HURRICANE GEORGES RECOVERY PROGRAM
Monitoring and Evaluation - Haiti

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Baseline with Geographic Zone Tables

Report no. 1

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NOTE : This document is a translation of the original baseline study report that was produced in French. The French version should be considered the "official" document.

EXECUTIVE SUMMARY

This report is the first of a series of studies aimed at evaluating the impacts of the Hurricane Georges Recovery Program (HGRP). Three phases have been identified: 1) Establishment of a baseline for measuring the initial level of indicators (1999 reference year) ; 2) A 1st Impact Survey plannned for November-December 2000; 3) A Final Impact Survey at the completion of the HGRP. This baseline study constitutes the first phase and establishes the baseline indicators for measuring the impacts of HGRP interventions.

The study area covers the southern section of the South East Department; from Bainet to Anse à Pître and the irrigated plain of Thomazeau. The surveys are geared toward the household level. Households within distinct agro-ecological zones will be analyzed. A random sample of 1,079 households was investigated during the baseline: 471 in hillside zones, 146 in non-irrigated plains and 462 in irrigated plains.

Initial levels of the following principal indicators were measured:

Indicator 1 : Average Household Revenue

The average yearly household revenue was 13,761.8 gourdes (688 US$). The range of values associated with this average revenue figure, as defined by the confidence intervals, were between 12,267 and 15,256 gourdes. The high standard deviation explains the large dispersion of average revenue. This revenue was due mainly to non-agricultural activities (44.9%) and crop production (33.5%). When taking into account the entire sample, households headed by women earned about half the revenue (7,633 Gourdes) of those headed by men (15,096 Gourdes). When considering revenue generation by gender within each household sampled (independent from the gender of each head of household), women and their dependents earned about 30% of the revenue and men and their dependents about 70%.

Indicator 2 : Percentage of Households utilizing ORE/PADF Improved Seeds.

The provision of ORE/PADF improved seeds had not been initiated at the time of the baseline study. Nevertheless, 1.2% of the households investigated claimed to have utilized ORE/PADF improved seeds.

Indicator 3 : Percentage of Households Trained in Disaster Managementon Techniques

About 5% of households headed by both men and women were aware of the disaster preparedness committees, the disaster preparedness plans and their contents. These households are located mostly on the Cayes-Jacmel coast where PADF has had a longstanding presence.

Indicator 4 : Percentage of Resilient Households.

Resilience cannot be measured by the baseline survey alone. It is necessary also to consult the progress reports of the different partner organizations.

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BACKGROUND

Hurricane Georges struck Haiti in September 1998 and severly damaged the agricultural infrastructure in many parts of the country. Many irrigation systems were either partially or totally destroyed. This severely affected the agricultural economy in the zones concerned. In order to help alleviate the situation, USAID designed and is implementing the HGRP. Among the main objectives of the program are the rehabilitation of drainage basins and small irrigation perimeters damaged by the hurricane. HGRP interventions will be implemented by several partner organizations including PADF, CECI, Plan International, and CRS. HGRP monitoring and evaluation will be carried out by SECID. Working closely with both USAID and PADF, SECID will complete a baseline and two subsequent surveys to measure HGRP impacts.

OBJECTIVES

The first survey will provide a baseline of reference data. This data will, first of all, serve as a baseline for measuring the changes in household revenue before and after HGRP interventions in the field. The second objective is to determine the level of utilization and impact of improved seeds that will be distributed by ORE to project participants. The third objective is to evaluate information provided to households on disaster preparedness and mitigation.

PROJECT DESIGN

Three phases were developed in order to analyze the impacts of HGRP interventions:

1) The establishment of a baseline. A baseline survey was conducted in May 2000 at potential HGRP sites with the goal of measuring the initial levels of reference indicators. Since 1999 was the reference year, the baseline was focused on indicator levels for this year. The potential HGRP intervention area was broken down into agro-ecological zones and each intervention site was stratified according to preestablished criteria. A total of 1,079 households located in the different agro-ecological zones were surveyed during the baseline.

2) A 1st Impact Survey in November-December 2000. This impact study will reflect the level of indicators for the year 2000. Comparison with the baseline year (1999) will allow the progress of HGRP interventions to be measured. A total of 1,000 households located in the different agro-ecological zones will again be surveyed during this second phase. The sample households not affected by HGRP interventions will serve as the “control group”. The results will be presented by agro-ecological zone.

3) A second impact study in November-December 2001. This study will focus, like the two preceeding studies, on a randomly selected sample of 1,000 households and measure indicator levels for the year 2001. Households not affected by HGRP interventions will serve again as the "control group". The results will be presented by agro-ecological zone. The progression of indicators will be determined by comparison with the baseline year (1999).

The table below summarizes the different phases of data collection.

Table 1 : Different Phases of Data Collection (based on USAID's proposal)

Period	May 2000	Nov-Dec 2000	Nov-Dec 2001	Total Households
May 2000	Baseline in the South East, from Bainet to Anse-à-Pitre and Thomazeau, grouped by agro-ecological zone (1999 reference year)			1,000 households
Nov-Dec 2000		1st Impact Survey (2000 reference year)		1,000 households
Nov-Dec 2001			Final Impact Survey (2001 reference year)	1,000 households

METHODOLOGY

This section provides a summary of the principal methodological steps that were used in conducting the survey.

The study area covers the southern portion of the South East Department ; from Bainet to Anse-à-Pître, and the Thomazeau plain. The plan was to administer 500 surveys in the Bainet/Jacmel/Cayes-Jacmel intervention area, 200 in the Marigot/Belle-Anse/Anse-à-Pître intervention area and 300 in the Thomazeau plain.

The study focusses on the household as the pertinent unit of analysis. The household is defined here as "a unit of production and consumption, where the person in charge (head of household) and other members share the same roof and take meals together". 1,079 rural households were surveyed during the baseline study.

The households were analysed by agro-ecological zone. This agro-ecological stratification approach diminished sample bias and reduced the variability between households. Three zones were pre-established according to topographical and irrigated water availability criteria: hillside, non-irrigated plain, and irrigated plain. The households surveyed were divided as follows: 471 in the hillside zone, 146 in the non-irrigated plain zone and 462 in the irrigated plain zone (43.6%, 13.5% and 42.9%, respectively). Table 1 shows the distribution of the sample households by agro-ecological zone. During the data analysis phase, the sample households were classified by head of household gender. These results are shown in table 2. Following a random sampling method, 17.9% of households headed by women and 82.1% of households headed by men were surveyed.

Table 1: Household Sample Distribution by Agro-Ecological Zone

Hillside		**Non-Irrigated Plain**		**Irrigated Plain**	
Locality	**No. of households**	**Locality**	**No. of households**	**Locality**	**No. of households**
Cajeun	35	Raymond	37	Tavette	36
Lapierre	38	Mambo	36	Demontreuil	36
Capaul	35	Banane	38	L'Hermitage mandais	35
Bas Petavie	37	Mapou	35	La Hatte	35
Laporte	35			Cachiman	36
Terre Rouge	38			Source Sable	36
Casque Carre	38			Sire	36
La vacherie	36			Joanau	36
Bassin Bleu	37			Chapotin	36
La Revoie	35			Carrefour Joanau	35
Gabriel	36			Despuzeau	36
Corail Lamothe	36			Boen	35
Macary (Dessira)	35			Balan	35
Totals	**471**		**146**		**462**
Grand Total 1,079					

Table 2: Heads of Households by Gender and Agro-Ecological Zone

Gender	**Agro-Ecological Zone**						**Totals**	
	Hillside		**Non-Irrigated Plain**		**Irrigated Plain**			
	No.	**%**	**No.**	**%**	**No.**	**%**	**No.**	**%**
Male	373	79.2	115	78.8	398	86.2	886	82.1
Female	98	20.8	31	21.2	64	13.8	193	17.9
Totals	**471**	**100.0**	**146**	**100.0**	**462**	**100.0**	**1,079**	**100.0**

The methodological approach consists of the following steps:

1.- ***Bibliographical Research:*** This step consists of consulting available documents on the relevant study areas and adjacent localities.

2.- ***Field Reconnaissance and Exploratory Survey:*** This step permits verification of the pertinence and currentness of the information consulted during the bibliographical search.

3.- ***Stratification of Interventions:*** The objective of stratifying project interventions is to classify the study area into homogenous zones allowing a more coherent analysis of the study parameters (revenue in particular). After defining the three agro-ecological zones, each locality was assigned to one of them.

4.- ***Locality Sampling :*** An average of 35 households were surveyed in each locality - 28 localities distributed among the three agro-ecological zones were selected - 14 in the western portion of the South East Department, 6 in the eastern part of the South East Department and 8 in the Thomazeau plain. These localities were randomly selected from a complete list of localities created from administrative maps.

5.- ***Enumeration of Households in the Intervention Zones:*** In order to establish a survey base, the enumeration (counting) of households at each randomly selected site was carried out before the administration of the formal baseline survey.

6.- ***Household Sampling:*** In each selected locality, an average of 35 households were selected randomly and surveyed after the enumeration of households during the community meetings.

The procedure was as follows:

Assigning a number to each household
Randomly selecting 35 households in the presence of community members.

7.- ***Field Surveys:*** The field surveys were carried out in two phases:

A preliminary contact meeting
The collection of information from rural households

8.- ***Data Entry:*** Data collected in the field was coded and entered into SPSS software.

PRINCIPAL RESULTS

SUMMARY INDICATOR TABLES

The following indicator tables summarize the results of the baseline survey. Detailed analysis of these tables is found later in this report.

