

*The Study on Comprehensive Disaster Prevention
around Mayon Volcano*

SUPPORTING REPORT (2)

(Part II : Feasibility Study)

XX : IMPLEMENTATION PLAN

**SUPPORTING REPORT (2) – XX
IMPLEMENTATION PLAN**

Table of Contents

	<u>Page</u>
1. IMPLEMENTATION PLAN.....	XX - 1
1.1 Issues in Project Implementation	XX - 1
1.2 Project Implementation by LGUs and by National Government.....	XX - 2
1.3 Classification of Priority Projects and Supporting Projects and Programs.....	XX - 4
1.4 Implementing Organization	XX - 6
1.4.1 Profile of Related Organizations.....	XX - 6
1.4.2 Implementation Arrangement	XX - 9
1.4.3 Project Coordination and Management.....	XX - 12
1.5 Implementation Schedule.....	XX - 14
1.5.1 Project Cost Sharing by Implementing Organization	XX - 14

SUPPORTING REPORT (2) – XX IMPLEMENTATION PLAN

1. IMPLEMENTATION PLAN

The following projects and programs have been presented as priority projects and supporting projects and programs.

(1) Priority Projects

- Yawa River System Sabo Project
- Legazpi City Urban Drainage Project
- Forecasting and Warning System Strengthening Project
- Evacuation System Strengthening Project
- Resettlement Sites Development Project

(2) Supporting Projects and Programs

- Organization and Strengthening of Multi-purpose Cooperatives with Micro Credit
- Hollow Block Production
- Agro-industry Development (Abaca, Pilinut and Coco Coir)
- Aggregate Production Plant Project
- Productivity Enhancement Programs in the Protected Area
- Provincial Disaster Management System Strengthening
- Community-based Disaster Management Strengthening

The details of each project are described in Chapters 8 and 9 of the Volume II “MAIN REPORT”.

This section presents the following four issues:

- Issues in project implementation
- Implementing organization
- Implementation schedule
- Project cost sharing among implementing organizations

1.1 Issues in Project Implementation

Local governments are expected to play a greater role in development activities. Considerable efforts in devolution have been made since the enactment of Local Government Code in 1991, however, the process is incomplete. The progress in devolution so far has been made mostly in social welfare, agriculture, environment and health sectors but less in public works sector. LGUs complain lack of finance due to inadequate revenue allotments from the national government. There are some confusions on the three levels of government –

national, provincial and city/municipality – due to the absence of detailed guidelines on project implementation responsibility. Thus, the enactment of Local Government Code and subsequent devolution of responsibilities for local government resulted to a new dimension of implementation issues.

1.2 Project Implementation by LGUs and by National Government

(1) NEDA Policy Framework

Investment Coordination Committee of NEDA issued a “Policy framework for national government assistance for the financing of local government project with environmental and social objectives”¹ in 1998. Though it shall be the policy of national government to support the financing of devolved activities, NEDA admits that such support will be limited, temporary, and targeted at selected groups of LGUs.

National government pay due attention to the following three aspects when assessing the needs for financing and management intervention in infrastructure development projects.

1) Equity (National Minimum)

If LGUs are unable to provide the minimum level of services to their constituents, national government may intervene in its service provision. The eligibility of LGUs will be based on income class and on economic class (as may be measured by poverty incidence).

2) Externalities

Intervention by national government is justified by spatial externalities, or when benefits and/or costs of public services provided by an LGU are realized by non-residents.

3) Economies of Scale

The provision of some services can be made more cost-effective if designated for a service is larger than the jurisdiction of a single LGU.

¹ Proposed NG-LGU Cost Sharing plan on Water Supply, Rural Infrastructure, Health and Environmental Sectors are attached as table “Proposed NG-LGU COST SHARING prepared by NEDA”.

LGU initiative in project implementation is important for the following reasons: (1) it would make the recipient (LGU) a major stakeholder, (2) it can be a good indicator of the LGU's need for the project, and (3) it can influence the LGU's spending priorities to activities with positive externalities. The LGU counterpart would have to be large enough to force the LGU and the community to decide for themselves if the project is the best investment for their own resources. Counterpart from the community can be in-kind resources that can be supplied by its members such as labor, local materials, and right-of-way.

Recurrent operation and maintenance expenditures shall be given low priority for national government grants. It is necessary to establish mechanisms to enable LGUs to collect user charges to raise revenue for the operation and maintenance of local public facilities.

