MINISTRY OF AGRICULTURE AND RURAL DEVELOPMENT

FEASIBILITY STUDY OF

COASTAL RESOURCES FOR SUSTAINABLE DEVELOPMENT PROJECT (CRSD)

(issued in accompany with Decision No.698/QD-BNN-HTQT dated March 30^{th} 2012 of the Minister of Agriculture and Rural Development)

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CURRENCY EQUIVALENT

(Exchange rate effective as of 16/01/2012)

Currency unit = VND Vietnamese Dong

1 VND = USD 0,000048 1 USD = VND 21,028

In this report, the currency equivalent is applied as round figure: 1 USD = 21,000 VND

FISCAL YEAR

From January 1 – To December 31

ABBREVIATIONS AND ACRONYMS

ALDB Alternative Livelihood Development Board

ALP Alternative Livelihood Program

AMT Aligned Monitoring Tool

APMB Agricultural Projects Management Board

BMP Better Management Practices
CPC Commune People's Committee
CPS Country Partnership Strategy
CSC Central Steering Committee

DARD Department of Agriculture and Rural Development

DAH Department of Animal Health

DECAFIREP Department of Capture Fisheries and Resources Protection

DOF Directorate of Fisheries

DONRE Department of Natural Resources and Environment

DPL Development Policy Loan

EIA Environmental Impact Assessment
EMDP Ethnic Minority Development Plan
EMPF Ethnic Minority Policy Framework
EMF Environmental Management Framework

ERR Economic Rate of Return

ESMF Environment and Social Management Framework

EU European Union

FAO Food and Agriculture Organization

FM Financial Management FO Fishers' Organization

GAP Good Aquaculture Practices
GEF Global Environment Facility
GOV Government of Vietnam

IBRD International Bank for Reconstruction and Development

IC Information Center

ICB International Competitive BiddingICD International Cooperation DepartmentIDA International Development Association

IFR Interim Financial Report

IUU Illegal, Unregulated and Unreported fishing

M&E Monitoring and Evaluation

MARD Ministry of Agriculture and Rural Development

MCS Monitoring, Control and Surveillance

MIC Middle Income Country
MKD Mekong River Delta
MKD Mekong River Delta
MOF Ministry of Finance

MPI Ministry of Planning and Investment

NCB National Competitive Bidding

NCC North Central Coastal

OIE World Organization of Animal Health

OM Operational Manual PCU Project Central Unit

PDO Project Development Objective
PMU Project Management Unit
PPC Provincial People's Committee

PPMU Provincial Project Management Unit

PSC Provincial Steering Committee
RIA Research Institute for Aquaculture
RPF Resettlement Policy Framework
SEA Strategic Environment Assessment

SCC South Central Coastal
SPF Specific Pathogen Free
SIL Specific Investment Loan

WB World Bank

Project Sites Map



Project Provinces: Thanh Hoa, Nghe An, Ha Tinh, Binh Dinh, Phu Yen, Khanh Hoa, Soc Trang and Ca Mau.

INTRODUCTION

In implementation of the Decision No. 557/TTg-QHQT dated 09/04/2011 of the Prime Minister approving the categories of "Coastal resources for sustainable development" project, Ministry of Agriculture and Rural Development had promulgated Decision No. 83/QĐ-BNN-HTQT dated 13/01/2011 assigning the Project owner's tasks and allowing the preparation for investment of "Coastal resources for sustainable development" project conducted by Agriculture Projects Management Board. In project preparation, a consulting firm, Fisheries Consulting and Investment Joint Stock Company which was selected and contracted to elaborate the Feasibility Study, has closely cooperated with and been positively supported by relevant departments under Ministry of Agriculture and Rural Development, related agencies, project provinces and World Bank experts.

The Feasibility Study of the World Bank-loaned "Coastal Resources for Sustainable Development" project has been developed based on consultants' final report and Decision No. 48/2008/QĐ-TTg dated 03/04/2008 of the Prime Minister issuing General Instructions to the Development of Feasibility Study for ODA Projects of the 5-Bank Group and relevant World Bank guidelines. The Feasibility Study, apart from introduction, conclusion, recommendations and attached appendices, comprises 6 chapters as follows:

- Chapter 1: Project executive summary;
- Chapter 2: Context, background and the need for project investment;
- Chapter 3: Project description: design, resources and outcomes;
- Chapter 4: Total investment, budget allocation, financial plans;
- Chapter 5: Project management, implementation and operation; and
- Chapter 6: Project outcomes and impacts.

CHAPTER 1 – PROJECT EXECUTIVE SUMMARY

1.1. PROJECT DESCRIPTION, PROJECT PROPOSING, EXECUTIVE AND IMPLEMENTING AGENCIES

1.1.1 Project description

a. Project development objective

The project development objective is to improve the sustainable management of coastal fisheries in the Project Provinces. This objective would be achieved through: (a) institutional capacity strengthening for sustainable fisheries management; (b) good practices for sustainable aquaculture; and (c) good practices for sustainable coastal capture fisheries.

b. Project components and objectives

The project comprises following four components:

- Component A: Institutional capacity strengthening for sustainable fisheries management. This component aims to contribute to the improved national capacity in effective planning, institutional and policy, major changes at provincial and local levels as well as improved resources and sector planning.
- Component B: Good practices for sustainable aquaculture. This component would provide support for the promotion and development of good practices in coastal aquaculture, sustainable and responsible marine culture in selected areas focusing on extensive farming practices based on the improved sustainability, quality and risk management.
- Component C: Sustainable management of near-shore capture fisheries. This component would provide support for sustainable management of capture fisheries in near-shore areas through long-term benefitable activities, improved sector's adaptative and sustainable capacity. To this end, the project would carry out activities addressing resources depletion, negative affection to people's lives and properties in order to protect the infrastructure, improve product's quality, livelihoods and management of coastal resources and other essential ecosystems for the sustainability of capture fisheries.
- Component D: Project management, monitoring and evaluation. This component would provide necessary resources to ensure the effective project management and implementation and fulfill the objectives and outcomes as set out.

Component A: Institutional capacity strengthening for sustainable fisheries management (est. US\$5.3 million, of which IDA would finance 100%). This component would support three activities: (a) inter-sectoral spatial planning for coastal areas; (b) upgrading of Vietnam fisheries database (Vnfishbase); and (c) conducting selected policy research for the development and implementation of Overall Master Plan for Fisheries Sector to 2020.

Component B: Good practices for sustainable aquaculture (est. US\$48.1 million, of which IDA would finance around US\$39.9 million; the remainder would be financed by the government and beneficiaries). This component would support good aquaculture

practices (GAP) through: (a) improved bio-security management at farms and community levels; (b) improved seed quality management; and (c) improved environmental management.

Component C: Sustainable management of near-shore capture fisheries (est. US\$52.2 million, of which US\$44.8 million would be financed by IDA; the remainder would be financed by the government). This component would support: (a) co-management of near-shore capture fisheries at district and commune levels in combination with strengthened MSC system, and (b) improvement of hygienic conditions and enhancement of operational effectiveness of selected fishing ports and fish landing sites.

Component D: Project management, monitoring and evaluation (est. US\$12.3 million, of which IDA would finance around US\$10.0 million; the remainder would be financed by the government): This component would support: (a) effective project management; and (b) enhanced institutional capacity at province, district and commune levels for project monitoring, evaluation and maintenance of project outcomes.

1.1.2. Responsible agencies

a) Project Proposing Agency

Is Agriculture Projects Management Board of the Ministry of Agriculture and Rural Development (MARD).

b) Executive Agencies

MARD is a line agency responsible for overall project implementation. MARD would be responsible for: (a) approval of project's overall plans, inform of annual project plans/allocation of ODA budget's disbursement targets and arrangement of counterpart budget for project activities performed by PCU; (b) reporting to the Government on the project implementation results; and (c) coordination with relevant Ministries and sectors such as Ministry of Finance, Ministry of Planning and Investment and State Bank of Vietnam to carry out necessary procedures in case of project adjustment or re-structure for acceleration of project progress, disbursement rate and effectiveness use of IDA loan.

Provincial People's Committee is provincial line agency responsible for sub-components and activities undertaken in the province. The Provincial People's Committee would be responsible for: (a) approval of overall plans and annual arrangement of budget for project activities conducted by Provincial Project Management Unit (PPMU); (b) reporting to the Government and MARD on the project's implementation results; and (c) support to PPMU in project implementation, improved disbursement and effective use of IDA loan.

c) Implementing Agencies

Agriculture Projects Management Board (APMB): the project executive agency (project owner) at central level is APMB under MARD. APMB would decide the establishment of Project Central Unit (PCU)¹ and propose to the Minister of Agriculture and Rural Development to decide the appointment of PCU Director. PCU would include Deputy

¹ PCU is currently under Agricultural Projects Management Board (APMB). MARD is supposed to establish Fisheries Projects Management Board. In such case, CRSD would be moved to new entity and Fisheries Projects Management Board would replace APMB to become project owner.

Director, project accountant, procurement, planning, monitoring and evaluation staff and other support staff.

Project Central Unit (PCU) is a key body responsible for project implementation at central level and bears general duties in coordination, monitoring and implementation of entire project activities at central level as well as among the provinces, including the monitoring of project procurement, management, monitoring and evaluation. PCU is responsible for synthesis of project reports, provide instructions and guidelines to PPMU to carry out project activities.

Provincial Department of Agriculture and Rural Development (DARD) is the investment owner of sub-components and project activities at provincial level. DARD would issue the decision on the establishment of Provincial Project Management Unit (PPMU) and appoint PPMU Director. PPMU would include Deputy Director, project accountant, procurement, planning, monitoring and evaluation staff and other support staff.

Provincial Project Management Unit (PPMU) is a key agency responsible for project implementation at provincial level. PPMU is entirely responsible for project activities at provincial level, including the procurement, financial management, project management and monitoring, evaluation of project implementation results. PPMU would work under the monitoring and guidance of Provincial Project Steering Unit, DARD and PCU.

d) Agencies responsible for support, consultancy and coordination in project implementation

Central Steering Committee (CSC): MARD would establish a Central Steering Committee led by MARD leardership to provide operational orientation for the project implementing agencies. The leader of Directorate of Fisheries would act as Standing Deputy Director of Central Steering Committee. The staff of Directorate of Fisheries would act as Standing Secretary to assist the work of CSC. CSC would include members representing Ministry of Finance, Ministry of Planning and Investment, State Bank of Vietnam, Ministry of Natural Resources and Environment, technical departments under MARD namely International Cooperation Department, Department of Finance, Department of Construction Management, Agriculture Projects Management Board etc. CSC would meet at least twice a year to support project implementing agencies in case of obstacles or difficulties emerged during implementation.

Directorate of Fisheries (DOF) under MARD is an agency responsible for general fisheries management. DOF would provide instructions in terms of policy and technical assistance to the Project to ensure the sound implementation supplemented to the sector's and Government's programs. DOF could determine and appoint DOF staff to work on full time basis at PCU to provide technical support to relevant components.

Department of International Cooperation under MARD would assist the coordination among Ministries, sectors and donors and report to the MARD's leadership in making important decisions related to the project, especially in case of project adjustment.

Department of Finance under MARD is a responsible agency to submit overall plans to the MARD for approval (or revision) of the entire project and allocate annual budget from ODA and central counterpart contribution in accordance with current regulations.

Department of Aquaculture, Department of Animal Health, Department of Capture Fisheries and Resources Protection and other technical departments under MARD, including research institutes would take part in project activities upon request of the PCU to provide technical support and coordinate in implementation of research programs related to aquaculture, capture fisheries and institutional capacity strengthening.

Research Institutes for Aquaculture No. 1, 2 and 3 (RIA) would take part in the project implementation under PCU management to coordinate the implementation of research on domestication and improvement of shrimp and fish seed quality.

Other technical departments of MARD would take part in monitoring, coordination and support CPU in the project implementation in accordance with their functions, mandates and assignments as authorized by MARD leadership.

Vietnam Administration of Seas and Islands (VASI) under Ministry of Natural Resources and Environment would take part in the project upon request of PCU to support the implementation of activities related to integrated inter-sector spatial planning and strategic environment assessment.

Provincial Steering Committee (PSC): At provincial level, the Provincial People's Committee would establish a provincial Project Steering Committee (PSC) headed by a Vice Chairman of the People's Committee to provide orientation for PPMU operations. PSC would meet at least twice a year to support PPMU to solve important issues during project implementation.

Sub-Department of Aquaculture, Sub-Department of Animal Health, Sub-Department of Capture Fisheries and Resources Protection and other technical departments under DARD would take part in the project upon request of PPMU to provide technical support for the project.

Department of Natural Resources and Environment (DONRE) would take part in the project upon request of PPMU to support the activities related to the preparation of environment management, monitoring and surveillance plans.

District/commune governments (district/commune People's Committee) in the project sites would take part in the project upon request of PPMU to support the implementation and monitoring of project activities at the localities.

Fishers/farmers organizations (FO) would be established on voluntary basis with the project support to facilitate the application of good aquaculture practices (GAP) under component B and take part in fisheries co-management models under component C.

Co-management arrangements include members from fishing communities and local authorities (commune People's Committee) and would support the preparation and implementation of fisheries co-management plans with the participation of relevant stakeholders in the coastal areas assigned for management.

1.2. PROJECT IMPLEMENTATION SCHEDULE

The project would be undertaken in 5 years commencing from 2012 to 2017. Tentative project implementation schedule is as follows:

- Agreement negotiation: April/2012.

- Agreement signing: June/2012.
- Project effectiveness: September/2012.
- Project termination: December/2017
- Credit disbursement termination period: 4 months after project termination.

1.3. PROJECT SITES

The project would be conducted in eight provinces: Ca Mau and Soc Trang (Mekong Delta Cluster); Khanh Hoa, Phu Yen, and Binh Dinh (South Central Cluster); and Ha Tinh, Nghe An, and Thanh Hoa (North Central Cluster).

As initially planned, the project would focus on a limited number of coastal provinces along the East Sea with three specific regions to affect, create livelihood and limit any possible obstacles during project implementation. The regional allocation is designed in accordance with economic development to improve and promote ecosystem and regional planning between administrative borders. The selection criteria of relevant provinces are based on the importance of fisheries sector over the province's economy and livelihoods, and/or the significant contribution to the fisheries sector. The indicators for evaluation are comprised of (1) economic output, catches, employment, number of people living in near shore areas in the province; (2) the proportion of provincial fisheries sector in the national economy and export. The primary objective of the project is to make improvement at the first level (provincial level). As such, the project would contribute to the improvement at national level. It is difficult and ineffective to make immediate effort in improvement at national level.

Each geographical group (3 clusters) would cover provinces that have similar characteristics (social, economic, cultural, climate features, the same problems and types of natural resources). The grouping is based on the advantages for the management and knowledge sharing among provinces and between processing capacity and hatcheries, the ease for operational monitoring, cooperation and interaction among WB funded projects.

Following provinces were taken into consideration representing three geographical groups:

- Group 1 North Central Cluster: Thanh Hoa, Nghe An.
- Group 2 South Central Cluster: Quang Ngai, Binh Dinh, Phu Yen, Khanh Hoa, Ninh Thuan, Binh Thuan.
- Group 3 Mekong River Cluster: Soc Trang, Bac Lieu, Ca Mau, Kien Giang.

The final selection would be made based on the difference in the readiness for project implementation and relevance.

Based on the above-mentioned selection determination and official document No. 557/TTg-QHQT dated 09/04/2011 of the Prime Minister approving the catagories of WB-financed "Coastal resources for sustainable devleopment" project that instructs MARD to work with WB to consider and supplement Ha Tinh province to the list of project provinces. In project preparation, WB and MARD had reviewed, discussed and agreed upon the selection of

eight project provinces including Ca Mau and Soc Trang (Mekong River Delta); Khanh Hoa, Phu Yen and Binh Dinh (South Central Cluster) and Ha Tinh, Nghe An and Thanh Hoa (North Central Cluster).

1.4. PROJECT BUDGET

Project budget would be US\$ 117.9 million as presented in Table 1.

Table 1: Estimated project investment and budget (1000 USD)

		Budget composition			
Components	Total budget	IDA	Central counterpar t budget	Local counterpar t budget	Contribution of beneficiaries
Component A	5,272	5,272		-	-
Component B	48,129	39,921	115	1,883	6,210
Component C	52,232	44,786		7,446	-
Component D	12,257	10,021	312	1,924	-
Total	117,890	100,000	427	11,253	6,210
Total budget over total cost	100%	84.8%	0.4%	9.5%	5.3%

International Development Association (IDA/WB) would provide a Credit by Special Drawing Right (SDR) equivalent to 100 million USD from Specific Investment Loan (SIL) to finance 84.8% of total project budget. Central counterpart contribution would be 0.4 million USD, equivalent to 0.4% of total project budget. Local counterpart contribution would be 11.3 million USD, equivalent to 9.5% of total project budget. Project beneficiaries would contribute 6.2 million USD, equivalent to 5.3% of total budget.

In addition, Global Environment Facility has committed to provide a non-refundable budget equivalent to 6.5 million USD to the project through WB Trust Fund. At present, WB and MARD are proceeding relevant procedures to receive this grant.

CHAPTER 2 – PROJECT CONTEXT AND RATIONALE

2.1. RATIONALE FOR THE NEED AND URGENCY OF PROJECT

2.1.1. Vietnam's macro environment and development policy

Vietnam is considered a major development 'success story'. With sustained high rates of growth over the past decade, Vietnam's Gross National Income per capita reached US\$1,100 in 2009, enabling the country to become a Middle Income Country (MIC). Over the past two decades, Vietnam's poverty rate has fallen dramatically from 58% in 1990 to an estimated 29% in 2000, and to around 9.5% in 2010. Despite these impressive gains, a large number of Vietnamese households remain vulnerable to livelihood disruption or consumption variability due to natural hazards, macro-economic instability, and/or growing pressures on the country's natural resource base. In addition, climate change impacts have created the medium and long-term challenges for the economy and the livelihods that required the adaptable behavior and investment. Vietnam is identified to be one among 5 countries of the most vulnerable countries due to natural hazards such as drought, storms and floods, number of people affected and approach scale.

This co-existence of rapid growth and increasingly high vulnerability applies, per force, to Vietnam's fisheries sector, including both capture fisheries and aquaculture. The sector has experienced very rapid growth ² over the past two decades. Vietnam ranks third in world aquaculture production (behind China and India) and sixth in terms of aquatic product exports. Domestic consumption is also growing rapidly, with the Vietnamese now obtaining nearly 50% of their dietary protein from aquatic products³. Despite such growth and increased socio-economic importance, the Vietnamese fisheries sector is at risk, due to a depleting resource base for marine fisheries, increasing environmental and disease problems in aquaculture, associated financial difficulties experienced by large numbers of sectoral participants, and a less than favorable international reputation.

There are evident signs that the past growth of the country's marine capture fisheries is non-sustainable. Volume growth has nearly halted in recent years, except with respect to lesser value fish species. Productivity is declining ⁴ and the share of 'trash fish' and small-sized fish in the landed catch is increasing ⁵. Overfishing is especially evident in the near-shore areas, which are the fishing grounds for some 85% of country's fleet and the primary

² Between 2000 and 2010, the sector's average annual growth was 13.6% in volume terms and 10.4% in value terms. Fisheries production in 2010 was estimated at 5.2 million tons, including 2.5 million tons from capture fisheries and 2.7 million tons from aquaculture. The sector now accounts for about 4% of GDP and 8% of Vietnam's merchandise exports. Its share of GDP is similar to that of the garments/textile industry. Its share of net foreign exchange earnings is much higher given that some important export sectors (e.g., garments, footwear, and wood products) feature high import content. The sector is very labor intensive: nearly eight million people now rely on fisheries-related activities for a major source of income and employment.

³ While Vietnam's aquatic product exports have grown exponentially and now exceed 1.3 million tons (\$5 billion per annum), more than two-thirds of the volume of fish caught or produced is consumed domestically.

⁴ Over the 1990-2008 period, there was a sevenfold increase in the horsepower capacity of the fishing fleet, compared with a threefold increase in production. While marine capture productivity has been falling for an extended period, the situation appears to have gotten considerably worse in recent years.

^{5 &}quot;Trash fish" or "by-catch" now accounts for an estimated 60% of the total marine catch. Most of this is consumed locally or used in the production of fish sauce or fish feed, used in aquaculture. Excessive 'trash fish' harvests are removing the seed and fingerlings of many valuable species, thus contributing to the depletion of coastal resources.

source of livelihood for most poor or near poor coastal communities. The near-shore fisheries is experiencing a classic 'tragedy of the commons' phenomenon, as too many fishers are now competing over an insufficient and dwindling "open access" resource, while also contributing to marine habitat destruction. The short-term incentives for individual fishers are incompatible with the longer term interests of the coastal communities and the needs for sustainable resource management.

It is increasingly challenging to sustain aquaculture production due to increased risks of disease and environmental pollution. The sub-sector's growth has been phenomenal, especially over the past decade. In 2008, Vietnam accounted for almost 5% of global aquaculture output - more than triple its share from a decade earlier. This sector is increasingly dependent on the two major species - fresh water catfish (Pangasius sp) and brackish water tiger shrimp (Peneus monodon)- the sector growth focused on limited geographical areas, mainly in Mekong River Delta. The economic risk due to the lack of diversity (in terms of species and geography) relates to the production potential and market fluctuation. Disease is now the major production risk; there are also potential problems in sourcing high quality seed and broodstock. The expension of aquaculture has also contributed to environmental damage, including coastal mangrove forest. Weak environment management in inland and coastal aquaculture has led to water pollution. The market risk related to the competitiveness, tarriff/anti-dumping measures, limited access to other markets and price instability. Over years, many small-scale fish farmers have had to abandon their operations due to disease and/or financial problems. However, there is remarkably potential for diversification of Vietnam aquaculture products that brings changes in the near future for value chain management and production practices for better management of the risks that aquaculture sector is facing.

2.1.2. Project conditions and background

Vietnam is a major coastal country in the East Sea, which is considered to be one of ten marine eco-diversity hubs and one of twenty sea areas with the richest marine resources in the world. Vietnam has marine indicator of about 0.01, six times higher than the world average value. It has a coastline of more than 3,260 km, territorial sea and EEZ covering 1 million km² with more than 4,000 small and big islands from the North to the South. Two offshore archipelagoes namely Paracel and Spartley covering a very crucial position in the East Sea. Within the mainland areas of over 330,000 km², Vietnam boasts high density of rivers and channels with many estuaries, bay, lagoons and 8 different ecosystems. Vietnam can develop aquaculture activities in upland, low land, midland, islands and most of watersheds from coastal to offshore areas or in inland areas.

Over years, Vietnam fisheries sector has kept growing towards the improvement of production, quality and effectiveness; produced for both domestic and export markets that significantly contributed to the national economy. With 28 coastal provinces accounting for 53% of the national population, the economy of coastal provinces is mainly dependent on natural resources, aquaculture and capture fisheries which play the largest proportion in the national income and employment. The productivity value directly derived from fisheries sector has accounted for nearly 6% GDP, 10% of total employment and 8% of export products. In 1985, the fisheries productivity was 1.16 million tons and this level was increased to more than 4.6 million tons in 2008 (an increase of 4.5 times). Of which, marine catch was on 2.35 times increase with the average growth of 3.79%/year; aquaculture was

increased to nearly 8.82 times with average growth speed of 9.99%/year. The average growth speed of fisheries productivity reached 6.17%/year for 1985-2008. GDP (as per competitive price in 1994) of fisheries sector during the period of 1995 - 2000 (including capture fisheries and aquaculture) was increased from 5.262 billion dongs in 1995 to 6,680 billion dongs in 2000; the average growth speed reached 4.89%/year which was higher than that in agriculture (4.53%/year) and forestry sectors (1.18%/year); in the period of 2001 - 2008, fisheries sector gained the average growth speed at 8%/year (3.35% and 1.03% of agriculture and forestry respectively).

However, marine and coastal resources (natural assets which are considered to be most crucial for rehabilitation) together with the development of fisheries sector are increasingly suffering from pressure and seriously depleting due to the combined impacts of overfishing, illegal fishing, improper production methods, competition in land and water use, increased population, urban and industrial pollution and others. In capture fisheries, the catch, quality and catch value are directly affected. In aquaculture, the direct impact is reflected in productivity production, quality and sector's general competitiveness.

There is a need to move from (fragmented) sectoral planning to inter-sectoral spatial planning for coastal resources. Responsibilities for coastal zone planning cut across different Ministries. Planners and policy-makers operate on the basis of limited data, including estimates of available fish stocks, patterns of fish catches, and even the number of fishing boats operating in different locations. Provinces compete with each other, rather than collaborate, which often leads to duplicative investments (e. g., landing sites, protective harbors) and inconsistent (or conflicting) plans/approaches. Anticipated private investments are often not reflected in government plans. While some donor-supported initiatives on integrated coastal zone management have been piloted in several coastal provinces, this approach has not yet been institutionalized or widely adopted.

Good aquaculture practices (GAP) are likely to be the key solution to manage disease and environmental risks. Each year diseases affect some 30% to 70% of the total grown area, reducing yields and leading many growers to fail entirely. In shrimp farming, diseases are mainly caused by low quality and infected seed; there is currently no system in place to certify sources of quality seed and to ensure that adequate bio-security measures are taken at the farm level. Current public veterinary services for aquaculture disease surveillance, containment and response are weak. Farmers often apply antibiotics and chemicals to overcome disease risks, which affects the reputation of Vietnam's seafood in international markets. To facilitate the wide adoption of GAP among producers, a range of public services – including those related to bio-security, veterinary measures and environmental monitoring – need to be strengthened.

Co-management could help enforce regulations and improve sustainability of near-shore fisheries. A combination of over capacity and destructive fishing practices is taking a heavy toll on biodiversity, the quality of resources, and the viability of livelihoods of many coastal communities⁶. Fisheries co-management pilots have so far been implemented in closed systems (e.g., lagoons, reservoirs), but have not been tried in open access areas, e.g.,

⁶ Over 100,000 small fishing boats are operating in near shore areas (6 nautical miles landward) and most of them have engine capacity of less than 50 CV. Most of fishing gear that are being used violate current regulations related to mesh size leading to the high rate of trash fish on daily catch. In some cases, explosives or chemicals are used to damage coral reef and spawning areas. Most of fishers interviewed told about the rapid

coastal areas. Decree No. 33/2010/ND-CP issued by the government in 2010 explicitly assigns open access coastal areas to local authorities and fishing communities to implement a partnership of co-management models. To translate this into action, local fishing communities, as well as local authorities, would need support to strengthen their capacity to carry out their new responsibilities.

Improving hygienic conditions and operational efficiency of fishing ports and landing sites can immediately provide a high return to the sector. There are over 80 small fishing ports and hundreds of traditional landing sites in the country; however, most of them lack facilities to provide necessary support services to fishermen (e.g., clean ice, net and boat repair). Under hot weather conditions, the quality of fish is severely damaged before reaching processing facilities or wholesale markets. Losses in the value of the catch are estimated at between 20% and 30%, resulting in considerable economic losses for fishing households, severe underutilization of fish processing capacity, and serious localized pollution around landing sites and wholesale markets.

Enhancing fisheries database system is of urgent need. The growth speed in fisheries product export from Vienam to European Union (EU) has been reduced since 2010 due to the weak fisheries communication and statistic systems that do not support to the compliance of EU existing regulations on illegal, unreported and unregulated fishing (IUU). Fisheries database system needs to be improved and small-scale fishers need to be provided with training to meet EU requirements.

Addressing the risks and shortcomings of the sector would require a collective and long term effort. A complex set of challenges has emerged from more than two decades of rapid (and largely uncontrolled) growth in the sector. Important advances can be made within the value chain for aquatic products, yet these need to be complemented by an improved and enforced regulatory framework, and pursued within a strategic orientation which emphasizes sustainability and quality. Addressing the sector's challenges, and putting it on an assured sustainable path would likely take a decade or more, yet the opportunities for socio-economic and environmental benefits are enormous and significant gains can be made.

The sector's new master plan should shift the prevailing orientation from meeting production and catch volume targets to emphasizing improved management of coastal resources, improved risk management, and improved product quality and value addition. The Master Plan for fisheries development to 2010 expired last year and the government is in the process of preparing a new Master Plan for fisheries development to 2020. Studies are needed to support Ministry of Agriculture and Rural Development (MARD) and coastal provinces in this important planning exercise.

2.1.3. The need for market expansion and sustainable development in fisheries sector

Over the last two decades, aquaculture has become a leading sector in agricultural development, seafood and fishery product export value has reached its highest growth speed among all export commodities of Vietnam. Domestic market for fish and fishery products has been increasingly developed with nearly 50% of animal protein from fishery products are available at Vietnamese diets. The robust development of material production, especially in aquaculture sector in recent years has increased the volume of fisheries materials, leading to increased capacity of processing establishments and labour demand. Fish processing sector has initially been available in limited urban or industrial areas. To date, it has been developed and

expanded throughout the country. A number of frozen fish processing establishments was increased from 170 in 1995 to 550 industrial-scale ones in 2008 with advanced regional and global technologies. Of which, three fourth (3/4) of the establishments are qualified to export to main markets. Fisheries export values are increasingly developed over years, facilitating Vietnam to become one of ten largest fisheries export countries in the world. Fisheries export revenue was increased over 50 times in 2008 (from 0.09 billion USD to 4.51 billion USD) compared to that in 1985. By 2008, fish and fishery products of Vietnam were exported to nearly 160 countries and territories in the world. The need of fish and fishery products in domestic and export markets is forecast to be increasingly on the rise in the coming time providing that stricter requirements on food hygiene and safety are satisfied, especially with export products.

Marine and coastal (brackish) aquaculture development is an important sector in coastal economy and therefore, this is an essential part to meet the predicted demand of fishery products in the future as well as to maintain or improve fisheries productivity. In the past, the significantly increased productivity was achieved thanks to the expansion of farms and promoted production system from extensive to semi-extensive/intensive production and improved production of high value species (such as lobster). In 2007, it was the first time that farmed products dominated over fished products. However, the measures that were and being applied in many localities are not appropriate any longer so fish farmers are facing concerned problems such as:

- Increased pollution from farming areas and urban areas;
- Disease outbreak: Higher number of farming areas increases farming density and single-species fishing methods lead to the disease outbreak;
- Environmental impact: The conversion from mangrove forest and wetlands to aquaculture sites has seriously affected the environment such as disappearance of growing areas of marine and brackish species as well as loss of mechanism for environmental protection against natural hazards such as storms and floods;
- The structural changes such as sea level rise due to climate change and the requirements of international trade have made these sector vulnerable;
- All these problems plus the insufficient capacity in investment of relevant stakeholders have hampered overall productivity and threatened the sustainability of this economic sector in the future. Productivity is defined to be number of output per each input unit (labor, equipment and capital). Many shrimp farmers have had to abandon their ineffective farming ponds because the output is not enough to cover the operational cost. Cause and effect relation among these problems becomes more complicated and can not be easy to solve. There is a common feature is that aquaculture sector can not reach its quality and quantity potential. Therefore, how to develop this sector in the future would relate to the improvement of product quality and quantity. A "high quality product" is not only the one that meets the food hygiene and safety requirements (chemical residues, bacteria...) but it is also a product that can be produced by environmentally friendly method and limit its impact. As such, the product would have higher price and become more competitive. Post-harvest technology and marketing also affect the product competitiveness.

Capture fisheries have been at standstill over the past decade. Most of near-shore areas have been over-exploited, causing the many difficulties for coastal—dependent fishing communities. Near-shore catch per unit effort (CPUE) has reduced from 1.11 ton/horse power/year (1985) to 0.35 ton/horse power/year (2008), while the fishing cost was increased and catch value was reduced. Accordingly, general economic returns are on reduction. Fisheries productivity seems not to increase but reduce in the future because of depleting coastal and marine resources and ecosystems – the essential assets of the fisheries. Major elements for the reduction of resources and ecosystems include:

- Illegal fishing and illegal overfishing;
- Loss of aquatic habitat due to destructive fishing gear (small mesh size, using explosives in fishing);
- The increase in capture of small fish which have high value;
- Water pollution due to rapid urbanization in coastal areas and other use sources (oil and gas, tourism, aquaculture etc);
- Fundamental causes of these problems are clarified, including the prolonged open access, trader's competitiveness for profit, increased production objectives, lack of earlier master plan for natural resources exploitation capacity, the weakness in management of fishing activities and fishers have no other alternative livelihoods.

In brief, there is no single solution to these complicated issues and the tendency of impact should be taken into account.

The external factors such as climate change, sea level rise, unstable markets, increased international requirements and standards related to food hygiene safety and traceability of origin have also contributed to the more vulnerability of regional economy and coastal fishing communities. A recent study revealed that seawater intrusion occurred in many places in the Mekong River Delta. The impact of sea level rise in the future would be greater in the coastal areas of East Sea – which is a rice hub and major aquaculture sites of the country. Climate change does not only cause material losses and damages but also affects the productivity and biological characteristics of marine species (such as development speed, changes in species' and disease's location and composition), marine ecosystem (such as changes in plants, water quality, calcification) as well as the employment in aquaculture sector.

However, existing protective infrastructure is not adequate and needs to be further invested to protect current assets and adapt to the climate changes in the future by diversified species culture. Regular natural hazards such as storms and floods would additionally affect fisheries and fishers livelihoods. Negative socio-economic impacts can be minimized through protection, preparedness and response to future developments. In addition, fluctuating market conditions, increasing international standards and requirements on food hygiene and safety and traceability of origin are affecting vulnerable areas of this sector as the case of catfish anti-dumping.

These negative tendencies reduce profits and property's use of the fishers, fish farmers and processors. This trend can totally alter the past achievements and impose risks on the economic development in coastal areas of Vietnam.

Vietnam's Fisheries Development Strategy to 2020 approved by the Prime Minister on September 16, 2010 (Decision No. 1690/2100/QD-TTG) re-orients the development of the fisheries sector focusing more on product quality and sustainable growth. The Coastal Resources for Sustainable Development Project (CRSD) would support MARD in implementing its new Development Strategy. CRSD project is consistent with the Bank's Vietnam Country Partnership Strategy (CPS) to create and maintain development opportunity while increasingly focuses on natural resources management (Pillar II). By contributing to the product quality improvement and reduction of actual losses, the Project would also contribute to the implementation of action plan of CPS related to improvement of competitiveness (Pillar I). By supporting the vulnerable fishing households, the Project would partly contribute to the CPS action plan on poverty reduction and economic opportunity creation (Pillar III). The project also addresses the Government's development priorities related to improvement of resilience of coastal zones to climate change, enhancement of sustainability of coastal infrastructure investments, and promotion of the competitiveness of the coastal areas' resource-based economy. CRSD would serve to complement other Bank instruments, including the Specific Investment Loans (SILs) focusing on water resources management and disaster risk management, and Development Policy Lending for climate change.

2.1.4. Project's legal basis

- Fisheries Law No. 17/2003/QH11 dated 26/11/2003;
- Environmental Protection Law No. 52/2005/QH11 dated 29/11/2005;
- Construction Law No. 16/2003/QH11 dated 26/11/2003;
- Decree No. 131/2006/NĐ-CP dated 09/11/2006 issuing the Government's regulation on the management and use of ODA;
- Decree No.01/2008/NĐ-CP dated 03/01/2008 of the Government governing the function, mandates and organizational structure of MARD;
- Circular No.04/2007-TT-BKH dated 30/7/2007 issued in accompany with Decree No.131/2006/NĐ-CP of Ministry of Planning and Investment guiding the implementation of the regulation on ODA management and use;
- Circular No. 108/2007/TT-BTC dated 07/9/2007 of the Ministry of Finance guiding the financial mechanism of ODA programs and projects;
- Decision No.48/2008/QĐ -TTG, dated 03/4/2008 of the Prime Minister issuing the General Guideline on establishment of feasibility study for the projects which use ODA from 5 groups of banks;
- Decision No.10/2006/QĐ-TTg dated 11/01/2006 of the Prime Minister approving the Fisheries Sector Comprehensive Master Plan to 2010 and Orientation to 2020;
- Decision No.1690/2010/QĐ-TTg dated 16/12/2010 of the Prime Minister approving Fisheries Sector Development Strategy to 2020;
- Decision No.124/QĐ-TTg dated 02/02/2012 of the Prime Minister approving overall Master Plan of Agriculture Sector to 2020 and Vision to 2030.
- Decision No.332/QĐ-TTg dated 03/3/2011 of Prime Minister approving Proposed Project on Aquaculture Devleopment to 2020;

- Decision No.2194/QĐ-TTg dated 25/12/2009 of the Prime Minister approving Proposed Project on development of agriculture, forestry, fisheries seeds and livestock breeds to 2020;
- Decision No.60/2010/QĐ-TTG dated 30/9/2010 of the Prime Minister issuing the principles, criteria and assigned allocated capitals for development from State budget for 2011-2015;
- Circular No. 11/2012/TTLT-BNNPTNT-BTC-BKHDT providing guidance on the State budget management and use for Proposed Project on development of agriculture, forestry, fisheries seeds and livestock breeds to 2020.
- Decision No.742/QĐ-TTg dated 26/05/2010 of the Prime Minister approving Master plan on Vietnam marine protected areas to 2020;
- Decision No.346/QĐ-TTg dated 15/3/2010 of Prime Minister approving Master plan on fishing ports and fish landing sites system to 2020 and orientation to 2030;
- Decision No.2374/QĐ-TTg dated 28/12/2010 of Prime Minister revising and supplementing the investment mechanism for fishing ports type II under the Decision No. 346/QĐ-TTg dated 15/3/2010 of the Prime Minister approving Master plan on fishing ports and fish landing sites system to 2020 and orientation to 2030;
- Decision No.1349/QĐ-TTg dated 09/8/2011 of Prime Minister revising the Master plan of protective harbors/shelthers for fishing vessels to 2020, orientation to 2030;
- Official document No. 557/TTg –QHQT dated 09/04/2011 of Prime Minister approving the catagories of WB funded project "Coastal resources for sustainable development";
- Decision No. 83/QĐ-BNN-HTQT dated 11/1/2011 of the Minister of Agriculture and Rural Development allowing the investment preparation and assignment of investor tasks for ODA loaned and WB-funded project "Coastal resources for sustainable development".
- Legal basis related to standards and criteria on the environment in project desgin as presented at item 3.7.1 in the report.

2.2. PROJECT OBJECTIVE

2.2.1. Project development objective

The project development objective is to improve the sustainable management of coastal fisheries in the Project Provinces. The overall objective would be achieved through: (a) strengthened capacity building in sustainable management of resources; (b) enhanced good practices in sustainable aquaculture; and (c) good practices for the sustainable coastal capture fisheries.

The project comprises the following four components:

 Component A: Institutional capacity strengthening for sustainable fisheries management. The component's objective is contribute to effective strengthening of national capacity in planning, institutional and policy, bringing major changes at provincial and local levels as well as the improvement of resources and entire sector planning.

- Component B: Good practices for sustainable aquaculture. The component's objective is to support the promotion and development of good practices in coastal aquaculture, sustainable and responsible marine culture in selected areas, focusing on the extensive farming practices thanks to the improvement of the sustainability, quality and risk management.
- Component C: Sustainable management of near-shore capture fisheries. The component's objective is to support the sustainable management of capture fisheries in near-shore areas through long-term benefit activities, improved sector's adaptative and sustainable capacity. To this end, the project would carry out activities targeting the factors that deplete the resources, negatively affect the people's lives and properties to protect infrastructure, improve product's quality, livelihoods and the management of coastal resources and other essential ecosystems for the sustainability of capture fisheries.
- Component D: Project management, monitoring and evaluation. The component's objective is to provide necessary resources to ensure the effective project management and implementation and achieve the objectives and outcomes set out.

2.2.2. Major outputs

Major outputs of the project:

- Inter-sectoral planning of coastal areas is successfully conducted and applied in pilot districts of project provinces;
- Project provinces have fisheries database system upgraded and fully operated;
- Legal framework on aquaculture, fisheries resources protection and development is consolidated.
- Fish farming households apply Good Aquaculture Practices (GAP);
- Shrimp diseases in farming areas applying GAP in project areas are reduced;
- Income of fish farmers is increased thanks to GAP application;
- Coastal fisheries co-management is successfully conducted and applied in pilot districts;
- Fisheries resources rehabilitation is increased in coastal areas of project provinces;
- Fishers income is increased thanks to co-management application.

Key PDO level result indicators:

- Indicator 1: Increase in the proportion of farms meeting national standards for water effluent following the adoption of Good Aquaculture Practices.
- Indicator 2: Reduction in shrimp disease losses in the production areas applying Good Aquaculture Practices.
- Indicator 3: Increase in the proportion of areas in which sustainable Near-Shore fisheries resource management systems are applied.

2.3. THE APPROPRIATENESS AND CONTRIBUTION TO NATIONAL STRATEGY

This project is developed in consistency with Vietnam Fisheries Sector Development Strategy to 2020 and World Bank's Country Partnership Strategy to create and maintain the development opportunity with an increasingly concern over natural resources management, including marine and coastal natural resources. The project meets the development objectives of Vietnam Government to improve the coastal areas's responses to climage change, strengthen the sustainability of coastal infrastructure investment catagories and improvement of coastal resource-based effectiveness and competitiveness of the economy. Vietnam is preparing draft new socio-economic development Strategy for 2011-2020 and the socioeconomic development Plan for 2011-2015. The socio-economic development Plan for 2011-2015 is a basis for World Bank to draft new Country Partnership Strategy in the fiscal year of 2011. Coastal and marine resources are an important priorities of the socio-economic development Plan for 2011-2015. This project would contribute to supplemented and increased effectiveness of other projects which were, are being and would be funded by the WB, particularly forthcoming Project to Provide Financial Support to Climate Change (Climate Change DPL) and other projects focusing on water resource management and natural hazard's risk management.

The WB has listed this project on the support program for 2011-2013 based on MARD proposal and the consensus of Ministry of Planning and Investment, Ministry of Finance and State Bank of Vietnam.

In fisheries sector, in addition to the economic development and fisher's income improvement, the project would remarkably affect the marine environment and climate change. In this regard, the WB particularly pays attention to the projects for environmental protection, especially the studies, research projects and recommendations on solutions to climate change. Accordingly, the "Coastal Resources for Sustainable Development" project both targets marine and coastal resource exploitation for sustainable development and flexibly adapts to climate change and environmental protection. In addition, WB gives priority to the projects targeting UN Millennium Development Objectives, including issues on ecological balance and environmental protection, creation of sustainable livelihoods and reduction of pressure on natural resources. The proposed project would actively contribute to these objectives.

2.4. RELATION WITH RELEVANT PROJECTS

The WB is a major donor of Vietnam. It has committed to support Vietnamese Government in implementation of socio-economic development objectives. Over years, WB has supported Vietnam in economic development in general and in agriculture, fisheries and rural development in particular. The WB-funded major projects to support agriculture and rural development include: Agricultural Sector's Remedy Project, Agricultural Diversification Project, Avian Flu Remedy Project, Avian and Human Flu Prevention Project, Vietnam Epidemic Prevention Project, Competitiveness Strengthening in Livestock Production and Food Hygiene and Safety Project and Agricultural Competitiveness Project, WB-funded Water Resource Project number 1, 2 and 3, Forest Protection and Rural Development Project, Coastal Wetland Development and Protection Project, Forestry Development Project, Natural Disaster Mitigation Project, Safe Water and Sanitary Environment in Red River Delta Project. The WB funded projects contribute to the agriculture sector development, poverty reduction, improvement of agricultural product competitiveness, remedy of damages caused by natural disasters, improvement of rural lives quality and environmental protection.

Over years, international organizations such as NACA, SEAFDEC etc and other countries in the world and region have undertaken many research programs, trainings, workshops and conferences on aquaculture in Vietnam. The projects funded by international organizations have supported many studies on capacity building for research institutes for aquaculture such as NORAD, ICLARM, ACIAR, AIT etc.

In 1993, fisheries sector was selected as one of three sectors subject to Dannish development aid to Vietnam. The first primary activity was to support to prepare a sector's comprehensive plan, followed by Assessment of Living Marine Resources of Vietnam Project (ALMRV-I) and Seafood Export and Quality Improvement Project (SEAQIP-I). Phase II of these projects was integrated into the components under FisheriesSector Support Program (FSPS-I) which was started in January 2000.

FSPS funded by Dannish International Deveopment Agency (DANIDA) in phase I (2000-2005) comprised of two components: SUFA (Support to Freshwater Aquaculture) and SUMA (Support to Brackish Aquaculture) and phase II (2006-2012) was combined as SUDA and supported capacity building for fisheries sector in some provinces. The program has supported infrastructure, information equipment, technical training, hatchery management and aquaculture in 9 provinces over the last 10 years. FSPS also supported the Research Institutes for Aquaculture, universities and vocational high schools to improve breed production technology, commercial breeding, nutrient feed, disease prevention and control etc. The support from this program helped improve institutional capacity, providing a strong basis for WB-funded project design.

In capture fisheries, ADB-loaned Vietnam fisheries infrastructure upgrading project (1997-2003) supported Vietnamese Government to improve, upgrade and build 10 fishing ports at 9 coastal provinces and cities for providing additional shelters from about 3,500 boats and promote the fish product transaction via port of about 35,000 tons/year. The operational ports have contributed to the significant improvement of fishing capacity for effective marine capture in offshore areas, contributed to the marine resource protection, coastal hygienic conditions and more jobs for workers.

The past and current projects, pilot models and their lessons learnt have been used as solid scientific background for lessons learning, formulation and desgin of CRSD project.

2.5. JUSTIFICATION OF PROJECT ESTABLISHMENT

Marine and coastal resources are of the most important renewable natural resources in Vietnam. These resources are under increasing pressure and depletion. The Government and relevant stakeholders have been aware of the need for important changes to protect and use marine and coastal resources in sustainable manner as a means to ensure the survival and long term competitiveness of fisheries sector, to maintain coastal economy and other related livelihoods. While the planning documents continuously emphasize on the quantity in catch, trade and farmed productivity, the central and local governments, coastal communities and private enterprises need to realize that the change in marine and coastal resource management as well as the applied methods in fishery value chain are very important. This ensures a long term existence and competitiveness of the sector together with the maintenance and development of coastal economy. The solutions are reflected in Vietnam Fisheries Law, 5-year Master plan on fisheries development for 2006 – 2020, Fisheries sector development

strategy to 2020, applied measures by local governments as well as in trade activities and fisheries resources management.

Good legal basis, policy and implementation measures for fisheries sector with a partial contribution from international donors have been established. However, there is a major gap in these measures and strategies set out. This "gap" is existed due to many factors such as limited capacity of the Governmental agencies, lack of investment among stages and unsatisfactory sanctions that restrict the changes in management, fish exploitation, production and trade. It is necessary to have more dedicated attention from relevant authorities and sectors.

The above analysis, real need for capital and capacity has led to the establishment of "Coastal resources for sustainable development" project.

CHAPTER III – PROJECT DESIGN, RESOURCES AND OUTCOMES DESCRIPTION

3.1. PROJECT SIZE

3.1.1. Analysis and selection of appropriate project size

Total proposed budget: 117,9 million USD. Including:

a) ODA:

IDA finance is about 100 million USD, equivalent to 2,100 billion VND (exchange rate: 1USD = 21,000 VND (round figure), of which:

- Basic infrastructure: 51.6 million USD, accounting for 52% of total ODA.
- Administration: 48.4 million USD, accounting for 48% of total ODA.
- **b)** Counterpart contribution: Counterpart contribution: 11.68 million USD, equivalent to 245 billion VND. Counterpart contribution would be mobilised as follows:
 - Central contribution: 8.97 billion VND accounting for 4% of total counterpart budget.
 - Local contribution: 236 billion VND accounting for 96% of total counterpart budget.
- **c) Beneficiaries' contribution**: Beneficiaries' contribution is 6.21 million USD, equivalent to 130.4 billion VND accounting for 5.3% of total project budget.

3.1.2 Identification of investment period

The project would be implemented in 5 years. Accordingly, the estimated investment value for each period is presented in below table.

Table 2. Investment period

Year	Total amount (million USD)	%
1st year	31.898	27%
2nd year	52.225	44%
3rd year	18.539	16%
4th year	8.356	7%
5th year	6.870	6%
Total	117.890	100%

3.2. INVESTMENT LOCATION

The project would be implemented in 8 provinces including Ca Mau and Soc Trang (Mekong River Delta Cluster), Khanh Hoa, Phu Yen and Binh Dinh (South Central Cluster) and Ha Tinh, Nghe An and Thanh Hoa (North Central Cluster) would be implemented in five years.

3.3. TECHNOLOGY AND TECHNIQUE

3.3.1. Technological selection

a) Lessons learnt in project design

An important factor to ensure a successful project design is the active participation of relevant stakeholders including State management agencies, project implementing agencies, local governments at all levels and beneficiaries or affected people during the study to prepare the project. The consultation process would not be stopped until design completion. It would be conducted throughout all activities during project implementation to ensure that expected outcomes would be achieved and beneficiaries would receive the highest benefits from project.

A social assessment was undertaken to understand the needs of coastal communities related to production and exploitation of fisheries resources. Livelihood alternative models towards the sustainability, production stability, application of advanced production methods that determine potential renewal of natural resources are mostly supported by the communities. Thanks to these consultations, high feasible production support methods were selected and included in the project design. These methods have been applied in other programs and projects which are supported by State budget or other donors, for example, the Government program to support job alternatives and universal education in coastal fishing communities, fisheries extension program with the mixed support from State and beneficiaries or the model to support infrastructure for production with the combination of public and private investment which is applied in some WB and ADB projects.

Regarding financial mechanism, Specific Investment Loan (SIL) is a proper mechanism for CRSD project to solve weak stages in fisheries production and exploitation to maintain coastal resources sustainability. In this case, SIL is more favourable than Development Policy Loan or Applied Program Loan. The SIL enables the close monitoring of activities and project's rules; any adjustment is possible in case of necessity by a part of relevant agencies or the WB. This mechanism also provides the flexibility for the future activities when activities are expanded in case of successful project implementation based on additional financing.

b) Lessons learnt applied in CRSD project design

The project design reflects many lessons learnt from the studies and implementation of WB and other donors funded projects in fisheries sector of Vietnam and other countries.

One of important lessons learnt from the world fisheries resources management is the empowerment to the local fishing communities. This would provide direct incentive for them to manage natural resources. Pilot fisheries development projects funded by WB in Morrocco (ICR 20933) and Albania (ICR 0000634) showed that the close cooperation between the Government and local fishing communities through co-management arrangements is very essential for sustainable fisheries management. To maintain usefull fisheries co-management, However it is necessary to establish fisher organizations and provide them with necessary support to ensuse their existence and operation in sustainable manner. If the fishers and fishing communities fully participate in the rule development, co-management models can establish the ownership that leads to the effective implementation of model's administration structure.

Another important lesson from world's coastal shirmp farming within the last decade was the regular disease outbreaks and negative impact on the environment due to rapid expansion and strengthened aquaculture that could have been managable thanks to the application of Good Aquaculture Practices (GAP). It is increasingly acknowledged that the shrimp disease management has a close relation with other aspects so the assurance of sustainability of shrimp farming and development of better management practices (BMP) or GAP are main steps for the sustainability of shrimp industry. In this strategy, the enhancement of seed quality, practices in release density, farming pond management and bio-security during production are very important.

Last but not least lesson is in order to manage the conflict and increase the compatibility in the use of marine and coastal resources, the integrated spatial planning (ISP) has been increasingly applied as a practical tool over years. This concept was first inroduced by UNESCO in 2006. For coastal areas, this concept is similar to the coastal areas management which was piloted in many places in Vietnam through donors' projects. The past experiences are useful to the integrated spatial planning component under CRSD project.

c) Experiences in ODA project management in Vietnam and application to CRSD

Strengthened empowerment and decentralization for project owner and sub-project owner: With regard to the lessons learnt of WB activities in Vietnam, the experience showed that decentralization to provincial authorities for implementation and approval of relevant procedures would increase the local ownership (at provincial, district and commune levels) and improve project implementation and disbursement. This is not only the concern of the WB, but also of Vietnam Government. Accordingly, the project would propose the Government and WB to clearly assign the functions and mandate of project implementing agencies. It is proposed that: (i) Project executive agency is MARD; (ii) Project investor is Agricultural Projects Management Board; (iii) Sub-project executive agencies are eight People's Committees in project provinces and investors of sub-project are DARDs in project provinces.

Strengthening capacity for provincial Project Management Unit is a pressure for provincial and district's project officers on the effectiveness of project implementation. Provincial public servants involved in PPMU are in charge of their regular tasks and have to take over project activities so they have to make additional effort, time and personal costs. As a result, CRSD would focus to reduce this pressure through clear decision and mandate assignment, harmonized procedures, increased training, harmonized operational arrangements, effective use of consultancies and other support services. Particularly, CRSD would fund and allow each PPMU to recruit consultants for each component in the province to assist part-time PPMU staff to carry out project activities as specifically requested.

Strengthening capacity for Project Central Unit (PCU): PCU is an independent unit with qualified expertise and working on full-time basis during project implementation. However, the quality of the staff is limited, particularly of those who are officially trained on project management, procurement and bidding. Some APMB contracted staff working for PCU but they are not provided with profound training on expertise and project management. Therefore, PCU capacity would be strengthened through short-term training courses and post-graduation courses to maintain and establish qualified and competent staff.

Project monitoring and evaluation: in many ODA projects, monitoring and evaluation system is limited and not fully undertaken at the beginning. As such, CRSD would include a monitoring and evaluation system which is soon established, computerized and consistent with targets and forms. Instead of the work focused on PCU, the project monitoring and evaluation would be undertaken in all project implementaing agencies. This would improve the progress, quality control and ensure the early detection of any obstacle for prompt action.

The lack of clear project objectives and implementation means, information and public attention is regularly mentioned as a common obstacle in project implementation. To solve this problem, the project would improve training activities, workshops, communication and awareness of relevant stakeholders in relation to the project objectives, contents, implementation approaches for best participation and mandate understanding of relevant agencies from central to local level.

Project implementation progress: Experiences in ODA project implementation showed slow activities in the first years due to timing requirements for appraisal work at all levels; inconsistent national procedures with the donor's, unready organizational structure, slow provision of counterpart contribution etc. These issues are foreseen in project preparation. Instead of setting these issues as a the condition of effectiveness as it did before, a series of preparation and institutions for project implementation would be ready before project negotiations under CRSD, including: completion of technical design document and bidding documents for civil works packages to be done in the first year; development of organizational structure and staff with proper qualifications in all project implementing agencies; development of project operational manual, financial management manual, identification of accounting software, initial training on procurement and bidding, financial management and disbursement for all PMU.

