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Baseline Study of Title II Development Food Assistance Programs in Uganda

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Information about Title II emergency and development food assistance programs may be obtained from USAID's Office of Food for Peace at http://www.usaid.gov/what-we-do/agriculture-and-food-security/food-assistance.

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List of Acronyms

ARI	Acute Respiratory Infection
BMI	Body Mass Index
DHS	Demographic and Health Survey
EA	Enumeration Area
FANTA	Food and Nutrition Technical Assistance III Project
FFP	Office of Food for Peace
FGD	Focus Group Discussion
FTF	Feed the Future
GHG	Growth, Health, and Governance
GPS	Global Positioning System
HAZ	Height-for-Age Z-Score
HDDS	Household Dietary Diversity Score
HH	Household
HHS	Household Hunger Scale
HIV	Human Immunodeficiency Virus
IDI	In-Depth Interview
IP	Implementing Partner
IYCF	Infant and Young Child Feeding
KI	Key Informant
KIDDP	Karamoja Integrated Disarmament and Development Program
LC	Local Council
LCU	Local Currency Unit
LSMS	Living Standards Measurement Survey
MAD	Minimum Acceptable Diet
MCC	Maternal Child Care
NGO	Non-Governmental Organization
NRM	Natural Resource Management
OLS	Ordinary Least Squares
OR	Odds Ratio
ORT	Oral Rehydration Therapy
PDB	Potential Direct Beneficiary
PPP	Purchasing Power Parity
PPS	Probability Proportional to Size
PVO	Private Voluntary Organization
QA	Quality Assurance
RWANU	Resiliency through Wealth, Agriculture, and Nutrition in Karamoja
SPSS	Statistical Package for the Social Sciences
UBOS	Uganda Bureau of Statistics
UGX	Ugandan Shilling
UNICEF	United Nations Children's Fund
UNPS	Uganda National Panel Survey
USAID	U.S. Agency for International Development
USD	United States Dollar
VHT	Village Health Trainee
VSG	Village Savings Group
WEAI	Women's Empowerment in Agriculture Index
WFP	U.N. World Food Program
WHO	World Health Organization

Executive Summary

Overview of the Baseline Study

In Fiscal Year 2012, the U.S. Agency for International Development (USAID) Office of Food for Peace (FFP) awarded funding to private voluntary organizations (PVOs) to design and implement multi-year Title II development food assistance programs in the most food-insecure regions of Uganda. In Uganda, the selected programs are Resiliency through Wealth, Agriculture, and Nutrition in Karamoja (RWANU) in southern Karamoja; and Growth, Health, and Governance (GHG) in northern Karamoja. The main purpose of the Title II programs is to improve long-term food security in Karamoja through a variety of interconnected activities.

In line with the USAID Evaluation Policy, FFP contracted with ICF International to carry out a baseline study in villages in the Karamoja Region selected for implementation of the Title II development food assistance programs. This baseline study is the first phase of a pre-post evaluation survey cycle. The second phase will include a final survey, to be conducted in five years, when the Title II programs are completed. The baseline study includes two components: (1) a representative population-based household survey to collect data for key FFP and program-specific indicators; and (2) a qualitative component to gather additional data that add context, richness, and depth to the results from the household survey. The results from the baseline study will be used for the following purposes:

1. Establish baseline values of key FFP and program-specific indicators prior to implementation of the Title II programs;
2. Assist the PVOs in establishing target levels for improvements in these indicators over the five-year Title II program cycle;
3. Inform PVOs about the current food security situation so they can refine their program design and implementation strategies and improve efficiency by targeting the areas and subgroups that will benefit most; and
4. Provide FFP baseline indicator values that can be compared across countries through meta-analyses of the indicator results.

The population-based household survey sample was designed to be statistically representative of the beneficiary villages selected for implementation by each respective program in its designated geographic regions of operation. The multistage clustered sampling design yielded a household sample size of 2,400 per program or 4,800 households overall. Questionnaires and training materials were developed and finalized based on consultations with FFP, the Food and Nutrition Technical Assistance III Project (FANTA), and the PVOs. The fieldwork, including training, data collection, and data entry, began in mid-January 2013 and concluded in June 2013.

The qualitative study component was conducted during the same timeframe as the population-based household survey. The qualitative team visited eight villages and undertook in-depth interviews (IDIs) and focus group discussions (FGDs). The team also conducted formal interviews and informal conversations with key informants who had insights into health and nutrition, as well as livelihood development in the villages where the RWANU and GHG programs are implemented. Nine question guides were used to conduct the IDIs and FGDs. Ultimately, the team conducted seven FGDs and 24 IDIs with potential direct beneficiaries (PDBs) and six IDIs and three informal conversations with key informants.

Limitations and challenges experienced during the research process include a compressed timeline, difficulty obtaining current household counts at the village level from existing data sources, difficulty recruiting experienced local interviewers in the Karamoja region, logistics and transportation constraints, difficulty accessing some villages, the length and complexity of the household survey questionnaire, seasonality of data collection, limitations of self-reported data, and concurrent fielding of the qualitative and household studies.

Key Findings

The baseline study findings and conclusions cover seven broad areas: (1) characteristics of the population; (2) household hunger and dietary diversity; (3) poverty levels; (4) water, sanitation, and hygiene; (5) agricultural practices; (6) women's health and nutrition; and (7) children's health and nutrition.

Characteristics of the Population

Historically, individuals in the districts that are part of the Title II program area are pastoralists who have faced decades of cattle raids. In fact, the Karamojong have been characterized as a nomadic people. However, qualitative data indicate that, while the Karamojong do follow their cattle while they graze, they tend to have a home base in their village *manyattas* (a traditional African village of huts, typically enclosed by a fence). The shift from animal rearing to agriculture as a primary form of livelihood is a recent trend in the history of the Karamojong.

The results of the household survey indicate that the average household in the program area includes 6.3 household members. Children ages 0-59 months are household members in nearly 75 percent of all households. Children ages 0-23 months are household members in about 35 percent of households. The majority of household heads have no formal education (83 percent). Most households include an adult male and female (89 percent).

Household Hunger

The household survey data show that about 73 percent of households suffer from moderate or severe hunger, with a higher prevalence in the northern Karamoja program area (76 percent) compared to the southern Karamoja program area (69 percent). Most of these households suffer from moderate hunger (65 percent), and 8 percent suffer from severe hunger. The baseline study was conducted in February to April of 2013, during the start of the lean season. According to the Famine Early Warning System Network (FEWS NET), food supplies were expected to be depleted approximately two to three months before the normal start to the lean season in March 2013.[1] Since the prevalence of household hunger is based on the occurrence and frequency of food deprivation experiences within the past four weeks, the early depletion of food supplies may have contributed to these high rates of moderate and severe hunger.

Data from the qualitative study indicate that accessibility of food is variable and influenced by a number of factors, such as the season (rainy versus dry), success of crop production, and access to an income that allows for the purchase of food. Wild foods during the rainy season add diversity to the diet that may not be available during the dry season. However, some individuals and family are solely dependent on such food sources due to a failure to harvest crops, to raise animals or to secure sufficient economic resources to purchase needed household supplies. Resilience during the dry season is also dependent upon success with production and access to other livelihood sources. In times of scarcity, individuals reported consuming one or two meals along with local brew to help keep them full.

Household Dietary Diversity

The Household Dietary Diversity Score (HDDS) of 2.4 indicates that households are typically able to access and consume 2.4 of 12 basic food groups. Diets are primarily composed of cereals and tubers, with some legumes and vegetables. Again, the early depletion of food supplies may have impacted the availability and access to foods, leading to a lower HDDS score for the 2013 lean season. The District Health Office Action Against Hunger (DHO-ACF) Nutritional Surveillance Program[2] reported an HDDS

[1] FEWS NET, Uganda Food Security Outlook, Jan.-June 2013. Retrieved from http://www.fews.net/docs/Publications/UG_OL_2013_01_en.pdf

[2] DHO-ACF and UNICEF Nutrition Surveillance Report (May 2012) *Nutrition Surveillance Karamoja Region, Uganda, Round 8, 2012*. Retrieved from http://www.actionagainsthunger.org/sites/default/files/publications/DHO-ACF_Karamoja_Nutrition_Surveillance_Round_8_-_Final_Report_2012.05.pdf

of 4.3 for the Karamoja region in the lean season of 2012, and the U.N. World Food Program[3] (WFP) reported an HDDS of 4.8 for Uganda as a whole (data collected from the Uganda National Panel Survey [UNPS] in 2009-2010).

Qualitative data indicate that the most common foods consumed are *posho* (a region-specific name for a dish made from maize flour and water, which may also be called *ugali*, *sima*, or *sembe*), beans or peas, maize, and wild greens. For the most part, respondents indicated that all family members eat from the same pot and, therefore, eat the same types of food. In terms of beverages, the two items most frequently identified by respondents are water and the local brew. The majority of food that individuals consume, according to qualitative data, is food that they produce or forage locally.

Poverty Levels

A total of 94 percent of the population in the survey areas currently lives in extreme poverty (less than $1.25 USD per day). Daily per capita expenditures are, on average, $0.56 USD per day, per person, with similar values in both program areas. The mean depth of poverty in the survey areas is 63.7 percent of the poverty line, with significantly deeper poverty in the southern Karamoja program areas (67 percent) than the northern Karamoja areas (62 percent).

The poverty rates in the survey area are very high compared to the rates in Uganda as a whole. Data from the Uganda National Household Survey IV[4] show that 25 percent of the Uganda population lives below the poverty line[5] and about 75 percent of the population in the Northeast region lives below the poverty line. The Northeast region as defined in the UNHS consists of the entire Karamoja region and a number of neighboring districts.

As part of the qualitative findings, six primary sources of income were identified: making charcoal, gathering firewood, producing local brew, engaging in small-scale agricultural production (both the sale of crops and animal rearing), working as hired labor in private gardens, and "casual labor." Most of the casual labor, as reported by potential beneficiaries, is inconsistent and undertaken on an as-needed basis. The incomes of those interviewed are generally insufficient to cover all nutritional needs, health care needs, and other necessary expenses.

Water, Sanitation, and Hygiene

While about 40 percent of households reported using an improved drinking water source, mainly boreholes, about 77 percent of households reported taking no measures to ensure the water is safe to drink. In comparison, these rates are much lower than those reported in the 2011 Demographic and Health Survey (DHS),[6] where approximately 66 percent of all rural Ugandan households reported using an improved drinking water source and 38 percent reported boiling water prior to drinking.

Only 15 percent of households reported using an improved sanitation facility (non-shared) during the daytime, either a ventilated pit latrine or a pit latrine slab. The majority of households did not use any facility (70 percent) or used an open pit (12 percent). The results for the sanitation indicator are similar to those reported in the 2011DHS, with 15 percent of all rural Uganda households using a non-shared improved sanitation facility.

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[3] United Nations World Food Program (2013). *Comprehensive Food Security and Vulnerability Analyses (CFSVA): Uganda*. Retrieved from http://documents.wfp.org/stellent/groups/public/documents/ena/wfp256989.pdf

[4] Uganda National Household Survey, Socio-economic Module. Abridged Report (November 2011). Retrieved from http://www.ubos.org/UNHS0910/unhs200910.pdf

[5] The poverty line is not clearly defined and may differ from $1.25/day USD as used in the baseline study of Title II development food assistance programs.

[6] Uganda Demographic and Health Survey (2011). Retrieved from http://www.measuredhs.com/pubs/pdf/FR264/FR264.pdf

Soap or another cleansing agent was observed at the hand washing station in only 8 percent of households. In contrast, the 2011 DHS survey reported a rate of 27 percent with water and soap at hand washing stations for rural Ugandan households.

According to qualitative data, the main contributing factor to the poor level of hygiene is lack of accessibility to an improved water source. In fact, respondents frequently named new boreholes or closer access to water when asked about the greatest needs in their village.

Reports from key informants and potential direct beneficiaries during qualitative data collection differed with respect to sanitation practices. While key informants reported a very low level of latrine use and hand washing, most potential direct beneficiaries reported having and using latrines and washing their hands at key points throughout the day.

Agriculture

The majority of farmers (91 percent) in the household survey reported raising crops, and more than one-quarter (28 percent) reported raising animals. The most common crops planted are sorghum, maize, and beans, and the most common animals raised are goats, cattle, and chicken. The average number of crops planted per household is 2.6. According to qualitative findings, the primary objective of farming is subsistence, with sales occurring in the event of excess production. Additionally, because of the fluctuating nature of the crop yield, respondents rely on additional sources of income to meet household needs.

Overall, 17 percent of farmers reported using at least two sustainable crop practices, and 12 percent reported using at least two sustainable livestock practices (for cattle and goats). Although most farmers still prepare their soil by hand (89 percent), soil preparation with ox plow (23 percent of farmers) and intercropping (20 percent of farmers) are the most commonly reported sustainable practices. About 16 percent of farmers reported using at least two sustainable natural resource management (NRM) practices, and half of farmers reported using improved storage practices, mainly cereal banks/silos or granaries.

In general, the qualitative data indicate that most agricultural decisions are made either solely by males or jointly by males and females. In cases where women and men make decisions jointly, women's input tends to focus on the storage and preparation of the crops for future use, whereas men tend to decide which crops the household will cultivate. The results for the five domains of empowerment index from the Women's Empowerment in Agriculture Index (WEAI) indicate that 42.4 percent of women are considered empowered in agriculture compared to 62.3 percent of men.

Women's Health and Nutrition

The nutritional status of women ages 15-49, as measured by Body Mass Index (BMI), is generally good despite a lack of dietary diversity. The majority of women ages 15-49 in the survey population (72 percent) have a BMI within the normal range (18.5-24.9), while 23 percent are considered underweight (BMI less than 18.5). Dietary diversity for women ages 15-49 is low; most consume, on average, 2.3 of nine basic food groups. Almost all consume grains, roots, and tubers, while only half consume green leafy vitamin A-rich vegetables.

In the household survey, three-quarters (77 percent) of women reported that they make decisions about health care for themselves and for their children either alone or jointly with their partner. Overall, more than half of these women (60 percent) reported attending four or more antenatal visits. During qualitative data collection, the majority of women and men stated that women are the main decision makers around antenatal care. When asked about family planning, almost half of women ages 15-49 indicated they are aware of where they can go to receive family planning services. Less than a quarter of women (23 percent) were able to identify at least seven of 15 important infant and young child feeding (IYCF) practices and maternal child care (MCC) practices.

