

Republic of the Philippines Department of Environment and Natural Resources BIODIVERSITY MANAGEMENT BUREAU

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TECHNICAL BULLETIN No. 2016- 06

SUBJECT

GUIDELINES ON SOCIO-ECONOMIC ASSESSMENT AND MONITORING SYSTEM (SEAMS) IN PROTECTED AREAS

Pursuant to RA 7586 otherwise known as the National Integrated Protected Areas System (NIPAS) Act of 1992, DAO 2008-26, the Revised Implementing Rules and Regulations, and in order to enhance DAO 2013-20, "Revised Guidelines on the Survey and Registration of Protected Area Occupants", particularly the socio-economic data as basis in protected area management planning, the following guidelines on Socio-Economic Assessment and Monitoring System is hereby issued.

Section 1. Objectives. The SEAMS aims to provide the Protected Area Superintendents and field implementers a standardized method of assessing and monitoring the socio-economic condition of occupants in protected areas. The results of the SEAMS shall be used in protected area planning and in carrying out management interventions which include the recognition of qualified tenured migrants for the issuance of Protected Area Community Based Resource Management Agreement (PACBRMA) and other appropriate tenurial instruments. These will also be used to determine the ecosystem services, values and benefits of protected areas to the communities.

The specific objectives of the SEAMS are: [1] to characterize the socio-economic condition of occupants in the PAs and nearby areas, [2] to identify and locate sources and values of the various ecosystems in the PAs; [3] to determine the degree of degradation or improvement in ecosystem services, uses, and values, and [4] to identify ecosystem pressures and threats, and their causes.

Section 2. Scope. The SEAMS shall cover all occupants inside the protected area. It may also cover communities in the buffer zones as well as those living adjacent and are dependent on the resources inside the protected area for subsistence and livelihood and/or benefiting from ecosystem services. Whenever applicable, firms or industries operating within and adjacent to protected areas shall also be covered by SEAMS.

Section 3. The Socio-Economic Assessment and Monitoring System (SEAMS). The SEAMS is a tool for a comprehensive assessment of socio-economic condition of communities within and adjacent to protected areas under the NIPAS. It provides information included in the conventional survey and registration of protected area occupants and other relevant data on demographic, socio-cultural, economic, physical and institutional characterization of the PAs. The areas to be surveyed can go beyond those within the PA boundaries to determine the extent of users and utilization of PA resources relevant to a comprehensive and effective management.





Together with the bio-physical information, the socio-economic assessment provides bases for formulating and enhancing PA management plans and policies.

The SEAMS enhances Forms 1 and 2 of DAO 2013-20 or the "Revised Guidelines on Survey and Registration of Protected Area Occupants", particularly the socio-economic data attached as Annexes A and B, respectively. It also serves as guide for protected area staff on the proper collection, encoding, processing and management of data. The SEAMS shall be conducted every five years.

The SEAMS shall be supplemented by a User Manual to be issued by the DENR through the Biodiversity Management Bureau.

Section 4. Team Formation and Composition. The SEAMS Team shall be created by the Regional Director with the minimum composition as follows:

Team Leader: Chief, Conservation and Development Division Members:

- a. Protected Area Superintendent (PASu)
- b. PENRO/CENRO, Technical staff (GIS trained)
- c. City/Municipal ENRO/PDC representative
- d. Barangay representative
- e. Local CSO representative
- f. Community/PO/IP representative

The Team shall be responsible for the actual conduct and implementation of the SEAMS.

Section 5. Data Management. Data management refers to the encoding, processing and analysis of demographic, socio-economic, physical and institutional data gathered during the assessment phase. To facilitate data management, the SEAMS Automated Utility Tool, an MS Excel-based application, shall be used. The following are the procedures employed in data management:

- a. **Encoding** The data derived from the socio-economic assessment and SRPAO forms shall be encoded using the SEAMS Automated Utility Tool. It is important that the encoder must at all times ensure the integrity of the data.
- b. Processing The encoded data shall be electronically processed using the SEAMS Automated Utility Tool. Expected outputs are the demographic, socio-economic, physical, institutional indicators and other relevant information as may be necessary. Maps shall also be generated to reflect spatial information.
- c. Analysis The information obtained from the data processing shall be analyzed and interpreted for reference in protected area management planning and decision making. It shall also be used to identify the qualified tenured migrants for the issuance of PACBRMA and other appropriate tenurial instruments. The outputs of the analysis shall be in the form of graphs, tables, and GIS maps.

Section 6. Reporting. Based on the information generated and analyzed from the SEAMS, in conjunction with the results of the Biodiversity Assessment and Monitoring System (BAMS), the Assessment Team shall prepare and submit to the Regional Director

the complete narrative report, i.e., demographic and socio-economic profiles, physical and institutional information. The report shall include the following attachments:

- a. Encoded SEAMS (Forms 1, 2 & 3, using SEAMS Automated Utility Tool);
- b. PA map reflecting the homelots, farmlots, resource uses and threats;
- c. Official List of Tenured Migrants (Form 5/Annex F of DAO 2013-32); and
- d. Accomplished Form for Indigenous People (Form 6/Annex G of DAO 2013-32).