3.3.2. Basic design on technical technology

This is a specific investment loan so most of investments are allocated to project provinces. Once the Agreement is signed, technical consultants would be recruited at central and provincial levels and research institutes under MARD would establish standard model and technological solutions to support provinces to design technical technology. This issue would be explicitly presented in the investment project, design and estimated cost of investment sub-projects.

3.4. PROJECT CONTENT DESIGN

Project design is comprised of four components with sub-components or activities. Below part presents components, sub-components and their interactive relation in the project. Each sub-component would include a description on objective, input, output, main activities and implementation methods.

3.4.1. Project components

The project comprises four (04) components:

- Component A: Institutional capacity strengthening for sustainable fisheries management;
- Component B: Good practices for sustainable aquaculture;

- Component C: Sustainable management of near-shore capture fisheries;
- Component D: Project management, Monitoring and Evaluation.

a. Component A: Institutional capacity strengthening for sustainable fisheries management

This component would support three activities: (a) inter-sectoral spatial planning for coastal areas; (b) upgrading of Vietnam fisheries database (Vnfishbase), including the establishment of knowledge management system for environment and fisheries management; and (c) conducting selected policy research to contribute to the formulation and implementation of new fisheries sector master plan to 2020.

PCU and PPMU would be responsible for activities of this component in coordination with relevant Departments, Directorate of Fisheries (DOF) under MARD, Vietnam Administration of Seas and Islands (VASI), Ministry of Natural Resources and Environment, departments and sectors in project provinces for implementation.

This component comprises three activities:

Activity A1: Inter-sectoral planning for coastal areas

Inter-sectoral planning would be carried out in the coastal areas of the project provinces for sustainable coastal resources management, exploitation and use. This is a participatory and multi-sectoral planning tool to solve and prevent conflicts among resource users by balancing ecological, economic, and social goals toward sustainable development. In parallel with the inter-sectoral planning, the project provinces would also carry out Strategic Environmental Assessments (SEA) for the fisheries sector. Results from the inter-sectoral planning and the SEAs would provide a basis for fine-tuning the Sector Master Plan to 2020 and would help enable the mainstreaming of marine spatial planning, biodiversity conservation, and sustainable use in the management of marine and coastal areas.

The project would provide necessary resources to allow PCU, PPMUs and relevant State management agencies to carry out inter-sectoral planning and the SEA in their provinces effectively, including, but not limited to, staff training, field surveys, resource and biodiversity assessments, workshops, and report preparation. Outputs of the inter-sectoral planning would help improve fisheries management by anticipating future demands, and balancing the demands for development with the need to protect marine ecosystems and to achieve social and economic objectives in a transparent and planned way.

Activity A2: Upgrading of Vietnam fisheries database

Existing fisheries information and statistic system of Vietnam is weak that does not satisfy the fisheries management requirements. In 2008, DANIDA-funded FSPS phase II supported Department of Capture Fisheries and Resources Protection (DECAFIREP) to upgrade database (Vietfishbase) and had its name changed to "Vnfishbase". This is an online and integrated database covering the information on fishing efforts, fishing vessel registration and technical inspection, productivity (sampling program). However, this online database has been recently established and exploited so there are many limitations that need to be upgraded and adjusted. In addition, database for integrated information on aquaculture (farming sites, species, farming seasons, seed sources, environment etc) has not been

established. Relevant management agencies mainly manage information based on their independent needs that is not consistent with technological and implementation methods.

Based on these needs, project would support the assessment and upgrade of current Vnfishbase to supplement information and link to other fisheries database under MARD. Project would also provide neccessary equipment which are currently in shortage such as computers, servers, internet line, local access network (LAN) etc. and develop human resources such as providing additional staff, organizing training on information collection, analysis and reporting etc. in order to ensure the smooth implementation of this new system. A knowledge management system would also be developed as a part in upgraded database to promote the information exchange on fisheries management between provinces and regions through training activities, formulation and consolidation of legal framework for the secondary data collection, data analysis and information sharing in knowledge management system.

Direct beneficiaries and participation in this component are relevant departments under DOF which are in charge of Vnfishbase and other fisheries database management and operation. In province, they are sub-DECAFIREP and sub-Department of Aquaculture under DARD. At central level, Vnfishbase system – after being upgraded, would be transfered to fisheries information center under DOF which is an agency in charge of curren software for continous management, use and operation.

Activity A3: Conducting selected policy research

CRSD would assist MARD and the project provinces to carry out selected research to contribute to the development and implementation of new Master Plan to 2020. The project would assist MARD and the project provinces to carry out selected research to contribute to the development and implementation of the new Master Plan to 2020. Funds to be provided are estimated at around US\$0.6 million for MARD and US\$50,000 for each province. Research themes for the first three year period have been identified (for both central and provincial levels), which include, but are not limited to, the following: (a) hatchery development strategy for coastal aquaculture to 2020; (b) review and planning of shrimp industry for sustainable development; and (c) research on alternative livelihoods for near-shore fishers. Additional research topics for the remaining years would be determined based on identified development needs and lessons from project implementation during initial years.

b. Component B: Good Practices for Sustainable Aquaculture

This component would support good aquaculture practices in coastal areas and sustainable and responsible aquaculture in selected sites, focusing on extensive farming thanks to improved sustainability, quality and risk control, research of initially proposed contents for this component while elaborating draft specified outline, focusing on: (a) improved bio-security management at farms and communities; (b) improved seed quality management; and (c) improved environmental management to support sustainable aquaculture.

Activity B1: Improved bio-security management

To support the establishment and scaling-up of sustainable farming sites through improvement of bio-security at farming areas and community level, the project would:

(i) Invest in and support the upgrade of public infrastructure for production:

The project would provide funds for upgrading about 45 public rural infrastructure schemes (<US\$300,000 per scheme) to improve bio-security conditions, reduce disease risks and pollution at farms of large farming communities in about 40 project districts. The investment locations would be major farming sites where GAP demonstration models are expected to be applied.

The investment of this activity would include necessary technical infrastructure for aquaculture (water supply and drainage system, solid waste and waste water treatment system) according to point b, paragraph 6 Part III, Decision 332/QĐ-TTg dated 03/3/2011 of the Prime Minister approving the Scheme on aquaculture development to 2020.

Under this regulation and related to scheme implementation, local budget and central budget would be used for construction of civil works and necessary technical infrastructure to serve aquaculture at dedicated farming areas at sea, lagoons, islands and reservoirs; construction of dedicated irrigation system of level I (sewage, dyke, water supply and drainage channels, pumping station), roads, electricity system, waste water treatment area etc. In detailed investment preparation and identification, project would ensure necessary technical infrastructure to be upgraded in the project with the scope of investment from State budget in accordance with above regulation stated in Decision No. 332/QĐ-TTg.

(ii) Establishment of demonstration model and training on GAP application, application of sustainable production through species diversification:

The project would select and establish about 400 demonstration models applying GAP (25,000 USD for each model) with the participation of 10,000 farmers on GAP. In parallel with the focus on the shrimp farmers to support them in GAP application to reduce disease risk, project would establish demonstration models to encourage other sustainable farming system through futher diversification of species and famring system to mitigate the environmental risks related to shrimp culture.

Selection criteria for GAP applied farming sites include: (a) satisfaction of criteria on farming areas applying VietGAP standards as regulated, (b) producers are willing to register and organize production groups applying GAP (or farmers organizations), (c) producers committed to invest capital in the model as per proportion and progress relevant to the model technical requirements and, (d) producers who are not financially supported under State budget for the same nature of the model.

The nature of support and investment in this component would focus on the activities covered by State budget according to regulation stated in point b paragraph 6 Part III of Decision 332/QĐ-TTg dated 03/3/2011 and current regulations related to the support policies from State budget in fisheries extension sector.

Point b paragraph 6 Part III of Decision No. 332/QĐ-TTg dated 03/3/2011 sets forth that local and central budget would be used to financially support dedicated farming areas applying GAP, the certificates applied in advanced farming process; the cost for trade promotion, branding for fish products and fisheries extension (training, short-term training courses for staff and farmers/fishers, model establishment etc). The establishment of demonstration models, training, support to grant certificate of GAP application in the project activities would be undertaken by the PPMUs. During project implementation, project implementing agencies would review, establish the plan and organize the implementation according to the specific regulations which are valid at the time of implemenation related to

economic and technical norms and support for the establishment of proper demonstration models consistent with the State support policy in fisheries extension sector and promote the application of good agriculture practices in aquaculture. The beneficiaries, while participating in the model, would be responsible for financial contribution and other necessary resources as regulated in fisheries extension sector.

In addition to direct support to the participatory households, the project would conduct communication and training activities to disseminate the information and implementation methods, the effectiveness of production models applying GAP and sustainable production methods through species diversification in order to gradually improve the awareness of fish farming communities and replicate project's good models.

(iii) Capacity strengthening for fish veterinary system and fisheries extension service in disease prevention and control:

Project would support capacity strengthening for 40 provincial/district fisheries extension centers and 43 sub-veterinary departments/provincial aquaculture management units on the disease diagnosis, monitoring, early reporting and disease control capacity through improving infrastructure, technical equipment and training.

Project would provide necessary technical support to MARD and PMUs to certify GAP and monitor technical aspects in this component. Regarding support on VietGAP certification, project would support the establishment and strengthening of capacity for agencies certifying VietGAP and support the evaluation and certification of VietGAHP according to Decision No. 01/2012/QĐ-TTg dated 09/01/2012 of the Prime Minister relating to policies supporting the application of good agriculture practices in agriculture, forestry and fisheries.

Activity B2: Improved seed quality management

Project would promote the use of certified quality seeds (or seeds from reliable supply sources) in aquaculture through following activities:

(i) Seed quality improvement:

In order to improve seed production and use with certified quality (particularly the shrimp seed), project would provide funds to upgrade technical infrastructure (to assist some 100 existing shrimp hatcheries in project area to ensure bio-security and enable them to produce and/or nurse high quality seed (including small scale public construction, less than 50,000 USD/scheme). This is the State investment target as per regulations stated in paragraph 2, Part IV, Decision No.2194/QĐ-TTg dated 25/12/2009 approving Scheme on development of agricultural, forestry plantation seeds and livestock and fisheries seeds to 2020. According to this regulation, State budget would be allocated to invest in infrastructure for research, production and processing of seeds (including irrigation, inland traffic roads, waste water treatment).

Direct production cost of hatcheries and other investment or supports would not be covered by State budget but by private sector. In investment preparation and review, local executive agencies and investors (provincial People's Committee and DARD) would screen and select necessary technical construction and infrastructure to be upgraded within State budget in accordance with above-mentioned regulation.

(ii) Hatchery standardization:

Project would support provinces to carry out hatcheries standardization through the strengthening of domesticated broodstock import, certification of natural broodstock and SPF seeds and support hatchery planning in provinces. In Nha Trang (and other feasible places), project would support the planning and development of a bio-security shrimp seed production site (seed industrial production area) which would be designed to only use SFP and domesticated broodstocks. Project would support public infrastructure while the province would call for construction investment and operation of standard hatcheries from private sector in this dedicated area.

The State budget's support to provinces to manage broodstock management, natural broodstock and SPF seeds certification is consistent with point 2, Part VI of Decision No.2194/QĐ-TTg dated 25/12/2009 approving Scheme on development of agricultural, forestry plantation seeds and livestock and fisheries seeds to 2020, and point b paragraph 4 Section IV of Decision 60/2010/QĐ-TTG dated 30/9/2010 of the Prime Minister issuing the principles, criteria and allocation of investment for development from State budget for 2011-2015 which comprises infrastructure investment for seed quality management and control system from State budget.

The investment in necessary technical infrastructure for Ninh Van dedicated hatcheries is covered by State budget according to paragraph 2, Part VI of Decision No. 2194/QĐ-TTg dated 25/12/2009 which states that State budget's investment shall include the construction of infrastructure in dedicated hacheries applying advanced technology in seed development.

(iii) Shrimp broodstock domestication research program:

To improve national capacity on the improvement of seed production and domestication, project would support Research Institutes for Aquaculture (RIAs) 1, 2, 3 to carry out broodstock domestication and disease-free seed production. Main result of this activity would gradually help replace poor quality seeds by certified ones. Accordingly, the disease-infected hacheries that use infected seeds from uncontrolled hatcheries or poor quality shrimp brooders can be prevented.

The research for selection, creation and pilot production, experiment, testing and regionalization of shrimp brooders of RIAs (under MARD) within this project is identified to comprise the investment in infrastructure for research, storage, management, production, processing and preservation of seeds and investment for locally import of new seeds. According to Article 7 of Circular No.11/2012/TTLT-BNNPTNT-BTC-BKHĐT guiding the mechanism for State budget management and use in Scheme on development of agricultural, forestry plantation seeds and livestock and fisheries seeds to 2020, these investments are covered by State budget.

During project implementation, PCU would coordinate with RIAs to procure goods, build necessary infrastructure, facilities and technical services to support a general research program on domestication and seed quality improvement of tiger shrimp and white leg shrimps as well as new species as researched by RIAs under MARD. PCU would be responsible for coordination and monitoring of work quality. This research program is a part of long-term and strategic fish seed development program so the MARD's ownership role is very important and necessary.

Activity B3: Improved environmental management

The project would strengthen the capacity of DONREs to conduct regular risk-based water quality monitoring programs and provide guidance for implementation that meet all environmental management requirements as stated in Decree No. 29/2011/NĐ-CP dated 18/4/2011 – a part related to regular water quality monitoring and control with focus on GAP applying areas that are supported by the project. It would also provide them with necessary resources, including incremental operating costs, additional technical equipment, and training for improved environmental monitoring and management in the project area. Data and results from the monitoring activities would be disseminated to local authorities, concerned agencies, and farmers through DONREs' and DARDs' regular monitoring reports and websites. PPMUs would take appropriate action to mitigate the negative impacts of aquaculture activities based on the project Environmental and Social Management Framework (ESMF).

c. Component C: Sustainable Management of Near-Shore Capture Fisheries

This component would support two key activities: (a) co-management of near-shore capture fisheries combined with improved capacity of monitoring, control and surveillance (MCS); and (b) improvement of hygiene conditions and operational efficiency of related fishing ports and landing sites to reduce environmental pollution and improvement of fish product value.

Activity C1: Co-management of near-shore capture fisheries

The objective of this sub-component is to improve natural resouces management through promotion of community management models (i.e the empowerment and improvement of "fisheries management" role of relevant stakeholders such as fisheries associations, local governments etc), improvement of enforcement, monitoring of fishing activities, protection of coastal habitat and bio-diversity of species. This sub-component includes following activities:

(i) Strengthening capture fisheries management with the community participation (comanagement):

To strengthen the sustainable management, exploitation and use of natural resources, project would encourage production re-organization, develop cooperative groups, community management in order to adhere the exploitation and use of surface water and coastal resources with the environmental and fisheries resources protection for sustainable production in accordance with Articles 5, 7, 9, 13 and 15 of Fisheries Law and Fisheries Sector Development Strategy to 2020.

Project would assit the organization and establishment of fisheries co-management models in the selected communes of project areas through capacity building for local fishing communities in sustainable management and exploitation of coastal resources, job training, support to livelihood alternatives towards the maintance of their long-term livelihoods. With these supports, fisheries co-management model is expected to be conducted in 140 communes in project areas (depending on the actual condition or local proposals, each co-management model would be undertaken in one commune or more) based on local current co-management models including the models supported by the Government or community's self-regulated models.

Project co-management approach is to empower the fishing rights to local fishers so that resource users have incentive to sustainably use the fisheries resources and stop the "open

access" in coastal fishing activities. The fishing rights can include, but not limited to, follwing forms: the fishing right of fishers group, right to access resources by individual, right to fish with certain catch, right to involve in traditional fishing etc...

To effectively organize the participatory co-management in fishing communities, project would support the planning and specific scheduling for communities' activities. Relevant stakeholders analysis needs to be conducted to identify support forms for the persons involved and help project beneficiaries to receive full support. Regular consultation needs to be undertaken to provide guidance on supported activities and to faciliate income improvement for vulnerable groups. The guidance on community consultation in comanagement implementation was prepared to support the project implementation.

The support to capacity strengthening for local fishing communities would focus on the activities such as promotion of fishers organization establishment, formulation of rules and regulations including the rule on more selective fishing gear, allocation of fishing right ... so that members would commit to the rights and specific obligations of new collective arrangement and they can apply these rights and obligations in accordance with the long-term livelihood maintenance approaches. Project would support fishing communities involved in co-management plan implementation (about 50,000 USD/community or 100,000 USD/ethnic or poor fishing community) to resolve their needs on sustainable management of coastal fisheries resources in the areas assigned through technical assistance, training, communication equipment, monitoring cost and operation of co-management organizations.

In some selected areas, project would support to invest in public infrastructure for agricultural production and improve local communities' income. Fishers' wives/husbands and children involved in the model would have opportunity to join vocational training based on actual needs so that they can find a job at the fishing port/fish landing sites or at other public constructions invested by the project.

Project would provide necessary technical support and training to the staff of MARD and PMUs in the establishment of policy, institutional framework and capacity strengthening for implementation and promotion of coastal capture fisheries co-management application.

(ii) Capacity strengthening in monitoring of fishing activities:

In parallel with capacity strengthening and empowerment to the local fishing communities, project would aslo support capacity strengthening for monitoring, control and surveillance system of the governments and State management agencies at central and local levels related to enforcement and monitoring of coastal fishing activities as an additional measure to fisheries co-management support.

Existing monitoring, control and surveillance system (MCS) is weak at local level. Sub-DECAFIREP is the unique agency responsible for MCS activities. Each sub-Department has been provided with one or two patrol boats so that they can not effectively fulfill the MCS for monitoring the annual compliance of small-size fishing vessels in the province. Local MCS network (district and commune levels) has been rarely existed so most of small-size fishing vessels (<20CV) are not registered. There is no effective mechanism to control the increase of small-scale fishing vessel. These small fishing vessels mainly cause the over-exploitation in coastal areas.

To support fisheries co-management, the activities under this sub-component would at least include:

Monitoring: Under CRSD, a new monitoring approach would be adopted for monitoring near-shore capture fisheries, which would involve local fishers (to detect violations happening in coastal areas within or around six miles from the coastline, that have been assigned to them under co-management arrangement), local governments (to monitor the number of unregistered/unlicensed boats), and Sub-departments and Divisions of Capture Fisheries and Fisheries Resources Protection and Fisheries Inspection (within the DARDs) to take appropriate action according to their administrative mandates. The project would support them all to strengthen their capacity in monitoring and reporting mainly through provision of training on the fisheries law and regulations as well as basic communications equipment (i.e., cameras, walkie-talkie, loudspeakers, etc.) and other resources (i.e., incremental operating costs) to carry out their monitoring tasks..

Control: All fishing activities shall have to comply with Fisheries Law 2003. Fisheries offences would be handled according to Decree 31/2010/ND-CP on Administrative Process for Fisheries Violation and Decree 32/2010/ND-CP on the management of fishery activities of foreign ships in Vietnam's sea areas, issued by Prime Minister on March 29 and 30, 2010. If the violation involves serious consequences, the violator's fishing facilities, equipment, and even fishing license may be taken away by the government. Under CRSD, the project is not supporting or involved in the sanction of the offense committed. Instead, efforts would focus on educational and awareness campaigns as well as training for local fishers, local governments, DARD staff, and other stakeholders on the context of Degree 31 and other relevant regulations to improve their awareness and understanding of the fisheries legislation and the potential adverse environmental and/or other consequences of poor fisheries practices

<u>Surveillance</u>: The main purpose of surveillance activities is to detect violations on site. Under CRSD, surveillance would be done mainly through the involvement of local fishers to detect fishing violations in near-shore areas (within six miles from the coastline). The project would not support or involve any monitoring, control, and surveillance activities for or related to off-shore fisheries (i.e., tracking of vessels by radar or satellite, aerial patrols, etc.). The project would also not involve activities related to military, police, and naval vessels. To strengthen surveillance activities in near-shore coastal areas, the project would strengthen some 30 field stations of sub-DECAFIREPs (in selected districts) to collaborate with fisher organizations in co-management and assist them in implementing co-management plans, particularly enforcement at the inter-commune and district levels.

Project would assist the capacity strengthening, establishment of institutional and legal framework for MCS system at central and local levels. About 30 MCS stations managed by sub-DECAFIREP of project provinces would be established with sufficient staff and equipment to coordinate and support co-management groups to carry out the regulations on co-management. 16 near-shore patrol boats (two boats per province) with basic communications equipment would be procured for sub-DECAFIREPs, as well as some speed boats for field stations to monitor the coastal areas. Fishing vessel registration and licensing system would be improved with the local authorities participation to limit the new registry of small boats (especially boats with capacity of less than 50 CV). DECAFIREP under MARD would be provided with technical support and necessary equipment as well as training on the establishment and consolidation of legal and institutional framework for MCS system.

PPMU would closely coordinate with sub-DECAFIREP to provide guidance on MCS activities. The approach to MCS activities would include the power decentralization to local level, encouragement of community participation and application of new technology (e.g. information technology) in applicable places. Local fishers would be encouraged to take part in planning and implementation of monitoring activities, reporting of any offences detected to the local authorities (commune People's Committee, use of photos, logbook, hotline etc). The violations would be reported to or transfered to the sub-DECAFIREP. Once the information received is verified, sub-DECAFIREP would support and/or coordinate with fisheries inspection for action. Project would further focus on "precautionary approach" through environmental education to encourage the "voluntary compliance" and help the violators change their behavior (e.g prevention or mitigation of illegal and destructive fishing activities in coastal areas). Both sub-DECAFIREP and Fisheries Inspection are civilian agencies under DARD so they are not allowed to be equipped with weapons and also are not allowed to arrest people. Under CRSD, all monitoring, control, and surveillance activities/missions are restricted to fisheries enforcement activities only and would not combine with any other tasks such as national security and/or other non-fisheries law enforcement activities.

(iii) Protection of biodiveristy and aquatic habitat

In this component, project would support the protection of regions with high importance of fisheries resources (spawning areas) and bio-diversity (special protective areas with endangered or threatened species) which are not a part of marine protected areas (MPA). In eight project provinces, it is expected to have at least 3 co-management areas to receive the project support and locate in the high biodiversity areas with fisheries resources value, covering more than 50,000 ha with many important natural communities. It is expected that the regions with isolated location would be prioritizedly selected based on the importance of the conservation as the essential habitat for some key species and communities.

Activity C2: Improvement of hygienic conditions and operational effectiveness of selected fishing ports and fish landing sites

Upon provincial proposals, project would support to improve infrastructure for 16 fishing ports, fish landing sites and fishing ports mixedwith shelters for fishing vessels in project areas. The fishing ports, fish landing sites and fishing vessel shelters selected must be those included in masterplan of fishing ports, fish landing places and fishing vessel shelters approved by the Prime Minister under Decision No. 346/QĐ-TTg dated 15/3/2010 on the planning of fishing ports and fish landing sites to 2020, orientation to 2030, and Decision No. 1349/QĐ-TTg dated 09/8/2011 adjusting the masterplan of fishing vessel shelters to 2020, and orientation to 2030. In addition, the project support priority would be fishing ports, fish landing sites and fishing ports mixed with fishing vessel shelters that need to be upgraded (Project would not invest in new construction) in order to improve hygienic conditions and reduce post-harvest losses and enhance the operational effectiveness of these places. The fishing ports and fish landing sites with high entrance of fishing vessels would be prioritized to be selected.

The investment in fishing ports and fish landing places would focus on the essential catagories such as dredging of entrance channels, dredging of roadstead, building landing sites, wave and sand prevention dykes, vessel anchoring construction, buoys and signal

system, port's specialized communication system, electric and water supply system, wastewater treatment system, fire and explosion control, operational office etc. These catagories are under the essential infrastructure subject to the State budget coverage as stated in section 4, paragraph VII, Article 1 of Decision No. 346/QĐ-TTg dated 15/3/2010, Decision No. 1349/QĐ-TTg dated 09/8/2011, and Article 1 of Decision No. 2374/QĐ-TTg dated 28/12/2010. In project implementation, project would ensure the investment catagories approved that only comprise essential infrastructure under relevant State budget expenditure within level and catagories as stated in above listed regulations.

Project investment in provincial fishing port and fish landing site system would assist reduction of environmental pollution, reduction of catch losses, maintainance of quality and support of fish product consumption relevant to national technical standards on conditions for food hygiene and safety. Project would support training and development of human resources as well as the management skill improvement for the upgraded establishments. After the upgrading of basic infrastructure under public investment sector, local governments would call for the private investment for remaining fisheries logistic establishments within fishing ports or fish landing sites.

Only the most simple bidding packages would be done in the first year, for example, the upgrading activities with minor impact or modest impact on the environment and not neccessary to revoke land and/or other private properties. In the initial phase, project would organize training courses for the staff in charge of environment safeguards and recruit technical consultants to support PCU and PPMU before carrying out more complicated work in the following years.

d. Component D: Project management, monitoring and evaluation

This component would support: (a) effective project management; and (b) improved institutional capacity at provincial, district and commune levels for monitoring and evaluation of project activities and maintenance of project intervention.

Activity D1: Project management

The project would provide necessary training, equipment, facilities, and operating costs for the PCU and the PPMUs to ensure that the project is implemented in accordance with the Project Operational Manual, including safeguards, financial management and audits, reporting and supervision.

Activity D2: Monitoring and evaluation

The project would provide necessary training, facilities, and operating costs for PCU and PPMUs to establish an M&E system for the project in line with the Aligned Monitoring Tools (AMT) established by Ministry of Planning and Investment. M&E consultant(s) would be recruited (in technical support to project management package) to assist the PCU and the PPMUs in setting up and handling M&E activities. Independent monitoring and evaluation consultants would also be recruited to assess the effectiveness of activities implemented under each component

3.4.2. Relation among project components

Component A contributes to the promotion of institutional capacity at central and local levels to improve the sector planning and marine resources and specifies the national policies

into strategy and better change at central and local level. The close relation among four components is clearly reflected in Component A. Component 1 would provide information for the implementation of activities in Components B and C. Following components have close relation since aquaculture activities would have regular impact on fishing activities and vice versa. For example, natural fish and shrimp are used as seeds and feed for aquaculture while mangrove forest is the habitat of many important fish in terms of trade. Therefore, aquaculture expansion is proposed as a means to provide additional livelihood for coastal fishers to reduce pressure on coastal resources. Similarly, uncontrolled fishing activities provide a large quantity of "trash fish" which are used as aquaculture feed but creating the risk to the environment (trash fish are normally immature fish of commercially valuable fish). Components B and C are designed to support in investment and techniques in line with the modalities that promote more profitable, effective and sustainable use in capture fisheries and aquaculture. Accordingly, there is a close connection among Components A, B and C in the support to planning, capacity strengthening to improve the general management for marine and coastal resources in Vietnam. Component D is designed to provide technical and cost support to project activities, recruitment of consultants, salary of project staff at central and local levels, cost for vehicle equipment procurement, office equipment of PMU and other supports in case of necessity to ensure the effective and efficient project operation.

3.5. CONSTRUCTION AND LOCATION

Under CRSD basic construction, it is expected that all major construction catagories would cover the upgrade and expansion of available infrastructure with small to average scale and simple architecture so the specific architecture options of each construction/sub-project are not mentioned in this report. During project implementation, the investment owners of catagories/scheme/sub-project would, based on specific conditions, establish the investment project, prepare the design drawings and estimated cost to present to competent authorities for approval in accordance with current regulations.

3.6. LAND CLEARANCE AND RESETTLEMENT PLAN

Project activities would not include or if any, include very limited resettlement activities.

In project preparation, project resettlement policy framework was established in consistence with donors regulations and harmonization with national policies. Resettlement policy framework was commented by relevant Ministries and sectors and presented to the Prime Minister for comment and would be approved by MARD according to current regulations.

Resettlement policy framework approved is the basis for implementation of project resettlement activities. Depending on the land acquisition scale, the investment owners of constructions where the land is taken away have to establish full or short-cut resettlement plan in accordance with the requirements of Resettlement Policy Framework that clearly presenting the affected people, people who have to move, settlement options, land clearance and resettlement options.

3.7. ENVIRONMENT

3.7.1. Standard and targets

a) National legal documennts applied in the project:

Law

- Law on Environmental Protection No. 52/2005/QH11 adopted by National Assembly on 29/11/2005, governing the duties of individuals and organizations related to environmental protection.
- Fisheries Law No. 17/2003/QH11 adopted by National Assembly on 26/11/2003, taking effective on 1/7/2004.
- ➤ Revised Land Law of 26/11/2003.
- Law on Water Resources No. 08/1998/QH10 dated 20/5/1998.
- ➤ Law on Transport No. 23/2008/QH12.
- Law on Construction No. 16/2003/QH11.

Decrees and Circulars

- ➤ Decree No. 80/2006/NĐ-CP dated 9/8/2006 of the Government regulating and providing detailed guidance on the implementation of some articles of Law on Environmental Protection.
- ➤ Decree No. 29/2011/NĐ-CP dated 18/4/2011 regulating strategic environmental assessment, environmental impact assessment and environmental protection committment.
- ➤ Decree No. 25/2009/NĐ-CP dated 6/3/2009 on integrated management of natural resources and seas and islands environment protection.
- ➤ Decree No. 27/2005/NĐ-CP dated 8/03/2005 regulating and providing detailed guidance on the implementation of Fisheries Law.
- ➤ Decree No. 73/2010/NĐ-CP governing the administrative sanction in the fields of security and social safety.
- ➤ Decree No. 59/NĐ-CP on management of solid waste.
- ➤ Decree No. 1338/NĐ-CP on technical guidance on the construction in the sites with weak soil foundation.
- ➤ Circular No. 22/2010/TT-BXD on construction safety management.
- ➤ Circular No. 26/2011/TT-BTNMT dated 18/7/2011 guiding the implementation of some articles of Decree 29/2011/NĐ-CP dated 18/4/2011 on strategic environmental assessment, environmental impact assessment and environmental protection committment.
- ➤ Circular No. 01/2000/TT-BTS dated 28/4/2000, supplementing to Circular No.04 TS/TT dated 30/8/1990 Annex 1 on the critical limit and allowable limit on the concentration of pollutants in marine water in coastal aquacutlure sites.
- ➤ Circular No. 12/2011/TT-BTNMT dated 14/4/2011 regulating the management of toxic waste management.

- ➤ Directive No. 01/1998/CT-TTg of Prime Minister banning the use of explosives, electrics and toxic substance in fishing activities.
- ➤ Decision No. 06/2006/QĐ-BTS dated 10/04/2006 issuing the regulation on management of hatcheries and shrimp farming areas.
- ➤ Technical regulation on establishment of masterplan, revision of master plan on the use of natural resources and environmental protection at sea and islands, to be issued in accompany with Circular No. 19/2011/TT-BTNMT dated 10/6/2011 of MONRE.
- ➤ Directive No. 02 /2008/CT-BXD on safety and hygiene in construction units.
- ➤ National technical standards and regulations QCVN 02 12:2009/BNNPTNT: Fishing port –food hygiene safety condition.
- ➤ National technical standards and regulations QCVN 02 11: 2009/BNNPTNT : Fish market –food hygiene safety condition.

Among above-mentioned legal documents, Decree No. 29/2011/NĐ-CP provides some regulations that the project should directly refer to as follows:

- Annex 1 of Decree No. 29/2011/NĐ-CP regulating strategic projects and masterplan that must contain strategic environmental assessment:
 - ✓ Strategic environmental assessement report that needs to be integrated in the strategic report, plans or master plans as follows:
 - National socio-economic development strategy
 - Sectoral development master plan or strategy at national level
 - Integrated master plan of inter-provincial river basins
 - ✓ Strategic environmental assessment report that must be prepared separately:
 - Socio-economic development masterplan and strategy: (i) focal socioeconomic regions, focal economic regions, economic corridors, economic belts; (ii) Socio-economic development master plan of provinces and cities under central direct control.
 - Master plan on land use, forest protection and development, exploitation and use of other resources in inter-provinces or inter-regions; (iii) strategies, master plans and other plans as instructed by National Assembly or Government.
- Annex II presents the list of projects that need to prepare environmental impact assessment report.
- Annex III presents the list of projects within MONRE competence for appraisal and approval. Below part is the most relevant projects with the proposed sub-components:
 - ✓ Projects under the National Assembly competence for investment policy decision; Prime Minister's competence for investment decision;

- ✓ Projects that use land within the national parks, world heritage, national level historical/cultural/sightseeing relics, regions under the bio-reserves areas except for the projects using land under the transitional areas of bio-reserves areas that are less than 20 ha;
- ✓ The projects encroaching the seas from 20 ha and more; the projects that need the alteration of upstream protective forest use purpose, wave, wind and sand prevention forest, special use forest of more than 20 ha or other natural forest from 100 ha and more; the projects using rice planting land for 2 crops and from 20 ha and more; projects on the establishment of aquaculture sites on sand with the areas of more than 100 ha;
- ✓ The projects located within two provinces or more.

✓ Standards and norms

- ➤ QCVN 05:2009/BTNMT Standards and norms on surrounding air quality;
- ➤ QCVN 08:2008/BTNMT Standards and norms of surface water;
- ➤ QCVN 10:2008/BTNMT National technical standards and norms on quality of coastal water;
- QCVN 14:2008/BTNMT National standards and norms on domestic waste water allowable limit of pollutant parameters;
- QCVN 08:2008/BTNMT National technical standards and norms on surface water quality;
- ➤ QCVN 15:2008/BTNMT: National technical standards and norms on pesticide residues on land;
- ➤ QCVN 03:2008/BTNMT: National technical standards and norms on maximum limit on heavy metal on land; TCVN 6774:2000 water quality– quality of freshwater to protect aquatic habitat;
- ➤ QCVN 14:2008/BTNMT: National technical standards and norms on domestic waste water;
- > OCVN 10: 2008/BTNMT: National technical standards and norms on coastal water;
- ➤ QCVN 02-15: 2009/BNNPTNT: National technical standards and norms of hatcheries which are qualified to food hygiene and safety, bio-security and environment;
- > TCVN 5308-91: Technical standards and norms in construction;
- ➤ TCVN 7222:2002: General requirements on environment of waste water treatment stations;
- > TCVN 4447:1987: Land work –construction and final check regulations/norms

Legal basis for procedures in case of incidental detection of cultural assets

- ➤ Law on Cultural heritage (2002);
- Law on revision and supplementation to Law on Cultural Heritage (2009);

Revised Decree No. 98/2010/NĐ-CP.

International treaties

- > UN Convention on the Law of the Sea 1982;
- ➤ UN Convention on Cultural and Nature Heritage Protection 1972.

b) WB requirements on environmental protection

During project preparation, partial Environmental Impact Assessment (EIA) and Environment and Social Management Framework (ESMF) of the project were conducted and prepared.

ESMF was established to provide a screening mechanism to exclude the activities that may cause significant negative impact on the environment and society and to evaluate the potential impact on environment and society of the sub-projects as financed by CRSD; then to propose the mitigation measures and implementation plans, monitoring and reporting.

The project is assigned an Environment Category B as its negative environmental and social impacts are assessed to be limited, localized and manageable. MARD has prepared an ESMF as part of the feasibility study in accordance with the country's environmental regulations and the World Bank OP/BP 4.01. The key potential negative socio-environmental impacts include: (a) improper use and management of chemicals and antibiotics in aquaculture; (b) ineffective management and improper treatment of solid wastes and wastewater from aquaculture; and (c) civil works impacts (i.e., increased localized level of dust, noise, disturbance to traffic and community, safety risks, water pollution risks) during the construction of new infrastructure or rehabilitation and upgrading of existing infrastructure (i.e., upgrading of fishing ports and landing sites). These impacts are assessed to be temporary and localized in nature and can be avoided or minimized by proper mitigation measures.

According to the screening and evaluation result on potential impact on environment and society, the project is assigned an Environment Category B by the WB. WB's policy OP 4.01 is applied to the CRSD due to its potential negative impacts on environment and the risks related to investment categories in project Component B and C. The formation of new establishments, equipment or upgrading of current infrastructure (such as newly-built fisheries monitoring stations, upgrading of water supply and drainage for aquaculture sites, establishment of new hatcheries, upgrading of current fishing ports, fish landing sites) would have some localized impact on the environment and society (such as the dust, incremental noise, interference to travel and activities of the communities) during construction process. In addition, the environmental risk such as water pollution is related to the establishment of new hatcheries in Nha Trang during operational stage. These potential impacts are predicted from low to average level and can be mitigated through design, solutions, construction and operation. As the result, project was ranked Environment Category B.

c) Typical sub-projects and project's potential impacts on environment and society:

Potential interests on environment and society of sub-projects

On the basis of information on project sites and fisheries sector as presented in Annex B of this ESMF, most of sub-projects under CRSD provide possibly positive impact on the environment and society. The interests of sub-projects are prosed in long-term rather than short-term ones. If it is successfully done, the interests would not only be limited to the

project villages and communes. Those interests would be easily welcomed by the fishing and farming communities (scaling-up of the sub-projects through actual study tours and learning the workplan for the farmers to adjacent communes which carry out the same activities).

Reduction of land and water pollution through strong promotion of GAP application. The application of good aquaculture practices (GAP) and best management practices (BMP) would not only improve the farmers income but reduce waste water and polluted settlement mud into water sources. Accordingly, on the long-term, the project would contribute to the improvement of water quality at project sites. The application of GAP and BMP principles, the application of bio-security and the use of disease-free seeds would also improve the quality of farming ponds and limit the development of disease and harmful species for the farmed ones and reduce the use of anti-biotic and chemicals in aquaculture.

Other positive impacts: Sub-projects are expected to provide positive impacts on economic, social and environmental aspects, including:

- Productivity of farming ponds (intensive, semi-intensive and multi-species culture) is improved and better management activities in general would reduce the need for land expansion for aquaculture and reduce the need for coastal resources related, contributing to the reduction of pressure on coastal fishing activities and more sustainable fisheries resources;
- ➤ Improve the awareness of management agencies and beneficiary communities on social, environmental protection and fisheries resources conservation;
- > Income, livelihood and nutrition are expected to become better;
- Fishers have access to fishery production establishments with better hygiene and environmental conditions. Accordingly, the risk on health impact at working place is reduced; the quality and production value of fisheries are increased and the productivity loss is reduced. The scope of rehabilitation work in each location would be different depending on the status and actual demand of each fish landing site;
- ➤ Value-added products are created thanks to better pre-processing, processing and marketing strategy;
- ➤ Locally-produced shrimp, fish and other fishery products quality (oysters, clams, lobster, seaweed...) are improved thanks to better implementation of GAP application, the use of disease-free seeds, hygiene conditions, pre-processing, processing and product distribution to local markets and export;
- Number of veterinary staff and office of veterinary testing offices is increased in project provinces. The lack of qualified veterinary staff and good veterinary testing offices in project provinces limited the access of fisheries management agencies to necessary information on animal diseases. The rehabilitation and supplement of testing offices as proposed would help veterinary staff under DARD better perform their duties;
- ➤ Infrastructure rehabilitation. High product consumption cost is partly due to the lack of necessary rural infrastructure including weak conditions in fishing ports, fish landing sites, poor infrastructure of warehouses, the lack of ice production equipment, product sorting-out area, and the lack of safe water. Through the support to upgraded infrastructure and facilities in fish landing sites, the project would help reduce costs and

damages on product quality that improve the market accessibility of the producers, increase the profits and contribute to poverty reduction in rural areas.

CRSD would provide environmental and social benefits through another mechanisms, including:

- Awareness and attention to environmental and social issues of beneficiaries, local communities and districts improved;
- ➤ Key staff of MARD and DARDs are provided with training to become experts on environmental and social management. Fisheries extensive staff of DARD are provided with training on environmental and social knowledge would become expertise in this field in project provinces;
- Awareness of key staff is improved in relation to benefits when complying with environmental and social principles to ensure the sustainability of development projects. As such, the environmental and social issues are incorporated in the project planning and implementation.

Potential environmental and social impacts of CRSD sub-projects

Most of constructions financed by CRSD are at the range from small to average scale. These constructions include: (i) construction of water supply and drainage system, wastewater treatment system for current farming sites applying GAP and construction of similar constructions for current hatcheries under Component B; (ii) establishment of 30 fishing operation monitoring, control and surveillance (MCS) stations and building new infrastructure (electric, water supply and drainage system) necessary for the upgrading of fishing ports and fish landing sites under Component C. Provided that the project sites are relocated to sensitive environment, potential negative impact of the proposed constructions are expected to temporarily take place in building stage. Such impacts are localized and manageable, including:

- Dust and air pollution
- Impact caused by the noise and vibration
- Water pollution
- Discharge water and settlement mud
- Solid waste
- Impact on the plantation coverage and ecological resources
- Traffic management
- Services and utilities interruption
- Safety for workers and communities
- Communication with local communities

For existing farms and hatcheries, project would assist to reduce the environmental pollution risks related to food, chemical residues and other wastes released from aquaculture activities in these establishments. In case where the project supports the establishment of new

farming sites, the Environmental Management Plan needs to be prepared to solve the potential impact in the building and operational stages, particularly the waste and waste water management.

For the constructions under Component C – upgrading of existing fishing ports, fish landing sites and fish markets focusing on the supply of safe water, construction of vessel shelters, collection of solid waste and waste water treatment without altering the designed capacity of such constructions, these potential impacts would be as similar as that of small constructions stated above. In case of dredging work, other impacts may be arisen such as: (i) land water pollution due to the disturbance of settlement mud and mud control after dredging; temporary treatment and transport of dredged mud; and (iii) the risks related to safety at dredged areas and destruction venues (of dredged materials).

The above mentioned potential impacts can be mitigated thanks to technical solutions used in the design of new establishments through standard building measures and proper dredging management work during implementation process as well as the GAP application in the operation of farming sites which are supported by the project, see detailed in Section 5 below.

3.7.2. Environmental protection and management solutions

a) Avoid negative impacts from process of project location selection – Exclusion list

The selection of project sites plays an important role in any project associated with construction schemes. CRSD is possible to create the potential disadvantaged impact on the environment if its sub-components are undertaken in particularly important areas such as national parks, biological conservation areas, protective forest or the areas of historical value. To avoid the potential disadvantaged impact on the environment and society in selection of project sites, sub-components under CRSD would be subject to environmentally eligible screening. Sub-components, that may impose disadvantaged impact on the areas that play important role in the biology and alter the sites which have valuable landscape or loss the historical/religious values, would not be financed by CRSD.

On the basis of Annex III of Decree 29 (the list of projects to be appraised by Ministry of Natural Resources and Environment), below projects would be subject to exclusion list of CRSD:

- Sub-components using the land within national parks, natural conservation areas, world heritages, cultural/cultural relics, nationally-recognized landscapes, biological reserves;
- Sub-components that require the forest land alteration of mangrove forest, upstream protective forest, wave and wind protection forests for aquaculture purpose or other purposes;
- Sub-components that require the alteration of 2-crop rice land with high yield;
- Aquaculture sub-components conducted on sand covering more than 100 ha;
- Sub-components located within two provinces and more.

The eligible screening of sub-components is presented in Annex C of ESMF.

b)Mitigation measures

Design stage:

With current infrastructure, project would focus on improvement of waste and waste water management practices measures. For new constructions, the technical design should include solutions that can meet the requirements on solid waste and waste water management.

Construction and operational stages:

A set of document on detailed mitigation measures was proposed to mitigate the project potential negative impacts and was included in Annex D attached with this ESMF. The document set is comprised of:

- Environmental Code of Practices (ECOP) applied to the constructions and works under CRSD which is revised from standard environmental code of practices for small-scale works funded by the WB in Vietnam.
- Environmental Code of Practices (ECOP) in accordance with national technical norms and standards QCVN 02-15: 2009/BNNPTNT on food hygiene and safety conditions, environmental and bio-security of hatcheries.

These ECOP would be included in the invitation bid profiles and contract for works and construction monitoring.

Detailed guidance on environmental protection in sub-components requiring dredging works

- The firm mud/sediments characteristics must be identified through sampling and analysis prior to construction work.
- Contractors would prepare on-site Social and Environmental Management Plan (SEMP)
 and present to construction monitoring partner and WB for prior review. SEMP would be
 comprised of implementation time frame, implementation categories and methods to
 ensure the requirements on travel safety, community health and environmental sanitation
 etc. The contracts would have to ensure that:
 - The dredged material management plans are taken the environmental issues in consideration through identification of short-term and long-term destruction plans, taking into account the measures to reduce the dredging work and maximize the useful use of dredged materials.
 - In the on-site Social and Environmental Management Plan (SEMP) approved, the appropriate destruction sites have to be identified in accordance with sediment quantity and quality;
 - Treatment plan of seriously-polluted mud must be approved by Department of Natural Resources and Environment before implementation;
 - o The destruction sites need to have fences in case of necessity;
 - O The waste water from dredged materials are not allowed to be discharged to rivers without treatment or proper settlement and filtering(e.g., lime is used to moderate waste water's pH (pH=6-8) from dredged materials before discharging to the environment).

- Materials collected from dredging work must be treated in accordance with Vietnamese regulations on waste collection in order to ensure safe transport, storage, treatment and management that are consistent with environmental requirements.
- Persons involved in firm dredged mud treatment must be qualified with license of occupational practices. Guidance on license of occupational practices is provided at Circular No. 12/2011/TT-BTNMT of MONRE regarding toxic waste management.
- o In case of road construction, these roads must be taken into consideration through environmental assessment process.
- Water discharging and current alteration at the construction site: in case where the dredging activities must to be done within river bed, the water in construction site must be discharged to secure the implementation at dry condition. Water containing settled mud which is pumped from construction site must be treated with settled mud treatment and control before discharging to the environment.
- o In case where the land owners are affected by the use of their land as the material gathering sites, the land owners must be included in the project resettlement plan.

CHAPTER 4 – TOTAL INVESTMENT, CAPITAL DISTRIBUTION AND FINANCIAL PLAN

4.1. TOTAL INVESTMENT

Project's total investment is approximately 117.9 million USD as presented in below table.

Table 3. Expected total investment and project budget (1,000 USD)

	Total	Budget composition			
Expenditure categories	project budget	IDA	Central contribution	Local contribution	Beneficiaries contribution
A. Construction work	51,601	51,601	-		-
B. Goods and equipment	17,720	17,720			-
C. Consultancy services	15,388	9,940	115	5,333	
D. Compensation and resettlement cost	4,000			4,000	
E. Training and workshops	6,162	6,162	-		-
F. Incremental operational cost	19,012	12,802	-		6,210
G. Regular cost for PMU	4,007	1,775	312	1,920	
Total ¹	117,890	100,000	427	11,253	6,210
% financing over total project budget	100.00%	84.82%	0.36%	9.55%	5.27%

Note:

4.2 FINANCIAL PLAN

4.2.1 Capital distribution

International Devevelopment Association (IDA/WB) would provide a credit by Special Drawing Right (SDR) equivalent to 100 million USD from Specific Investment Loan (SIL) to finance 84,8% of total project investment budget. Government's contribution from Central budget would be 0.4 million USD, equivalent to 0.4% of total project budget. The local contribution from provincial budget would be 11.3 million USD, equivalent to 9.5% of total project budget. Project beneficiaries' contribution would be 6.2 million USD, equivalent to 5.3% of total project investment budget.

The IDA loan period is 25 years long with 5 years of grace period, the maximum committment charge is 0.5%/year, service charge is 0.75%/year and the loan interest is 1.25%/year.

In addition to these costs, the Global Environment Facility (GEF) has committed to support a non-refundable fund equivalent to 6.5 million USD compared to the initial support budget of 5 million USD as stated in the MARD's proposal to the Government for the approval of WB loaned projects. This grant would be financed through WB's Trust Fund and is under the WB and MARD reception process.

^{1:} As agreed by WB, contingency cost (inclusive of price and material contingency) in the total project cost in USD at the project establishment time is temporary at 0. The loan by SDR normally forms the balance at 3-5% of total project cost calculated in USD due to the difference between USD and SDR during project implementation time. This balance, if arisen, is expected to be sufficient to cover project contingency costs (regularly estimated at 1% for material contingency and 2% for price contingency).

The objective of GEF grant for the project focuses on the conservation and development of biodiversity of marine and coastal resources to conservation and sutainable use of natural resources. This objective is consistent with project development objective aimed at improving coastal capture fisheries on sustainable manner. The GEF co-financing activities are expected to be mainstreamed on Activity A1 and C1 of the project to support the inter-sectoral spatial planning and sustainable coastal capture fisheries that are expected to focus on: supporting to coastal inter-sector planning, marine resources assessment and setting up database on marine protected areas, adjusting marine protected areas management plans and supporting to fisheries co-management models. At present, A1 and C1 activities are planned to be financed from IDA loan. In case where the GEF grant is approved, this fund would be used to replace the financing from IDA for A1 and C1 activities. The IDA financing would be re-allocated to other project activities

4.2.2. Financial mechanism and capital use nature

The project financial and capital use mechanism is applied in accordance with Section III, Part I of Circular No.108/2007/TT-BTC dated 7/9/2007 of the Ministry of Finance guiding the financial mechanism for Official Development Assistance (ODA) programs and projects, particularly:

a) Financial mechanism:

- WB loans: WB loans would be granted to MARD in terms of the project activities undertaken by MARD. Targeted support budget would be allocated to provinces in terms of project activities undertaken by project provinces.
- Counterpart's contribution: Central budget would be granted to project activities undertaken by MARD. Local budget would be allocated to project activities undertaken by project provinces. The counterpart's contribution would be planned and arranged in accordance with current regulations on State budget planning and compliance at all levels.
- Beneficiaries would arrange contributions to the activities related to VietGAP application demonstration models and biodiversity sustainable production.

b) Nature of capital use:

This is a mixed project including basic infrastructure capital and administration costs, of which basic infrastructure capital takes a major part of total ODA. Pursuant to the loan proportion financed by State budget, the project is classified at the the group of <u>basic infrastructure</u> projects. The planning and allocation procucedures on government's contribution, project loans, management and settlement are applied in accordance with current regulations of loaned projects for basic infrastructure. The administration costs would be undertaken following State regulations on administration expenses.

4.3. PROPORATION OF IDA/WB FINANCING

The proportion of IDA financing for each project expense is as follows:

Project expenses	WB financing proportion
(1) Goods and construction works	100%
(2) Consultancy fees, non-consultancy fees, training, workshops and incremental operational costs ¹	100%

Note:

4.4. ESTIMATED CAPITAL DISTRIBUTION FOR COMPONENTS AND ACTIVITIES

The estimated capital distribution for project components and activities are presented in Table 4.

Table 4. Estimated cost for components and sub-components (1000 USD)

	Total		Including		
Components/Sub-components	project cost	IDA	Government's contribution	Beneficiaries' contribution	
Component A: Institutional capacity					
strengthening for sustainable fisheries	5 252	5 252			
management	5,272	5,272	-	-	
Activity A1: Inter-sectoral spatial Planning for Coastal Areas (ISP)	1,512	1,512			
Tot Coastal Aleas (ISF)	1,312	1,312	_	_	
Activity A2: Upgrading of Vietnam Fisheries					
Database (Vnfishbase)	1,370	1,370	_	_	
Activity A3: Conducting Selected Policy	1,570	1,570			
Research	2,390	2,390	_	_	
Component B: Good practices for	2,000	_,			
sustainable aquaculture	48,129	39,921	1,998	6,210	
Activity B1: Improved Bio-Security	Í	ĺ	,	, , , , , , , , , , , , , , , , , , ,	
Management	33,360	25,662	1,488	6,210	
Activity B2: Improved Seed Quality					
Management:	10,166	9,656	510	-	
Activity B3: Improved Environmental					
Management	4,603	4,603	-	-	
Component C: Sustainable management of					
near-shore capture fisheries	52.232	44.786	7.446	-	
Activity C1: Co-Management of Near-Shore					
Capture Fisheries:	13,158	12,903	255	-	
Activity C2: Improvement of hygenic					
conditions and operational effectiveness of	20.074	21 002	7 101		
fishing ports and fish landing sites selected Component D: Project management,	39,074	31,883	7,191	-	
Component D: Project management, monitoring and evaluation	12,257	10,021	2,236		
momenting and evaluation	14,431	10,021	2,230	-	
Activity D1: Project management	11,667	9,431	2,236		
Activity D2: Monitoring and evaluation	590	590	-	-	
TOTAL	117,890	100,000	11,680	6,210	

Note: The estimated capital distribution to each component and activities for the project implementing agencies is presented at Annex 6. Project cost can be re-distributed during project implementation process depending on the performance results or in case where the budget is supplemented, adjusted or project design is altered.

¹ The expenses entirely financed by WB would not include the expenses covered by Government's contribution (central and local contributions) as follows: (i) salary and allowances for public servants (including public servants and civil servants involved in the project; (ii) land clearance and compensation costs for construction works; and (iii) consultancy fee for technical and economic report/investment project establishment, construction design and monitoring consultancy; the cost for appraisal and cost settlement for constructions and other fees and charges related to construction investment management in accordance with applicable national regulations within CRSD.

CHAPTER 5 – PROJECT MANAGEMENT AND OPERATION

5.1. MAIN INFORMATION ON PROJECT IMPLEMENTING AGENCIES

5.1.1. Institutional arrangement

Based on the proposal and submission of Detailed Outline of Coastal Resources for Sustainablee Development project financed by the World Bank for MARD, the Prime Minister had issued official document No. 557/TTg-QHQT dated 09 April 2011 approving the project activities.

According to the approved outline, the project is formulated towards sectoral approach, of which, MARD is a line investment agency for the whole project. Provincial People's Committee of the project provinces is the line agency of sub-projects and responsible for the implementation of project activities in the province.

Agricultural Projects Management Board (APMB) under MARD is the project investor for the central level activities. APMB would issue the decision to establish Project Central Unit (PCU) which acts on behalf of APMB to directly manage the project.

Provincial People's Committee of the project provinces authorizes DARD as the investor of the components carried out by the province. DARD would establish Provincial Project Management Unit (PPMU) to bear main responsibility in project implementation at provincial level.

MARD is the agency to implement several ODA projects. MARD has established 3 Project Management Boards which bear main responsibility on sector's ODA project implementation, including Agricultural Projects Management Board, Forestry Projects Management Board and Irrigation Project Central Management Board.

Decision No. 3241/QĐ-BNN-TCCB dated 22/10/2008 of the Minister of Agriculture and Rural Development governs the function, mandate, authorities and organizational structure of Agricultural Projects Management Board. Since 1999, APMB has carried out 13 technical assistance and loaned projects of the WB, ADB, AFD, DANIDA... valued more than 1 billion USD. At present, MARD is considering the establishment of fisheries projects management board, which would be separated from agricultural projects management board. Fisheries projects management board would have its key staff from agricultural projects management board. They are staff with experiences on ODA project management and would manage CRSD project once this project is moved to the new board.

Project provinces are those which participated in WB funded projects. People's Committee and DARD within their function can act as line agency and sub-project investor which are capable of project implementation.