The most common illnesses identified during qualitative data collection are malaria, diarrhea, and cough/cold. The majority of respondents acknowledged an improvement in the health of the community in recent years, yet discussions about community needs frequently included health facilities, medication, and illness prevention. The majority of respondents described distance from the health centers and cost as the greatest hindrances to receiving care. Respondents generally reported having trust in health service providers and mentioned an improvement in health care services. When discussing causes of disease, respondents said contributing factors are limited access to health care facilities, lack of proper hygiene, and limited prevention mechanisms.

Children's Health and Nutrition

More than one-third (37 percent) of children under five years of age in the household survey are moderately or severely stunted, and 21 percent of children under five years of age show signs of being moderately or severely underweight. In comparison, rates of stunting in the 2011 DHS for children under five years of age were 36 percent in rural Ugandan households and 19 percent in urban Ugandan households; and rates of underweight children were 15 percent in rural Ugandan households and 7 percent in urban Ugandan households.

Only 4 percent of children ages 6-23 months are receiving a minimum acceptable diet (MAD). This result is largely driven by the lack of a diverse nutritional diet. The proportion of children 6-23 months of age with a minimum dietary diversity of four or more food groups is low: 6 percent for breastfed children 6-8 months, 8 percent for breastfed children 8-23 months, and 6 percent for non-breastfed children 6-23 months of age.

Overall, 60 percent of children ages 0-6 months are exclusively breastfed. Qualitative data indicate that the majority of women exclusively breastfeed their children, although the age when children are introduced to supplemental foods varies. Many respondents indicated that breastfeeding is a strong cultural tradition within their community. Men and women stated that women make the decision to breastfeed and that it is a natural process supported through generations of tradition. This high level of breastfeeding is an important factor in predicting the future health of children. When asked at what age women begin to introduce other foods, most respondents indicated they begin to introduce soft foods, such as porridge, when the child is between four and six months old. As solid foods are introduced, many infants continue to breastfeed until they begin to walk.

According to the qualitative data, the most frequent illnesses identified by those interviewed include respiratory problems, gastrointestinal problems (commonly referred to as a stomachache), diarrhea, and malaria. When asked if children suffer the same ailments as adults, most respondents indicated that they do. The two ailments most frequently associated with children are diarrhea and malaria.

Overall, 22 percent of all children under five years of age had diarrhea in the two weeks preceding the survey (similar to the 2011 DHS rate of 24 percent in rural Ugandan households and 22 percent in urban Ugandan households). Of the children with diarrhea, caregivers reported that 31 percent had blood in their stools, giving cause for concern at this high level of complicated diarrhea (7 times higher than the 2011 DHS rate of 4 percent in rural Ugandan households). Caregivers reported seeking advice or treatment for the majority of children with diarrhea (85 percent). Of the children under five years of age with diarrhea, 88 percent are treated with oral rehydration therapy. The interview and focus group data indicate that, overall, respondents are able to seek treatment for their children when needed.

1. Introduction

In Fiscal Year 2012, the U.S. Agency for International Development (USAID) Office of Food for Peace (FFP) awarded funding to private voluntary organizations (PVOs) to design and implement multi-year Title II development food assistance programs in the most food-insecure regions of Uganda. The selected programs are Resiliency through Wealth, Agriculture, and Nutrition in Karamoja (RWANU) and Growth, Health, and Governance (GHG). RWANU is being implemented in southern Karamoja by ACDI/VOCA in partnership with Concern Worldwide and Welthungerhilfe. GHG is being implemented in northern Karamoja by Mercy Corps in partnership with Peace for Development Agency, and Tufts University's Feinstein International Center. The main purpose of these Title II programs is to improve long-term food security in Karamoja.

The strategic objectives of RWANU are to improve the availability of and access to food and to reduce malnutrition in pregnant and lactating mothers and in children under five years of age. Program activities include farmer capacity building and savings mobilization, strengthening agricultural input supply, restocking of goats, improvement of sanitation, improvement of feeding practices for infants and young children, and meeting the nutritional needs of pregnant and lactating women and of children under two years of age. The program is expected to reach 269,559 direct beneficiaries.

The strategic objectives of GHG are to strengthen livelihoods, improve nutrition among children under age two, and improve governance and local capacity for conflict mitigation. Program activities include strengthening input and support services, increasing market access, promoting agricultural investments, providing nutrition education, offering incentives for seeking appropriate health care, and building the capacity of local governance and youth organizations. The program is expected to reach 304,140 direct beneficiaries.

In line with the USAID Evaluation Policy, FFP contracted with ICF International (ICF) to carry out a baseline study in a sample of villages selected for implementation of the Title II development food assistance programs (see Annex 11 for the Contract Scope of Work). This baseline study is the first phase of a pre-post evaluation survey cycle. The second phase will include a final survey to be conducted in five years when the Title II programs are completed. The baseline study includes two components: (1) a representative population-based household survey to collect data for key FFP and program-specific indicators; and (2) a qualitative component to gather additional data that add context, richness, and depth to the results from the household survey. The results from the baseline study will be used for the following purposes:

1. Establish baseline values of key FFP and program-specific indicators prior to implementation of the Title II programs;
2. Assist the PVOs in establishing target levels for improvements in these indicators over the five-year Title II program cycle;
3. Inform PVOs about the current food security situation so they can refine their program design and implementation strategies and improve efficiency by targeting the areas and subgroups that will benefit most; and
4. Provide FFP baseline indicator values that can be compared across countries through meta-analyses of the indicator results.

FFP defines food security as "all people at all times hav[ing] both physical and economic access to sufficient food to meet their dietary needs for a productive and healthy life." Food security depends on four main factors: availability of food, access to food, utilization of food, and stability. Availability of food refers to the physical presence of food in the region, whether in markets, on farms, or through food assistance. Access to food refers to the ability of households to procure a sufficient quality and quantity of food. Utilization of food refers to the ability of individuals to properly absorb and select nutritious food. Stability in this context is the capacity to sustain acceptable nutrition over time.

The baseline study of Title II development food assistance programs in Uganda was designed to provide information on all four aspects of food security. The study investigates household food access; sanitation and hygiene; agriculture, household expenditures, and assets; and dietary diversity and anthropometry among women and children. The survey includes the Women's Empowerment in Agriculture Index (WEAI) survey module. Feed the Future (FTF), the U.S. Government's global hunger and food security Presidential initiative, developed this survey module to measure and track levels of women's empowerment for decision making in agricultural households and within the community.

This report begins with an overview of the study methods for the household survey and qualitative study, followed by a summary of the current food security situation in Karamoja. The findings from the population-based household survey are then presented for all FFP and program-specific indicators. The qualitative study results are integrated with these findings to provide further context and understanding. The report closes with a summary of key findings and conclusions.

2. Methodology

2.1 Methods for Population-based Household Survey

A. Study Design and Objectives

The primary objective of the population-based household survey is to assess the status of key FFP and program indicators prior to program implementation. The baseline measurements will be used to calculate change in these indicators and undertake a statistical test of differences in the indicators at completion of the five-year Title II program cycle, when the same survey will be conducted again in the program areas. This pre-post design will enable the measurement of changes in indicators between the baseline and final evaluation, but will not allow statements about attribution or causation to be made.

B. Sample Design

The sample for the population-based household survey was selected using a multistage clustered sampling approach to provide a statistically representative sample of the beneficiary villages selected by each Title II program, respectively, in its designated geographic region of operation. For RWANU, these villages are located in the southern Karamoja districts of Moroto, Napak, Nakapiripirit, and Amudat. For GHG, these villages are located in the northern Karamoja districts of Kaabong, Kotido, and Abim. For the remainder of this report, the labels "northern Karamoja" and "southern Karamoja" will be used to represent the geographic areas covered by the GHG and RWANU programs, and the term IP will be used to represent the collective implementing partner organizations for each program.

The sample allocations for each program were based on adequately powering a test of differences in the prevalence of stunting because stunting is a key measure for food insecurity. The sample size derived using the stunting indicator provides enough households to measure target change levels for all other indicators except two: the exclusive breastfeeding indicator for children 0-5 months and the minimum acceptable diet (MAD) indicator for children 6-23 months. The following criteria were used for deriving sample sizes for each Title II program:

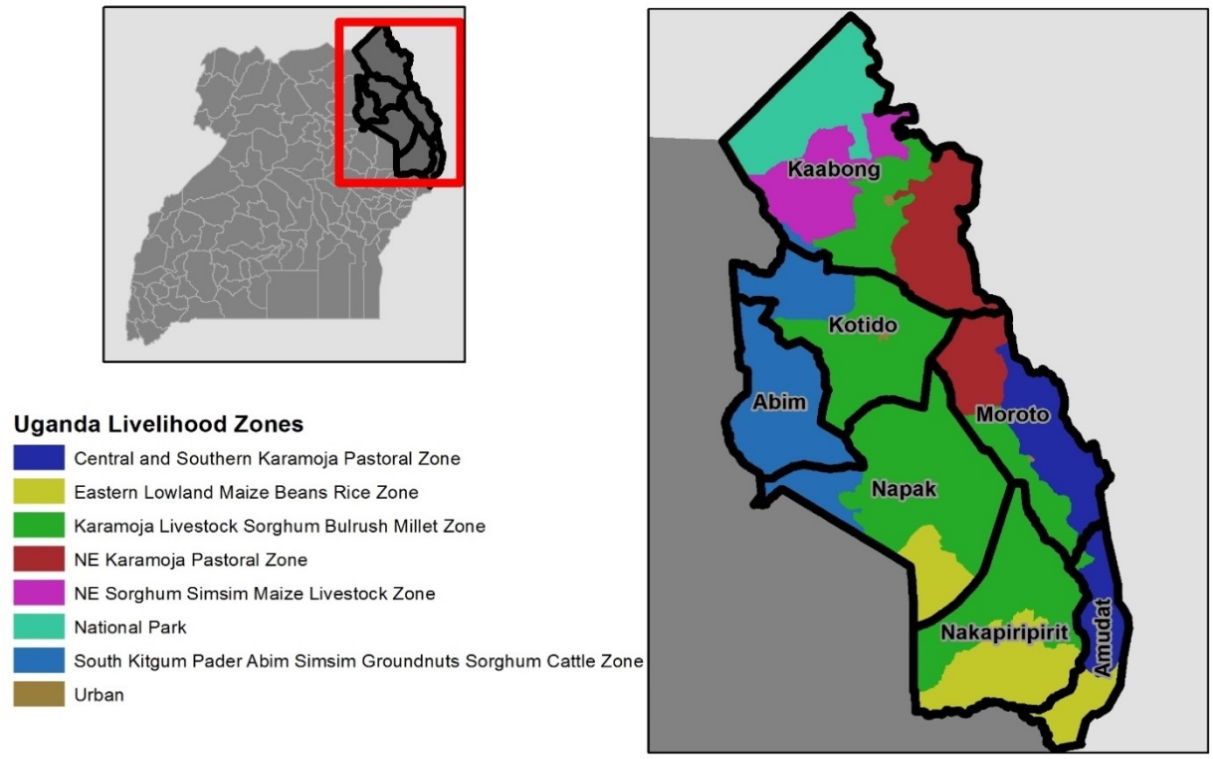
- design effect of 2;
- confidence level of 95 percent;
- power level of 80 percent;
- expected change in stunting, over the life of the program, of 6 percentage points;
- use of the Stukel/Deitchler Inflation and Deflation Factors (see Appendix A of the FANTA Sampling Guide[7]) to determine the number of households (with children ages 0-59 months) to select; and

[7] FANTA III Sampling Guide (1999) and Addendum (2012). Retrieved from http://www.fantaproject.org/monitoring-and-evaluation/sampling

- inflation of the sample size of households by 10 percent to account for estimated household nonresponse.

Based on these criteria, the optimum sampling allocation was determined to be 80 villages, with 30 households per village for each program. The household sample size was 2,400 per program, or 4,800 households overall. A more detailed description of the sampling methodology, including household definitions and specific household selection procedures, can be found in the Sampling Plan for Baseline Studies of Title II Development Food Assistance Programs (see Annex 1). An overview of the sample selection procedures is provided below.

Figure 1: Selected Districts for the Title II Baseline Survey



The sampling frame for each program was constructed from the set of villages selected for implementation by each IP. The IPs provided village lists, which were matched to census-level household and population information in order to assign a measure of size for each village. Census-level household counts for villages in Uganda were obtained from the Uganda Bureau of Statistics (UBOS). Since the last census was conducted in 2002, it was not possible to match some of the villages on the lists provided by the programs to the census file. ICF attempted to gather information for household counts for these villages from other sources, such as the U.N. World Food Program (WFP), but ultimately, there were some villages for which the household counts were not known during the sampling stage. These villages were handled separately in the sample selection process, as described below.

The sample selection of 4,800 households was done in two stages: first, sampling of geographic clusters, and then sampling of households within the clusters. The first-stage sample of 80 clusters or villages for each program was selected using the sampling frame and an approximation to the PPS (probability proportional to size) sampling method. The number of households in each village was used as the size measure to assign villages to size strata. Villages with less than 30 households, which accounted for less than 1.5 percent of all households in the frame, were removed from the sampling frame. A separate stratum was created for villages without household counts, and villages in this stratum were selected

using a simple random sampling method. Table 2.1 provides the total program and sampled community and household counts for each program.

Sampled communities were allocated proportional to the size of each district. Replacement communities were selected and used in instances where a community refused to participate. Replacements were made based on matching the department and sampling size stratum.

Table 2.1 Sampled Villages and Households for Each Title II Program

District	Total villages in program	Total households in program*	Total villages sampled	Total households sampled
Northern Karamoja–GHG				
Abim	254	12,079	12	360
Kaabong	351	53,496	47	1,410
Kotido	157	21,720	21	630
TOTAL	**762**	**87,295**	**80**	**2,400**
Southern Karamoja–RWANU				
Amudat	35	2,309	9	270
Nakapiripirit	168	14,490	28	840
Moroto	21	2,289	4	120
Napak	178	13,940	39	1,170
TOTAL	**402**	**33,028**	**80**	**2,400**

*Household counts were initially unavailable for 40 of the 762 villages in the GHG program and for 126 of the 402 villages in the RWANU program. These household counts represent the total households for the 722 villages in the GHG program with household counts and the 276 villages in the RWANU program with household counts.