The report, with corresponding recommendations, shall be presented to the PAMB and/or the DENR. The Management Board and/or the DENR shall ensure that appropriate management interventions are implemented to address the gaps and issues identified in the assessment report.

The DENR Regional Office shall prepare and submit to the BMB, within 3 months after the conduct of the SEAMS, hard copy of the narrative report with attachments b, c and d; and electronic copies of the entire SEAMS report.

The BMB shall consolidate the results of the SEAMS, together with the BAMS as input to the State of the Protected Area Report.

Section 7. Monitoring. To complement the SEAMS which shall be conducted every five (5) years, annual monitoring shall be undertaken through Focus Group Discussion and for ecotourism, using TB No. 2013-03, "Prescribed Tools for Impact Monitoring of Ecotourism Activities" to assess the impacts of protected area management to the local communities.

Section 8. Fund Allocation. The DENR Regional Offices shall allocate necessary funding for the conduct of the SEAMS in its Annual Work and Financial Plan.

Section 9. Transitory Provision. Existing socio-economic data in protected areas shall be reviewed and updated based on this Technical Bulletin.

Section 10. Effectivity. This Technical Bulletin shall take effect immediately and shall be circulated for the information and guidance of all concerned.

HERESA MUNDITA S. LIN

Director



DEPART	ENT OF ENVIRONMENT AND NATURAL RESOUR	CES
	REGION	

SOCIO-ECONOMIC ASSESSMENT AND MONITORING SYSTEM (SEAMS) DEMOGRAPHIC

Per Household

FORM 1 Questionnaire

1. PENRO :	10. Proofs of Occupancy :
2. CENRO :	11. Area of Homelot (ha.)
3. Name of Protected Area :	Location (GPS Reading):
4. Province :	
5. City/ Municipality :	12. Area of Farmlot (ha.)
6. Barangay and Sitio :	Location (GPS Reading):
7. Data Accomplished :	
8. Date of Occupancy (month/day/year) :	13. Area of other uses, if any :
9. Household Tag No. (Reg-PA-Year-MunBrgyTag No.):	Location (GPS Reading):

14. Demographic Information:

Name of Household Head	Name of Household Members	Relationship to the Household Head	Sex (Male/Female)	Age	Civil Status	Religion	Highest Educational Attainment	Ethnic Origin	Remarks (Occupation)

Note: All pages of the form should be signed by the Team Leader

1



1. Sources of Income

1.1. Revenue from Ecotourism

1.1.a Household member name	1.1.b Sex (Male/Female)	1.1.c Tour g	uiding	1.1.d Ecoloo	lge operation	1.1.e Kiosk	operation	1.1.f Boat/ operation	•	1.1.g Portera	ge	1.1.h Trar	ısport service	s (specify)		ing/restaurant erations	1.1.j Trekkii	19	1.1.k Caving]	1.1.1 Others	(specify)		1.1.m Remarks
(list in the same order as Form 1 section 14)		1.1.c.i Average Annual income	I.l.c.ii Location where ecotourism activity is conducted	1.1.d.i Average Annual income	1.1.d.ii Location where ecotourism activity is conducted	1.1.e.i Average Annual income	1.l.e.ii Location where ecotourism activity is conducted	1.l.f.i Average Annual income	1.l.f.ii Location where ecotourism activity is conducted	1.l.g.i Average Annual income	1.l.g.ii Location where ecotourism activity is conducted	1.1.h_sp Specific transport service	1.l.h.i Average Annual income	1.l.h.ii Location where ecotourism activity is conducted	1.1.i.i Average Annual income	I.l.i.ii Location where ecotourism activity is conducted	1.1.j.i Average Annual income	1.1.j.ii Location where ecotourism activity is conducted	1.1.k.i Average Annual income	1.l.k.ii Location where ecotourism activity is conducted	1.1.1_sp Others (specify)	1.1.l.i Average Annual income	1.1.1.ii Location where ecotourism activity is conducted	
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2. Cost

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1.2. Income source from Fisheries (Salt water)

1.2.a	1.2.Ь	1.2.c	1.2.d	1.2.e	1.2.f	1.2.g	1.2.h	1.2.i	1.2.j	1.2.k	1.2.1	1.2.m	1.2.n	1.2.0	1.2.p	1.2.q
Type of fishing	Species	Unit of	Volume sold	Volume consumed	Price per	Value	Type of gears used	Total number of	Number of season	Season or period	location or landmarks	No of people & household	Marketing agents	Market	Type of	Remarks
method		measure	per year	per year	unit		per fishing method		or period in a year	of fishing (month)	where fishing activity is conducted	members involved in the		location	payment	(Male/Female)
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2.2. Costs incurred from fishery-based income source