Proposed project investment catagories focus on public infrastructure, social benefits and the activities which are possible not to return direct capital and not for profit purpose. All proposed investment catagories would accordingly be under the State budget's expenditures and no catagory is subject to re-loan from State budget.

5.1.2. Expertise and financial aspects

The projects under the management of agriculture projects management board would include project accountants working under the direction of Chief Accountant of Agricultural Projects Management Board. The projects would have independent auditors as regulated by the Government and donors. Annually, the project would conduct audit and present report to higher authorities and donors. Some completed projects would be checked by Government Inspectorate, Inspectorate of Construction Ministry, MARD and State Audit of Vietnam. The conclusions of inspection group show that in general, projects had good financial management without any signal of corruption except for minor expertise shortcomings.

5.2. PROJECT IMPLEMENTING MANAGEMENT

5.2.1. Implementation management

a) Project implementing agencies

- At central level: Ministry of Agriculture and Rural Development
- At cities and provinces: Ca Mau and Soc Trang (Mekong River Delta Cluster); Khanh Hoa, Phu Yen and Binh Dinh (South Central Cluster) and Ha Tinh, Nghe An and Thanh Hoa (North Central Cluster).

b) Investment agency and project/sub-project investors

- MARD is project line agency covering overall responsibility for project activities.
 Provincial People's Committee of project provinces is executive investor of project activities carried out at the province.
- Agricultural Projects Management Board under MARD is central executive agency over the project activities. People's Committee of project provinces authorizes DARD to act as investor of components carried out by the province.

c) Project implementation management

c.1. At central level:

The Ministry of Agriculture and Rural Development is Line Agency responsible for overall project implementation. MARD is responsible for: (a) approving the general investment plan of the entire project, and delegating to the Project Provinces to approve annual work plans and budgets for their provinces; (b) reporting to the government on implementation progress and effectiveness; and (c) coordinating with concerned ministries, such as the Ministries of Finance and Planning and Investment, and the State Bank of Vietnam to process necessary legal amendments or project restructuring to facilitate project implementation, enhance disbursement, and improve the efficiency of the use of IDA funds.

The Central Steering Committee (CSC): MARD would establish a CSC which is led by MARD leader to provide overall guidance to the project implementing agencies. Leader of Directorate of Fisheries (DOF) would act as vice chairman of CSC standing board. DOF staff would act as permanent secretary assisting the CSC. The CSC has its members coming from Ministry of Finance, Ministry of Planning and Investment, State Bank of Vietnam, Ministry of Natural Resouces and Environment; relevant departments of MARD including International Cooperation Department, Planning and Finance Department, Department of Construction Management, Agricultural Project Management Board etc. CSC

would hold meetings at least twice a year to assist the implementing agencies in solving problems or constraints faced during project implementation.

The Agricultural Projects Management Board (APMB): is project owner. APMB would decide the establishment of Project Central Unit (PCU)⁷ and request the Minister of Agriculture and Rural Development to issue decision appointing PCU Director. PCU would include Vice Directors, project account, procurement officer, planning,monitoring and evaluation staff and other supporting ones.

The Project Central Unit (CPU) is the key project agency at the central level, responsible for coordination, monitoring and implementation of all project activities at the central level and across provinces, including procurement and financial management, and project supervision, as well as results monitoring and evaluation. PCU is responsible for systhesis of project reports and providing guidance for PPMUs to comply with project activities. Specific responsibilities of the PCU include, but are not limited to, the following: (a) providing guidance and support to the PPMUs in project implementation and management, including preparing and implementing annual work plans, procurement plans, disbursement plans, M&E, EMP, EMDPs, RAPs, etc.; (b) developing and maintaining a sound project accounting system in accordance with the procedures required by government and donors; (c) handling all ICB packages and the selection of international consultants, as well as all other procurement matters for which central management is more efficient compared to provincial level management; (d) monitoring the quality of implementation, safeguards compliance, and project impact to report to MARD and IDA; and (e) preparing proposals for project restructuring and legal amendments, when necessary, for submission to government and IDA

The Directorate of Fisheries under MARD is responsible for the overall management of the fisheries sector in the country. It would provide overall policy guidance and technical support to the project to ensure that project activities are consistent with government policies and are complementary to sector and government programs. DOF can consider and assign their staff to work on full-time basis at PCU to provide technical support to project components.

The International Cooperation Department (ICD) in MARD would assist in coordinating with other Government ministries and with donors and report to the MARD leaders on important matters (e.g., legal amendments).

Planning Department under MARD is responsible department to submit project overall plan and annual ODA investment and central budget distribution to the MARD for approval or adjustment as regulated by current regulations.

The Departments of Aquaculture (DOA), Animal Health (DAH), Capture Fisheries and Resources Protection (DECAFIREP), and other technical agencies of MARD including Research Institutes would be available to assist at the request of PCU in implementing technical matters related to sustainable aquaculture and capture fisheries and capacity building.

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⁷ PCU is currently under Agricultural Projects Management Board (APMB). MARD is supposed to establish Fisheries Projects Management Board. In such case, CRSD would be moved to new entity and Fisheries Projects Management Board would replace APMB to become project owner.

Other technical Departments under MARD would take part in monitoring, coordination and support of PCU in project implementation in respective functions and mandates and the assignments of MARD leaders.

Vietnam Administration of Seas and Islands (VASI) of MONRE would be available to assist the PCU in implementing activities related to inter-sectoral planning and Strategic environmental assessment.

Research Institutes of Aquaculture No. 1, 2 and 3 (RIA) would take part in the project under PCU management to coordinate the implementation of a domestication and shrimp/fish seed quality improvement research program.

c.2. At local level:

Provincial People's Committee involved in the project is line agency of sub-projects in the province. Provincial People's Committee would be responsible for: (a) approving overall plan and arranging annual capital for project activities conducted by PPMU; (b) reporting the Government and MARD on the project implementation results; and (c) instructing Provincial Project Management Unit in project implementation, improving the disbursement and effectively using the IDA loan.

Provincial Project Steering Committee (PSC): At provincial level, People's Committee would establish Provincial Project Steering Committee (PSC) led by provincial Vice Chairman of People's Committee to provide orientation for PPMU. PSC would hold meetings at least twice a year to support PPMU in solving the important issues during project implementation.

DARD of project province would participate in the project as the investor of subprojects and its activities in the province. DARD would establish PPMU and appoint the Director of PPMU. PPMU would include Vice Director, project accountant, procurement staff, planning, monitoring and evaluation staff and other auxiliary staff.

Provincial Project Management Unit (PPMU) is an agency holding major responsibility for project activities at provincial level. PPMU would take overall responsible for project activities at province, including the procurement and bidding, financial management, project management, monitoring and evaluation. PPMU would work under the supervision and guidance of provincial Project Steering Committee, DARD and PCU. PPMU would have specific duties, namely: (a) preparation and implementation of annual plan including workplan, financial, procurement, disbursement plans and preparation of other reports as required by the Government and donors; (b) organization of procurement and bidding of the bid packages assigned to the locality and preparation of bid evaluation report for relevant authorities for approval; (c) maintainance of effective accounting system in accordance with national and donor regulations; (d) monitoring of safeguards compliance and project quality at provincial level; (e) coordination with project districts and communes to carry out planned activities.

Sub-Departments of Aquaculture, Animal Health, Capture Fisheries and Resources Protection, and other technical agencies of DARD would assist the PPMU in implementing technical matters as assigned DARD.

The Department of Natural Resources and Environment would assist the PPMU in implementing activities related to environmental planning, monitoring, supervision, and management as requested by the PPC.

Local governments, consisting of District and Commune People's Committees of the Project Districts and Communes, would assist the PPMU in implementing and monitoring project activities in their locations.

Fish Farmer Organizations/Fisher Organizations would be established on a voluntary basis through the facilitation of the project to implement GAP under Component B and participatory co-management arrangements under Component C

Co-management organizations consisting of members from among local fishers and local government (i.e., Commune People's Committee) would assist the preparation and implementation of a participatory co-management plan for the coastal waters assigned to them.

Table 5. Implementation Arrangements for each Component

Component	Primary Responsibility	Supporting Agencies
 A. Institutional capacity strengthening for sustainable fisheries resources management: Inter-sectoral planning for coastal areas Upgrading Vietnam fisheries database Studies to support provincial master planning B. Good practices for sustainable aquaculture: Upgrading bio-security conditions for selected farming areas Improving seed quality through promoting SPF seed Supporting seed domestication and breeding programs Strengthening aquatic animal health management networks 	PCU/PPMU PCU/PPMU PCU/PPMU PPMU/PCU PPMU/PCU PPMU/PCU PPMU/PCU	DARD, DONRE, PCU, VASI, MARD technical departments. PCU, RIAs, DARD, DONRE, MARD technical departments.
 Water quality monitoring C. Support to sustainable near-shore capture fisheries: Establishing co-management models in pilot districts Monitoring, control, and surveillance Upgrading fisheries infrastructure 	PPMU/PCU PPMU/PCU PPMU/PCU	DARD, MARD technical departments, local governments.

5.2.2. Project management and personnel

a) Project Central Unit

Personnel of Project Central Unit (PCU): consisted of Director, Vice Directors, project accountant, project procurement, planning, monitoring and evaluation staff and other supporting staff working on full-time basis. Salary and allowances for PCU staff would be

applied in accordance with State regulations and allocated by PCU project management sources.

PCU functions

- Responsible for overall project implementation, management, monitoring and coordination according to the Financing agreement signed between Government and WB;
- Acts as contact point with the donor related to project activities;
- Provides guidance and support to provinces in project implementation and management, including the preparation and implementation of workplan, procurement plan, annual disbursement, M&E plan, environmental management plans, ethnic minority development plan, resettlement compensation plan etc.;
- Synthesizes the workplan, overall disbursement plan and annual plan to present to MARD for approval;
- Synthesizes reports on sub-project proposal to present to WB for consideration;
- Carries out procurement packages in accordance with International Competitive Bid (ICB), international consultant selection and other bids as assigned to them;
- Monitors, controls, evaluates and reports the project implementation status as regulated by Government and WB.

b) Provincial Project Management Unit (PPMU)

PPMU personnel comprises Director, Vice Director, project accountant, procurement, planning, M&E, evaluation staff and other supporting staff. Salary and allowances for PPMU staff are applied in accordance with Government regulations and provided from PPMU project management source.

PPMU functions

- Takes overall responsibility over the project implementation, management and monitoring in the province and effective coordination of project activities with relevant agencies in the province. PPMU would work under the supervision and guidance of PPMU, DARD and PCU.
- Prepares and carries out annual plan including workplan, financial, procurement, disbursement plans and prepares other reports as requested by the Government and donors;
- Organizes goods procurement, construction and selection of consultants at local level and prepare bid evaluation reports to present to relevant agencies for approval;
- Monitors the safeguards compliance and project implementation quality at provincial level;
- Coordinates with project districts and communes to carry out planned activities.

5.2.3. The role of bidders

Eligible national and international bidders are invited to take part in project procurement activities in accordance with WB Guidelines "Procurement of Goods, Works and Non-Consulting Services" and Guidelines "Selection and Employement of Consultants by WB Borrowers", Procurement Law and Decree 85/2009/NĐ-CP dated 15/10/2009 of the Government guiding the implementation of Procurement Law and selection of bidder under Construction Law and current regulations of the Government. After the contract is signed between the bidders and project/sub-project investors, the bidders are responsible for project implementation with secured quality and progress. The organizations and individuals who violate bidding legislation, they would be punished upon the severity of the violation in accordance with Chapter on Handling with Bidding Violations as set forth in Decree No.85/2009/NĐ-CP dated 15/10/2009 of the Government.

5.2.3. The role of consultants

Project would need consultancy services to support the project implementation at central and local level. In addition to one international consultancy company which would be contracted to provide major technical support at central level by PCU, PCU and PPMU would select other individual consultants or consultancy firms to support project management, implementation, external audit and training of internal audit for the whole project. WB's *Guidelines "Selection and Employement of Consultants by WB Borrowers"* and other procedures consistent to the Govenrment and WB in terms of consultancy selection, management and use would be applied.

h) The role of other relevant stakeholders in project implementation

During project implementation, MARD would work closely with other Ministries, particularly Vietnam Administration of Seas and Islands and local governments at all its level to carry out project activities. Non-governmental organizations, mass organizations such as Women Union, Farmers Union and individuals can take part in project activities at central and provincial level on the basis of project demands and competitive procrement procedures.

5.3. PROJECT IMPLEMENTATION PLAN

Major activities per year during project implementation is presented at table 6.

Table 6. Major activities by year

Year	Major activities		
First year	Capital planning for the first year.		
	Establish PCU and PPMU.		
	Undertake administrative procedures with WB.		
	Select Service Bank (approved by State Bank of Vietnam and WB), open		
	project account at Service Bank and State Treasury.		
	Withdraw capital from WB to project designated account		
	Establish and approve Operational Manual (OM), provide training on OM		
	for project staff and relevant parties.		
	Procurement of vehicles and office equipment for PMUs.		
	Bid to select consultancy to support project implementation at central and		
	provincial levels.		

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	Bid to select auditors.		
	Establish project overall plan to submit MARD for approval.		
	Provinces establish investment sub-projects to submit People's		
	Committee for approval.		
	Bid for civil works and goods procurement for infrastructure investment		
	in the first year.		
	Establish accounting and financial management system for PCU and		
	PPMU.		
	Undertake disbursement.		
	Organize local and oversea study tours.		
	Prepare progress reports.		
	Prepare capital plans for the second year (July of the first year).		
Second year	Continuously approve feasible sub-projects in provinces.		
	Organize construction bids for sub-projects.		
	Organize sub-project construction.		
	Check and monitor the construction.		
	Establish institutional and policy documents to submit to competent		
	authorities for approval.		
	Organize training courses for trainers and farmers.		
	Establish GAP plan and model implementation.		
	Establish workplan and implement co-management model.		
	Undertake disbursement.		
	Organize local and oversea study tours.		
	Prepare progress reports.		
	Prepare capital plan for the third year (July of the second year).		
Third year	Continuously approve feasible sub-projects in provinces.		
	Organize construction bids for sub-projects.		
	Organize sub-project construction.		
	Check and monitor the construction.		
	Establish institutional and policy documents to submit competent		
	authorities for approval.		
	Organize training courses for trainers and farmers.		
	Establish GAP plan and model implementation.		
	Establish co-management plan and implementation.		
	Undertake disbursement.		
	Organize local and oversea study tours.		
	Prepare progress report.		
	Prepare capital plan for the next year (July of the third year).		
Fourth year	Continuously approve feasible sub-projects in provinces.		
	Organize construction bids for sub-projects.		
	Carry out construction of sub-projects.		
	Check and monitor the construction.		
	Establish policy and institutional documents to submit competent		
	authorities for approval.		
	Organize training courses for trainers and farmers.		

	Establish GAP plan and model implementation.		
	Establish co-management plans and model implementation.		
	Undertake disbursement.		
	Organize local and overseas study tours.		
	Prepare progress reports.		
	Establish capital plan for the next year (July of the fourth year)		
Fifth year	Continuously approve feasible sub-projects in provinces.		
	Organize construction bids for sub-projects.		
	Carry out construction of sub-projects.		
	Check and monitor the construction.		
	Establish policy and institutional documents to submit competent		
	authorities for approval.		
	Organize training courses for trainers and farmers.		
	Establish GAP plan and model implementation.		
	Establish co-management plans and model implementation.		
	Undertake disbursement.		
	Organize local and overseas study tours.		
	Prepare progress reports.		
	Synthesize project activities, disbursement, Government contribution		
	allocation, consider existing problems (if any) for settlement.		
	Review project completion results.		
	Project sum-up.		

5.4. FINANCIAL MANAGEMENT

5.4.1. The role of organizations at all levels in financial management

a) Central level

State Bank of Vietnam (SBV)

- On behalf of the Government, acts as WB loan borrower and a unit receiving funds from donors;
- Conducts periodical systhesis (6 months and one year) of capital withdrawal and payment through project account system at Service Bank and inform Ministry of Finance, Ministry of Planning and Investment and relevant agencies.

Ministry of Finance (MOF)

- Provides and approves regulations and instructions on financial management;
- Approves Capital Withdrawing Application of PCU/PPMU for disbursement from WB and designated accounts of the donors;
- Coordinates with Ministry of Planning and Investment (MPI), Ministry of Finance (MOF) to provide Government contribution to the project through MARD;
- Assigns officers to work with WB and mid-term review team of the relevant donors related to financial management; and

- Takes final responsibility before the Government on the project legitimate financial management in accordance with the role and function of MOF.

Ministry of Agriculture and Rural Development (MARD)

- Provides guidance and monitor PCU activities;
- Reviews, approves project overall plan, authorizes Agriculture Projects Management Board to approve annual financial plan for the activities performed by PCU;
- Announces annual ODA-related investment disbursement plan/targets for the project;
- Provides Government contribution for legitimate activities conducted by PCU; and
- Approves annual budget settlement and completed cost settlement for the project activities conducted by PCU and synthesizes project cost settlement results.

Project Central Unit (PCU)

- Establishes anual workplan, anual Budget and demand on Budget lines;
- Manages designated account at commercial banks;
- Ensures the Vietnam's compliance with expenditure management regulations through State Treasury;
- Prepare Capital Withdrawal Dossier, Capital Withdrawal Application and relevant documents and submit to MOF for consideration and to WB for disbursement and fund allocation from appointed accoun for the expenditures carried out by PCU;
- Establishes accounting system, maintains accounting records in compliance with Government and WB regulations. Establishes computerized accounting system and ensures effective operation of accounting system;
- Establishes and maintains internal audit/control system at PCU; monitors and provides guidance for provinces to ensure the effective operation of this system in project activities;
- Synthesizes financial reports from PPMU;
- As authorized by MARD, verifies annual cost settlement and systhesizes completed cost for Project activities conducted by PPMU.
- Recruits external audit firm for the Project and submits annual audit report to relevant stakeholders on time.

State Treasury

- Undertakes prior and post payment control for the expenditures carried out by PCU, ensures the payment for legitimate expenses only.

PMU Service Bank

- Is the service bank for the project;
- Opens accounts for PMU;

- Arranges payment for beneficiaries as requested by PMU;
- Transfers capital from designated account to recipient's bank account as requested by PMU.
- Regularly reports on the capital withdrawal and payment of project to the State Bank of Vietnam (on six month and a year basis).

b) Provincial and city level

Provincial People's Committee (PPC)

- Instructs and monitors PPMUs activities;
- Reviews, approves overall plans of activities conducted by PPMU, authorizes DARD to approve annual financial plan as conducted by PPMU;
- Allocates Government contribution for legitimate activities undertaken by PPMU; and
- Approves annual cost settlement and completed cost settlement for the project activities performed by PPMU.

Provincial and city's State Treasury

- Controls expenditures of PPMUs within project, ensures the payment for legitimate expenses only;
- Arranges payment as requested by PPMUs for beneficiaries from Government contribution and advance capital in the proportion identified in the Financing Agreement between WB and the Government.

PPMU

- Establishes workplan, annual budget plan and demands on capital flow;
- Prepares Capital Withdrawal Dossier with Statement of Expenses (SOEs) for disbursement;
- Establishes accounting system, maintains accounting records for the funds as regulated by Government and WB;
- Establishes and maintains internal control system and ensures the effectiveness of these activities; and
- Establishes financial statements as requested.

5.4.2. Preparation of financial plan

a) Objective and principle of financial plans

Project objective is to complete the project on time within allowable budget. As such, budget plan is an effective tool to assist PMU in objective planning for each year or each quarter and also indicate specific objective to be achieved for each PMU staff and relevant stakeholders (the banks, donors, bidders and other interested parties).

The principle of project financial plan preparation is to closely harmonize with project progress, expected workload, current cost norms and to ensure the sufficient allocation of budget for project activities.

The financial plan comprises ODA capital plan, Government contribution (central, local budget and beneficiaries' contribution) and other capitals (if any).

Each PMU is responsible for financial plan preparation of project activities carried out by them. PCU is responsible for preparing the financial plan for the activities that they perform and at the same time, synthesizes general financial plan for the whole project.

Annual financial plan of the project should clearly present detailed contents for each component, each major activity, funding source, Government's contribution and include a report describing the basis and background for each expense.

Project annual financial plan which was approved and announced by competent agency is a basis to control the payment, use of Government's contribution and ODA fund. After the annual financial plan is approved, PMUs present financial plan to the MOF (Department of Debt Management and External Finance) and expense control agency.

b) Preparation of project financial plan

Preparation of financial plan

PMUs prepare feasible plans in following steps:

- Formulate the workplan based on the identification of all activities and target budget for each activity and cost related. Budget line would be harmonized between the plan and report for easy comparision. This is the first project implementation plan so this plan needs to be presented to the Project Director for review and approval.
- Formulate procurement plan based on construction schemes or procured goods. Procurment staff need to estimate the completion time for each work.
- Prepare capital arrangement plan through identifying time of completion, disbursement for activities and details of each capital source.
- Prepare workplan for each year with the respective budget plan for the next year.
- Prepare plan for different financing sources (ODA, Government's contribution).
- Annually, at the time of State budget preparation, submission, review and approval as regulated, PPMUs would prepare the investment capital plan based on project progress to present PCU for comments. On basis of provincial proposal, PCU reviews, synthesize and present project ODA capital need and Government's contribution to project activities carried out by PCU to MARD and announces PPMUs on the agreed plan to report to the provincial People's Committee. Upon reception of project proposal, MARD and provincial People's Committee incorporate it in the general budget plan of MARD and province to present to MOF and MPI for incorporation of State budget to present to the Government and National Assembly for approval. The approval, allocation and annoucement of project investment plan would be undertaken according to national current regulations on the State budget preparation and compliance. The decision made by MARD and provincial People's Committee on the

- allocation of project investment plan must be presented to MOF/Department of Finance and State Treasury where the expenses are controlled.
- Government contribution plan allocated to PCU from State budget through MARD and to PPMU would be arranged from local contribution to the project by the province.

Budget preparation procedure (WB fund and counterpart contribution)

Planning staff coordinate with procurement, accounting and technical sections of the project to estimate the cost (budget plan) from WB and counterpart contribution capital sources for the coming years.

Budget plan should include the detailed items and capital source (from WB, counterpart contribution and other capital sources).

The basis for preparation of budget plan comprises the project implementation plan approved, WB disbursement plan, procurement plan (for goods and services) and progress on the implementation of procurement contracts signed (between suppliers and PMUs).

Annual budgeting and time

- The workplan is prepared based on the Financing Agreement, WB loan and annual counterpart contribution.
- Planning section prepares the counterpart contribution and WB budget based on the project overall plan for each items and presents to the Project Director for approval.
- Project Director is responsible for review of budget plans presented by planning section including counterpart contributions and WB loan for the whole project and presents to relevant competent agencies in July each year, including: (i) MARD, MOF (WB and central budget contribution); provincial People's Committee (lcoal contribution).
- With respect to projects using State budget as counterpart contribution, when counterpart contribution is required for implementation of necessary tasks, implementing agencies should issue an official document requesting MPI to report to Prime Minister for consideration of additional budget from contingency (if any). If the contingency is not available, the Prime Minister is requested to advance the budget of the following year.
- PCU presents 6 month and annual cost settlement reports to State Treasury for control and approval and to the External Finance Department under MOF and WB.
- At the end of fiscal year, financing section prepares report comparing detailed data of PCU and PPMU with that of State Treasury at all levels.
- During project implementation, if PMU finds the planned budget established at the end of the last year inappropriate, PMU should revise the planned budget as soon as possible to ensure the project progress and presents revised budget plan to the State Treasury for control and approval and to the Department of Debt Management and External Financing (MOF) and WB after revision.

The cause and solution to any deviation and error in budget detected in above cases should be presented. These solutions need to be presented in Financial Statements.

The preparation process of section's plans and tasks is presented in table 7.

Table 7. The preparation process of section's plans and tasks

Activities	Responsibility	Implementation time
I. Overall plan		
Establish overall activities (as per each component and activity) including below information: 1. Timing (starting and ending) for each project items, output and major activities. 2. Workload to be completed for each implementation stage 3. Input workload needed for each item, output and activities relevant to each stage.	PCU/PPMU (Planning, technical, procurement, financial sections)	After PMU is established
Synthesize capital need (detailed as per each component, activity, expense, capital source)	PCU/PPMU (Planning section)	
Present overall plan (including capital need and activity plan as basic description report and calculation basis) to PCU for review and synthesis	PPMU	
PCU presents the plan to WB for consideration and to MARD for approval	PCU	
WB and MARD review and approve project overall plan (including PCU plans)	IDA/WB, MARD	
Provincial People's Committee approves project overall plan related to the activities undertaken by PPMU	Provincial People's Committee	
II. Annual planned budget allocation		
Prepare annual workplan (detailed as per each component and activity) including: 1. Timing (starting and ending) for each project items, output and major activities. 2. Workload to be completed for each implementation stage 3. Input workload needed for each item, output and activities relevant to each stage.	PCU/PPMU (Planning, technical, procurement, financial sections)	June
Synthesize capital need (detailed as per each component, activity, expense, capital source).	PCU/PPMU (Planning section)	June
Present annual financial plan (including capital need	PPMU	June

Activities	Responsibility	Implementation time
and activity plan as basic description report and calculation basis) to PCU for review and synthesis		
PCU agrees plan with units	PCU/PPMU	June
PCU presents IDA/WB capital for whole project and central contribution for MARD for synthesis; PPMU presents local contribution plan to provincial People's Committee for synthesis; PCU presents IDA/WB capital plan for review and	PCU/PPMU	July
approval of ODA capital for the next year. MARD and provincial People's Committee synthesize plan to present to MOF, MPI for State budget synthesis and present to Government and National Assembly for approval.	MARD and provincial People's Committee	August
National Assembly approves annual national budget plan; IDA/WB approve ODA capital for the next year	National Assembly	October and November
Government announces budget information to Ministries, sector and provincial People's Committee.	Government	November
MARD and Provincial People's Committee announce budget/disbursement target to PCU /PPMU.	MARD and provincial People's Committee	November
II. Annual implementation/disbursement plan		
PCU/PPMU establish detailed annual implementation/disbursement plan in accordance with assigned budget/disbursement target to present project owner for approval.	PCU/PPMU	November and December
Project owner approves implementation/annual disbursement plan	Agriculture Projects Management Board, DARD	December
PCU/PPMU present disbursement plan to MOF (Department of Debt Management and External Finance) and State Treasury for expense control	PCU/PPMU	December
Revise annual plan to present to relevant agencies in case of activity revision, supplement and government contribution needs	PCU/PPMU	In case of emerging activity or in every September

5.4.3. Financial reporting system and audit arrangements

The Financial Management Assessment (FMA) identified the following key risks: (i) the proposed project implementing agencies (with staff mainly coming from Sub-DOAs or Sub-DECAFIREPs) are not familiar with Bank FM requirements; and (ii) project design gives greater flexibility and autonomy to the advance account opening level 1 to each PMU, which would require greater capacity and accountability in monitoring fund flows and in meeting the financial reporting requirements. These issues require good management and coordination between MARD and the DARDs. The FM risk is rated 'substantial' by WB.

The principal risk mitigation measures include: (a) acceptable FM staffing to be appointed at all implementing agencies, and provided with training on WB financial management requirements and disbursement procedures; (b) a Project FM Manual to be developed as part of the Project Operational Manual, describing in detail the roles and responsibilities of the concerned parties, as well as specifying the project FM procedures and regulations; (c) an accounting software which is being used in one of the projects under Agriculture Projects Management Board would be selected and upgraded for the project and training to be provided to all accounting staff; and (d) an internal audit TOR, acceptable to the Bank, to build the capacity of Project internal audit agencies.

PCU and PPMU would record all transactions of project accounts in a way to enable the identification of project expenses and annual audit through the Bank acceptable audit firms in compliance with the relevant audit principles. The notary copied of the audited reports would be presented to the WB in English language within 6 months after each fiscal year is ended. PCU would establish quarterly project progress on related issues in project implementation, supplied services and issues related to project management, propose the solutions to the improve the effectiveness and present Project Steering Committee and WB within 30 days after termination of each quarter. Progress reports would be prepared under a form agreed between Vietnam Government and WB at the project initiation stage. Vietnam Government would prepare and provide mid-term report to the WB at the end of second year of the project and project termination report within 3 months after the project ends. These reports would include the form and contents consistent with WB requirements, particularly:

a) Project financial statements

Financial statements established in accordance with Vietnamese Government and WB regulations

Project financial statements represent overall status of project assets and capital (WB and counterpart contributions) within project management and use.

Table 8. Requirements on project financial statements

No.	Reports/Statements	Preparation time
	Report to Vietnamese Government	
1	Account balance sheet	Quarterly, annually
2	Implementation budget statement	Quarterly, annually
3	Investment report	Quarterly, annually

4	Description of Financial Statements	Quarterly, annually
5	Investment capital details	Quarterly, annually
6	Investment as per project and categories	Quarterly, annually
7	Investment settlement by project, completed construction categories for transfer and use	Quarterly, annually
8	Other expenditure reports	Quarterly, annually
9	PMU operational cost report	Quarterly, annually
	Reports to WB	
10	Report on designated accounts	Annually
11	Report on Capital source and use	Annually
12	Detailed report on project implementation cost	Annually
13	Report on loan withdrawal	Annually
14	Loan withdrawal conciliation sheet	Annually
15	Report on procurement procedure management (goods and civil works construction)	Quarterly, annually
16	Report on procurement procedure management (consultancy)	Quarterly, annually
17	Contract-based expenditure report (goods and construction)	Quarterly, annually
18	Contract-based expenditure report (consultancy report)	Quarterly, annually

At the end of fiscal year, PMU prepares financial statements and reports related to designated accounts and statements of expenditures attached with description of financial statements in accordance with WB regulated formats for independent audit purpose.

Project financial statements comprise:

- Integrated report on the capital source and use, which indicates each capital source receiving from WB and Vietnamese Government and other revenues;
- Project implementation cost statement which indicates project objectives, major project expenses and reflects the figures arisen in a year and accumulated figures by the year end date;
- Account balance sheet indicates the accumulated figure of the capital, balance in the Bank and other asset and public debts of the project;
- Financial statement description indicates the conciliation between recorded capital and the capital receiving from WB. Collate the capital withdrawal with the amount disbursed according to additional disbursement methods to designated account, reimbursement or direct payment.

Report on designated accounts: A designated account normally comprises:

- Advances to the designated account and the additional amount to designated account;
- Paid amount;
- Incremental interest from designated account; and
- Balance by end of the year.

Statement of Expense: The detailed expenditure lists expenditures and is attached with withdrawal application, reference number and amount. Total withdrawal amount in form of SOEs is a part of conciliation sheet with the Bank in the same period. Once the report is established, the accountant would synthesize data in different criteria of the documentations arisen in reporting period. Integrated reports prepared by PCU is synthesized from PPMU financial statements.

Reports for management and internal control between PCU and PPMU

For financial management and internal control between PCU and PPMUs, the PPMUs shall establish internal report to present to PCU for review, collation and synthesis as follows:

- 01 copied of dossier for capital withdrawal to designated account and payment requests in form of direct payment withdrawal, withdrawal of reimbursed capital while presenting dossier to the MOF;
- Rapid report on project disbursement and implementation;
- Cost synthesis and settlement of used cost;
- Detailed report of project activities.

In case of deviation or it is necessary to further considerate the legitimacy of the expenses or the appropriateness of the financial statements prepared by PPMU, PCU may request PPMU to supplement/clarify the dossier and request national expense control agencies and donors to re-consider capital withdrawal dossiers with deviations.

b) Recipients and deadline of financial statements

Financial statement recipients

For the reports prepared as requested by Government of Vietnam and WB

- Ministry of Agriculture and Rural Development
- MOF/Department of Finance (in case of counterpart contribution)
- WB
- Ministry of Planning and Investment

For internal reports

- PCU

Financial statement submission deadline

- *Monthly report:* Internal reports, rapid reports on the capital use status shall monthly prepared by PPMU and presented to PCU on the day of 5th of the next month.

- *Quarterly report*: Quarterly reports prepared by PPMU for PCU would be presented no later than 15 days after a quarter is ended. PCU would present quarterly reports to WB, MOF and MARD no later than 45 days after a quarter is ended.
- Annual reports: PPMU presents annual reports to PCU no later than 45 days after the year is ended. The reports presented to MOF and MARD would not be later than 90 days since the date of a year end. IFRs report presented to the WB would not be later than 45 days after the year ends and audit report presented to WB would not be later than 6 months after the end of a fiscal year.

c) Audit

External audit

PCU would recruit external audit consulting firm according to WB procedures and process. Project financial statements and financial reports prepared by project implementing agencies would be annually audited in accordance with international audit standards and TOR accepted by the WB. Audit report would be presented to the WB within 6 months after the end of a fiscal year.

Internal control and audit

An independent and objective internal audit would be conducted to improve the operational effectiveness and ensure the proper use and procedure compliance by PMUs.

Internal audit procedure would be established in the Financial Management Manual. Agricultural Projects Management Board under MARD and DARDs of project provinces would be responsible for internal audit of PCU and PPMUs. An internal audit consultant would be recruited by PCU to improve the capacity of units which are assigned to conduct internal audit at central and local level. This internal audit consultant would be recruited no later than 6 months since the effective date of project based on TOR accepted by the WB.

d) Cost settlement report

To evaluate the investment process result and improve the investment work, the investor needs to prepare annual report of settlement and report of investment settlement for the completed project.

Annual cost settlement report

- At the end of each fiscal year, PCU/PPMU would establish annual cost settlement report to present to MARD and provincial People's Committee for approval. The annual cost settlement report is established according to current regulations.
- The report content is consistent with Regulation No. 214/2000/QĐ-BTC dated 28/12/2000 regarding the implementation of accounting mechanism applied to the investors including cost estimates, investment settlement approval and settlement of approved investment capital in details and as per each item.
- Investment capital settlement report would be prepared as per format No. F03B-CĐT (in accompany with Decision No. 214/2000/QĐ-BTC dated 28/12/2000 of MOF).
- The annual cost settlement principles and steps are conducted as per Circular No. 210/2010/TT-BTC dated 20/12/2010 of Ministry of Finance regarding the cost

settlement of basic construction investment under State budget according to annual budget limit.

Cost settlement report upon project completion

Upon project completion, the investor shall prepare investment cost settlement report as per Circular No. 19/2011/TT-BTC dated 14/2/2011 of Ministry of Finance regarding the cost settlement of completed project under State budget to present to MOF and other competent agencies.

The investment settlement report of the completed project shall include following contents:

- Detailed investment capital including State budget, loan and other capitals; approved and implemented capitals;
- Investment cost shall cover details on the each items, total investment approved, total cost estimates approved, investment cost proposed for settlement, investment cost proposed to remove from the assets established through the investment;
- Cost settlement report shall reflect the value of assets established through the investment as per fixed or working assets.

5.4.4. Budget approval, disbursement and retroactive mechanism

a) Budget approval mechanism:

This would be conducted according to State regulations and WB rules. Basic contents of this mechanism are presented in section 4.2.

b) Designated account

To ensure the effective project implementation and timely disbursement, the Government would open 9 designated accounts in USD at a commercial bank satisfying WB conditions after the loan is effective for PCU and 8 PPMU to receive the WB loan. The initial advance in each account is expected to be less than the expenditure plan in the first six months of each project implementing agencies. The specific increase of the initial advance can be adjusted accordingly based on the project needs. The specific amount of each designated account would be stated in the Disbursement Letter issued by WB.

All designated accounts shall be opened, supplemented and paid in accordance with Instructions to Loan Disbursement of WB and Vietnamese financial regulations. The accounts would be paid and supplemented as per SOE procedure of WB based on capital withdrawal application presented to the WB. The advance accounts and SOE would be audited in the annual audit process.

Together with the opening of advance accounts in USD, each PMU would open an account at State Treasury within their location to receive the Government contribution. The expenses of each PMU would be controlled and certified by the State Treasury. The State Treasury certification of the legitimacy of expense account is the basis for PMU to prepare additional capital withdrawal application presented to the WB.

c) Retroactive mechanism

The retroactive mechanism is reflected through the capital transfer and payment

process. The process is established based on: (I) Financing Agreement, (ii) Project Appraisal Document, (iii) WB Disbursement Manual; (iv) Vietnamese regulations on financial management to ODA project.

5.4.5. Capital withdrawal modality

a) Loan withdrawal

Retroactive capital withdrawal

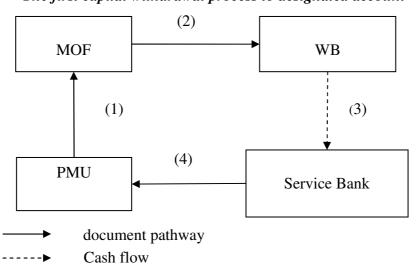
This modality is applied to the project expenses within the time from the date of negotiation (or prior date accepted by WB) to the effective date of project. PMU prepare the dossier for capital withdrawal includes: (i) Capital withdrawal application and SOE in agreed format; (ii) Certification of payment reception by the bidders/beneficiaries;

Capital withdrawal via designated account

The first withdrawal to designated account

- Preparation of the first capital withdrawal, including: Official document asking capital withdrawal presented to MOF/State Treasury; Capital withdrawal application (in WB format).
- MOF (Department of Debt Management and External Finance)/State Treasury would check and issue offical document accepting the capital withdrawal;
- After the completion of capital withdrawal application, the capital withdrawal dossier would be presented to WB. The WB would review, approve and conduct wire transfer to designated account with the amount stated in the application (after conducting all internal procedures);

The first capital withdrawal process to designated account



Note:

Description of capital withdrawal process:

- 1. PMU presents capital withdrawal dossier to MOF (Department of Debt Management and External Finance) and to PCU for synthesis;
- 2. Within 5 working days upon the reception of dossier, MOF would consider, approve and co-sign on the capital withdrawal application to presented to PPMU and WB;

- 3. WB reviews the capital withdrawal dossier and conduct wire transfer to the designated account of PMU opened at Service Bank;
- 4. Service Bank announces PMU after receiving capital transfered by WB.

Withdrawal of additional capital through designated account

This modality is applied to withdraw the additional capital for the expenses paid from designated account, there are two types namely: Statement of Expense (SOE) – applied to under-limit contracts, Summary Statement (SS) – applied to the beyond-limit contracts. Supplement capital withdrawal dossier includes:

- Certification of legitimate expenses by State Treasury;
- Application for supplement to designated account presented to MOF Department of Debt Management and External Finance;
- Statement of Expense by commercial bank;
- Summary Statement for beyond-limit contracts
- Preparation dossiers prepared by PMU to present to WB
- Capital withdrawal application and detailed Statement of Expense as per WB format;
- Statement of Expense of designated account prepared by commercial bank.

For the beyond-limit contracts, exept for above mentioned dossiers, PMU shall provide Summary Statements of relevant documents related to the payment of these contracts (for the beyond-limit contract, the copied of payment voucher must be attached with the Summary Statement).

Procedure on additional capital withdrawal via designated account

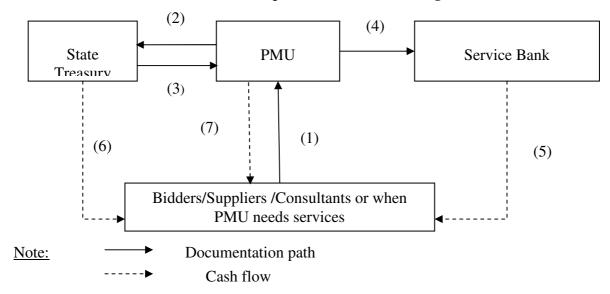


Chart description: PMU is understood to cover both PCU and PPMUs. The payment is conducted after the designated account gets capital disbursed from WB.

- 1. Bidders/suppliers/services present Payment Request to PMU or when PMU needs services;
- 2. PMU prepares Dossier as regulated to present to State Treasury for expense control;

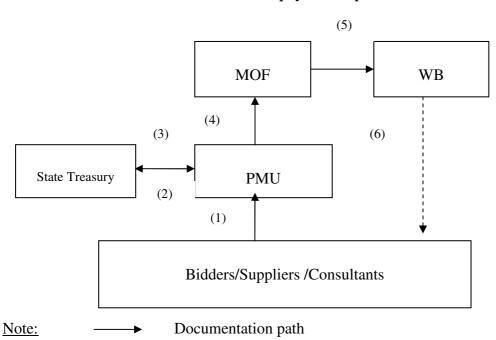
- 3. Within 5 working days, State Treasury checks and certifies legitimate dossiers for payment (which clearly indicates the government contribution and WB fund) and sends payment approval to PMU;
- 4. PMU presents payment request for Service Bank;
- 5. Service Bank makes wire transfer to the bidders;
- 6. State Treasury pays counterpart contribution (if any) to the bidders.
- 7. PMU directly pays bidders/suppliers

Direct payment capital withdrawal modality

This modality is applied to withdraw capital for direct payment to implementing agencies with each payment beyond 20% of limit from designated account and other circumstances accepted by WB. PMU prepares dossier to present WB, including

- Official letter requesing capital withdrawal attached with Capital Withdrawal Application and Statement of Expenses in WB regulated format;
- Receipts/payment request from the bidders;
- Copied contract signed with bidders and attached documents (if any).

Procedure on direct payment capital withdrawal



Cash flow Description of payment procedure:

4 P111

- 1. Bidders present payment request to PMU;
- 2. PMU prepares dossier and present to State Treasury for expense control;
- 3. State Treasury announces expense control result to PMU;
- 4. PMU prepares direct payment application to MOF (Department of Debt Management and External Finance) and to PCU for synthesis;

- 5. Within 5 working days upon the reception of dossier, MOF would review, approve and co-sign on the capital withdrawal application to PMU and WB;
- 6. WB would review the capital withdrawal dossier and conduct wire transfer to bidders' account.

Capital withdrawal in form of commitment letter

This modality is applied to pay for suppliers in case of goods import or other circumstances accepted by WB. PMU prepares dossier to present to WB including:

- Application to Special commitment;
- Statement of expenses as per WB regulated format.

b) Withdrawal of counterpart contribution

Relevant regulations include Circular No.108/2007/TT-BTC dated 07/09/2007 of MOF guiding the financial management mechanism applied to ODA programs and projects. The steps and procedures for capital withdrawal from counterpart contribution may be comprised of two methods:

- Capital withdrawal through advance allocation; and
- Capital withdrawal through payment allocation.

5.5. PROCUREMENT MANAGEMENT

5.5.1. Assessment of procurement capacity and risks

In project preparation, in November 2011, WB conducted the procurement capacity and risk assessment (PCRA) of project implementing agencies including PCU and PPMU. Most of PPMU have experiences in construction bids according to Government procurement procedures. However, those experiences are mainly based on consultants to prepare the bidding documents and evaluate bids. In addition, PPMUs have not much experience in goods procurement contracts with high value as well as consultancy contracts. Moreover, most of PPMU are not familiar with WB procurement procedures.

Through PCRA, following risks are identified:

- Project implementing agencies have a tendency to apply the Vietnamese Law and regulations on public procurement rather than WB guidelines when any conflict occurs;
- There is a lack of practical instructions on the procurement procedures for PMU staff;
- PMU staff are not familiar with WB procurement guidelines and documents and in lack of experience in WB-funded contract management;
- Weak procurement planning;
- Inadequate contract management capacity.

Following measures were agreed by the WB to solve the above risks:

Table 9. Capacity building in procurement of project implementing agencies

	Activities	Responsibility	Time frame
1	Assign tasks for persons in charge of procurement who are competent, experienced and accepted by the Bank.	Project implementing agencies	Project negotiation
2	Recruit competent procurement consultants to monitor and support PCU and PPMU.	Project implementing agencies	Project implementation
3	Prepare, complete and approve Operational Manual with detailed part on procurement.	Project implementing agencies	Project negotiation /effective project
4	Provide initial training on procurement for procurement staff	WB	Project negotiation
5	Provide in-depth training on procurement and contract management for PPMU	WB / Project implementing agencies	Project implementation
6	Conduct regular working trips to support project implementation and conduct annual post-procurement evaluation.	WB / Project implementing agencies	Project implementation
7	Prepare procurement plans including proper bidding packages and practical implementation time.	Project implementing agencies	Project implementation
8	Prepare and approve Workplan to improve the equality and transparency in procurement	Project implementing agencies	Project implementation
9	Establish effective complaint settlement mechanism for the project	Project implementing agencies	Project implementation

5.5.2. Procurement procedure

General regulation

The contracts which are partly or wholly financed by IDA within the project would be procured in accordance with WB instructions including: "Guidelines on procurement of goods, works and non-consulting services under IBRD loans and IDA credits and grants by WB Borrowers", May/2004 revised in October 2006 and May 2010 (the Guidelines) and; "Guidelines on selection and employment of consultants to WB borrowers", version of May/ 2004 which was supplemented and revised in October 2006 and May/ 2010 (The Guidelines on consultant employment) and other regulations stated in Financing Agreement. For the contracts under National Competitive Bid (NCB), apart from above guidelines, other regulations listed in the Appendix of the Financing Agreement are also applied.

The contracts which are totally funded by Government contribution (e.g, design consultancy contract, construction monitoring consultancy) would be procured according to the Law on Procurement and current guidances by the Government.

Procurement methods and application threshold

The application limit of the procurement methods shall be agreed with the WB during project preparation and listed in below table.

Table 10. Project procurement methods

Items	Procurement methods	Contract value (USD)	
	ICB	≥ 500.000	
Coods non consultancy convices	NCB	< 500.000	
Goods, non-consultancy services	Shopping	<100.000	
	Direct contract (DC)	N/A	
	ICB	≥ 5.000.000	
Construction	NCB	< 5.000.000	
Construction	Shopping	<100.000	
	DC	N/A	
	QCBS, QBS, FBS, LCS	≥ 200.000	
Consultancy services	QCBS, QBS, FBS, LCS, < 200.000 CQS		
-	SSS	N/A	
	IC	N/A	
Note:	ICB – International Competitive NCB – National Competitive SH - Shopping DC – Direct contract QCBS – Quality and Cost-Bayer QBS – Quality-based Selection FBS – Fixed Budget Selection LCS – Lowest Cost Selection CQS – Consultancy Quality SSS – Sole Source Selection IC – Individual consultancy N/A – Not applicable	e Bid ased Selection on on Selection	

Institutional arrangements and procurement responsibility

- PCU and PPMU are procurement agencies over the contracts/activities under their responsibility. Procurement procedure would be complied with WB Procurement Guidelines and specific regulations stated in the Project Agreement in accordance with the legislation and current regulations of WB and Vietnamese Government on procurement.
- As assigned, PCU would be responsible for procurement of international consultancy bids (ICB), the international competitive bids (ICB) and other bids, of which, the concentrated procurement would be more effective than separate procurement in each locality and the construction bids, goods procurement, non-consultancy and consultancy bids under the activities/sub-components conducted by the PCU.

- PPMU organizes goods procurement bids, non-consultancy services, construction bids and national consultancy bids as assigned within the instruction of PCU to ensure the compliance with WB and Vietnamese Government requirements.

5.5.3. Project management and procurement plan implementation

a) Procurement planning

- Procurement plan must be etablished for all packages carried by implementing agencies. In case where a bid could not be identified, the procurement plan can be set up for some bids that can be proceed earlier or during the 18 months of implementation. On annual basis or in case of demand, the procurement plans of the implementing agencies must be updated and revised in accordance with real condition.
- Specific procurement plan for each package must be prepared in accordance with Project Agreement signed and WB Guidelines to procurement as well as national regulations on bidding. Prior to any bidding activity, the procurement plan must be formulated to present to WB for review and approval and to Vietnamese executive agency for approval in accordance with current regulations. The procurement plan prepared by PPMU must be presented to PCU to incorporate in the project overall plans to present to WB for review.
- In procurement planning, the packages must be allocated based on the effective and cost-effective principle during implementation and transfer of goods, construction and services.
- During project implementation, procurement plan for initial 18 month period stated in Appendix attached is agreed upon among project implementing agencies and donors.

b) WB and Vietnamese Government's procurement review and approval

• WB

Prior review: The packages related to goods, non-consulting services, construction and consultating services must be subject to prior review of IDA/WB related to the steps required in procurement process that must be complied with procurement methods and contract valueas follows:

Table 11: IDA prior review

Items	Procurement method	Bank prior review
	ICB	All ICB contracts
	NCB	The first contract regardless of the value of each
Goods, non-		project implementation agency (PCU/PPMU);
consultancy		and all contracts with the value $\geq 400,000$ USD.
services	Shopping	The first contract regardless of the value of each
		project implementation agency (PCU/PPMU);
	DC	All DC contract
	ICB	All ICB contract
	NCB	The first contract regardless of the value of each
Construction		project implementation agency (PCU/PPMU);
		and all following contracts with the value
		≥ US\$ 3,000,000

Items	Procurement method	Bank prior review
	Shopping	The first contract regardless of the value of each
		project implementation agency(PCU/PPMU).
	DC	All DC contract
	QCBS, QBS, FBS,	All contracts with consultancy firms with the
Consultancy	LCS, CQS	value \ge US\$ 200.000;
services	SSS	All individual contract (IC) with the value ≥
	IC	US\$ 50,000; and all SSS contracts

WB's post-review and procurement monitoring: The contracts which are not prior reviewed would be subject to the post control of IDA in accordance with procedures stated in paragraph 5, Appendix 1 of Procurement and Consultancy Employment Guidelines. At initial stage, it is expected that 20% of the contracts which are not prior reviewed would be subject to post control. This percentage would be regularly revised during project implementation based on procurement capacity of relevant agencies.

Vietnam

- MARD would review procurement plan for the packages conducted by PCU. APMU would review and approve next steps and handle the situations during bidding in case of the bids conducted by PCU as regulated.
- Provincial People's Committee would review and approve the procurement plan of the bids conducted by PPMU. DARD would review and approve the next steps and handle the situation in case of the bids conducted by PPMU as regulated.
- PCU would be responsible for providing guidance and monitoring of the procurement process conducted by PPMU to ensure the compliance with WB and Vietnamese Government's procurement regulations applied to the project. For the provincial bids subject to WB prior review, PPMU must present dossier/proposal to PCU for review and synthesis for the donor for comment. PCU would conduct prior review of the PPMU bids which are not under WB prior review requirement (except for the bids in form of competitive bids).

5.5.4. Contract management

- Procurement agencies including PCU and PPMU would sign contract with the bidders selected in accordance with project regulations and organize the management and monitoring of bidders' contract compliance as per provisions signed.
- PPMUs would present monthly, quarterly, yearly reports and other specialized reports to PCU for synthesis of the contract implementation results in accordance with the Aligned Monitoring Tools (AMT) stated in Decision No. 803 of MPI and other reports for procurement management and monitoring by competent agencies.

CHAPTER 6 – PROJECT RESULTS AND IMPACTS

6.1. PROJECT RESULTS AND IMPACTS MONITORING MECHANISM AND PROJECT IMPACTS

6.1.1 Indicators to measure project implementation results

Below table is prepared within Project framework for monitoring of major implementation results which presents impact measurement indicators consistent with the project develoment objective and progress measurement indicators or direct/immediate results.

This table also presents brief information on the M&E mechanism and data collection methods as well as responsible agencies in project data collection and M&E.

Table 12: Project M&E framework

Project indicators	Unit	Basic data			ulate va	lue ** Y 4 Y 5	5	Frequ ency	Data source/ Metho d	Data collectio n responsi bility	riptio
PROJECT IMPAG	CT INI	DICATO	RS								
Indicator 1: Increase in the proportion of farms meeting national standards for water effluent following the adoption of Good Aquaculture Practices	%	0	5	10	20	40	50	Annua Ily	Annual survey reports	PCU and PPMUs	Cum ulate d calcul ation
Indicator 2: Reduction in shrimp disease losses in the production areas applying Good Aquaculture Practices.	%	0	0	5	10	15	30	Annua lly	Annual survey reports	PCU, PPMUs, fisheries extensio n staff	Cum ulate d calcul ation
Indicator 3: Increase in the proportion of areas in which sustainable Near-Shore fisheries resource management systems are applied.	%	0	0	10	20	40	50	Annua Ily	Annual survey reports	PCU, PPMUs, sub- DECAF IREP	Cum ulate d calcul ation

Project indicators	Unit	Basic data			ulate va	lue ** Y 4 Y 5	5	Frequ ency	Data source/ Metho d	Data collectio n responsi bility	Desc riptio n
PROJECT PROG	RESS I	INDICA'	ΓORS (DIREC	T RESU	ULTS)					•
Component A: Ins	titutior	nal capac	ity stre	engtheni	ng for s	ustaina	ble fishe	eries ma	nagemer	nt	
1. Percentage of project provinces, districts, communes which are provided with training on intersector planning	%	0	20	40	60	80	100	Annua lly	Annual synthes ized reports		Cum ulate d calcul ation
1. Number of project provinces establishing intersector planning teams at provincial level.	Num ber of provi nce	0	2	4	8	8	8	Annua lly	Annual synthes ized reports	PCU and PPMUs	Cum ulate d
3. Number of national and provincial level researches conducted for Fisheries Sector Master Plan to 2020.	Num ber of resea rch	0	2	4	8	12	12	Annua lly	Annual synthes ized reports	PCU and PPMUs	Cum ulate d
4. Number of project provinces with upgraded and sufficiently operated fisheries database	Num ber of provi nce	0	0	2	4	6	8	Annua Ily	Annual synthes ized reports		Cum ulate d
Component B: Go	od prac	ctices for	sustair	nable aq	uacultu	re					
1. Number of farmers trained on GAP.	Num ber of farme r	0	1.000	2.000	5.000	10.000	20.000	Annua lly	Annual synthes ized reports	PCU, PPMUs, fisheries extensio n staff	Aver aged calcul ation
2. Number of hatcheries operating and meeting biosecurity standards.	Num ber of hatch ery	0	0	0	10	15	20	Annua lly	Annual synthes ized reports	PCU, PPMUs, fisheries extensio n staff	Cum ulate d calcul ation
3. Percentage of farmers in selected sites using quality seeds/with quality certificate	%	25	25	30	35	40	50	Annua lly	Annual synthes ized reports	PCU, PPMUs, fisheries extensio n staff	Cum ulate d calcul ation
4. Number of provincial	Num ber	0	0	0	4	6	8	Annua 11y	Annual synthes	PCU, PPMUs,	Cum ulate

Project indicators	Unit	Basic data			ulate va		5	Frequ ency	Data source/ Metho d	Data collectio n responsi bility	Desc riptio n
agencies in charge of fish veterinary services who have improved capacity on disease diagnosis, monitoring and early reporting	of agenc ies								ized reports	fisheries extensio n staff	d calcul ation
5. Percentage of farms in selected sites having access to waste/water management system.	%	<10	0	10	20	40	50	Annua lly	Annual synthes ized reports	PCU, PPMUs, fisheries extensio n staff	Cum ulate d calcul ation
Component C: Sus	stainab	le manag	gement	of near	-shore c	apture f	fisheries	}			
1. Coastal capture fisheries comanagement successfully applied in pilot districts	Num ber of distri ct	0	0	2	4	8	16	Annua lly	Annual synthes ized reports	PCU, PPMUs, DECAF IREP	Cum ulate d
2. Successful comanagement implementation at high biodiversity and important natural habitat areas	На	0	0	0	10.000	20.000	30.000	Annua lly	Annual synthes ized reports	PCU, PPMUs, DECAF IREP	Cum ulate d
3. Number of MCS stations at district level with sufficient staffing and in official operation.	Num ber of statio ns	0	0	2	4	8	16	Annua 11y	Annual synthes ized reports	PCU, PPMUs, DECAF IREP	Cum ulate d calcul ation
4. Number of fishing ports and fish landing sites with improved hygienic conditions and pre-processing practices.	Num ber of fishin g ports/ fish landi ng sites	0	0	1	3	6	16	Annua lly	Annual synthes ized reports	PCU, PPMUs, DECAF IREP	Cum ulate d
Component D: Pro	oject m	anageme	ent, Mo	nitoring	g and Ev	aluatio	n —				
1. Number of project provinces meeting the requirements in	Num ber of provi	0	1	4	5	6	6	Annua lly	Annual survey reports	PCU, PPMUs	Cum ulate d

Project indicators	Unit	Basic data	Cumulate va	5	Frequ ency	Data source/ Metho d	Data collectio n responsi bility	Desc riptio n
project management, monitoring and evaluation	nce							

Note: The indicators listed in this table would be discussed with WB and relevant stakeholders in project negotiation. Final negotiation results would be incorporated in signed Financing Agreement or Revised Agreement afterwards, and would be used as official implementation result indicators used in the project.