Table A : Total Average Revenue in GOURDES and the (US $ equivalent)[1] according to Head of Household Gender and Agro-Ecological Zone

Head of Household Gender	Hillside		Non-Irrigated Plain		Irrigated Plain		Total Sample	
	Average[2] revenue Gdes	No. of house holds	Average revenue Gdes	No. of house holds	Average revenue Gdes	No. of house holds	Average revenue Gdes	No. of House Holds
Women	5,971.0 *(298.6US$)*	98	11,596.4 *(579.8US$)*	31	8,259.4 *(413.0US$)*	64	7,633.4 *(381.7US$)*	193
Men	14,199.4 *(710.0US$)*	373	21,495.6 *(1,074.8US$)*	115	14,088.9 *(704.4US$)*	398	15,096.8 *(754.8US$)*	886
Total average revenue	**12,487.3** ***(624.4US$)***	**471**	**19,393.7** ***(969.7US$)***	**146**	**13,281.4** ***(664.1US$)***	**462**	**13,761.8** ***(688.1US$)***	**1,079**
Confidence interval - 5% significance level	Lower	Upper	Lower	Upper	Lower	Upper	Lower	Upper
	10,248.1 *(512.4US$)*	14,726.5 *(736.3US$)*	12,884.5 *(644.2US$)*	25,902.9 *(1,295.1US$)*	11,644.2 *(582.2US$)*	15,399 *(770.0US$)*	12,267.4 *(613.4US$)*	15,256.2 *(762.8US$)*

Table B: Percentage of Households utilizing ORE/PADF Improved Seeds in their Fields

Utilizing ORE/PADF[3] Improved Seeds	Agro-Ecological Zone						Total Sample	
	Hillside		Non-Irrigated Plain		Irrigated Plain			
	% of house holds	No. surveyed	% of house holds	No. surveyed	% of house holds	No. surveyed	% of house holds	No. surveyed
Women	0%	98	0%	31	1.9%	64	.7%	193
Men	3.1%	373	0%	115	0%	398	1.4%	886
Total	**2.5%**	**471**	**0**	**146**	**.3%**	**462**	**1.3%**	**1,079**

[1] The exchange rate at the time of the survey was 1 US $ = 20 gourdes

[2] In the tables, total average revenue is calculated as follows: for example, 12,487.3=(5,971.0*98 + 14,199.4*373)/471.

[3] There was confusion among the households between the HGRP and PADF-PLUS. The seeds received came from PADF-PLUS.

Table C : Household Comprehension of Risk Management and Disaster Preparedness and Mitigation by Agro-Ecological Zone

Household Comprehension of Risk Management and Disaster Preparedness and Mitigation	Agro-Ecological Zone						Total Sample		
	Hillside		Non-Irrigated Plain		Irrigated Plain				
	Female	Male	Female	Male	Female	Male	Female	Male	Total[4]
	%	%	%	%	%	%	%	%	%
1-Knowledge of the existence of a disaster committee	6.1%	7.8%	3.2%	4.3%	0%	2.0%	3.6%	4.8%	4.5%
2-Knowledge of the existence of a disaster preparedness plan	1.0%	.8%	0%	.9%	0%	0%	.5%	.5%	.5%
3-Knowledge of the contents of the disaster preparedness plan	0%	.6%	0%	1.7%	0%	0%	0%	.5%	.4%
Households meeting at least one of the conditions above	6.1%	8.2%	3.3%	4.3%	0%	2.0%	3.6%	4.9%	4.7%
Both genders meeting conditions 1&2&3 above	7.8%		4.1%		1.7%		4.7%		
No. of households surveyed	98	373	31	115	64	398	193	886	1,079

[4] The weighted average taking into account the size of households headed by men and women.

Indicator 1 : Average Household Revenue

1.1. Total Average Revenue

When including all the households and taking into account the proportion of households by agro-ecological zone in the sample, **the average annual revenue is 13,761.8 gourdes (688 US$)**. The range of values consistent with this average revenue figure, taking into account the confidence intervals, are between 12,267 and 15,256 gourdes. The high standard deviation results in a large dispersion of average revenue values. This revenue comes mainly from non-agricultural activities (44.9%) and crop production (33.5%). See table # 3.

The analysis by agro-ecological zone shows an appreciable difference in average revenue among them - 12,487.3 gourdes in the hillside zone, 19,393.7 gourdes in the non-irrigated plain zone and 13,761.8 gourdes in the irrigated plain zone. The high level of average revenue in the non-irrigated plain zone can be attributed to non-agricultural activities. The majority of households surveyed in this zone were located near main roads and the town of Jacmel – a major commercial center. Households in the non-irrigated plain zone benefit from opportunities in the area, particularly from commercial activities. In addition, most of the households in this zone were located close to the sea creating revenue opportunities from fishing.

However, when considering revenue obtained just from crop production, the irrigated plain zone appears to be the most interesting. Average revenue acquired exclusively through agricultural production was highest in the irrigated plain zone – 5,432 gourdes compared with 4,183 gourdes in the hillside zone and 3,452 gourdes in the non-irrigated plain zone.

The standard deviation, however, was very high and accounted for a large deviation in relation to the averages and a large variability of average revenues. This indice enabled us to carry out the test of homogeneity with the goal of confirming or invalidating if the perceived difference of average revenues between the agro-ecological zones was significant. The test of homogeneity showed that average revenues by agro-ecological zone were identical.

With a significance level of 5%, the acceptance region of the Hypothesis H_0 of homogeneity for average revenue was located on a normal curve reduced by the interval [-1.96 ; +1.96]. The corresponding z value between the hillside and non-irrigated plain zones was (-1.90), between the hillside and irrigated plain zones (-0.46), and between the non-irrigated and irrigated plain zones (1.78). Since these three values fell within the acceptance region of the hypothesis for homogeneity, with a significance level of 5%, the average revenues by agro-ecological zone were not significantly different[5]. This result is corroborated by the confidence intervals of the different zones that contain

[5] Refer to the annex for details on the test for homogeneity.

considerable portions of communes in all the zones [12884.5; 14726.5] representing 62% of the amplitude of confidence intervals from the total sample [12267.4; 15256.2].

Table 3 : Total Average Household Revenue by Agro-Ecological Zone

Revenue Source	Hillside		Non-Irrigated Plain		Irrigated Plain		Total Sample	
	Average Gdes	**Percentage of revenue by activity type**	**Average Gdes**	**Percentage of revenue by activity type**	**Average Gdes**	**Percentage of revenue by activity type**	**Average Gdes**	**Percentage of revenue by activity type**
Crop production	4,183.25 *(209.2US$)*	33.5	3,452.08 *(172.6US$)*	17.8	5,432.19 *(271.6US$)*	40.9	4,610.20 *(230.5US$)*	33.5
Fruits	1,223.75 *(61.2US$)*	9.8	1,396.35 *(69.8US$)*	7.2	610.94 *(30.5US$)*	4.6	977.09 *(48.9US$)*	7.1
Non-agricultural activities	5,594.31 *(279.7US)*	44.8	12,082.27 *(604.1US$)*	62.3	4,914.12 *(245.7US$)*	37.0	6,179.05 *(309.0US$)*	44.9
Sale of animals	1,086.40 *(54.3US$)*	8.7	2,094.52 *(104.7US$)*	10.8	1,832.83 *(91.6US$)*	13.8	1,555.08 *(77.8US$)*	11.3
Animal products	124.87 *(6.2US$)*	1.0	77.57 *(3.9US$)*	0.4	159.38 *(8.0US$)*	1.2	137.62 *(6.9US$)*	1.0
Land use fees	274.72 *(13.7US$)*	2.2	290.90 *(14.5US$)*	1.5	332.34 *(16.6US$)*	2.5	302.76 *(15.1US$)*	2.2
Total average revenue	**12,487.3** ***(624.4US$)***	**100**	**19,393.7** ***(969.7US$)***	**100**	**13,281.4** ***(664.1US$)***	**100**	**13,761.8** ***(688.1US$)***	**100**
Standard Deviation	24,790.9		40,117.6		17,950.9		25,046.8	
Limit	Lower	Upper	Lower	Upper	Lower	Upper	Lower	Upper
Confidence Interval - 5% Significance Level	10,248.1 *(512.4US$)*	14,726.5 *(736.3US$)*	12,884.5 *(644.2US$)*	25,902.9 *(1,295.1US$)*	11,644.2 *(582.2US$)*	15,399 *(770.0US$)*	12,267.4 *(613.4US$)*	15,256.2 *(762.8US$)*

1.2. Composition of Average Revenue

After taking into account the weightings of different revenue sources (Table 3) when looking at all the zones combined, crop production and non-agricultural activities constitute the two principal sources of revenue (33.5% and 44.9% respectively) in the make up of total average revenue. At the agricultural production level, three crops (bananas - 30.7%, beans - 16.6%, corn - 10.6% and legumes - 14.7%) provide most of this revenue. Sorghum (7.7%) and sugar cane (7.2%) also provide significant revenue from crop production. Other crops can be considered to be residual.

Concerning non-agricultural revenue, commerce (35%), trades (12.9%) and fishing (11.3%) represent the main components.

Analysis of each agro-ecological zone shows similar results. The importance of non-agricultural activities (commerce in particular) in the non-irrigated plain zone has already been noted.

1.3. Average Revenue by Head of Household Gender

In general, households headed by women generate less revenue than those headed by men. Taking into account all the households sampled, a household headed by a woman earns about half the revenue (7,633 gourdes) of those headed by men (15,096 gourdes) See Table 4. This revenue difference can be explained by the following:

- Households headed by women have less land than households headed by men (approximately 50% less) which results in less agricultural revenue.

- Female heads of households are often older and more likely to be widows or abandoned by their spouses. There are also many young, single women who head households who do not have the same opportunities or potential for finding work as male heads of households.

- Female heads of households are excluded from certain jobs which are reserved exclusively for men like fishing, charcoal production and certain trades.