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1.3. Income source from Fisheries (Fresh water)

1.3.a	1.3.Ь	1.3.c	1.3.d	1.3.e	1.3.f	1.3.g	1.3.h	1.3.i	1.3.j	1.3.k	1.3.1	1.3.m	1.3.n	1.3.0	1.3.p	1.3.q
Type of fishing method	Species	Unit of	Volume sold	Volume consumed	Price per	Value	Type of gears used per fishing method	Total number of	Number of season	Season or period	location or landmarks	No of people & household	Marketing agents	Market	Type of	Remarks
method		measure	per year	per year	unit		per fishing method	fishing hours per	or period in a year	of fishing (month)	where fishing activity is	members involved in the		location	payment	(Male/Female)
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2.3. Costs incurred from fishery-based income source

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1.4. Income source from Trading, Processing, and Manufacturing

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Type of trading activity	Species	Unit of measure	Volume sold per year	Volume consumed per	Price per unit	Value	Specific site/location/ landmarks where trading	Season/ period of trading	No of people & household members	Marketing agents	Market location	Type of payment	Remarks (Male/Female)
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2.4. Costs incurred from Trading, Processing, and Manufacturing

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Item	Total	Unit	Average	Number of	Cost	Items	Total	Unit	Average	Number of	Cost	Items	Total	Unit	Average	Number of	Cost	Items	Total	Unit	Average	Number of	Cost	Items		Unit	Average	Number of	Cost	Specify	
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1.5. Revenue from Agriculture

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Type of agricultural	Species	Area	Unit of	Volume sold	Volume consumed	Price per	Value	Specific site/	Describe/ enumerate	Season of	Number of production	No of people &	Marketing	Market	Type of payment	Remarks
activity	·	(ha.)	measure	per year	per year	unit		location/ landmarks	specific activities	production (months)	period per year	household members	agents	location	,, , ,	(Male/Female)
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2.5. Costs incurred from agriculture-based income source

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1.6. Revenue from Livestock and Poultry

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Types or kind of	Grazing area	Unit of measure	Volume sold per	Volume consumed	Price per	Value	Specific site/location/	Specific activities	Season/ period of	No of household members	Marketing agents	Market	Type of payment	Remarks
livestock (species)	(ha.)		year	per year	unit		landmark of grazing areas	conducted in the livelihood	livelihood	involved in the activity		location		(Male/Female)
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2.6. Costs incurred from livestock and poultry industry

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	.al	IL HARLI	age Numb	ber of	Cost	Items Tota	l Unit	Average	Number of	Cost Iter	ns Total	Unit	Average	Number of	Cost	Items T	otal L	Unit Average	Number of	Cost	Items Tot	al Unit	Average	Number of	Cost	2.6.gO Specify	
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1.7. Revenue from Forestry (Non-timber forest product)

1.7.a Type of non-timber forest product	1.7.b Species	1.7.c Area (ha.)	1.7.d Unit of measure	1.7.e Volume sold per year	1.7.f Volume consumed per year	1.7.g Price per unit	1.7.h Value	1.7.i Specific site/ location/ landmarks	1.7.j Gathering/ harvesting/ collection/ planting/ production	1.7.k Season/ period of gathering/ harvesting/ collection/ planting	1.7.1 No of people & household members involved in the activity	1.7.m Marketing agents	1.7.n Market location	1.7.0 Type of payment	1.7.p Remarks (Male/Female)
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2.7. Costs incurred from forestry-based livelihood (Non-timber forest product)

		Mat	Materials Equipment										Li	abor					Trans	portation						Others				2.7R	
2.7.aM	2.7.ЬМ	2.7.cM		2.7.eM	2.7.fM	2.7.aE	2.7.ЬЕ	2.7.cE	2.7.dE	2.7.eE	2.7.fE	2.7.aL	2.7.bL	2.7.cL	2.7.dL	2.7.eL	2.7.fL	2.7.aT	2.7.ЬТ	2.7.cT	2.7.dT	2.7.eT	2.7.fT Cost	2.7.a0	2.7.ЬО	2.7.cO	2.7.dD	2.7.eO	2.7.fD	2.7.gO Specify	Remarks
Items	Total	Unit	Average	Number	Cost	Items	Total	Unit	Average	Number	Cost	Items	Total	Unit	Average	Number	Cost	Items	Total	Unit	Average	Number	Cost	Items	Total	Unit	Average	Number	Cost	Specify	
	Annual			of times			Annual		price per	of times	incurred		Annual		price per		incurred	1	Annual			of times	incurred		Annual		price per		incurred	cost item	
	Cost		unit	cost is	during		Cost		unit	cost is	during		Cost		unit	cost is	during		Cost		unit	cost is	during		Cost		unit	cost is	during		
				incurred	what					incurred	what					incurred	what					incurred	what					incurred	what		
				in a year	stage?					in a year	stage?					in a year	stage?					in a year	stage?					in a year	stage?		
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^{*}use the back of the form or a clean sheet if the items exceed the available slots in this section.