The second-stage selection of households was completed when the field teams entered each community. Prior to the second-stage sampling, the selected communities were canvased on the ground in order to

- validate and/or update the household counts for each community;
- determine the appropriate sampling interval needed to obtain 40 households, using updated household counts;
- assess the density and placement of households within the community; and
- determine whether the community was large enough to divide into segments.

A systematic sampling approach was used to select households. This method entailed (1) randomly choosing a starting point between 1 and n (the sampling interval), with the household labeling 1, 2, … n commencing at one end of the cluster; (2) conducting an interview in the first household represented by the random starting point; and (3) choosing every nth household from the previous one thereafter for an interview (where n is the sampling interval and equals the total number of households in the cluster, divided by 30), until the entire cluster has been covered. The field team supervisor was trained on how to implement the systematic sampling method before entering the field. Global positioning system (GPS) units were used to capture the longitude and latitude at the center of each community. Households in which no survey was conducted due to absence or refusals after three attempts were not replaced; therefore, the target of 30 households per cluster was not always achieved. The total number of households with completed interviews for each program is provided in the Findings, Section 4.1.

A third stage of sampling was done at the individual level to select one woman in households where multiple women were eligible to be interviewed for questionnaire modules E (women's nutrition and health) and J5 (women's family planning practices). For these modules, a Kish grid was used to randomly select a woman 15-49 years old to be interviewed. All children under five years of age were interviewed for the children's module. For module G (agriculture), all farmers with decision-making power over land or livestock were interviewed. Further details of sampling at the individual level are provided in the Sampling Plan for Baseline Studies of Title II Development Food Assistance Programs (Annex 1).

C. Questionnaire

The survey instrument (see Annex 2) was developed through a series of consultations with FFP, the Food and Nutrition Technical Assistance III Project (FANTA), and the IPs before, during, and after the in-country workshop in December 2012. During the workshop, ICF and the IPs shared information about the baseline study and Title II programs and worked on finalizing the survey instrument.

A preliminary questionnaire was developed prior to the workshop, based on the selected FFP indicators and the guidelines described in the *FFP Standard Indicators Handbook*.[8] Definitions for sustainable agricultural practices, value chain activities, and improved storage practices were confirmed with the IPs during the workshop, along with definitions for the program-specific indicators to be included in the questionnaire. Other questions that required adaptation to the local country context, such as foods and types of sanitation facilities, were also defined in consultation with the IPs, the USAID mission in Uganda, FFP, and FANTA.

The questionnaire consisted of separate modules for the following topics:

- Module A: Household identification and informed consent
- Module B: Household roster
- Module C: Household food diversity and hunger
- Module D: Children's nutrition and health
- Module E: Women's nutrition and health
- Module F: Household sanitation practices
- Module G: Agriculture
- Module H: Household consumption
- Module J1: Caregiver's health, antenatal, and infant care practices
- Module J3: Household mobility and security
- Module J5: Women's family planning practices
- Anthropometry
- Women's Empowerment in Agriculture

Questions for Modules A through G were adapted using questions from the *FFP Standard Indicators Handbook* and the Demographic and Health Survey (DHS) questionnaire[9]. Questions for Module H were adapted from the Uganda National Panel Survey (UNPS), conducted by UBOS in 2009-2010; and FTF population-based survey instrument module E (Volume 8, October 2012)[10]. Questions for Modules J1, J3, and J5 were provided to ICF by the IPs after the December 2012 workshop. The WEAI module was taken from the FTF population-based survey instrument module G. This module collects data about the roles of primary male and female decision makers in the household. It was administered in all households, regardless of whether agricultural activity occurred, except those with no adult members or those without an adult female decision maker.

D. Field Procedures

a. Training, Piloting, and Pretesting

For training and fielding purposes, ICF developed three training manuals based on FFP and DHS guidelines:

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[8] USAID. (2011). *FFP Standard Indicators Handbook (Baseline-Final Indicators).* Retrieved from http://pdf.usaid.gov/pdf_docs/pnadz580.pdf

[9] DHS Model Questionnaire – Phase 6 (2008-2013) (English, French)/ Retrieved from http://www.measuredhs.com/publications/publication-dhsq6-dhs-questionnaires-and-manuals.cfm

[10] Retrieved from http://www.feedthefuture.gov/sites/default/files/resource/files/ftf_vol8_populationbasedsurveyinstrument_oct2012.pdf

1. **Team Leader Manual** – includes a number of topics required to effectively prepare team leaders and field editors for fieldwork, such as introduction and objectives of the study, survey organization, team leader roles and responsibilities, rules and regulations, ethics, fieldwork preparations, and quality control requirements/procedures.
2. **Interviewer Manual** – includes guidelines for implementation of the survey and fieldwork procedures, including interviewing techniques and procedures for completing the questionnaires. This manual also includes detailed explanations and instructions for each question in the questionnaire.
3. **Anthropometry Manual** – includes procedures adapted from the DHS biomarker manual for all of its surveys worldwide. The procedures in the DHS biomarker manual were adapted from *How to Weigh and Measure Children*[11] and approved by FFP for use in this survey.

Training in Uganda took place from mid-January to mid-February 2013 and consisted of four phases, with each phase lasting one week. The first phase was held in Mbale and was attended by about 180 interviewers. Mbale is situated in the Mbale District and is the nearest large town outside Karamoja and one of the key entry points into Karamoja. This phase began with an explanation of the survey objectives, sampling design, and methods for selecting households and respondents within the households. The training provided a detailed explanation of the questionnaire, question by question, including routing and filtering, and a discussion of directive and nondirective probing. This session was followed by mock interviews among interviewers and discussions of any problems that arose.

In the second phase of the training, interviewers were divided into 20 teams, with a team leader and three or four interviewers on each team. These teams were dispatched to their home districts to pilot the questionnaire. The objectives of the pilot were to (1) test the translation of the questionnaire into the three local languages (Karamojong, Luo, and Swahili); (2) identify issues related to the questionnaire (routing, wording, length, etc.); and (3) assess the capability of each interviewer.

Based on the pilot results, the questionnaire was revised and finalized. Interviewers were then assigned to different roles based on their performance in the training and pilot study. There were 7 district supervisors, 20 team leaders, 40 anthropometrists, 17 back checkers, and 77 interviewers.

The third phase of the training was held in Moroto (Moroto is the headquarters city in the District of Moroto) and consisted of three sessions. One three-day session was devoted to training district supervisors, team leaders, and back checkers. It covered in detail their leadership roles and quality control requirements. One refresher training session was held with all participants, except anthropometrists, to review the questionnaire and discuss changes. A training session on anthropometry was also organized for the anthropometrists, and it included classroom instruction and a field practicum. All team members attended the first day of the anthropometry training, which provided an overview of the anthropometry module.

During the fourth phase, teams returned to their home districts to pretest the survey. The pretest encompassed all modules of the questionnaire and included all district supervisors, team leaders, and interviewers. The purpose of the pretest was to ensure that field teams were ready for data collection. Survey teams conducted live interviews in non-sampled villages to test-run team coordination, field logistics, and readiness of interviewers to begin data collection. Debriefing sessions were held to review issues identified during the pretesting and before the fieldwork officially started in mid-February 2013.

b. Fieldwork

Fieldwork in Uganda immediately followed the conclusion of the pretest in mid-February 2013. It lasted approximately two months and was completed by the end of April 2013. As described in Section 2.1B, the field teams canvassed each village prior to conducting the fieldwork to update the number of

[11] I.J. Shorr. How to Weight and Measure Children. UN: New York. 1986. Modified in 1998.

households and to sketch maps of the village boundaries and the households within the villages. The updated household counts were then reported to the ICF survey specialist to determine the sampling intervals.

During the first few weeks of fieldwork, ICF field managers visited all interview teams in seven districts to oversee the interviews and to assist the teams in identifying and correcting mistakes. For quality control purposes, team leaders were required to keep fieldwork control sheets to record contacts with households and GPS data for each village. These sheets were used to record the number of attempts to reach each household, number of households and individuals interviewed within each household, and reasons for nonresponse in households where interviews were not obtained.

Back-checkers were required to spot check and verify information in at least 15 percent of the interviews. Back-checks verified that the interview took place, the approximate duration of the interview, information on the household roster, proper administration of the various sections of the questionnaires, and interviewers' general adherence to professional standards. In addition, team leaders conducted field editing to review every completed questionnaire on the same day of data collection to check for adequate completion of all fields, presence of missing data, and legibility of open-ended items. Interviewers were required to make corrections or to return for re-interview if necessary.

Furthermore, to enhance the quality control mechanism and improve field teams' capacities, ICF set up two quality assurance (QA) teams in the region, each with two QA specialists. One team was based in Kotido (for northern Karamoja) and the other was based in Moroto (for southern Karamoja). The QA teams performed a complete final review of each questionnaire before transferring the questionnaires to Kampala for data processing. Additionally, the QA specialists assisted ICF in coaching interviewers who demonstrated difficulty in comprehending the questionnaire by traveling with the teams.

c. Data Entry and Processing

When all survey forms for a village were cleared through the field quality control procedures, the forms were packaged and forwarded to the central data entry office in Kampala. The forms were entered by a team of trained data entry personnel, who used QPSMR data entry software customized to fit the survey form. ICF worked directly with the data entry team to ensure that the data entry program was thoroughly tested and matched the survey form. ICF reviewed the data entry program to ensure that only valid data ranges were allowed for each question and that the program included checks for questionnaire logic (e.g., skips and filters) and flagged any data inconsistencies. ICF developed a common Statistical Package for the Social Sciences (SPSS) database structure, which was forwarded to the in-country data processing team and was used for delivering all data to ICF.

ICF conducted a quality control review of the raw data and converted SPSS data files after 100 survey forms were entered to ensure that the data were complete and accurate and to determine whether there were any problems with data conversion or the database structure. Appropriate feedback was provided, and changes to the data entry software or SPSS database were incorporated as needed.

For the final dataset, data cleaning took place locally, in-country, based on ICF's review of the final dataset. Checks were conducted for the following: village matching to sampled villages; household roster consistency with individuals interviewed for each module; duplicate records; data completeness (e.g., variables, labels, and missing data); data validity (e.g., frequency distribution anomalies and out-of-range values); and data consistency (e.g., correspondence between the number of interviews at each level, and skip patterns). Identified data inconsistencies were forwarded to the data teams for review and correction. Final data review and preparation for analysis took place at ICF after receipt of the cleaned dataset.

E. Data Analysis

a. Sampling weights

Sample weights were computed for each indicator corresponding to a unique sampling scheme. The sampling weight consists of the inverse of the product of the probabilities of selection from each of the

stages of sampling (cluster selection; household selection; and, when relevant, individual selection). For Uganda, separate weights were derived for the following indicators:

- Households (used for indicators derived from Modules C, F, H, and J3)
- Children (Module D)
- Women 15-49 years (Modules E and J5)
- Farmers (Module G)
- Caregivers (Module J1)

Weights were adjusted to compensate for household and individual nonresponse, as appropriate. Different sampling weights were calculated for separate analyses of each program area and for the aggregate Title II program data.

b. Indicator definitions and tabulations

FFP indicators were calculated using tabulation methods as currently documented in the *FFP Standard Indicators Handbook*. Table A3.1 in Annex 3 presents the specific definition and disaggregation for each indicator. Child stunting and underweight indicators are derived using the World Health Organization (WHO) Child Growth Standards and associated software.[12] Consumption aggregates—to compute prevalence of poverty, mean depth of poverty, and per capita expenditure indicators—follow the World Bank's Living Standards Measurement Survey (LSMS) [13] methodology (see Annex 4 for more detail).

The four FFP agricultural indicators were developed based on input from the IPs, FANTA, and FFP. Agricultural activities, value chain activities, and storage practices were defined based on those activities and practices used and promoted by the IPs. Table A3.2 of Annex 3 provides operational definitions of each indicator.

Program-specific indicators were selected and defined based on the objectives of the programs designed by the IPs. These indicators were discussed during the December workshop and were finalized based on input from FFP, FANTA, and the IPs. Table A3.3 of Annex 3 provides the selected program-specific indicators and their definitions.

Results for all indicators are weighted to represent the full target population and tabulated for the combined program areas and for each Title II program separately. Point estimates and variance estimation are derived using Taylor series expansion and take into account the design effect associated with the complex sampling design; 95 percent confidence intervals are provided for all FFP indicators at the country level and for each Title II program separately. A tabular summary of all indicators with confidence intervals for both program areas combined and separately is provided in Annex 7.

c. Handling of missing or erroneous data

Missing data points were excluded from both the denominator and the numerator for calculation of all FFP and program-specific indicators. "Don't Know" responses were recoded to the null value and were included in the denominator. For example, for the household dietary diversity component, "Yes," "No," and "Don't Know" responses were included in the denominator, but only "Yes" responses were counted in the numerator.

For anthropometry indicators, the WHO software flagged biologically implausible cases according to WHO criteria,[14] and only those children with valid weight and height scores were included in the analysis

[12] WHO. (2011). WHO Anthro and macros, version 3.2.2. Retrieved from http://www.who.int/childgrowth/software/en/
[13] Living Standards Measurement Study (LSMS) surveys. Retrieved from: www.worldbank.org/lsms
[14] WHO Multicentre Growth Reference Study Group. WHO Child Growth Standards: Length/height-for-age, weight-for-age, weight-for-length, weight-for-height and body mass index-for-age: Methods and development. Geneva: World Health Organization, 2006 (312 pages).

for the stunting and underweight indicators. Implausible cases were excluded from the analysis, but were left in the dataset.

d. Descriptive cross-tabulations

Further descriptive analyses were conducted to provide additional context and present the subcomponents underlying some key indicators. These descriptive analyses include the following:

- Characteristics of households: household size, household headship, education level of head of household, gendered household type, percentage of households with children under five years of age and with a child 6-23 months;
- Food groups consumed for Household Dietary Diversity and Women's Dietary Diversity;
- Sanitation practices: drinking water sources, treatment of drinking water, and toilet facilities;
- Prevalence of stunted and underweight children under five years of age, by age group;
- Breastfeeding status for children under two years, by age group;
- Components of a minimum acceptable diet (MAD) for children 6-23 months;
- Percentage of women 15-49 years old by Body Mass Index (BMI) and height groupings;
- Percentage of farmers by value chain activity performed in the past 12 months;
- Percentage of farmers by sustainable agricultural practice used in the past 12 months; and
- Percentage of farmers by storage practice used in the past 12 months.

e. Multivariate Models

Multivariate analyses were performed to deepen IPs' understanding of the causes of (a) food insecurity and (b) malnutrition. These analyses were adjusted to take the design effect into account and were conducted separately for each program and overall. Multivariate analyses were limited to two critical indicators:

- Household Hunger Scale (HHS)—moderate or severe hunger as a critical food insecurity indicator
- Prevalence of stunted children under five years of age—height-for-age Z-score (HAZ) as a critical malnutrition indicator

For household hunger (a binary indicator), a logistic regression approach was used. For the HAZ (a continuous indicator), an ordinary least squares (OLS) regression approach was used.