6.1.2. Project major conditions and committments

Negotiation conditions

- Environmental and social policy framework, ethnic minority development plan approved by MARD;
- Feasibility Study, Operational Manual, 18-month Procurement Plan approved by MARD;
- PMU was established with relevant staffing approved by WB;
- Provincial People's Committee committed to provide timely and sufficient local contribution for the project first year and following years;

Post-negotiation:

- Project's effective conditions: project resettlement policy framework was approved by Prime Minister.
- After negotiation, line agencies (MARD and provincial People's Committees) issued document allowing project implementing agencies (PCU/PPMU) to organize prompt procurement of bidding packages in the first year prior to the project's effective date.

6.1.3. Project M&E and reporting mechanism

M&E system

The expected results, monitoring indicators and monitoring of project implementation results are introduced in the project monitoring framework. The monitoring content would be mainstreamed in all project components and designed to provide necessary information for regular management of project effectiveness and impact assessment. To facilitate the Government's monitoring on ODA projects, the project monitoring activities would be prepared in accordance with Aligned Monitoring Tools (AMT) as per Decision No.803/2007/QĐ-BKH dated 30/7/2007 of MPI.

PCU would be responsible for establishment of project M&E system in accordance with AMT and provide guidance to PPMU for application.

Project M&E system would include M&E staff of PCU and PPMU with the support of national consultants recruited by PCU.

Basic survey activities would be conducted at initial stage within 3 years after project completion to provide inputs for the project implementation result assessment.

Project regular assessment

The Government of Vietnam (MARD) and WB would check and evaluate the project activities every six months through a mixed inspection group. PCU would be responsible for preparation of project progress on quartly, semi-annual and annual basis and coordinate with PPMU to facilitate the work of Government and WB inspection group.

On the basis of the Government and WB's inspection, evaluation and comments of relevant stakeholders, Government of Vietnam and WB would identify the exisiting problems in project implementation and agree upon the necessary measures to remedy. The Government of Vietnam and WB would conduct mid-term review of project activities and impact on the third year of implementation. The project completion assessment would be conducted upon the project termination. This assessment would be based on the TOR agreed by Government and WB.

6.2. PROJECT ECONOMIC AND FINANCIAL BENEFITS

The project is designed with four components, of which Component A and B can be quantified. The benefit analysis of these components would be applied to calculate the econoime rate of return (ERR).

Component A – Institutional Capacity Strengthening for Sustainable Fisheries Management – clearly also has a set of sector benefits, but these are difficult to quantify in economic terms and a cost benefit analysis was not carried out for this component. Among the benefits from Component A are improved sector management capacity and efficiency, better planning to avoid waste and resource use conflicts, improved marine habitats and biodiversity, an increase in the quantity and quality of fisheries and aquaculture data for better management and policy–making, and improved data recording to foster exports (IUU, traceability). Component A contributes to the overall vision and direction of the near-shore fishing industry as well as the aquaculture sub-sector. Component A thus contributes indirectly to achieving the benefits of Components B and C.

a. Component B: Good Practices for Sustainable Aquaculture

Component B supports good aquaculture practices through three key activities: (a) improved bio-security management at the farm and farming community levels; (b) improved seed quality management; and (c) improved environmental management.

Aquaculture in the eight project provinces would focus on some species, of which the most prominent are tiger shrimp (P. monodon), white leg shrimp (P. Vannamei). In addition, polyculture would be carried out such as farming of shrimp with fish and crab, Artemia (brine shrimp) with crab and fish, clam, and crab. Aquaculture species would also include sea snail, sea cucumber, lobster, green muscle, and blood cockle.

Without project

Aquaculture is a thriving business in many of the coastal provinces in Vietnam. While the average of pond area is approximately one hectare, quite a few households have farmed on two or three hectares. Many farmers can produce two cycles per year in the same pond, but one cycle is the most common largely because of disease and water problems. The

aquaculture value chain is ineffective, of which the production, processing and marketing are at high risks. Most farmers use too high stocking densities, water quality is often poor, medicine and chemicals are often overused or inefficiently used, and feed is not the best quality and is not provided in the proper amount. These problems generally decrease the quality and size of final aquaculture products, causing further problems to the processing and marketing value chain. Although farmers can make sizeable profits from just one cycle, disease can wipe out the entire production in a cycle, leaving the farmer to pay for the cycle expenses without income. It was reported that farmers had to sell their product before product's maturity, to avoid the risk of losing all due to disease. This results in small sized products and lower price at farm gate. The management of waste and waste water is often not environmentally sound.

With project

The aquaculture industry can become more efficient and less risky through the adoption of proper aquaculture management techniques (GAP standards), extension and specialized training under the project. Better management, in addition to improved water quality (through community or individual pond water monitoring, management and treatment) and better pond preparation between cycles, can lead to an increase in production per hectare. Product quality can be improved through better management, leading to an increase in farm gate prices. Production costs can be lowered through proper stocking densities and proper medication and feeding regimes. Increased production and prices would go hand in hand with increased investments that may include waste water treatment facilities, the purchasing of new pumping and aeration equipment. Project activities would increase production/ha, decrease post harvest losses, increase prices through improved quality, and possibly decrease production costs. These would lead to increased farmer net benefits and an overall increase in economic activity in the project provinces. Other benefits include the possibility of a more diversified aquaculture, increased export earnings, and a better environment. In addition, processing factories would have a more assured supply of aquaculture products and would thus be able to operate more efficiently. Better quality products would increase the market accessibility, especially to international markets.

Quantifiable Benefits from Component B

Project provinces have provided data and information on revenue and aquaculture production cost as per species. In total, there are 20 aquaculture farms covering one ha analysed (particularly the model for each species in each province, if any) based on the assumption of "with or without project support". After discussion with provinces, porject sets out the objective to have 10,808 ha of aquaculture sites applying GAP after project end. Table 13 presents objective related to farming sites applying GAP in each province and as per each species.

Table 13 also presents the with project incremental net benefits/ha for each species model. The net benefits of the without project models were subtracted from the net benefits of the with project models to arrive at the incremental net benefits/ha. Net benefit of the model with project is higher than that without project is based on the povincial assumption that the application of GAP would increase the product costs and production and there would be (positive) change in seed release density, farmed feed cost, feed quantity and labour requirements. Due to the difference in provincial conditions with the difference in cost and product price so the models applied fo the same farmed species (such as tiger shrimp) would

present different result. However, these models have the same cost structure while the cost for different catagories are within the identified scope in terms of budget in previous studies. In some cases, the price and model cost are standardized. In case where the province did not offer the proper farmed species, the average farming cost of such species in other province would be applied. Since the provinces did not offer the farming models for sea snails, sea cucumbers, crabs, lobster, fish so the farming areas of such species were not covered in this analysis (accounting for 904 ha, equivalent to 8.5% over 10,808 targeted ha).

Table 13 also presents the total annual net profit for each species (number of expected ha for each species x incremental net profit with project). In total, the incremental net profit is available thanks to the application of GAP which is about 51 million USD each year.

In consideration of financial analysis of farming households, e.g tiger shrimp farming, they can increase the net profit of about 5,145 USD or 58% (Table 13) thanks to project participation. Incremental benefits for the other 19 farm models range from a 17% increase for extensive production to over 100% for more intensive aquaculture production systems.. This shows that the households involved in project and applied GAP could get sufficient financial profits. It is important because it not only attract the farmers attention to GAP but they also expect to commit GAP application on long term basis. The incremental benefits are also sufficiently large to service farmers' debt for incremental investments, e.g., water pumps and aeration and water treatment equipment.

Table 13. Incremental net profit in aquaculture activities with project

Province/species	Project targed Ha	Incremental net profit with project (US\$/ha/year)	Total annual incremental net profit (US\$)	% incremental net profit with project
Soc Trang				
1. Tiger shrimp	400	5,145	2,058,095	58%
2. White-leg shrimp	600	5,348	3,208,821	55%
3. Polycultute: shrimp-crab-fish	1200	7,059	8,470,325	81%
4. Brine shrimp (artemia)-crab-fish	720	3,762	2,708,527	>100%
5. Clam	200	3,060	612,009	49%
Total	3120			
Ca Mau				
1. Tiger shrimp a/	440	5,892	2,592,480	74%
2. White-leg shrimp	320	7,452	2,384,762	39%
3. Polyculture: shrimp-crab-fish b/	920	4,601	4,232,900	98%
4. Crab c/	160	-		-
Total	1840			
Khanh Hoa				
1. Tiger shrimp	500	4,333	2,166,381	>100%
2. White leg shrimp	500	6,867	3,433,624	84%
3. Sea snail, sea cucumber	54	-		-

4. Lobster c/	2	-		-
Total	1056			
Phu Yen				
1. Tiger shrimp	400	4,786	1,914,286	>100%
2. White leg shrimp	400	5,613	2,245,317	24%
3. Oyster and seaweed	300	-		-
4. Blood cockle	280	-		-
Total	1380			
Binh Dinh				
1. Tiger shrimp d/	320	5,039	1,612,457	-
2. White leg shrimp	480	4,381	2,102,857	17%
3. Lobster c/	60	-		-
Total	860			
Thanh Hoa				
1. Tiger shrimp d/	240	5,039	1,209,343	
2. White leg shrimp	48	5,583	268,000	31%
3. Polyculture: shrimp-				
crab-fish d/	640	4,101	2,624,418	-
4. Clam	80	3,988	319,048	34%
Total	1008			
Nghe An				
1. White leg shrimp	384	4,803	1,844,480	-
2. Crab-fish c/	48	-		-
3. Clam	192	6,570	1,261,426	>100%
Total	624			
Ha Tinh				
1. White leg shrimp	320	4,995	1,598,476	79%
2. Polyculture: shrimp-				
crab-fish	400	3,616	1,446,584	81%
3. Clam	200	4,284	856,857	>100%
Total	920			
Total e/	10,808		51,17 1,473	

Source: Data on incremental net profit of aquaculture model covering 1 ha is provided by project province:

- a/ Inclusive of 120 ha extensive shrimp culture
- b/ Inclusive of 120 ha fish culture
- c/ Model is not available
- d/ Model is not available use average data of other province
- e/ Total annual incremental net profit worth 51.1 million USD gained from the use of 9,904 ha over the total of 10,808 ha.

b. Component C: Sustainable Management of Near-Shore Capture Fisheries

This component would support two key activities: (a) co-management of near-shore capture fisheries at district and commune levels in combination with capacity strengthening of MSC system; and (b) improvement of hygiene conditions and operational effectiveness of

fishing ports and landing sites selected to mitigate environmental pollution at locality and improvement of fish products.

Activity C1: Co-management of near-shore capture fisheries

Without Project

Current near-shore capture fisheries are characterized by over fishing and environmentally damaging fishing practices. As described in the current status of coastal capture fisheries, most of fishers have used small mesh-size net, violating the regulations related to capture fisheries and even used chemicals and explosives in fishing. These have taken a toll on bio-diversity and are depleting fish stocks of all types, as well as degrading the near-shore fishing environment. As a consequence, fishermen's livelihoods could be threatened as near-shore capture fisheries becomes unsustainable over time. This would also impact the overall economy, as the near-shore fishing industry is a large contributor to the economy.

With Project

With-project investments would be in the form of the development and implementation of participatory fisheries co-management in selected communes. The project would provide vocational training and upgrade of public infrastructure to support the alternative income. Monitoring, control and surveillance (MCS) would be further invested for government's capacity strengthening in MCS. Co-management would assist the implementation of regulations on capture fisheries and enhance the long-term sustainability of coastal fisheries resources. These would lead to the enhancement of near shore fishing environment, an increase in resources and biodiversity, fish landings and ultimately to increased incomes for fishing households and processing plants, as well as a greater contribution to the overall economy thanks to near-shore fishing industry.

Quantifiable Benefits from Activity C1

Project provinces have provided information on the number and type of coastal fishing vessels with different fishing activities (gill net, pen, trawl net, long line) conducted in the province's water areas within project sites. Relating to each type of fishing vessel, provinces provided information on the revenue and operational cost of fishing vessel through which the annual net profit is calculated in case of with and without project to estimate the incremental net profit per year for each type of fishing vessel. Total incremental net profit of each province is calculated by multiplying the number of each type of fishing vessel with the incremental net profit of such fishing vessel type. No attempt was made to quantify the benefits from project support to alternative income sources for the participating communes.

Table 14 below presents an estimate of the net benefits with project by province, and the number of fishing vessels that would be affected by the project. Incremental net benefits of the project are estimated at US\$25.7 million per year. These incremental net profits are calculated based on the province's assumptions including the changes in number of fishing vessels, fish catch and product price thanks to co-management activities supported by the project.

Table 14. Total incremental net profit thanks to project-supported co-management

	Incremental net profit/year, all fishing vessels a/	Number of fishing vessels
Provinces	(US\$)	operated in project zone b/
Soc Trang	389,790	723
Ca Mau	2,933,010	4783
Khanh Hoa	4,281,514	6368
Phu Yen	4,767,274	7083
Binh Dinh	4,510,600	7612
Ha Tinh	2,341,202	3616
Thanh Hoa	4,856,550	7501
Nghe An	1,704,102	3247
Total	25,784,043	40933

Source: data on revenue and operational cost of each fishing type in case of with project and without project provided by project provinces

Activity C2: Improving conditions and operational efficiency of selected fishing ports

At least 16 fishing ports/landing sites within project sites are expected to be upgraded in each stage within 5 years of CRSD implementation. Activity C2 includes the provision of proper shelter areas at the fishing ports selected for fishing vessels.

Without project

Many of the fishing ports and traditional landing sites in the country lack basic facilities to provide necessary support services to the fishermen, e.g., clean water and ice in sufficient quantities, proper cold storage facilities, net and boat/engine repair facilities on site. Port management skills are often of shortage. Due to limited infrastructure, the quality of the fish can severely deteriorate at the port before reaching processing plants and wholesale markets, especially during periods of hot weather. Losses in the value of the catch are estimated to be as high as 20% to 30%, resulting in significant loss in income for fisher households and the ports, as well as under-utilization of fish processing plant capacity. The present state of many of the fishing ports also raises food safety questions

With project

Project would support the upgrading of fishing ports/landing sites and in many cases it would facilitate the accessibility to these sites. Project would provide budget to invest in solid waste and wastewater treatment facilities and shelter areas. The project would also assist with developing human resources and management skills so that the ports are efficiently operated. Major activities of Activity C2 are to improve hygiene conditions and operational efficiency of fishing ports in order to increase the catch reception at port, improve landed fish and reduce environmental pollution. This would increase the port's production value and fishers income as well as food safety. As the components of the project are integrated, the full realization of

a/ Incremental net profit/year, fishing vessel x number of fishing vessel type.

b/ Fishing operation activities of coastal fishing vessel include: gill net, trawl net, casting net, trap, lift net, purse net, lift net, long line.

the expected benefits from Activity C2 is depending on the accomplishment of activities under Component A and Activity C1.

Quantifiable Benefits from Activity C2

Project provinces provided information on the type of fish landed, volume (ton) and average price of fish products landed every year (without project) as well as the province's assumptions and estimates on the type of fish landed, quantity and expected price with project. Provinces suggested that the quantity of fish landed at port with project would be increased thanks to many factors such as: (a) reduced damages of the products (current damage percentage at the range of 20% to 30% would be significantly reduced; and (b) greater scale of logistic establishments at fishing port. In some cases, provinces suggested that the landed fish price would be increased with project thanks to improved fish quality.

Table 15 presents an estimate of with project net benefits by port/landing sites; total annual benefits achieved by upgrading fishing ports and fish landing sites thanks to project support (this analysis includes net profit from upgrading of 13 fishing ports/fish landing sites with available data only). are estimated at US\$17.5 million. Benefits from the building of typhoon shelters and from direct environmental improvements although important and sizable, were not quantified in this analysis

In total, annual net profits are estimated at US\$17.5 million. Annual incremental profit with project presented in Table 15 is the net production value of the establishments in the port and is the cost for landing the fishery products including the fees paid by fishers in order to cover the port operational expenses. This value is different among various provinces depending on the type of landed products, port capacity and different prices among the ports. The benefits from shelter establishment and direct environmental improvement are important and significant but are not qualifiable in this analysis.

Table 15. Estimate of Yearly Increase in Net Benefits from Port Rehabilitation

Province/Port/Landing Site	Yearly With Project Increase in Net Benefits a/
Ca Mau	
Song Doc port	\$2,985,492
Ho Gui landing site	\$3,050,563
Soc Trang	
Tran De port	\$1,017,143
Bai Gia landing site	\$798,571
Mo O landing site	\$747,619
Khanh Hoa	
Hon Ro port	\$1,420,952
Vinh Luong port	\$650,476
Phu Yen	
Dan Phuoc port	\$1,743,201
Dong Tac port	\$1,954,366
Binh Dinh	
De Gi port	\$2,314,000
Thanh Hoa	
Hoang Hoa landing site	\$400,000

Nghe An					
Quynh Phuong port	\$238,500				
Lach Van port	\$176,960				
Total ports	\$17,497,844				
Source: With and without project port landings and price/ton by species supplied by					
provinces					
- / 337:41					

a/ With project species increment in volume landed x species price summed over all species categories

c. Project cost

Project costs presented in Table 16 were used to estimate cost for 05 years of project implementation and extracted from Table on project cost (Costab). Total project cost is used to compute the economic rate of return, as all four components contribute to the incremental benefits estimated for component B and C. In the absence of information on taxes and the foreign/local content of project investment costs and incremental net benefits, economic values were derived from financial investment costs by applying a conversion factor of 0.9.

Table 16. CRSD project cost

	2012-					
Project components	2013	2014	2015	2016	2017	Total
1. A – Institutional capacity						
strengthening	1,717	2,594	557	407	307	5,582
		23,17	12,20			
2. B – Good Aquaculture Practices	5,399	1	1	4,931	3,642	49,343
		26,94				
3. C – Near-shore capture fisheries	22,958	1	4,538	1,460	940	56,837
4. D - Project management,						
monitoring and evaluation	3,008	2,709	2,674	2,459	2,386	13,238
		55,41	19,97			125,00
Total	33,082	5	0	9,257	7,275	0

Source: COSTAB

d. Economic Rate of Return and Sensitivity Analysis

Economic Rate of Return (ERR) was carried out, relating the net benefits from Component B and activities C1 and C2 to total project costs ⁸. As shown in Table 17, benefits from Component B are assumed to allocate within 5 years of project implementation as within this period, project could achieve its objective to expand the GAP applied farming sites covering 10,808 ha. The benefit from this activity is allocated to 0, 10%, 20%, 40%, 60% and 80% respectively over the six years (including the year O), and in the seventh year would reach US\$51.2 million. It is assumed that benefits from Component B would be realized for 15 years after project completion

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⁸ The aquaculture, near-shore capture fishing, port/landing financial models and budgets described previously use financial product and input prices. In general, aquaculture input materials and fishing inputs operate in a relatively open market as do agricultural product markets and the differences now in Vietnam between financial and economic prices, although they exist, are small. Thus economic prices are assumed to be equal to financial prices for the purpose of the economic rate of return analysis.

Net benefits from capture fishing co-management are also assumed to come on stream in a staged manner as in the case of Component B. In addition, benefits from co-management are set at 80% of the full value for the sixth to the tenth years (as it would take time for stocks to replenish and regenerate the in-shore environment). The full benefit of US\$25.8 million is assumed from the eleventh year onwards. Net benefits from C2 port infrastructure rehabilitation are expected to come on stream in the same manner as C1, with the full benefit of US\$17.5 million assumed from year eleven. The full value of fishing ports could be promoted once the fisheries resources are replenished and near-shore environment is improved under Activity C1.

Table 17 presents the estimated ERR: the base ERR is estimated at economic value of the benefits and cost transferred from financial value of the cost with coefficient of 0.9. The ERR is estimated at 44%, with a NPV of US\$277.2 million. This is a good ERR for the Vietnamese Government and people's investment in CRSD project and a firm basis calculated based on careful assumptions.

Table 17. Estimation of Economic Rate of Return (ERR) of CRSD project

(US\$ '000)	2012	2013	2014	2015	2016	Y 6	Y7	Y8	Y9	Y10	Y11 to Y20
I. Total incremental net benefit											
A. Component B: Good Aquaculture Practices (GAP)	-	5,117	10,234	20,469	30,703	40,937	51,171	51,171	51,171	51,171	51,171
B. Component C: Capture fisheries co-management	-	2,578	5,157	10,314	18,049	20,627	20,627	20,627	20,627	20,627	25,784
C. Component C: Rehabilitation of fishing ports		1,750	3,500	6,999	12,248	13,998	13,998	13,998	13,998	13,998	17,498
Total incremental financial benefit		9,445	18,891	37,781	61,000	75,563	85,797	85,797	85,797	85,797	94,453
Total incremental financial benefit ^a /		8,501	17,002	34,003	54,900	68,006	77,217	77,217	77,217	77,217	77,217
II. Total project cost											
Financial cost	31,898	52,225	18,539	8,356	6,871						
Financial cost + 8% contingency	34,450	56,403	20,022	9,025	7,421						
Economic cost ^a /	31,005	50,763	18,020	8,122	6,679						
III. Project net profit	(31,005)	(42,262)	(1,018)	25,881	48,221	68,006	77,217	77,217	77,217	77,217	77,217
Net current value (12%) ERR	277.246 44,0%										

a/ Cost extracted from COSTAB. Due to the absence of information on taxes and expected cost payment by local and foreign currency and on the incremental net value, the economic value of net benefit is calculated based on project financial cost with the coefficient of 0.9.

Considering the firmness of economic rate of return at 44%, this analysis did not cover the sensitiveness to identify ERR in case of incremental net benefit of Component B, C1 and C2 (particularly in case of the increased product price, lower price and shorter time for completion of net benefit during project implementation period).

Aquaculture, coastal capture fisheries cost as well as the landed and farmed products price could not be reduced in the future and the available signals show the increasing price in future. Input cost for aquaculture and coastal capture fisheries would keep on the rise in line with the increased sale price. With the competitiveness and good market regulation, the overincrease in sale price of inputs would not be occurred. ERR is still firm even the net benefits of Component B, C1 and C2 is down to 75% and ERR is still at high rate of 35% with NPV of 185.9 million USD. Should the net benefit of the project is down to 50%, ERR would be 25% with the NPV of 94.6 million USD.

e. Non-quantifiable benefits

In addition to quanfiable benefits, project would bring other non-quanfiable benefits and it is not mentioned in above analysis.

Project components have positive impact on the environment. Component A covers the activities related to management, planning and improvement of human resources focusing on the environmental protection. Component B would affect the optimal input use and management of agriculture protection (chemicals, pesticide) in aquaculture activities at the farms through the technological training and transfer. The improvement of waste water and waste in aquaculture under Component B and at fishing ports/fish landing sites under C2 would also provide positive impact on the environment. Near-shore capture fisheries environment would also be improved thanks to C1 activities. Another remarkable benefit from the project is the improvement of food safety thanks to the improvement of hygiene conditions at fishing ports/fish landing places under project support. The value of port shelters which can not be estimated but would save many lives, reduce the concern of the communities thanks to the establishment of shelters. All activities related to project benefits would bring demonstrative impact for out-of-project stakeholders to learn and have similar positive changes. In addition, the project would help create direct and indirect employment that increases the tax collection.

6.3. SOCIAL IMPACT ASSESSMENT

In project preparation, the World Bank coordinated with project proposing agency and project provinces to conduct a social assessment, which provides analysis of social issues related to the project and foresees the major social devleopment outcomes.

Social assessment reveals that the project would create general positive impact on the fishing communities and small-scale fish farmers including the ethnic minorities at project areas. Social negative impacts include limited land acquisition to serve the small scale constructions regarding improvement of fishing ports, fish landing places and bio-security sites for local fishing communities. The Khmer population in coastal areas of Soc Trang province could be affected by project land acquisition. Therefore, project would apply operational policy - OP 4.12 (on Resettlement) and Policy OP 4.10 (on Indigenous people) introduced by WB.

Project Resettlement Policy Framework (RPF) was formulated in accordance with the Bank's Policy 4.12 and Vietnamese legal documents. RPF provides specific instructions including steps to be proceeded for preparation, review and approval of Resettlement Action Plans (RAPs) for sub-projects which would be formulated during project implementation. Project provinces committed to have no land acquisition activities at sub-projects in the first year as the investment contents would be undertaken at existing establishments.

Project support activities are expected to provide positive impact on the ethnic minority through the improvement of their accessibility to sustainable production techniques, reduction of disease in aquaculture and improvement of coastal areas management that help maintain their livelihoods.

Public consultation with advance notice and sufficient information to the ethnic minorities who may be affected (through social assessment) reflected the wide support of the communities to this project. An Ethnic Minority Policy Framework (EMPF) as per the Bank Policy 4.10 was established to provide guidance to the preparation of EMDPs in implementation process.

Project support to the establishment of participatory fisheries co-management at 140 communes selected in project areas would have positive impact on the local livelihoods and environment. However, co-management may impose short-term negative impact on the poor or ethnic minorities as they would be allowed to freely fish. To solve this prolem, social impact assessment report offers the guidance on consultation with co-management implemenation communities. This guidance designs a consultation framework for fishing communities affected to take part in the design of co-management principle, to identify neccessary measures to avoid any disadvantage impact from co-management and project M&E that may affect their livelihoods. This consultation framework would be used as a part of Operational Manual.

Details of social assessment, draft RPF and EMPF are presented at Appendices 7, 8 and 9 in the report. After relevant Ministries and agencies gave their opinions, the RPF would be presented to the Prime Minister by MARD for review and approval or authorization to MARD for approval. EMPF related to the project safeguards would be approved separately by MARD.

6.4. ENVIRONMENTAL IMPACT ASSESSMENT

General environmental impact was assessed to be positive, e.g the livelihood improvement of fishing communities and small-scale fish farmers (including ethnic minority people) at project areas and capacity improvement for the sector's sustainable management of coastal resources through co-management at locality. The project would help local beneficiaries have better access to relevant support services and more income. Local communities would be empowered with the collective rights and responsibilities regarding the management of coastal fisheries resources and would be allowed to apply these rights and obligations in a form to ensure their long-term livelihoods.

Negative impacts are assessed to be limited, localized, managable and can be remedied. These impacts are avoidable or can be mitigated with the proper design and application of limitation measures. The project key environmental issues include: (1) improper use and management of chemicals and anti-biotics in aquaculture; (2) ineffective management and treatment of solid waste and waste water from farming sites; and (3) impact

from constructions (such as increased dust and localised noise, disturbance to traffic and community, the risk on safety and water pollution) during the construction of new infrastructure or upgrading of existing facilities (upgrading of fishing ports, fish landing sites etc). The project would not directly affect major aquatic habitat. However, the comanagement arrangements in Component B when applied may include some spawning grounds for fish species. The impact on natural environment would be positive, not negative.

An ESMF has been prepared to guide the project in screening, assessing and mitigating project environmental and social impacts. The ESMF is in accordance with Bank safeguard policies, as well as with Vietnamese laws. The framework provides guidelines for: (1) safeguard screening, including a negative list of sub-projects which would be excluded from the menu of eligible sub-projects; (2) impact assessment and development of mitigation measures, including the Environmental Codes of Practice (ECOP) for small scale construction and dredging; (3) safeguard documentation preparation and clearance; (4) safeguard implementation, supervision, monitoring, and reporting; (5) institutional strengthening and capacity building programs for the PCU and PPMU staff, as well for relevant DONRE; and (6) institutional arrangements and budget.

The ESMF requires that for each type of infrastructure activity, the implementing agencies would prepare standard mitigation measures in the form of ECOP to mitigate construction and operation related impacts. The ECOP would be included in the bidding and contract documents, and would be monitored by the supervision engineers. The sub-projects on infrastructure conducted in the first year are at small-scale so the project provinces would prepare ECOP in consistency with infrastructure activities and incorporate those Code of Conduct to bidding documents and contracts and ensure the effective implementation.

Draft Social and Environmental Policy Framework (Appendix 10) would be separately approved by MARD relating to project safeguards.

6.5. MAJOR RISKS AND ASSUMPTIONS

Major risks identified for the project are related to the lack of experiences of project implementing agencies, the risks on governance related to project implementation decentralization, the risks on compliance with procurement, financial management and safeguards. The remedies and limitation to these risks have been identified during project preparation and mostly incorporated in the project design. The strategy and major approaches to support implementation process and reduce risks include: (i) capacity strengthening for project implementing agencies, (ii) improvement of project governance, and (iii) project cautious M&E, at least in the first phase of project implementation.

Building capacity for implementing agencies. Most of project implementing agencies have little experience with the Bank-funded projects and are also not familiar with Bank procedures. Most of the project implementing agencies have little experience with the Bank-funded projects and are also not familiar with Bank procedures. Local authorities may insist on following government procedures or implement "dual procedures". The project includes training and capacity building activities for the implementing and oversight agencies as a solution to effective risk mitigation. Project was designed to provide sufficient personnel to these activities. Technical assistance during project implementation would provide timely guidance and advice to the PPMUs, especially when technically complex implementation issues or differences between national regulations and Bank procedures are emerged.

Improvement of project governance. Decentralization in project implementation and management would create incentives for local levels; however, capacity at the local levels is generally low. There would be risks on the ineffective use or improper use of project costs during implementation. To limit these risks, project needs to actively improve the capacity of internal audit system at each implementing agency (in addition to annual independent audit). The responsibilities of each implementing agency have been clearly defined to monitor the duties of each individual and agency. Draft Action Plan on Governance, Transparency and Anti-Corruption (GTAP) attached in this report would be incorporate in Operational Manual for monitoring and handling of corruption during project implementation. The complaint settlement mechanism would be publicized to encourage the project monitoring by local beneficiaries or affected people.

Intensive monitoring and supervision especially in the initial period. There are risks of non-compliance in procurement, financial management, and safeguards during project implementation. The project, therefore, requires intensive monitoring and supervision in the initial period to identify issues in a timely manner and to address them before they become major problems. The review and supervision would follow a risk-based approach which would focus on poor performing implementing agencies and on high risk areas. Intensive monitoring and supervision would be maintained until the capacity of the implementing agencies has been improved or the project's technical assistance team has been recruited.

Implementation Support Plan

IDA project implementation support plan includes the implementation support missions and supervision visits, fieldtrips and assessment of financial compliance. In the first year of implementation, there would be at least two official implementation support missions and annual monitoring visits with one or two interim visits depending on project implementation status. After the first year implementation, PCU would organize a workshop to preliminarily assess project activities to draw lessons and recommendations on necessary revision. A mid-term review would be organized in the second year (about 18 months after project implementation) to give an opportunity for project re-structure with legal adjustment, if necessary, to achieve project development objectives within project time frame. About six months prior to the project termination, WB would organize a support mission and provide guidance to the MARD and project provinces in assessment and project completion report preparation as regulated by the WB. During project implementation, a working mission of WB would be established to discuss and support the implementing agencies upon request. International technical support through FAO-Government on aquaculture and fisheries would be maintained during IDA missions to ensure the technical quality in project implementation and support widen strategic issues of the sector.

The Bank team would provide intensive implementation support in the initial period, focusing on the implementation of the various agreed risk management measures on technical issues, as well as on fiduciary, safeguards, and governance aspects. It would address identified issues promptly and provide extra support to those agencies and provinces where implementation is either lagging or not in compliance with agreed policies and procedures. In addition to full implementation support missions (generally two a year), one or two interim missions would also be fielded depending on project needs. After the first year of implementation, the PCU would organize an implementation review workshop to assess project performance, draw lessons, and recommend necessary adjustments

6.6. PROJECT SUSTAINABILITY

Project objective is to establish a support mechanism for fisheries sector development, especially the coastal and marine resources exploitation which are contributing significantly to the economy and export. After project termination, project would assist fisheries sector, directly MARD, to improve institutional arragements of the sector, to furnish the better knowledge and expertise for the project provinces in general and fishers in particular with better means in coastal and marine resources exploitation.

The project would assist government (and the sector) to move from a quantity orientation to a quality and risk management orientation. It would improve the efficiency of existing public and private investments and also help address environmental problems to improve sustainability. At the sector level, the project would help improve sustainability by: implementing inter-sectoral planning for coastal areas; contributing to the sector's Master Plan to 2020; and introducing and promoting GAP in coastal aquaculture; and introducing and promoting co-management arrangements for near-shore capture fisheries. The project would offer good models for scaling up by the public and private sectors which could be replicated in other areas in Vietnam.

6.7. LOGFRAME

Table 18. Project logframe

Project design summary	Indicators/Implementation objectives	Data source/Monitoring mechanism	Assumptions and risks
The project development objective is to improve the sustainable management of coastal fisheries in the Project Provinces	Indicator 1: Increase in the proportion of farms meeting national standards for water effluent following the adoption of Good Aquaculture Practices from 0% in 2011 to 50% in 2017.	Annual survey report of PCU and PPMUs	Assumptions: Sector development strategy and market requirements are continuously support factor for the expansion of farming areas applying GAP. Risks: Financial difficulty makes farmers lack of cost for GAP maintaince
	Indicator 2: Reduction in shrimp disease losses in the production areas applying Good Aquaculture Practices to 20% in 2017 compared to that in 2011.	Annual survey report of PCU and PPMUs, fisheries extension staff	Assumptions: Improved capacity of seed production, certification ssytem and fish disease control Risks: Limited knowledge, awareness and

Project design summary	Indicators/Implementation objectives	Data source/Monitoring mechanism	Assumptions and risks
			production conditions of fish farmers disencourage the maintainance of bio- security measures in aquaculture
	Indicator 3: Increase in the proportion of areas in which sustainable Near-Shore fisheries resource management systems are applied from 0% in 2011 to 50% in 2017.	Annual survey report of PCU and PPMUs, sub-DECAFIREP	Assumptions: Good coordination among State management agencies in establishment and implementation of coastal integrated plans towards sustainable use of coastal resources Risks: Limited effectiveness of co-management implementation that is not attracting fishers to abandon the overexploitation measures and destructive fishing methods of coasta resources
Output 1: Institutional capacity strengthening for sustainable fisheries management	1. 100% project provinces, districts and communes are provided with training on integrated spatial planning. 2. Project provinces establish inter-sectoral planning team at provincial level. 3. Complete 12 researches at national and provincal level for Fisheries Sector Master plan to 2020. 4. Project provinces possess upgraded and functioned fisheries database.	Annual integrated reports of PCU and PPMUs	Assumptions: The readiness and good coordination among State management agencies in provinces and between provinces in the formulation and implementation of coastal inter-sectoral planning. MARD provides long-term orientation to maintain support measures, improved institutional, policy and regulatory framework and closed monitoring for sustainable

Project design summary	Indicators/Implementation objectives	Data source/Monitoring mechanism	Assumptions and risks
			development of fisheries sector. Risks:
			Delayed coastal planning and improved capacity due to long-lasting decision making process between relevant stakeholders.
Output 2: Good practices for sustainable aquaculture	1. 20,000 farmers are provided with training on GAP. 2. 50 hatcheries working in compliance with biosecurity standards. 3. 50% farmers in selected sites using quality seeds with certificate of seed quality. 4. 8 fish veterinary agencies at provincial level have capacity improved on disease diagnosis, monitoring and early reporting. 5. 50% farmers in selected areas have access to/use proper waste management system/water management system.	Annual integrated reports of PCU and PPMUs, and fisheries extension staff	Assumptions: GAP demonstration models in aquaculture promotes its effectiveness and attracts the farmers attention; The training, dissemination work are actively and harmonizely conducted that have good results in improvement of knowledge and production of fish farmers; Hatcheries and fish farmers are qualified and have proper production conditions to receive project support; Certification organizations have commercial benefits and capacity to serve project sites Risks: The producers for commercial interests or limited financial capacity continuously use unclear origin without certification of disease-free. Environmental risks due to the uncontrolled industrial pollution and

Project design summary	Indicators/Implementation objectives	Data source/Monitoring mechanism	Assumptions and risks
			from new emerging uncontrolled sources affect the bio-security conditions at farming sits and hatcheries. Natural disasters and risks on price unstability, cost for input and output price make the farmers leave farming sites.
Output 3: Sustainable management of near-shore capture fisheries	1. Coastal fisheries comanagement is successfully implemented and applied at 16 pilot districts. 2. Co-management is successfully conducted in high biodiversity and important natural habitats covering the areas of 30,000 ha. 3. 16 MCS stations are established with sufficient staffing and official in operation 4. 16 fishing ports and fish landing sites have hygienic conditions and preprocessing practices improved.	Annual integrated reports of PCU and PPMUs, DECAFIREP	Assumptions: Good implementation of coastal planning which is a basis for establishment and implementation of co- management models; Effective dissemination and measures to support alternative livelihoos have positive impact on local community's awareness; MCS of fishing activities is sufficiently arranged in terms of personnel and vehicles for effective operation; The upgrading of infrastructure at fishing ports/fish landing sites is conducted in right progress with quality satisfying requirement of modern fisheries logistics and in good operation. Risks: Co-management model is ineffectively operated due to the lack of sanctions to violations.

Project design summary	Indicators/Implementation objectives	Data source/Monitoring mechanism	Assumptions and risks
Output 4: Establishment of project effective management support mechanism at central and local levels	1. 6 project provinces meet the requirements on the project management, M&E.	Annual survey report of PCU and PPMUs	Assumptions: Qualified staff at PCU and PPMUs are assigned to work on time and most of them work for the project during project implementation. Adequate qualified staff working at MARD and DARDs Risks: Government contribution is not allocated on time.

CONCLUSION

"Coastal resources for sustainable development" project has been proposed and established in accordance with Fisheries Sector Master plan to 2020. The project is consistent to Country Partnership Strategy of the World Bank to create and maintain development opportunity with the increasing concern over natural resources management, including coastal and marine resources. The project meets the development objectives of Vietnamese Government to improve the responsiveness of the coastal areas to climate change, enhancement of sustainability of the coastal infrastructure investment schemes and improvement of the effectiveness and competitiveness of the economy based on the coastal resources.

For the fisheries sector, in addition to economic development and income improvement for fishers, the project has great affect to the marine environment and climate change. Accordingly, the "coastal resources for sustainable development" project would both achieve the exploitation of marine and coastal resources for sustainable development and flexibly adapt to the climate change and environmental protection. Thus, it would create a balance among sustainable economic development activities and the protection of natural resources, environment, and ecology. This proposed project would positively contribute to the UN Millennium Development Goals.

The project is designed to improve the coastal fisheries management towards sustainable manner in eight coastal provinces selected in Vietnam through institutional capacity strengthening for fisheries sector in the sustainable management of natural resources, promotion of good practices in sustainable aquaculture, implementation of good practices for the sustainable coastal capture fisheries. The fiscal and financial benefit analysis shows that project would be a very good investment of the Government and Vietnamese people with the Economic Rate of Return (ERR) at 44% and Net Profit Value (NPV) of 277.2 million USD. Even the net benefits thanks to the project activities have reduced in case of risks on increased inputs in aquaculture production and increased cost in fishing activities, economic benefit indicators are still at high rate and reflect to be a good sector investment.

In addition to quanfiable benefits, project would also provide other important non-quanfiable benefits such as positive impact on the environment through management, planning and strengthening of human resources focusing on environmental protection, optimizing the input use and management in agriculture (chemicals, pesticide) in aquaculture at faming sites, improving the waste and waste water management in aquaculture, at fishing ports and fish landing sites as well as replenishing near shore fisheries exploitation environment. Another substantial benefit is the improvement of food safety thanks to the improved hygienic conditions at fishing ports and fish landing places under project support. The value of shelters at fishing ports/fish landing places is unable to be estimated but it would definitely reduce the loss in human lives and community concerns thanks to safe shelters. All activities related to project benefits would bring the demonstrative impacts for out-of-project stakeholders to learn and have similar positive changes. Besides, the project would provide additional direct or indirect employment and contribute to tax revenue.

Based on the necessity, appropriateness, sustainability and the expected benefits of the project, the project proposing agency requests MARD to review and approve the Feasibility Study of project "Coastal resources for sustainable development". This feasibility study would be used as basis for the Government and IDA/WB to negotiate Financing Agreement.

APPENDIX 1. ESTIMATED PROJECT BUDGET ALLOCATION BY IMPLEMENTATING AGENCY

Unit: 1000 USD

Provinces	COMPON ENT A	COMPON ENT B	COMPON ENT C	COMPON ENT D	TOTAL
Ca Mau	428	6,274	9,001	952	16,656
Soc Trang	315	6,198	7,047	952	14,513
Khanh Hoa	425	8,762	4,687	952	14,827
Phu Yen	400	4,417	6,488	952	12,258
Binh Dinh	420	3,087	5,637	952	10,097
Thanh Hoa	428	6,162	6,526	952	14,069
Nghe An	370	4,045	7,693	952	13,061
Ha Tinh	420	4,220	4,120	952	9,713
PCU	2.066	4,964	1,033	4.637	12,700
TOTAL	5,272	48,129	5,232	12,257	117,890

Note: The cost for implementing agencies can be re-allocated during project implementation depending on the implementation results of each agency or in case of cost supplement, adjustment or project design changes.

APPENDIX 2 – 18-MONTH PROCUREMENT PLAN

1. Implementation period

18 months since the date of Agreement signing, from 6/2012 to 12/2013.

2. Scope of application

All procurement bids which are wholly or partly financed by IDA are prepared in this plan. These procurement procedures would be conducted in accordance with WB Guidelines to procurement and the procedures agreed for the National Competitiveness Bid (NCB) would be specified in Attachment of Financing Agreement.

This plan would cover packages subject to prior procurement methods and retroactive financing according to WB regulations but the specific procurement plan must be prior reviewed and approved by WB.

This plan would not include the packages financed by Government's contributions (e.g. design consultancy contracts or construction supervision consultancy) in the first 18 months of the project. These packages would be prepared by project implementing agencies to present to executive agencies for separate approval and would be procured as per Procurement Law and current regulations of the Government.

3. Thresholds for Procurement Methods and Bank Prior Review

Expenditure Category	Procurement Method	Contract Value (US\$)	Bank Prior Review		
	ICB	≥ 500.000	All the ICB contracts		
Goods, non- consultancy services	NCB	< 500.000	First contract under PCU and each PPMU; and all contracts >= US\$ 400,000		
	Shopping	<100.000	(PCU/PPMU); First contract under PCU and each PPMU		
	DC	N/A	All DC contracts		
Works	ICB	≥ 5.000.000	All the ICB contracts		
	NCB	< 5.000.000	First contract under PCU and each PPMU; and all contracts >= US\$ 3,000,000		
construction	Shopping	<100.000	First contract under PCU and each PPMU		
	DC	N/A	All DC contracts		
	QCBS, QBS, FBS, LCS	≥200.000	All contracts >= US\$ 200,000 for firms; all contracts >= US\$ 50,000 for		
Consultancy services	QCBS, QBS, FBS, LCS, CQS	<200.000	individuals; and all SSS contracts.		
	SSS	N/A			
	IC	N/A			
Note:	ICB – International Competitive Bidding NCB – National Competitive Bidding				

DC – Direct Contracting

QCBS - Quality and Cost Based Selection

QBS - Quality Based Selection

FBS – Fixed Budget Selection

LCS - Least Cost Selection

CQS - Selection Based on Consultants' Qualification

SSS – Single (or Sole) Source Selection

IC – Individual Consultant selection procedure

NA – Not Applicable

4. Goods, works and non-consulting service procurement

No.	Name of packages	Comp	Estimat ed cost (million USD)	Num ber of packa ge	Procu reme nt meth ods	Nationa I priority (Yes/ No)	WB Review (Prior/ Post)	Expecte d bid invitati on time
	TOTAL		42,856	133				
I	CA MAU PPMU		5,539	13				
	Goods and non-consulting services		265	3				
1	Patrol ships	3	180	1	NCB	Yes	Prior	Q1- 2013
2	Office equipment for PPMU	4	25	1	SH	Yes	Prior	Q2- 2012
3	PPMU cars	4	60	1	SH	Yes	Post	Q2- 2013
	Civil works		5,274	10				
4	Upgrading province's fisheries extension center/district's station	2	35	1	SH	No	Post	Q1- 2013
5	Upgrading office, capacity strengthening for fish disease diagnosis unit at provincial and district levels	2	270	1	NCB	No	Post	Q1- 2013
6	Upgrading infrastructure of provincial hatcheries for diversified aquaculture	2	100	1	NCB	No	Post	Q2- 2013
7	Establishment of MCS stations	3	225	1	NCB	No	Post	Q2- 2013
8	Establishment of offices for co-management team	3	50	1	SH	No	Post	Q2- 2013
9	Rehabilitation of infrastructure of Song Doc fishing port	3	1,772	2	NCB	No	Post	Q3- 2012
10	Rehabilitation of Ho Gui fishing port infrastructure	3	2,817	2	NCB	No	Prior	Q3- 2012
11	Upgrading offices for PPMU	4	5	1	SH	No	Prior	Q3- 2012

П	Soc Trang PPMU		4,005	13				
	Goods and non-consulting		235	3				
	services		233					
1	Patrol ships	3	150	1	NCB	Yes	Prior	Q1- 2013
2	Office equipment for PPMU	4	25	1	SH	Yes	Prior	Q2- 2012
3	PPMU cars	4	60	1	SH	Yes	Post	Q2- 2013
	Civil works		3,770	7				
4	Upgrading office of province's agricultural extension center, subdepartment of Aquaculture, sub-department of veterinary service, sub-DECAFIREP, office of PPMU	2	155	1	NCB	No	Post	Q3- 2012
5	Upgrading agricultural extension station and veterinary station of Cu Lao Dzung district, Vinh Chau, My Xuyen and 3 offices for co-management teams and MCS station	2	245	1	NCB	No	Post	Q1- 2013
6	Upgrading infrastructure of province's hatchery for diversified aquaculture	2	200	1	NCB	No	Post	Q2- 2013
7	Upgrading bio-security shrimp farming sites of Hoa Tua 1 commune and Ngoc Dong commune	2	600	1	NCB	No	Post	Q2- 2013
8	Upgrading infrastructure of diversified atermia farming zones in Vinh Chau district	2	500	1	NCB	No	Post	Q3- 2012
9	Developing infrastructure to support alternative livelihoods for poor fishing communities.	3	200	1	NCB	No	Post	Q2- 2013
10	Upgrading infrastructure of Tran De fishing port – Package 1	3	1,870	1	NCB	No	Prior	Q3- 2012
Ш	Khanh Hoa PPMU		4,180	16				
	Goods and non-consulting services		235	3				
1	Patrol ships	3	150	1	NCB	Yes	Prior	Q1- 2013
2	Office equipment for PPMU	4	25	1	SH	Yes	Prior	Q2- 2012
3	PPMU cars	4	60	1	SH	Yes	Post	Q2-

								2013
	Civil works		3,945	13				
4	Upgrading office of province's fisheries extension center/district's fisheries extension station	2	100	1	NCB	No	Post	Q1- 2013
5	Support the upgrading of infrastructure of Ninh Van dedicated hatchery	2	1,000	2	NCB	No	Prior	Q3- 2012
6	Upgrading capacity strengthening of province's and district's fish disease diagnosis and veterinary service	2	180	1	NCB	No	Post	Q1- 2013
7	Upgrading infrastructure of provincial hatcheries for diversified aquaculture	2	200	1	NCB	No	Post	Q2- 2013
8	Upgrading public infrastructure for diversified aquaculture	2	70	1	SH	No	Post	Q2- 2013
9	Upgrading office of sub- DECAFIREP	3	40	1	SH	No	Post	Q1- 2013
10	Establish MCS stations	3	100	1	NCB	No	Post	Q1- 2013
11	Establish office for co- management teams	3	50	1	SH	No	Post	Q2- 2013
12	Develop infrastructure to support alternative livelihoods	3	200	1	NCB	No	Post	Q1- 2013
13	Rehabilitation of Hon Ro fishing port infrastructure	3	1,000	1	NCB	No	Post	Q3- 2012
14	Rehabilitation of Vinh Luong fishing port infrastructure	3	1,000	1	NCB	No	Post	Q3- 2012
15	Upgrading office for PPMU	4	5	1	SH	No	Prior	Q3- 2012
IV	Phu Yen PPMU		5,163	18				
	Goods and non-consulting services		235	3				
1	Patrol ships	3	150	1	NCB	Yes	Prior	Q1- 2013
2	Office equipment for PPMU	4	25	1	SH	Yes	Prior	Q2- 2012
3	PPMU cars	4	60	1	SH	Yes	Post	Q2- 2013
	Civil Works		4,928	15				
4	Upgrading office of province's fisheries extension center/district's	2	60	1	SH	No	Post	Q1- 2013

	fisheries extension station							
5	Support the upgrading of infrastructure of hatchery	2	50	1	SH	No	Post	Q1- 2013
6	Upgrading office and capacity strengthening of province's and district's fish disease diagnosis and veterinary service	2	120	1	NCB	No	Post	Q1- 2013
7	Upgrading infrastructure of province's hatchery for diversified aquaculture	2	100	1	NCB	No	Post	Q2- 2013
8	Upgrading public infrastructure for diversified aquaculture	2	800	2	NCB	No	Post	Q2- 2013
9	Upgrading office of sub- DECAFIREP	3	40	1	SH	No	Post	Q1- 2013
10	Establish MCS stations	3	60	1	SH	No	Post	Q1- 2013
11	Establish offices for co- management teams	3	60	2	SH	No	Post	Q3- 2012
12	Upgrading Dong Tac fishing port	3	1,838	2	NCB	No	Prior	Q3- 2012
13	Upgrading Dan Phuoc fishing port	3	1,795	2	NCB	No	Post	Q3- 2012
14	Upgrading office for PPMU	4	5	1	SH	No	Prior	Q3- 2012
V	Binh Dinh PPMU		2,615	13				
	Goods and non-consulting services		235	3				
1	Patrol ships	3	150	1	NCB	Yes	Prior	Q1- 2013
2	Office equipment for PPMU	4	25	1	SH	Yes	Prior	Q2- 2012
3	PPMU cars	4	60	1	SH	Yes	Post	Q2- 2013
	Civil Works		2,380	9				
4	Upgrading office of province's fisheries extension center/district's fisheries extension station	2	20	1	SH	No	Post	Q1- 2013
5	Upgrading office and capacity strengthening of province's and district's fish disease diagnosis and veterinary service	2	90	1	SH	No	Post	Q1- 2013
6	Upgrading office for PPMU and office on fisheries database under sub-	3	45	1	SH	No	Prior	Q1- 2013

	DECAFIREP							
7	Establish MCS stations	3	100	1	NCB	No	Post	Q1- 2013
8	Establish office for co- management teams	3	125	3	SH	No	Post	Q2- 2013
9	Upgrading infrastructure of De Gi fishing port	3	2,000	2	NCB	No	Prior	Q3- 2012
VI	Thanh Hoa PPMU		5,869	18				
	Goods and non-consulting services		245	3				
1	Patrol ships	3	160	1	NCB	Yes	Prior	Q1- 2013
2	Office equipment for PPMU	4	25	1	SH	Yes	Prior	Q2- 2012
3	PPMU cars	4	60	1	SH	Yes	Post	Q2- 2013
	Civil Works		5,624	15				
4	Upgrading infrastructure of bio-security farming sites in Nga Tan commune and Nga Thuy commune	2	440	2	NCB	No	Post	Q4- 2012
5	Upgrading office and capacity strengthening of province's and district's fish disease diagnosis and veterinary service	2	150	1	NCB	No	Post	Q1- 2013
6	Upgrading public infrastructure for diversified aquaculture	2	584	1	NCB	No	Post	Q3- 2012
7	Upgrading office of sub- DECAFIREP	3	30	1	SH	No	Post	Q1- 2013
8	Establish MCS stations	3	120	2	NCB	No	Post	Q3- 2012
9	Establish office for co- management team	3	265	2	NCB	No	Post	Q1- 2013
10	Develop infrastructure to support alternative livelihood	3	200	1	NCB	No	Post	Q2- 2013
11	Upgrading infrastructure of Hoang Phu fish landing site	3	1,730	2	NCB	No	Prior	Q3- 2012
12	Upgrading infrastructure of Hai Chau fish landing site	3	2,100	2	NCB	No	Post	Q4- 2012
13	Upgrading office for PPMU	4	5	1	SH	No	Prior	Q3- 2012
VII	Nghe An PPMU		4,660	13				
	Goods and non-consulting services		135	3				
1	Patrol ships	3	50	1	NCB	Yes	Prior	Q1-