1.8. Revenue from Forestry (Timber forest product)

1.8.a	1.8.b	1.8.c	1.8.d	1.8.e	1.8.f	1.8.g	1.8.h	1.8.i	1.8.j	1.8.k	1.8.1	1.8.m	1.8.n	1.8.0	1.8.p
Type of timber forest product	Species	Area (ha.)	Unit of measure	Volume sold per year	Volume consumed per	1.8.g Price per unit	1.8.h Value	Specific site/ location/	Gathering/ harvesting/	Season/ period of gathering/	No of people & household	Marketing agents	Market location	Type of payment	Remarks (Male/Female)
					year			landmarks	collection/ planting/ production method/ activity	harvesting/ collection/ planting	members involved in the activity				
									memour activity						
1.															
2.															
3.															
4.															
5.															
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9.															
10.															

2.8. Costs incurred in forestry-based income source (Timber forest product)

			M	laterials .					E	quipment						Labor					T	ransportatio	ın					Oth	ers			2.8R
2.8		8.bM	2.8.cM	2.8.dM	2.8.eM	2.8.fM		2.8.ЬЕ	2.8.cE	2.8.dE	2.8.eE	2.8.fE	2.8.aL	2.8.bL	2.8.cL	2.8.dL	2.8.eL	2.8.fL	2.8.aT	2.8.bT	2.8.cT	2.8.dT	2.8.eT	2.8.fT	2.8.a0	2.8.ЬО			2.8.eO	2.8.f0	2.8.gO Specify	Remarks
lter		tal	Unit	Average	Number	Cost	Items	Total	Unit	Average	Number of		Items	Total	Unit	Average	Number of		Items	Total	Unit	Average		Cost	Items	Total	Unit	Average	Number of		Specify	
		nual		price per	of times	incurred		Annual		price per	times cost			Annual		price per	times cost			Annual		price per	times cost	incurred		Annual		price per	times cost	incurred	cost item	
	Co	ıst		unit	cost is	during		Cost		unit	is incurred	_		Cost		unit	is .	during		Cost		unit	is incurred	during		Cost		unit	is incurred			
					incurred	what					in a year	what					incurred	what					in a year	what					in a year	what		
					in a year	stage?						stage?					in a year	stage?						stage?						stage?		
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^{*}use the back of the form or a clean sheet if the items exceed the available slots in this section.



1.9. Revenue from Resource and Wildlife Collection and Use

1.9.a Type of revenue source from resource use and wildlife collection	1.9.b Species	1.9.c Area (ha.)	1.9.d Unit of measure	1.9.e Volume sold per year	1.9.f Volume consumed per year	1.9.g Price per unit	1.9.h Value	1.9.i Specific site/ location/ landmarks	1.9.j Gathering/ harvesting/ collection/ planting/ production method/ activity	1.9.k Season/ period of gathering/ harvesting/ collection/ planting	1.9.1 No of people & household members involved in the activity	1.9.m Marketing agents	1.9.n Market location	1.9.o Type of payment	I.9.p Remarks (Male/Female)
1.															
3.															
4.															
6.															
7.															
9.															
10.															

2.9. Costs from resource and wildlife collection-based Livelihood

			Materia		J., DUDDU E. VO			Γ!						1-1-						T	4-4				ſ	Others			2.9R
						00 0000	100 5	Equipm		0.05			1	Labo						Transpor							0.00	T	
2.9	aM 2.9.bM		2.9.dM	2.9.eM	2.9.fM	2.9.aE 2.9.bE	2.9.cE	2.9.dE	2.9.eE	2.9.fE				2.9.dL	2.9.eL	2.9.fL		2.9.ЬТ		2.9.dT	2.9.eT	2.9.fT			2.9.d0	2.9.eO	2.9.f0	2.9.gU	Remarks
lter	aM 2.9.bM is Total	Unit	Average	Number of	Cost	Items Total	Unit	Average	Number of	Cost	Items	Total	Unit	Average	Number of	Cost	Items	Total	Unit	Average	Number of	Cost	Items Total	Unit	Average	Number of	Cost	2.9.gO Specify	
	Annual		price per	times cost is	incurred	Annual		price per	times cost is	incurred		Annual		price per	times cost is	incurred		Annual		price per	times cost is	incurred	Annual		price per	times cost is		cost	
	Cost			incurred in a				unit	incurred in a			Cost		unit	incurred in a	during what		Cost		unit	incurred in a		Cost		unit	incurred in a			
	5551			year	stage?				vear	stage?		5551			year	stage?		5551			vear	stage?	5551			year	stage?		
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^{*}use the back of the form or a clean sheet if the items exceed the available slots in this section.