(2) Cost Sharing Examples

1) Flood Control and Road

There are two actual cost sharing agreements reached between DPWH and LGUs. One is KAMANAVA Flood Control and Drainage System Improvement Project (Metro Manila), and the other case is the Butuan City (Mindanao) Circumstantial Road and Second Bridge. In the case of KAMANAVA Project, the Municipality of Malabon will collaborate in resettlement of people to be affected by construction works. The City of Butuan is agreed to shoulder the road right of way acquisition cost of the project in the amount not exceeding 5 Million Pesos.

2) Irrigation and Agrarian Reform

a. Southern Philippines Irrigation Sector (ADB)

This project will construct and improve small to medium – scale irrigation systems, strengthen irrigation operation and maintenance. While executing agency of this project is National Irrigation Administration (NIA), irrigators' associations as beneficiaries will contribute 25% of total construction costs of newly constructed or rehabilitated irrigation facilities in order to generate a sense of ownership.

b. Agrarian Reform Community Development (IBRD)

This project has three components: a) Community Development and Technical Assistance, b) rural infrastructure, c) Agricultural and Enterprise Development. Oversight responsibility for the project rests with the Department of Agrarian Reform. Project costs are estimated at about US\$106 million. The cost sharing plan is shown below.

Project Cost Sharing

(US\$ million)

IBRD	50
Agrarian Reform Communities	20
Local Government Units	5
National Government	11
Land Bank of the Philippines	20
Total	106

*Agrarian Reform Communities refer to 80,000 households.

3) Summary of Cost Sharing Examples

In the Southern Philippines Irrigation Sector Project, and Agrarian Reform Community Development Project, LGUs and beneficiaries are expected to shoulder a part of project cost. In both cases, irrigation component is included. The direct beneficiaries can be identified. The beneficiaries are convinced of the return from their investment (contribution) in the project. In the cases of flood control and road projects LGUs' contribution is limited to pre-investment (Resettlement and Right-of Way) stage.

1.3 Classification of Priority Projects and Supporting Projects and Programs

Based on the Philippine government policy, the Study Team classified the Priority Projects selected in the Master Plan depending on the potential for cost-recovery from user charges, its inter-LGU spillover effects and its local impact visibility. (table “Characteristics of Priority Projects and Supporting Projects and Programs”)

As seen in the above-mentioned table, Sabo and Urban Drainage Project have less potential for cost recovery from user charge. In terms of inter-LGU spillover effects, Yawa River System Sabo Project may have medium level spill over effects because hazard area extends to Camalig, Daraga and Legazpi City, while Legazpi City Urban Drainage Project's beneficiary is limited to Legazpi City. Forecasting, Warning System, and Evacuation System likewise have low potential for cost recovery from users however their inter-LGU spillover effects are high. For those projects with low potential for cost recovery for users and especially for those with high spillover effects, national government funding/intervention is required.

National government intervention for Yawa River System Sabo, Legazpi City Urban Drainage, Forecasting and Warning System Strengthening projects is justified in view of its externalities and economy of scale.

Characteristics of Priority Projects and Supporting Projects and Programs

Group	Project	Potential for Cost Recovery from User Charges	Inter-LGU Spillover Effects	Local Impact Visibility	Government Intervention	
PRIORITY PROJECTS	SABO/DRAINAGE	Yawa River System Sabo Project	Low	Medium	Low	<ul style="list-style-type: none"> • NG&LGU - Construction - O & M
		Legazpi City Urban Drainage	Low	Low	Medium	<ul style="list-style-type: none"> • NG&LGU - Construction - O & M
	FW&E	Forecasting and Warning System Strengthening	Low	High	Medium	<ul style="list-style-type: none"> • NG - Construction - O & M
		Evacuation System Strengthening	Low	High	Low	<ul style="list-style-type: none"> • NG&LGU - Construction - O & M
SUPPORTING PROJECTS AND PROGRAMS	RESETTLEMENT	Resettlement Site Development	Medium	Low	High	<ul style="list-style-type: none"> • LGU - Construction - O & M
		Supporting Programs for Resettlers - Cooperatives - Holow Block - Agro-industry	Medium	Medium	High	<ul style="list-style-type: none"> • LGU&NG - Credit Assistance - Technical Assistance
	INSTITUTIONAL	Provincial Disaster Management System Strengthening	Low	Medium	Low	<ul style="list-style-type: none"> • LGU - Technical Assistance
		Community based Disaster Prevention Capacity Strengthening	Low	Medium	High	<ul style="list-style-type: none"> • LGU - Technical Assistance
	ECONOMIC DEVELOPMENT	Aggregate Production Plant	Medium	Low/Medium	Low/Medium	<ul style="list-style-type: none"> • LGU - Technical Assistance
	Mineral Water Development	Medium	High	High	<ul style="list-style-type: none"> - Technical Assistance 	
	Protected Area Development	Medium	Medium	Medium	<ul style="list-style-type: none"> - Technical Assistance 	

NG – National Government

LGU – Local Government Unit

However, LGUs financing and management intervention is also considered important. Efforts have to be made to encourage local ownership and adoption of participatory approaches in project design, implementation and O&M².