								2013
	055			_		.,		Q2-
2	Office equipment for PPMU	4	25	1	SH	Yes	Prior	2012
3	PPMU cars	4	60	1	SH	Yes	Post	Q2-
3	FFIVIO Cars	4	00		311	163	FUSI	2013
	Construction		4,525	10				
	Support infrastructure of							Q3-
4	Quynh Bang hatchery,	2	200	1	NCB	No	Post	2012
	Quynh Lien							
	Upgrading office and							
_	capacity strengthening of	2	<u></u>	4	CLI	Na	Doot	Q1-
5	province's and district's fish	2	60	1	SH	No	Post	2013
	disease diagnosis and veterinary service							
	Upgrading hatchery							
6	infrastructure for diversified	2	100	1	NCB	No	Post	Q2-
	aquaculture	_	100	_	IVCB	140	1 030	2013
	Upgrading public							
7	infrastructure for diversified	2	200	1	NCB	No	Post	Q2-
	aquaculture							2013
8	Establish office for co-	3	40	2	CLI	No	Doct	Q2-
٥	management team	5	40	2	SH	No	Post	2013
9	Upgrading infrastructure of	3	1,555	1	NCB	No	Post	Q3-
	Lach Van fishing port	J	1,333	T	INCD	INO	FUST	2012
10	Upgrading infrastructure of	3	2,365	2	NCB	No	Prior	Q3-
	Lach Lo shelter		_,					2012
11	Lingua dina affica fan DDNALL	4	5	1	SH	No	Prior	Q3-
VII	Upgrading office for PPMU							2012
ı	Ha Tinh PPMU		2,535	12				
	Goods and non-consulting		160	2				
	services		160	3				
1	Patrol ships	3	75	1	NCB	Yes	Prior	Q1-
		<u> </u>	, ,	_	1105		11101	2013
2	Office equipment for PPMU	4	25	1	SH	Yes	Prior	Q2-
								2012
3	PPMU cars	4	60	1	SH	Yes	Post	Q2-
	Civil Works		2,375	9				2013
	Upgrading office of		2,3/3	ד				
	province's fisheries							Q1-
4	extension center/district's	2	120	1	NCB	No	Post	2013
	fisheries extension station							
	Upgrading office and							
	capacity strengthening of							64
1	. ,	۱ ـ	120	4	NCD	No	Post	Q1-
5	province's and district's fish	2	120	1	NCB	INO	FUSL	2042
5	province's and district's fish disease diagnosis and	2	120	1	INCB	NO	7031	2013

			1				T	
6	Upgrading hatchery infrastructure for diversified aquaculture	2	100	1	NCB	No	Post	Q2- 2013
7	Upgrading public infrastructure for diversified aquaculture	2	200	1	NCB	No	Post	Q2- 2013
8	Establish office for co- management team	3	130	2	SH	No	Post	Q2- 2013
9	Upgrading infrastructure of Thach Kim and Ky Ha fishing ports	3	1,700	2	NCB	No	Prior	Q3- 2012
10	Upgrading office for PPMU	4	5	1	SH	No	Prior	Q3- 2012
IX	PCU		8,290	17				
	Goods and non-consulting services		6,690	14				
1	Equipment to upgrade fisheries database and communication system at all levels	1	385	1	NCB	Yes	Post	Q2- 2013
2	Goods and equipment to enhance fisheries extension units at provinces and districts	2	605	1	ICB	Yes	Prior	Q2- 2013
3	Goods to enhance fish veterinary disease diagnosis at provinces and districts	2	2,255	1	ICB	Yes	Prior	Q2- 2013
4	Equipment to support DONRE in environmental monitoring and management	2	1,350	1	ICB	Yes	Prior	Q2- 2013
5	Office equipment for sub- DECAFIREP and MCS stations	3	585	1	ICB	Yes	Prior	Q2- 2013
6	Equipment to upgrade database and fisheries communication system at MARD	1	770	1	ICB	Yes	Prior	Q1- 2013
7	Office and training equipment for Department of Aquaculture	2	20	1	SH	Yes	Post	Q4- 2012
8	Equipment for RIA 1	2	150	1	NCB	Yes	Post	Q2- 2013
9	Equipment for RIA 2	2	250	1	NCB	Yes	Prior	Q3- 2013
10	Equipment for RIA 3	2	100	1	NCB	Yes	Post	Q4- 2013
11	Equipment for DECAFIREP	3	50	1	SH	Yes	Post	Q1- 2013

12	Office rent for PCU	4	48	1	SH	Yes	Post	Q2- 2012
13	Office equipment for PCU	4	62	1	SH	Yes	Prior	Q2- 2012
14	Car for PCU	4	60	1	SH	Yes	Post	Q2- 2013
	Civil Works		1,600	3				
15	Infrastructure upgrading for RIA 1	2	700	1	NCB	No	Prior	Q2- 2013
16	Infrastructure upgrading for RIA 2	2	250	1	NCB	No	Post	Q3- 2013
17	Infrastructure upgrading for RIA 3	2	650	1	NCB	No	Post	Q4- 2013

5. Consultancy packages

тт	Packages	Compon ent	Estimate d cost (1000 USD)	No. of bids	Procure ment method	WB approval (Prior/P ost)	Expecte d bid invitatio n time
	TOTAL		7,712	95			
I	Ca Mau PPMU		605	12			
1	Strategic Environmental Assessment (SEA)	1	30	1	cqs	Post	Q4- 2012
2	Assess and prepare biosecurity at selected farming sites	2	25	1	IC	Post	Q3- 2012
3	National technical consultancy on monitoring and certification of GAP and bio-security upgrading at selected farming sites	2	96	2	IC	Prior	Q3- 2012
4	Study hatchery planning	2	20	1	IC	Post	Q4- 2012
5	National technical consultancy on establishment and maintenance of disease monitoring and reporting	2	54	1	IC	Prior	Q3- 2012
6	National technical consultancy on MCS strengthening	3	54	1	IC	Prior	Q3- 2012
7	National technical consultancy on establishment of comanagement rule and agreement	3	54	1	IC	Prior	Q3- 2012
8	National technical consultancy on preparation	3	30	1	IC	Post	Q3- 2012

					l		
	of co-management for high biodiversity zone						
9	National consultancy (or NGO) on establishment of co-management plan at high bio-diversity zone	3	80	1	cqs	Post	Q4- 2012
10	National consultancy on aquaculture	4	81	1	IC	Prior	Q3- 2012
11	National consultancy on fisheries resources exploitation	4	81	1	IC	Prior	Q3- 2012
II	Soc Trang PPMU		590	12			
1	Strategic Environmental Assessment (SEA)	1	30	1	cqs	Post	Q4- 2012
2	Assess and prepare biosecurity at selected farming sites	2	30	1	IC	Post	Q3- 2012
3	National technical consultancy on monitoring and certification of GAP and bio-security upgrading at selected farming sites	2	96	2	IC	Prior	Q3- 2012
4	Study hatchery planning	2	20	1	IC	Post	Q4- 2012
5	National technical consultancy on establishment and maintenance of disease monitoring and reporting	2	54	1	IC	Prior	Q3- 2012
6	National technical consultancy on MCS strengthening	3	54	1	IC	Prior	Q3- 2012
7	National technical consultancy on establishment of comanagement rule and agreement	3	54	1	IC	Prior	Q3- 2012
8	National technical consultancy on preparation of co-management for high biodiversity zone	3	30	1	IC	Post	Q3- 2012
9	National consultancy (or NGO) on establishment of co-management plan at high bio-diversity zone	3	60	1	cqs	Post	Q4- 2012
10	National consultancy on aquaculture	4	81	1	IC	Prior	Q3- 2012
11	National consultancy on fisheries resources	4	81	1	IC	Prior	Q3- 2012

	exploitation						
III	Khanh Hoa PPMU		460	9			
1	Strategic Environmental Assessment (SEA)	1	30	1	CQS	Post	Q4- 2012
2	Assess and prepare biosecurity at selected farming sites	2	10	1	IC	Post	Q3- 2012
3	National technical consultancy on monitoring and certification of GAP and bio-security upgrading at selected farming sites	2	96	2	IC	Prior	Q3- 2012
4	National technical consultancy on establishment and maintenance of disease monitoring and reporting	2	54	1	IC	Prior	Q3- 2012
5	National technical consultancy on MCS strengthening	3	54	1	IC	Prior	Q3- 2012
6	National technical consultancy on establishment of comanagement rule and agreement	3	54	1	IC	Prior	Q3- 2012
7	National consultancy on aquaculture	4	81	1	IC	Post	Q3- 2012
8	National consultancy on fisheries resources exploitation	4	81	1	IC	Prior	Q3- 2012
IV	Phu Yen PPMU		550	11			
1	Strategic Environmental Assessment (SEA)	1	30	1	CQS	Post	Q4- 2012
2	Assess and prepare biosecurity at selected farming sites	2	10	1	IC	Post	Q3- 2012
3	National technical consultancy on monitoring and certification of GAP and bio-security upgrading at selected farming sites	2	96	2	IC	Prior	Q3- 2012
4	National technical consultancy on establishment and maintenance of disease monitoring and reporting	2	54	1	IC	Prior	Q3- 2012
5	National technical consultancy on MCS	3	54	1	IC	Prior	Q3- 2012

	strengthening						
6	National technical consultancy on establishment of comanagement rule and agreement	3	54	1	IC	Prior	Q3- 2012
7	National technical consultancy on preparation of co-management for high biodiversity zone	3	30	1	IC	Post	Q3- 2012
8	National consultancy (or NGO) on establishment of co-management plan at high bio-diversity zone	3	60	1	CQS	Post	Q4- 2012
9	National consultancy on aquaculture	4	81	1	IC	Prior	Q3- 2012
10	National consultancy on fisheries resources exploitation	4	81	1	IC	Prior	Q3- 2012
V	Binh Dinh PPMU		460	9			
1	Strategic Environmental Assessment (SEA)	1	30	1	cqs	Post	Q4- 2012
2	Assess and prepare biosecurity at selected farming sites	2	10	1	IC	Post	Q3- 2012
3	National technical consultancy on monitoring and certification of GAP and bio-security upgrading at selected farming sites	2	96	2	IC	Prior	Q3- 2012
4	National technical consultancy on establishment and maintenance of disease monitoring and reporting	2	54	1	IC	Prior	Q3- 2012
5	National technical consultancy on MCS strengthening	3	54	1	IC	Prior	Q3- 2012
6	National technical consultancy on establishment of comanagement rule and agreement	3	54	1	IC	Prior	Q3- 2012
7	National consultancy on aquaculture	4	81	1	IC	Prior	Q3- 2012
8	National consultancy on fisheries resources exploitation	4	81	1	IC	Prior	Q3- 2012

VI	Thanh Hoa PPMU		455	8			
1	Strategic Environmental	1	30	1	cqs	Post	Q4-
1	Assessment (SEA)	1	30	1	cus	POST	2012
	Assess and prepare bio-						Q3-
2	security at selected farming	2	5	1	IC	Post	2012
	sites						2012
	National technical						
	consultancy on monitoring						Q3-
3	and certification of GAP	2	96	2	IC	Prior	2012
	and bio-security upgrading						2012
	at selected farming sites						
	National technical					Prior	
	consultancy on						Q3-
4	establishment and	2	54	1	IC		2012
	maintenance of disease						
	monitoring and reporting					D.	
_	National technical	•		_		Prior	Q3-
5	consultancy on MCS	3	54	1	IC		2012
	strengthening					D.	
	National technical					Prior	
_	consultancy on	2	F 4	1	10		Q3-
6	establishment of co-	3	54	1	IC		2012
	management rule and						
	agreement National consultancy on					Prior	Q3-
7	aquaculture	4	81	1	IC	1 1101	2012
	National consultancy on					Prior	
8	fisheries resources	4	81	1	IC	11101	Q3-
	exploitation	-	01	-	10		2012
VII	Nghe An PPMU		480	9			
	Strategic Environmental						Q4-
1	Assessment (SEA)	1	30	1	CQS	Post	2012
	Assess and prepare bio-						
2	security at selected farming	2	30	1	IC	Post	Q3-
	sites						2012
	National technical						
	consultancy on monitoring						0.3
3	and certification of GAP	2	96	2	IC	Prior	Q3-
	and bio-security upgrading						2012
	at selected farming sites						
	National technical						
	consultancy on						Q3-
4	establishment and	2	54	1	IC	Prior	2012
	maintenance of disease						2012
	monitoring and reporting						
	National technical						Q3-
5	consultancy on MCS	3	54	1	IC	Prior	2012
	strengthening						

	ı		1	ı	1		1
6	National technical consultancy on establishment of comanagement rule and agreement	3	54	1	IC	Prior	Q3- 2012
7	National consultancy on aquaculture	4	81	1	IC	Prior	Q3- 2012
8	National consultancy on fisheries resources exploitation	4	81	1	IC	Prior	Q3- 2012
VIII	Ha Tinh PPMU		480	9			
1	Strategic Environmental Assessment (SEA)	1	30	1	cqs	Post	Q4- 2012
2	Assess and prepare biosecurity at selected farming sites	2	30	1	IC	Post	Q3- 2012
3	National technical consultancy on monitoring and certification of GAP and bio-security upgrading at selected farming sites	2	96	2	IC	Prior	Q3- 2012
4	National technical consultancy on establishment and maintenance of disease monitoring and reporting	2	54	1	IC	Prior	Q3- 2012
5	National technical consultancy on MCS strengthening	3	54	1	IC	Prior	Q3- 2012
6	National technical consultancy on establishment of comanagement rule and agreement	3	54	1	IC	Prior	Q3- 2012
7	National consultancy on aquaculture	4	81	1	IC	Prior	Q3- 2012
8	National consultancy on fisheries resources exploitation	4	81	1	IC	Prior	Q3- 2012
IX	PCU		3,632	16			
1	Technical consultancy on coastal integrated planning and management (int '1)	1	75	1	IC	Prior	Q4- 2012
2	Technical consultancy on coastal integrated planning and management (int '1)	1	30	1	IC	Post	Q4- 2012

3	Develop fisheries database (capture fisheries, aquaculture, & MPA) (national)	1	250	1	QCBS	Prior	Q4- 2012
4	Upgrade Vnfishbase	1	50	1	cqs	Post	Q4- 2012
5	International consultancy on bio-security in seed protection and aquaculture (at central and provincial levels)	2	100	1	IC	Prior	Q4- 2012
6	National consultancy on bio-security in seed protection and aquaculture (at central and provincial levels)	2	15	1	IC	Post	Q4- 2012
7	National consultancy on fish veterinary	2	108	1	IC	Prior	Q2- 2012
8	International consultancy on labs assessment	2	75	1	IC	Prior	Q2- 2013
9	National consultancy on MCS	3	108	1	IC	Prior	Q2- 2012
10	National consultancy on formulation of safety regulations on coastal capture fisheries	3	20	1	IC	Post	Q2- 2013
11	National consultancy on implementation of socio and environmental monitoring plan	4	200	1	QCBS	Prior	Q3- 2012
12	Technical support to internal audit of project financial system	4	150	1	cqs	Post	Q4- 2012
13	Technical support to project management	4	1,953	1	QCBS	Prior	Q2- 2012
14	Project audit (external audit)	4	350	1	QCBS	Prior	Q2- 2012
15	Accounting software	4	40	1	SSS	Prior	Q1- 2012
16	Interpreter	4	108	1	IC	Prior	Q2- 2012

APPENDIX 3. LIST OF CONSTRUCTIONS WITH TECHNICAL DESIGN COMPLETED

	Provinces	Design completed	Estimatedcost	Total cost for civil works planned
			(1000 USD)	(1000 USD)
1.	CA MAU	1. Song Doc fishing port	3366	8409
		2. Ho Gui fish landing		
		site	3370	
		Total	6,736	80%
2.	SOC TRANG	1. Artemia farming site	500	7400
		2. Disease diagnosis		
		center	30	
		3. Tran De fishing port	1870	
		4. Offices for sub-		
		DECAFIREP	40	
		Total	2,440	33%
3.	KHANH	4 37 1 77 1 . 1	2600	7110
	HOA	1. Ninh Van hatchery	3600	7110
		2. Vinh Luong fishing	1000	
		port3. Hon Ro fishing port	1000	
		5. Holl Ko lishing port	1000	
		Total	5,600	79%
4.	PHU YEN	1. Dong Tac fishing port	2500	5548
		Takal	2.500	A.E. O/
_	DIMIT DIMIT	Total	2,500	45%
5.	BINH DINH	1. De Gi fishing port	2000	3680
		Total	2,000	54%
6.	HA TINH	N/a	0	0
	·	N/a	0	0
_	NOTE AN	Total	1706	0
7.	NGHE AN	1. Lach Van fishing port	1726	7465
		2. Lach Lo shelter (in	2612	
		Nghi Tan fishing port) 3. Quynh Bang electric	2012	
		system - Quynh Lien	271	
		System Quyim Elen	271	
		Total	4,609	62%
8.	THANH	1. Hoang Phu fish	4046	702 (
	HOA	landing site	1942	7024
		2. Hai chau fish landing	2100	
		site 3. Upgrading	2100	
		infrastructure of bio-		
		security farming sits in	220	
		security fairning sits in	220	

	Nga Tan commune		
	4. Upgrading		
	infrastructure of bio-		
	security farming site in		
	Nga Thuy commune	220	
	5. Lach Truong MCS		
	station	81	
	6. Sam Son MCS station	81	
	7. Hoang Chau channel		
	system	584	
	Total	5,228	74%
9. PCU	N/a		0%
Total		29,113	50,840
			57%

APPENDIX 4. DRAFT GOVERNANCE AND ANTI-CORRUTION PLANS

The project has developed a Governance and Transparency Action Plan (GTAP) that addresses the general governance environment in Vietnam, as well as the risks associated with the fisheries sector. The GTAP conforms to the overall priorities of the country's governance agenda and delineates the measures to be implemented and monitored throughout the project cycle. The GTAP draws on: (a) anti-corruption measures developed under previous World Bank-financed projects; and (b) the findings of the 2009 review of progress in implementing the Government's Anti-Corruption Law in the construction sector in Vietnam. It also reflects local capacity for implementation

The GTAP, which is presented in the OM, consists principally of two parts: (a) awareness raising and capacity building; and (b) transparency and disclosure measures. Specific activities include the preparation of a governance and transparency training manual; the implementation of corresponding training sessions; and periodic disclosure of key project related information in relevant public media. Other governance and corruption mitigation measures adhere to the specific principles and actions already set out in relevant World Bank policies and guidelines for procurement, financial management and disclosure, as appropriate.

Draft Governance and Anti-Corruption Action Plans for CRSD

Subjects	Interventions/Measures	Responsibility	Expected time
Awareness raising and capacity building. Plan on public governance transparency and anticorruption available; all relevant stakeholders are aware of their duties and of the action plan as well as are capable to comply with such plan	General content 1. Compile handbook and training documents on State governance and transparency, including: (a) definitions and neglect/waste; (b) current definitions and policies on anti-corruption of WB and Vietnam; and (c) training documents with case studies.	PCU	Within 6 months since the signature of Financing Agreement (FA).
	 Organize training and consultation with relevant stakeholders of the project including provincial and project staff, bidders and consultants, representatives of communities, NGOs selected on the State governance and transparency. Regular update of training programs on State 	PCU/PPMUs PCU	Organize at least 2 courses in the first year and one course every next year

Subjects	Interventions/Measures	Responsibility	Expected time
	governance and transparency based on lessons learnt through project implementation and feedback collected through consultancy, trainings, complaints of relevant stakeholders.		Consider and update in March each year
	Procurement 1. Organize training on detection and taking action to the collusion with the project staff involved in procurement.	PCU/PPMUs	Organize at least 2 courses in the first year and one
	2. Share all investigation report and sanction applied.	PCU/PPMUs	course every next year.
	3. Organize at least one meeting each year to disseminate information to bidders and communities/beneficiaries.	PCU/PPMUs	During project cycle As above
Transparency and disclosure measures Project relevant information are announced to relevant stakeholders (including beneficiaries), transparent management of project, all stakeholders receive equal and honest	1. Establish communication means and measures including: (a) (establishment) project website linking to website of project provinces; (b) published communication is selected relevant to relevant interest parties; and (c) national-level proper communication means.	PCU/PPMUs	Within 6 months after the project execution
disclosed information on staff and contracted partners.	2. Regularly proper posting of: (a) basic information on the project (scope, cost and organization, workplan); (b)documents and dossiers that can be announced (Resettlement plan, environmental impact assessment, procurement plan); (c) annual cost of	PCU/PPMUs	Within 6 months after the project execution; updated in the last day of each quarter.

Subjects	Interventions/Measures	Responsibility	Expected time
	project and funds; (d) project, project provinces and Vietnam's policies; and (e) complain and reporting mechanism.		
	3. Regular update for people on (a) project progress, including disbursement and procurement; (b) M&E results; (c) resettlement plan implementation; and (d) quarterly interim financial reports and annual Statement of Finance audited	PCU/PPMUs	By end of each quarter with annual assessment.
Independent consultancy in charge of outline and it implementation	1. Independent audit would especially pay attention to any collusion/corruption/fraud.	Independent consultant	Annually through project cycle
audit/implementation assessment.	2. Systematic monitoring of line agencies (MARD, PPC) and related agencies (MOF, DOF, MARD Inspectorate, independent auditors) in case of refusal to comply with proper remedy measures	PCU/PPMUs	As above
Benefited communities conduct the monitoring	1. Representatives of project beneficiaries are encouraged to take part in monitoring activities.	PCU/PPMUs	Through project cycle
	2. Support to local communities and civil organizations in project monitoring		
Complaint settlement and reporting mechanism	1. Establish mechanism and confidential reports to the complaints and denunciation related to corruption, management of dossiers on equal treatment and confidential manner	People's Committee of project provinces/MARD / PCU/PPMU	Within 60 days after the project execution
Support of MARD and project provinces	 Authorities promptly decide the identification of collusion/corruption/fraud. Systematic monitoring of borrower in the case of 	Bộ NN & PTNT/UBND các tỉnh dự án	Within project execution; annual review

Subjects	Interventions/Measures	Responsibility	Expected time
	declining the implementation of proper remedy measures or integrity.		
Sanctions and remedies	1. Project Operational Manual (OM) would include: (a) procedure on detection, reporting and handling with the collusion/corruption/fraud which clearly covers duties for each unit/level; (b) issue one clause on sanction/punishment applied to PCU/PPMU and bidders involved in collusion/corruption/fraud.	PCU/PPMU	Within 60 days after the project execution
	2. Announce on the website/bidding information of MARD or project and provincial newspapers on the sanction applied to the bidders involved in collusion in two weeks after the decision is issued.	MARD/People's Committee of project provinces	Within project execution; annual review

APPENDIX 5. OVERVIEW ON FISHERIES SECTOR'S RECENT DEVELOPMENT

1. Aquaculture

1.1. Overview

Aquaculture sector has started commercial production since 1980s with tiger shrimp farming. In the next two decades, shrimp farming has been rapidly developed to become a major economic activity in coastal aquaculture.

Being aware of aquaculture's crutial role, the Prime Minister had approved Aquaculture Development Program under Decision No. 224/1999/QĐ-TTg dated 25 December 1999 for aquaculture development to secure food security and create major materials for export. It was expected that by 2010 total farmed products would reach over 2 million tons, export revenue gained over 2.5 billion USD that created employment and income for 2 million people, contributed to the socio economic development and coastal security.

The core principle of the Program was to develop aquaculture towards sustainable manner adhered to protection of eco-environment to ensure stable production and livelihoods. Regarding technology, great effort was made to fulfill modernization and industrial farming development together with other culture methods in each region. At the same time, freshwater, brackish and marine aquaculture were focused to make a significant change in export shrimp farming and culture of other aquatic species for consumption and export demand.

Aquaculture targets stated in the production plan to 2010 and the implementation result for 2000 - 2010 are presented in below table:

Table 1. Planned targets and implementation results in terms of areas, productivity, export value of aquaculture production (2000 – 2010)

				Target to	Implemented by		Fulfill ment
No.	Contents	Unit	Year 1999	2010	2005	2010	percen tage (%)
1	Aquaculture areas	ha	524,619	1,000,000	959,945	1,096,722	109.68
2	Aquaculture productivity	ton	480,767	2,000,000	1,437,350	2,828,622	141.43
2.1	Brackish shrimp	ton	63,664	360,000	324,680	469,893	130.53
2.2	Marine fish	ton	52	200,000	3,510	22,000	11.0
2.3	Mollusc	ton	63,000	380,000	114,570	286,610	75.4
2.4	Seaweed	ton	1,178	50,000	20,260	26,000	52.0
2.5	Giant prawn	ton	1,715	60,000	6,400	28,000	46.67
2.6	Catfish	ton	86,700	300,000	375,000	1,140,000	380.0
2.7	Other freshwater fish species	ton		628,000	553,000	856,119	136.32
3.	Export revenue value	1000 USD	613,791	2,500,000	1,627,301	3,500,000	140.0
4.	Labourers	Perso n		2,800,000	2,550,000	3,500,000	125.0

To specify general objectives under Aquaculture Development Program for aperiod of 2000-2010 dated 23/06/2004, the Prime Minister had issued Decision No. 112/2004/QĐ-TTg approving fish seed development program to 2010. The program's objective was to improve the capacity in research, gradual ownership of seed production technology to establish a diversified seed group with economic and export value for aquaculture development in fresh, brackish and marine water. At the same time, the modernization of the hatchery system would be gradually completed to provide better and diversified seed quality for aquaculture and effective and sustainable economic structure transition.

Seed production targets to 2010 and implementation result for 2000-2010 are presented in below table.

Table 2. Planned targets and implementation results on seed production for 2000 - 2010

N	Contont	Unit	1999	Target	Impleme	ented by	Fulfillment
0.	Content	Unit	1999	to 2010	2005	2010	percentage (%)
1	P15 shrimp seed	billion	7.7	35	28.80	45.0	128.57
2	Marine fish seed	billion	5.0	400	15.0	60.0	15.0
3	Mollusc seed	billion		3.0	0.063	0.49	4.41
4	Catfish	billion	32 million	0.7	0.30	2.36	337.14
5	Unisex tilapia	billion		0,5	0.20	0.23	45.0
6	Other seeds	billion		12.0	12.00	27.5	229.2

The result of the Aquaculture development program implementation for 2000 – 2010 showed that the program's objectives was fundamentally completed with many indicators exceeding the plans set out. Aquaculture has been an active economic sector that provided products for local consumption and export. Export revenue from aquaculture in 2010 was 3,500,000,000 USD (reaching over 125% compared to plan) providing 3.5 million of jobs (reaching 175% as target set out). Aquaculture areas in 2010 was 2,828,622 ton (reaching 141.4% against the plan). Basically, seed production sufficiently provided seeds for commercial shrimp farming, especially the seeds of main brackish species for 2010 was 45 billion shrimp individuals (reaching 128.6% against the plan), catfish for 2010 was 2.36 billion fish individuals (reaching 337.2 % against the plan). The seeds of some economic species and traditional freshwater fish for 2010 was 27,5 billion individuals (reaching 229.2% against the plan). In addition, aquaculture infrastructure and dedicated hatchery zone had been gradually improved; irrigation system for aquaculture was upgraded; national hatcheries and hatcheries level I, provincial hatcheries and dedicated ones have been established and functioning well.

1.2. Special issues to be solved for improvement of aquaculture sustainability

Marine and coastal aquaculture is an important part of coastal economic zone. However, the coastal and marine fisheries resources have been seriously depleted due to various causes namely overfishing, illegal fishing, improper production, competitive use of water and land, increased population, urban and industrial pollution etc.

The issues of special concern for the sustainable aquaculture development include:

- Weak shrimp development plan.

Shrimp farming has seen a robust development in recent years. However, the weak planning and lack of regulations led to the coastal environmental degradation. Uncontrol of biodiversity and the lack of sufficient planning increased the infection in shrimp farming activities. The infrastructure for aquaculture is limited. Therefore, it is necessary to establish and carry out the farming site management plants in order to improve the bio-security in important farming sits, improve the sustainability and production capacity.

- Low seed quality (or without certificate of seed quality):

At present, shrimp farming is the most important coastal aquaculture activities. Two main species are tiger shrimp and white leg shrimp. Shrimp seed quality is one of the main cause for large scale of infection. Most of shrimp brooders (tiger shrimp) are naturally caught and some are imported from neighboring countries. Shrimp brooders of white leg shrimp (Vanamei) are all imported from Hawai, Thailand, China. The quality of brooders is not controlled or certified.

It is estimated that over 70% of current white leg shrimp farms are using the seeds without quality control and imported from China and other sources.

To ensure the success and sustainability of the shrimp farming sector, it is necessary to improve the provision of disease-free seeds with high quality.

- Weakness in disease control by veterinary agencies

The agencies in charge of disease control are lacked and weak at all levels. There is no effective disease control responding to the disease. Some research institutes establish the testing labs which are unable to be reached by the farmers.

- Non-sustainable aquaculture practices norms

The monitoring and implementation of measures to ensure the bio-security are in lack or ineffective. The farmers take action to the disease by using anti-biotic or prohibited chemicals. As a result, the products and production system sometimes do not meet the strict requirements of US and EU markets relating to the quality standard and food safety.

- Lack of diversified species

The Government and research institutes do not strongly focus on the diversification of farmed species and domestication and nursing of high value species (such as mollusk or marine fish) and lack of adequate programs or research on new farmed species.

To optimize the sustainable use of coastal resources and provide alternative livelihood for coastal poor fishers, it is necessary to further diversify the farmed species.

- Low value-added of the products

Post-harvest, pre-processing, transport and recycling of the products are still limited that makes the quality reduced.

2. Capture fisheries

2.1 Overview

- Vietnam's fisheries is mainly conducting traditional practices with small scale coastal fishing activities. According to statistics, by end of 2010, number of fishing vessels

was more than 128,000 with the total capacity of 6.1 million CV (of which, the number of fishing vessels with engine capacity of less than 90CV was 107,000) and 83.7% involved in coastal fishing activities. Therefore, the density of vessels at coastal areas was high. At a peak time, 50-60 vessels are fishing within 1km^2 in coastal areas.

- The fishing fleet uses about 40 types of fisheries catogories into 4 classes and 15 groups. Their products are mainly immature fish or low value ones. The statistics showed that normal catch was at small size, low quality. High trash fish percentage includes 40 50 % in shrimp trawl fishery, 70 80% in bottom net and 90 95 % in push net fishing.
 - Coastal areas are the main fishing grounds (water depth of less than 30m)
- Fish species are diversified. According to scientific research, Vietnam marine living resources comprise 225 shrimp species, 55 squid species, 7 octopus species, 653 seaweed species, around 1600 crustacean, 2100 fish species with more than 100 species of high value. The resources availability was about 4.36 million ton (including marine fish, shrimp and squid) with maximum fishing capacity of 1.75 million ton/year (inshore and offshore fish).
- According to fisheries sector development masterplan to 2010 and orientation to 2020, marine catch is maintained at 1.5 1.8 million ton/year. The optimum catch in biological and socio economic development aspects is 1.5 million ton/year of which the coastal catch is 700,000 ton and offshore catch is 800,000 ton.
- Over years, the catch productivity of fisheries sector is increasing. However, Vietnam coastal fisheries resources are seriously depleting.

2.2. Status of fishing fleet and fishing operations at localities

a/Overall assessment on the fishing fleet and fishing operations

- Before 2004, the fishing fleet was strongly developed in terms of quantity and engine capacity. Since 2004 to date, the fishing fleet was reduced in terms of quantity, at non-motorized vessels but the engine capacity was increased.
- Fleet structure has positively changed in recent years but there is high proportion of vessels with less than 20CV (49.73%) especially in Tonkin Gulf (41.03%). The bigger ships of more than 400CV accounting for 2.35% have mainly fished in the East and South West region.
- Small boats are equipped with limited communication equipment, life vest and small engine capacity so they meet great challenge in case of strong storms and winds. In some cases, fishers still have to go fishing in inshore and offshore areas.

Big and medium vessels are equipped with communication system but their scope of operation is limited. The lifebuoys and rescue equipment is not sufficient so it is dangerous for them to fish offshore in storm and windy season.

- Number of vessels fishing in coastal areas, inshore and offshore areas accounted for 42.45%, 40.67% and 16.87% respectively.
- The change of fishing grounds is regularly occurred. Annually, about 8,500 9,000 vessels change their fishing grounds and move to offshore areas. They are mainly coming from central areas to Tonkin Gulf, South West and South East region for fishing.

b/Characteristics of each studied areas

Tonkin Gulf

- Total local fishing vessels: 27,412 vessels, of which 24,967 are motorized ones.
- Number of small vessels below 50CV account for 76.65%, vessels beyond 150CV account for 2.82%, and very few is more than 400CV.

Coastal fishing vessels account for 53.09%, and vessels in offshore areas account for 10.13%

- Annually, about 1,600 fishing vessels from other locations move around to fish on seasonal cases. They are mainly from Binh Dinh, Quang Binh and Phu Yen. Their main destination is Cat Ba – Hai Phong and Hon Gai – Quang Ninh.

Central areas

- Total number of local fishing vessels: 33,101 vessels, of which 26,054 are motorized boats.
- Number of vessels less than 50CV: accounts for 75.78%, vessels beyond 150CV accounting for 2.87%, and very few boats are more than 400CV.

Coastal fishing vessels account for 46.47%, and offshore fishing vessels account for 9.54%

- Number of vessels change their fishing ground per season at central areas is about 850-900 focusing on offshore areas of Ninh Thuan and Binh Thuan provinces. Their destination is Phan Rang and Phan Thiet.

South East sea

- Total local fishing vessels: 21,398, of which 21,158 are motorized.
- Number of small boats less than 50CV accounts for 58.79%. Vessels of more than 150CV account for 18.35%. There are 664 vessels beyond 400CV accounting for 3.1%.

Number of coastal fishing vessels account for 28.97%, and number of offshore vessels account for 26.75%.

- Annually, more than 2,000 vessels from other localities move to South East region for fishing, mainly in offshore areas of Ba Ria Vung Tau. They are mainly from South Central region and destination is Vung Tau area.

South West region

- Total number of local fishing vessels: 10,527 motorized vessels
- Number of vessels less than 50CV accounts for 53.15%. Vessels of more than 150CV account for 34.64%. Vessels beyond 400CV are 1,196 accounting for 11.36%.

Number of coastal fishing vessels account for 29.52% while offshore vessels account for 37.43%

- Annually, more than 3,000 vessels form other provinces come to South West fishing ground including small and medium sized vessels. They are mainly from Mekong River Delta

such as Tien Giang, Ben Tre, Tra Vinh and other Central South region like Binh Dinh, Phu Yen and Khanh Hoa provinces.

Table 3. Number of vessels and fishing operations by end of Feb/2008

No		Tokin Gulf	Coastal Central	South East	South West	Total (nationwide)
1	Total fishing vessels	27,412	33,101	21,398	10,527	92,438
	Motorized vessels	24,967	26,054	21,158	10,527	82,706
	Non-motorized vessels	2,455	7,047	240	0	9,732
2	Fishing vessel by engine capacity					
	< 20 cv	14,553	15,382	6,199	3,108	39,242
	20 ÷ 50 cv	6,459	9,703	6,381	2,487	25,030
	50 ÷ 90 cv	3,624	4,858	3,095	992	12,569
	90 ÷ 150 cv	2,002	2,207	1,797	293	6,299
	150 ÷ 400 cv	742	900	3,262	2,451	7,355
	> 400cv	32	51	664	1,196	1,943
3.	Fishery type					
	Trawl net	5,656	4,384	7,859	4,707	22,606
	Purse net	949	3,399	991	946	6,285
	Gill net	5,490	5,439	2,851	1,834	15,614
	Long line	4,574	6,497	2,301	1,659	15,031
	Other	10,743	13,382	7,396	1,381	32,902
4.	Fishing areas					
	Coastal areas	14,553	15,382	6,199	3,108	39,242
	Middle areas	10,083	14,561	9,476	3,479	37,599
	Offshore areas	2,776	3,158	5,723	3,940	15,597

Table 4. Summary on number of fishing vessel by engine capacity (as of 31/03/2011)

No.	Provinces	Total	Horse Power (HP)										
		vessels	< 20	20-50	50-90	90-250	250-400	>400					
1	Quang Ninh	13119	10023	2661	267	146	15	7					
2	Hai Phong	3979	2656	630	269	387	32	5					
3	Thai Binh	1449	694	526	74	116	20	19					
4	Nam Dinh	2357	1738	193	117	205	44	6					
5	Ninh Binh	133	96	34	1	0	2	0					
6	Thanh Hoa	8516	6739	539	490	582	134	32					
7	Nghe An	4326	1985	1266	214	586	180	95					
8	Ha Tinh	3789	3010	692	56	5	26	0					
9	Quang Binh	4932	3299	395	458	754	21	5					
10	Quang Tri	2212	1782	298	47	83	2	0					

Total		129294	65174	31551	9916	11283	7838	3614
28	Tien Giang	1351	58	324	180	165	569	55
27	Bac Lieu	1092	239	432	46	70	274	31
26	Tra Vinh	1342	290	653	249	80	60	10
25	Soc Trang	1260	415	553	42	55	146	49
24	Ca Mau	5064	1471	1863	384	705	570	53
23	Kien Giang	11966	4337	3208	762	847	1286	1526
22	Ben Tre	4287	169	2014	401	452	790	461
21	B.Ria – V.Tau	6716	1911	1661	602	1061	804	677
20	HCM city	1857	927	751	59	34	48	38
19	Binh Thuan	8566	2922	2733	1184	819	712	196
18	Ninh Thuan	2446	1123	419	235	469	171	29
17	Khanh Hoa	9699	5537	2634	656	599	231	42
16	Phu Yen	7318	4693	1332	574	697	22	0
15	Binh Dinh	8106	2690	2252	1090	1090	947	37
14	Quang Nam	4184	2928	895	156	145	38	22
13	Quang Ngai	5567	1464	1540	984	821	653	205
12	Da Nang	1688	680	718	128	110	38	14
11	TT-Hue	1973	1298	355	137	200	3	0

2.3. Status of fishing ports, landing sites and markets

a. General assessment

- Size and investment planning

Most of provinces do not have detailed planning on location for establishment of fishing ports, fish landing sites, vessel shelters so in some places, fishing ports are established at inconvenient place that is difficult to enter or negatively affect the landscape and logistic services such as Cat Ba fishing port (Hai Phong) which is located in narrow and sightseeing locations; Ca Mau fishing port located far from estuary (more than 60km), Xuan Pho fishing port (Ha Tinh) located far from estuary so it is difficult to attract vessels to land.

Many projects have their scale of operation limited due to investment budget so the constructions are not on a par with the need for fisheries development and modernization.

Some fishing ports have limited space for landing such as Phan Thiet and Quy Nhon (Binh Dinh). Some constructions such as water supply and drainage system, waste water treatment system are limited such as Cua Hoi fishing port (Nghe An), Ca Mau port.

- Fishing port use and management

The management board is available at most of fishing port. But there is no common agreement on this organization.

At fishing port, management board called for the involvement of different economic entities for investment in fisheries logistics.

Generally, fishing ports and fish landing places have not coordinated in order keeping and environmental protection. There is a lack of fishing vessels, fisheries resources and quality control system as well as product auction.

b. Detailed assessment

At present, there are 73 fishing ports through the country with the length of 10324m, 46 fish landing sites with the length of 4042m and 04 fish markets adhered to fishing ports.

Most of fishing ports cover roadstead, fish market and ice production workshop. Other fisheries logistic services such as pre-processing, freezing house, petrol tank, food stores etc...are not integrated. Among the fishing port system, Cat Lo fishing port in Vung Tau is considered to be a completed one in terms of investment scale.

Most of modern fish landing sites are natural venue covering a roadstead and anchoring areas. Fisheries logistic services are not adequate.

The assessment of current fishing ports and fish landing sites showed that:

- The longest fishing port is Tac Cau fishing port in Kien Giang (500m), followed by Ha Long fishing port (400m) and Ca Mau fishing port (360m).
 - The average length of a port is 162,1m and of a fish landing site is 223.6m.
- Fishing port with largest ice production workshop is Tac Cau port Kien Giang: capacity of 719T/day followed by Cat Lo port Vung Tau: capacity of 350 T/day. Other fishing ports have the capacity of $50 \div 150$ T/day.
 - Average number of vessels landed: 637 vessels/month
 - Average number of vessels landed at fish landing site: 567 vessels/month
- The longest fish landing site is Dai Hop commune's site, Kien Thuy district, Hai Phong city with the length of 800m followed by Hoa Loc fish landing site, Hau Loc, Thanh Hoa and the site of Hai Ha ward, Ba Ria Vung Tau with the length of 500m.
- Number of fishing ports and fish landing sites proposed to be removed including:

Fishing port of Seafood import export II Quang Ninh – Ha Long city: it needs to be removed as it locates in the tourism port under Ha Long city masterplan;

Cu Lao fishing port– Khanh Hoa: it needs to be removed as its venue is not convenient;

My Tho fishing port – Tien Giang, should be removed as overloaded port without expansion capacity;

Den Do fish landing site – Tien giang under military management: it should be removed to other appropriate venue;

Cao fish landing sit – Phuoc Hai commune – Dat Do district, Ba Ria Vung Tau: it needs to be removed to fishing port of Dat Do district.

Other fishing ports and fish landing sites need to be upgraded for fisheries sector development.

2.4. Issues that need solution for sustainable coastal fishing activities

Coastal capture fisheries play an important role in providing jobs for millions of coastal poor fishers. Moreover, coastal areas are the spawning areas for many fish species for replenishment of offshore fisheries resources. Coastal fisheries resources have been seriously exploited. In many places, it has been over-exploited from 10 - 12%. Some resources are endangered and depleted, especially small pelagic fish, squid and shrimp.

Some major factors affecting the sustainability of coastal fisheries include:

- Lack of effective plans and management mechanism:

Despite the fisheries law came into force in 2003, its enforcement is limited. In 2009, the Government issued Decree No. 25 applying integrated coastal management for sustainable protection and use of marine and coastal resources. In 2010, Government issued Decree No.33 to govern fishing activities through the allocation of inshore fishing areas to province, district and commune authorities for coastal co-management. This is the first time that the "free" fishing zone" (6 nautical miles from shoreline) has their legal "owners" and they have duty to make planning, protect and manage the zone assigned.

- Over-investment and weak fishing operations

By 2010, there were more than 100,000 small vessels (<90 CV) operating in coastal areas. Common fishing gear includes trawl net, gill net, trap, push net. The fishing capacity is increased together with increased number of small vessels that created serious pressure on the coastal fisheries and coastal communities. Due to high cost of petrol, the coastal fishing activities have not profitable any longer. In early 2011, the Government stopped subsidizing petrol for the coastal vessels. Many fishers with small boats are facing many difficulties and temporarily suspending their coastal fishing activities. Many people among them wish to abandon fishing activities if they had a chance for job change.

Some fishing gear used in coastal areas led to the high quantity of trash fish. Single and pair trawlers contain 50-70 % of unused fish (trash fish). These non-sustainable fishing activities led to the loss of many fish brooders or fingerlings of high value fish. This is one of the causes for depletion of coastal resources.

- Lack of alternative livelihood for fishers

At present, coastal fishers are facing many difficulties while the Government stops the petrol subsidy. Some expected to change job. This is now a problem to local authorities.

- Limited infrastructure damaging the supply chains

There are more than 80 fish landing sites to serve offshore vessels while the coastal vessels continuously using traditional fish landing sites without support services. In general, most of catch would be consumed at village markets. High value species would be selected to sell for sale agents and plants. Remaining products are processed in poor hygiene conditions (lack of safe water, few ice, fish is located on land or transported in bamboo baskets or closed nylon bags). In hot weather, fish quality would be seriously damaged before reaching the processing plants or fish wholesale market.

As estimated, due to bad pre-processing and preservation on board, fish landing sites and during transportation, fish products value loss about 20 - 30% causing bid economic

damages to the fishers that losing the sector resources and polluting the environment in the fish landing sites and fish wholesale market.

3. Status of fisheries planning, statistics and information

3.1 Planning:

- Aquaculture planning

Aquaculture development planning was reviewed and revised as a basis for the establishment of production development plans and infrastructure construction and production financing. In practice, the establishment of aquaculture development plans is slow not meeting the development demand. The plans' feasibility is limited.

During 2000 – 2005, most of localities had no aquaculture plans. The unregulated development is the major cause for environment pollution, disease, material redundancy. On 11/01/2006 the Prime Minister approved Fisheries Sector Development Master Plan to 2010 and orientation to 2020 under the Decision No. 10/2006/QĐ-TTg. Due to slow issuance of master plan, many places for aquaculture were not relevant but used as shrimp farming ponds. In addition, investment for master plan implementation was not enough so suspended masterplan was available as there was not infrastructure for implementation.

Many large master plans for marine areas, brackish water shrimp farming, tilapia development, seaweed development, special crustacean, mollusk have not been approved. To carry out the aquaculture development project in the next period, it is necessary to carry out a master plan and invest in irrigation system for major species farming and specific farming zone.

- Capture fisheries planning

Capture fisheries planning was duly cared by the Government and MARD including:

- Master plan on vessel shelter approved by Prime Minister under the Decision No. 288/2005QĐ-TTg dated 08/11/2005
- Master plan on fishing port and fish landing sites to 2020 and orientation to 2030 approved by Prime Minister at the Decision No. 346/QĐ-TTg dated 25/03/2010
- Marine capture fisheries master plan including East West region to 2020
- Offshore fishing development master plan in Tonkin Gulf to 2020
- Master plan for inshore marine capture fisheries in Central region to 2010

3.2. General assessment on fisheries statistics

Though fisheries is considered to be an important sector of Vietnam, contributing to GDP, job creation and food security, no official fisheries statistic is available to date. At present, fisheries sector's statistics is conducted through reports presented by local authorities and General Office of Statistics but this information is not easy to use in sector management and planning due to the lack of targets, limited accuracy and frequency of data collection and representation.

In addition, Vietnam has not any strategy or plan on fisheries statistics which is prepared at national or provincial levels. At the same time, most of localities face difficulties in cost and human resources and maintenance of provincial fisheries statistics. Accordingly, the data collected can not satisfy the management demand at local, national level or regional

fisheries organizations. The comprehensive statistics are not continously and harmonizely conducted for capture fisheries and aquaculture over years. As such, inputs for consultancy, planning, sector management plans are insufficient and not reliable. On the other hand, there are no official and professional staff in fisheries statistics at local level. If any, they are collaborators working on seasonal basis. In previous years, there were some staff and collaborators collecting fisheries statistic samples thanks to the support from Fisheries Sector Support Program I (FSPS I).

Within the support of Danish Government through Danish International Development Agency (DANIDA), FSPS developed Vnfishbase covering the information on fishing effort, registration and technical inspection of fishing vessels and catch (sampling program). However, this online software is not sufficient that need upgrading and equipment such as server, network administration equipment, other related devices...Fisheries database such as IUU fishing, logbookin capture fisheries are not established.

In addition, national database on aquaculture is cared by FSPS II but the data on aquaculture (areas, species, season, productivity, seed hatchery, environment....) has not been established and operated. Related sector management agencies have mainly managed information based on their independent demand without technological integration or implementation method. Like capture fisheries, aquaculture lacks of collaborators and staff in charge of statistics as well as the legal framework, materials for maintenance and implementation of activities. To collect fisheries database, legal framework and capacity building at local level should be improved to fully meet the fisheries management and development demands. The specialized data collection needs new approach and technology to update the data and cost and human resources for implementation by provincial People's Committee.

Directorate of Fisheries (DOF) is a new entity established under Decision No.05/2010/QĐ-TTg dated 25/1/2010 of the Prime Minister regarding the mandate, functions and organizational structure of DOF under MARD. Accordingly, most of relevant departments are re-structured and re-organized with insufficient staffing. The infrastructure in general and information technology facilities in particular are lacked which do not meet the requirements of sector's management, production control and development planning. Computer system of the units under DOF are mainly obsolete, unintegrated and in lack of server. To date, a national fisheries database or an official server for fisheries data storage has not been available in DOF.

In general, most of project programs related to investment, fisheries statistic pilots and particularly Fisheries Sector Program Support phase I (FSPS) and some provinces where the fisheries plays important role have actively used local contribution in implementation of statistics for management purpose such as Nghe An, Soc Trang provinces. In addition, some fisheries-related organizations such as Food and Agriculture Organization (FAO), Southeast Asian Fisheries Development Center SEAFDEC)... provided technical support to fisheries statistics such as studies on pilot lessons. However, the statistics and technical support are provided in small scale, unintegrated and on pilot manner.

It is necessary to review, establish and complete institutional framework and policies for fisheries statistics in Vietnam with the agreement of General Office of Statistics. The condition for the success of fisheries statistics is the concensus of all relevant stakeholders from central to local level. Professional collaborators who would take part in statistic system

on long-term and stable basis need to be provided with training. At the same time, information technology facilities with due concern is the pre-requisite for sustainable operation. Accordingly, to have regular fisheries statistics with reliable information apart from information technology investment and capacity building, it is necessary to pay attention to institutional policies, especially at 28 coastal provinces.

3.3 Status of fisheries information technology at DOF and localities

- DOF headquarter is located at No.10 Nguyen Cong Hoan street. However, different departments and units are located in different buildings under MARD (building A1, A2 and B1). A quick survey on the current status on information technology of the units under DOF revealed that:

Departments under A1 building (5-storey building) includes Department of Planning and Finance, Department of Science, Technology and International Cooperation, Administrative office (1st floor), Department of Aquaculture (4th floor), DOF Inspectorate and Center for Testing and Certification (5th floor); building A2 (2-storey building) includes DOF leadership office and Administrative Office of DOF which are using the old network line of MARD under the management of Center for Information and Statistics. At the 4th and 5th floors, the network is weak and many network hub is unavailable. At present, Administrative Office is contracting the preparation of this network funded by additional budget of 2010.

At building B1 (3-storey building) where DECAFIREP and Institute for Fisheries Economics and Planning locate, their own network was invested some years ago. DECAFIREP has 4 lines including 2 optic lines (2 x 16.000 Kbps). Fisheries Information Center has established recently so there is no separate network line for this center. They share the same line with Center for Information and Statistics.

✓ Investment in technical facilities and cost for information technology applications

Directorate of Fisheries is a new entity to be established in 2010 so the information technology for beneath units/departments is not available. Just the Administrative Office, Inspectorate were provided with additional technology equipment. To date, most of other units/departments under DOF have not been invested in terms of information technology.

The cost for application of information technology 2010 for these units/departments is mainly for the line rent and other services. At present, MARD is carrying out project "upgrading of IT facilities for the management and control of MARD" including the establishment of online network facilities at No.10 Nguyen Cong Hoan.

✓ Human resources

At present, 100% of public servants and staff working in DOF are using computers, especially the office software application. The application of IT in management is limited. Relevant units/departments have no staff specialized in IT.

✓ Equipment

Internet line is not available at all units/departments. Some units have to share the line with others or even lack of Internet line. Basically, newly-established units/departments are using old computers without the provision of new ones. In some units, there is a lack of computers for all staff.

There are two departments using server to manage own network system and use different applications for specialized work management (DECAFIREP and Institute for Fisheries Economics and Planning).

✓ Applied software

The application of software in departments/units includes financing – accounting management software (in 3 departments) and software for technical work (2 departments). The IT facilities are not protected by means of anti-virus software. The public servants and staff in the units and departments have used emails including MARD and private email addresses.

✓ Electronic webpage

There are two units having their own electronic webpage namely DECAFIREP (www.cucktbvnlts.gov.vn) and Institute of Fisheries Economics and Planning (www.vifep.com.vn). For the sector management as per Law on Information Technology (Article 28), DOF has been upgrading electronic webpage (www.tongcucthuysan.gov.vn and www.fistenet.gov.vn) and put into operation since November 2010.

✓ General assessment

The IT application in the departments under DOF is independently conducted. Accordingly, the information transmission among departments is not conducted via IT. If only internet is used, it is much dependent on the transmission speed from departments to the suppliers. By this way, the information transmission speed among departments is remarkably reduced compared to the use of network line among departments.

In spite of certain advantages, there are many difficulties in the establishment and upgrading of facilities for IT application development in coming time.

Though it is of priority within FSPS, the pilot provinces reflected IT limitations, server and internet equipment. There is no integrated IT investment project for important fisheries provinces, even in the FSPS-supported provinces. Preliminary assessment results extracted from the province's reports on the status of IT revealed that there is no integration and unity in terms of quality and quantity of IT facilities among provinces and no guidance was provided by central authorities.

According to the report on current status of IT in some provinces, An Giang sub-department of fisheries has 42 staff but only 11 desktops and one server are available. An Giang sub-department of NAFIQAD has 22 staff but only 8 desktops are provided. Thua Thien Hue province has 714 staff under DARD but only 210 desktops are available. Especially, sub-DECAFIREP was provided with 10 computers and sub-Department of Aquaculture has 7 computers but these are so old. According to current status on IT in Ben Tre agricultural sector, there is a lack of computers, audio-video equipment, projectors....in the administrative offices and fisheries specialized units. In many cases, two staff have to share one old computer. All computers were provided in many years ago that could not be upgraded. As a result, the need for computers and IT equipment for technical units/departments in various provinces is not the same. The common concern is the weak and unintegrated IT for fisheries sector and lack of copyrighted anti-virus version, firewall, network and professional staff.

In some provinces expected to be involved in CRSD, the IT status is the same. For example, Thanh Hoa has 6 coastal districts and 53 coastal communes with 71,600 fishing vessels

while only one staff in charge of fisheries statistics at provincial level. There is no staff or collaborator conducting statistic at district and commune levels and only one computer is available for statistic work. Similarly, Ca Mau province has 22 coastal communes under 6 coastal districts with 4,926 fishing vessels. In this province, only one staff, nine staff and eight staff in charge of statistic at provincial, district and commune levels respectively but they are part-time staff because they are working in fisheries extension sector. In addition, IT for fisheries sector in Ca Mau has not been fully invested. Just few computers are used for fisheries statistics.

3.4. Issues to be solved for planning and capacity building in management and organization

- Sustainable coastal resource management capacity is weak and limited in the information sharing among sectors and levels in the province. The duties on coastal planning are imposed on different ministries. The planning work at provincial level is conducted in accordance with sector's tradition that leads to the unharmonization or even overlap among sectors. The investment from private sector is estimated not to be reflected in the State planning, like the experience in aquaculture and support facilities. The coincident investment is occurred (e.g. fishing ports, shelters) and provinces compete with each other without synergy. The planners and policy makers work based on the limited data, even the estimated fish availability, the fish composition in a catch or even the number of fishing vessels go to fish at different places.
- The legal basis, policy and measures for management improvement are available but there is a gap in implementation. For example, fisheries sector overall masterplan to 2010 and vision to 2020 which was approved by the Prime Minister in 2006 addresses clear objective to 2010 that allows 50,000 small fishing vessels to fish in inshore areas but this number in fact exceeds 100,000 vessels. In 2009, the Government issued Decree No. 25 allowing the integrated management of coastal areas measures. In 2010, Decree No. 33 of the Government was issued to manage the fishing activities by authorizing the management of near shore fishing areas to local authorities at province, district and commune levels for comanagement of coastal fisheries resources. Due to difficulty in budget and personnel, the implementation of such decrees at local level is limited.
- Opportunity for organizational improvement of coastal resources planning. Fisheries sector development master plan to 2010 was expired last year and the Government is in preparation of new fisheries sector development master plan to 2020. The important thing is that this master plan abandons the previous important focus related to increase of catch and productivity in short-term basis to focus on the improvement of resources management and replenishment of fisheries resources, increase of product value and quality on the long term. There is a need to support the government in this important planning. At the same time, there are opportunities for take full use of current software *Vnfishbase* to provide integrated data for the sector including capture fisheries (such as registration of fishing vessels, fishing license and fish landing sites) and aquaculture (farming areas, fish species, environmental conditions, disease status etc...). There is a need for investment in this system with qualified staff at district and commune levels to collect, update and manage data as required. At each province or provinces related, there is still a room for the establishment and implementation of integrated coastal management plans.