1.10. Revenue from Mining and Quarrying Industry

1.10.a Type of revenue source from mining and quarrying industry	1.10.b Revenue in a month	1.10.c Number of times in a year	1.10.d Source of extraction	1.10.e Remarks (Male/Female)
1.				
2.				
3.				
4.				
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9.				
10.				

2.10. Costs incurred in mining and quarrying industry

Z.IU.	LOSTS INC	nccea ii		nd quarrying it	naustry	1										-							ı						_
			Materia					Equipme						Labor						Transporta						thers			2.10R
2.10.a	М 2.10.ЬМ	2.10.cM	2.10.dM	2.10.eM	2.10.fM	2.10.aE 2.10.bE		2.10.dE	2.10.eE	2.10.fE	2.10.a	2.10.bL		2.10.dL	2.10.eL	2.10.fL			2.10.c1	2.10.dT	2.10.eT	2.10.fT	2.10.a0 2.10.b0		2.10d0	2.10.e0	2.10.f0	2.10.g0	Remark
Items	Total	Unit	Average	Number of	Cost	Items Total	Unit	Average	Number of	Cost	Items	Total	Unit	Average	Number of	Cost	Items	Total	Unit	Average	Number of	Cost	Items Total	Unit	Average	Number of	Cost	Specify	
	Annual		price per	times cost is	incurred	Annual		price per	times cost is	incurred		Annual		price per	times cost is	incurred		Annual				incurred	Annual		price per	times cost is		cost	
	Cost		unit	incurred in a	during what	Cost		unit	incurred in a	during what		Cost		unit	incurred in a	during what		Cost		unit	incurred in a	during what	Cost		unit	incurred in a	during what	item	
				year	stage?				year	stage?					year	stage?					year	stage?				year	stage?		
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^{*}use the back of the form or a clean sheet if the items exceed the available slots in this section.



1.11. Revenue from Other Industries 2.11. Costs incurred in other industries 1.11.b Revenue in a month 2.11.Ь 2.11.c Remarks 1.11.a Type of industries 1.11.c Number of times in a year 1.11.d Remarks Total monthly expenditure in Industry-based source of revenue Number of times expenditure is (Male/Female) incurred in a year 1. Manufacturing 2. Electricity, Gas, and Water 3. Construction 4. Tourism 1.12 Revenue from service-based industry 2.12 Costs incurred in service-based industry 1.12.d

Types at services	Kevenue in a month	Number of times in a year	Kemarks	lotal monthly expenditure from service-based sources of revenue	Number of times expenditure is incurred in a year	Kemarks (Male/Female)
1. Wholesale & Retail Trade, Repair of Motor Vehicles, Motorcycles & Personal & Household Goods						
2. Hotels and Restaurants						
3. Transport, Storage and Communication						
4. Financial Intermediation						
5. Public Administration / Government employee						
G. Education						
7. Health, Wellness, and Social Work						
8. Private Households with Employed Persons						
9. Private employment						
10.						

1.13. Revenue from other sources 2.13. Costs incurred from other revenue sources

1.13.a Other revenue sources	1.13.b Revenue in a month	1.13.c Number of times in a year	1.13.d Remarks	2.13.a	2.13.Ь	2.13.c Remarks						
				Total monthly expenditure from service-based livelihood	Number of times expenditure is	(Male/Female)						
					incurred in a year							
1. Remittances (local)												
2. Remittances (abroad)												
3. Retirement												
4. 4Ps beneficiary												
5												

^{*}use the back of the form or a clean sheet if the items exceed the available slots in this section.



3. Type of Expenditures

		Household Expenditures (in a mo	onth)	
	3.1. Total amount per month	3.2 Number of months expenditure is incurred in a year	3.3 Annual expenditure per item	3.4.Remarks
. Food				
2. Alcoholic beverages				
3. Tobacco				
4. Clothing and footwear				
5. Furnishings, household equipment and routine household needs				
6. Health				
. Housing				
l. Water				
9. Electricity				
D. Gas and other fuels				
I. Transportation				
2. Communication				
3. Recreation and culture				
4. Education				
5. Accommodation services				
6. Taxes				
7. Miscellaneous goods and services (e.g. occasional expenses)				
3. Other expenditure (e.g. interest payments)				

^{*}use the back of the form or a clean sheet if the items exceed the available slots in this section.



SOCIO-ECONOMIC ASSESSMENT MONITORING SYSTEM (SEAMS) HEALTH, HAZARD & INSTITUTIONAL

4. Natural Hazards:

4.1. Climate risks and disasters:	4.2. Number of occurrences in the last 5	4.3. Compared to the previous years, in terms	4.4. Compared to the previous years, in terms	4.5. Were you affected by the following?;	4.6. Estimated average cost of damage
	years	of frequency, has it :	of intensity, has it :	Yes - 1	
		1- Increased	1- Increased	No - 2	
		2- Remained stable/the same 3- Decreased	2-Remained stable/the same 3-Decreased		
		9- Decleased	7- Decl. 69260		
a. Flooding					
a. Hobbing					
b. Landslides					
c. Typhoon					
I.D. II					
d. Drought					
e. Earthquake					
f. Wildfire					
g. Tsunami					
h. Storm surge					
İ.					
j.					