An analysis by agro-ecological zone shows similar results. However, it is worth noting that the difference in revenue between households headed by females and households headed by males is more pronounced in the hillside zone. In the two plain zones, this difference is less because of the predominance of commerce activities that represent the principal source of revenue for households headed by females.

Table 4 : Total Average Revenue by Head of Household Gender and Agro-Ecological Zone

Revenue Source	Hillside		Non-Irrigated Plain		Irrigated Plain		Total Sample	
	Average[6] revenue Gdes	No. of house holds	Average revenue Gdes	No. of house holds	Average revenue Gdes	No. of house holds	Average revenue Gdes	No. of house holds
Female	5,971.0 *(298.6US$)*	98	11,596.4 *(579.8US$)*	31	8,259.4 *(413.0US$)*	64	7,633.4 *(381.7US$)*	193
Male	14,199.4 *(710.0US$)*	373	21,495.6 *(1,074.8US$)*	115	14,088.9 *(704.4US$)*	398	15,096.8 *(754.8US$)*	886
Total average revenue	**12,487.3** ***(624.4US$)***	**471**	**19,393.7** ***(969.7US$)***	**146**	**13,281.4** ***(664.1US$)***	**462**	**13,761.8** ***(688.1US$)***	**1,079**

1.4. Revenue Generation by Gender within the Household

In households managed by both men or women, there is a portion of revenue that is generated by the man and his dependents; and another portion brought in by the woman and her dependents. Table 5 presents the proportion (percentage) of revenue generation by gender. **Women and their dependents bring in about 30% of household revenue and men and their dependents about 70%.** These proportions are applicable to all the agro-ecological zones (see table 5). It should be noted that most of the revenue generated by women comes from non-agricultural activities (commerce in particular).

Table 5 : Revenue Generation by Gender within the Household

Revenue Source	Hillside		Non-Irrigated Plain		Irrigated Plain		Totals	
	Female	Male	Female	Male	Female	Male	Female	Male
Crop production	8.9%	91.1%	5.5%	94.5%	7.2%	92.8%	7.7%	92.3%
Fruits	40.4%	59.6%	21.8%	78.2%	23.3%	76.7%	32.3%	67.7%
Non-agricultural activities	45.4%	54.6%	40.0	60.0	56.5%	43.5%	47.7%	52.3%
Sale of animals	14.7%	85.3%	4.6%	95.4%	8.5%	91.5%	9.7%	90.3%
Animal products	37.6%	62.4%	35.0%	65.0%	14.7%	85.3%	24.7%	75.3%
Land use fees	14.8%	85.2%	11.8%	88.2%	34.5	65.5	25.0%	75.0%
% of average revenue	29.6%	70.4%	28.4%	71.6%	26.9%	73.1%	28.2%	71.8%
No. of households surveyed	98	373	31	115	64	398	193	886

[6] In the tables, total average revenue is calculated as follows: for example, 12,487.3=(5,971.0*98 + 14,199.4*373)/471.

1.5. Average Revenue Distribution by Gender

In order to better understand the dispersion and disparity of revenue according to head of household gender, Table 6 divides households by head of household gender and agro-ecological zone. The table shows that 13.0% of female-led households and 3.7% of households led by men earn less than 1,000 gourdes annually. When taking into account the total cumulative sample, 60% of households headed by women and 32% of households headed by men earn less than 5,000 gourdes of annual revenue. Also, 80% of female-headed households and 57% of male-headed households earn less than 10,000 gourdes annually. This confirms that households managed by women are less well-off than those led by men. In addition, Table 6 shows that the distribution of average revenue for female-headed households is concentrated below the average when compared with male-led households that are symetrically clustered around the average.

Table 6 : Total Average Revenue Levels by Gender and Agro-Ecological Zone

Revenue Level	Agro-Ecological Zone						Total Sample	
	Hillside		Non-Irrigated Plain		Irrigated Plain			
Gourdes	Female	Male	Female	Male	Female	Male	Female	Male
	%	%	%	%	%	%	%	%
Less than 1000	15.3%	4.6%	12.9%	2.6%	9.4%	3.3%	13.0%	3.7%
1000-3000	32.7%	16.6%	35.5%	14.8%	26.6%	14.6%	31.1%	15.5%
3000-5000	16.3%	13.4%	9.7%	9.6%	15.6%	15.3%	15.0%	13.8%
5000-10,000	19.4%	25.5%	12.9%	18.3%	21.9%	26.4%	19.2%	24.9%
10,000-20,000	8.2%	19.8%	16.1%	24.3%	14.1%	22.4%	11.4%	21.6%
20,000-50,000	8.2%	16.6%	9.7%	22.6%	10.9%	13.6%	9.3%	16.0%
50,000 and greater		3.5%	3.2%	7.8%	1.6%	4.5%	1.0%	4.5%
Total	100%	100%	100%	100%	100%	100%	100%	100%
No. of households surveyed	98	373	31	115	64	398	193	886

Indicator 2 : Percentage of Households Utilizing ORE/PADF Improved Seeds

The provision of improved seeds to households had not been initiated at the time of the baseline survey. Nevertheless, a baseline was established in order to be able to measure progress in subsequent surveys. 98.8% of households said that they have not yet utilized ORE/PADF improved seeds. About 70% of the households surveyed had not yet heard of these seeds and the 29% that knew of the seeds said that they were not yet available. Head of household gender did not make any difference in this case. More detailed information on utilization of ORE/PADF improved seeds will be collected during the 1st Impact Survey scheduled for November 2000.

On the other hand, 1.2% of households surveyed in the South East said that they had benefitted by PADF-PLUS improved bean and corn seeds. These seeds were mentioned because the respondents mistakenly believed that they were provided by the HGRP.

The FAO/Ministry of Agriculture seed distribution program affected a small number of households in the study zone. This explains why between 5% and 10% of households reported utilizing non-ORE/PADF improved seeds (see table and annex).

Table 7: Percentage of Households Utilizing ORE/PADF Improved Seeds

Utilizing ORE/PADF Improved Seeds	Agro-Ecological Zone						Totals		
	Hillside		Non-Irrigated Plain		Irrigated Plain				
	Female	Male	Female	Male	Female	Male	Female	Male	Total[7]
	%	%	%	%	%	%	%	%	%
Yes	0%	3.1%	0%	0%	1.9%	0%	.7%	1.4%	1.3%
No	100%	96.9%	100%	100%	98.1%	100%	99.3%	98.6%	98.7%
Total	100%	100%	100%	100%	100%	100%	100%	100%	100%
Number of households surveyed	98	373	31	115	64	398	193	886	1,079

[7] The weighted average taking into account the size of households headed by men and women.

Indicator 3 : Knowledge of the Existence of a Disaster Preparedness and Mitigation Committee, a Disaster Preparedness Plan and the Contents of the Plan (3 responses combined)

Table 8 is the result of aggregating the responses to these three questions:

1. Do you know of a group or committee in the locality that helps people prepare themselves for future natural disasters?

2. Do you know of the existence of a disaster preparedness and mitigation plan in your community?

3. Do you know the contents of this plan?

At the time the survey was administered, activities for preparing households in the case of a disaster had not yet commenced. The mobilization for forming disaster preparedness and mitigation comittees had only been initiated on the Cayes-Jacmel coast where the first two projects were getting underway. The first mobilization session in Cayes-Jacmel was held after the baseline survey had been completed. However, in selected project intervention zones, the main organizations chosen to mobilize the communities were sometimes identified as the disaster committees by the households in the survey. Table 8 shows the percentage of households that responded positively to at least one of the three questions listed above. A similarly formatted table is presented in the annex for each question. In general, the responses are closely correlated. In other words, the households that responded positively to the first question were more likely to do the same for the second and third questions.

Approximately 5% of households headed by both genders knew of the existence of a committee or a disaster preparedness and mitigation plan. These households were located mainly on the Cayes-Jacmel coast where PADF has had a long-standing presence and where CODHA was promoting the program.

Table 8 : Households Informed about Disaster Preparedness and Mitigation by Agro-Ecological Zone.

Level of Household Knowledge	Agro-Ecological Zone						Total Sample		
	Hillside		Non-Irrigated Plain		Irrigated Plain				
	Female	Male	Female	Male	Female	Male	Female	Male	Total[8]
	%	%	%	%	%	%	%	%	%
1-Knowledge of the disaster preparedness committee	6.1%	7.8%	3.2%	4.3%	0%	2.0%	3.6%	4.8%	4.5%
2-Knowledge of the disaster preparedness plan	1.0%	.8%	0%	.9%	0%	0%	.5%	.5%	.5%
3-Knowledge of the contents of the disaster preparedness plan	0%	.6%	0%	1.7%	0%	0%	0%	.5%	.4%
Households meeting at least one of the three conditions cited above	6.1%	8.2%	3.3%	4.3%	0%	2.0%	3.6%	4.9%	4.7%
Both genders combined meeting conditions 1&2&3	7.8%		4.1%		1.7%		4.7%		
No. of households surveyed	98	373	31	115	64	398	193	886	1,079

Knowledge of risk and disaster management will be evident by how well households are able to prepare for future natural disasters and and their behavior during an actual disaster. Also, it would be interesting to evaluate the capacity and attitudes of households in preparing for disasters.

The majority of households were not informed on ways to prepare for disasters; 75% of the households surveyed believed there was nothing to do to prepare for them. This percentage is again higher in the irrigated plain zone (85%). Most of the households saying that they had the capacity to prepare for natural disasters believed that soil conservation and reforestation where the best solutions.

Furthermore, in measuring the future behavior of households in the case of a new disaster, 45% of households surveyed said that there is nothing they can do; they would submit passively to a disaster. Households led by women would be more prone to exposure (55% said there was nothing they could do as opposed to 43% for households led by men). Other households (more than ½ of those surveyed) showed a little more imagination and cited strategies that they would use in the event of future disasters. A

[8] The weighted average taking into account the size of households headed by men and women.

majority (36.9%) would flee their homes and seek refuge elsewhere. These same households mentioned that their dwellings were too flimsy to survive a natural disaster. On the other hand, 10% of households hoped to stay in their homes and seek shelter under tables or beds. (see Table 11).