For each of these outcomes, independent variables were identified separately. The variables were selected based on the availability of variables from the survey data and their theoretical relevance as predictors; this relevance was established by reviewing previous models and discussions with the IPs, FFP and FANTA. Independent variables included in each model are presented in sections 4.2.A.1 and 4.5.A.1, with the full models presented in Annex 9. It is worth noting that these models are exploratory rather than causal, and that the possibility of unobserved variable bias cannot be ruled out.

2.2 Methods for Qualitative Study

A. Study Design and Objectives

The overarching objective of the qualitative component of the baseline study is to elucidate and contextualize the findings from the population-based household survey. Specifically, the qualitative component aims to uncover patterns in decision-making and access to health care and food/beverages at the family and villages levels, and to help researchers understand the "how" and "why" of food utilization and consumption, as well as the access and uptake of health care. For example, the household survey provides information about foods and beverages the household uses, consumes, or produces; and health care the household accesses, uses, or consumes. Qualitative data provide insight into who makes the decisions regarding food/beverage usage, consumption, and production, as well as decisions regarding

health care use and/or consumption, what the decision-making process is, and how other factors (such as demographic characteristics, culture, or socio-historical context) may affect the decision-making process.

To supplement the household survey findings, ICF aimed to meet seven intermediate analytic goals:

1. Describe access to and use of food and beverages at the household and village levels, especially access and use for women and children under five years of age.
2. Describe the decision-making process used for food and beverage consumption at the household and village levels, especially as it affects women and children under five years of age.
3. Describe patterns in the health care needs of households and villages, and the access to and type of care available to household and village members, emphasizing the needs of women and children under five years of age.
4. Describe how decisions are made regarding health care at the household and village levels, especially for women and children under five years of age.
5. Describe patterns in agricultural development and processes at the household and village levels for farming for subsistence and income generation.
6. Describe the living conditions and economic practices of potential program participants.
7. Describe any cultural, political, environmental, or other social contexts that may influence decision making and access to food and health care.

To meet these objectives, a qualitative research team undertook a field study of a sample of villages where the GHG and RWANU programs will be implemented. The qualitative team consisted of a senior qualitative research expert from ICF and interview specialists, recruitment staff, and local translators from the local subcontractor, A.C. Nielsen. The field study consisted of three components. First, the qualitative team met with staff from the programs and from the survey team to identify key areas that needed to be explored in greater depth. Second, the team visited eight villages, where they undertook in-depth interviews (IDIs) and focus group discussions (FGDs) with a sample of individuals, as described below. Four of the villages represented areas where the GHG program will be implemented and the other four where the RWANU program will be implemented. The sample of villages selected for the qualitative study align with those from the household survey. Finally, the team conducted formal interviews and informal conversations with key informants who had insights into health and nutrition, as well as livelihood development, in the villages where the RWANU and GHG programs will be implemented.

B. Study Sample

The household survey was conducted with four primary respondent groups: the heads of household or responsible adults, women ages 15-49, primary caregivers or mothers of children under five years of age, and farmers. These groups were also the primary focus of the qualitative data collection. Specifically, the qualitative team identified two categories of individuals to participate in the interviews and focus groups: key informants (KIs) and potential direct beneficiaries (PDBs). KIs are individuals who, due to their position, have important information regarding either the villages in which the Title II programs will be implemented or the programs themselves. PDBs are individuals who may participate in the programs in the future. In this study, the qualitative team worked with the following six categories of definitions and recruitment criteria for PDBs:

- Male head of household: A man who self-identifies or is identified by another household member as head of household and has decision-making authority. This individual may or may not have children, may or may not have a single or multiple spouses, and may or may not participate in farming activities. The preference is to speak with individuals who have children under five years of age in the household, though this is not a requirement.

- Female head of household or lead female in household: A woman who self-identifies or is identified by another household member as a lead female figure in a household and has some decision-making authority. The individual may or may not have children, may or may not live with her husband or a male head of household, and may or may not participate in farming

activities. The preference is to speak with individuals who have children under five years of age in the household, though this is not a requirement.

- Male farmer: Using the standard FFP definition of farmer[15] established in the baseline survey, a male who undertakes and has decision-making authority over farming activities either on his own property or on someone else's (community plot). The type of farming the individual undertakes is open. He may participate in the care of animals, preparation of fields, tending to and harvesting crops, or the processing of food stuffs. He may participate in farming either for subsistence or income generation, or both.
- Female farmer: Using the definition of farmer indicated above, a female who undertakes and has decision-making authority over farming activities on her own property or someone else's (community plot). The type of farming the individual undertakes is open. She may participate in the care of animals, preparation of fields, tending to and harvesting crops, or the processing of food stuffs. She may participate in farming either for subsistence or for income generation, or both.
- Male caregiver or father: A male in the household who either cares for children in the household or is a father of children under five years of age. He should have knowledge of the child's feeding and eating patterns and health care needs and consumption. This individual may or may not be a head of household and may or may not farm. It is not important or relevant for this individual to be a farmer.
- Female caregiver or mother: A female in the household who either cares for children in the household or who is a mother of children under five years of age. She should have knowledge of the child's feeding and eating patterns and health care needs and consumption. This person may or may not have a spouse living in the household. It is not important or relevant for this individual to be a farmer.

The key informants included representatives from the programs and their partners, village or district health and/or nutrition experts, and village or district livelihood or agricultural development experts.

For the qualitative study component, the sampling strategy was purposive. Villages and individuals were targeted based on a set of criteria in order to meet the overall objective of the qualitative component. Three main criteria were used to select the sample: category of individual, geographic region, population size (to denote access to services), and strategic objectives of the IPs. Tables A5.1 and A5.2 in Annex 5 provide a summary of information, by IP, for the category of individual (type of PDB or KI) who was interviewed or who participated in the focus group, the location where the activity took place, a breakdown of the villages by number of households, and the strategic objective.

C. Instruments

ICF used nine question guides to conduct the IDIs and FGDs. These guides, listed below, are included in Annex 6:

- IDI Guide for Male Heads of Household and Female Lead in Household
- FGD Guide for Male Heads of Household and Female Lead in Household

[15] FFP definition of a farmer: Farmers include (1) herders and fishers and are men and women who have access to a plot of land (even if very small) over which they make decisions about what will be grown, how it will be grown, and how to dispose of the harvest; AND/OR (2) men and women who have animals and/or aquaculture products over which they have decision-making power. Farmers produce food, feed, and fiber, where "food" includes agronomic crops (crops grown in large scale, such as grains), horticulture crops (vegetables, fruit, nuts, berries, and herbs), animal and aquaculture products, as well as natural products (e.g., nontimber forest products, wild fisheries). These farmers may engage in processing and marketing food, feed, and fiber and may reside in settled communities, mobile pastoralist communities, or refugee/internally displaced person camps.

- IDI Guide for Male Caregiver/Father of Children 5 and Under and Female Caregiver/Mother of Children 5 and Under
- FGD for Male Caregiver/Father of Children 5 and Under and Female Caregiver/Mother of Children 5 and Under
- IDI Guide for Male and Female Farmers
- FGD Guide for Male and Female Farmers
- IDI Guide for IP reps
- IDI Guide for Business and Agriculture Development Expert
- IDI Guide for Health and Nutrition Expert

ICF set a number of priorities in the development of the question guides. The first priority was to meet the primary objective of the qualitative research—that is, to help researchers understand findings from the household survey. The team ensured that the topic areas covered in the qualitative question guides mirrored those found in the household survey. The topic areas include the following:

- Food access and utilization
- Nutritional status of women and children
  - Prenatal care
  - Breastfeeding
- Health status and access to health care
  - Diarrhea and oral rehydration
- Water, sanitation, and hygiene
- Agriculture and livelihood
  - Agricultural production
- Poverty measurement
- Socio-cultural community context
- Program implementation, strategies, and goals

The second priority was to merge the objectives of the qualitative component (to pinpoint decision-making processes, identify roles and responsibilities, and understand socio-cultural contexts that might influence survey responses and measures) with the topics covered in the household survey. For example, in questions about food access and utilization, the qualitative instruments go beyond the household survey questionnaire by asking how decisions were made, who made the decisions, and what influenced choices.

The third priority was to tailor the instruments to the various respondent groups and type of data collection. Questions were targeted to the specific type of respondent, such that farmers answer a greater number of questions about agriculture and farming than caregivers did. Conversely, caregivers were given questions that emphasized child health and nutrition as well as maternal health, while farmers were not. ICF ensured that a single guide was used for male and female participants in the same category to avoid the assumption that men could answer some types of questions while women could answer others.

D. Data Collection

Data collection took place in eight villages in four districts (of a total of seven sampled for the household survey): Kaabong and Abim districts in northern Karamoja where the GHG program will be implemented and Napak and Nakapiripirit districts in southern Karamoja where the RWANU program will be implemented. The villages sampled from each district are as follows:

- Kaabong: Naporukolong
- Kaabong: Lopelipel
- Abim: Geregere East
- Abim: Olem East
- Napak: Iriiri
- Napak: Lomusia

- Nakapiripirit: Cucu
- Nakapiripirit: Kilimanjaro

Overall, ICF conducted a total of 7 FGDs and 24 IDIs with PDBs, and six IDIs and three informal conversations with key informants.[16] Table A5.3 of Annex 5 provides a breakdown of the number of PDB interviews conducted, by district. PDB interviews were conducted by individuals from the districts in which data collection was occurring and took place in the local language. A qualitative research expert from ICF oversaw the interviews, with the assistance of an interpreter. As described above, three primary guides were used for the IDIs (one for heads of household, one for farmers, and one for caregivers), and three primary guides were used for the FGDs with PDBs (one for heads of household, one for farmers, and one for caregivers). Each IDI with PDBs lasted approximate 1½ hours, and each FGD with PDBs lasted between 1½ and 2 hours. Informal conversations and IDIs with KIs occurred within the districts; in Kampala; and, when necessary, over the telephone. On average, IDIs and informal conversations with KIs lasted between 1 and 2½ hours. All IDIs and FGDs were digitally recorded, and a senior researcher took field notes during IDIs and FGDs to accompany the transcripts from the recordings.

E. Data Preparation, Coding, and Analysis

Prior to the completion of the data collection, the local subcontractor began transcribing and translating the IDIs and FGDs that had been digitally recorded. ICF conducted periodic QA checks to ensure that the transcripts align with observations of interviews. Some challenges with transcription were encountered due to having to conduct the interviews outdoors, which caused difficulties hearing the recordings. For the few portions of the interviews that were inaudible, analysts relied on field notes to supplement analysis. Once the transcription was completed, an individual from the coding team developed a codebook in collaboration with an individual from the data collection team, drawing from the IDI and FGD protocols, experience in the field, and the structure of the final report. The data were coded using ATLAS.ti. To check for reliability at the front end of coding, two coders coded the same transcript simultaneously and re-coded until they reached consensus. The lead coder then reviewed the coding to ensure consistency.

To provide an understanding of the quantitative indicators derived from the results of the household survey, content and domain analysis were used to analyze the qualitative data. Content analysis was used to identify themes or trends in responses, both within and across respondent groups so that the findings from the household survey could be triangulated with the findings from the qualitative data collection. For example, content analysis was undertaken to identify which foods individuals consume and whether those identified through the qualitative component of the study align with those from the household survey. Domain analysis was used to examine the possible relationship between responses and the socio-cultural context of the villages in which the program was being implemented. Drawing from the previous example, researchers undertook domain analyses to help them understand the context in which choices about food consumption are made and the possible influence that particular contextual factors may have on the decision-making process. In this report, the intent is to assess the qualitative trends in relationship to the household survey findings and to better understand the quantitative indicators through an examination of context.

2.3 Study Limitations and Issues Encountered

Limitations and issues encountered during the baseline study are summarized below.

Compressed timeline for fielding the surveys

Baselines are critical to the overall Title II program evaluation cycle and must measure key attributes of the target population prior to the start of program implementation. This requirement resulted in considerable pressure to field the baseline data collection as soon as possible so as not to delay the start of

[16] Three informal conversations took place in lieu of formal interviews. The informant preferred not to be recorded.

program implementation. Within a very limited time frame, the ICF research team developed the technical approach to the baseline study and created survey instruments, procedural manuals, and field guides. Additionally, lead time for IRB applications and planning and logistics for the fieldwork was very short. Because it was the first time FFP contracted with an outside firm to conduct an independent baseline study of Title II programs, many elements of the project had to be developed for the first time. Future FFP-managed baseline and endline surveys will benefit from the preparative work accomplished during this early stage.

Qualitative study designed concurrently with population-based household survey

Due to the short timeline for the overall study, it was not possible to undertake the qualitative study after the household survey was completed, so the surveys were conducted concurrently. There were consequences in having the components occur simultaneously. First, the qualitative research team was unable to draw from the household survey findings to inform the study design. Consequently, the instruments, sampling, and overall approach were designed prior to the household survey data collection. Second, so as not to miss particular topic areas, the qualitative team covered a broad range of topics but could have covered the fewer topics in greater depth had the household survey results been available. Third, the qualitative team emphasized data collection at the household level with single individuals rather than at the key informant level so that data could be triangulated with data collected by the household survey teams. The number of communities visited and interviews conducted were limited, which constrained researchers' ability to identify contextual differences across communities. While in most cases the data collected are useful in exemplifying the findings from the household survey, further qualitative information could have helped to explain specific household survey results.

Outdated household counts

The research team did not originally plan to conduct a household listing exercise in sampled villages. However, a listing exercise was necessary because the household counts obtained from UBOS were outdated and there were some villages for which household counts were not available at all. The need for the listing exercises led to complications in terms of time and costs.

Recruitment and training difficulties

To address cultural and language barriers, ICF recruited interviewers from the region and, when possible, from specific districts. Recruiting a sufficient number of qualified interviewers for such a large-scale and complex study in what is arguably the least developed region of Uganda presented challenges not only for the household survey, but also for the qualitative data collection. Some interviewers were disqualified during the training and fielding process. ICF spent significant time and resources to train and develop members of the data collection team; their capacity was the key to successful fieldwork implementation.