Those projects with medium level potential for cost recovery, local government units should take the initiative in project implementation. The projects of this category include Resettlement Site Development, Supporting Programs for Resettlers, Aggregate Production Plant, and Mineral Water Development.

These projects can expect cost recovery from users. For example, those people who settled to resettlement site can contribute to LGUs through Community Tax³ and Real Property Tax. In addition to such taxing schemes, Legazpi City has a plan to charge 50 Pesos per month as Operation and Maintenance charge for Banquerohan resettlement site.

For Supporting Programs for Resettlers, training costs shall be borne by beneficiaries (resettlers).

Business Tax collection is expected from Aggregate Production, Mineral Water and Agro-industry. Business Tax is 100% retained at city/municipality. In the case of Legazpi City, a share of Business Tax to Total Revenue is approximately 10% in 1998.

In case of Aggregate Production, Tax on Sand, Gravel and other Quarry Resources can also be expected.

1.4 Implementing Organization

1.4.1 Profile of Related Organizations

Table "Profile of Related Organizations" describes the related organizations' mandate, budget, and number of staff, number of engineer or professional staff and project implementation experiences. As seen in the table, as national government agencies, DPWH only has project implementation in various sectors including flood control, road, bridges, drainage, sabo and school building.

While the Local Government Code of 1991 stipulates the transfer of responsibility of service delivery to LGUs, LGUs still do not have sufficient capacity for project implementation. Neither Legazpi City nor Daraga Municipality has capacity to

² For Legazpi City's Track record in project implementation, see table "INFRASTRUCTURE PROJECT IMPLEMENTATED BY LEGAZPI CITY".

³ Collected Real Property Tax is shared among Province (35%), City/Municipality (40%), and Barangay (25%), Community Tax is retained 100% at City/Municipality.

implement Yawa River System Sabo, Legazpi City Urban Drainage Project, Forecasting and Warning System Strengthening Project. There are several constraints:

- 1) They do not have experience in Sabo, Drainage and Forecasting projects;
- 2) They do not have sufficient number of engineers to plan and manage the projects, - Legazpi City has licensed 18 engineers and Daraga, only 1 engineer- (nevertheless Legazpi City and Daraga are seen to have higher capacity for O&M of facilities – see table “Engineering Capacity to participate in operation and maintenance activities for infrastructure including Sabo and Flood Control Facilities” assessed by DILG Regional Office);
- 3) Their annual budget is small – Project cost for Yawa River System Sabo Project is seven (7) times bigger than Legazpi City’s annual budget.⁴

Legazpi City and Daraga Municipality citizens are direct beneficiaries of the project. However, Legazpi City and Daraga Municipality’s contribution to the Yawa Sabo and Urban Drainage Projects will be limited to land acquisition due to the above mentioned constraints (capacity of LGUs).

⁴ For Legazpi City’s Revenue and Expenditure, see table “REVENUE OF LEGAZPI CITY” and table “EXPENDITURE OF LEGAZPI CITY”.

Profile of the Related Organizations

Organizations	Mandate	Annual Budget (98) Million-pesos	Number of Staff	Number of Engineer / Professional	Project Experience	Remark
DPWH	Provision of technical services for the planning, design, construction, maintenance and/or operation of infrastructure facilities	27,253	18,395	5,171	Flood control, Road, Bridges, Drainage, School, Sabo	Expertise in Multi-sector
DPWH Regional Center		N/A	207	76		
DECS	Supplies school buildings as evacuation center	35,782	503,439	498,772	School management	
PHIVOLCS	Issues advisories on earthquake and volcanic activities	120	236	194	Earthquake, Volcano	
- Lignon Hill and Buang		N/A	10	3		
PAGASA	Observe and report the weather of the Philippines and specified adjacent areas, issue forecasts and warnings of weather and flood conditions affecting national safety, welfare and economy	360	1,382	1,374	Weather, Flood forecasting	
- Legazpi		N/A	12	2		
OCD	Coordination of the activities of the government and private sectors to ensure maximum utilization of resources for the protection and preservation of the populace and property during emergency	57	239	186	Coordination of disaster operation including Warning	
- Region V		N/A	5	3		
DTI	coordination, promotion, facilitation and regulation of the country's trade and industry	1,620	3,232	3,026	Trade and Industry	
DSWD	Organizes relief and rehabilitation activities with DCCs	1,471	2,627	2,063	Relief and Rehabilitation	
- Field Office V		N/A	98	87		
NHA (Region V)	Assesses housing requirements of displaced persons, provides emergency or temporary housing	N/A	25	5	Resettlement, socialized housing	Livelihood assistance for resettlers
ALBAY	Efficient and effective provision of infrastructure facilities to service the needs of the residents including but not limited to provincial roads and bridges, inter-municipality water works, drainage and sewerage, flood control	321	637	30	Road, Bridge, Irrigation, Resettlement	1st. Class LGU
LEGAZPI	All the services and facilities of the municipality and province, and adequate communication and transportation facilities	231	533	18	Resettlement	1st. Class LGU
DARAGA	Efficient and effective provision of infrastructure facilities to service the needs of the residents including but not limited to municipal roads and bridges, water supply systems, dikes, drainage and sewerage	51	365	1	Resettlement	1st. Class LGU