Table 9: Capacity of Households to Prepare for Natural Disasters

What You Can Do to Prepare for Disasters	Agro-Ecological Zone						Total Sample		
	Hillside		Non-Irrigated Plain		Irrigated Plain				
	Female	Male	Female	Male	Female	Male	Female	Male	Total[9]
	%	%	%	%	%	%	%	%	%
Nothing	69.1%	67.8%	77.1%	65.0%	85.8%	85.1%	77.5%	75.2%	75.3%
Soil conservation/ Reforestation	27.8%	22.7%	12.9%	19.3%	7.9%	5.5%	18.8%	14.5%	15.3%
Remove trees and branches that could damage the house	2.1%	4.0%		5.3%	3.2%	3.5%	2.1%	3.9%	3.6%
Follow instructions heard on the radio	1.0%	1.1%			1.6%	1.3%	1.0%	1.0%	1.0%
Construct a shelter to protect against the wind		.8%				.3%		.4%	.4%
Put animals in a shelter		2.7%		7.0%		2.3%		3.0%	2.5%
Avoid high-risk areas		.8%		.9%		1.0%		.9%	.7%
Take shelter in a concrete house		.3%			1.6%	.5%	.5%	.3%	.4%
Structurally reinforce your house				2.6%		.8%		.7%	.6%
Total	100%	100%	100%	100%	100%	100%	100%	100%	100%
No. of households surveyed	98	373	31	115	64	398	193	886	1,079

[9] The weighted average taking into account the size of households headed by men and women.

Table 10 : Reaction of Households in the Case of a Future Disaster

What You Can Do in the Case of a Disaster	Agro-Ecological Zone						Total Sample		
	Hillside		Non-Irrigated Plain		Irrigated Plain				
	Female	Male	Female	Male	Female	Male	Female	Male	Total[10]
	%	%	%	%	%	%	%	%	%
Nothing	54.1%	53.5%	64.5%	46.5%	52.4%	32.5%	55.2%	43.1%	45.3%
Flee your house and seek refuge elsewhere	28.6%	27.1%	29.0%	40.4%	31.7%	48.5%	29.7%	38.4%	36.9%
Stay at your house and seek shelter under a bed or table	11.2%	9.6%	3.2%	6.1%	11.1%	11.5%	9.9%	10,0%	10.0%
Structurally reinforce your house	3.1%	6.7%		.9%		1.3%	1.6%	3.3%	3.2%
Don't get near trees or water	3.1%	2.2%		6.1%	3.2%	4.3%	2.6%	3.6%	3.4%
Follow instructions heard on the radio		.5%	3.2%			1.5%	.5%	.9%	.8%
Remove a section of the roof to let wind pass through		.5%			1.6%		.5%	.2%	.3%
Total	100%	100%	100%	100%	100%	100%	100%	100%	100%
No. of households surveyed	98	373	31	115	64	398	193	886	1,079

[10] The weighted average taking into account the size of households headed by men and women.

Indicator 4 : Percentage of Resilient Communities

Resilient communities cannot be completely defined within the context of this baseline study. They represent a group of localities that are capable of addressing the problems caused by natural disasters. Resilience can be defined as communities having at least 20% of households satisfying indicator 2; specifically, utilization of ORE/PADF improved seeds, or 20% of households informed on how to prepare for and mitigate disaster risks including knowledge of the existence of a disaster preparedness and mitigation committee, plan or the contents of this plan. These communities must also be the beneficiary of an infrastructural or environmental project under the HGRP. It is necessary to wait for the progress reports submitted by the different implementing agencies before determining the level of this indicator.

ANNEXES

SUMMARY INDICATOR TABLES BY GEOGRAPHIC ZONE

The following summary indicator tables display data by **geographic zone** with the goal of testing if the averages are homogenous or statistically different.

Table A 1: Total Average Revenue in GOURDES and the (US $ Equivalent)[11] according to Head of Household Gender and Geographic Zone

Head of Household Gender	Jacmel/Cayes-Jacmel/Bainet		Marigot/Bellanse/ Anse-à-Pître		Thomazeau		Total Sample	
	Average Revenue Gdes	No. of households	Average Revenue Gdes	No. of households	Average Revenue Gdes	No. of households	Average Revenue Gdes	No. of household
Female	6,154.8 *(307.7US$)*	123	11,655.4 *(582.8US$)*	38	8,540.2 *(427.0US$)*	32	7,633.4 *(381.7US$)*	193
Male	12,946.5 *(647.3US$)*	457	22,764.2 *(1,138.2US$)*	177	13,647.0 *(682.4US$)*	252	15,096.8 *(754.8US$)*	886
Total average revenue	**11,506.2** ***(575.3US$)***	**580**	**20,674.9** ***(1,033.7US$)***	**215**	**13,119.6** ***(656.0US$)***	**284**	**13,761.8** ***(688.1US$)***	**1,079**
Confidence interval - 5% significance level	Lower	Upper	Lower	Upper	Lower	Upper	Lower	Upper
	9,660.9 *(483.0US$)*	13,351.5 *(667.6US$)*	15,981.7 *(799.1US$)*	25,368.1 *(1,268.4US$)*	10,936.4 *(546.2US$)*	15,302.8 *(765.1US$)*	12,267.4 *(613.4US$)*	15,256.2 *(762.8US$)*

Components for the Test of Homogeneity

1) Between Jacmel/Cayes-Jacmel/Bainet and Marigot/Bellanse/Anse-à-Pître

Z= - 3.55, falls within the acceptance zone of the alternative hypothesis. Given a significance level of 5%, there is a significant difference between the two average revenues.

2) Between Jacmel/Cayes-Jacmel/Bainet and Thomazeau

Z= -1.10, falls within the acceptance zone of the nulle hypothesis. Given a significance level of 5%, there is no significant difference between the average revenues of the Jacmel/Cayes-Jacmel/Bainet zone and the Thomazeau zone.

3) Between Marigot/Bellanse/Anse-à-Pître and Thomazeau

Z= 2.85, greater than 1.96. Given a significance level of 5%, the average revenues are significantly different.

[11] The exchange rate at the time of the study was 1 US $ = 20 gourdes

Table B1: Percentage of Households Utilizing ORE/PADF Improved Seeds in their Fields

Utilization of ORE/PADF Improved Seeds	Geographic Zone						Total Sample	
	Jacmel/Cayes-Jacmel/Bainet		Marigot/Bellanse/ Anse-à-Pître		Thomazeau			
	% of households	No. surveyed	% of households	No. surveyed	% of households	No. surveyed	% of households	No. surveyed
Female	1.3%	123	2.5%	38	0%	32	.7%	193
Male	2.1%	457	2.30%	177	0%	252	1.4%	886
Total	**1.9%**	**580**	**2.3%**	**215**	**0%**	**284**	**1.3%**	**1,079**

Table C1 : Households Informed about Disaster Preparedness and Mitigation by Geographic Zone.

Level of Household Knowledge	Geographic Zone						Total Sample		
	Jacmel/Cayes-Jacmel/Bainet		Marigot/Bellanse/ Anse-à-Pître		Thomazeau				
	Female	Male	Female	Male	Female	Male	Female	Male	Total[12]
	%	%	%	%	%	%	%	%	%
1-Knowledge of the disaster preparedness committee	4.1%	4.6%	5.3%	11.2%	0%	0%	3.6%	4.8%	4.5%
2-Knowledge of the disaster preparedness plan	.8%	.7%	0%	.6%	0%	0%	.5%	.5%	.5%
3-Knowledge of the contents of the disaster preparedness plan	0%	.7%	0%	.6%	0%	0%	0%	.5%	.4%
Households meeting at least one of the conditions cited above	4.1%	5.0%	5.3%	11.8%	0%	0%	3.6%	4.9%	4.7%
Both genders combined meeting conditions 1&2&3	4.8%		10.6%		0%		4.7%		
No. of households surveyed	123	457	38	177	32	252	193	886	1,079

[12] The weighted average taking into account the size of households headed by men and women.

Table 1a: Total Average Household Revenue by Agro-Ecological Zone

Revenue Source	Hillside		Non-Irrigated Plain		Irrigated Plain		Total Sample	
	Average	Standard Deviation	Average	Standard Deviation	Average	Standard Deviation	Average	Standard Deviation
Crop production	4,374.5 (n=450)	9,136.3	3,727.2 (n=135)	8,881.0	5,779.7 (n=434)	13,198.5	4,887.2 (n=1,019)	11,042.1
Fruits	1,453.8 (n=395)	2,524.6	2,211.1 (n=92)	4,828.5	1,570.2 (n=179)	3,567.9	1,589.7 (n=666)	3,230.9
Non-agricultural activities	7,023.5 (n=376)	22,401.5	13,667.5 (n=129)	40,479.0	5,789.5 (n=392)	8,830.4	7,439.7 (n=897)	22,022.2
Sale of animals	22,76.3 (n=224)	3,072.7	4,577.5 (n=67)	6,179.5	3,653.8 (n=232)	4,332.7	3,182.2 (n=523)	4,227.2
Animal products	253.4 (n=232)	633.8	223.7 (n=49)	268.0	738.2 (n=105)	1,671.1	381.5 (n=386)	1,025.7
Land use fees	1,819.7 (n=71)	3,322.8	1,697.0 (n=26)	3,149.6	2,200.9 (n=69)	3,026.9	1,959.0 (n=166)	3,163.4
Total Average Revenue	**12,487.3 (n=471)**	**24,790.9**	**19,393.7 (n=146)**	**40,117.6**	**13,281.4 (n=462)**	**17,950.9**	**13,761.8 (n=1,079)**	**25,046.8**
Mode	2,500		1,800		3,680		2,500	