Number of interviewers recruited per district was not proportional to the sample size

The local subcontractor initially assumed that an equal number of interviewers would be needed for each of the seven districts participating in the study. However, more villages and households were sampled for larger districts than smaller ones. Early in the study, the research team planned to address this issue by redeploying interview teams that finished earlier in the smaller districts so that they could help in larger districts, such as Kaabong and Nakapiripirit.

Logistics and transportation constraints

Karamoja has limited transportation, energy infrastructure, and logistical support (e.g., administrative supplies and, cash to pay for logistics, bank trips, etc.). Electricity is available for only a few hours, via generator, in most parts of the region; and Internet and cell phone coverage are unstable and sparse. As a result, questionnaires had to be printed and transported from Kampala, which is a 12-hour drive from Karamoja, by car. Moreover, the geography and road conditions made transportation a daunting challenge. It usually takes hours to travel from one village/town to another. The fieldwork was conducted

shortly before the rainy season, and the unpredictable rainfall sometimes made roads treacherous or impassable.

Difficulty accessing the villages

Despite the teams' best efforts, they found some villages inaccessible. For instance, a village in the mountains in the Amudat district was only assessable via rock climbing. This made it logistically challenging and dangerous for interviewers to reach the village, especially with heavy and bulky anthropometry equipment. A few villages refused the research teams because several recent visits by development organizations had resulted in little change. Some villages were relocated because of the government's development programs. In each instance, villages that were identified for inclusion in the study but could not be accessed were replaced with pre-identified back-ups. This process, however, was time consuming and created logistical challenges.

Length and complexity of the questionnaire

The length and complexity of the questionnaire made interviews difficult. Interviewers often needed to explain survey questions verbally. To maintain consistency, each interviewer carried a printed manual to use as a reference. The questionnaire was divided into three separate components that were not always conducted simultaneously in each household: (1) general questionnaire of FFP and program-specific indicators; (2) WEAI module; and (3) anthropometry module. The three separate components took approximately three hours to complete in each household and the staggered timing to complete them increased the risk that interviewers might misplace one of the components or lose track of which ones belonged together.

Confusion over the eligibility criteria for children

On the household roster, eligible children are defined as "any child under six years of age." However, the definition of children eligible for the children's module is "those under five years of age." Although the inclusion of children under six as eligible on the roster was intentional so as not to miss any children that might actually be less than five, this difference in definition between the roster and the children's module created confusion for many of the field staff and interviewers. Field managers and team leaders continually explained and reinforced the difference between the roster requirements and the children's module verification of age under five years throughout the trainings and fieldwork.

Validity and reliability of self-reported data

Most of the data collected for the indicators rely on self-reporting. Self-reporting has several limitations, such as the possibility of exaggeration or omission of information; inaccurate recollection of experiences or events; social-desirability bias or reporting of untruthful information; and reduced validity when respondents do not fully understand a question.

Seasonality of data collection

The timing of the survey data collection can affect indicators that measure food access, hunger, and dietary diversity. The household survey was intentionally conducted in February to April, at the start of the lean season, so as to measure indicators at the most vulnerable period for the beneficiary population. Although this is not a limitation, it will be important that endline data are also conducted during the same time period. As noted in Section 3 of this report, there were several factors that led to early depletion of food supplies during the 2013 lean season, which further impacted food insecurity in the survey region.

Tight timeframe for analysis and reporting

The tight timeframe for data analysis and reporting did not allow sufficient time for the research team to thoroughly analyze and evaluate the wealth of data collected for the household survey. The quantitative analysis focused on development of the indicators, accompanied by supporting bivariate analyses. Little time was available to develop and explore further multivariate analyses. Additionally, much of the rich qualitative data that was collected could not be fully analyzed and included in the report.

3. Overview of the Food Security Situation in Karamoja

The Karamoja region suffers from chronic food insecurity, primarily due to poor climate and civil insecurity. These challenges are compounded by poor water and sanitation practices as well as mother and young child feeding and care behaviors that contribute to malnutrition. Additionally, the region is geographically isolated, with limited roads and markets. The purchase of household food continues to be the major source of food in the region, at 49 percent during the April/May period.[17] During this time of year, most households have depleted food reserves hence more reliance on purchasing of food. Compounding this problem is the steady increase in food prices during this period of the year, which places additional hardship on poor households. Access to food at the household level remains a serious issue; surveillance indicates that only 2.57 percent of households were food secure and 76.5 percent of households had serious food access problems during the April/May period of 2012.[18]

Karamoja has three main livelihood zones.[19] While there are distinctions within each zone, the patterns remain relatively consistent within each. The western portion of Karamoja is primarily agriculture based. This region has the greatest rainfall (800 to 1200 millimeters per year) and is known as the greenbelt of Karamoja. The middle portion is largely agro-pastoral, with an average of 500 to 800 millimeters of poorly distributed rainfall per year. Most families in this area practice agriculture, though it is less productive than in the western zone. The eastern portion of Karamoja is predominantly pastoral, with low rainfall (less than 700 millimeters, poorly distributed), and is not well suited for agriculture.

Most inhabitants of the region, even those who are predominantly pastoralist, participate to some degree in agriculture.[20] The most common crops are maize and sorghum, sometimes complemented with beans and groundnuts.[21] However, agriculture in Karamoja is a high-risk endeavor due to the frequency of droughts and floods and low productivity.[22] Weather in the region has been particularly erratic since 2001, with frequent dry spells (2002, 2004, 2006, 2007, 2008, 2009, 2010, and 2011).[23] Although most of Uganda is bimodal, Karamoja experiences only one rainy season and a single harvest per year.[24] This weather pattern limits the supply of food and increases the length of the lean period. Improved agricultural extension services are needed to improve practices.[25] Farmers are limited in their ability to buy inputs such as improved seeds due to the lack of cash and of availability in the marketplaces. Crop diseases are also a common problem.[26] The result is a very low quality[27] and quantity of agricultural productivity, which contributes to the cycle of food insecurity.

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[17] Action Against Hunger. (2012). *Nutrition surveillance, Karamoja region, Uganda, round 8, May 2012*. Retrieved from: http://www.actionagainsthunger.org/sites/default/files/publications/DHO-ACF_Karamoja_Nutrition_Surveillance_Round_8_-_Final_Report_2012.05.pdf
[18] Ibid.
[19] Government of Uganda, Office of the Prime Minister. (2009). *Karamoja action plan for food security (2009-2014)*. Retrieved from http://www.opm.go.ug/assets/media/resources/17/Karamoja_Action_Plan_for_Food_Security_(2009-2014).pdf
[20] Browne, S., & Glaeser, L. (2010). *Karamoja region food security assessment: Uganda. A special report by the famine early warning system network (FEWS NET).* Washington, DC: USAID. Retrieved from http://www.fews.net/docs/Publications/Karamoja%20Food%20Security%20Assessment%20January%202010.pdf
[21] Stites, E., & Mitchard, E. (2011). *Milk matters in Karamoja: Milk in children's diets and household livelihoods.* Boston: Feinstein International Center. Retrieved from http://sites.tufts.edu/feinstein/2011/milk-matters-in-karamoja
[22] Levine, S. (2010). *What to do about Karamoja? Why pastoralism is not the problem but the solution. A food security analysis of Karamoja.* Rome: Food and Agriculture Organization of the United Nations. Retrieved from http://www.celep.info/wp-content/uploads/downloads/2011/07/what-to-do-about-Karamoja.pdf
[23] World Food Programme. (2013). *Comprehensive food security and vulnerability analysis (CFSVA): Uganda*. Retrieved from http://www.wfp.org/content/uganda-comprehensive-food-security-and-vulnerability-analysis-cfsva-april-2013
[24] Government of Uganda, Office of the Prime Minister. (2009).
[25] Ibid.
[26] Browne, S., & Glaeser, L. (2010).
[27] Ezaga, O. P. (2010). *Markets for livestock and food crops in Karamoja subregion*. Rome: FAO. Retrieved from http://www.fao.org/fileadmin/user_upload/drought/docs/1_Markets%20for%20Livestock%20and%20Food%20Crops%20in%20Karamoja.pdf

The Famine Early Warning System Network (FEWS NET) provides details on events affecting the food security situation during the data collection period for the baseline study. [28] The Karamoja region received normal to above-normal rainfall during the prior year (2012), but due to waterlogging conditions and an outbreak of fungal disease on sorghum (the main staple crop), harvests were below average. These harvests, which were mostly completed in October to November 2012—except for long-maturing sorghum harvests, which were harvested in early January 2013—were mostly consumed as green consumption. Therefore, the dry harvest did not replenish household stocks to normal levels. As a result, a majority of poor households depleted their own production and faced food deficits of two to three months before the normal start to the lean season in March 2013. During the previous year, households in the region experienced poor crop sales during the dry season, which further reduced the ability of poor households to purchase adequate levels of food.

Traditionally, pastoralists lived in *manyattas* while traveling to mobile enclosed cattle camps (*kraals)* during the dry season to find better water and grass for their animals. However, civil unrest and widespread raiding of herds limits pastoralists' mobility, and the traditional *kraal* system has largely ceased.[29] Travel restrictions limit herders' ability to move livestock at will.[30] Many animals are now corralled in protected *kraals* adjacent to Ugandan army camps. While most respondents indicate that this practice has decreased the losses due to raiding, other challenges have arisen. Because herders can take the animals only as far as they can walk in a day while still returning to the *kraal* at night, areas immediately surrounding the protected kraals have been significantly overgrazed. Similarly, herders are unable to relocate the kraals when they believe it is necessary due to seasonal changes and must first convince the army.[31] Additionally, the close quarters of the animals has led to an increase in diseases that diminish the herds directly and reduce reproduction rates.[32] Some reports indicate that the military limits the owners' ability to sell their stock at will.[33] All of these issues contribute to the reduced quality of herds and their usefulness in helping families deal with shocks.

Another outcome of this situation is reduced access to animal products. Historically, milk has been critical to the diets of the region's population.[34] Now, not only has the availability of milk decreased due to reductions in the quality of the herd, it has also decreased due to milking of the animals by soldiers or requirements that the soldiers be given a portion as payment for their services.[35] Traditionally, the most vulnerable individuals traveled with the herders to the *kraals* to have ready access to milk. Now, the animals may be a significant distance from the residences of those most in need of milk, thus reducing their consumption.[36] The reduced availability of milk has also contributed to the disintegration of traditional social support networks. The better off have long shared their milk with the poorest of the population, but this practice has largely ceased due to the limited supply of milk.[37]

Households' means of coping with food insecurity has led to practices that threaten the environment. Many households supplement income by collecting wood and producing charcoal for sale. The increased reliance on natural resources contributes to the rapid degradation of the environment in Karamoja, and this trend is expected to increase food insecurity.[38]

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[28] FEWS NET, Uganda Food Security Outlook, Jan.-June 2013, Retrieved from http://www.fews.net/docs/Publications/UG_OL_2013_01_en.pdf
[29] Stites, E., & Akabwai, D. (2009). *Changing roles, shifting risks: Livelihood impacts of disarmament in Karamoja, Uganda*. Boston: Feinstein International Center. Retrieved from http://hdl.handle.net/10427/71114
[30] Browne, S., & Glaeser, L. (2010).
[31] Stites, E., & Akabwai, D. (2009).
[32] Levine, S. (2010).
[33] Stites, E., & Akabwai, D. (2009).
[34] Stites, E., & Mitchard, E. (2011).
[35] Ibid.
[36] Stites, E., & Akabwai, D. (2009).
[37] Stites, E., & Mitchard, E. (2011).
[38] Browne, S., & Glaeser, L. (2010).

Child feeding practices also contribute to malnutrition in the region. Brewing and selling local beer to acquire cash is increasingly common, and the family, including children, generally consumes the leftovers and byproducts of production.[39] While providing infants and children with animal milk remains a priority for families, small children have less access to fresh animal milk than in the past. Many women do not exclusively breastfeed through six months of age, and children are often weaned very early (some reports indicate as early as six weeks).[40] The diets of young children often lack protein and diversity. The majority of children (82 percent) ages 6 to 23 months had an unacceptable diet, according to 2012 lean season surveillance, lacking adequate quantity and variety of food.[41]

Water and sanitation practices in the region contribute to malnutrition among children and adults. More than half of households (60.8 percent) reported using the bush for human waste disposal in 2012. Hand washing with soap is not widespread, partially due to the cost and unavailability of soap. Diarrheal diseases are common, especially among young children. Limited access to health services compounds these problems.[42]

Many of the challenges described above are longstanding, resulting in a half-century history of food aid[43] and short-term humanitarian assistance in Karamoja. The two Title II programs, RWANU and GHG, aim to improve long-term food security in Karamoja through a variety of interconnected activities. In addition to the Title II programs, other ongoing programs may impact the findings of the baseline survey. These programs support food security in the program zone, and some are scheduled to be phased out in 2015, the midpoint in Title II program implementation. At that time, it is plausible that the area will experience a significant decline in food security due to the sudden loss of this massive injection of food in the region. Furthermore, the Office of the Prime Minister has been supporting a free plowing scheme, which will be suspended at the end of the current financial year (2013). Ongoing programs include the following:

- Food assistance to the most vulnerable households and cash-for-work and food-for-work programs funded by the Northern Uganda Social Action Fund (NUSAFII) and implemented by WFP and other partners: More than 60,000 identified food-insecure households (with an estimated 400,000 members) who participate in public works programs are to receive conditional food or cash transfers beginning in July 2012 through August 2014. Extremely Vulnerable Households—34,000 households, with a total of 155,000 members—will receive unconditional food assistance at 50 percent of the recommended daily allowance for the duration of the lean season in 2013.
- Community-Based Supplementary Feeding Program: Nearly 25,000 moderately malnourished children and moderately malnourished pregnant and lactating mothers will receive highly fortified foods monthly, together with care to treat and "cure" their moderate malnutrition.
- School Feeding: More than 100,000 schoolchildren in all schools in Karamoja should receive school meals to alleviate short-term hunger and maintain attendance.
- Maternal Child Health and Nutrition program: All pregnant and lactating women who seek antenatal, postnatal, and young child health services in Karamoja, and children under two years of age, will receive highly fortified food to prevent stunting.