Mandate of NG agencies is drawn from various Executive Orders for Departments and agencies, and also drawn from PD1566.

Mandate of LGU is based on Section 27 (Basic Services and Facilities) Local Government Code of 1991.

N/A - data not available

1.4.2 Implementation Arrangement

(1) Summary of Implementation Agency

The implementing arrangement by project cycle is given in table “Implementation Arrangement of Priority Projects”, “Implementation Arrangement of supporting Project and Programs” likewise.

Implementing Agency for the priority projects are summarized below.

Project/Program	Implementing Organization
Yawa River System Sabo	DPWH
Legazpi City Urban Drainage	DPWH
Forecasting and Warning System	
Monitoring System of Volcanic Activities	PHIVOLCS
Monitoring System of Flood and Mud Flow	DPWH
Warning System	OCD
Repeater Station System	DPWH
Inter-agency Disaster Mitigation Network	OCD
Evacuation System Strengthening	
Evacuation Center	DPWH
Emergency Shelter	LGUs
Livestock Sanctuary	LGUs
Resettlement Site Development Projects	
Banquerohan	Legazpi
Anislag	Daraga

Implementation Arrangement of Priority Projects

Projects	Oversight Responsibility	Detailed Design	Selection of Contractor	Land Acquisition	Construction / Installation of equipment	O &M
Yawa River System Sabo Project	DPWH	DPWH	DPWH	Legazpi City, Daraga	DPWH	DPWH
Legazpi City Urban Drainage Project	DPWH	DPWH	DPWH	Legazpi City	DPWH	DPWH
Forecasting and Warning System Strengthening Project						
- Monitoring System of Volcanic Eruption	PHIVOLCS	PHIVOLCS	PHIVOLCS	N/A	PHIVOLCS	PHIVOLCS
- Monitoring System of Flood and Mud Flow	DPWH	DPWH	DPWH	N/A	DPWH	DPWH
- Warning System	OCD	OCD	OCD	N/A	OCD	OCD
- Repeater Station System	DPWH	DPWH	DPWH	N/A	DPWH	DPWH
- Inter-agency Disaster Mitigation Network	OCD	OCD	OCD	N/A	OCD	LGUs
Evacuation System Strengthening Project						
- Evacuation Center	DPWH	DPWH	DPWH	N/A	DPWH	DECS
- Emergency Shelter	LGUs	LGUs	LGUs	LGUs	LGUs	LGUs
- Livestock Sanctuary	LGUs	LGUs	LGUs	LGUs	LGUs	LGUs
Resettlement Site Development Projects						
Banquerohan Phase I and Phase II	Legazpi	Legazpi	Legazpi	N/A	Legazpi	Legazpi
Anislag	Daraga	Daraga	Daraga	N/A	Daraga	Daraga