Table 2a : Number and Frequency of Households in the calculation of Total Average Revenue

Revenue Source	Hillside		Non-Irrigated Plain		Irrigated Plain		Total Sample	
	No. of House holds	Frequency %	No. of house holds	Frequency %	No. of house holds	Frequency %	No. of house holds	Frequency %
Crop production	450	95.5	135	92.5	434	93.9	1,019	94.4
Fruits	395	83.9	92	63.0	179	38.7	666	61.7
Non-agricultural activities	376	79.8	129	88.4	392	84.8	897	83.1
Sale of animals	224	47.6	67	45.9	232	50.2	523	48.5
Animal products	232	49.3	49	33.6	105	22.7	386	35.8
Land use fees	71	15.1	26	17.8	69	14.9	166	15.4
Total	**471**	**100**	**146**	**100**	**462**	**100**	**1,079**	**100**

REVENUE FROM CROP PRODUCTION

Table 3a : Total Average Agricultural Revenue (crop production) by Household according to Agro-Ecological Zone in Gourdes

Source of Agricultural Revenue	Hillside		Non-Irrigated Plain		Irrigated Plain		Total Sample	
	Average	%	Average	%	Average	%	Average	%
Corn	524.94 *(26.2US$)*	12.0	842.34 *(42.1US$)*	22.6	404.57 *(20.2US$)*	7.0	518.04 *(25.9US$)*	10.6
Beans	813.66 *(40.7US$)*	18.6	704.44 *(35.2US$)*	18.9	843.84 *(42.2US$)*	14.6	811.28 *(40.6US$)*	16.6
Sorghum	188.10 *(9.4US$)*	4.3	287.0 *(14.4US$)*	7.7	595.31 *(29.8US$)*	10.3	376.31 *(18.8US$)*	7.7
Bananas	1,885.14 *(94.3US$)*	43.1	1,330.61 *(66.5US$)*	35.7	1,150.16 *(57.5US$)*	19.9	1,491.16 *(74.6US$)*	30.7
Manioc	126.86 *(6.3US$)*	2.9	108.08 *(5.4US$)*	2.9	104.03 *(5.2US$)*	1.8	117.29 *(5.9US$)*	2.4
Yams	349.96 *(17.5US$)*	8.0	18.64 *(0.9US$)*	.5	17.34 *(0.9US$)*	.3	166.16 *(8.3US$)*	3.4
Sweet Potatoes	26.25 *(1.3US$)*	.6	26.09 *(1.3US$)*	.7	121.37 *(6.1US$)*	2.1	68.42 *(3.4US$)*	1.4
Sugar Cane	52.49 *(2.6US$)*	1.2	70.82 *(3.5US$)*	1.9	751.36 *(37.6US$)*	13.0	351.88 *(17.6US$)*	7.2
Congo Peas	139.98 *(7.0US$)*	3.2	93.18 *(4.7US$)*	2.5	57.80 *(2.9US$)*	1.0	97.74 *(4.9US$)*	2.0
Malanga	21.87 *(1.1US$)*	.5	3.73 *(0.2US$)*	.1	-	-	9.77 *(0.5US$)*	.2
Rice		-		-	46.24 *(2.3US$)*	.8	19.54 *(1.0US$)*	.4
Peanuts	48.12 *(2.4US$)*	1.1	63.36 *(3.2US$)*	1.7	23.12 *(1.2US$)*	.4	39.10 *(2.0US$)*	.8
Vigna	8.75 *(0.4US$)*	.2	44.73 *(2.2US$)*	1.2	40.46 *(2.0US$)*	.7	29.32 *(1.5US$)*	.6
Pois de souche	8.75 *(0.4US$)*	.2	11.18 *(0.6US$)*	.3	11.56 *(0.6US$)*	.2	7.77 *(0.4US$)*	.2
Legumes	113.74 *(5.7US$)*	2.6	7.45 *(0.4US$)*	.2	1,560.52 *(78.0US$)*	27.0	718.42 *(35.9US$)*	14.7
Other	70.0 *(3.5US$)*	1.6	115.54 *(5.8US$)*	3.1	46.24 *(2.3US$)*	.8	63.53 *(3.2US$)*	1.3
Average agricultural revenue	**4,374.5** ***(218.7US$)***	**100**	**3,727.2** ***(186.4US$)***	**100**	**5,779.7** ***(289.0US$)***	**100**	**4,887.2** ***(244.4US$)***	**100**

Table 4a : Total Average Agricultural Revenue (crop production) by Household according to Agro-Ecological Zone

Source of Agricultural Revenue	Hillside		Non-Irrigated Plain		Irrigated Plain		Total Sample	
	Average	Standard deviation	Average	Standard deviation	Average	Standard deviation	Average	Standard deviation
Corn	*559.3 (n=424)*	968.2	*915.3 (n=124)*	1,995.3	*784.1 (n=225)*	1,677.2	*681.9 (n=773)*	1,408.6
Beans	*1,225.9 (n=298)*	2,438.4	*1,905.1 (n=50)*	4,963.0	*1,441.1 (n=255)*	1,630.9	*1,373.2 (n=603)*	2,469.2
Sorghum	*338.1 (n=250)*	667.8	*504.1 (n=77)*	714.4	*754.7 (n=343)*	953.1	*570.4 (n=670)*	860.3
Bananas	*4,058.4 (n=209)*	7,848.9	*3,902.7 (n=46)*	5,972.3	*8,756.2 (n=57)*	17,664.0	*4,893.7 (n=312)*	10,290.2
Manioc	*626.1 (n=90)*	2,134.1	*510.2 (n=29)*	604.6	*1,028.1 (n=45)*	3,082.0	*715.9 (n=164)*	2,269.9
Yams	*1,425.2 (n=111)*	5,904.4	*425.0 (n=6)*	377.8	*505.4 (n=13)*	403.7	*1,287.1 (n=130)*	5,464.5
Sweet Potatoes	*195.4 (n=63)*	245.4	*332.5 (n=10)*	319.0	*529.1 (n=100)*	1,114.4	*396.2 (n=173)*	875.8
Sugar Cane	*1,618.9 (n=14)*	2,920.9	*782.5 (n=12)*	511.8	*7,414.2 (n=44)*	18,598.9	*5,118.3 (n=70)*	15,044.5
Congo Peas	*445.2 (n=142)*	688.5	*474.9 (n=27)*	481.0	*607.3 (n=42)*	818.8	*481.2 (n=211)*	694.2
Malanga	*1,952.0 (n=5)*	2,346.9	*750 (n=1)*	-	-	-	*1,751.7 (n=6)*	2,155.7
Rice					*716.1 (n=27)*	919.3	*716.1 (n=27)*	919.3
Peanuts	*777.2 (n=28)*	711.7	*936.0 (n=9)*	802.1	*594.5 (n=15)*	710.2	*752.0 (n=52)*	721.9
Vigna	281.9 (n=14)	270.2	438.7 (n=14)	706.8	520.8 (n=35)	960.6	449.5 (n=63)	797.0
Pois de souche	235.9 (n=14)	259.5	216.7 (n=6)	126.2	338.5 (n=13)	275.9	272.8 (n=33)	247.7
Legumes	1,869.56 (n=27)	3,971.0	562.5 (n=2)	760.1	3,341.3 (n=203)	9,346.0	3,146.0 (n=232)	8,856.7
Others	1,741.4 (n=18)	4,558.9	1,714.1 (n=9)	3,865.3	2,477.9 (n=8)	4,233.6	1,902.7 (n=35)	4,206.9
Average agricultural revenue	**4,374.5 (n=471)**	**9,136.3**	**3,727.2 (n=146)**	**8,881.0**	**5,779.7 (n=462)**	**13,198.5**	**4,887.2 (n=1079)**	**11,042.1**

Table 5a : Number and Frequency of Households in the calculation of Average Agricultural Revenue

Source of revenue	Hillside		Non-Irrigated Plain		Irrigated Plain		Total Sample	
	Number of households	Frequency	Number of households	Frequency	Number of households	Frequency	Number of households	Frequency
Corn	424	90.0	124	84.9	225	48.7	773	71.6
Beans	298	63.3	50	34.2	255	55.2	603	55.9
Sorghum	250	53.1	77	52.7	343	74.2	670	62.1
Bananas	209	44.4	46	31.5	57	12.3	312	28.9
Manioc	90	19.1	29	19.9	45	9.7	164	15.2
Yams	111	23.6	6	4.1	13	2.8	130	12.0
Sweet Potatoes	63	13.4	10	6.8	100	21.6	173	16.0
Sugar Cane	14	3.0	12	8.2	44	9.5	70	6.5
Congo Peas	142	30.1	27	18.5	42	9.1	211	19.6
Malanga	5	1.1	1	.7	0	0	6	.5
Rice	0	0	0	0	27	5.8	27	2.5
Peanuts	28	5.9	9	6.2	15	3.2	52	4.8
Vigna	14	3.0	14	9.6	35	7.6	63	5.8
Pois de Souche	14	3.0	6	4.1	13	2.8	33	3.1
Legumes	27	5.7	2	1.4	203	43.9	232	21.5
Others	18	3.8	9	6.2	8	1.7	35	3.2
Total average revenue	**471**	**100**	**146**	**100**	**462**	**100**	**1,079**	**100**

REVENUE FROM NON-AGRICULTURAL ACTIVITIES

Table 6a : Total Average Non-Agricultural Revenue by Household according to Agro-Ecological Zone