[39] Dancause, K. N. et al. (2010). Beer is the cattle of women: Sorghum beer commercialization and dietary intake of agro-pastoral families in Karamoja, Uganda. *Social Science & Medicine, 70*(8), pp. 1123-30.
[40] Stites, E., & Mitchard, E. (2011).
[41] Action Against Hunger. (2012).
[42] Gelsdorf, K., Maxwell, D., & Mazurana, D. (2012). *Livelihoods, basic services and social protection in Northern Uganda and Karamoja.* Working paper 4. London: Secure Livelihoods Research Consortium, Overseas Development Institute. Retrieved from http://www.odi.org.uk/sites/odi.org.uk/files/odi-assets/publications-opinion-files/7781.pdf
[43] Government of Uganda, Office of the Prime Minister. (2009).

4. Findings

The findings of the baseline study are presented according to five content categories: (1) characteristics of the population, (2) household indicators, (3) agricultural indicators, (4) women's health and nutrition, and (5) children's health and nutrition. Each section includes results for FFP and program-specific indicators, along with relevant results from the qualitative study. The tables in Annex 7 present a tabular summary of all FFP and program-specific indicators, confidence intervals, standard errors, and weighted population estimates for each program area and for the areas combined, along with results for statistical tests of differences between the two programs for each indicator. The WEAI findings and discussion are provided in Annex 8.

4.1 Characteristics of the Study Population

This section provides an overarching picture of the northern and southern Karamoja program areas. Demographic characteristics are presented from the household survey, and results from the qualitative study are provided with respect to mobility, security, and violence in the region.

A total of 4,766 household interviews were completed across the Karamoja region: 2,399 in the northern Karamoja program districts and 2,367 in the southern Karamoja program districts. Table 4.1a provides estimates of the populations represented in the survey area overall and for specific subgroups.

Table 4.1b shows the characteristics of these households. The average household included 6.3 household members. Children ages 0-59 months were household members in nearly 75 percent of all households. Children ages 0-23 months were household members in about 35 percent of households. The majority of heads of household (83 percent) had no formal education. Education levels were higher in the northern Karamoja program area than in the southern Karamoja program area. Most households (89 percent) included an adult male and female.

Table 4.1a Total Population in the Title II Area by Program Area
[Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Total population	983,906	559,850	424,056
Male	473,724	269,269	204,455
Female	510,182	290,581	219,601
Total households (HH)	155,574	87,812	67,762
Male and Female Adults	15,340	9,660	5,681
Female Adults Only	1,749	658	1,091
Male Adults Only	138,485	77,495	60,990
Child No Adults	0	0	0
Women of reproductive age (15-49 years)	202,672	118,040	84,632
Children 0-59 months	191,021	111,334	79,687
Males 0-59 months	93,842	55,689	38,153
Females 0-59 months	97,179	55,645	41,534
Children 0-5 months	21,553	12,645	8,908
Males 0-5 months	11,424	6,712	4,712
Females 0-5 months	10,129	5,933	4,196
Children 6-23 months	59,976	34,540	25,436
Males 6-23 months	30,266	18,039	12,227
Female 6-23 months	29,710	16,501	13,209

Source: USAID Title II survey in Uganda (2013), weighted population estimates

Table 4.1b Household Characteristics by Program Area
[Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Average household size	6.3	6.4	6.3
Percent of households with children 0-59 months	75.8	77.2	73.9
Percent of households with a child 6-23 months	36.2	36.4	36.0
Household headship (% male)	85.0	84.5	85.7
Education level of head of household			
No formal education*	83.2	78.7	89.0
Pre-primary	0.4	0.8	0.0
Primary	9.1	10.5	7.2
Secondary*	6.4	9.0	3.0
Higher	0.9	1.1	0.7
Gendered household type			
Adult Female No Adult Male	9.9	11.0	8.4
Adult Male No Adult Female*	1.1	0.7	1.6
Male and Female Adults	89.0	88.2	90.0
Child No Adults	0.0	0.0	0.0
Number of responding households	4,766	2,399	2,367

* Difference between program areas is statistically significant at $p < .05$

A. Mobility and Security

Qualitative findings reveal the relationship between the history of the Karamojong and observed patterns of behavior, beliefs, and practices. An issue that has a tremendous impact on the daily lives of the Karamojong is the high level of violence and insecurity. The Karamojong have a long history of pastoralism, but have perpetrated decades of violent cattle raids. Although the Karamojong are often characterized as a nomadic people, qualitative data indicate they follow their cattle while they graze but tend to have a home base in their village *manyatta*. The migration reported by study participants is due primarily to violence and insecurity. Cattle raids by competing tribes continue, sometimes across international borders with South Sudan and Kenya. Internal raids are exacerbated by a high prevalence of guns, many of which were obtained with the fall of Idi Amin in 1979. According to interviews with potential direct beneficiaries and key informants, the raids resulted in a drastic reduction in cattle ownership, the main livelihood source for most villages. These raids made it unsafe for the Karamojong to cultivate ancestral lands located far from their village. As one respondent said,

> I practice farming, but I don't have oxen. Because [at] the times when the raids were persistent, all of the animals I had were raided. For the case of livestock for my household, I don't have any animals I keep at home. Before, I had animals. But all the animals were taken away during the time of the raids.

Therefore, some households may be discouraged from owning livestock due to the fear of loss through theft or raiding. In addition, the pervasiveness of arms creates a culture of violence and fear that, according to a majority of respondents, greatly inhibits their lives. Upon close examination, respondents indicated that a lack of security impacts their lives in terms of livelihood development; their ability to interact with other villages; and their ability to access health care, agricultural development, drinking water, and education. As one respondent stated, "When there is insecurity, you cannot dig. Like those days, people were chased away from their farmland into camps that made farming very difficult. And so, people were affected by hunger."

Violence and insecurity persist in Karamoja. In recent years, however, the Ugandan Government re-initiated a large-scale disarmament, started between 2000 and 2001 that is referred to as the Karamoja

Integrated Disarmament and Development Program (KIDDP).[44] As described by one respondent in a village in Napak,

> Initially there were raids among the following clans of the Karamojong: Jie of Kotido District, Matheniko of Moroto District, Bokora of Napak District, and the Pian of Nakapiripirit District…. But after a period of time, the government intervened and disarmed the people since they had owned guns illegally, and that is why we have peace now in Karamoja.

An assessment of Karamoja conflict and security, conducted by Saferworld,[45] found that armed violence between ethnic groups, particularly in the form of cattle raiding, is still prevalent in Karamojong society, affects all communities, and mostly involves firearms. In a follow-up study conducted in 2011-2012,[46] Saferworld found continued insecurity felt by communities and reports of illegal weapons still in the hands of civilians.

Despite respondents' mixed perceptions of the disarmament process, the consensus is that the process has resulted in a drastic change in the way they live their lives. They say disarmament has increased their ability to interact with individuals from other villages and made it safe for children to journey to school, for individuals to start reintegrating livestock into their villages and households, and for businesses to come into the villages and explore the possible extraction of mineral resources. Above all else, disarmament has eliminated the sense of fear so many lived with. A female head of household described how life has changed in the past two years:

> What I see in this regime of Museveni, there are changes in that the insecurity which was there is [there] no more. There is some peace, even wealth/animals, which were formerly raided by the warriors. It [the increase of animals] has started accumulating now.

Referencing the recent increase in peace, another respondent stated, "Even on the side of health, health centers have also increased. Even on the side of agriculture. People can now attend to their gardens." Although the people's sense of security has increased, life is not easy in Karamoja. Those who live there still face challenges. As one individual said,

> We can move to cultivate in far places where we used to access in the past. That's why we are getting food varieties that are good and healthy. But, the only challenge we still have is the pests which are disturbing us. Not the warriors.

B. Increased Movement

The household survey demonstrated that the security situation is improving and that lifestyle changes are occurring. When asked about movement and security, approximately 61 percent of all respondents reported increased movement in areas that were previously not accessible due to insecurity. As shown in Table 4.1c, more respondents in the southern Karamoja program area (71 percent) reported increased movement than in the northern Karamoja program area (52 percent).

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[44] The disarmament process in Karamoja has a long and violent history. Pre-disarmament activities started as far back as 1986. Most current discussions reference the various phases of disarmament that took place through KIDDP. More information can be found in the following two documents: *Creating conditions for promoting human security and recovery in Karamoja, 2007/2008-2009/2010*, by the Karamoja Integrated Disarmament and Development Program and the Office of the Prime Minister (2007). Retrieved from http://www.brookings.edu/~/media/Projects/idp/Uganda_Karamoja_2007.PDF; and *Crisis in Karamoja: Armed Violence and the Failure of Disarmament in Uganda's Most Deprived Region*, by J. Bevan for the Small Arms Survey, Geneva, Switzerland (2008). Retrieved from http://www.smallarmssurvey.org/fileadmin/docs/B-Occasional-papers/SAS-OP21-Karamoja.pdf

[45] Saferworld. (2010). *Karamoja conflict and security assessment.* Retrieved from http://www.saferworld.org.uk/downloads/pubdocs/Karamoja%20conflict%20and%20security%20assessment.pdf

[46] Saferworld. (2012). *Tracking key conflict and security dynamics in Karamoja: An update*. Retrieved from http://www.saferworld.org.uk/downloads/pubdocs/Uganda%20PPP%20report.pdf

Table 4.1c Program-specific Indicators - Increased Movement by Program Area
Program-specific indicators by program area [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Increased Movement (Household respondents)			
Percentage reporting increased movement in areas that were previously not accessible due to insecurity*	60.7	52.4	71.4
Number of responding households	4,766	2,399	2,367

* Difference between program areas is statistically significant at $p < .05$

4.2 Household Indicators

This section begins with the household survey findings for the Household Hunger Scale (HHS), followed by an exploration of the predictors of household hunger and the results for the Household Dietary Diversity Score (HDDS). Qualitative data, when available, highlight the findings from the household survey with respect to food and beverage sources, access, availability, and diversity.

A. Household Hunger Scale (HHS)

Household hunger was measured using the HHS, a perception-based food deprivation scale. The scale consists of three components measuring inadequate household food access, with each component split into an occurrence question (whether the episode of food deprivation occurred at all in the past four weeks) and a frequency of occurrence question (how many times the episode had occurred in the past four weeks). The responses to the questions are coded and summed into a numerical score (with a minimum possible score of 0 and a maximum possible score of 6) representing three levels of hunger: (1) *Little to no hunger* (HHS score = 0 to 1); (2) *Moderate hunger* (HHS score = 2 to 3); and (3) *Severe hunger* (HHS score = 4 to 6).

Table 4.2a provides the results for the HHS. Overall, 73 percent of households suffer from moderate or severe hunger, with a higher prevalence in the northern Karamoja program area (76 percent) than in the southern Karamoja program area (69 percent). The HHS is based on perceptions of hunger in the past four weeks and thus may be sensitive to the season in which the survey is conducted. In the case of the Uganda household survey, data were collected during the lean season, from February through April.

Table 4.2a Food for Peace Indicators - Household Hunger Score (HHS)
Household-level FFP indicators by program area [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
HHS (All Households)			
Prevalence of households with moderate or severe hunger*	72.8	76.0	68.8
Adult Female No Adult Male	71.7	73.2	69.1
Adult Male No Adult Female	70.7	61.7	76.2
Male and Female Adults*	73.0	76.4	68.7
Child No Adults [1]	-	-	-
Number of responding households	4,766	2,399	2,367
Adult Female No Adult Male	452	254	198
Adult Male No Adult Female	70	25	45
Male and Female Adults	2,124	2,120	2,124
Child No Adults	0	0	0
Number of responding households	4,766	2,399	2,367

[1] No households of this type in the sample
* Difference between program areas is statistically significant at $p < .05$

A.1 Predictors of Household Hunger

Multivariate logistic regression models for moderate and severe household hunger (hereafter referred to as "household hunger") were applied to help researchers understand factors associated with household hunger for the overall Karamoja region and separately for each program area. Annex 9, Table A9.1 presents statistical results for these models. Independent variables in the model include the following:

- Household composition: Number of prime-aged adults (15-49 years old), number of elder dependents (50 years or older), and number of young dependents (ages 0-14)
- Demographic characteristics of the head of household: Sex, age, and education level
- Socioeconomic status: household poverty and food consumption
- Household agricultural status: Raised crops in the last 12 months, number of farmers in the household, used at least two sustainable livestock practices, used at least two sustainable crop practices, used at least one sustainable natural resource management (NRM) practice, practiced value chain activities, used improved storage practices
- District

The overall model shows that the models are significantly different between program areas, so predictors are presented separately for each program rather than overall. The model for the northern Karamoja program areas shows a low explanatory power, with a pseudo $R^2 = .07$, indicating that the independent variables in the model explain about 7 percent of the variance in household hunger. The model for the southern Karamoja program areas has a somewhat better fit, with a pseudo $R^2 = .12$.

In the logistic regression framework, the significance of individual predictors is based on odds ratios (ORs). ORs indicate the extent to which the likelihood of an outcome increases for each unit increase in the predictor variable (in the case of continuous predictors), or for the presence of the predictor variable relative to its absence (in the case of binary predictors). For example, if owning livestock decreases the likelihood of household hunger from 70 percent to 60 percent, this would be equivalent to an OR of (60/40)/(70/30) = 0.64. ORs are always positive numbers, with an OR of 1 indicating no change in the odds of an event, values between 0 and 1 indicating a decrease in the odds, and values greater than 1 indicating an increase in the odds. In a multiple logistic regression model, the OR indicates the increase or decrease in the likelihood of an outcome for a unit increase in the predictor. Significant predictors must be interpreted as the change in the odds of household hunger, with all other factors in the model being equal.

Significant predictors of household hunger for the northern Karamoja program areas include the following:

- Sex of head of household: Having a female head of household decreases the odds of household hunger by a ratio of 0.72.
- Daily per capita food consumption: Each log of Ugandan shilling (UGX) spent in food during the last week increases the odds of household hunger by a ratio of 1.73. Using untransformed food consumption, the increase in odds would be 1.61 for every additional 1,000 UGX daily per capita or 1.84 for every additional USD in constant 2010 prices.
- District: Households in Kotido (OR = 2.51) and Abim (OR = 3.18) are more likely to suffer from hunger than households in Kaabong.

Deriving recommendations from any cross-sectional multivariate model must rest on the assumption that the model is causal, which may or may not be the case. Furthermore, the models identified few significant effects for the northern Karamoja program area. The effect of daily per capita food consumption is in fact rather counterintuitive: in the current model, greater household food consumption is associated with increased odds of household hunger. Although food consumption in the last week and household hunger may not be necessarily correlated for every household, it is expected that, on average, they would be. In the absence of an alternative explanation, this result should be disregarded, as it seems to be spurious.