N/A = Not applicable

Implementation Arrangement of Supporting Projects and Programs

Projects	Oversight Responsibility	Advisory	Preparatory Works	Detailed Design	Selection of Contractor	Construction / Installation of equipment	Operation
Supporting Programs for Resettlers							
Organization and Strengthening of Multi-Purpose Cooperatives with Micro-Credit	Legazpi, Daraga	DSWD, LBP, TLRC	Legazpi City, Daraga	N/A	N/A	N/A	Cooperative
Hollow Block Production	Legazpi City, Daraga	TLRC	Cooperative	Cooperative	Cooperative	Cooperative	Cooperative
Agro-industry Development							
- Abaca Production and Handicraft	Legazpi City, Daraga	FIDA	Cooperative	Cooperative	Cooperative	Cooperative	Cooperative
- Pilinut Processing	Legazpi City, Daraga	DA	Cooperative	Cooperative	Cooperative	Cooperative	Cooperative
- Coco Coir Production	Legazpi City, Daraga	CDA	Cooperative	Cooperative	Cooperative	Cooperative	Cooperative
Study Area Economic Development							
- Aggregate Production Plant	DPWH	DPWH	Private Sector	Private Sector	Private Sector	Private Sector	Private Sector
- Mineral Water Production Plant	DTI		Private Sector	Private Sector	Private Sector	Private Sector	Private Sector
- Protected Area Development Project	DPWH	DA / DTI	DPWH	DPWH	DPWH	DPWH	DPWH
Institutional Strengthening for Disaster Prevention Capacity							
- Provincial Disaster Management System Strengthening	Albay		Albay	N/A	N/A	Albay	Albay
- Community-based Disaster Management Strengthening	Legazpi City & 9 Municipalties		Legazpi City & 9 Municipalities	N/A	N/A	Legazpi City & 9 Municipalities	Legazpi City & 9 Municipalities

N/A = Not applicable

(2) Recommendation for Implementation

1) DPWH and LGU collaboration

Legazpi City and Daraga Municipality's participation in implementation of Yawa River System Sabo Project is recommended. As examined above, the two LGUs' capacity to implement the project is insufficient at the moment. The Philippine government's idea is to devolve the activities of the national government to LGUs. It is useful to make the LGU a major stakeholder to identify if the project is best investment.

Therefore, engineers from the LGUs should be involved in the project planning and management. It would contribute to the LGUs project management capability enhancement. DPWH should propose the arrangement enabling the LGUs' engineers' participation.

2) Force Account System for Yawa River System Sabo

Cost Estimate and Implementation Schedule are prepared on the Contract Basis in this Report.

However, Force Account System is proposed for Yawa River System Sabo Project. Though DPWH has many experiences in Sabo, flood control and drainage projects, they have not implemented such projects in Force Account System. Therefore, it is recommended for DPWH to implement the Project in Force Account System as means of capacity building for project management though the project cost is over one thousand million pesos.

1.4.3 Project Coordination and Management

There are five core projects proposed as Priority Projects. Supporting projects and programs are presented to complement the priority projects. Following figure presents overall project coordination and management structure. Project Steering Committee consists of DPWH and NEDA at national level. In the Study Area, Technical Working Committee comprised of DPWH, NEDA, PHIVOLCS and OCD is established. Technical Working Committee coordinates with the existing Development Council – Bicol Region Development Council and Albay Provincial Development Council.

Under the supervision of Technical Working Committee, Project Management Office (PMO) will be established in DPWH Region V. Consultants shall be assigned to PMO as the engineers defined by FIDIC. PMO monitors and supervises all the projects and programs. For each project and program, Sub-PMOs will be established.

insert **“Project Coordination and Management Structure”**

1.5 Implementation Schedule

Implementation schedule of priority projects and supporting projects and programs is summarized in the following figures.

1.5.1 Project Cost Sharing by Implementing Organization

Project cost sharing will be made according to Implementation Arrangement. Tentative cost sharing plan for priority projects is given in the following tables.

Implementation Schedule of the Priority Projects

	Projects and Programs	(1999 - 2005)						
		1999	2000	2001	2002	2003	2004	2005
PRIORITY PROPOJECTS	<i>Sabo Facility Construction</i>							
	Yawa River System Sabo Project							
	<i>Urban Drainage</i>							
	Legazpi City Urban Drainage Project							
	<i>Forecasting, Warning and Evacuation</i>							
	Forecasting and Warning System Strengthening Project							
	Evacuation System Strengthening Project							
	<i>Resettlement Site Development Project</i>							
	Resettlement Site Development Projects							

- Notes :
- Feasibility Study
 - Financial Arrangement
 - Selection of Consultant
 - Detailed Design
 - Selection of Contractor
 - Construction Works and/or Installation of Equipment
 - Preparatory Works

Implementation Schedule of the Supporting Projects and Programs

	Projects and Programs	(1999 - 2005)						
		1999	2000	2001	2002	2003	2004	2005
SUPPORTING AND INSTITUTIONAL PROJECTS AND PROGRAMS	<i>Supporting programs for Resettlers</i>							
	Organization and Strengthening of Multi-purpose Cooperatives with Micro Credit							
	Hollow Block Production							
	Agro-industry Development (Abaca, Pilinut and Coco Coir)							
	<i>Proposed Projects for Study Area Economic Development</i>							
	Aggregate Production Plant Project							
	Mineral Water Development Project							
	Protected Area Development Project							
	<i>Institutional Strengthening Project for Disaster Prevention</i>							
	Provincial Disaster Management System Strengthening							
	Community-based Disaster Management Strengthening							