SOCIO-ECONOMIC ASSESSMENT MONITORING SYSTEM (SEAMS) HEALTH, HAZARD & INSTITUTIONAL

5. Housing, Sanitation, and Health				
5.1 Housing Status (Please Check)	5.2 Housing Unit I (Please Check)		5.3 Source of Water (Please check)	5.4 Lot Ownership Status Owned/ With claims
Owned/ With claims Rented Being Occupied for free with conser Being Occupied for free without cor Others, please specify	nt of Owner V isent of Owner C	Concrete/ Brick Half concrete/ bricks & half wood Vood Galvanized Iron/ Aluminum Light materials (Bamboo, Nipa, Anahaw, Cogon, Sawali) Others, please specify	River Spring Deep Well Rainfed Small water impounding facility Irrigation/ Local Water System Others, specify	Rented Being Occupied for free with consent of Owner Being Occupied for free without consent of Owner Others, please specify Owned/ With claims
Health Status				
5.5 Causes of illness in the previous year (Morbidity)	5.6 Causes of death in the previous year (Mortality)	5.7 Waste Disposal	5.8 Type of Toilet Facilities	
□Acute Respiratory Infection	Diseases of the heart	5.3.a Solid waste (biodegradable)	□water-sealed septic tank used exclusively by household	
☐Acute Lower Respiratory Tract Infection & Pneumonia	□Diseases of the vascular system	□Composting	water-sealed septic tank shared to others	
□Branchitis/Branchialitis	□Pneumonia	□Burning	□water-sealed other depository type used exclusively by househol	
□Hypertension	□Malignant neoplasms/cancers	☐ Burying	☐ water-sealed other depository type shared to other household	
□Acute Watery Diarrhea	□All forms of tuberculosis	□Local collection system	□ closed pit	
□Influenza	☐ Accidents	□Others, specify	open pit	
□Urinary Tract Infection	□Chronic obstructive pulmonary disease allied conditions	5.3.a Solid waste (non-biodegradable)	others, specify	
□TB Respiratory	□Diabetes mellitus	□Burning		
□Injuries	□Nephritis/nephritic syndrome	□Burying		
□Disease of the Heart	□Other diseases of respiratory system (e.g., asthma)	□Local collection system		
□ Others, specify:	□Others, specify:	Others, specify		
		5.3.c Toxic waste (describe):		



SOCIO-ECONOMIC ASSESSMENT MONITORING SYSTEM (SEAMS) HEALTH, HAZARD & INSTITUTIONAL

6. Physical Infrastructures within the ba	arangay. (Please	check)							
6.1. Access to road networks and other support facili	ities (Yes/No)		8.2. Knowledge and parti	cipation Local PA manageme	ent structures (Yes/N	lo)	8.4. Knowledge of the existence of active tribal/traditional leadership (IPs)	Yes□	No□
a. Tourism establishments	Yes□	No□	a. PAMB				8.5. Awareness on cultural zones and ritual practices	Yes□	No□
b. Irrigation facilities	Yes□	No□	i. Knowledge/ awa	areness	Yes 🗖	No□	8.6. Protected area threats	Yes□	No□
c. Hospitals	Yes□	No□	ii. Participation		Yes□	No□	a. Knowledge of the following (within the barangay/PA)		
d. Health centers	Yes□	No□					i. Expansion of housing, settlements, agriculture, livestock, industrial activities,		
e. Evacuation centers	Yes□	No□	b. Community/Bara	ngay-based Protection/ Volu	inteer groups		commercial and/or transportation/utilities infrastructure into natural ecosystems	Yes□	No□
f. Community/Barangay/	Yes□	No□	i. Knowledge/ awa	areness	Yes□	No□	ii. Illegal collection of terrestrial wildlife (such as endangered animals and plants)	Yes□	No□
Tribal hall			ii. Participation		Yes□	No□	iii. Illegal logging or wood collection (timber or fuelwood)	Yes□	No□
g. Chapel/Church/Mosque/Worship place	Yes□	No□							
h. School/Day care center	Yes□	No□	c. POs				iv. Illegal collection of aquatic resources (using explosives, poisons; collection of		
i. Sports center (e.g. basketball court)	Yes□	No□	i. Knowledge/ aw	areness	Yes□	No□	corals, giant clams or other endangered species)	Yes□	No□
j. Barangay park	Yes□	No□	ii. Participation		Yes□	No□	v. Commercial fishing in municipal waters	Yes□	No□
							vi. Invasive and other problematic species and genes	Yes□	No□
7. Perception rating of the respondent o	on:		d. Tribal Organizatio	ns			vii. Human intrusion and disturbance within the protected area		
(scale of 1-5. with 5 as the highest)			i. Knowledge/ awa	areness	Yes□	No□	(such as recreational activities)	Yes□	No□
a. Importance of the PA to household welfare and	well-beina		ii. Participation		Yes	No 🗖	viii. Pollution entering or generated within the protected area		
b. Effectiveness of PA management	3		'				(solid and liquid wastes)	Yes□	No□
c. Local government programs on PA			8.3. Knowledge of Tenuri	al Instruments in the area			ix. treasure hunting/small scale mining/quarrying	Yes□	No□
d. Government support to community-based park	protection		□ CADT [°]	□ISF	□PCBRMA		ix. Others, specify:	Yes□	No□
e. Private sector support to PA management			□CADC	□CBFMA	□FLA				
f. Delivery of social services			□CALT	□Individual titles			b. Hotspots (illegal activities)		
,			□ICCA	□ARCs	□Others, specif	y:	i. Entry points, specify:		
8. Institutional (Please check)					•		ii. Exit points, specify:		
8.1. Knowledge of local policies (Yes/No)									
a. Incal environment Code	Yes□	No□					c. Hotspot for insurgency	Yes□	No□
b. Eco-tourism control	Yes	No 🗆					S. Heteper is: most gener		
c. CLUP/CRMP	Yes	No 🗆							
d. Customary laws/Tribal justice	Yes□	No□							