APPENDIX 6. ESTIMATED PROJECT COST

Coastal resources for sustainable development Table 101. Component A – Capacity strengthening - CA MAU

Evnance					Qu	antity				Amount						Including
	Expenses	Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	IDA
Α.	I. Investment Coastal spatial planning															
	 Training on coastal management and spatial planning Survey, environmental and social assessment of 	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	10.0
	coastal areas	District	3	3	-	-	-	6	10	30.0	30.0	-	-	-	60.0	60.0
	Biodiversity and marine resources assessment Integrated spatial planning for aquaculture, coastal	District	3	3	-	-	-	6	10	30.0	30.0	-	-	-	60.0	60.0
	capture fisheries Sub-total A	district	3	3	-	-	-	6	13	39.0 101.0	39.0 101.0	2.0	2.0	2.0	78.0 208.0	78.0 208.0
B.	Studies to support provincial integrated planning 1. Study to support province's overall masterplan	Year	1	1	1	-	-	3	15	15.0	15.0	15.0	-	-	45.0	45.0
	2. Strategic environmental assessment	Lump	-	1	-	-	-	1	30	-	30.0	-	-	-	30.0	30.0
	3. Workshops	Year	1	1	1	1	1	5	3	3.0	3.0	3.0	3.0	3.0	15.0	15.0
C.	Sub-total B Upgrading fisheries database and information system									18.0	48.0	18.0	3.0	3.0	90.0	90.0
	Equipment (province, district, commune) Training	Lump sum	1	-	-	-	-	1	50	50.0	-	-	-	-	50.0	50.0
	Training Contracted staff in charge of information collection and system maintenance	Year Year	1	1	1	1	1	5 5	2 10	2.0	2.0	2.0	2.0	2.0	10.0 50.0	10.0 50.0
D.	Sub-total C Establishment of knowledge management system	i c ai	'	'	'	'	'	3	10	62.0	12.0	12.0	12.0	12.0	110.0	110.0
Б.	Set up provincial website	Lump sum	1	_	_	_	_	1	5	5.0	-	_	-	_	5.0	5.0
	2. Training	Year	1	1	1	1	1	5	1	1.0	1.0	1.0	1.0	1.0	5.0	5.0
	3. Website maintenance and update website	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	10.0
	Sub-total D TOTAL									8.0 189.0	3.0 164.0	3.0 35.0	3.0 20.0	3.0 20.0	20.0 428.0	20.0 428.0

Coastal resources for sustainable development **Table 102. Component A – Capacity strengthening - SOC TRANG**

	Expenses		Quantity								Amount						
			Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	Including IDA	
I. Inv	estment																
A.	Coastal spatial planning 1. Training on coastal management and spatial planning	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	10.0	
	2. Survey, environmental and social assessment of coastal areas	District	2	1	_	-	_	3	10	20.0	10.0	_	-	-	30.0	30.0	
	3. Biodiversity and marine resources assessment4. Integrated spatial planning for aquaculture,	District	2	1	-	-	-	3	10	20.0	10.0	-	-	-	30.0	30.0	
	coastal capture fisheries	district	2	1	-	-	-	3	15	30.0	15.0	-	-	-	45.0	45.0	
В.	Sub-total A Studies to support provincial integrated planning									72.0	37.0	2.0	2.0	2.0	115.0	115.0	
	1. Study to support province's overall masterplan	Year	1	1	1	-	-	3	15	15.0	15.0	15.0	-	-	45.0	45.0	
	2. Strategic environmental assessment	Lump sum	-	1	_	_	_	1	30	_	30.0	_	_	_	30.0	30.0	
	3. Workshops	Year	1	1	1	1	1	5	3	3.0	3.0	3.0	3.0	3.0	15.0	15.0	
C.	Sub-total B Upgrading fisheries database and information system									18.0	48.0	18.0	3.0	3.0	90.0	90.0	
		Lump															
	Equipment (province, district, commune)	sum	1	-	-	-	-	1	30	30.0	-	-	-	-	30.0	30.0	
	Training Contracted staff in charge of information	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	10.0	
	collection and system maintenance	Year	1	1	1	1	1	5	10	10.0	10.0	10.0	10.0	10.0	50.0	50.0	
D.	Sub-total C Establishment of knowledge management system									42.0	12.0	12.0	12.0	12.0	90.0	90.0	
	1. Set up provincial website	Lump sum	1	_	_	_	_	1	5	5.0	-	_	_	_	5.0	5.0	
	2. Training	Year	1	1	1	1	1	5	1	1.0	1.0	1.0	1.0	1.0	5.0	5.0	
	3. Website maintenance and update website	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	10.0	
	Sub-total D								•	8.0	3.0	3.0	3.0	3.0	20.0	20.0	
TOTA	L									140.0	100.0	35.0	20.0	20.0	315.0	315.0	

Coastal resources for sustainable development **Table 103. Component A – Capacity strengthening - KHANH HOA**

	Evnonaga				Qı	uantity	1		_			Amo	unt			Including
	Expenses	Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	IDA
I. Inv A.	estment Coastal spatial planning															
	 Training on coastal management and spatial planning Survey, environmental and social assessment 	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	10.0
	of coastal areas	District	2	2	1	-	-	5	10	20.0	20.0	10.0	-	-	50.0	50.0
	3. Biodiversity and marine resources assessment4. Integrated spatial planning for aquaculture,	District	2	2	1	-	-	5	10	20.0	20.0	10.0	-	-	50.0	50.0
	coastal capture fisheries	district	2	3	-	-	-	5	15	30.0	45.0	-	-	-	75.0	75.0
В.	Sub-total A Studies to support provincial integrated planning									72.0	87.0	22.0	2.0	2.0	185.0	185.0
	Study to support province's overall masterplan	Year Lump	1	1	1	-	-	3	15	15.0	15.0	15.0	-	-	45.0	45.0
	Strategic environmental assessment	sum	_	1	_	_	_	1	30	_	30.0	_	_	_	30.0	30.0
	3. Workshops	Year	1	1	1	1	1	5	3	3.0	3.0	3.0	3.0	3.0	15.0	15.0
C.	Sub-total B Upgrading fisheries database and information system								-	18.0	48.0	18.0	3.0	3.0	90.0	90.0
	·	Lump														
	 Equipment (province, district, commune) 	sum	1	-	-	-	-	1	55	55.0	-	-	-	-	55.0	55.0
	Training Contracted staff in charge of information	Year	1	1	1	1	1	5	5	5.0	5.0	5.0	5.0	5.0	25.0	25.0
	collection and system maintenance Sub-total C	Year	1	1	1	1	1	5	10 _	10.0 70.0	10.0 15.0	10.0 15.0	10.0 15.0	10.0 15.0	50.0 130.0	50.0 130.0
D.	Establishment of knowledge management system									. 0.0						.00.0
	Set up provincial website	Lump sum	1	_	_	_	_	1	5	5.0	_	_	_	_	5.0	5.0
	2. Training	Year	1	1	1	1	1	5	1	1.0	1.0	1.0	1.0	1.0	5.0	5.0
	3. Website maintenance and update website	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	10.0
	Sub-total D								=	8.0	3.0	3.0	3.0	3.0	20.0	20.0
TOTA	L									168.0	153.0	58.0	23.0	23.0	425.0	425.0

Coastal resources for sustainable development **Table 104. Component A – Capacity strengthening - PHU YEN**

	Expenses				Qι	antity			_			Amo	unt			Including
	Expenses	Unit	Y1	Y2	Y3	Y4	Y5	Unit	Price	Y1	Y2	Y3	Y4	Y5	Total	IDA
l lnv	estment															
Α.	Coastal spatial planning															
Λ.	Training on coastal management and spatial															
	planning	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	10.0
	2. Survey, environmental and social assessment of															
	coastal areas	District	2	2	-	-	-	4	10	20.0	20.0	-	-	-	40.0	40.0
	Biodiversity and marine resources assessment Integrated spatial planning for aquaculture,	District	2	2	-	-	-	4	10	20.0	20.0	-	-	-	40.0	40.0
	coastal capture fisheries	district	2	3	-	-	-	5	15	30.0	45.0	-	-	-	75.0	75.0
	Sub-total A									72.0	87.0	2.0	2.0	2.0	165.0	165.0
В.	Studies to support provincial integrated planning															
	Study to support province's overall masterplan	Year	1	1	1	-	-	3	15	15.0	15.0	15.0	-	-	45.0	45.0
	2. Strategic environmental assessment	Lump sum		4				1	30		30.0	_			30.0	30.0
	3. Workshops	Year	1	1	1	1	1	5	30	3.0	3.0	3.0	3.0	3.0	15.0	15.0
	Sub-total B	Tour			'	'	•	9	٠ -	18.0	48.0	18.0	3.0	3.0	90.0	90.0
	Upgrading fisheries database and information									10.0	40.0	10.0	0.0	0.0	50.0	30.0
C.	system															
		Lump														
	 Equipment (province, district, commune) 	sum	1	-	-	-	-	1	50	50.0	-	-	-	-	50.0	50.0
	2. Training	Year	1	1	1	1	1	5	5	5.0	5.0	5.0	5.0	5.0	25.0	25.0
	3. Contracted staff in charge of information	Voor	4	4	4	4	1	5	10	10.0	10.0	10.0	10.0	10.0	E0.0	E0.0
	collection and system maintenance Sub-total C	Year	I	ı	ı	ı	ı	5	10	10.0 65.0	10.0 15.0	10.0 15.0	10.0 15.0	10.0 15.0	50.0 125.0	50.0 125.0
	Establishment of knowledge management									65.0	15.0	15.0	15.0	15.0	125.0	123.0
D.	system															
	•	Lump														
	Set up provincial website	sum	1	-	-	-	-	1	5	5.0	-	-	-	-	5.0	5.0
	2. Training	Year	1	1	1	1	1	5 5	1	1.0	1.0	1.0	1.0	1.0	5.0	5.0
	3. Website maintenance and update website	Year	1	1	1	1	1	5	2 _	2.0	2.0	2.0	2.0	2.0	10.0	10.0
	Sub-total D								=	8.0	3.0	3.0	3.0	3.0	20.0	20.0
TOTA	L									163.0	153.0	38.0	23.0	23.0	400.0	400.0

Coastal resources for sustainable development **Table 105. Component A – Capacity strengthening - BINH DINH**

	Expenses				Qι	antity			_			Amoı	unt			Including
	схрензез	Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	IDA
l. Inve	stment															
A.	Coastal spatial planning															
	Training on coastal management and spatial	V				_		-	•	0.0	0.0	0.0	0.0	0.0	40.0	40.0
	planning 2. Survey, environmental and social assessment of	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	10.0
	coastal areas	District	2	3	_	_	_	5	10	20.0	30.0	_	_	_	50.0	50.0
	Biodiversity and marine resources assessment	District	2	3	_		_	5	10	20.0	30.0	_	_	_	50.0	50.0
	Integrated spatial planning for aquaculture, coastal	District	_	J				3	10	20.0	50.0				30.0	30.0
	capture fisheries	district	2	3	-	-	-	5	15	30.0	45.0	-	-	-	75.0	75.0
	Sub-total A								-	72.0	107.0	2.0	2.0	2.0	185.0	185.0
B.	Studies to support provincial integrated planning															
	1. Study to support province's overall masterplan	Year	1	1	1	-	-	3	15	15.0	15.0	15.0	-	-	45.0	45.0
	2. Strategic environmental assessment	Lump														
	2. Strategic environmental assessment	sum	-	1	-	-	-	1	30	-	30.0	-	-	-	30.0	30.0
	3. Workshops	Year	1	1	1	1	1	5	3 _	3.0	3.0	3.0	3.0	3.0	15.0	15.0
	Sub-total B									18.0	48.0	18.0	3.0	3.0	90.0	90.0
	Upgrading fisheries database and information															
C.	system	Luman														
	Equipment (province, district, commune)	Lump sum	1	_	_		_	1	50	50.0	_	_	_	_	50.0	50.0
	2. Training	Year	1	1	1	1	1	5	5	5.0	5.0	5.0	5.0	5.0	25.0	25.0
	3. Contracted staff in charge of information collection	i Gai		'	'	'	'	3	3	5.0	5.0	5.0	5.0	5.0	25.0	25.0
	and system maintenance	Year	1	1	1	1	1	5	10	10.0	10.0	10.0	10.0	10.0	50.0	50.0
	Sub-total C								-	65.0	15.0	15.0	15.0	15.0	125.0	125.0
	Establishment of knowledge management															
D.	system															
	1. Set up provincial website	Lump	4					4	F	5.0					F 0	5.0
	2. Training	sum	- 1	-	-	-	-		5		- 10	- 1.0	- 1.0	- 10	5.0	
	Website maintenance and update website	Year	 	 	 	 	1	5 5	2	1.0 2.0	1.0	1.0	1.0	1.0	5.0	5.0
	•	Year	ı	I	ı	I	ı	5	2_		2.0	2.0	2.0	2.0	10.0	10.0
TOTA	Sub-total D								-	8.0	3.0	3.0	3.0	3.0	20.0	20.0
TOTA	-									163.0	173.0	38.0	23.0	23.0	420.0	420.0

Coastal resources for sustainable development

Table 106. Component A – Capacity strengthening - THANH HOA

	Evnances				Qι	uantity	,					Amo	unt			Including
	Expenses	Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	IDA
I Inv	estment															
Α.	Coastal spatial planning															
,	Training on coastal management and spatial															
	planning	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	10.0
	2. Survey, environmental and social assessment															
	of coastal areas	District	3	3	-	-	-	6	10	30.0	30.0	-	-	-	60.0	60.0
	3. Biodiversity and marine resources assessment4. Integrated spatial planning for aquaculture,	District	3	3	-	-	-	6	10	30.0	30.0	-	-	-	60.0	60.0
	coastal capture fisheries	district	3	3	_	_	-	6	13	39.0	39.0	_	_	_	78.0	78.0
	Sub-total A								-	101.0	101.0	2.0	2.0	2.0	208.0	208.0
	Studies to support provincial integrated											_				
B.	planning															
	1. Study to support province's overall masterplan	Year	1	1	1	-	-	3	15	15.0	15.0	15.0	-	-	45.0	45.0
	2. Strategic environmental assessment	Lump														
		sum	-	1	-	-	-	1	30	-	30.0	-	-	-	30.0	30.0
	3. Workshops	Year	1	1	1	1	1	5	3	3.0	3.0	3.0	3.0	3.0	15.0	15.0
	Sub-total B									18.0	48.0	18.0	3.0	3.0	90.0	90.0
0	Upgrading fisheries database and information															
C.	system	Lumn														
	1. Equipment (province, district, commune)	Lump sum	- 1					- 1	50	50.0					50.0	50.0
	2. Training	Year	1	- 1	- 1	- 1	- 1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	10.0
	3. Contracted staff in charge of information	i eai	'	1	ı	ı	'	5	2	2.0	2.0	2.0	2.0	2.0	10.0	10.0
	collection and system maintenance	Year	1	1	1	1	1	5	10	10.0	10.0	10.0	10.0	10.0	50.0	50.0
	Sub-total C		-	•	•	•	-	Ū		62.0	12.0	12.0	12.0	12.0	110.0	110.0
	Establishment of knowledge management									00						
D.	system															
	Set up provincial website	Lump														
		sum	1	-	-	-	-	1	5	5.0	-	-	-	-	5.0	5.0
	2. Training	Year	1	1	1	1	1	5	1	1.0	1.0	1.0	1.0	1.0	5.0	5.0
	3. Website maintenance and update website	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	10.0
	Sub-total D									8.0	3.0	3.0	3.0	3.0	20.0	20.0
TOTA	L									189.0	164.0	35.0	20.0	20.0	428.0	428.0

Coastal resources for sustainable development **Table 107. Component A – Capacity strengthening - NGHE AN**

	Expenses				Qι	uantity	•		_			Amoı	unt			Including
	Lxpenses	Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	IDA
Llove	stment															
Α.	Coastal spatial planning															
71.	Training on coastal management and spatial															
	planning	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	10.0
	2. Survey, environmental and social assessment of															
	coastal areas	District	2	2	-	-	-	4	10	20.0	20.0	-	-	-	40.0	40.0
	Biodiversity and marine resources assessment Integrated spatial planning for aquaculture,	District	2	2	-	-	-	4	10	20.0	20.0	-	-	-	40.0	40.0
	coastal capture fisheries	district	2	2	-	-	-	4	15 _	30.0	30.0	-	-	-	60.0	60.0
	Sub-total A									72.0	72.0	2.0	2.0	2.0	150.0	150.0
В.	Studies to support provincial integrated planning															
	Study to support province's overall masterplan	Year	1	1	1	-	-	3	15	15.0	15.0	15.0	-	-	45.0	45.0
	2. Strategic environmental assessment	Lump														
	·	sum	-	1	-	-	-	1	30	-	30.0	-	-	-	30.0	30.0
	3. Workshops	Year	1	1	1	1	1	5	3 _	3.0	3.0	3.0	3.0	3.0	15.0	15.0
	Sub-total B Upgrading fisheries database and information									18.0	48.0	18.0	3.0	3.0	90.0	90.0
C.	system															
٥.	- Control of the cont	Lump														
	1. Equipment (province, district, commune)	sum	1	-	-	-	-	1	50	50.0	-	-	-	-	50.0	50.0
	2. Training	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	10.0
	Contracted staff in charge of information	\ <u>/</u>					4	_	40	40.0	400	40.0	400	400	50.0	50.0
	collection and system maintenance	Year	1	1	1	1	1	5	10 _	10.0	10.0	10.0	10.0	10.0	50.0	50.0
	Sub-total C Establishment of knowledge management									62.0	12.0	12.0	12.0	12.0	110.0	110.0
D.	system															
٥.		Lump														
	Set up provincial website	sum	1	-	-	-	-	1	5	5.0	-	-	-	-	5.0	5.0
	2. Training	Year	1	1	1	1	1	5	1	1.0	1.0	1.0	1.0	1.0	5.0	5.0
	3. Website maintenance and update website	Year	1	1	1	1	1	5	2 _	2.0	2.0	2.0	2.0	2.0	10.0	10.0
	Sub-total D								=	8.0	3.0	3.0	3.0	3.0	20.0	20.0
TOTAL	-									160.0	135.0	35.0	20.0	20.0	370.0	370.0

Coastal resources for sustainable development **Table 108. Component A – Capacity strengthening - HA TINH**

	Cynanaga				Qι	antity	,					Amo	unt			Including
	Expenses	Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	IDA
l lmv	estment															
1. IIIV	Coastal spatial planning															
A.	Training on coastal management and spatial															
	planning	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	10.0
	2. Survey, environmental and social assessment	. • • •	•	•	•	•		Ū	_							
	of coastal areas	District	2	3	-	-	-	5	10	20.0	30.0	-	-	-	50.0	50.0
	3. Biodiversity and marine resources assessment	District	2	3	-	-	-	5	10	20.0	30.0	-	-	-	50.0	50.0
	4. Integrated spatial planning for aquaculture,															
	coastal capture fisheries	district	2	3	-	-	-	5	15 _	30.0	45.0	-	-	-	75.0	75.0
	Sub-total A									72.0	107.0	2.0	2.0	2.0	185.0	185.0
В.	Studies to support provincial integrated planning															
Б.	Study to support province's overall masterplan	Year	1	1	1		_	3	15	15.0	15.0	15.0		_	45.0	45.0
	, , ,	Lump	'	'	'			3	13	13.0	13.0	13.0			45.0	45.0
	2. Strategic environmental assessment	sum	_	1	_	_	_	1	30	_	30.0	_	-	_	30.0	30.0
	3. Workshops	Year	1	1	1	1	1	5	3	3.0	3.0	3.0	3.0	3.0	15.0	15.0
	Sub-total B								-	18.0	48.0	18.0	3.0	3.0	90.0	90.0
	Upgrading fisheries database and information															
C.	system															
	4 5	Lump							50	50.0					50.0	50.0
	Equipment (province, district, commune) Training	sum	1	-	-	_	- 1	1	50	50.0	-	-	-	-	50.0	50.0
	Training Contracted staff in charge of information	Year	ı	ı	ı	ı	ı	5	5	5.0	5.0	5.0	5.0	5.0	25.0	25.0
	collection and system maintenance	Year	1	1	1	1	1	5	10	10.0	10.0	10.0	10.0	10.0	50.0	50.0
	Sub-total C	roui		•		•		· ·	10 _	65.0	15.0	15.0	15.0	15.0	125.0	125.0
	Establishment of knowledge management									00.0	10.0	10.0	10.0	10.0	.20.0	120.0
D.	system															
	1. Set up provincial website	Lump														
		sum	1	-	-	-	-	1	5	5.0				-	5.0	5.0
	2. Training	Year	1	1	1	1	1	5	1	1.0	1.0	1.0	1.0	1.0	5.0	5.0
	3. Website maintenance and update website	Year	1	1	1	1	1	5	2 _	2.0	2.0	2.0	2.0	2.0	10.0	10.0
TOT:	Sub-total D								=	8.0	3.0	3.0	3.0	3.0	20.0	20.0
TOTA	<u>L</u>									163.0	173.0	38.0	23.0	23.0	420.0	420.0

Coastal resources for sustainable development **Table 109. Component A – Capacity strengthening – PCU**

ıaı	ble 109. Component A – Capacity strengthening – PCO				Qu	antity						Am	ount			Including
	Expenses	Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	IDA
	L L															
I.	Investment A. Coastal spatial planning															
	 Technical support on coastal spatial planning and management 															
	International consultancy	month	3 5	0	0	0	0	3	25	75	0	0	0	0	75	75
	National consultancy	month	5	6	4	0	0	15	2	10	12	8	0	0	30	30
	Sub-total A.1									85	12	8	0	0	105	105
	Training on coastal spatial planning and management	year	1	1	1	0	0	3	2	2	2	2	0	0	6	6
	Sub-total A									87	14	10	0	0	111	111
	B. Studies to support provincial integrated planning (central															
	4 OFA for Colonian and the	Lump		•	•	•	^		450	450	•	•	0	0	450	450
	SEA for fisheries sector	sum	1	0	0	0	0	1	150	150	0	0	0	0	150	150
	Assessment of need and fisheries logistic services to	Lump	_	_	•	•	^		400	0	400	•	0	0	400	400
	2020	sum Lump	0	1	0	0	0	1	100	0	100	0	0	0	100	100
	3. Seed development and production to 2020	sum	0	1	0	0	0	1	50	0	50	0	0	0	50	50
		Lump	-									-		•		
	4. Capacity strengthening on planning	sum	1	0	0	0	0	1	300	300	0	0	0	0	300	300
	5. Workshop	year	1	1	1	1	1	5	10	10	10	10	10	10	50	50
	Sub-total B	,						_		460	160	10	10	10	650	650
	C. Upgrading fisheries database and information system											. •	. •			
	o. opg.comgo.co accessor andoc.	Lump														
	1. Set up fisheries database	sum	1	1	1	1	1	5	50	50	50	50	50	50	250	250
	The set of non-ones database	Lump	•	•	•	•	•	Ū							_00	_00
	Upgrade Vnfishbase software	sum	0	1	0	0	0	1	50	0	50	0	0	0	50	50
	3. Equipment	ou	Ŭ	•	Ū	Ū	Ū	•	00	Ū	00	Ū	Ū	Ū	00	00
	Server	set	0	6	0	0	0	6	40	0	240	0	0	0	240	240
	Data center system	set	Ö	3	Ö	Ö	Ö	3	70	Ö	210	Ö	Ö	Ö	210	210
	Internet administration system	set	Ö	1	0	0	0	1	50	0	50	0	Ö	Ö	50	50
	Desk top	set	Ö	25	0	Ö	0	25	1	0	25	0	0	0	25	25
	Laptop	set	0	10	0	0	0	10	2	0	20	0	0	0	20	20
	Internet line	set	0	1	0	0	0	1	10	0	10	0	0	0	10	10
	Set up LAN	set	0	1	0	0	0	i	35	0	35	0	0	0	35	35
	Firewall and attached equipment		0	6	0	0	0	6	5	0	30	0	0	0	30	30
	Server software	set set	0	12	0	0	0	12	5	0	60	0	0	0	60	60
	Security software for system and other software	set set	0	14	0	0	0	1	50	0	50	0	0	0	50	50
	Interior equipment for data center		0	1	0	0	0	1	40	0	40	0	0	0	40	40
	interior equipment for data center	Lump	U	ı	U	U	U	1	40	U	40	U	U	U	40	40

	sum														
Sub-total C.3									0	770	0	0	0	770	770
4. Workshop	year	1	1	1	1	1	5	20	20	20	20	20	20	100	100
Contracted staff and survey to collect information	Year	1	1	1	1	1	5	15	15	15	15	15	15	75	75
Sub-total C									85	905	85	85	85	1245	1245
D. Establishment of knowledge management system															
	Lump														
Set up website for MARD	sum	1	0	0	0	0	1	10	10	0	0	0	0	10	10
2. Training	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	25
Website maintenance and update	year	1	1	1	1	1	5	5	5	5	5	5	5	25	25
Sub-total D									20	10	10	10	10	60	60
TOTAL									652	1089	115	105	105	2066	2066

Coastal resources for sustainable development Table 201. Component B - GAP - CA MAU

Bule 201. Component B - GAP - CA MAO				Qı	uantity						Amo	ount				ncludin	a
Expenses	Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	СР	IDA	TN
l. Investment																	
A. Upgrade bio-security in farming sites																	
selected																	
1. Dissemination	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	_	25	_
Set up demonstration model	Model	8	8	8	8	_	32	25	200	200	200	200	-	800	-	200	600
3. Provide training for agricultural extension																	
staff and farmers on GAP/BMP	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
4. Upgrade bio-security at farming sites									-	_	_	-					
Technical support to farming site																	
assessment and planning	Commune	5	-	-	-	-	5	5	25	-	-	-	-	25	-	25	-
Upgrade farming site infrastructure	Site	-	2	3	-	-	5	200	-	400	600	-	-	1,000	-	1,000	-
Provincial contribution for upgrading of														,		,	
farming site facilities	Site	-	2	3	-	-	5	20	-	40	60	-	-	100	100	-	-
Sub-total A.4									25	440	660	-	-	1,125	100	1,025	-
5. GAP/BMP certification	Ha	-	-	100	200	200	500	0.1	-	-	10	20	20	50	-	50	-
6. Traceability of origin of seeds used in GAP																	
areas	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
7. Technical support and upgrade bio-security																	
in farming sites	Month	-	24	24	24	24	96	1	-	24	24	24	24	96	-	96	-
8. Enhance province and district																	
agricultural extension agencies																	
Provincial contribution for upgrading of																	
agricultural extension agency's office	Unit	6	-	-	-	-	6	0.5	3	-	-	-	-	3	3	-	-
Upgrade agricultural extension agency's																	
office	Unit	7	-	-	-	-	7	5	35	-	-	-	-	35	-	35	-
Equipment for agricultural extension																	
agency's office	unit	7	-	-	-	-	7	15	105	-	-	-	-	105	-	105	-
Sub total A.8									143	-	-	-	-	143	3	140	-
Independent assessment of GAP	Lump																
compliance	sum	-	-	-	-	1	1	10	-	-	-	-	10	10	-	10	-
Set up link among fish farmers and																	
market	Year	-	1	1	1	1	4	3	-	3	3	3	3	12	-	12	-
 Workshop to monitor and evaluate 	Year	1	1	1	1	-	4	3	3	3	3	3	-	12	-	12	-
Sub-total A									391	690	920	270	77	2,348	103	1,645	600
B. Improvement of seed quality (Use SPF seed																	
Dissemination, awareness improvement	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
Training for agricultural extension staff	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-

	LODEL																	
	and SPF hatchery																	
3	Upgrade infrastructure to ensure bio-			_	_	_	_				400	400	400	400	400		400	
Ū	security at hatcheries	hatchery	-	5	5	5	5	20	20	-	100	100	100	100	400	-	400	-
	Design/monitoring/public infrastructure	Lump																
4	upgrading for seed production	sum							_		_				_	_		
	consultancy		-	1	-	-	-	1	5	-	5	-	-	-	5	5	-	-
5	Support to public infrastructure for seed	Lump						_										
Ŭ	production	sum	-	1	1	-	-	2	25	-	25	25	-	-	50	-	50	-
6	Evaluate hatchery certification	Lump							_									
Ŭ	·	sum	-	20	-	-	-	20	2	-	40	-	-	-	40	-	40	-
7	Inspect, monitor brooders and seed							_										
	quality	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
8	Study seed production planning	year	-	1	-	-	-	1	20		20	-	-	-	20	-	20	
	total B									25	215	150	125	125	640	5	635	-
	provement of fish veterinary system																	
	Improve capacity on disease diagnosis at	provincial																
an	d district levels																	
	Construction for provincial sub-																	
	department of veterinary service	station	-	1	-	-	-	1	30	-	30	-	-	-	30	-	30	-
	Equipment for provincial sub-department	station																
	of veterinary service		-	1	-	-	-	1	100	-	100	-	-	-	100	-	100	-
	Construction for district sub-department	station																
	of veterinary service		-	4	4	-	-	8	30	-	120	120	-	-	240	-	240	-
	Equipment for district sub-department of	station																
	veterinary service		-	4	4	-	-	8	50	-	200	200	-	-	400	-	400	-
	Provincial contribution for upgrading of	station																
	province/district veterinary stations		-	5	4	-	-	9	3	-	15	12	-	-	27	27	-	-
_	Training	station	-	1	1	1	1	4	10	-	10	10	10	10	40	-	40	
Su	b-total C.1									-	475	342	10	10	837	27	810	-
2	Disease monitoring	year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
3	Set up and maintain disease reporting	year																
Ū	network		1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
4	Training for local veterinary staff	year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
5	Monthly meeting of district veterinary staff	year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
6	Control of disease outbreak (sterilization)	year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
7	Dissemination, awareness improvement	year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
8	Technical support to fish veterinary	year																
3	management		6	12	12	12	12	54	1	6	12	12	12	12	54	-	54	
	total C									46	527	394	62	62	1,091	27	1,064	-
	juaculture diversification																	
1.	Rehabilitation of provincial hatcheries																	
	Provincial contribution to hatchery																	
	upgrading	hatchery	-	1	-	-	-	1	30	-	30	-	-	-	30	30	-	-

	Construction	hatchery	-	1	-	-	-	1	100	-	100	-	-	-	100	-	100	-
_	Equipment	hatchery	-	1	-	-	-	1	100	-	100	-	-	-	100	-	100	-
Su	b-total D.1									-	230	-	-	-	230	30	200	-
2	Set up demonstration model	Model	-	5	5	5	5	20	20	-	100	100	100	100	400	-	100	300
3	Upgrade infrastructure to support																	
U	aquaculture diversification	District	-	5	-	-	-	5	200	-	1,000	-	-	-	1,000	-	1,000	-
	Local contribution for upgrading																	
4	infrastructure for aquaculture																	
	diversification	District	-	5	-	-	-	5	20	-	100	-	-	-	100	100	-	-
	Training for agricultural extension staff,																	
5	hatcheries staff and farmers	Year	-	1	1	1	1	4	10	-	10	10	10	10	40	-	40	-
6	Dissemination, awareness improvement	year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
7	Evaluation, workshop	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
Sub-	total D									10	1,450	120	120	120	1,820	130	1,390	300
E. Wa	ater quality monitoring																	
1.	Support DONRE																	
		Lump																
	Equipment	sum	-	1	-	-	-	1	200	-	200	-	-	-	200	-	200	-
	Training	Year	-	1	1	1	1	4	10		10	10	10	10	40	-	40	-
Su	b-total E.1									-	210	10	10	10	240	-	240	-
2	Water quality monitoring	Year	-	1	1	1	1	4	30	-	30	30	30	30	120	-	120	-
3	Workshops	Year	1	1	1	1	1	5	3	3	3	3	3	3	15	-	15	-
Sub-	total E									3	243	43	43	43	375	-	375	<u> </u>
TOTA	AL .									475	3,125	1,627	620	427	6,274	265	5,109	900

Coastal resources for sustainable development Table 202. Component B - GAP - SOC TRANG

	Expenses				Qu	antity			_			Amo	unt				Including	3
	LAPETISES	Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	СР	IDA	TN
I.	Investment																	
	A. Upgrade bio security in farming sites selected																	
	1. Dissemination	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
	Set up demonstration model Provide training for agricultural extension staff	Model	5	5	5	5	-	20	25	125	125	125	125	-	500	-	125	375
	and farmers on GAP/BMP	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
	Upgrade bio-security at farming sites Technical support to farming site assessment and planning	Commune	6	_	_	_	_	6	5	30	_	_	_	_	30	_	30	_
	Upgrade farming site infrastructure	Site	-	2	3	_		5	300	-	600	900	_	_	1,500	_	1,500	
	Provincial contribution for upgrading of		-	2	3	-	-			-	000		-	-	1,500	-	1,500	-
	farming site facilities	Site	-	2	3	-	-	5	30		60	90	-	-	150	150	-	
	Sub-total A.4									30	660	990	-	-	1,680	150	1,530	-
	GAP/BMP certification Traceability of origin of seeds used in GAP	На	-	-	100	200	-	300	0.1	-	-	10	20	-	30	-	30	-
	areas 7. Technical support and upgrade bio-security in	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
	farming sites 8. Enhance province and district agricultural extension agencies	Month	-	24	24	24	24	96	1	-	24	24	24	24	96	-	96	-
	Provincial contribution for upgrading of agricultural extension agency's office Upgrade agricultural extension agency's	Unit	6	-	-	-	-	6	2	12	-	-	-	-	12	12	-	-
	office Equipment for agricultural extension	Unit	6	-	-	-	-	6	20	120	-	-	-	-	120	-	120	-
	agency's office	Unit	6	-	-	-	-	6	20	120	-	-	-	-	120	-	120	
	Sub-total A.8									252	-	-	-	-	252	12	240	-
	9. Independent assessment of GAP compliance	Lump sum	-	-	-	-	1	1	10	-	-	-	-	10	10	-	10	-
	10. Set up link among fish farmers and market	Year	-	1	1	1	1	4	3	-	3	3	3	3	12	-	12	-
	11. Workshop to monitor and evaluate	Year	1	1	1	1	-	4	3	3	3	3	3	-	12	-	12	
	Sub-total A									430	835	1,175	195	57	2,692	162	2,155	375

	provement of seed quality (Use SPF seeds)	.,						_	_	_	_	_	_	_				
1	Dissemination, awareness improvement Training for agricultural extension staff and	_ Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
2	SPF hatchery	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
3	Upgrade infrastructure to ensure biosecurity at hatcheries	Hatchery	_	3	_	_	_	3	20	_	60	_	-	-	60	_	60	-
4	Design/monitoring/public infrastructure upgrading for seed production consultancy	Lump sum	_	1	_	_	_	1	5	_	5	_	_	_	5	5	_	
5	Support to public infrastructure for seed	Lump sum		'				,							_		50	
6	production Evaluate hatchery certification	Lump sum	-	1 6	-	-	-	1 6	50 2	-	50 12	-	-	-	50 12	-	50 12	-
7	Inspect, monitor brooders and seed quality	V	_	4	_	_	_	·		10		10	10	10		_		_
8	Study seed production planning	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
	, , ,	Year	-	1	-	-	-	1	20		20	-	-	-	20	-	20	
Sub-to	otal B									25	172	25	25	25	272	5	267	-
	trict levels Construction for provincial sub-department of veterinary service Equipment for provincial sub-department of veterinary service Construction for district sub-department of veterinary service Equipment for district sub-department of veterinary service Equipment for district sub-department of veterinary service Provincial contribution for upgrading of province/district veterinary stations Training	Station Station Station Station Station	- - - -	1 1 2 2 5 1	- 2 2 - 1	- - - - 1	- - - - 1	1 1 4 4 5 4	30 100 30 50 3 10	- - - -	30 100 60 100 15 10	- 60 100 - 10	- - - - -	- - - - -	30 100 120 200 15 40	- - - - 15	30 100 120 200 - 40	- - - -
Su	b-total C.1									-	315	170	10	10	505	15	490	-
2	Disease monitoring	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
3	Set up and maintain disease reporting network	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	_	25	-
4	Training for local veterinary staff	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	_	25	_
5	Monthly meeting of district veterinary staff	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
6	Control of disease outbreak (sterilization)	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	_	50	_
7	Dissemination, awareness improvement	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	_	25	-
8	Technical support to fish veterinary management	Year	6	12	12	12	12	54	1	6	12	12	12	12	54	-	54	-
Sub-to	otal C									46	367	222	62	62	759	15	744	-

D. Aq	uaculture diversification																	
1.	Rehabilitation of provincial hatcheries																	
	Provincial contribution to hatchery upgrading	Hatchery	-	1	-	-	-	1	30	-	30	-	-	-	30	30	-	-
	Construction	Hatchery	-	1	-	-	-	1	200	-	200	-	-	-	200	-	200	-
	Equipment	Hatchery	-	1	-	-	-	1	100		100	-	-	-	100	-	100	<u>-</u>
Su	b-total D.1									-	330	-	-	-	330	30	300	-
2	Set up demonstration model	Model	8	8	8	8	8	40	20	160	160	160	160	160	800	-	200	600
3	Upgrade infrastructure to support aquaculture diversification Local contribution for upgrading	District	-	1	1	-	-	2	400	-	400	400	-	-	800	-	800	-
4	infrastructure for aquaculture diversification Training for agricultural extension staff,	District	-	1	1	-	-	2	40	-	40	40	-	-	80	80	-	-
5	hatcheries staff and farmers	Year	-	1	1	1	1	4	10	-	10	10	10	10	40	-	40	-
6	Dissemination, awareness improvement	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
7	Evaluation, workshop	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	_
Sub-t	otal D									170	950	620	180	180	2,100	110	1,390	600
E. Wa	ter quality monitoring																	
1.	Support DONRE																	
	Equipment	Lump sum	-	1	-	-	-	1	200	-	200	-	-	-	200	-	200	-
	Training	Year	-	1	1	1	1	4	10		10	10	10	10	40	-	40	-
Su	b-total E.1									-	210	10	10	10	240	-	240	-
2	Water quality monitoring	Year	-	1	1	1	1	4	30	-	30	30	30	30	120	-	120	-
3	Workshops	Year	1	1	1	1	1	5	3	3	3	3	3	3	15	-	15	
Sub-t	otal E									3	243	43	43	43	375	-	375	
TOTA	L									674	2,567	2,085	505	367	6,198	292	4,931	975

Coastal resources for sustainable development Table 203. Component B - GAP - KHANH HOA

Expenses				Qı	uantity	,					Amo	unt			Ir	cluding	<u> </u>
Expenses	Unit	Y 1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	Govt	IDA	TN
I. Investment																	
A. Upgrade bio security in farming sites selected																	
1. Dissemination	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
2. Set up demonstration model3. Provide training for agricultural extension staff and farmers on GAP/BMP	Model Year	4	4	4	4	- 1	16 5	25 10	100 10	100 10	100 10	100 10	- 10	400 50	-	100 50	300
4. Upgrade bio-security at farming sites Technical support to farming site assessment and planning	Commune	2	-	-	-	-	2	5	10	-	-	-	-	10	-	10	-
Upgrade farming site infrastructure Provincial contribution for upgrading of farming site facilities	Site Site	-	2	-	-	-	2	200 20	-	400 40	-	-	-	400 40	- 40	400	-
Sub-total A.4									10	440	_	_	_	450	40	410	_
5. GAP/BMP certification6. Traceability of origin of seeds used in GAP	На	-	-	200	100	100	400	0.1	-	-	20	10	10	40	-	40	-
areas 7. Technical support and upgrade bio-security in	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
farming sites 8. Enhance province and district agricultural extension agencies Provincial contribution for upgrading of	Month	-	24	24	24	24	96	1	-	24	24	24	24	96	-	96	-
agricultural extension agency's office Upgrade agricultural extension agency's	Unit	5	-	-	-	-	5	2	10	-	-	-	-	10	10	-	-
office Equipment for agricultural extension	Unit	5	-	-	-	-	5	20	100	-	-	-	-	100	-	100	-
agency's office	Unit	5	-	-	-	-	5	20	100	-	-	-	-	100	-	100	
Sub-total A.8	Lump								210	-	-	-	-	210	10	200	-
9. Independent assessment of GAP compliance	sum	-	-	-	-	1	1	10	-	-	-	-	10	10	-	10	-
10. Set up link among fish farmers and market	Year	-	1	1	1	1	4	3	-	3	3	3	3	12	-	12	-
11. Workshop to monitor and evaluate	Year	1	1	1	1	-	4	3	3	3	3	3	-	12	-	12	
Sub-total A									343	590	170	160	67	1,330	50	980	300

B. Im	provement of seed quality (Use SPF seeds)																	
1	Dissemination, awareness improvement	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
2	Training for agricultural extension staff and SPF hatchery	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	_	50	_
3	Upgrade infrastructure to ensure bio-security at hatcheries	hatchery	5	10	15	15	-	45	20	100	200	300	300	-	900	-	900	-
4	Design/monitoring/public infrastructure upgrading for seed production consultancy	Lump sum	1	1	1	-	-	3	120	120	120	120	-	-	360	360	-	-
5	Support infrastructure for Ninh Van hatchery																	
	Package 1&2	Year	1	-	-	-	-	1	1,000	1,000	-	-	-	-	1,000	-	1,000	-
	Package 3&4	Year	-	1	-	-	-	1	1,000	-	1,000	-	-	-	1,000	-	1,000	-
	Package 5&6	Year	-	-	1	-	-	1	1,600		-	1,600	-	-	1,600	-	1,600	
Sı	ıb-total B.5									1,000	1,000	1,600	-	-	3,600	-	3,600	-
6	Evaluate hatchery certification	Lump sum	0	5	10	15	15	45	2	-	10	20	30	30	90	-	90	-
7	Inspect, monitor brooders and seed quality	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
8	Study seed production planning	Year	-	1	-	-	-	1	20	-	20	-	-	-	20	-	20	-
Sub-	total B									1,245	1,375	2,065	355	55	5,095	360	4,735	-
1.	provement of fish veterinary system Improve capacity on disease diagnosis at pro id district levels	vincial																
	Construction for provincial sub-department of veterinary service Equipment for provincial sub-department of	Station	-	1	-	-	-	1	30	-	30	-	-	-	30	-	30	-
	veterinary service Construction for district sub-department of	Station	-	1	-	-	-	1	100		100	-	-	-	100	-	100	
	veterinary service Equipment for district sub-department of	Station	0	5	0	0	0	5	30	-	150	-	-	-	150	-	150	-
	veterinary service Provincial contribution for upgrading of	Station	-	5	-	-	-	5	50	-	250	-	-	-	250	-	250	-
	province/district veterinary stations	Station	-	6	-	-	-	6	3	-	18	-	-	-	18	18	-	-
	Training	Station	-	1	1	1	1	4	10	-	10	10	10	10	40	-	40	-
Sı	ıb-total C.1									-	558	10	10	10	588	18	570	-
2	Disease monitoring	Station	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
3	Set up and maintain disease reporting network	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-

4	Training for local veterinary staff	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	_	25	_
5	Monthly meeting of district veterinary staff	Year	1	1	1	1	1	5	5	5	5	<u>5</u>	 5	 5	25	_	25	
6	Control of disease outbreak (sterilization)	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	_	50	
7	Dissemination, awareness improvement	Year	4	4	1	1	1	5	5	5	5	5	5	5	25	_	25	_
8	Technical support to fish veterinary management	Year	6	12	12	12	12	5 54	1	6	5 12	5 12	12	5 12	25 54	-	25 54	-
Sub-	total C									46	610	62	62	62	842	18	824	-
D. A c	quaculture diversification																	
1.	Rehabilitation of provincial hatcheries																	
	Provincial contribution to hatchery upgrading	Hatchery	-	1	-	-	-	1	30	-	30	-	-	-	30	30	-	-
	Construction	Hatchery	-	1	-	-	-	1	200	-	200	-	-	-	200	-	200	-
	Equipment	Hatchery	-	1	-	-	-	1	100	-	100	-	-	-	100	-	100	-
Sı	ibtotal- D.1									-	330	-	-	-	330	30	300	-
2	Set up demonstration model	Model	-	6	6	6	6	24	20	-	120	120	120	120	480	-	120	360
3	Upgrade infrastructure to support aquaculture diversification	District	-	1	-	-	-	1	200		200	-	-	-	200	-	200	
4	Local contribution for upgrading infrastructure for aquaculture diversification Training for agricultural extension staff,	District Year	0	1	0	0	0	1	20	-	20	-	-	-	20	20	-	-
5	hatcheries staff and farmers	rear	0	1	1	1	1	4	10	-	10	10	10	10	40	_	40	-
6	Dissemination, awareness improvement	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	_	25	_
7	Evaluation, workshop	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
Sub-	total D									10	690	140	140	140	1,120	50	710	360
E. W a	ater quality monitoring																	
1.	Support DONRE																	
	Equipment	Lump sum	-	1	-	-	-	1	200		200	-	-	-	200	-	200	
	Training	Year	0	1	1	1	1	4	10		10	10	10	10	40	-	40	
Sı	ıb-total E.1									-	210	10	10	10	240	-	240	
2	Water quality monitoring	Year	0	1	1	1	1	4	30	-	30	30	30	30	120	_	120	-
3	Workshops	Year	1	1	1	1	1	5	3	3	3	3	3	3	15	_	15	-
Sub-	total E									3	243	43	43	43	375	_	375	-
TOT	AL									1,647	3,508	2,480	760	367	8,762	478	7,624	660

Coastal resources for sustainable development Table 204. Component B - GAP – PHU YEN

Evnance				Qu	antity						Amo	ount			I	ncluding	
Expenses	Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	Govt	IDA	TN
. Investment																	
A. Upgrade bio security in farming sites selected																	
1. Dissemination	year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
2. Set up demonstration model	Model	2	2	2	3	3	12	25	50	50	50	75	75	300	-	75	225
3. Provide training for agricultural extension staff																	
and farmers on GAP/BMP	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
4. Upgrade bio-security at farming sites																	
Technical support to farming site assessment																	
and planning	Commune	2	-	-	-	-	2	5	10	-	-	-	-	10	-	10	-
Upgrade farming site infrastructure	Site	-	2	-	-	-	2	200	-	400	-	-	-	400	-	400	-
Provincial contribution for upgrading of																	
farming site facilities	Site	-	2	-	-	-	2	20	-	40	-	-	-	40	40	-	-
Sub-total A.4									10	440	-	-	-	450	40	410	-
GAP/BMP certification	На	-	-	100	200	-	300	0.1	-	-	10	20	-	30	-	30	-
6. Traceability of origin of seeds used in GAP																	
areas	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
7. Technical support and upgrade bio-security in																	
farming sites	Month	-	24	24	24	24	96	1	-	24	24	24	24	96	-	96	-
8. Enhance province and district agricultural																	
extension agencies																	
Provincial contribution for upgrading of																	
agricultural extension agency's office	Unit	3	-	-	-	-	3	2	6	-	-	-	-	6	6	-	-
Upgrade agricultural extension agency's																	
office	Unit	3	-	-	-	-	3	20	60	-	-	-	-	60	-	60	-
Equipment for agricultural extension agency's																	
office	Unit	3	-	-	-	-	3	20	60	-	-	-	-	60	-	60	-
Sub-total A.8									126	-	-	-	-	126	6	120	-
	Lump																
Independent assessment of GAP compliance	sum	-	-	-	-	1	1	10	-	-	-	-	10	10	-	10	-
Set up link among fish farmers and market	Year	-	1	1	1	1	4	3	-	3	3	3	3	12	-	12	-
Workshop to monitor and evaluate	year	1	1	1	1	-	4	3	3	3	3	3	-	12	-	12	-
Sub-total A									209	540	110	145	132	1,136	46	865	225
B. Improvement of seed quality (Use SPF seeds)																	
1 Dissemination, awareness improvement	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
Training for agricultural extension staff and	_																
2 SPF hatchery	year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
3 Upgrade infrastructure to ensure bio-security	- Hatchery	_	5	5	5	5	20	20	_	100	100	100	100	400	_	400	_

at hatcheries Design/monitoring/public upgrading for seed produ Support to public infrastruproduction	action consultancy sum Lump sum	-	1	1	-	-	2	2.5 25	-	3 25	3 25	-	-	5 50	5	- 50	-
6 Evaluate hatchery certific	ation Lump		5	5	5	5	20	2	_	10	10	10	10	40	_	40	_
7 Inspect, monitor brooders 8 Study seed production plans	and seed quality Year	1 -	1	1 -	1 -	1 -	5 1	10 20	10 - 25	10 10 20 183	10 10 - 163	10 10 - 135	10 10 - 135	50 20 640	- - - 5	50 20 635	- - -
C. Improvement of fish veterir 1. Improve capacity on dise provincial and district level Construction for provincia	ease diagnosis at s al sub-department of								23		103	133	100		3		
veterinary service Equipment for provincial	Station sub-department of Station	-	1	-	-	-	1	30	-	30	-	-	-	30	-	30	-
veterinary service Construction for district s	·	-	1	-	-	-	1	100	-	100	-	-	-	100	-	100	-
veterinary service Equipment for district sul	b-department of Station	-	3	-	-	-	3	30	-	90	-	-	-	90	-	90	-
veterinary service Provincial contribution for	·	-	3	-	-	-	3	50	-	150	-	-	-	150	-	150	-
province/district veterinar		-	4	-	-	-	4	3	-	12	-	-	-	12	12	-	-
Training	Station	-	1	1	1	1	4	10		10	10	10	10	40	-	40	
Sub-total C.1			_			_	_	40	-	392	10	10	10	422	12	410	-
2 Disease monitoring	year	1	- 1	ı	1	- 1	5	10	10	10	10	10	10	50	-	50	-
Set up and maintain disea	ase reporting year	4	4	4	4	4	_	E	E	E	E	E	E	O.E.		O.E.	
network 4 Training for local veterina	your staff	1		1	1	- 1	5 5	5 5	5 5	5 5	5 5	5 5	5 5	25 25	-	25 25	-
4 Training for local veterina 5 Monthly meeting of distric		1	1	1	1	1	5	5	5	5	5	5	5	25 25	-	25 25	-
6 Control of disease outbre	ct veterinary staff year eak (sterilization) year	1	1	1	1	1	5	10	10	10	10	10	10	50	_	50	_
7 Dissemination, awarenes		1	i	i	1	i	5	5	5	5	5	5	5	25	_	25	_
Technical support to fish			'	!	•		9	9	0	0	0	3	0	20		20	
8 management	votomary	6	12	12	12	12	54	1	6	12	12	12	12	54	_	54	_
Sub-total C									46	444	62	62	62	676	12	664	-
D. Aquaculture diversification	l																
1. Rehabilitation of provinc	ial hatcheries																
Provincial contribution to	hatchery upgrading Station	-	1	-	-	-	1	20	-	20	-	-	-	20	20	-	-
Construction	Station		1	-	-	-	1	100	-	100	-	-	-	100	-	100	-
Equipment	Station	-	1	-	-	-	1	100		100	-	-	-	100	-	100	
Sub-total D.1									-	220	-	-	-	220	20	200	-
Set up demonstration mo		4	4	4	4	4	20	20	80	80	80	80	80	400	-	100	300
3 Upgrade infrastructure to	support aquaculture district	-	1	1	-	-	2	400	-	400	400	-	-	800	-	800	-

4	diversification Local contribution for upgrading infrastructure for aquaculture diversification Training for agricultural extension staff,	District	-	1	1	-	-	2	40	-	40	40	-	-	80	80	-	-
5	hatcheries staff and farmers	Year	-	1	1	1	1	4	10	-	10	10	10	10	40	-	40	-
6	Dissemination, awareness improvement	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
7	Evaluation, workshop	year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	
	total D									90	760	540	100	100	1,590	100	1,190	300
	ater quality monitoring																	
1.	Support DONRE																	
		Lump																
	Equipment	sum	-	1	-	-	-	1	200	-	200	-	-	-	200	-	200	-
	Training	Year	-	1	1	1	1	4	10		10	10	10	10	40	-	40	-
Sı	b-total E.1									-	210	10	10	10	240	-	240	-
2	Water quality monitoring	Year	-	1	1	1	1	4	30	-	30	30	30	30	120	-	120	-
3	Workshops	year	1	1	1	1	1	5	3	3	3	3	3	3	15	-	15	-
Sub-	otal E									3	243	43	43	43	375	-	375	
TOT	AL									373	2,170	918	485	472	4,417	163	3,729	525

Coastal resources for sustainable development Table 205. Component B - GAP - BINH DINH

	<u>_</u>				Qu	antity	,					Am	ount			Ir	cludin	a
	Expenses	Unit	Y1	Y2	Y3	Y4		Total	Price	Y1	Y2	Y3	Y4	Y5	Total	Govt	IDA	TN
	Investment																	
ı.	A. Upgrade bio security in farming sites selected																	
	Dissemination	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	_	25	_
	Set up demonstration model	Model	4	4	4	4	-	16	25	100	100	100	100	-	400	_	100	300
	Provide training for agricultural extension staff and	Model	_	7	_	_		10	23	100	100	100	100		400		100	300
	farmers on GAP/BMP	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	_	50	_
	4. Upgrade bio-security at farming sites	. oa.	•	•	•	•	•	Ŭ					. 0	. 0	00		00	
	Technical support to farming site assessment and																	
	planning	Commune	2	_	-	_	_	2	5	10	_	-	_	_	10	-	10	-
	Upgrade farming site infrastructure	Site	_	2	-	-	-	2	200	-	400	-	-	-	400	-	400	-
	Provincial contribution for upgrading of farming																	
	site facilities	Site	-	2	-	-	-	2	20	-	40	-	-	-	40	40	-	-
	Sub-total A.4									10	440	-	-	-	450	40	410	-
	5. GAP/BMP certification	Ha	-	-	100	-	-	100	0.1	-	-	10	-	-	10	-	10	-
	6. Traceability of origin of seeds used in GAP areas	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
	7. Technical support and upgrade bio-security in																	
	farming sites	Month	-	24	24	24	24	96	1	-	24	24	24	24	96	-	96	-
	8. Enhance province and district agricultural																	
	extension agencies																	
	Provincial contribution for upgrading of																	
	agricultural extension agency's office	Unit	2	-	-	-	-	2	1	2	-	-	-	-	2	2	-	-
	Upgrade agricultural extension agency's office	Unit	2	-	-	-	-	2	10	20	-	-	-	-	20	-	20	-
	Equipment for agricultural extension agency's		_					_										
	office	Unit	2	-	-	-	-	2	10	20	-	-	-	-	20	-	20	
	Sub-total A.8									42	-	-	-	-	42	2	40	-
	0.1.1	Lump							4.0					40	40		40	
	9. Independent assessment of GAP compliance	sum	-	-	-	-	1	1	10	-	-	-	-	10	10	-	10	-
	10. Set up link among fish farmers and market	Year	-	1	1	1	1	4	3 3	-	3	3	3	3	12	-	12	-
	11. Workshop to monitor and evaluate	Year	- 1	ı	I	ı	-	4	3	<u>3</u> 175	3 590	3 160	3	- 57	12	- 40	12	-
	Sub-total A									1/5	590	160	150	57	1,132	42	790	300
	B. Improvement of seed quality (Use SPF seeds) 1. Dissemination, awareness improvement	Year	4	4	4	4	4	5	5	5	5	5	5	5	ΩE		25	
	Biocommunion, awareness improvement	_ rear	- 1	!	ı	ı	ı	5	5	5	5	5	5	5	25	-	25	-
	Training for agricultural extension staff and SPF	Voor	4	4	4	4	4	5	10	10	10	10	10	10	50		50	
	2 hatchery	Year	ı	ı	ı	ı	ı	5	10	10	10	10	10	10	50	-	50	-
	Upgrade infrastructure to ensure bio-security at hatcheries	Hatchery		2	2	2		6	20		40	40	40		120		120	
	Hatchelles	пашнегу	-	4	2	2	-	O	20	-	40	40	40	-	120	-	120	-