Notes :

	Financial Arrangement
	Selection of Consultant
	Detailed Design
	Selection of Contractor
	Construction Works and/or Installation of Equipment
	Preparatory Works
	Operation

Project Cost Sharing for Yawa River System Sabo Project

Unit: Million PHP

Description	F.C.	L.C.	DPWH	Legazpi City	Daraga	Total
1. Direct Cost	164.4	547.9	712.3	0.0	0.0	712.3
2. Government Administration Cost	-	15.5	15.5	0.0	0.0	15.5
3. Engineering Services Cost	144.4	13.3	157.7	0.0	0.0	157.7
4. Land Acquisition	-	35.3	0.0	25.4	9.9	35.3
5. Physical Contingency	30.9	61.2	92.1	0.0	0.0	92.1
Subtotal (1 - 5)	339.7	673.2	977.6	25.4	9.9	1,012.9
6. Price Contingency	38.1	318.7	315.7	29.6	11.5	356.8
Total	377.8	991.9	1,293.3	55.0	21.4	1,369.7

Project Cost Sharing for Legazpi City Urban Drainage Project

Unit: Million PHP

Description	F.C.	L.C.	DPWH	Legazpi City	Total
1. Direct Cost	205.6	129.1	334.7	0.0	334.7
2. Government Administration Cost	-	10.6	10.6	0.0	10.6
3. Engineering Services Cost	62.2	8.7	70.9	0.0	70.9
4. Land Acquisition	-	15.7	0.0	15.7	15.7
5. Physical Contingency	26.8	16.4	43.2	0.0	43.2
Subtotal (1 - 5)	294.6	180.5	459.4	15.7	475.1
6. Price Contingency	35.4	83.4	105.7	13.1	118.8
Total	330.0	263.9	565.1	28.8	593.9

Project Cost Sharing for Forecasting and Warning Strengthening Project

Unit: Million PHP

Description	F.C.	L.C.	DPWH	PHIVOLCS	OCD	Total
1. Direct Cost	210.8	37.0	111.8	40.7	95.3	247.8
2. Government Administration Cost	-	9.8	5.0	1.5	3.3	9.8
3. Engineering Services Cost	51.7	7.3	30.1	8.9	20.1	59.0
4. Physical Contingency	26.3	5.4	16.2	4.8	10.8	31.7
Subtotal (1 - 5)	288.8	59.5	163.1	55.8	129.4	348.3
5. Price Contingency	33.8	25.3	30.1	8.9	20.1	59.1
Total	322.6	84.8	193.2	64.6	149.5	407.4

Project Cost Sharing for Evacuation System Strengthening Project

Unit: Million PHP

Description	F.C.	L.C.	DPWH	*LGUs	Total
1. Direct Cost	0.0	291.9	260.8	31.1	291.9
2. Government Administration Cost	-	9.1	8.5	0.6	9.1
3. Engineering Services Cost	34.4	6.2	37.8	2.8	40.6
4. Physical Contingency	3.4	30.7	31.7	2.4	34.1
Subtotal (1 - 5)	37.8	337.9	338.8	36.9	375.7
5. Price Contingency	3.3	127.4	121.6	9.1	130.7
Total	41.1	465.3	460.3	46.1	506.4

*LGUs' cost sharing is proposed for Emergency Shelter and Livestock Sanctuary, LGUs refer to Legazpi City and 9 Municipalities. The detail is given in Table below.

Summary of Project Cost Sharing for Resettlement Site Development Project

Unit: Million PHP

Description	F.C.	L.C.	Legazpi	Daraga	Total
1. Direct Cost	4.7	202.5	120.5	86.7	207.2
2. Government Administration Cost	-	9.1	5.4	3.7	9.1
3. Engineering Services Cost	37.3	6.3	25.7	17.9	43.6
4. Physical Contingency	4.2	21.8	15.3	10.7	26.0
Subtotal (1 - 5)	46.2	239.7	167.0	118.9	285.9
5. Price Contingency	4.0	90.0	55.5	38.5	94.0
Total	50.2	329.7	222.4	157.5	379.9

Summary of Project Cost Sharing for Priority Projects

Unit: Million PHP

Project	DPWH	PHIVOL CS	OCD	Legazpi City	Daraga	*LGUs	Total
1. Yawa River System Sabo	1,293.3			55.0	21.4		1,369.7
2. Legazpi City Urban Drainage	565.1			28.8			593.9
3. Forecasting and Warning System	193.2	64.6	149.5				407.4
4. Evacuation System Strengthening	460.3			4.1	1.2	40.7	506.4
5. Resettlement Site Development				222.4	157.5		379.9
Total	2,511.9	64.6	149.5	310.4	180.1	40.7	3,257.2