Source of Non-Agricultural Revenue	Hillside		Non-Irrigated Plain		Irrigated Plain		Total Sample	
	Average	%	Average	%	Average	%	Average	%
Salaried agricultural work	84.28 (4.2US$)	1.2	54.67 (2.7US$)	.4	225.79 (11.3US$)	3.9	141.35 (7.1US$)	1.9
Direct revenue from the HGRP	-	0	-	0	-	0	-	0
Crafts	140.47 (7.0US$)	2.0	27.34 (1.4US$)	.2	5.79 (0.3US$)	.1	66.96 (3.3US$)	.9
Trades	744.49 (37.2US$)	10.6	1,831.44 (91.6US$)	13.4	880.00 (44.0US$)	15.2	959.72 (48.0US$)	12.9
Civil servant/ regular employment	302.01 (15.1US$)	4.3	902.06 (45.1US$)	6.6	422.63 (21.1US$)	7.3	446.38 (22.3US$)	6.0
Sale of wood & charcoal	400.34 (20.0US$)	5.7	984.06 (49.2US$)	7.2	358.95 (17.9US$)	6.2	468.70 (23.4US$)	6.3
Sale of agricultural products	688.30 (34.4US$)	9.8	601.37 (30.1US$)	4.4	775.79 (38.8US$)	13.4	714.21 (35.7US$)	9.6
General commerce	1,446.84 (72.3US$)	20.6	3,184.52 (159.2US$)	23.3	1,736.85 (86.8US$)	30.0	1,822.73 (91.1US$)	24.5
Fishing	1,208.04 (60.4US$)	17.2	1,284.75 (64.2US$)	9.4	335.79 (16.8US$)	5.8	840.69 (42.0US$)	11.3
Seasonal emigration	386.29 (19.3US$)	5.5	697.04 (34.9US$)	5.1	225.79 (11.3US$)	3.9	349.67 (17.5US$)	4.7
Long-term emigration	386.29 (19.3US$)	5.5	410.03 (20.5US$)	3.0	358.95 (17.9US$)	6.2	379.42 (19.0US$)	5.1
Other and unclassified revenue	1,257.20 (62.9US$)	17.9	3,676.55 (183.8US$)	26.9	451.58 (22.6US$)	7.8	1,249.87 (62.5US$)	16.8
Average non-gricultural revenue	**7,023.5 (351.2US$)**	**100**	**13,667.5 (683.4US$)**	**100**	**5,789.5 (289.5US$)**	**100**	**7,439.7 (372.0US$)**	**100**

Table 7a : Total Average Non-Agricultural Revenue by Household according to Agro-Ecological Zone

Source of Non-Agricultural Revenue	Hillside		Non-Irrigated Plain		Irrigated Plain		Total Sample	
	Average	**Standard Deviation**	**Average**	**Standard Deviation**	**Average**	**Standard Deviation**	**Average**	**Standard Deviation**
Salaried agricultural work	1,919.4 (n=17)	2,455.1	684.5 (n=10)	558.2	2,938.7 (n=30)	4,609.0	2,239.2 (n=57)	3,673.0
Direct revenue from the HGRP	-	-	-	-	-	-	-	-
Crafts	3,805.9 (n=14)	11,611.2	1,700.0 (n=2)	1,131.4	1,081.7 (n=3)	1,661.3	3,154.1 (n=19)	9,951.4
Trades	4,192.3 (n=67)	5,776.1	8,721.9 (n=27)	10,232.8	6,615.4 (n=52)	11,373.7	5,893.0 (n=146)	9,081.6
Civil servant/ Regular employment	6,715.3 (n=17)	7,229.1	12,927.8 (n=9)	13,183.9	9,800.9 (n=17)	7,881.8	9,235.5 (n=43)	9,081.6
Sale of wood & charcoal	1,901.7 (n=79)	2,851.3	7,481.7 (n=17)	16,224.7	1,429.9 (n=98)	1,919.3	2,152.6 (n=194)	5,454.9
Sale of agricultural products	2,819.1 (n=92)	3,653.3	2,877.6 (n=27)	4,059.7	3,034.3 (n=100)	2,992.3	2,924.6 (219)	3,407.9
General commerce	3,932.7 (n=138)	5,250.1	7,194.3 (n=57)	14,180.3	3,408.1 (n=200)	4,755.5	4,137.7 (n=395)	7,157.0
Fishing	22,688.0 (n=20)	2,971.1	23,572.6 (n=7)	28,908.9	8,855.3 (n=15)	9,472.2	17,895.2 (n=42)	20,573.0
Seasonal emigration	2,645.4 (n=50)	3,529.8	4,241.0 (n=21)	3,437.2	3,707.3 (n=24)	6,179.9	3,266.4 (n=95)	4,338.2
Long-term emigration	2,004.5 (n=72)	2,352.0	2,528.6 (n=21)	5,474.5	3,290.1 (n=43)	4,286.5	2,491.7 (n=136)	3,660.0
Other and unclassified revenue	18,939.3 (n=25)	79,435.7	78,975.0 (n=6)	173,131.7	6,806.4 (n=26)	10,322.3	19,724.5 (n=57)	76,694.6
Average non-gricultural revenue	**7,023.5 (n=471)**	**22,401.5**	**13,667.5 (n=146)**	**40,479.0**	**5,789.5 (n=462)**	**8,830.4**	**7,439.7 (1,079)**	**22,022.3**

Table 8a : Number and Frequency of Households in the calculation of Average Non-Agricultural Revenue

Source of Non-Agricultural Revenue	Hillside		Non-Irrigated Plain		Irrigated Plain		Total Sample	
	Number of households	Frequency %	Number of households	Frequency %	Number of households	Frequency %	Number of households	Frequency %
Salaried agricultural work	17	3.6	10	6.8	30	6.5	57	5.3
Direct revenue from the HGRP	0	0	0	0	0	0	0	0
Crafts	14	3.0	2	1.4	3	.6	19	1.8
Trades	67	12.2	27	18.5	52	11.3	146	13.5
Civil servant/ Regular employment	17	3.6	9	6.2	17	3.7	43	4.0
Sale of wood & charcoal	79	16.8	17	11.6	98	21.2	194	18.0
Sale of agricultural products	92	19.5	27	18.5	100	21.6	219	20.3
General commerce	138	29.3	57	39.0	200	43.3	395	36.6
Fishing	20	4.2	7	4.7	15	3.2	42	3.9
Seasonal emigration	50	10.6	21	14.4	24	5.2	95	8.8
Long-term emigration	72	15.3	21	14.4	43	9.3	136	12.6
Other and unclassified revenue	25	5.3	6	4.1	26	5.6	57	5.3
Households generating non-agricultural revenue	376	79.8	129	88.4	392	84.8	897	83.1
Number of Households	471	100	146	100	462	100	1,079	100

Table 9a : Weights of Different Sources in the composition of Non-Agricultural Revenue

Non-Agricultural Revenue Source	Hillside	Non-Irrigated Plain	Irrigated Plain	Total Sample
	%	%	%	%
Salaried agricultural work	1.2	.4	3.9	1.9
Direct revenue from the HGRP	0	0	0	0
Crafts	2.0	.2	.1	.9
Trades	10.6	13.4	15.2	12.9
Civil servant/ regular employment	4.3	6.6	7.3	6.0
Sale of wood & charcoal	5.7	7.2	6.2	6.3
Sale of agricultural products	9.8	4.4	13.4	9.6
General commerce	20.6	23.3	30.0	24.5
Fishing	17.2	9.4	5.8	11.3
Seasonal emigration	5.5	5.1	3.9	4.7
Long-term emigration	5.5	3.0	6.2	5.1
Other and non-classified revenue	17.9	26.9	7.8	16.8
Total	100	100	100	100

Table 10a: Relationship of Household Members with the Head of Household according to Agro-Ecological Zone

Relationship with the Head of Household	Agro-Ecological Zone			Totals		
	Hillside	Non-Irrigated Plain	Irrigated Plain			
	%	%	%	No.	%	% cumulative
Spouse	16.8	16.7	18.3	835	17.4	17.4
Son/daughter	67.9	64.8	71.2	3,300	68.9	86.3
Father/mother	1.6	.9	.8	58	1.2	87.5
Uncle/aunt	.2	1.1	.3	19	.4	87.9
Other parent	10.9	12.3	8.3	479	10.0	97.9
Other relation	2.6	4.1	1	102	2.1	100.0
Total	**100.0**	**100.0**	**100.0**	**4,793**	**100.0**	**----**

Table 11a: Distribution of Household Members by Gender and Agro-Ecological Zone

Gender	Agro-Ecological Zone						Totals	
	Hillside		Non-Irrigated Plain		Irrigated Plain			
	No.	%	No.	%	No.	%	No.	%
Masculine	1,300	49.7	394	50.1	1,288	52.0	2,982	50.7
Feminine	1,315	50.3	392	49.9	1,187	48.0	2,894	49.2
Total	**2,615**	**100.0**	**786**	**100.0**	**2,475**	**100.0**	**5,876**	**100.0**

Table 12a: Distribution of Household Members by Agro-Ecological Zone according to Level of Education

Education Level	Agro-Ecological Zone			Totals		
	Hillside	Non-Irrigated Plain	Irrigated Plain			
	%	%	%	No.	%	% cumulative
Don't know	1.1	1.2	1.4	68	1.2	1.2
Illiterate	29.2	27.2	28.8	1,584	28.2	30.0
Did not complete primary school (less than 6 years of schooling)	50.7	49.9	50.9	2,788	50.7	80.7
Completed primary school (6 years of schooling)	4.8	6.1	4.1	258	4.7	85.4
Did not complete secondary school (less than 13 years of schooling)	9.9	12.7	13.6	652	11.8	97.2
Completed secondary school (13 years of schooling)	1.4	.7	.6	51	.9	98.1
University (more than 13 years of schooling)	.2	.5	.1	10	.2	98.3
Alphabetization Center (a few months of alphabetization training).	2.8	1.6	.6	93	1.7	100.0
Total	**100.0**	**100.0**	**100.0**	**5,504**	**100.0**	**----**