5	Design/monitoring/public infrastructure upgrading	Lump																
•	for seed production consultancy	sum	-	-	-	-	-	-		-	-	-	-	-	-	-	-	-
6	Support to public infrastructure for seed	Lump		_				_	_									
	production	sum	-	6	-	-	-	6	2	-	12	-	-	-	12	-	12	-
7	Evaluate hatchery certification	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
8	Inspect, monitor brooders and seed quality	year	-	1	-	-	-	1	20		20	-	-	-	20	-	20	
	total B									25	97	65	65	25	277	-	277	-
	provement of fish veterinary system																	
	Improve capacity on disease diagnosis at provinc	ial and																
dis	strict levels																	
	Construction for provincial sub-department of																	
	veterinary service	Station	-	1	-	-	-	1	30	-	30	-	-	-	30	-	30	-
	Equipment for provincial sub-department of	Station																
	veterinary service		-	1	-	-	-	1	100	-	100	-	-	-	100	-	100	-
	Construction for district sub-department of	Station																
	veterinary service		-	2	-	-	-	2	30	-	60	-	-	-	60	-	60	-
	Equipment for district sub-department of	Station																
	veterinary service		-	2	-	-	-	2	50	-	100	-	-	-	100	-	100	-
	Provincial contribution for upgrading of	Station																
	province/district veterinary stations		-	3	-	-	-	3	3	-	9	-	-	-	9	9	-	-
	Training	Station	-	1	1	1	1	4	10	_	10	10	10	10	40	-	40	-
Sı	b-total C.1									-	309	10	10	10	339	9	330	-
2	Disease monitoring	year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
3	Set up and maintain disease reporting network	year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
4	Training for local veterinary staff	year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
5	Monthly meeting of district veterinary staff	year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
6	Control of disease outbreak (sterilization)	year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
7	Dissemination, awareness improvement	year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
8	Technical support to fish veterinary management	year	6	12	12	12	12	54	1	6	12	12	12	12	54	-	54	-
	total C									46	361	62	62	62	593	9	584	-
	uaculture diversification																	
1.	Rehabilitation of provincial hatchery		-	-	-	-	-	-		-	-	-	-	-	-	-	-	-
2	Set up demonstration model	Model	4	4	4	4	4	20	20	80	80	80	80	80	400	-	100	300
3	Upgrade infrastructure to support aquaculture																	
U	diversification	District	-	1	-	-	-	1	200	-	200	-	-	-	200	-	200	-
4	Local contribution for upgrading infrastructure for																	
7	aquaculture diversification	District	-	1	-	-	-	1	20	-	20	-	-	-	20	20	-	-
	Training for agricultural extension staff,																	
5	hatcheries staff and farmers	year	-	1	1	1	1	4	10	-	10	10	10	10	40	-	40	-
6	Dissemination, awareness improvement	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
7	Evaluation, workshop	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
	total D									90	320	100	100	100	710	20	390	300
E. W a	ater quality monitoring																	

Support DONRE																	
	Lump																
Equipment	sum	-	1	-	-	-	1	200	-	200	-	-	-	200	-	200	-
Training	Year	-	1	1	1	1	4	10	-	10	10	10	10	40	-	40	-
Sub-total E.1									-	210	10	10	10	240	-	240	-
 Water quality monitoring 	Year	-	1	1	1	1	4	30	-	30	30	30	30	120	-	120	-
3 Workshops	year	1	1	1	1	1	5	3	3	3	3	3	3	15	-	15	-
Sub-total E									3	243	43	43	43	375	-	375	-
TOTAL									339	1.611	430	420	287	3.087	71	2.416	600

Coastal resources for sustainable development Table 206. Component B - GAP – THANH HOA

Evnance				Qu	antity						Amo	unt				Including	g
Expenses	Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	Gov.	IDA	TN
l. Investment																	
A. Upgrade bio security in farming sites selected																	
1. Dissemination	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	_	25	_
Set up demonstration model	Model	6	6	6	6	_	24	25	150	150	150	150	-	600	_	150	450
3. Provide training for agricultural extension staff		•		-	•												
and farmers on GAP/BMP	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	_	50	-
4. Upgrade bio-security at farming sites																	
Technical support to farming site assessment																	
and planning	Commune	1	-	-	-	-	1	5	5	-	-	-	-	5	-	5	-
Upgrade farming site infrastructure	Site	-	6	-	-	-	6	200	-	1,200	-	-	-	1,200	-	1,200	-
Provincial contribution for upgrading of										,				·		,	
farming site facilities	Site	-	6	-	-	-	6	20	-	120	-	-	-	120	120	-	-
Sub-total A.4									5	1,320	-	-	-	1,325	120	1,205	-
GAP/BMP certification	Ha	-	-	100	100	-	200	0.1	-	-	10	10	-	20	-	20	-
Traceability of origin of seeds used in GAP																	
areas	year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
7. Technical support and upgrade bio-security in	•																
farming sites	month	-	24	24	24	24	96	1	-	24	24	24	24	96	-	96	-
8. Enhance province and district agricultural																	
extension agencies																	
Provincial contribution for upgrading of																	
agricultural extension agency's office	Unit	-	-	-	-	-	-		-	-	-	-	-	-	-	-	-
Upgrade agricultural extension agency's office	Unit	-	-	-	-	-	-		-	-	-	-	-	-	-	-	-
Equipment for agricultural extension agency's																	
office	Unit	7	-	-	-	-	7	20	140	-	-	-	-	140	-	140	-

Sub-total A.8									140	-	-	-	-	140	-	140	-
0.1.1	Lump							40					40	40		40	
9. Independent assessment of GAP compliance	sum	-	-	-	-	1	1	10	-	-	-	-	10	10	-	10	-
10. Set up link among fish farmers and market	Year	-	1	1	1	ı	4 4	3	-	3	3	3	3	12	-	12	-
11. Workshop to monitor and evaluate	Year	ı	ı	1	ı	-	4	3	3	3	3	3	-	12	-	12	450
Sub-total A									318	1,520	210	210	57	2,315	120	1,745	450
B. Improvement of seed quality (Use SPF seeds)	Vaar	4	4	4	4	4	_	4	4	4	4	4	4	-		-	
1 Dissemination, awareness improvement	Year	I	ı	I	ı	1	5	ı	1	ı	ı	ı	ı	5	-	5	-
Training for agricultural extension staff and 2 SPF hatchery	Year	1	1	1	1	1	5	1	1	1	1	1	1	5	_	5	_
Unarada infrastruatura ta angura hia aggurity	- roui	•	•	·	•	•	Ū	•	•		•	•	•	Ū		Ū	
at hatcheries	Hatchery	_	_	2	_	_	2	20	_	_	40	_	_	40	_	40	_
Design/monitoring/public infrastructure	Lump			_			_	20			40			40		40	
upgrading for seed production consultancy	sum	_	_	_	_	_	_		_	_	_	_	_	_	_	_	_
Support to public infrastructure for seed	Lump																
5 production	sum	_	_	_	_	_	_		_	_	_	_	_	_	_	_	_
•	Lump																
6 Evaluate hatchery certification	sum	_	2	_	_	_	2	2	_	4	_	_	_	4	_	4	_
7 Inspect, monitor brooders and seed quality	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	_
8 Dissemination, awareness improvement	year	-	1	-	-	-	1	20	-	20	-	-	-	20	_	20	_
Sub-total B	<i>y</i> • • • • • • • • • • • • • • • • • • •		•				•		12	36	52	12	12	124	-	124	-
C. Improvement of fish veterinary system											<u> </u>						
1. Improve capacity on disease diagnosis at																	
provincial and district levels																	
Construction for provincial sub-department of																	
veterinary service	station	-	1	_	_	-	1	30	_	30	_	-	_	30	-	30	-
Equipment for provincial sub-department of	station																
veterinary service		-	1	_	_	-	1	100	_	100	_	-	_	100	-	100	-
Construction for district sub-department of	station																
veterinary service		-	6	-	-	-	6	20	-	120	-	-	-	120	-	120	-
Equipment for district sub-department of	station																
veterinary service		-	6	-	-	-	6	30	-	180	-	-	-	180	-	180	-
Provincial contribution for upgrading of	station																
province/district veterinary stations		-	7	-	-	-	7	2	-	14	-	-	-	14	14	-	-
Training	station	-	1	1	1	1	4	10	-	10	10	10	10	40	-	40	-
Sub-total C.1									-	454	10	10	10	484	14	470	-
2 Disease monitoring	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
3 Set up and maintain disease reporting network	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
4 Training for local veterinary staff	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
5 Monthly meeting of district veterinary staff	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
6 Control of disease outbreak (sterilization)	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
7 Dissemination, awareness improvement	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
8 Technical support to fish veterinary	Year	6	12	12	12	12	54	1	6	12	12	12	12	54	-	54	-

	management																	
	Sub-total C									46	506	62	62	62	738	14	724	-
	D. Aquaculture diversification																	
	1. Rehabilitation of provincial hatchery																	
	Provincial contribution for hatchery upgrading	hatchery	-	1	-	-	-	1	20	-	20	-	-	-	20	20	-	-
	Construction	hatchery	-	1	-	-	-	1	100	-	100	-	-	-	100	-	100	-
	Equipment	hatchery	-	1	-	-	-	1	100		100	-	-	-	100	-	100	-
	Sub-total D.1									-	220	-	-	-	220	20	200	-
2	Set up demonstration model	Model	12	12	12	12	12	60	20	240	240	240	240	240	1,200	-	300	900
3	Upgrade infrastructure to support aquaculture																	
O	diversification	district	-	1	1	-	-	2	500	-	500	500	-	-	1,000	-	1,000	-
4	Local contribution for upgrading infrastructure																	
7	for aquaculture diversification	district	-	1	1	-	-	2	50	-	50	50	-	-	100	100	-	-
	Training for agricultural extension staff,																	
5	hatcheries staff and farmers	year	-	1	1	1	1	4	10	-	10	10	10	10	40	-	40	-
6	Dissemination, awareness improvement	year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
7	Evaluation, workshop	year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
	Sub-total D									250	1,030	810	260	260	2,610	120	1,590	900
	E. Water quality monitoring																	
	1. Support DONRE																	
	Facilities	Lump		4					000		000				000		000	
	Equipment	sum	-	- 1	-	-	-	l 4	200	-	200	-	-	-	200	-	200	-
	Training	year	-	I	ı	ı	I	4	10		10	10	10	10	40	-	40	
_	Sub-Total E.1			-					00	-	210	10	10	10	240	-	240	-
2	Water quality monitoring	year	-	1	1	1	1	4	30	-	30	30	30	30	120	-	120	-
3	Workshops	year	1	1	1	1	1	5	3	3	3	3	3	3	15	-	15	
	Sub-total E									3	243	43	43	43	375	-	375	
	TOTAL									629	3,335	1,177	587	434	6,162	254	4,558	1,350

Coastal resources for sustainable development Table 207. Component B - GAP – NGHE AN

	Evnence				Qua	antity						Amo	unt			li	ncluding	
	Expenses	Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	Govt	IDA	TN
	Investment																	
١.	A. Upgrade bio security in farming sites selected																	
	1. Dissemination	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	_	25	_
	Set up demonstration model	Model	4	4	4	4	<u>'</u>	16	25	100	100	100	100	-	400	_	100	300
	3. Provide training for agricultural extension staff	Wiodoi	•		•	•			20	100	100	100	100		100		100	000
	and farmers on GAP/BMP	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	_	50	_
	4. Upgrade bio-security at farming sites	. oa.	•	•	•	•	•	Ŭ					. 0		00		00	
	Technical support to farming site assessment																	
	and planning	Commune	6	_	_	_	_	6	5	30	_	_	_	_	30	_	30	_
	Upgrade farming site infrastructure	Site	-	3	3	_	_	6	200	-	600	600	_	_	1,200	_	1,200	_
	Provincial contribution for upgrading of				_			-							-,		-,	
	farming site facilities	Site	_	3	3	-	-	6	20	-	60	60	-	-	120	120	_	-
	Sub-total A.4									30	660	660	-	-	1,350	120	1,230	
	GAP/BMP certification	Ha	-	-	100	-	-	100	0.1	-	-	10	-	-	10	_	10	-
	6. Traceability of origin of seeds used in GAP																	
	areas	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
	7. Technical support and upgrade bio-security in																	
	farming sites	Month	-	24	24	24	24	96	1	-	24	24	24	24	96	-	96	-
	8. Enhance province and district agricultural																	
	extension agencies																	
	Provincial contribution for upgrading of																	
	agricultural extension agency's office	Unit	-	-	-	-	-	-		-	-	-	-	-	-	-	-	-
	Upgrade agricultural extension agency's																	
	office	Unit	-	-	-	-	-	-		-	-	-	-	-	-	-	-	-
	Equipment for agricultural extension agency's																	
	office	Unit	-	3	-	-	-	3	10	-	30	-	-	-	30	-	30	-
	Sub-total A.8									-	30	-	-	-	30	-	30	-
		Lump																
	Independent assessment of GAP compliance	sum	-	-	-	-	1	1	10	-	-	-	-	10	10	-	10	-
	Set up link among fish farmers and market	Year	-	1	1	1	1	4	3	-	3	3	3	3	12	-	12	-
	Workshop to monitor and evaluate	Year	1	1	1	1	-	4	3	3	3	3	3	-	12	-	12	
	Sub-total A									153	840	820	150	57	2,020	120	1,600	300
	B. Improvement of seed quality (Use SPF se																	
	1 Dissemination, awareness improvement	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
	Training for agricultural extension staff and				_			_										
	2 SPF hatcheries	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
	3 Upgrade infrastructure to ensure bio-security	Hatchery	-	4	4	-	-	8	20	-	80	80	-	-	160	-	160	-

	at hatcheries Design/monitoring/public infrastructure	Lump																
4	upgrading for seed production consultancy Support to public infrastructure for seed	sum Lump	1	-	-	-	-	1	20	20	-	-	-	-	20	20	-	-
5	production	sum	1	-	-	-	-	1	200	200	-	-	-	-	200	-	200	-
6	Evaluate hatchery certification	Lump sum	_	10	_	_	_	10	1	_	10	_	_	_	10	_	10	_
7	Inspect, monitor brooders and seed quality	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	_	50	-
8	Dissemination, awareness improvement	Year	-	1	-	-	-	1	20		20	-	-	-	20	-	20	
	Sub-total B									245	135	105	25	25	535	20	515	-
	. Improvement of fish veterinary system																	
1	 Improve capacity on disease diagnosis at p and district levels 	provincial																
	Construction for provincial sub-department of																	
	veterinary service	Station	-	1	-	-	-	1	20	-	20	-	-	-	20	-	20	-
	Equipment for provincial sub-department of	Station																
	veterinary service		-	1	-	-	-	1	100	-	100	-	-	-	100	-	100	-
	Construction for district sub-department of	Station																
	veterinary service		-	2	-	-	-	2	20	-	40	-	-	-	40	-	40	-
	Equipment for district sub-department of	Station																
	veterinary service		-	2	-	-	-	2	25	-	50	-	-	-	50	-	50	-
	Provincial contribution for upgrading of	Station																
	province/district veterinary stations		-	3	-	-	-	3	2	-	6	-	-	-	6	6	-	-
	Training	Station	-	1	1	1	1	4	10		10	10	10	10	40	-	40	-
	Sub-total C.1									-	226	10	10	10	256	6	250	-
2	Disease monitoring	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
3	Set up and maintain disease reporting	Year																
	network		1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
4	Training for local veterinary staff	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
5	Monthly meeting of district veterinary staff	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
6	Control of disease outbreak (sterilization)	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50	-
7	Dissemination, awareness improvement	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
8	Technical support to fish veterinary	Year	_	40	40	40	40	- 4		•	40	40	40	40	F.4		- 4	
	management		6	12	12	12	12	54	1	6	12	12	12	12	54	-	54	
	Sub-total C									46	278	62	62	62	510	6	504	-
	D. Aquaculture diversification																	
	Rehabilitation of provincial hatchery																	
	Provincial contribution for hatchery upgrading	Hatchery	-	1	-	-	-	1	15	-	15	-	-	-	15	15	-	-
	Construction	Hatchery	-	1	-	-	-	1	100	-	100	-	-	-	100	-	100	-
	Equipment	Hatchery	-	ı	-	-	-	ı	50		50	-	-	-	50	-	50	
_	Sub-total D.1	Ma -l - l	0	^	^	^	•	00	40	-	165	-	-	-	165	15	150	-
2	Set up demonstration model	Model	6	6	6	6	6	30	10	60	60	60	60	60	300	-	75	225
3	Upgrade infrastructure to support aquaculture	District	-	1	-	-	-	1	200	-	200	-	-	-	200	-	200	-

	diversification																	
4	Local contribution for upgrading infrastructure																	
4	for aquaculture diversification	District	-	1	-	-	-	1	20	-	20	-	-	-	20	20	-	-
	Training for agricultural extension staff,																	
5	hatcheries staff and farmers	Year	-	1	1	1	1	4	10	-	10	10	10	10	40	-	40	-
6	Dissemination, awareness improvement	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
7	Evaluation, workshop	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
	Sub-total D									70	465	80	80	80	775	35	515	225
	E. Water quality monitoring																	
	1. Support DONRE																	
		Lump																
	Equipment	sum	-	1	-	-	-	1	50	-	50	-	-	-	50	-	50	-
	Training	Year	-	1	1	1	1	4	5	_	5	5	5	5	20	-	20	-
	Sub-total E.1									-	55	5	5	5	70	-	70	-
2	Water quality monitoring	Year	-	1	1	1	1	4	30	-	30	30	30	30	120	-	120	-
3	Workshops	Year	1	1	1	1	1	5	3	3	3	3	3	3	15	-	15	-
	Sub-total E									3	88	38	38	38	205	-	205	
	TOTAL									517	1,806	1,105	355	262	4,045	181	3,339	525

Coastal resources for sustainable development Table 208. Component B - GAP – HA TINH

Expenses				Qua	antity	•		_			Amo	unt			lr	ncluding	
Lapenses	Unit	Y 1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	Govt	IDA	TN
I. Investment A. Upgrade bio security in farming sites selected																	
1. Dissemination	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
 Set up demonstration model Provide training for agricultural extension staff and farmers on GAP/BMP 	Model Year	3	3 1	3 1	3 1	- 1	12 5	25 10	75 10	75 10	75 10	75 10	- 10	300 50	-	75 50	225
Upgrade bio-security at farming sites Technical support to farming site assessment and planning	Commune	6	-	_	_	_	6	5	30	-	-	-	-	30	-	30	_
Upgrade farming site infrastructure	site	-	3	3	-	-	6	200	-	600	600	-	-	1,200	-	1,200	-
Provincial contribution for upgrading of farming site facilities	Site	-	3	3	-	-	6	20		60	60	-	-	120	120	-	
Sub-total A.4									30	660	660	-	-	1,350	120	1,230	-
5. GAP/BMP certification 6. Traceability of origin of seeds used in GAP	На	-	-	100	-	-	100	0.1	-	-	10	-	-	10	-	10	-
areas 7. Technical support and upgrade bio-security in	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25	-
farming sites 8. Enhance province and district agricultural extension agencies	month	-	24	24	24	24	96	1	-	24	24	24	24	96	-	96	-
Provincial contribution for upgrading of agricultural extension agency's office Upgrade agricultural extension agency's	Unit	6	-	-	-	-	6	2	12	-	-	-	-	12	12	-	-
office Equipment for agricultural extension	unit	6	-	-	-	-	6	20	120	-	-	-	-	120	-	120	-
agency's office	Unit	3	-	-	-	-	3	10	30	-	-	-	-	30	-	30	
Sub-total A.8									162	-	-	-	-	162	12	150	-
9. Independent assessment of GAP compliance	Lump sum	-	-	-	-	1	1	10	-	-	-	-	10	10	-	10	-

1	0. Set up link among fish farmers and market	Year	-	1	1	1	1	4	3	-	3	3	3	3	12	-	12	-
	11. Workshop to monitor and evaluate	Year	1	1	1	1	-	4	3	3	3	3	3	-	12	-	12	
	Sub-total A									290	785	795	125	57	2,052	132	1,695	225
	B. Improvement of seed quality (Use SPF se	eeds)																
1 2 3 4 5 6 7 8	Dissemination, awareness improvement Training for agricultural extension staff and SPF hatchery Upgrade infrastructure to ensure biosecurity at hatcheries Design/monitoring/public infrastructure upgrading for seed production consultancy Support to public infrastructure for seed production Evaluate hatchery certification Inspect, monitor brooders and seed quality Dissemination, awareness improvement	Year Year Hatchery Lump sum Lump sum Lump sum Lump year Year	1 1 - - - 1	1 1 1 - 2 1	1 1 1 1 1 - 1	1 1 - - - 1	1 1 1	5 5 2 - - 2 5	5 10 20 1 10 20	5 10 - - - - 10	5 10 20 - - 2 10 20	5 10 20 - - - 10	5 10 - - - - 10	5 10 - - - 10	25 50 40 - - 2 50 20	-	25 50 40 - - 2 50 20	- - - -
Ū	Sub-total B	Year	-	ı	-	-	-	ı	20	 25	67	<u>-</u> 45	<u>-</u> 25	<u>-</u> 25	187		187	
	C. Aquaculture diversification									25	07	40	23	25	107	-	107	-
	1. Rehabilitation of provincial hatche Construction for provincial sub-department of veterinary service Equipment for provincial sub-department of veterinary service Construction for district sub-department of veterinary service Equipment for district sub-department of veterinary service Provincial contribution for upgrading of province/district veterinary stations Training	Station Station Station Station Station Station		1 1 5 5 6	- - - -	- - - - 1	- - - - 1	1 1 5 5 6 4	20 100 20 25 2	- - - -	20 100 100 125 12 10	- - - - 10	- - - - - 10	- - - - 10	20 100 100 125 12 40	- - - 12	20 100 100 125 - 40	- - - - -
2	Sub-total C.1 Disease monitoring			,			,	_		-	367	10	10	10	397	12	385	-
3	Set up and maintain disease reporting	Year Year	1 1	1	1	1	1	5 5	10 5	10 5	10 5	10 5	10 5	10 5	50 25	-	50 25	-

	network																	
4	Training for local veterinary staff	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	_	25	_
5	Monthly meeting of district veterinary staff	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	_	25	_
6	Control of disease outbreak (sterilization)	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	_	50	_
7	Dissemination, awareness improvement	Year	1	1	1	1	1	5	5	5	5	5	5	5	25		25	_
8	Technical support to fish veterinary management	Year	6	12	12	12	12	54	1	6	12	12	12	12	54		54	
	Sub-total C		Ü	12	12	12	12	34	'	46	419	62	62	62	651	12	639	
	D. Aquaculture diversification													-				
	Rehabilitation of provincial hatchery Provincial contribution for hatchery upgrading	Hatchery	_	1	-	-	-	1	15	-	15	-	-	-	15	15	-	-
	Construction	Hatchery	-	1	-	-	-	1	100	-	100	-	-	-	100	-	100	-
	Equipment	Hatchery	-	1	-	-	-	1	50	_	50	-	-	-	50	-	50	-
	Sub-total D.1									-	165	-	-	-	165	15	150	-
2	Set up demonstration model	Model	6	6	6	6	6	30	20	120	120	120	120	120	600	-	150	450
3	Upgrade infrastructure to support aquaculture diversification	District	-	1	-	-	-	1	200	-	200	-	-	-	200	-	200	-
4	Local contribution for upgrading infrastructure for aquaculture diversification	District	-	1	-	-	-	1	20	-	20	-	-	-	20	20	-	-
5	Training for agricultural extension staff, hatcheries staff and farmers	Year	-	1	1	1	1	4	10	-	10	10	10	10	40	-	40	-
6	Dissemination, awareness improvement	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	_	25	-
7	Evaluation, workshop	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	_	25	_
	Sub-total D									130	525	140	140	140	1,075	35	590	450
	E. Water quality monitoring														·			
	1. Support DONRE																	
	Equipment	Lump sum	-	1	-	-	-	1	100	-	100	-	-	-	100	-	100	-
	Training	Year	-	1	1	1	1	4	5		5	5	5	5	20	-	20	
	Sub-total E.1									-	105	5	5	5	120	-	120	-

	TOTAL									494	1,934	1,080	390	322	4,220	179	3,366	675	
	Sub-total E									3	138	38	38	38	255	-	255	-	
3	Workshops	Year	1	1	1	1	1	5	3	3	3	3	3	3	15	-	15		
2	Water quality monitoring	Year	-	1	1	1	1	4	30	-	30	30	30	30	120	-	120	-	

Coastal resources for sustainable development Table 209. Component B - GAP – PCU

France				Qu	ıantit	У					Am	ount			Inclu	uding
Expenses	Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y 3	Y 4	Y5	Total	Govt	ID/
Investment																
A. GAP introduction and implementation																
1. MARD's Department of Aquaculture																
Office and training equipment	Year	_	1	_	_	_	1	20	_	20	_	_	_	20	_	20
Training for MARD and certification	Year	1	1	1	1	1	5	20	20	20	20	20	20	100	-	10
Improvement of institutional framework and rules	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	_	5
Equipment for capacity strengthening of	Lump							-	_	_	_	_	_			
certification organization	sum	-	1	1	1	-	3	30	-	30	30	30	-	90	-	9
Sub-total A.1									30	80	60	60	30	260	-	26
2. Support province to carry out and monitor GAP																
Training for provincial staff on GAP/BMP	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	5
Set up forum on GAP/BMP	Year	-	1	1	1	1	4	10	-	10	10	10	10	40	-	4
Sub-total A.2									10	20	20	20	20	90	-	9
3. Maintain and update database on aquaculture,	Year															
including GAP sites		1	1	1	1	1	5	10	10	10	10	10	10	50	-	5
4. Communication for awareness improvement	Year	1	1	1	1	1	5	30	30	30	30	30	30	150	-	1
Support to seed certification program	Year	1	1	1	1	1	5	20	20	20	20	20	20	100	-	1(
6. Workshops	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	2
Sub-total A									105	165	145	145	115	675	-	6
B. Support to domestication and seed breeding																
1. Support RIA1																
	Lump															
Government contribution	sum	-	1	-	-	-	1	50	-	50	-	-	-	50	50	
	Lump															_
Construction	sum	-	1	-	-	-	1	700	-	700	-	-	-	700	-	70
	Lump													. = =		
Equipment	sum	-	1	-	-	-	1	150	-	150	-	-	-	150		1
Sub-total B.1									-	900	-	-	-	900	50	85
2. Support RIA2																

	Lump															
Government contribution	sum	-	1	-	-	-	1	15	-	15	-	-	-	15	15	-
	Lump															
Construction	sum	-	1	-	-	-	1	250	-	250	-	-	-	250	-	250
	Lump															
Equipment	sum	-	1	-	-	-	1	250		250	-	-	-	250		250
Sub-total B.2									-	515	-	-	-	515	15	500
3. Support RIA3	1															
Government contribution	Lump		4				4	50		50				50	50	
Government contribution	sum Lump	-	ı	-	-	-	'	50	-	50	-	-	-	50	50	-
Construction	sum	_	1	_	_	_	1	656	_	656	_	_	_	656	_	656
Constitution	Lump		•				•	000		000				000		000
Equipment	sum	-	1	-	-	-	1	100	_	100	-	-	_	100	-	100
Sub-total B.3										806	-	-	-	806	50	756
4. Assessment and information	Year	-	1	1	1	-	3	20	-	20	20	20	-	60	-	60
5. Bio-security for farming sites and hatcheries (ce	ntral and															
provincial level s)																
Int'l consultancy on bio-security in seed production																
and aquaculture	Month	2	2	-	-	-	4	25	50	50	-	-	-	100	-	100
National consultancy on bio-security in seed																
production and aquaculture	month	3	2	-	-	-	5	3	9	6	-	-	-	15	-	15
Sub-total B.5									59	56	-	-	-	115	-	115
Sub-total B									59	2,297	20	20	-	2,396	115	2,281
C. Improvement of fish veterinary system																
Support to Center for fish seed experiment and																
testing	1															
Technical support consultancy	Lump	1					4	50	50					50		50
recrifical support consultancy	sum Lump	1	-	-	-	-	'	50	50	-	-	-	-	50	-	30
Equipment	sum	_	_	1	1	1	3	500	_	_	500	500	500	1,500	_	1,500
Training	Year	_	_	1	1	1	3	20	_	_	20	20	20	60	_	60
Operational cost	Year	_	_			-	-	20	_	_	-	-	-	-	_	-
Sub-total C.1									50	-	520	520	520	1,610	-	1,610
2. Disease control	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	_	50
3. Set up and maintain disease reporting network	Year							-	_	-						
(hotline)		1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
4. Training for provincial veterinary staff	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
National consultancy on fish veterinary																
management	Month	6	12	12	12	12	54	2	12	24	24	24	24	108	-	108
Int'l consultancy on labs evaluation	month	3	-	-	-	-	3	25	75	-	-	-	-	75	-	75
Sub-total C									157	44	564	564	564	1,893	-	1,893
TOTAL									321	2,506	729	729	679	4,964	115	4,849

Coastal resources for sustainable development
Table 301. Component C - Sustainable capture fisheries - CA MAU

	Evnonces					antity			_			Amo					iding
	Expenses	Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	Govt	IDA
Α. Ι	I. Investment Establish co-management model at commune and district level																
1	Establish co-management team	Team	5	5	-	-	-	10	5	25	25	-	-	-	50	-	50
2	Upgrade office of co-management team	Commune	5	5	-	-	-	10	5	25	25	-	-	-	50	-	50
3	Office equipment, communication Consultancy to give technical support on formulation	Set	5	5	-	-	-	10	5	25	25	-	-	-	50	-	50
4	of co-management rule and agreement	Month	6	12	12	12	12	54	1	6	12	12	12	12	54	-	54
5	Border zoning	Commune	5	5	-	-	-	10	5	25	25	-	-	-	50	-	50
6	Monitoring and drills	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
7	Training (including licensing)	year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
	Prepare for co-management plan at high biodiversity	-															
8	site	Plan	-	1	-	-	-	1	30	-	30	-	-	-	30	-	30
9	Carry out co-management plan at high biodiver	sity site Lump															
	Local consultancy (or NGO)	sum Lump	-	1	1	1	1	4	20	-	20	20	20	20	80	-	80
	Goods, equipment	sum Lump	-	-	1	-	-	1	13	-	-	13	-	-	13	-	13
	Small Construction	sum Lump	-	-	1	-	-	1	20	-	-	20	-	-	20	-	20
	Training and workshops	sum Lump	-	-	1	1	1	3	10	-	-	10	10	10	30	-	30
	Operational cost	sum	-	-	1	1	1	3	15	-	-	15	15	15	45	-	45
	Sub-total A.9									-	20	78	45	45	188	-	188
	10. Additional support to poor fishing communities	commune	-	5	-	-	-	5	50	-	250	-	-	-	250	-	250
	Sub-total A									116	422	100	67	67	772	-	772
B. N	Monitoring, control and surveillance system (MCS)																
1	Equipment for province's patrol force																
-	Upgrade/build patrol ship	ship	_	3	_	_	_	3	120	_	360	_	_	_	360	_	360
	Communication equipment for fisheries enforcement	·		2				3									
	ship	set	-	3	-	-	-	3	10	-	30	-	-	-	30	-	30
	Provincial contribution to upgrade office of sub-	Lump	-	-	-	-	-	-		-	-	-	-	-	-	-	-

	DECAFIREP	sum															
	Upgrade office for sub-DECAFIREP	Lump sum Lump	-	-	-	-	-	-		-	-	-	-	-	-	-	-
	Office equipment for sub-DECAFIREP	sum	1	-	-	-	-	1	20	20	-	-	-	-	20	-	20
	Establish MCS station	Station	5	-	-	-	-	5	45	225	-	-	-	-	225	-	225
	Provincial contribution for MCS station	station	5	-	-	-	-	5	4	20	-	-	-	-	20	20	-
	Office equipment, high speed canoe for MCS station	station	5	-	-	-	-	5	5	25	-	-	-	-	25	-	25
2	Sub-total B.1 Consultancy on technical support to monitoring and control of fishing activities	month	6	12	12	12	12	54	1	290 6	390 12	- 12	- 12	- 12	680 54	20	660 54
3	Trainings		1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
4	Carry out monitoring and control of fishing activities	year year	1	1	1	1	1	5	30	30	30	30	30	30	150	-	150
5	Communication, awareness improvement	year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
6	Set up hotline	year	1	1	1	1	1	5	2	2	2	2	2	2	10	_	10
7	Register, license and control fishing vessels	year	1	1	1	1	1	5	5	5	5	5	5	5	25	_	25
,	Sub-total B	,	•		'	'		9	3	343	449	 59	 59	 59	969	20	949
	C. Upgrading fisheries infrastructure									040	443	55	55	33	303	20	343
	1. Upgrade Song Doc fishing port																
	opg. ado cong zoo noming pen	Lump															
	Provincial contribution to upgrade fishing port	sum Lump	1	-	-	-	-	1	375	375	-	-	-	-	375	375	-
	Construction: package 1	sum Lump	1	-	-	-	-	1	1,814	1,814	-	-	-	-	1,814	-	1,814
	Construction: package 2	sum Lump	-	1	-	-	-	1	958	-	958	-	-	-	958	-	958
	Equipment: package 1	sum Lump	-	1	-	-	-	1	77	-	77	-	-	-	77	-	77
	Equipment: package 2	sum	-	1	-	-	-	1	144	-	144	-	-	-	144	-	144
	Training	year	1	1	1	1	1	5	2	2	2	2	2	2	10	-	10
	Sub-total C.1									2,191	1,181	2	2	2	3,378	375	3,003
	2. Upgrading Ho Gui fish landing site																
	Provincial contribution to upgrade fishing port	Lump sum Lump	1	-	-	-	-	1	385	385	-	-	-	-	385	385	-
	Construction: package 1	sum Lump	1	-	-	-	-	1	1,800	1,800	-	-	-	-	1,800	-	1,800
	Construction: package 2	sum	-	1	-	-	-	1	1,017	-	1,017	-	-	-	1,017	-	1,017
	Equipment: package 1	Lump	-	1	-	-	-	1	74	-	74	-	-	-	74	-	74

Equipment: package 2	sum Lump sum	-	1	-	-	-	1	96	-	96	_	_	_	96	-	96
Training	year	1	1	1	1	1	5	2	2	2	2	2	2	10	-	10
Sub-total C.2 3. Provincial contribution to compensate re-settlement an related activities	d other								2,187	1,189	2	2	2	3,382	385	2,997
Provincial contribution (if any)	Lump	4					4	500	500				_	500	500	
` - '	sum	'	-	-	-	-	1	500								
Sub-total C									4,878	2,370	4	4	4	7,260	1,260	6,000
ΤΟΤΔΙ									###	3 241	163	130	130	9 001	1 280	7 721

Coastal resources for sustainable development
Table 302. Component C - Sustainable capture fisheries - SOC TRANG

	Expenses		Quantity									Including					
		Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y 4	Y5	Total	Govt	IDA
A. E	I. Investment stablish co-management model at commune and district level																
1	Establish co-management team	Team	5	-	-	-	-	5	5	25	-	-	-	-	25	-	25
2	Upgrade office of co-management team	Commune	5	-	-	-	-	5	5	25	-	-	-	-	25	-	25
3	Office equipment, communication	Set	5	-	_	-	_	5	5	25	-	-	-	-	25	-	25
4	Consultancy to give technical support on formulation of co-management rule and agreement	Month	6	12	12	12	12	54	1	6	12	12	12	12	54	-	54
5	Border zoning	Commune	5	-	-	-	-	5	5	25	-	-	-	-	25	-	25
6	Monitoring and drills	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
7	Training (including licensing)	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
8 9	Prepare for co-management plan at high biodiversity site Carry out co-management plan at high biodiversity site	Plan	-	1	-	-	-	1	30	-	30	-	-	-	30	-	30
	Local consultancy (or NGO)	Lump sum	-	1	1	1	-	3	20	-	20	20	20	-	60	-	60

Goods, equipment	Lump sum	_	_	1	_	_	1	10	_	_	10	_	_	10	_	10
Small Construction	Lump sum	_	_	1	_	_	1	20	_	_	20	_	_	20	_	20
Training and workshops	Lump sum	_	_	1	1	1	3	10	_	_	10	10	10	30	_	30
Operational cost	Lump sum	-	_	1	1	1	3	15	_	-	15	15	15	45	_	45
Sub-total A.9									_	20	75	45	25	165	-	165
 Additional support to poor fishing communities Provincial contribution to upgrade public infrastructure 	Lump sum	1	-	-	_	-	1	40	40	-	_	-	-	40	40	-
Build public infrastructure Support household members (education, vocational training)	Lump sum Household	-	1 120	1 -	-	-	2 120	200 0.5	-	200 60	200	-	-	400 60	-	400 60
Sub-total A.10									40	260	200	-	-	500	40	460
11. Plan on ethnic minority development	Commune	7	-	-	-	-	7	50	350	-	-	-	-	350	-	350
Sub-total A									506	332	297	67	47	1,249	40	1,209
B. Monitoring, control and surveillance system (MCS)																
1 Equipment for province's patrol force																
Upgrade/build patrol ship Communication equipment for fisheries enforcement ship	Ship set	-	2	-	-	-	2	75 25	-	150 50	-	-	-	150 50	-	150 50
Provincial contribution to upgrade office of sub- DECAFIREP	Lump sum	1	-	-	-	-	1	4	4	-	-	-	-	4	4	-
Upgrade office for sub-DECAFIREP	Lump sum	1	-	-	-	-	1	40	40	-	-	-	-	40	-	40
Office equipment for sub-DECAFIREP	Lump sum	1	-	-	-	-	1	20	20	-	-	-	-	20	-	20
Establish MCS station	Station	1	-	-	-	-	1	40	40	-	-	-	-	40	-	40
Provincial contribution for MCS station Office equipment, high speed canoe for MCS	Station	1	-	-	-	-	1	4	4	-	-	-	-	4	4	-
station	Station	1	-	-	-	-	1	20	20	-	-	-	-	20	-	20
Sub-total B.1 Consultancy on technical support to monitoring and control of fishing activities	Month	6	12	12	12	12	54	1	128 6	200 12	- 12	- 12	- 12	328 54	8	320 54
- ·	MOHUH	О	12	12	12	12	54	ļ	_			12		54	-	-
2 ITAININGS	Voor	4	4	4	4	4		_	_	_	_	_	_	25		25
3 Trainings4 Carry out monitoring and control of fishing activities	Year Year	1	1	1	1	1	5 5	5 30	5 30	5 30	5 30	5 30	5 30	25 150	-	25 150

6	Set up hotline	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	-	10
7	Register, license and control fishing vessels	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	_	25
	Sub-total B									181	259	59	59	59	617	8	609
	C. Upgrade fisheries infrastructure																
	1. Upgrade Tran De fishing port																
	Provincial contribution to upgrade fishing port	Lump sum	1	-	-	-	-	1	229	229	-	-	-	-	229	229	-
	Construction: package 1	Lump sum	1	-	-	-	-	1	1,870	1,870	-	-	-	-	1,870	-	1,870
	Construction: package 2	Lump sum	-	1	-	-	-	1	350	-	350	-	-	-	350	-	350
	Equipment	Lump sum	-	1	-	-	-	1	60	-	60	-	-	-	60	-	60
	Training	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	-	10
	Sub-total C.1									2,101	412	2	2	2	2,519	229	2,290
	2. Upgrade fishing port																
	Provincial contribution to upgrade fishing port	Lump sum	1	-	-	-	-	1	166	166	-	-	-	-	166	166	-
	Construction: package 1	Lump sum	1	-	-	-	-	1	1,000	1,000	-	-	-	-	1,000	-	1,000
	Construction: package 2	Lump sum	-	1	-	-	-	1	603	-	603	-	-	-	603	-	603
	Equipment	Lump sum	-	1	-	-	-	1	40	-	40	-	-	-	40	-	40
	Training	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	-	10
	Sub-total C.2									1,168	645	2	2	2	1,819	166	1,653
	3. Upgrade Mo O fish landing site																
	Provincial contribution to upgrade fishing port	Lump sum	1	-	-	-	-	1	32	32	-	-	-	-	32	32	-
	Construction: package 1	Lump sum	-	1	-	-	-	1	275	-	275	-	-	-	275	-	275
	Equipment	Lump sum	-	1	-	-	-	1	26	-	26	-	-	-	26	-	26
	Training	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	-	10
4. Pro	Sub-total C.3 ovincial contribution to compensate re-settleme related activities	ent and other								34	303	2	2	2	343	32	311
	Provincial contribution (if any)	Lump sum	1	-	-	-	-	1	500	500	-	-	-	-	500	500	
	Sub-total C									3,803	1,360	6	6	6	5,181	927	4,254
	TOTAL									4,490	1,951	362	132	112	7,047	975	6,072

Coastal resources for sustainable development
Table 303. Component C – Sustainable capture fisheries - KHANH HOA

	Francisco				Qu	antity	y					Amo	ount			Inclu	ding
	Expenses	Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y 4	Y5	Total	Govt	IDA
	I. Investment																
۸ ۵	Establish co-management model at commune and																
Α. Ι	district level																
1	Establish co-management team	Team	5	5	_	_	_	10	5	25	25	_	_	_	50	_	50
2	Upgrade office of co-management team	Commune	5	5	_	_	_	10	5	25	25	_	_	_	50	_	50
3	Office equipment, communication	set	5	5	_	_	_	10	5	25	25	_	_	_	50	_	50
Ū	Consultancy to give technical support on	001	Ŭ	Ū					Ū						00		00
4	formulation of co-management rule and agreement	Month	6	12	12	12	12	54	1	6	12	12	12	12	54	_	54
5	Border zoning	Commune	5	5	-	-	-	10	5	25	25	-	-	-	50	-	50
6	Monitoring and drills	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
7	Training (including licensing)	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
8.	Supporting poor fishing communities to develop ag							_		_	_	_		_	_		_
	Ninh Van /b	,															
	Additional support to poor fishing communities																
	in Ninh Van																
	Provincial contribution to upgrade public	Lumpsum						4									
	infrastructure		1	-	-	-	-	1	20	20	-	-	-	-	20	20	-
	Build public infrastructure	Lump sum	-	1	-	-	-	1	200	-	200	-	-	-	200	-	200
	Support household members (education, vocational			00				00	٥.5		40				40		40
	training)	household	-	80	-	-	-	80	0.5	-	40	-		-	40	-	40
	Sub-total A.8									20	240	-	-	-	260	20	240
	Plan on ethnic minority development	commune	-	1	-	-	-	1	50		50	-	-		50	-	50
	Sub-total A									136	412	22	22	22	614	20	594
B. I	Monitoring, control and surveillance system (MCS)																
1	Equipment for province's patrol force	01.1		_				•	450		000				200		
	Upgrade/build patrol ship	Ship	-	2	-	-	-	2	150	-	300	-	-	-	300	-	300
	Communication equipment for fisheries	0 .		_				•	0.5		50				50		50
	enforcement ship	Set	-	2	-	-	-	2	25	-	50	-	-	-	50	-	50
	Provincial contribution to upgrade office of sub- DECAFIREP	Lump sum	4					4	4	4					4	4	
		1	- 1	-	-	-	-	- 1	4	4 40	-	-	-	-	4	4	-
	Upgrade office for sub-DECAFIREP	Lump sum	1	-	-	-	-	1	40 20	40 20	-	-	-	-	40 20	-	40 20
	Office equipment for sub-DECAFIREP Establish MCS station	Lump sum	I	-	-	-	-	 -		-	100	-	-	-		-	
	Provincial contribution for MCS station	Station Station	-	5	-	-	-	5 5	20 2	-	100 10	-	-	-	100 10	- 10	100
			-	Э	-	-	-	Э	2	-	10	-	-	-	10	10	-
	Office equipment, high speed canoe for MCS	Station		_				5	20		100				100		100
	station		-	Э	-	-	-	Э	20	- 64	100 560	-	-		100	- 1.4	100
	Sub-total B.1									64	200	-	-	-	624	14	610

	Consultancy on technical support to monitoring and																
2	control of fishing activities	Month	6	12	12	12	12	54	1	6	12	12	12	12	54	-	54
3	Trainings	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
4	Carry out monitoring and control of fishing activities	Year	1	1	1	1	1	5	30	30	30	30	30	30	150	-	150
5	Communication, awareness improvement	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
6	Set up hotline	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	-	10
7	Register, license and control fishing vessels	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
	Sub-total B									117	619	59	59	59	913	14	899
	C. Upgrade fishing port infrastructure																
	1. Upgrade Hon Ro fishing port																
	Provincial contribution to upgrade fishing port	Lump sum	-	1	-	-	-	1	120	-	120	-	-	-	120	120	-
	Construction	Lump sum	-	1	-	-	-	1	1,000	-	1,000	-	-	-	1,000	-	1,000
	Equipment	Lump sum	-	1	1	-	-	2	100	-	100	100	-	-	200	-	200
	Training	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	-	10
	Sub-total C.1									2	1,222	102	2	2	1,330	120	1,210
	2. Upgrade Vinh Luong fish landing site																
	Provincial contribution to upgrade fishing port	Lump sum	-	1	-	-	-	1	120	-	120	-	-	-	120	120	-
	Construction	Lump sum	-	1	-	-	-	1	1,000	-	1,000	-	-	-	1,000	-	1,000
	Equipment	Lump sum	-	1	1	-	-	2	100	-	100	100	-	-	200	-	200
	Training	Year	1	1	1	1	1	5	2	_ 2	2	2	2	2	10	-	10
	Sub-total C.2									2	1,222	102	2	2	1,330	120	1,210
3.	Provincial contribution to compensate re-settlement	nt and other															
	related activities																
	Provincial contribution (if any)	Lump sum	1	-	-	-	-	1	500	500	-	-	-	-	500	500	-
	Sub-total C									504	2,444	204	4	4	3,160	740	2,420
	TOTAL									757	3,475	285	85	85	4,687	774	3,913

Coastal resources for sustainable development
Table 304. Component C – Sustainable capture fisheries – PHU YEN

145.00	F				Qua	antity	,					Amo	unt			Inclu	iding
	Expenses	Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	Govt	IDA
A.	I. Investment Establish co-management model at commune and district level																
1	Establish co-management team	team	5	5	_	_	_	10	5	25	25	_	_	_	50	_	50
2	Upgrade office of co-management team	Commune	5	5	_	_	_	10	5	25	25	_	_	_	50	_	50
3	Office equipment, communication	Set	5	5	_	_	_	10	5	25	25	_	_	_	50	_	50
·	Consultancy to give technical support on formulation	00.	·	·				. •	Ū								
4	of co-management rule and agreement	month	6	12	12	12	12	54	1	6	12	12	12	12	54	_	54
5	Border zoning	Commune	5	5	-	-	-	10	5	25	25	-	-	-	50	_	50
6	Monitoring and drills	year	1	1	1	1	1	5	5	5	5	5	5	5	25	_	25
7	Training (including licensing)	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	_	25
-	Prepare for co-management plan at high biodiversity		-	-	•	-	•	-	-	-		-					
8	site	Plan	_	1	-	_	_	1	30	-	30	_	-	_	30	-	30
	Carry out co-management at high biodiversity																
9	sites																
		Lump															
	National consultancy (or NGO)	sum	_	1	1	1	_	3	20	-	20	20	20	_	60	-	60
		Lump															
	Goods, equipment	sum	-	-	1	-	-	1	10	-	-	10	-	-	10	-	10
	, 1 1	Lump															
	Small construction	sum	-	-	1	-	-	1	20	-	-	20	-	-	20	-	20
		Lump															
	Training, workshops	sum	-	-	1	1	1	3	10	-	-	10	10	10	30	-	30
		Lump															
	Operational cost	sum	-	-	1	1	1	3	15	-	-	15	15	15	45	-	45
	Sub-total A.9									-	20	75	45	25	165	-	165
	10. Additional support to poor fishing communities	Commune															
		Lump															
	Provincial contribution to upgrade public infrastructure	sum	1	-	-	-	-	1	20	20	-	-	-	-	20	20	-
		Lump															
	Establish public infrastructure	sum	-	1	-	-	-	1	200	-	200	-	-	-	200	-	200
	Support household's members (education, vocational																
	training)	household	-	100	-	-	-	100	0.5	-	50	-	-	-	50	-	50
	Sub-total A.10									20	250	-	-	-	270	20	250
	Sub-total A									136	422	97	67	47	769	20	749
В.	Monitoring, control and surveillance system (MCS)																
1	Equipment for province's patrol force																
	• • • •																

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Training	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	-	10
Sub-total C.2									2	1,107	867	2	2	1,980	140	1,840
3. Provincial contribution to compensate re-settlement and	d other															
related activities																
	Lump															
Provincial contribution (if any)	sum	1	-	-	-	-	1	500	500	-	-	-	-	500	500	-
Sub-total C									1,641	2,462	869	4	4	4,980	867	4,113
TOTAL									1,894	###	1,025	130	110	###	897	5,591

Coastal resources for sustainable development Table 305. Component C – Sustainable capture fisheries - BINH DINH

	Evnoncos				Qua	antity						Amou	unt			Inclu	uding
	Expenses	Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y 3	Y 4	Y5	Total	Govt	IDA
	I. Investment																
A. E	stablish co-management model at commune and district level																
1	Establish co-management team	team	5	5	-	-	-	10	5	25	25	-	-	-	50	-	50
2	Upgrade office of co-management team	Commune	5	5	-	-	-	10	5	25	25	-	-	-	50	-	50
3	Office equipment, communication	set	5	5	-	-	-	10	5	25	25	-	-	-	50	-	50
	Consultancy to give technical support on formulation																
4	of co-management rule and agreement	Month	12	24	24	24	24	108	1	12	24	24	24	24	108	-	108
5	Border zoning	Commune	5	5	-	-	-	10	5	25	25	-	-	-	50	-	50
6	Monitoring and drills	year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
7	Training (including licensing)	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
8	Additional support to poor fishing communities																
	Provincial contribution to upgrade public	Lump															
	infrastructure	sum	1	-	-	-	-	1	20	20	-	-	-	-	20	20	-
		Lump															
	Establish public infrastructure	sum	-	1	-	-	-	1	200	-	200	-	-	-	200	-	200
	Support household's members (education, vocational																
	training)	household	-	100	200	100	-	400	0.5	-	50	100	50	-	200	-	200
	Sub-total A.8									20	250	100	50	-	420	20	400
	Sub-total A									142	384	134	84	34	778	20	758
B. N	lonitoring, control and surveillance system (MCS)																
1	Equipment for province's patrol force																
	Upgrade/build patrol ship	Ship	-	2	2	-	-	4	75	-	150	150	-	-	300	-	300
	Communication equipment for fisheries enforcement	•															
	ship	Set	-	2	2	-	-	4	25	-	50	50	-	-	100	-	100
	Provincial contribution to upgrade office of sub-	Lump															
	DECAFIREP	sum	1	-	-	-	-	1	4	4	-	-	-	-	4	4	-

	Upgrade office for sub-DECAFIREP	Lump	1	-	-	-	-	1	40	40	-	-	-	-	40	-	40
	Office equipment for sub-DECAFIREP	Lump sum	1	_	_	_	_	1	20	20	_	_	_	_	20	_	20
	Establish MCS station	Station		5	_	_	_	5	20	-	100	_	_	_	100	_	100
	Provincial contribution for MCS station	Station	_	5	_	_	_	5	2	_	10	_	_	_	10	10	-
	Office equipment, high speed canoe for MCS station	Station	_	3	_	_	_	3	20	_	60	_	_	_	60	-	60
	Sub-total B.1			-						64	370	200	-	-	634	14	620
	Consultancy on technical support to monitoring and									•							
2	control of fishing activities	Month	6	12	12	12	12	54	1	6	12	12	12	12	54	-	54
3	Trainings	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
4	Carry out monitoring and control of fishing activities	Year	1	1	1	1	1	5	30	30	30	30	30	30	150	-	150
5	Communication, awareness improvement	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
6	Set up hotline	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	-	10
7	Register, license and control fishing vessels	year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
	Sub-total B									117	429	259	59	59	923	14	909
	C. Upgrading fisheries infrastructure 1. Upgrade De Gi fishing port																
	i. Opgrade De di fishing port	Lump															
	Provincial contribution to upgrade fishing port	sum	1	_	_	_	_	1	260	260	_	_	_	_	260	260	_
	1 Tovincial contribution to apprade listling port	Lump	'	_	_	_	_	'	200	200	_	_	_	_	200	200	_
	Construction: package 1	sum	1	_	_	_	_	1	1,000	1,000	_	_	_	_	1,000	_	1,000
	Pro 1.91	Lump							,	,					,		,
	Construction: package 2	sum	-	1	-	-	-	1	1,000	-	1,000	-	-	-	1,000	-	1,000
		Lump															
	Equipment	sum	-	1	-	-	-	1	600	-	600	-	-	-	600	-	600
	Training	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	-	10
	Sub-total C.1									1,262	1,602	2	2	2	2,870	260	2,610
	2. Upgrade Tan Phung fish landing site																
		Lump															
	Provincial contribution to upgrade fishing port	sum	1	-	-	-	-	1	25	25	-	-	-	-	25	25	-
		Lump															
	Construction: package 1	sum	1	-	-	-	-	1	250	250	-	-	-	-	250	-	250
	Training	Year	-	1	1	1	1	4	2	-	2	2	2	2	8	-	8
	Sub-total C.2									275	2	2	2	2	283	25	258
	3. Upgrade Nhon Ly fish landing site																
		Lump						_									
	Provincial contribution to upgrade fishing port	sum	1	-	-	-	-	1	25	25	-	-	-	-	25	25	-
	Complementians and the second	Lump	4					4	050	050					050		050
	Construction: package 1	sum	1	-	-	-	-	1	250	250	-	-	-	-	250	-	250
	Training	Year	-	1	1	1	1	4	2	-	2	2	2	2	8	-	8
	Sub-total C.3									275	2	2	2	2	283	25	258