Significant predictors for the southern Karamoja household hunger model include the following:

- Number of elder dependents: Each additional elder dependent increases the odds of household hunger by 1.70.
- Age of the head of household: Each additional year of age for the head of household decreases the odds of moderate or severe household hunger by a ratio of 0.98.
- Educational level of head of household: Having a head of household with a secondary education decreases the odds of household hunger by a ratio of 0.44 relative to a head of household with no education. Having a head of household with postsecondary education decreases the odds of household hunger by a ratio of 0.48 relative to a head of household with no education.
- Raised crops in the last 12 months: If a household raised crops in the last 12 months, the odds that it will suffer from hunger increase by 3.45.
- Used at least two sustainable agriculture practices for crops: Households that used at least two sustainable crop practices are less likely to suffer from hunger by a ratio of 0.66. Post hoc analyses indicate that, of all sustainable crop practices, only intercropping is associated with a reduced likelihood of household hunger (OR = .38, p = .00).
- Practiced value chain activities: Households that practiced value chain activities are less likely to suffer from hunger by a ratio of 0.54. Post hoc analyses indicate that, of all value chain activities, only grading is associated with a reduced likelihood of household hunger (OR = .46, p = .00).
- Using improved storage practices: Households that used improved storage practices are less likely to suffer from hunger by a ratio of 0.65.
- District: Households in Amudat (OR = 0.56) are less likely to suffer from hunger than households in the remaining districts.

There are some surprising results in this model, most notably the fact that raising crops increases the odds of household hunger. In the southern Karamoja program area, 19.6 percent of all households did not raise any crops. Hunger among households that raised crops in the southern Karamoja program areas is 83 percent, compared to 75 percent for households not raising crops. These differences are largest in the Napak district (84 versus 70 percent hunger). This finding must, however, be interpreted in combination with the other agricultural indicators in the model, which show that using improved crop and storage practices and practicing value chain activities reduce the odds of hunger. One way to interpret these results is that households that raise crops and do not implement improved practices are more likely to suffer from food insecurity than households that do not raise crops at all. A reverse causal interpretation is also possible if wealthier households happen to invest more and have storage facilities.

This hypothesis was tested post hoc based on a model that contains all the predictors in the main model plus the interaction terms between raising crops and the remaining agricultural indicators. Results from this analysis show that the interaction of raising crops and practicing value chain activities, in particular, is a significant predictor of household hunger, above and beyond the other predictors in the model. Those households that raise crops and practice value chain activities are significantly less likely to experience hunger, by a factor of 0.25 ($p < .01$).

A.2 Drivers of Hunger: Access and Availability

A primary driver of hunger is the access and availability of food. According to the qualitative data, the majority of food that individuals consume is food they produce or forage locally. The process of production is further discussed in the section on agriculture. However, individuals produce most of the foods they consume, including the sorghum used for local brew, on their lands. Further, as suggested above and in the section on agriculture, factors that drive successful production include enhanced production techniques, environment changes, and the ability of an individual to work. In qualitative interviews, respondents noted that they purchase some of the crops and animals they consume at the local market. However, these tend to be foodstuffs and items they were unable to produce on their own, such as salt, cooking oil, or silverfish.

Qualitative data indicate that in villages where people are successfully cultivating crops or where respondents have reported past development programs in the region, individuals have greater access to

food during the dry season. This is because after food production has ended and crops have been harvested, individuals store crops for use throughout the year or sell some, which allows them to purchase what they need. In villages where production levels and development levels are lower, there is a heavier reliance on food found in the wild, and respondents report having greater access to foods during the rainy season. As one respondent in Napak stated,

> During rainy season, we can depend on wild foods such as mushrooms, wild fruits, and others, but in dry season everything is dry. We only wait for relief food or we send kids to collect firewood and sell [it] to people in the Matay trading center, and the money we get is used for buying food.

Qualitative interviews indicate that individuals who report successful crop production and high yields also report eating more frequently. Local brew is used as a substitute for meals, and in times of scarcity, individuals reported consuming one or two meals along with local brew to help keep them full. Therefore, the availability of food and access to it help drive the consumption of local brew. In Kaabong, where respondents indicated better access to food during the rainy season, one individual explained,

> In the rainy periods, we are able to access food, most especially vegetables. And, we can at least eat twice a day. Whereas in dry periods, food is so scarce and we can either eat once or only take alcohol and sleep. The little food available is left for the young ones.

B. Household Dietary Diversity Score (HDDS)

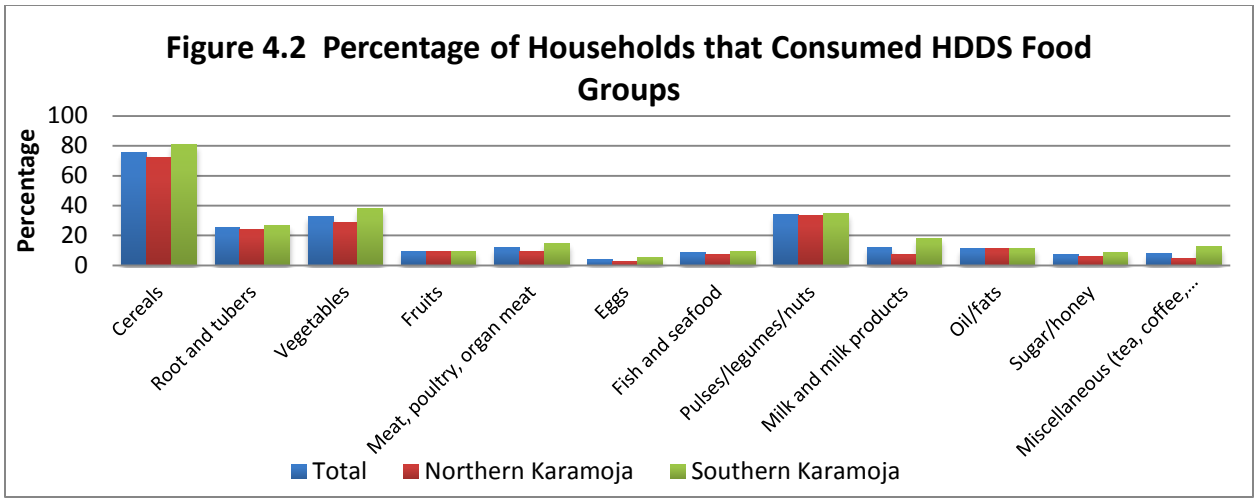
The HDDS is based on the number of different food groups consumed by the head of household or any other household members in the past 24 hours. The set of 12 food groups is derived from the U.N. Food and Agricultural Organization. The HDDS ranges from 0 to12, with lower numbers indicating less dietary diversity. Although the HDDS gives an indication of food groups consumed in the household, the HDDS should not be interpreted as a nutrition indicator reflecting diet quality, but rather as an indicator of food access. Thus it serves as a proxy for socioeconomic status.

Table 4.2b presents the results for the HDDS. The overall score of 2.4 indicates poor dietary diversity, with only two to three of the 12 food groups consumed in each household, on average. Dietary diversity is higher in the southern Karamoja program area (HDDS=2.7) than in the northern Karamoja program area (HDDS=2.2). As shown in Figure 4.2, about 75 to 80 percent of households consume foods made from cereal grains such as wheat, maize, rice, sorghum, and/or millet. Vegetables and pulses, legumes, or nuts are the second and third most commonly eaten food groups.

Table 4.2b Food for Peace Indicators - Household Dietary Diversity Score (HDDS)
Household-level FFP indicators by program area [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
HDDS (All Households)			
Average Household Dietary Diversity Score*	2.4	2.2	2.7
Number of responding households	4,766	2,399	2,367

* Difference between program areas is statistically significant at $p < .05$



Qualitative data also indicate a low level of dietary diversity in the four districts visited in Karamoja. The most common types of food that individuals and families consume are *posho*, beans or peas, maize, and wild greens. Less frequently mentioned foods include sorghum, rice, sunflower, squash or pumpkins, sesame, cassava, and sweet potatoes.

The vast majority of the food described is either a starch or a legume. While some households produce vegetables such as cabbage, tomatoes, and eggplant, the primary source of vegetable fiber is wild greens that individuals forage during the rainy season. Very few individuals reported eating meat. This tendency may be due to a decrease in livestock that results from raids, or it might be attributed to the tradition of retaining animals as a form of currency or indicator of wealth/status rather than selling or consuming them, as potential beneficiaries and key informants indicated. For the most part, respondents indicated that all family members eat from the same pot, and therefore eat the same types of food. The only variance indicated was for very small children, who consume porridge that other family members do not consume. When asked whether the quantities that individuals consumed varied by family member, age, or gender, the most frequent response given was that leftovers and any additional food tend to go to the children.

In terms of beverages, the two items most frequently identified by respondents are water and the local brew. Water is most frequently named as the beverage consumed with meals. "Kwete" (local brew) is a beverage that is produced locally, often within one's home. It has "low levels"[47] of alcohol, and the primary ingredient is usually sorghum. Some local brews are made with other products such as *simsim* (sesame) or maize, depending on the geography and the crops and animals produced in the village. Most individuals who reported consuming local brew stated that consumption begins in the mornings. One individual explained that the alcohol content is lower in the morning, that the beverage becomes more bitter as the day goes on, and that "Kwete [local brew] you need to take it like at around 11 a.m. in the morning, because if it delays, it ferments and become bitter (Kong) and can easily make one drunk." Regarding the consumption of local brew by children, responses were fairly divided. In some villages, individuals were adamant that local brew and other forms of alcohol (it should be noted that respondents never describe local brew as a type of alcohol) are not consumed by children. In other villages,

[47] "Low" is the terminology used by individuals when describing the level of alcohol in local brew. There is some indication that the percentage of alcohol falls in the range of 2 to 4 percent. However, recent studies have not been undertaken. These numbers are drawn from Food Tables for Africa from 1968, which report between 2 and 2.8 percent, and from a more recent study in Kenya on the alcohol content of local brews: "Estimating Alcohol Content of Traditional Brew in Western Kenya Using Culturally Relevant Methods: The Case for Cost Over Volume" by R. Papas, J. Sidle, E. S. Wamalwa, T. O. Okumu, K. L. Bryant, J. L. Goulet, S.A. Maisto, R. S. Braithwaite, and A. C. Justice. *AIDS Behav.* 2010 August; 14(4): 836–844; manuscript Retrieved from http://www.ncbi.nlm.nih.gov/pmc/articles/PMC2909349/

individuals admitted that taking local brew is a cultural practice that begins at an early age, even as early as six months, when it is mixed with a child's porridge so that the child develops a "taste" for it. As a male caregiver in Kaabong stated,

> It is the same in all households and everyone takes it, even young kids. The young kids have learned to drink due to lack of animals that would provide milk for them. Each one drinks according to his/her capability. Young kids can go to the pot of alcohol and get a drink.

B.1 Socio-Cultural Consumption Practices

The qualitative data analysis identified two categories of social and cultural practices and traditions that influence consumption practices. The first category includes traditions that dictate which types of foods can or should be eaten based on sex and age. For example, women are discouraged from eating the testes of an animal and the back of the chicken, but in a number of locations, the liver is reserved for women. Men and boys are often reserved the lungs and the head of an animal. The second category relates to specific desired outcomes. For example, young boys who are shepherds are encouraged to eat the hoofs of goats and cattle to improve shepherding skills. Women of childbearing age are discouraged from eating young goats so as to avoid premature births, and in Abim these women are discouraged from eating pumpkin leaves to avoid giving birth to babies with heads shaped like pumpkins. In general, many individuals do not consume meat due to the scarcity of livestock in the region and the prohibitive cost. However, a prevalent tradition is to slaughter an animal to share in celebration of holidays such as Christmas or New Year's.

C. Household Poverty Levels

In this section, poverty indicators generated from the household survey data are presented, followed by data gathered through the qualitative study regarding sources of income; income sufficiency; and roles, responsibilities and decision making in income generation.

Poverty indicators are based on household consumption and are used as a proxy for income. Income in most developing countries and rural areas is difficult to measure, and consumption data are typically less prone to recall error and more smoothly distributed over time than income data.[48]

The three FFP poverty indicators are (1) the percentage of people living on less than $1.25 USD per day per capita, (2) daily per capita expenditures, and (3) mean depth of poverty. See Annex 4 for definitions of these indicators and the methodology used to compute them. The results for these indicators are provided in Table 4.2c.

A total of 94.3 percent of the population in the survey areas is currently living in extreme poverty (less than $1.25 USD per day), which is substantially higher than the percentage of the population living in extreme poverty for Uganda as a whole (38 percent).[49] Although the corresponding figure for the Karamoja region is not available from the 2009 household survey report (which uses a different poverty line), the data show that poverty in the Northeast region (comprised of the districts of Abim, Moroto, Kaabong, Nakapiripirit, Katwaki, Amuria, Bukedea, Soroti, Kumi, and Kaberamaido) is about three times higher than the national figure (76 versus 25 percent),[50] which is in line with the findings of this study.

Daily per capita expenditures are, on average, $0.56 USD per day, per person (expressed in constant 2010 USD), with similar values in both program areas.

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[48] See, for example, "Poverty Measurement and Analysis" by A. Coudouel, J. S. Hentschel, and Q. T. Wodon, in *Core Techniques and Cross-Cutting Issues*, Retrieved from http://siteresources.worldbank.org/INTPRS1/Resources/3836061205334112622/5467_chap1.pdf

[49] According to the latest figures compiled by the World Bank for Uganda (2009), exact methodology to compute the poverty headcount ratio is not available, although both the World Bank and the figures used for this report are based on the international poverty line of $1.25 USD per day, per capita, and the LSMS framework. See http://data.worldbank.org/indicator/SI.POV.DDAY

[50] See http://www.ubos.org/UNHS0910/chapter6_%20Poverty%20trend%20estimates.html

The mean depth of poverty in the survey areas is 63.7 percent of the poverty line, with significantly deeper poverty in the southern Karamoja program area (67 percent) than in the northern Karamoja area (62 percent). This indicator is useful in understanding the average daily per capita amount that would have to be transferred to the poor to end poverty in the survey area. It is the sum over all individuals of the shortfall of their real private consumption per adult equivalent from the poverty line, divided by the poverty line. One way to interpret the mean depth of poverty is that it gives the per capita cost of end poverty, as a percentage of the poverty line, if money could be targeted perfectly. Thus, with a mean depth of poverty of 63.7 percent, it would cost 63.7 percent of the poverty line per person in the program area in order to end poverty through selective transfers.