SOCIO-ECONOMIC ASSESSMENT MONITORING SYSTEM (SEAMS)

CERTIFICATION

hereby certify under oath that the above information are true and correct to the best of my knowledge and belief.												
Printed name and signature of Household Head/ Respondent	Printed name and signature of Interviewer/Enumerator											
 Date	Printed name and signature of Team Leader											
(In case the household head or members refused to be interviewed)												
Noted By:												
Printed name and signature of Barangay Representative during the Survey	Printed name and signature of Interviewer/Enumerator											

Please attach map scale 1:50,000 showing the exact or approximate location of the homelot/farmlot within the said protected area



DEPARTMENT OF ENVI	RONMENT A	AND NATURAL	. RESOURCES
REGION			

SOCIO-ECONOMIC ASSESSMENT AND MONITORING SYSTEM (SEAMS)

FORM 2 Summary per Barangay

Name of Protected Area	:	
Municipality	:	
Barangay	:	

A. Demographic Information:

Name of Household Head	Sex		Tı (in	otal Household Mem cluding household h	ead)	Total Area Farmlot (ha)	Total Area Homelot (ha)	Total Area Other uses (ha)	Total Area Occupied (ha)	Date of Occupancy	Remarks
	Male	Female	Male	Female	Total						

Note: All pages of the form should be signed by the Team Leader



SOCIO-ECONOMIC ASSESSMENT AND MONITORING SYSTEM (SEAMS) Form 2 – Economic Profile

B. Income source information:

Name of			Ecotouris	m				Fisheries	(Saltwater)					Fisheries	(Freshwater)		
Household Head	Type of revenue source	Source location.	Total revenue from ecotourism	Total cost from ecotourism	Net revenue from ecotourism	List of species caught	Source location	Average fishing hours spent (Catch effort)	Total revenue from fishery	Total cost from fishery	Net revenue from saltwater fishery	List of species caught	Source location	Average fishing hours spent (Catch effort)	Total revenue from fishery	Total cost from fishery	Net revenue from freshwater fishery
								,									



SOCIO-ECONOMIC ASSESSMENT AND MONITORING SYSTEM (SEAMS) Form 2 – Economic Profile

Income source information (cont'):

	ncome source into	milativii (
Name of			Trading, Processing						Agriculture						Livestock and Poul	try	
Household	List of species	Source	Total revenue from trading,	Total cost from trading,	Net revenue from trading,	List of	Source	Total	Total revenue	Total cost	Net revenue	List of	Source	Total	Total revenue	Total cost from	Net revenue from
Head	traded, processed,	location	processing and	processing and	processing and	crops	location	cultivated	from	from	from	species	location	grazing	from livestock and	livestock and	livestock and
	manufactured		manufacturing of aquatic	manufacturing of aquatic	manufacturing of aquatic	-		area (ha)	agriculture	agriculture	agriculture			area (ha)	poultry income	poultry income	poultry income
									agi icaitai c	ayı ıcultur c	ayı ıcuncur c				source	source	source
			resource	resource	resource												



SOCIO-ECONOMIC ASSESSMENT AND MONITORING SYSTEM (SEAMS) Form 2 - Economic Profile

Income source information (cont'):

Name of			Non-Timber For	rest Products				Tim	ber Forest Products				R	esource Use and/or W	ildlife Collection		
Household Head	List of species	Source location	Total revenue from non-timber forest products		Net revenue from non-timber forest products	List of species	Source location	Total volume of timber gathered/ harvested	Total revenue from timber forest products	Total cost from timber forest products	Net revenue from timber forest products	List of species being collected/ gathered	Source location	Total revenue from resource use and wildlife collection	Total cost from resource use and wildlife collection	Net revenue from resource use and wildlife collection	
Not	ted by:					Atteste	Attested by: Pre						pared by: Team Members				