4. Provincial contribution to compensate re-settlement and other related activities

Lump

Provincial contribution (if any)

Sub-total C

TOTAL

sum

- 1

500 <u>500 - - - - 500</u> 2,312 1,606 6 6 6 3,936 **2,571 2,419 399 149 99 5,637**

500 500 -3,936 810 3,126 5,637 844 ###

Coastal resources for sustainable development

Table 306. Component C - Sustainable capture fisheries - THANH HOA

. 45.0 0	Curanasa		-		Qua	ntity						Amou	nt			Inclu	iding
	Expenses	Unit	Y 1	Y2	Y3	Y4	Y5	Total	Price	Y 1	Y2	Y3	Y 4	Y5	Total	Govt	IDA
ΔF	I. Investment stablish co-management model at commune and																
, –	district level																
1	Establish co-management team	Team	5	5	-	-	-	10	5	25	25	-	-	-	50	-	50
2	Upgrade office of co-management team	Commune	5	5	-	-	-	10	5	25	25	-	-	-	50	-	50
3	Office equipment, communication Consultancy to give technical support on	Set	5	5	-	-	-	10	5	25	25	-	-	-	50	-	50
4	formulation of co-management rule and agreement	Month	12	24	24	24	24	108	1	12	24	24	24	24	108	-	108
5	Border zoning	Commune	5	5	-	-	-	10	5	25	25	-	-	-	50	-	50
6	Monitoring and drills	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
7	Training (including licensing)	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
8	Additional support to poor fishing commun	nities															
	Provincial contribution to upgrade public	Lump sum															
	infrastructure		1	-	-	-	-	1	20	20	-	-	-	-	20	20	-
	Establish public infrastructure	Lump sum	-	1	-	-	-	1	200	-	200	-	-	-	200	-	200
	Support household's members (education,																
	vocational training)	Household	-	100	100	-	-	200	0.5	-	50	50	-	-	100	-	100
	Sub-total A.8									20	250	50	-	-	320	20	300
	Sub-total A									142	384	84	34	34	678	20	658
B. M	onitoring, control and surveillance system (MCS)																
1	Equipment for province's patrol force																
	Upgrade/build patrol ship	Ship	-	2	-	-	-	2	160	-	320	-	-	-	320	-	320
	Communication equipment for fisheries																
	enforcement ship	Set	-	2	-	-	-	2	25	-	50	-	-	-	50	-	50
	Provincial contribution to upgrade office of sub-	Lump sum															
	DECAFIREP		1	-	-	-	-	1	3	3	-	-	-	-	3	3	-
	Upgrade office for sub-DECAFIREP	Lump sum	1	-	-	-	-	1	30	30	-	-	-	-	30	-	30
	Office equipment for sub-DECAFIREP	Lump sum	1	-	-	-	-	1	20	20	-	-	-	-	20	-	20
	Establish MCS station	Station	-	2	-	-	-	2	60	-	120	-	-	-	120	-	120

	Provincial contribution for MCS station Office equipment, high speed canoe for MCS	Station	-	2	-	-	-	2	6	-	12	-	-	-	12	12	-
	station	Station	-	5	-	-	-	5	20	-	100	-	-	-	100	-	100
	Sub-total B.1									53	602	-	-	-	655	15	640
	Consultancy on technical support to monitoring and																
2	control of fishing activities	Month	6	12	12	12	12	54	1	6	12	12	12	12	54	-	54
3	Trainings	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
4	Carry out monitoring and control of fishing activities	Year	1	1	1	1	1	5	30	30	30	30	30	30	150	-	150
5	Communication, awareness improvement	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
6	Set up hotline	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	-	10
7	Register, license and control fishing vessels	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
	Sub-total B									106	661	59	59	59	944	15	929
	C. Upgrading fisheries infrastructure 1. Upgrade Hoang Phu fish landing site																
	Provincial contribution to upgrade fishing port	Lump sum	1	_	_	_	_	1	184	184	_	_	_	_	184	184	_
	Construction: package 1	Lump sum	i	_	_	_	_	i	900	900	_	_	_	_	900	-	900
	Construction: package 2	Lump sum		1	_	_	_	1	830	-	830	_	_	_	830	_	830
	Equipment	Lump sum	_	i	_	_	_	i	110	_	110	_	_	_	110	_	110
	Training	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	_	10
	Sub-total C.1		•	•	•	•	•	·	_	1,086	942	2	2	2	2,034	184	1,850
	2. Upgrade Hai Chau fish landing site									.,000	•	_	_	_	_,00.		.,000
	Provincial contribution to upgrade fishing port	Lump sum	1	_	_	_	_	1	160	160	_	_	_	_	160	160	_
	Construction: package 1	Lump sum	_	1	-	_	_	1	1,000	-	1,000	_	_	_	1,000	-	1,000
	Construction: package 2	Lump sum	-	-	1	-	-	1	1,100	-	-	1,100	-	-	1,100	-	1,100
	Equipment	Lump sum	-	1	-	-	-	1	100	-	100	´ -	-	-	100	-	100
	Training	, Year	1	1	1	1	1	5	2	2	2	2	2	2	10	-	10
	Sub-total C.2									162	1,102	1,102	2	2	2,370	160	2,210
	3. Provincial contribution to compensate re-settler other related activities	ment and								-	, -	, -			,		, -
	Provincial contribution (if any)	Lump sum	1	-	_	_	_	1	500	500	_	-	_	_	500	500	-
	Sub-total C									1,748	2,044	1.104	4	4	4,904	844	4,060
	TOTAL									1,996	###	1,247	97	97	###	879	5,647

Coastal resources for sustainable development Table 307. Component C – Sustainable capture fisheries – NGHE AN

	F				Qu	antit	٧					Quan	tity			Inclu	ding
	Expenses	Unit	Y 1	Y2	Y3		Y5	Total	Price	Y 1	Y2	Y3	Ý4	Y5	Total	Govt	IDA
	I. Investment																
A. E	stablish co-management model at commune																
	and district level																
1	Establish co-management team	Team	4	4	-	-	-	8	5	20	20	-	-	-	40	-	40
2	Upgrade office of co-management team	Commune	4	4	-	-	-	8	5	20	20	-	-	-	40	-	40
3	Office equipment, communication	Set	4	4	-	-	-	8	5	20	20	-	-	-	40	-	40
	Consultancy to give technical support on																
	formulation of co-management rule and																
4	agreement	Month	6	12	12	12	12	54	1	6	12	12	12	12	54	-	54
5	Border zoning	Commune	4	4	-	-	-	8	5	20	20	-	-	-	40	-	40
6	Monitoring and drills	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
7	Training (including licensing)	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
8	Additional support to poor fishing comm	unities															
	Provincial contribution to upgrade public	Lump sum															
	infrastructure	•	1	-	-	-	-	1	20	20	-	-	-	-	20	20	-
	Establish public infrastructure	Lump sum	-	1	-	-	-	1	200	-	200	-	-	_	200	-	200
	Support household's members (education,	•															
	vocational training)	Household	-	20	40	40	-	100	0.5	-	10	20	20	_	50	-	50
	Sub-total A.8									20	210	20	20	-	270	20	250
	Sub-total A									116	312	42	42	22	534	20	514
B. N	Monitoring, control and surveillance system										0						•
	(MCS)																
1	Equipment for province's patrol force																
•	Upgrade/build patrol ship	Ship	_	1	_	_	_	1	50	_	50	_	_	_	50	_	50
	Communication equipment for fisheries	Op		•				•									
	enforcement ship	Set	_	2	_	_	_	2	10	_	20	_	_	_	20	_	20
	Provincial contribution to upgrade office of sub-	Lump sum		_				_	. •								
	DECAFIREP	Lamp cam	_	_	_	_	_	_		_	_	_	_	_	_	_	_
	Upgrade office for sub-DECAFIREP	Lump sum	_	_	_	_	_	_		_	_	_	_	_	_	_	_
	Office equipment for sub-DECAFIREP	Lump sum	1	_	_	_	_	1	10	10	_	_	_	_	10	_	10
	Establish MCS station	Station		_	_	_	_		10	-	_	_	_	_	-	_	-
	Provincial contribution for MCS station	Station	_	_	_	_	_	_		_	_	_	_	_	_	_	_
	Office equipment, high speed canoe for MCS	Glation															
	station	Station	_	1	2	_	_	3	10	_	10	20	_	_	30	_	30
	Upgrade/build patrol ship	Station	_	1	2	_	_	3	50	_	50	100	_	_	150	_	150
	Sub-total B	Glation	_		_	_	_	J	30	10	130	120			260		260
	Sub-total B									10	130	120	-	-	200	-	200

•	Consultancy on technical support to monitoring	N.A. 11	•	40	40	40	4.0	- 4	_	•	40	40	40	40	- 4		F.4
2	and control of fishing activities	Month	6	12	12	12	12	54	1 -	6	12	12	12	12	54	-	54
3	Trainings	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
	Carry out monitoring and control of fishing	Year						_	00	00	00	00	00	00	450		450
4	activities		1	1	1	1	1	5	30	30	30	30	30	30	150	-	150
5	Communication, awareness improvement	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
6	Set up hotline	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	-	10
7	Register, license and control fishing vessels	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
	Sub-total B									63	189	179	59	59	549	-	549
	C. Upgrading fisheries infrastructure																
	1. Upgrade Quynh Phuong fishing port																
	Provincial contribution to upgrade fishing port	Lump sum	1	-	-	-	-	1	159	159	-	-	-	-	159	159	-
	Construction: Package 1	Lump sum	1	-	-	-	-	1	280	280		-	-	-	280	-	280
	Construction: Package 2&3	Lump sum	-	1	-	-	-	1	1,260	-	1,260	-	-	-	1,260	-	1,260
	Equipment	Lump sum	-	1	-	-	-	1	49	-	49	-	-	-	49	-	49
	Training	Year	-	1	1	1	1	4	2	-	2	2	2	2	8	-	8
	Sub-total C.1									439	1,311	2	2	2	1,756	159	1,597
	2. Upgrade Lach Van fishing port																
	Provincial contribution to upgrade fishing port	Lumpsum	1	-	-	-	-	1	157	157	-	-	-	-	157	157	-
	Construction: package 1	Lump sum	1	-	-	-	-	1	800	800	-	-	-	-	800	-	800
	Construction: package 2&3	Lump sum	-	1	-	-	-	1	755	-	755	-	-	-	755	-	755
	Equipment	Lump sum	-	1	-	-	-	1	14	-	14	-	-	-	14	-	14
	Training	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	-	10
	Sub-total C.2									959	771	2	2	2	1,736	157	1,579
	3. Upgrade Lach Lo shelter	Lump sum															
	Provincial contribution to upgrade shelter	Lump sum	1	-	-	-	-	1	237	237	-	-	-	-	237	237	-
	Construction: package 1	Lump sum	1	-	-	-	-	1	1,000	1,000	-	-	-	-	1,000	-	1,000
	Construction: package 2	Lump sum	-	1	-	-	-	1	1,365	-	1,365	-	-	-	1,365	-	1,365
	Equipment	Lump sum	-	1	-	-	-	1	10	-	10	-	-	-	10	-	10
	Training	Year	-	-	1	1	1	3	2	-	-	2	2	2	6	-	6
	Sub-total C.3									1,237	1,375	2	2	2	2,618	237	2,381
4	. Provincial contribution to compensate re-settle	ement and															
	other related activities																
	Provincial contribution (if any)	Lump sum	1	-	-	-	-	1	500	500	-	-	-	-	500	500	-
	Sub-total C	•								3,135	3,457	6	6	6	6,610	1,053	5,557
	TOTAL									3,314	3,958	227	107	87	7,693	1,073	6,620

Coastal resources for sustainable development Table 308. Component C – Sustainable capture fisheries – HA TINH

i abie st	38. Component C – Sustainable capture fisheries – H	A IIIII			Qua	antity						Amo	unt			Incli	ıding
	Expenses	Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	Govt	IDA
	I. Investment																
A. E	Establish co-management model at commune and																
	district level	-	_	_				40	_	0.5	0.5				50		5 0
1	Establish co-management team	Team	5	5	-	-	-	10	5	25	25	-	-	-	50	-	50
2	Upgrade office of co-management team	Commune	5	5	-	-	-	10	5	25	25	-	-	-	50	-	50
3	Office equipment, communication	Set	5	5	-	-	-	10	5	25	25	-	-	-	50	-	50
	Consultancy to give technical support on formulation		•	40	40	40	40	- 4		•	40	40	40	40	- 4		- 4
4	of co-management rule and agreement	Month	6	12	12	12	12	54	1	6	12	12	12	12	54	-	54
5	Border zoning	Commune	5	5	-	-	-	10	5	25	25	-	-	_	50	-	50
6	Monitoring and drills	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
7	Training (including licensing)	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
8	Additional support to poor fishing communities																
		Lump															
	Provincial contribution to upgrade public infrastructure	sum	1	-	-	-	-	1	20	20	-	-	-	-	20	20	-
		Lump															
	Establish public infrastructure	sum	-	1	-	-	-	1	200	-	200	-	-	-	200	-	200
	Support household's members (education, vocational																
	training)	household	-	100	100	100	-	300	0.5		50	50	50	-	150	-	150
	Sub-total A.8									20	250	50	50	-	370	20	350
	Sub-total A									136	372	72	72	22	674	20	654
В. М	Monitoring, control and surveillance system (MCS)																
1	Equipment for province's patrol force																
	Upgrade/build patrol ship	Ship	-	1	-	-	-	1	75	-	75	-	-	-	75	-	75
	Communication equipment for fisheries enforcement																
	ship	Set	-	1	-	-	-	1	10	-	10	-	-	-	10	-	10
	Provincial contribution to upgrade office of sub-	Lump															
	DECAFIREP	sum	-	1	-	-	-	1	4	-	4	-	-	-	4	4	-
	Ungrada office for out DECATIDED	Lump															
	Upgrade office for sub-DECAFIREP	sum	-	1	-	-	-	1	40	-	40	-	-	-	40	-	40
		Lump															
	Office equipment for sub-DECAFIREP	sum	1	-	-	-	-	1	10	10	-	-	-	-	10	-	10
	Establish MCS station	Station	-	5	-	-	-	5	20	-	100	-	-	-	100	-	100
	Provincial contribution for MCS station	Station	-	5	-	-	-	5	2	-	10	-	-	-	10	10	-
	Office equipment, high speed canoe for MCS station	Station	-	5	-	-	-	5	10	-	50	-	-	-	50	-	50
	Upgrade/build patrol ship	Station	_	5	-	_	-	5	50	-	250	-	-	-	250	-	250
	Sub-total B			-				-		10	539	_	-	-	549	14	535
	Consultancy on technical support to monitoring and									. •					0.0		
2	control of fishing activities	Month	6	12	12	12	12	54	1	6	12	12	12	12	54	_	54
_	Control of Horning Convince	WOLL	J					0 1	•	0					0.		0.

3	Trainings	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
4	Carry out monitoring and control of fishing activities	Year	1	1	1	1	1	5	30	30	30	30	30	30	150	-	150
5	Communication, awareness improvement	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	-	25
6	Set up hotline	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	-	10
7	Register, license and control fishing vessels Sub-total B	Year	1	1	1	1	1	5	5	<u>5</u>	5 598	5 59	5 59	5 59	25 838	- 14	25 824
	C. Upgrading fisheries infrastructure 1. Upgrade Thach Kim fishing port																-
	10 01	Lump															
	Provincial contribution to upgrade fishing port	sum Lump	1	-	-	-	-	1	95	95	-	-	-	-	95	95	-
	Construction	sum Lump	-	1	-	-	-	1	850	-	850	-	-	-	850	-	850
	Equipment	sum	-	1	-	_	-	1	100	-	100	-	-	-	100	_	100
	Training	Year	-	1	1	1	1	4	2	-	2	2	2	2	8	-	8
	Sub-total C.1									95	952	2	2	2	1,053	95	958
	2. Upgrade Ky Ha fishing port														,		
	13 , 31	Lump															
	Provincial contribution to upgrade fishing port	sum Lump	1	-	-	-	-	1	95	95	-	-	-	-	95	95	-
	Construction	sum Lump	-	1	-	-	-	1	850	-	850	-	-	-	850	-	850
	Equipment	sum	_	1	-	_	_	1	100	_	100	_	-	_	100	_	100
	Training	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	_	10
	Sub-total C.2									97	952	2	2	2	1,055	95	960
3.	Provincial contribution to compensate re-settlement related activities	and other												_	1,000		
		Lump															
	Provincial contribution (if any)	sum	1	-	-	-	-	1	500	500	-	-	-	-	500	500	-
	Sub-total C									692	1,904	4	4	4	2,608	690	1,918
	TOTAL									891	2,874	135	135	85	4,120	724	3,396

Coastal resources for sustainable development Table 309. Component C – Sustainable capture fisheries - PCU

Evnance				Qu	antity	,					Am	nount			Including
Expenses	Unit	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	IDA
I. Investment															
A. Monitoring, Control and Surveillance system															
(MCS)															
1. Support to DECAFIREP	Lumn														
Equipment	Lump sum	1	_	_	_	_	1	50	50	_	_	_	_	50	50
Technical support	Month	6	12	12	12	12	54	2	12	24	24	24	24	108	108
Training	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	50
Year	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	25
Sub-total A.1	Year	'	'	•	•	'	5	3		39	39	39	39	233	233
	Year	1	4	4	4	4	E	20	20	20	20	20	20	233 100	233 100
 Support provinces to conduct MCS Maintain and update database on capture 	Year	1	- 1	1	ı	ı	5	20	20	20	20	20	20	100	100
fisheries	1 Cai	1	1	1	1	1	5	20	20	20	20	20	20	100	100
4. Dissemination, awareness improvement	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	50
5. Workshops	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	10
Sub-total A		•	•	•	•	•	Ü	_	129	91	91	<u>–</u> 91	<u>–</u> 91	493	493
B. Establish co-management model									120	٥.	٥.	01	٥.	100	100
b. Establish to management model	Lump														
1. Establish manual for coastal capture fisheries	sum	-	1	1	-	-	2	10	-	10	10	-	-	20	20
2. Trainings	Year	1	1	1	1	1	5	5	5	5	5	5	5	25	25
Dissemination and awareness improvement	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	50
4. Workshops	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	10
Sub-total B									17	27	27	17	17	105	105
C. Upgrade fisheries infrastructure															
Study selected fishing gear	Year	_	1	1	_	_	2	50	_	50	50	_	_	100	100
Study venue for establishment of new fishing port	Year	_	1	1	_	_	2	100	_	100	100	_	_	200	200
3. Improve institutional framework and on-port	Year		•	•			_	100		.00	.00				200
monitoring		1	1	1	1	1	5	5	5	5	5	5	5	25	25
4. Trainings	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	50
5. Dissemination and awareness improvement	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	50
6. Workshops	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	10
Sub-total C									27	177	177	27	27	435	435
TOTAL									173	295	295	135	135	1,033	1,033

Coastal resources for sustainable development Table 401. Component D – Project Management - CA MAU

France				Qu	antity	у					Amo	ount			Inclu	uding
Expenses	Unit	Y 1	Y2	Y3	Y4	Y5	Price	Unit	Y1	Y2	Y3	Y4	Y5	Total	Govt.	IDA
I. Investment																
A. Repair, upgrade office for PPMU																
Provincial contribution for office repair and	Lump															
upgrade	sum	1	-	-	-	-	1	0.5	0.5	-	-	-	-	0.5	0.5	-
10	Lump															
Upgrade and repair office for PPMU	sum	1	-	-	-	-	1	5	5.0	-	-	-	-	5.0	-	5.
	Lump															
Office equipment for PPMU	sum	1	-	-	-	-	1	25	25.0	-	-	-	-	25.0	-	25
Sub-total I.A									30.5	-	-	-	-	30.5	0.5	30
B. Capacity strengthening																
PPMU workshops	Workshop	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	10
PPMU training of procurement, financial																
management and project management	Training	1	1	1	-	-	3	5	5.0	5.0	5.0	-	-	15.0	-	15
Local study tours	Trip	-	1	1	-	-	2	15	-	15.0	15.0	-	-	30.0	-	30
Sub-total I.B									7.0	22.0	22.0	2.0	2.0	55.0	-	55
C. Monitoring and Evaluation																
Monitoring, evaluation (M&E)	Year	1	1	1	1	1	5	10	10.0	10.0	10.0	10.0	10.0	50.0	-	50
Training on M&E	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	10
Sub-total I.C									12.0	12.0	12.0	12.0	12.0	60.0	-	60
. Implementation of environmental and social																
plan (ESMP)																
Carry out ESMP	Year	1	1	1	1	1	5	20	20.0	20.0	20.0	20.0	20.0	100.0	-	10
Training on ESMP	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	10
Sub-total I.D									22.0	22.0	22.0	22.0	22.0	110.0	-	110
E. Financial management																
Audit, financial management internal control	Year	1	1	1	1	1	5	10	10.0	10.0	10.0	10.0	10.0	50.0	-	50
Training on financial management internal																
control	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	10
Sub-total I.E									12.0	12.0	12.0	12.0	12.0	60.0	-	60
F. Technical support																
 Local consultancy on aquaculture 	Month	6	12	12	12	12	54	1.5	9.0	18.0	18.0	18.0	18.0	81.0	-	81
2. Local consultancy on capture fisheries	Month	6	12	12	12	12	54	1.5	9.0	18.0	18.0	18.0	18.0	81.0	-	81
Sub-total I.F									18.0	36.0	36.0	36.0	36.0	162.0	-	16
G. Car	Car	1	-	-	-	-	1	60	60.0	-	-	-	-	60.0	-	60
Sub-total I									161.5	104.0	104.0	84.0	84.0	537.5	0.5	537
II. Concurrent expenses																

A. Salary for PPMU staff 1. Salary for PPMU staff																
-	Manath	10	40	12	40	10	00	0.4	4.0	4.0	4.0	4.0	4.0	04.0	040	
Director	Month	12	12	. –	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Vice Director	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Accountant	Month	24	24	24	24	24	120	0.4	9.6	9.6	9.6	9.6	9.6	48.0	48.0	-
M&E staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Planning staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Procurement staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Safeguard staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Driver (contracted)	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Admin., clerical staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Sub-total II.A									48.0	48.0	48.0	48.0	48.0	240.0	240.0	-
B. Operational cost																
	Lump															
Operational cost	sum	1	1	1	1	1	5	35	35.0	35.0	35.0	35.0	35.0	175.0	-	175.0
Sub-total II									83.0	83.0	83.0	83.0	83.0	415.0	240.0	175.0
TOTAL									244.5	187.0	187.0	167.0	167.0	952.5	240.5	712.0

Coastal resources for sustainable development Table 402. Component D - Project Management- SOC TRANG Quantity Amount Including **Expenses** UNIT Y1 Y2 Y3 Y4 Y5 Total Price Y1 **Y2 Y3** Y5 **Y4** Total GOVT IDA I. Investment A. Repair, upgrade office for PPMU Provincial contribution for office upgrade and Lump 0.5 0.5 repair sum 0.5 0.5 Lump Repair, upgrade office for PPMU 5 5.0 5.0 5.0 sum Lump Office equipment for PPMU sum 25.0 25.0 Sub-total I.A 30.5 0.5 30.0 B. Capacity strengthening 10.0 PPMU workshops 2 2.0 2.0 2.0 10.0 Workshop 2.0 2.0 PPMU training on procurement, financial management and project management Training 5 5.0 5.0 5.0 15.0 15.0 15 Trip Local study tours 15.0 15.0 30.0 30.0 Sub-total I.B 22.0 22.0 2.0 2.0 55.0 55.0 C. Monitoring and Evaluation (M&E)

Monitoring and Evaluation (M&E)	Year Year	1	1	1	1	1	5 5	10 2	10.0	10.0	10.0	10.0	10.0	50.0	-	50.0
Training on M&E Sub-total I.C	rear	ı	ı	ı	ļ	1	5	2	2.0 12.0	2.0 12.0	2.0 12.0	2.0 12.0	2.0 12.0	10.0 60.0	-	10.0 60.0
D. Carry out Environmental and Social									12.0	12.0	12.0	12.0	12.0	60.0	-	60.0
Management Plan (ESMP)																
Carry out ESMP	Year	4	4	4	4	4	_	20	20.0	20.0	20.0	20.0	20.0	100.0	_	100.0
Training on ESMP	Year	1	- 1	1	1	1	5 5	20 2	20.0	2.0	2.0	2.0	2.0	100.0	-	100.0
Sub-total I.D	real	1	1	'	'	ı	5	2	22.0	22.0	22.0	22.0	22.0	110.0		110.0
E. Financial management									22.0	22.0	22.0	22.0	22.0	110.0	-	110.0
Audit, internal financial management control	Year	-1	4	4	4	4	5	10	10.0	10.0	10.0	10.0	10.0	50.0	_	50.0
Training on internal audit of financial	rear	'	'	'	,	'	5	10	10.0	10.0	10.0	10.0	10.0	50.0	-	50.0
•	Year	-1	4	4	4	4	5	2	2.0	2.0	2.0	2.0	2.0	10.0		10.0
management Sub-total I.E	rear	'	'	'	,	'	5	2	12.0	12.0	12.0	12.0	12.0	60.0		60.0
F. Technical support									12.0	12.0	12.0	12.0	12.0	00.0	-	60.0
National consultancy on aquaculture	Month	6	12	12	12	12	54	1.5	9.0	18.0	18.0	18.0	18.0	81.0	_	81.0
National consultancy on capture fisheries	Month	6	12	12	12	12	54	1.5	9.0	18.0	18.0	18.0	18.0	81.0	_	81.0
Sub-total I.F	WOTEN	O	12	12	12	12	J 4	1.5	18.0	36.0	36.0	36.0	36.0	162.0		162.0
G. Car	Car	1	_	_	_	_	1	60	60.0	-	30.0	-	50.0	60.0	_	60.0
Sub-total I	Oai	'					'	00	161.5	104.0	104.0	84.0	84.0	537.5	0.5	537.0
II. Concurrent expenses									101.5	104.0	104.0	04.0	04.0	337.3	0.5	337.0
A. Salary for PPMU staff																
1. Salary for PPMU staff																
Director	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Deputy Director	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Accountant	Month	24	24	24	24	24	120	0.4	9.6	9.6	9.6	9.6	9.6	48.0	48.0	-
M&E staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Planning staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Procurement staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Safeguards staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Driver (contracted)	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Admin., clerical staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Sub-total II.A									48.0	48.0	48.0	48.0	48.0	240.0	240.0	-
B. Operational cost																
•	Lump															
Operational cost	sum	1	1	1	1	1	5	35	35.0	35.0	35.0	35.0	35.0	175.0	-	175.0
Sub-total II									83.0	83.0	83.0	83.0	83.0	415.0	240.0	175.0
TOTAL									244.5	187.0	187.0	167.0	167.0	952.5	240.5	712.0

Coastal resources for sustainable development
Table 403. Component D – Project management - KHANH HOA

Evnonco					antity							ount			Inclu	ding
Expenses	UNIT	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	GOVT	ID
I. Investment																
A. Repair, upgrade office for PPMU																
Provincial contribution for office upgrade and	Lump															
repair	sum	1	_	_	-	_	1	0.5	0.5	_	_	_	-	0.5	0.5	_
- F	Lump															
Repair, upgrade office for PPMU	sum	1	-	-	-	-	1	5	5.0	-	-	-	-	5.0	-	5
	Lump															
Office equipment for PPMU	sum	1	-	-	-	-	1	25	25.0	-	-	-	-	25.0	-	25
Sub-total I.A									30.5	-	-	-	-	30.5	0.5	30
B. Capacity strengthening																
PPMU workshops	Workshop	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	10
PPMU training on procurement, financial																
management and project management	Training	1	1	1	-	-	3	5	5.0	5.0	5.0	-	-	15.0	-	15
Local study tours	Trip	-	1	1	-	-	2	15	-	15.0	15.0	-	-	30.0	-	30
Sub-total I.B									7.0	22.0	22.0	2.0	2.0	55.0	-	5
C. Monitoring and Evaluation (M&E)																
Monitoring and Evaluation (M&E)	Year	1	1	1	1	1	5	10	10.0	10.0	10.0	10.0	10.0	50.0	-	50
Training on M&E	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	10
Sub-total I.C									12.0	12.0	12.0	12.0	12.0	60.0	-	6
D. Carry out Environmental and Social																
Management Plan (ESMP)							_									
Carry out ESMP	Year	1	1	1	1	1	5	20	20.0	20.0	20.0	20.0	20.0	100.0	-	10
Training on ESMP	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	1
Sub-total I.D									22.0	22.0	22.0	22.0	22.0	110.0	-	11
E. Financial management																
Audit, internal financial management control	Year	1	1	1	1	1	5	10	10.0	10.0	10.0	10.0	10.0	50.0	-	50
Training on internal audit of financial		_					_	_								
management	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	10
Sub-total I.E									12.0	12.0	12.0	12.0	12.0	60.0	-	60
F. Technical support		_														_
National consultancy on aquaculture	Month	6	12	12	12	12	54	1.5	9.0	18.0	18.0	18.0	18.0	81.0	-	81
2. National consultancy on capture fisheries	Month	6	12	12	12	12	54	1.5	9.0	18.0	18.0	18.0	18.0	81.0	-	8
Sub-total I.F	_						_		18.0	36.0	36.0	36.0	36.0	162.0	-	16
G. Car	Car	1	-	-	-	-	1	60	60.0	-		-		60.0		60
Sub-total I									161.5	104.0	104.0	84.0	84.0	537.5	0.5	53
II. Concurrent expenses																

A. Salary for PPMU staff 1. Salary for PPMU staff																
Director	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	_
Deputy Director	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	_
Accountant	Month	24	24	24	24	24	120	0.4	9.6	9.6	9.6	9.6	9.6	48.0	48.0	-
M&E staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Planning staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Procurement staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Safeguards staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Driver (contracted)	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Admin., clerical staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Sub-total II.A									48.0	48.0	48.0	48.0	48.0	240.0	240.0	-
B. Operational cost																
	Lump															
Operational cost	sum	1	1	1	1	1	5	35	35.0	35.0	35.0	35.0	35.0	175.0	-	175.0
Sub-total II									83.0	83.0	83.0	83.0	83.0	415.0	240.0	175.0
TOTAL									244.5	187.0	187.0	167.0	167.0	952.5	240.5	712.0

Evnances				Qu	antity	y					Amo	ount			Inclu	iding
Expenses	UNIT	Y 1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	GOVT	IE
I. Investment																
A. Repair, upgrade office for PPMU																
Provincial contribution for office upgrade and	Lump															
repair	sum	1	-	-	-	-	1	0.5	0.5	-	-	-	-	0.5	0.5	
	Lump															
Repair, upgrade office for PPMU	sum	1	-	-	-	-	1	5	5.0	-	-	-	-	5.0	-	
	Lump															
Office equipment for PPMU	sum	1	-	-	-	-	1	25	25.0	-	-	-	-	25.0	-	2
Sub-total I.A									30.5	-	-	-	-	30.5	0.5	3
B. Capacity strengthening																
PPMU workshops	Workshop	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	1
PPMU training on procurement, financial																
management and project management	Training	1	1	1	-	-	3	5	5.0	5.0	5.0	-	-	15.0	-	1
Local study tours	Trip	-	1	1	-	-	2	15	-	15.0	15.0	-	-	30.0	-	3
Sub-total I.B									7.0	22.0	22.0	2.0	2.0	55.0	-	5
C. Monitoring and Evaluation (M&E)																

Monitoring and Evaluation (M&E) Training on M&E Sub-total I.C	Year Year	1 1	1 1	1 1	1 1	1	5 5	10 2	10.0 2.0 12.0	10.0 2.0 12.0	10.0 2.0 12.0	10.0 2.0 12.0	10.0 2.0 12.0	50.0 10.0 60.0	- -	50.0 10.0 60.0
D. Carry out Environmental and Social									12.0	12.0	12.0	12.0	12.0	00.0		00.0
Management Plan (ESMP)																
Carry out ESMP	Year	1	1	1	1	1	5	20	20.0	20.0	20.0	20.0	20.0	100.0	_	100.0
Training on ESMP	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	10.0
Sub-total I.D									22.0	22.0	22.0	22.0	22.0	110.0	-	110.0
E. Financial management																
Audit, internal financial management control	Year	1	1	1	1	1	5	10	10.0	10.0	10.0	10.0	10.0	50.0	-	50.0
Training on internal audit of financial																
management	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	10.0
Sub-total I.E									12.0	12.0	12.0	12.0	12.0	60.0	-	60.0
F. Technical support																
 National consultancy on aquaculture 	Month	6	12	12	12	12	54	1.5	9.0	18.0	18.0	18.0	18.0	81.0	-	81.0
National consultancy on capture fisheries	Month	6	12	12	12	12	54	1.5	9.0	18.0	18.0	18.0	18.0	81.0	-	81.0
Sub-total I.F									18.0	36.0	36.0	36.0	36.0	162.0	-	162.0
G. Car	Car	1	-	-	-	-	1	60	60.0	-	-	-	-	60.0	-	60.0
Sub-total									161.5	104.0	104.0	84.0	84.0	537.5	0.5	537.0
II. Concurrent expenses																
A. Salary for PPMU staff																
1. Salary for PPMU staff																
Director	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Deputy Director	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Accountant	Month	24	24	24	24	24	120	0.4	9.6	9.6	9.6	9.6	9.6	48.0	48.0	-
M&E staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Planning staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Procurement staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Safeguards staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Driver (contracted)	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Admin., clerical staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	
Sub-total II.A									48.0	48.0	48.0	48.0	48.0	240.0	240.0	-
B. Operational cost	1															
Onevetional seet	Lump	4	1	4	4	4	_	0.5	05.0	05.0	05.0	05.0	05.0	175.0		175.0
Operational cost	sum	ı	ı	ı	ı	I	5	35	35.0	35.0	35.0	35.0	35.0	175.0	- 040.0	175.0
Sub-total II									83.0	83.0	83.0	83.0	83.0	415.0	240.0	175.0
TOTAL									244.5	187.0	187.0	167.0	167.0	952.5	240.5	712.0

Coastal resources for sustainable development Table 405. Component D – Project management - BINH DINH

Expenses					antity			_			Amo				Inclu	
Expenses	UNIT	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	GOVT	ID/
I. Investment																
A. Repair, upgrade office for PPMU																
Provincial contribution for office upgrade and	Lump															
repair	sum	1	_	_	_	_	1	0.5	0.5	_	_	_	_	0.5	0.5	_
Topan	Lump	•					•	0.0	0.0					0.0	0.0	
Repair, upgrade office for PPMU	sum	1	_	-	_	_	1	5	5.0	-	-	_	_	5.0	-	5.
- F , - F- 3	Lump															
Office equipment for PPMU	sum	1	-	-	-	-	1	25	25.0	-	-	-	-	25.0	-	25
Sub-total I.A									30.5	-	-	-	-	30.5	0.5	30
B. Capacity strengthening																
PPMU workshops	Workshop	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	10
PPMU training on procurement, financial	·															
management and project management	Training	1	1	1	-	-	3	5	5.0	5.0	5.0	-	-	15.0	-	15
Local study tours	Trip	-	1	1	-	-	2	15	-	15.0	15.0	-	-	30.0	-	30
Sub-total I.B	•								7.0	22.0	22.0	2.0	2.0	55.0	-	55
C. Monitoring and Evaluation (M&E)																
Monitoring and Evaluation (M&E)	Year	1	1	1	1	1	5	10	10.0	10.0	10.0	10.0	10.0	50.0	-	50
Training on M&E	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	10
Sub-total I.C									12.0	12.0	12.0	12.0	12.0	60.0	-	60
D. Carry out Environmental and Social																
Management Plan (ESMP)																
Carry out ESMP	Year	1	1	1	1	1	5	20	20.0	20.0	20.0	20.0	20.0	100.0	-	10
Training on ESMP	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	10
Sub-total I.D									22.0	22.0	22.0	22.0	22.0	110.0	-	11
E. Financial management																
Audit, internal financial management control	Year	1	1	1	1	1	5	10	10.0	10.0	10.0	10.0	10.0	50.0	-	50
Fraining on internal audit of financial management	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	10
Sub-total I.E									12.0	12.0	12.0	12.0	12.0	60.0	-	60
F. Technical support																
 National consultancy on aquaculture 	Month	6	12	12	12	12	54	1.5	9.0	18.0	18.0	18.0	18.0	81.0	-	81
National consultancy on capture fisheries	Month	6	12	12	12	12	54	1.5	9.0	18.0	18.0	18.0	18.0	81.0	-	81
Sub-total I.F									18.0	36.0	36.0	36.0	36.0	162.0	-	16
G. Car	Car	1	-	-	-	-	1	60	60.0		-		-	60.0		60
Sub-total I									161.5	104.0	104.0	84.0	84.0	537.5	0.5	53
II. Concurrent expenses																
A. Salary for PPMU staff																
1. Salary for PPMU staff																

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Director	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Deputy Director	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Accountant	Month	24	24	24	24	24	120	0.4	9.6	9.6	9.6	9.6	9.6	48.0	48.0	-
M&E staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Planning staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Procurement staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Safeguards staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Driver (contracted)	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Admin., clerical staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Sub-total II.A									48.0	48.0	48.0	48.0	48.0	240.0	240.0	-
B. Operational cost																
	Lump															
Operational cost	sum	1	1	1	1	1	5	35	35.0	35.0	35.0	35.0	35.0	175.0	-	175.0
Sub-total II									83.0	83.0	83.0	83.0	83.0	415.0	240.0	175.0
TOTAL									244.5	187.0	187.0	167.0	167.0	952.5	240.5	712.0

Coastal resources for sustainable development
Table 406. Component D – Project management - THANH HOA

Evnance				Qu	antity	/					Amo	ount			Including	
Expenses	UNIT	Y 1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	GOVT	IDA
I. Investment																
A. Repair, upgrade office for PPMU																
Provincial contribution for office upgrade and	Lump															
repair	sum	1	-	-	-	-	1	0.5	0.5	-	-	-	-	0.5	0.5	-
·	Lump															
Repair, upgrade office for PPMU	sum	1	-	-	-	-	1	5	5.0	-	-	-	-	5.0	-	5.0
	Lump															
Office equipment for PPMU	sum	1	-	-	-	-	1	25	25.0	-	-	-	-	25.0	-	25.
Sub-total I.A									30.5	-	-	-	-	30.5	0.5	30.
B. Capacity strengthening																
PPMU workshops	Workshop	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	10.
PPMU training on procurement, financial																
management and project management	Training	1	1	1	-	-	3	5	5.0	5.0	5.0	-	-	15.0	-	15.
Local study tours	Trip	-	1	1	-	-	2	15		15.0	15.0	-	-	30.0	-	30.
Sub-total I.B									7.0	22.0	22.0	2.0	2.0	55.0	-	55.
C. Monitoring and Evaluation (M&E)																
Monitoring and Evaluation (M&E)	Year	1	1	1	1	1	5	10	10.0	10.0	10.0	10.0	10.0	50.0	-	50.
Training on M&E	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	10.
Sub-total I.C									12.0	12.0	12.0	12.0	12.0	60.0	-	60.

D. Carry out Environmental and Social																
Management Plan (ESMP)	V	4	4	4	4	4	-	00	00.0	00.0	00.0	00.0	00.0	100.0		100.0
Carry out ESMP	Year Year	1	- 1	1	- 1	1	5 5	20 2	20.0	20.0 2.0	20.0 2.0	20.0 2.0	20.0	100.0	-	100.0
Training on ESMP	rear	1	ı	ı	ı	1	5	2	2.0				2.0	10.0		10.0
Sub-total I.D									22.0	22.0	22.0	22.0	22.0	110.0	-	110.0
E. Financial management	V			_	_		_	4.0	400	100	40.0	100	400	F0.0		F0.0
Audit, internal financial management control	Year	1	1	1	1	1	5	10	10.0	10.0	10.0	10.0	10.0	50.0	-	50.0
Training on internal audit of financial							_	_						400		400
management	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	10.0
Sub-total I.E									12.0	12.0	12.0	12.0	12.0	60.0	-	60.0
F. Technical support		_														
National consultancy on aquaculture	Month	6	12	12	12	12	54	1.5	9.0	18.0	18.0	18.0	18.0	81.0	-	81.0
2. National consultancy on capture fisheries	Month	6	12	12	12	12	54	1.5	9.0	18.0	18.0	18.0	18.0	81.0	-	81.0
Sub-total I.F									18.0	36.0	36.0	36.0	36.0	162.0	-	162.0
G. Car	Car	1	-	-	-	-	1	60	60.0	-	-	-	-	60.0	-	60.0
Sub-total I									161.5	104.0	104.0	84.0	84.0	537.5	0.5	537.0
II. Concurrent expenses																
A. Salary for PPMU staff																
1. Salary for PPMU staff																
Director	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Deputy Director	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Accountant	Month	24	24	24	24	24	120	0.4	9.6	9.6	9.6	9.6	9.6	48.0	48.0	-
M&E staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Planning staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Procurement staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Safeguards staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Driver (contracted)	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Admin., clerical staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	
Sub-total II.A									48.0	48.0	48.0	48.0	48.0	240.0	240.0	-
B. Operational cost																
	Lump															
Operational cost	sum	1	1	1	1	1	5	35	35.0	35.0	35.0	35.0	35.0	175.0	-	175.0
Sub-total II									83.0	83.0	83.0	83.0	83.0	415.0	240.0	175.0
TOTAL									244.5	187.0	187.0	167.0	167.0	952.5	240.5	712.0

Coastal resources for sustainable development Table 407. Component D – Project management - NGHE AN

Expenses					antit			-			Amo				Inclu	
Lapenses	UNIT	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	GOVT	ID
I. Investment																
A. Repair, upgrade office for PPMU																
Provincial contribution for office upgrade and	Lump															
repair	sum Lump	1	-	-	-	-	1	0.5	0.5	-	-	-	-	0.5	0.5	
Repair, upgrade office for PPMU	sum Lump	1	-	-	-	-	1	5	5.0	-	-	-	-	5.0	-	5
Office equipment for PPMU	sum	1	_	_	_	_	1	25	25.0	-	-	-	_	25.0	-	2
Sub-total I.A									30.5	-	-	-	-	30.5	0.5	3
B. Capacity strengthening																
PPMU workshops	Workshop	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	1
PPMU training on procurement, financial									-	-	-	-	_			
management and project management	Training	1	1	1	-	-	3	5	5.0	5.0	5.0	-	-	15.0	-	1
Local study tours	Trip	-	1	1	-	-	2	15	-	15.0	15.0	-	-	30.0	-	3
Sub-total I.B	•								7.0	22.0	22.0	2.0	2.0	55.0	-	5
C. Monitoring and Evaluation (M&E)																
Monitoring and Evaluation (M&E)	Year	1	1	1	1	1	5	10	10.0	10.0	10.0	10.0	10.0	50.0	-	5
Training on M&E	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	1
Sub-total I.C									12.0	12.0	12.0	12.0	12.0	60.0	-	6
D. Carry out Environmental and Social Management Plan (ESMP)																
Carry out ESMP	Year	1	1	1	1	1	5	20	20.0	20.0	20.0	20.0	20.0	100.0	-	1
Training on ESMP	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	1
Sub-total I.D									22.0	22.0	22.0	22.0	22.0	110.0	-	1
E. Financial management																
Audit, internal financial management control Training on internal audit of financial	Year	1	1	1	1	1	5	10	10.0	10.0	10.0	10.0	10.0	50.0	-	5
management	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	1
Sub-total I.E									12.0	12.0	12.0	12.0	12.0	60.0	-	6
F. Technical support																
National consultancy on aquaculture	Month	6	12	12	12	12	54	1.5	9.0	18.0	18.0	18.0	18.0	81.0	-	8
2. National consultancy on capture fisheries	Month	6	12	12	12	12	54	1.5	9.0	18.0	18.0	18.0	18.0	81.0	-	8
Sub-total I.F									18.0	36.0	36.0	36.0	36.0	162.0	-	1(
G. Car	Car	1	-	-	-	-	1	60	60.0	-	-	-	-	60.0	-	6
Sub-total I									161.5	104.0	104.0	84.0	84.0	537.5	0.5	50
II. Concurrent expenses																

A. Salary for PPMU staff 1. Salary for PPMU staff																
Director	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Deputy Director	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Accountant	Month	24	24	24	24	24	120	0.4	9.6	9.6	9.6	9.6	9.6	48.0	48.0	-
M&E staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Planning staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Procurement staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Safeguards staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Driver (contracted)	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Admin.and clerical staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Sub-total II.A									48.0	48.0	48.0	48.0	48.0	240.0	240.0	-
B. Operational cost																
	Lump															
Operational cost	sum	1	1	1	1	1	5	35	35.0	35.0	35.0	35.0	35.0	175.0	-	175.0
Sub-total II									83.0	83.0	83.0	83.0	83.0	415.0	240.0	175.0
ΤΟΤΔΙ									244 5	187 0	187 0	167.0	167.0	952 5	240 5	712 0

Including

Coastal resources for sustainable development
Table 408. Component D – Project management - HA TINH

Expenses

UNIT

V1 Y2 Y3 Y4 Y5 Total
Price
Y1 Y2 Y3 Y4

I Investment

Expenses						,										9
Expenses	UNIT	Y1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	GOVT	IDA
I. Investment																
A. Repair, upgrade office for PPMU																
Provincial contribution for office upgrade and	Lump															
repair	sum	1	-	-	-	-	1	0.5	0.5	-	-	-	-	0.5	0.5	-
	Lump															
Repair, upgrade office for PPMU	sum	1	-	-	-	-	1	5	5.0	-	-	-	-	5.0	-	5.0
	Lump															
Office equipment for PPMU	sum	1	-	-	-	-	1	25	25.0	-	-	-	-	25.0	-	25.0
Sub-total I.A									30.5	-	-	-	-	30.5	0.5	30.0
B. Capacity strengthening																
PPMU workshops	Workshop	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	10.0
PPMU training on procurement, financial																
management and project management	Training	1	1	1	-	-	3	5	5.0	5.0	5.0	-	-	15.0	-	15.0
Local study tours	Trip	-	1	1	-	-	2	15	-	15.0	15.0	-	-	30.0		30.0
Sub-total I.B									7.0	22.0	22.0	2.0	2.0	55.0	-	55.0

C. Monitoring and Evaluation (M&E)

Monitoring and Evaluation (M&E) Training on M&E	Year Year	1 1	1	1	1	1	5 5	10 2	10.0 2.0	10.0 2.0	10.0 2.0	10.0 2.0	10.0 2.0	50.0 10.0	-	50.0 10.0
Sub-total I.C	roui	•	•	•			Ü	_	12.0	12.0	12.0	12.0	12.0	60.0		60.0
D. Carry out Environmental and Social									12.0	12.0	12.0	12.0	12.0	00.0		00.0
Management Plan (ESMP)																
Carry out ESMP	Year	1	1	1	1	1	5	20	20.0	20.0	20.0	20.0	20.0	100.0	_	100.0
Training on ESMP	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	_	10.0
Sub-total I.D							_		22.0	22.0	22.0	22.0	22.0	110.0	-	110.0
E. Financial management									_							
Audit, internal financial management control	Year	1	1	1	1	1	5	10	10.0	10.0	10.0	10.0	10.0	50.0	-	50.0
Training on internal audit of financial																
management	Year	1	1	1	1	1	5	2	2.0	2.0	2.0	2.0	2.0	10.0	-	10.0
Sub-total I.E									12.0	12.0	12.0	12.0	12.0	60.0	-	60.0
F. Technical support																
 National consultancy on aquaculture 	Month	6	12	12	12	12	54	1.5	9.0	18.0	18.0	18.0	18.0	81.0	-	81.0
2. National consultancy on capture fisheries	Month	6	12	12	12	12	54	1.5	9.0	18.0	18.0	18.0	18.0	81.0	-	81.0
Sub-total I.F									18.0	36.0	36.0	36.0	36.0	162.0	-	162.0
G. Car	Car	1	-	-	-	-	1	60	60.0	-	-	-	-	60.0	-	60.0
Sub-total I									161.5	104.0	104.0	84.0	84.0	537.5	0.5	537.0
II. Concurrent expenses																
A. Salary for PPMU staff																
1. Salary for PPMU staff																
Director	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Deputy Director	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Accountant	Month	24	24	24	24	24	120	0.4	9.6	9.6	9.6	9.6	9.6	48.0	48.0	-
M&E staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Planning staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Procurement staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Safeguards staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Driver (contracted)	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Admin.and clerical staff	Month	12	12	12	12	12	60	0.4	4.8	4.8	4.8	4.8	4.8	24.0	24.0	-
Sub-total II.A									48.0	48.0	48.0	48.0	48.0	240.0	240.0	-
B. Operational cost																
	Lump															
Operational cost	sum	1	1	1	1	1	5	35	35.0	35.0	35.0	35.0	35.0	175.0	-	175.0
Sub-total II									83.0	83.0	83.0	83.0	83.0	415.0	240.0	175.0
TOTAL									244.5	187.0	187.0	167.0	167.0	952.5	240.5	712.0

Coastal resources for sustainable development Table 409. Component D – Project management - PCU

Tubio 400. Component D. Troject management. 1 CC				Qu	antity	,					Amo	unt			Inclu	ding
Expenses	UNIT	Y 1	Y2	Y3	Y4	Y5	Total	Price	Y1	Y2	Y3	Y4	Y5	Total	GOVT	IDA
I. Investment																
A. Office upgrade																
A. Office upgrade	Lump															
PCU office equipment	sum	1	_	_	_	_	1	62	62	_	_	_	_	62	_	62
B. Capacity strengthening		-					·							-		-
PCU workshops	training	1	1	1	1	1	5	15	15	15	15	15	15	75	_	75
Training on procurement, financial management,							•									. •
project management of PCU	training	1	1	1	-	-	3	20	20	20	20	-	-	60	-	60
Study tour (local and international trips to learn GAP,																
fishing port management)	trip	1	2	2	2	2	9	65	65	130	130	130	130	585	-	585
Post-graduate education	training	-	2	1	-	-	3	35	-	70	35	-	-	105	-	105
Sub-total I.B									100	235	200	145	145	825	-	825
C. Monitoring and Evaluation (M&E)																
Monitoring and Evaluation (M&E)	Year	1	1	1	1	1	5	20	20	20	20	20	20	100	-	100
Training on M&E	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	-	10
Sub-total I.C									22	22	22	22	22	110	-	110
D. Carry out Environmental and Social Management Plan (ESMP)																
Carry out ESMP	Year	-	1	-	-	-	1	200	-	200	-	-	-	200	-	200
Training on ESMP	Year	1	1	1	1	1	5	2	2	2	2	2	2	10	-	10
Sub-total I.D								•	2	202	2	2	2	210	-	210
E. Financial management																
Audit, internal financial management control (APMB)	Year	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50
Training on internal audit of financial management	Year Lump	1	1	1	1	1	5	10	10	10	10	10	10	50	-	50
Consultancy on internal audit	sum	-	1	-	-	-	1	150	-	150	-	-	-	150	-	150
Sub-total I.E								•	20	170	20	20	20	250	-	250
F. Technical support																
Chief Technical Advisor	Month	6	10	10	10	9	45	25	150	250	250	250	225	1,125	-	1,125
National consultancy on aquaculture	Month	6	12	12	12	12	54	3	18	36	36	36	36	162	_	162
National consultancy on capture fisheries	Month	6	12	12	12	12	54	3	18	36	36	36	36	162	-	162
National consultancy on procurement	Month	6	12	12	12	6	48	3	18	36	36	36	18	144	-	144
National consultancy on M&E	Month	6	12	12	12	6	48	3	18	36	36	36	18	144	-	144
National consultancy on construction(1)	Month	6	8	8	8	3	33	3	18	24	24	24	9	99	-	99
2000 1200 2200 200 200 200 200 200 200 2		-	-	-	-	-		-					-			

National consultancy on construction (2)	Month	6	8	8	8	3	33	3	18	24	24	24	9	99	-	99
Sub-total I.F									258	442	442	442	351	1,935	-	1,935
	Lump															
G. Project audit	sum	1	-	-	-	-	1	350	350	-	-	-	-	350	-	350
H. Accounting software	Software	1	-	-	-	-	1	40	40	-	-	-	-	40	-	40
I. Interpreter	Month	6	12	12	12	12	54	2	12	24	24	24	24	108	-	108
J. Car	Vehicle	1	-	-	-	-	1	60	60	-	-	-	-	60	-	60
Sub-total I									926	1,095	710	655	564	3,950	-	3,950
II. Concurrent expenses																
A. Salary for PPMU staff																
1. Salary for PPMU staff																
Director	Month	12	12	12	12	12	60	0.4	5	5	5	5	5	24	24	-
Deputy Director	Month	24	24	24	24	24	120	0.4	10	10	10	10	10	48	48	-
Accountant	Month	36	36	36	36	36	180	0.4	14	14	14	14	14	72	72	-
M&E staff	Month	12	12	12	12	12	60	0.4	5	5	5	5	5	24	24	-
Planning staff	Month	12	12	12	12	12	60	0.4	5	5	5	5	5	24	24	-
Procurement staff	Month	24	24	24	24	24	120	0.4	10	10	10	10	10	48	48	-
Safeguards staff	Month	12	12	12	12	12	60	0.4	5	5	5	5	5	24	24	-
Driver (contracted)	Month	12	12	12	12	12	60	0.4	5	5	5	5	5	24	24	-
Admin.and clerical staff	Month	12	12	12	12	12	60	0.4	5	5	5	5	5	24	24	-
Sub-total II.A									62	62	62	62	62	312	312	-
B. Operational cost																
1. PCU Operational cost	Year	1	1	1	1	1	5	50	50	50	50	50	50	250	-	250
2. PCU Office lease	Year	1	1	1	1	1	5	25	25	25	25	25	25	125	-	125
Sub-total II.B									75	75	75	75	75	375	-	375
Sub-total II									137	137	137	137	137	687	312	375
TOTAL									1,063	1,232	847	792	701	4,637	312	4,325