*LGUs refer to Municipalities of Camalig, Guinobatan, Ligao, Malilipot, Sto. Domingo and Tabaco

Summary of Project Cost Sharing for Evacuation Shelter and Livestock Sanctuary by LGUs

Unit: Million PHP

LGU	Bacacay	Camalig	Daraga	Guinobatan	Ligao	Malilipot	Malinao	Sto. Domingo	Tabaco	Legazpi	Total
Number of Shelter&Sanctuary	LS-1	ES-2, LS-1	ES-1	ES-2, LS-1	ES-1, LS-1	ES-2, LS-1	LS-1	ES-3, LS-1	ES-3, LS-1	ES-2, LS-1	ES-16, LS-9
1. Direct Cost	1.93	3.33	1.70	3.33	2.63	3.33	1.93	4.02	4.02	3.33	29.55
Government Administration											
2. Cost	0.04	0.07	0.04	0.07	0.06	0.07	0.04	0.09	0.09	0.07	0.64
3. Engineering Services Cost	0.19	0.32	0.16	0.32	0.25	0.32	0.19	0.39	0.39	0.32	2.84
4. Physical Contingency	0.16	0.27	0.14	0.27	0.21	0.27	0.16	0.33	0.33	0.27	2.39
Subtotal (1 - 4)	2.32	3.99	2.03	3.99	3.15	3.99	2.32	4.82	4.82	3.99	35.42
5. Price Contingency	0.60	1.03	0.53	1.03	0.81	1.03	0.60	1.25	1.25	1.03	9.15
Total	2.91	5.02	2.56	5.02	3.97	5.02	2.91	6.07	6.07	5.02	44.57

ES- Emergency Shelter
LS- Livestock sanctuary

PROPOSED NG-LGU COST SHARING BY NEDA

Sector/Activity	LGU Income Class	Revised NG Share (%)	Remarks
I. Water Supply (Only for level 1)	1st	0	No NG grants Level 2 and 3 water system
	2nd	0	
	3rd and 4th	0	
	5th and 6th	50	
II. Rural Infrastructure			
A. Public Market Bus Terminal	1st - 6th	0	Revenue generating projects will not be provided NG grants.
	1st - 6th	0	
B. Provincial Roads Municipal Roads	1st - 6th	0	NG support only possible for access roads, farm to market roads covered by approved national programs (e.g. envirolement or agrarian reform)
	1st- 6th	0	
C. Communal Irrigation	1st	20	The cost-sharing arrangement applies only to capital costs
	2nd and 3rd	30	
	4th	40	
	5th and 6th	50	
III. Health	1st and 2nd	50	The cost-sharing arrangement applies only to capital costs
	3rd and 4th	70	
	5th and 6th	90	
IV. Environment			
A. Blue watershed protection, municipal fishery mgt., coastal resource mgt., mangrove protection/rehabilitation	1st	20	Cost sharing based on total project cost (PS and MOOE included in the NG grant)
	2nd and 3rd	50	
	4th and 6th	70	
B. Green Reforestation and forest related activities, soil conservation, protected area mgt. Wildlife conservation	1st	20	Cost sharing based on total project cost (PS and MOOE included in the NG grant)
	2nd and 3rd	50	
	4th and 6th	70	
C. Brown Solid waste mgt. vehicular emission control, water pollution control, traffic engineering	1st	0	NG will shoulder costs pertaining to rehabilitation of ecosystems. LGUs shall shoulder all other costs (I.e. enforcement, investments, O & M)
	2nd and 3rd	0	
	4th and 6th	0	
D. Sanitary Support Facilities for public Markets and Sluaghterhouse	3rd and 4th	50	
	5th and 6th	70	

SOURCE: NEDA INVESTMENT COORDINATION COMMITTEE "Policy Framework for National Government Assistance for the Financing of Local Government Projects with Environmental and/or Social Benefits