Noted by:	Attested by:	Prepared by: Team Members
PENRO/ CENRO	Team Leader	
	 Date	



SOCIO-ECONOMIC ASSESSMENT AND MONITORING SYSTEM (SEAMS) Form 2 – Economic Profile

Income source information (cont'):

Inci	Income source information (cont'):													
Name of			Mining and Quarr	ying Industry			Other Industries			Services			enue sources (i.e. ren	nittances)
Household Head	Type of	Source	Total revenue mining	Total cost from	Net revenue from	Total revenue from	Total cost from	Net revenue from	Total revenue	Total cost from	Net revenue	Total revenue from	Total cost from other	Net revenue from
	revenue	location	and quarrying	mining and quarrying	mining and quarrying	other industries	other industries	other industries	from services	services	from services	other revenue sources	revenue sources	other revenue sources
	source													
Note	d bv:				Attested by	:			Pi	repared by: Tea	am Members			
	<i>1</i> ·					-			•	-F				
			/ CENRO				 Leader		_					
		I LINIVU	/ ULINI\U			1601111	LGaudi							

Date



Name of Protected Area

Municipality

DEPARTMENT OF ENVIRONMENT AND NATURAL RESOURCES	l
REGION	

SOCIO-ECONOMIC ASSESSMENT AND MONITORING SYSTEM (SEAMS)

FORM 3 Summary of Municipality

Name of Barangay		Household Heads			Household Members			Total Area Occupied (ha)				
	Male	Female	Total	Male	Female	Total	Homelot	Farmlot	Other use	Total	Total No. of Qualified Tenured Migrants	
Noted by:			Attested	l by:				Prepared by: Tea	am Members			
	FUDD				_						-	
PENRO/ C	FNKU				Team Leader						-	
											-	
					Date						-	

CODE BOOK: GUIDE IN FILLING-OUT OF SURVEY FORMS AND ENCODING OF DATA GATHERED

Relationsh ip _code	Relationship to household head
1	1 Household head
2	2 Wife/spouse/partner
3	3 Son/daughter
4	4 Brother/sister/sibling
5	5 Son-in-law/daughter-in-law
6	6 Grandson/granddaughter
7	7 Father
8	8 Mother
9	9 Other Relative
10	10 Boarder
11	11 helper
12	12 Non-relative

Sex_cod e	Sex
1	Male
0	Female

Civil Status

Code

ıs	Civil Status	Religion _code	Religion		
	Single	1	Baptist		
	Married	2	Born Again		
	Divorced	3	Buddhist		
	Separated	4	Evangelical		
	Widowed	5	Hindu		
		6	Iglesia ni Cristo		
		7	Islam		
		8	Roman Catholic		
		9	Spiritual Indigenous		
		10	Taoist		
		11	Others		

Educational Attainment Code	Educational Attainment			
0	No grade completed			
1	Elementary undergraduate and below			
2	Elementary graduate			
3	High School undergraduate			
4	High School graduate Post secondary undergraduate			
5				
6	Post secondary graduate			
7	College undergraduate			
8	College graduate			
9	Post baccalaureate			

Market Agent code	Market Agent
1	middleman
2	direct selling
•	

CODE BOOK: GUIDE IN FILLING-OUT OF SURVEY FORMS AND ENCODING OF DATA GATHERED

Market location code	Market location
1	1 - Barangay
2	2 - Municipality
3	3 - Province
4	4 - Outside the province
5	5 - Foreign market

Payment type code	Payment type
1	Cash
2	Non-cash

cost incurred during what stage? _code	cost incurred during what stage?	Yes_No _code	Yes_No
1	1 - production	1	Yes
2	2 - processing	2	No
3	3 - marketing		

Perception on natural hazard
1 - increased
2 - Remained stable/the same
3 - decreased

Housing Status _code	Housing Status
1	Owned/with claims
2	Rented
3	Being occupied for free with consent
4	Being occupied for free without consent of owner
5	Others, please specify

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Housing material code	Housing Unit Material
1	Concrete/brick
2	Half concrete/bricks & half wood
3	Wood
4	Galvanized iron/aluminum
5	Light materials (bamboo, nipa, anahaw, cogon)
6	Others, please specify

Water source code	Water source
1	River
2	Spring
3	Deep well
4	Rainfed
5	Small water impounding facility
6	Irrigation/local water system
7	others, specify

Waste disposal code	Waste disposal
1	Composting
2	Burning
3	Burying
4	Local collection system
5	Others, specify

Toilet type	Toilet type
1	Water-sealed-septic tank, used exclusively by the household
2	Water-sealed-septic tank, shared with other households
3	Water-sealed-other depository, used exclusively by the household
4	Water-sealed-other depository, shared with other households
5	Closed-pit
6	Open-pit
7	Others