Table 13a: Distribution of Household Members (18 years and older) according to Matrimonial Status and by Agro-Ecological Zone

Matrimonial Status	Agro-Ecological Zone			Totals		
	Hillside	Non-Irrigated Plain	Irrigated Plain			
	%	%	%	No.	%	
Married	30.2	32.1	24.5	845	28.0	
Living together	27.2	29.7	33.3	912	30.2	
Divorced	--	--	.1	1	0.1	
Separated	4.1	4.4	3.5	117	3.9	
Single	31.9	28.2	32.8	961	31.8	
Widow/ Widower	6.7	5.6	5.8	186	6.1	
Total	**100.0**	**100.0**	**100.0**	**3,022**	**100.0**	

Table 14a: Education Level of Household Members (6 years and older) by Agro-Ecological Zone

Education Level	Agro-Ecological Zone			Totals		
	Hillside	Non-Irrigated Plain	Irrigated Plain			
	%	%	%	No.	%	% cumulative
Don't know	.9	.8	1.4	55	1.1	1.1
Illiterate	27.4	24.2	27.3	1363	26.9	28.0
Did not complete primary school (less then 6 years of schooling)	51.2	50.8	51.1	2585	51.1	79.1
Completed primary school (6 years of schooling)	5.1	6.6	4.3	250	4.9	84.1
Did not complete secondary school (less than 13 years of schooling)	10.8	14.5	14.6	652	12.9	97.0
Completed secondary school (13 years of schooling)	1.5	.8	.6	51	1.0	98.0
University (more than13 years of schooling)	.2	.6	.1	10	.2	98.2
Alphabetization Center (a few months of alphabetization training)	3.0	1.8	.6	93	1.8	100.0
Total	**100.0**	**100.0**	**100.0**	**5,059**	**100.0**	**----**

Table 15a: Distribution by Average and by Age Group of Household Members according to Agro-Ecological Zone

Age Group	Agro-Ecological Zone			Totals		
	Hillside	Non-Irrigated Plain	Irrigated Plain			
	%	%	%	No.	%	% cumulative
< 6 years	14.2	15.4	12.3	797	13.6	13.6
6 – 15 years	30.6	30.5	29.8	1776	30.2	43.8
16 – 30 years	24.0	23.4	26.4	1465	24.9	68.8
31 – 50 years	18.9	18.1	20.4	1140	19.4	88.2
51 – 70 years	9.8	11.7	9.8	591	10.1	98.3
> 70 years	2.5	.9	1.3	104	1.7	100.0
Total	100.0	100.0	100.0	5873	100.0	---
Average	**24.25 years**	**23.56 years**	**24.51 years**	**24.26 years**		

Table 16a: Distribution of Household Members (6 years and older) according to Main Occupation and by Agro-Ecological Zone

Occupation of Household Members (6 years and older)	Agro-Ecological Zone			Totals		
	Hillside	Non-Irrigated Plain	Irrigated Plain			
	%	%	%	No.	%	% cumulative
Don't know	.1	.8	.7	22	.4	.4
Student	47.6	46.7	46.8	2,376	47.1	47.5
Agriculture	28.6	224.6	28.1	1,405	27.9	75.4
Agricultural laborer	.1	.3	.2	10	.2	75.6
Crafts	.4	.3	.1	15	.3	75.9
Trades	2.0	2.9	2.5	116	2.3	78.2
Sale of wood & charcoal	.3	.3	.4	17	.3	78.5
General commerce	8.0	11.5	12.0	514	10.2	88.7
Employee	.7	1.4	.8	42	.8	89.5
Other	1.7	1.8	1.9	89	1.8	91.3
None	10.5	9.5	6.5	436	8.7	100.0
Total	**100.0**	**100.0**	**100.0**	**5,877**	**100.0**	**----**

Table 17a: Distribution of Agricultural Plot Size by Household and Agro-Ecological Zone

Total Surface Area (carreaux)	Agro-Ecological Zone			Totals		
	Hillside	Non-Irrigated Plain	Irrigated Plain			
	%	%	%	No.	%	% cumulative
< 0.5	40.1	28.9	22.8	263	29.6	29.6
≥ 0.5 and < 1	25.6	29.6	30.2	254	28.5	58.1
≥ 1 and < 2	21.2	20.4	25.1	205	23.0	81.1
≥ 2 and < 5	9.8	17.6	18.2	136	15.3	96.4
≥ 5	3.4	3.5	3.8	32	3.6	100.0
Total	100.0	100.0	100.0	890	100.0	---
Average	**1.08 cx**	**1.28 cx**	**1.46 cx**	**1.3 cx**		

Table 18a: Distribution by Plot Size and Head of Household Gender according to Agro-Ecological Zone

Total Surface Area (carreaux)	Agro-Ecological Zone						Totals	
	Hillside		Non-Irrigated Plain		Irrigated Plain			
	Gender		Gender		Gender		Gender	
	Female	Male	Female	Male	Female	Male	Female	Male
	%	%	%	%	%	%	%	%
< 0.5	54.0	36.3	40.0	25.9	40.4	20.3	46.0	26.2
≥ 0.5 and < 1	23.8	26.1	30.0	29.5	28.1	30.5	26.7	28.9
≥ 1 and < 2	17.5	22.2	13.3	22.3	19.3	25.9	17.3	24.2
≥ 2 and < 5	4.3	11.7	16.7	17.9	11.1	19.5	8.7	16.6
≥ 5	--	4.3	--	4.5	3.5	3.8	1.3	4.1
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
Average	**0.65 cx**	**1.20 cx**	**0.83 cx**	**1.40 cx**	**0.96 cx**	**1.53 cx**	**0.81 cx**	**1.41 cx**

Table 19a: Average Plot Size according to Head of Household Gender

Average Surface Area (carreaux)	Agro-Ecological Zone						Totals	
	Hillside		Non-Irrigated Plain		Irrigated Plain			
	Gender		Gender		Gender		Gender	
	Female	Male	Female	Male	Female	Male	Female	Male
Total	0.65	1.20	0.83	1.40	0.96	1.53	0.81	1.41
Cultivated	0.40	1.06	0.55	0.99	0.70	1.16	0.54	1.10

Table 20a: Distribution by Cultivated Plot Size by Household and Head of Household Gender according to Agro-Ecological Zone

Cultivated Plot Size (carreaux)	Agro-Ecological Zone						Totals	
	Hillside		Non-Irrigated Plain		Irrigated Plain			
	Gender		Gender		Gender		Gender	
	Female	Male	Female	Male	Female	Male	Female	Male
	%	%	%	%	%	%	%	%
≤ 1	71.0	46.6	62.1	41.1	49.1	23.4	60.8	33.4
> 1 and<= 2	19.4	27.8	20.7	28.6	31.6	35.6	24.3	32.1
> 2 and <= 3	9.6	16.2	10.3	17.0	14.0	28.5	11.5	22.9
> 3 and <= 4	--	7.3	6.9	10.7	5.3	11.7	3.4	10.1
> 4	--	2.1	--	2.7	--	0.8	--	1.5
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
Average	**0.40 cx**	**1.06 cx**	**0.55 cx**	**0.99 cx**	**0.70 cx**	**1.16 cx**	**0.63 cx**	**1.10 cx**

Table 21a: Distribution by Agro-Ecological Zone and Cultivated Plot Size

Cultivated Plot Size (carreaux)	Agro-Ecological Zone			Totals		
	Hillside	Non-Irrigated Plain	Irrigated Plain			
	%	%	%	No.	%	% cumulative
≤ 1	51.7	45.4	26.7	337	38.0	38.0
> 1 and <= 2	26.0	27.0	35.1	273	30.8	68.8
> 2 and <= 3	14.9	15.6	26.7	186	21.0	89.8
> 3 and <= 4	5.7	9.9	10.9	80	9.0	98.8
> 4	1.7	2.1	0.7	11	1.2	100.0
Total	100.0	100.0	100.0	890	100.0	---
Average	**0.92 cx**	**0.90 cx**	**1.10 cx**	**1.01 cx**		

Table 22a: Distribution of Plots according to Land Tenure and Agro-Ecological Zone

Land Tenure	Agro-Ecological Zone			Totals		
	Hillside	Non-Irrigated Plain	Irrigated Plain			
	%	%	%	No.	%	
Purchased	25.1	23.0	22.7	649	23.7	
Inherited	38.4	21.4	36.7	965	35.2	
Joint ownership	4.7	2.8	2.2	89	3.2	
Rental – payment in cash	11.6	25.3	5.4	288	10.5	
Rental – payment with produce	11.2	16.0	2.8	495	18.0	
Rental – no payment required	2.5	4.7	1.4	62	2.3	
Purchased and ceded	2.6	2.8	3.6	85	3.1	
Inherited and ceded	3.9	3.9	4.2	111	4.0	
Total	100.0	100.0	100.0	2,744	100.0	

Table 23a: Average Plot Surface Area (carreaux) by Type of Ownership

Type of Ownership	Agro-Ecological Zone					
	Hillside		Non-Irrigated Plain		Irrigated Plain	
	Average (cx)	Standard Deviation	Average	Standard Deviation	Average	Standard Deviation
Purchased	.342	.608	.566	.807	.482	.554
Inherited	.316	.630	.606	.766	.502	.580
Joint ownership	.382	.598	.409	.352	.353	.547
Rental – payment in cash	.241	.562	.425	.542	.312	.366
Rental – payment with produce	.282	.435	.250	.250	.397	.464
Rental – no payment required	.306	.280	.368	.249	.485	.318
Purchased and ceded	.464	.648	.675	.736	1.310	5.352
Inherited and ceded	.310	.395	.375	.408	.566	.866