INFRASTRUCTURE PROJECT IMPLEMENTED BY LEGAZPI CITY

ITEM NO.	PROJECT/ PROGRAME DESCRIPTOIN	IMPLEMEN-TATION YEAR	DURATION	LENGTH/ VOLUME	SOURCE OF FUND	PROJECT COST	EQUIPMENT UTILIZED	BRIDF DESCRIPTION OF PROJECT
1.	River Improvement/ Flood Control Project	1996	270 C.D.	18,577 cu.m	DOTC	5.0 M	Bulldozer, Payloader, Dump Truck, Trailer Truck, Backhoe	Dredging of River Course (Pawa-Yawa River)
		1997	300 C.D.	23,868 cu.m	NDCC	6.1 M		Dredging of River Course (Bonga-Mabinit-Pawa-Bongtong)
		1997	90 C.D.	6,429 cu.m	NDCC	2.5 M		Dredging of River Course (Arimbay River)
2.	Road Construction	1995	200 C.D.	3 kms	LGIF/USAI D (80%) & LGU (20%)	14.16 M		Road Opening (Tahao and Alternte Road)
		1999	165 C.D.	352 L.M.	LGU	2.989 M	Road Roller, Road Grade, Concrete Mixer, Hand Tools	Cocnreting of Quezon Avenue
3.	Resettlement Site Development Project	1994	360 C.D.	304 Units	NDCC	20.0 M	Bulldozer, Payloader, Dump Truck, Backhoe, Trailer Truck, Hand Tools, Concrete Mixer	Site Development and Housing Construction
		995		200 Units	NDCC	9.0 M		Housing Construction
		1996		92 Units	NDCC	5.0 M		Site Development and Housing Construction
		1994-1996		Lump Sum	NHA	14.93 M		Site Development and Acquisition
		1995	60 C.D.	13 L.M.	NDCC	2.0 M	Boom Crane with Drop Hammer, Backhoe, Concrete Mixer, Dump Truck, Hand Tools	Construction of RCDG Bridge, Cagbacong, Legazpi City

**Engineering Capability to participate in Operation and Maintenance Activities for Infrastructure
including Sabo and Flood Control Facilities Assessed by (DILG Region V)**

Province, City and Municipalities	* High	* Medium	* Low	Comment
1. Albay Provincial Government	×			
2. Legazpi City	×			
3. Bacacay		×		Have undergone actual construction of flood control facilities in the LGU.
4. Camalig		×		
5. Daraga	×			Trainings and experience.
6. Guinobatan		×		
7. Ligao	×			
8. Malilipot		×		
9. Malinao		×		Operation and Maintenance activities for infrastructure is under the supervision of MPDC.
10. Sto. Domingo	×			Training and experience.
11. Tabaco	×			

Assessment is based on past track record or experiences in related project and willingness.

REVENUE OF LEGAZPI CITY

PHP

Items	1990		1995		1998		1999
	Budget	Realized	Budget	Realized	Budget	Realized	Budget
1. IRA	9,839,211.00	14,555,503.00	121,230,285.00	117,185,648.00	168,519,337.00	157,539,332.00	166,657,398.00
(1) Reserve for Calamity	0.00	0.00	7,324,239.00	7,122,007.40	11,247,817.00	10,698,816.60	10,802,980.00
(2) Development Fund	1,967,842.20	2,911,100.60	24,246,057.00	23,437,129.60	33,703,868.00	31,507,866.40	33,331,480.00
2. Tax Revenue							
(1) Real Property Taxes	4,780,000.00	6,108,383.03	9,000,000.00	9,787,441.64	17,900,000.00	16,521,311.14	17,600,000.00
(2) Municipal Business Tax	3,000,000.00	3,891,990.82	8,000,000.00	12,217,222.16	22,000,000.00	21,636,298.43	20,000,000.00
(3) Local Gov't Stabilization Fund - STA	6,202,804.00	7,769,960.00	5,056,000.00	0.00	0.00	0.00	0.00
(4) Receipts from Eco. Enterprise Mgt.	0.00	0.00		3,967,146.40	4,040,000.00	5,294,555.83	4,360,000.00
3. Other Revenue	4,992,750.00	6,025,794.52	8,357,600.00	14,680,478.51	16,801,200.00	16,077,880.92	12,007,200.00
TOTAL	28,814,765.00	38,351,631.37	151,643,885.00	157,837,936.71	229,260,537.00	217,069,378.32	220,624,598.00

Source: Legazpi City Budget Office

EXPENDITURE OF LEGAZPI CITY

PHP

Items	1990		1995		1998		1999
	Budget	Realized	Budget	Realized	Budget	Realized	Budget
1. Personal Services	13,888,805.00	21,576,915.28	99,349,696.00	73,537,484.28	111,687,987.00	110,187,304.33	118,396,933.00
2. Maintenance and Other Operating Expenses	12,520,051.98	14,949,030.73	96,946,533.00	79,930,363.16	114,312,870.00	75,199,392.91	99,685,835.00
3. Capital Outlay	370,000.00	1,744,388.48	4,000,000.00	45,169,691.24	3,200,000.00	12,740,044.60	2,500,000.00
TOTAL	26,778,856.98	38,270,334.49	200,296,229.00	198,637,538.68	229,200,857.00	198,126,741.84	220,582,768.00

Source: Legazpi City Budget Office