Table 24a: Distribution of Plots according to Slope

Slope	Agro-Ecological Zone			Totals		
	Hillside	Non-Irrigated Plain	Irrigated Plain			
	%	%	%	No.	%	% Cumulative
Gentle	32.3	74.9	91.2	1,841	67.1	67.1
Average	37.9	16.8	6.6	538	19.6	86.8
Steep	29.8	8.3	2.2	363	13.2	100.0
Total	100.0	100.0	100.0	2,742	100.0	---

Table 25a: Soil Conservation Methods Utilized

Soil Conservation Method	Agro-Ecological Zone			Totals	
	Hillside	Non-Irrigated Plain	Irrigated Plain		
	%	%	%	%	% Cumulative
Contour canals	2.7	12.5	.8	2.4	2.4
Gully plugs	.4	1.3	--	.3	2.7
Dry walls	10.0	2.0	1.7	5.2	7.9
Hedgerows	2.8	2.6	.1	1.4	9.3
Mulch strips	4.3	3.3	.8	2.5	11.8
Terracing	.1	--	--	.0	11.8
Other structures	1.1	--	--	.5	12.3
No structures	78.7	78.3	96.9	87.7	100.0
Total	100.0	100.0	100.0	100.0	---

Table 26a: Percentage of Irrigated Plots

Plot	Agro-Ecological Zone			Totals	
	Hillside	Non-Irrigated Plain	Irrigated Plain		
	%	%	%	%	% Cumulative
Irrigated	6.4	1.8	82.5	43.0	43.0
Non-irrigated	93.6	98.2	17.5	57.0	100.0
Total	100.0	100.0	100.0	100.0	---

Table 27a: Average Number of Trees by Plot and Agro-Ecological Zone

Number of Trees	Agro-Ecological Zone			Totals
	Hillside	Non-Irrigated Plain	Irrigated Plain	
	No.	No.	No.	
Minimum	0	0	0	0
Maximum	915	1,025	921	1,025
Average	60	54	26	43

Table 28a: Reasons given for not Utilizing ORE/PADF Improved Seeds

Reasons for not Utilizing ORE/PADF Improved Seeds	Agro-Ecological Zone			Totals	
	Hillside	Non-Irrigated Plain	Irrigated Plain		
	%	%	%	%	
Don't know about them	75.1	86.9	61.2	69.3	
Not available in my locality	23.5	14.1	35.0	28.3	
Not available at planting time	0.7	--	1.6	1.1	
Too expensive	0.7	--	0.3	0.4	
Don't practice farming	--	--	1.9	0.9	
Total	100.0	100.0	100.0	100.0	

Table 29a: Type of Seeds Utilized by Households

Seed Type	Agro-Ecological Zone								
	Hillside			Non-Irrigated Plain			Irrigated Plain		
	% of Households			% of Households			% of Households		
	Corn	Beans	Sorghum	Corn	Beans	Sorghum	Corn	Beans	Sorghum
Traditional	95.4	92.7	99.4	95.7	95.7	98.1	85.1	89.9	85.3
ORE/ PADF	1.3	1.0	--	--	--	--	--	0.3	0.3
Improved (Other)	3.3	6.3	0.6	4.3	4.3	1.9	14.9	9.8	14.4
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

Table 30a: Fertilization Techniques Practiced by Households according to Agro-Ecological Zone

FertilizationTechniques Utilized by Farmers	Agro-Ecological Zone						Totals	
	Hillside		Non-Irrigated Plain		Irrigated Plain			
	% Yes	% No	% Yes	% No	% Yes	% No	% Yes	% No
Traditional fallow	87.2	12.8	84.3	15.7	91.6	8.4	88.7	11.3
Ash	6.1	93.9	7.1	92.9	11.0	89.0	8.3	91.7
Chicken manure	3.5	96.5	2.9	97.1	4.5	95.5	3.8	98.2
Purchased manure	5.0	95.0	3.6	96.4	2.9	97.1	3.9	96.1
Organic manure	81.5	18.5	59.3	40.7	43.4	56.6	62.3	37.7
Chemical fertilizer	23.8	76.2	9.3	90.7	6.7	93.3	14.5	85.5
Green manure	14.3	85.7	11.4	88.6	4.0	96.0	9.3	90.7
Compost	15.7	84.3	8.6	91.4	4.3	95.7	9.8	90.2

Table 31a: Percentage of Households who know or have heard of ORE/PADF Improved Seeds

Familiar with ORE/PADF Improved Seeds	Agro-Ecological Zone			Totals
	Hillside	Non-Irrigated Plain	Irrigated Plain	
	%	%	%	%
Yes	6.6	0.0	0.6	3.2
No	93.4	100.0	99.4	96.8
Total	100.0	100.0	100.0	100.0

Table 32a: Availability of ORE/PADF Improved Seeds

Availability of ORE/PADF Improved Seeds	Agro-Ecological Zone			Totals
	Hillside	Non-Irrigated Plain	Irrigated Plain	
	%	%	%	%
Don't Know	49.1	72.9	25.8	42.3
Yes	1.3	0.0	0.9	0.9
No	49.6	27.1	73.3	56.8
Total	100.0	100.0	100.0	100.0

Table 33a: Farmer Practice of Burning Fields Before Planting

Practices Burning of Fields before Planting	Agro-Ecological Zone			Totals	
	Hillside	Non-Irrigated Plain	Irrigated Plain		
	%	%	%	%	% Cumulative
Always	16.3	17.3	29.4	22.1	22.1
Sometimes	20.7	30.9	24.1	23.5	45.6
Never	63.0	51.8	46.5	54.4	100.0
Total	100.0	100.0	100.0	100.0	--

Table 34a: Farmer Practice of Burning Plant Residues

Practices Burning of Plant Residues	Agro-Ecological Zone			Totals	
	Hillside	Non-Irrigated Plain	Irrigated Plain		
	%	%	%	%	% Cumulative
Always	24.1	39.3	30.9	29.1	29.1
Sometimes	24.8	28.6	34.9	29.6	58.7
Never	51.1	32.1	34.2	41.3	100.0
Total	100.0	100.0	100.0	100.0	--

Table 35a: Availability of Disaster Preparedness Committee Members for Assisting Farmers in the Case of Natural Disasters according to Agro-Ecological Zone

Disaster Preparedness Committee	Agro-Ecological Zone						Total Sample		
	Hillside		Non-Irrigated Plain		Irrigated Plain				
	Female	Male	Female	Male	Female	Male	Female	Male	Totals[13]
	%	%	%	%	%	%	%	%	%
Yes	6.1%	7.8%	3.2%	4.4%	0%	2.0%	3.6%	4.8%	4.5%
No	93.9%	92.2%	96.8%	95.6%	100%	98.0%	96.4%	95.2%	95.5%
Total	100%	100%	100%	100%	100%	100%	100%	100%	100%

Table 36a: Participation in Meetings with Disaster Preparedness Committee Members

Number of Meetings	Agro-Ecological Zone			Totals	
	Hillside	Non-Irrigated Plain	Irrigated Plain		
	% Farmers	% Farmers	% Farmers	%	% Cumulative
0	19.4	--	--	15.0	15.0
1-3	45.2	66.7	66.7	50.0	65.0
4-6	12.9	16.7	33.3	15.0	80.0
7-10	19.3	16.6	--	17.5	97.5
Greater than 10	3.2	--	--	2.5	100.0
Total	100.0	100.0	100.0	100.0	---

Table 37a: Knowledge of the Existence of a Disaster Preparedness Plan

Knowledge of Disaster Preparedness Plan	Agro-Ecological Zone						Tota l Sample		
	Hillside		Non-Irrigated Plain		Irrigated Plain				
	Female	Male	Female	Male	Female	Male	Female	Male	Total[14]
	%	%	%	%	%	%	%	%	%
Yes	1.0%	.8%	0%	.9%	0%	0%	. 5%	.5%	.5%
No	99.0%	99.2%	100%	99.1%	100%	100%	99.5%	99.5%	99.5%
Total	100%	100%	100%	100%	100%	100%	100%	100%	100%

[13] The weighted average taking into account the size of households headed by men and women.
[14] The weighted average taking into account the size of households headed by men and women.

Table 38a: Knowledge of Disaster Preparedness Plan Contents

Knowledge of Disaster Preparedness Plan Contents	Agro-Ecological Zone						Total Sample		
	Hillside		Non-Irrigated Plain		Irrigated Plain				
	Female	Male	Female	Male	Female	Male	Female	Male	Total[15]
	%	%	%	%	%	%	%	%	%
Yes	0%	.6%	0%	1.7%	0%	0%	0%	.5%	.4%
No	100%	99.4%	100%	98.3%	100%	100%	100%	99.5%	99.6%
Total	100%	100%	100%	100%	100%	100%	100%	100%	100%

Table 39a: Beneficiaries of Development Projects

Beneficiaries of Development Projects	Agro-Ecological Zone			Totals	
	Hillside	Non-Irrigated Plain	Irrigated Plain		
	%	%	%	Frequency	%
Yes	44.6	26.7	16.4	324	30.1
No	55.4	73.3	83.6	754	69.9
Total	100.0	100.0	100.0	509	100.0

Table 40a: Cooperativeness of Interviewees

The Interviewee was:	Agro-Ecological Zone			Totals	
	Hillside	Non-Irrigated Plain	Irrigated Plain		
	%	%	%	%	% cumulative
Very cooperative and informative	63.7	58.0	50.5	57.3	57.3
Somewhat cooperative	35.0	40.6	47.5	41.2	98.5
Not cooperative and informative	1.3	1.4	2.0	1.5	100.0
Total	100.0	100.0	100.0	100.0	---

[15] The weighted average taking into account the size of female and male-headed households.