Table 4.2c Food for Peace Indicators - Poverty
Household-level FFP indicators by program area [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Percent of people living on less than $1.25/day	94.3	93.2	95.6
Adult Female No Adult Male	93.8	92.6	96.2
Adult Male No Adult Female*	87.2	100.0	78.9
Male and Female Adults	94.4	93.3	95.8
Child No Adults [1]	-	-	-
Daily per capita expenditures [2]	0.56	0.58	0.52
Adult Female No Adult Male	0.62	0.63	0.61
Adult Male No Adult Female	0.66	0.50	0.76
Male and Female Adults	0.55	0.58	0.51
Child No Adults [1]	-	-	-
Mean depth of poverty [3] *	63.7	61.5	66.7
Adult Female No Adult Male	58.2	57.1	60.5
Adult Male No Adult Female	56.6	64.3	51.5
Male and Female Adults*	64.3	61.9	67.4
Child No Adults [1]	-	-	-
Number of household members in responding households	29,659	15,127	14,532

[1] No households of this type in the sample
[2] Expressed in constant 2010 USD
[3] Expressed as percent of poverty line
* Difference between program areas is statistically significant at $p < .05$

C.1 Income Sources

The household survey did not collect data on income sources; however the qualitative study gathered some data with asked questions regarding income sources. Their responses indicate that income sources in Karamoja are fairly consistent across districts and are rather meager. There is a dearth of possible livelihoods, so individuals find income from the few sources they have available to them. Across the region, respondents identified six primary sources of income: making charcoal, gathering firewood, producing local brew, engaging in small-scale agricultural production (both the sale of crops and animal rearing), working as hired labor in private gardens, and "casual labor." Most of this work, as reported by potential beneficiaries, is undertaken inconsistently, on an as-needed basis. That is, when individuals are unable to produce sufficient crops and animals for consumption or have an upcoming or outstanding expense, they seek other types of work. As one respondent from Napak described,

> Normally I depend on agricultural products. I had harvested in plenty in the previous year. But, if not, in most cases I also rely on selling firewood, laboring for others. Later we are paid at the end, and that money is being used for buying home needs.

Primarily women gather firewood. Men are more likely to work in other individuals' gardens or to seek other casual labor, and the income gained from these sources typically goes to health care or education costs or to purchase food or home essentials (such as soap). Therefore, although the roles of men and women may differ, both can contribute to the household income. Respondents indicated that the primary breadwinners are the parents (both male and female), but when children grow old enough, they can contribute to the family income as well.

It is common in some villages for a man to take several wives. Families receive income when young women marry, as the groom's family pays a "bride price" to the bride's family. In some cases, the bride's family continues to visit the groom's family for additional resources. In situations where second or third marriages occur, a bride price does not accompany a subsequent bride. For some women, when their husband or husband's family pays a bride price, she becomes obligated to perform particular household duties such as cooking and cleaning.

The head of the household, usually a man, controls the income. This arrangement is evident in the following exchange with a woman about her savings:

> **Moderator:** Do you have any savings?
> **Respondent:** I don't have, but my husband has.
> **Moderator:** Where does he get the money for saving?
> **Respondent:** I get it through local brewing and give to my husband to save.
> **Moderator:** Who has the decision over the savings?
> **Respondent:** My husband has the authority over that money.

This exchange demonstrates the dichotomy in Karamoja: women in Karamoja often play an important role in maintaining the household and bringing in income. In cases where men are not present, or where women are the heads of household, women are both the generators and controllers of the household income. However, while many respondents indicated that women are gaining rights, a similar number of women reported that men, when present, make the final decisions regarding expenses in the household.

C.2 Income Sufficiency and Savings

Potential beneficiaries stated that they have enough to "survive."[51] However, in discussing income sufficiency and savings with key informants, and in examining the data, it is apparent that the Karamojong define "survival" on the most basic level. It was not uncommon for respondents to report going to sleep hungry or using local brew to fill the void in their stomachs. At times, children are unable to attend school because the family can't afford the supplies needed or the fees associated with attending school. As one female head of household in Abim stated,

> In my home I live by digging with my own hand, and that is what we eat, and when I get some money, especially by digging in other people's gardens, that is what I used to buy with what to eat and I prepare it for the children to eat. Sometimes when I work somewhere, and I get the money, I go and buy for them clothes. Sometimes I buy . . . books and I take with them to school; and when they are back from school during holidays they help me work for money, part of which we buy with what to eat. We also dig our gardens and cultivate what to eat. This is how we struggle here.

Additionally, respondents said it is difficult and expensive to access health care. Even when health care is provided at no or little cost, respondents often cannot afford to pay for transportation to the health care facility. Insufficient income prompts individuals to assess immediate needs and determine what can be put off until later. Respondents made it clear that the focus is on "needs" rather than "wants." This focus on basic necessities was frequently described when respondents were asked if there are times when they

[51] The term "survive" is used colloquially here, as it was used by respondents. When asked if they had sufficient income, they often responded, "We make enough to survive" or "We make enough to get by." However, as survey data indicate, they may be "surviving," but they are not thriving in the sense that they have low levels of dietary diversity and high levels of poverty.

wish to purchase a food or beverage but are unable to do so. The most frequent response was yes. Respondents forgo many indulgences on a regular basis, including sugar, tea, milk, alcohol, and soda. A respondent in Nakapiripirit said, "There are no other means of getting income but what we get through firewood collection. We also spent on health and other things. So, sometimes you forgo what you want and spend on the other."

As far as savings, there were two primary response categories. Respondents indicated that they did not earn enough to save, or that they participated in a village savings group (VSG). Although individuals who participate in VSGs are in the minority, participation in these groups gives individuals a bit more economic security than those who do not have access to such groups. For example, a respondent from Abim stated, "I can borrow money from this VSG if I [am] in a fix, when I cannot sell my foodstuff very fast to pay [expenses for] the children at school." Those individuals who live in villages that have savings groups but do not earn enough to save would participate if they had sufficient income to do so. On a few occasions, when respondents were asked what types of programs or projects they wanted in their community, they mentioned VSGs. A small number of individuals mentioned saving money in an informal way, such as storing it in their homes. Beyond savings groups, key informants indicated a need for better infrastructure, such as roads, wells, reliable water systems, and consistent access to electricity, to help generate income for local community members.

C.3 Financial Roles, Responsibility, and Decision Making

Women contribute financially to households but are not always in charge of making decisions about how money is spent. When a male heads a household, he ultimately decides how to spend money, how much to save, and for what purpose. A key informant confirmed this arrangement and shared the following observation about how the male's decision-making power influences a household's uptake of health care:

> I think from experience and what I have heard, in most cases the men make the decisions. And most of the decisions are made based on whether the man has the money to take the family to the health center or not, and sometimes the decisions are made late because those are the persons that have money. So sometimes decisions that are not good are made because they feel like they don't have the money to take the person to the health center. So, those are some of the issues.

While this response indicates that men often decide when to seek health care for household members because they control household money—and that men often make poor decisions with regard to health care because they feel the household lacks adequate resources—some respondents indicated that women weigh in on financial decisions. Several men spoke of discussing financial decisions with their wives or consulting their wives on what crops and animals the household should cultivate to generate income.

D. Household Sanitation Practices

Household sanitation practices were assessed based on three standard FFP indicators: (1) percentage of households using an improved drinking water source, (2) percentage of households using improved sanitation facilities, and (3) percentage of households with a cleansing agent and water available at a hand washing station. Table 4.2d presents the results for these indicators, and Table A10.2 in Annex 10 provides a further breakdown of the components for each indicator. Poor sanitation practices are associated with increased morbidity and mortality, particularly for diarrheal diseases. Worldwide, it is estimated that improved water sources reduce diarrhea morbidity by 21%; improved sanitation reduces diarrhea morbidity by 37.5%; and the simple act of washing hands at critical times can reduce the number of diarrhea cases by as much as 35%.[52] Results for children's diarrhea indicators in the survey population are provided in Section 4.5B.

[52] World Health Organization, Facts and Figures: Water, sanitation and hygiene links to health, retrieved from http://www.who.int/water_sanitation_health/publications/factsfigures04/en/print.html

D.1 Drinking Water

About 40 percent of the households surveyed use an improved drinking water source. Improved drinking water sources include piped water into the dwelling or yard, public tap water, tube wells or boreholes, protected dug wells or springs, or rainwater collection. The majority of households (85 percent) using an improved drinking water source reported using a tube well or borehole as their primary source. Survey responses indicate that the majority of households (77 percent) do nothing to make water safer to drink, 15 percent let water stand and settle before drinking it, and 7 percent boil drinking water.

Table 4.2d Food for Peace Indicators - Water, Sanitation and Hygiene (WASH)
Household-level FFP indicators by program area [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
WASH (All Households)			
Percentage using an improved drinking water source	39.4	37.4	41.9
Percentage using improved sanitation facilities[1]*	8.9	12.7	4.0
Percentage with cleansing agent and water available at hand washing station*	8.1	11.0	4.0
Number of responding households	4,766	2,399	2,367

[1] Daytime sanitation facility.
* Difference between program areas is statistically significant at $p < .05$

Most individuals interviewed for the qualitative component of the study indicated that they use water from an improved source: a borehole. However, respondents indicated that pumps break down often and that water sources are far from where people live. In fact, when asked to name one of the village's greatest needs, respondents frequently said "new boreholes" or closer access to water. A potential beneficiary in Nakapiripirit, for example, said this:

> Our access roads should be repaired. The boreholes and grinding mills should be brought nearer to the people because the water we take is from the springs and it's not safe. We also need a school; the school our children attend is too far.

When boreholes are inaccessible, broken, or dried out, individuals within a community draw water from other sources, such as natural springs or rivers. In most cases, these sources are farther away than the boreholes. The distance individuals had to travel to reach a water source varied. However, according to the qualitative data, most respondents said it takes one to two hours to fetch the water, including the time it takes to travel to the source, wait, collect the water, and return home. In one community, it takes nearly five hours to collect water. The shortest amount of time reported was 10 minutes.

Not everyone in every village has access to the borehole. In some villages, a cost is associated with borehole use to cover maintenance. If an individual does not pay maintenance dues, that person is not permitted to use the borehole and must seek water from other sources. Respondents named rainwater as an alternative water source. A man in Napak explained:

> Borehole water is our main source of drinking water, both in the rainy and dry season. And, in most cases in rainy season we collect rainwater for washing, bathing, and cleaning home utensils. But that work is being done by my wives, not me.

Women, often a daughter, are most commonly responsible for collecting water for all household purposes. Fetching water involves risks such as encounters with snakes or other animals; fights that might break out at the borehole; and violent physical attacks en route, including rape. Violent attacks on women while fetching water were described primarily by respondents in the northern district of Kaabong. While reports have been filed, according to respondents, little has been done to protect women or to respond to

their reports. One potential beneficiary gave the following response when asked about the risks associated with fetching water:

> Hot sun and waiting. Since there are many people, there are occasions when the water runs out. Rape and defilement of young girls and women occurs at the hands of men at the water sources. We have reported to police and LCs [local councils].

Respondents interviewed for the qualitative study indicated that water from boreholes is used for bathing, drinking, and tending to animals. The majority do not sanitize their water. Yet when asked about sanitation, some individuals stated that they do not sanitize their water but boil it, which indicates they might not understand that boiling is a form of sanitation. As in the household survey, some individuals in the qualitative study also stated that once they collect the water in jerry cans, they let it settle before they drink it.

D.2 Sanitation Facilities

The second component of WASH indicators is use of an improved sanitation facility. Although about 28 percent of households reported having access to a sanitation facility of any type, only 9 percent of households reported using an improved sanitation facility during the daytime—either a ventilated pit latrine or a pit latrine with a slab. Use of improved sanitation facilities is higher in the northern Karamoja area (13 percent) than in the southern Karamoja areas (4 percent), and access to a sanitation facility of any type is higher in the northern Karamoja program area (41 percent) than in the southern Karamoja program area (11 percent).

On the other hand, most respondents from the qualitative study stated that they do use latrines. A few indicated that while they personally do not have a latrine, they use a neighbor's or one at a community building. Only a small minority of respondents said they do not use the latrine and go to the bush instead. When asked why they do not use the latrine, the majority stated it is because they do not have one. Others reported not using latrines due to their condition (dirty or unsafe). Another indicated that women avoid using latrines so as not to give birth there:

> We have a pit latrine made from grass. Both men and women use it. And it is only when someone is far from home that is when he/she can't use latrine. Young children also don't use the latrine. Nor do pregnant women because they have doubts and believe that she might deliver in the latrine.

The responses of key informants align with the household survey findings but not with responses obtained during qualitative interviews. Key informants indicated a low level of latrine use. One key informant went so far as to say the rate of open defecation is "about 100 percent."

D.3 Hand Washing

The third component of the WASH indicators is the percentage of households with a cleansing agent observed at the place of hand washing. Interviewers from the household survey observed the presence of water and soap, detergent, or another cleansing agent at the place for hand washing in only 8 percent of households. When asked about the most important times to wash their hands, 70 percent of household survey respondents named three of five critical moments for hand washing, with nearly all (98 percent) correctly reporting "before eating" (98 percent) and 64 percent reporting "before preparing food" and "after defecation." Only about a fourth of households named critical moments for hand washing related to child care, including "after cleaning a child" (26 percent) and "before feeding a child" (24 percent).

Table 4.2e Program-specific Indicators, Hand Washing and Sanitation
Program-specific indicators by program area [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Handwashing, Sanitation (Household respondents)			
Percentage who know 3 of 5 critical moments for handwashing[1]	70.2	69.6	71.0
After defecation	63.5	64.4	62.2
After cleaning a child*	26.4	21.7	32.6
Before preparing food	64.2	66.5	61.2
Before feeding a child	24.2	23.7	24.9
Before eating	97.9	97.3	98.6
Percentage with access to a sanitation facility of any type*	27.8	40.5	11.3
Number of responding households	4,766	2,399	2,367

[1] Critical moments for handwashing include (1) after defecation, (2) after cleaning a child, (3) before preparing food, (4) before feeding a child, and (5) before eating.

* Difference between program areas is statistically significant at $p < .05$

Qualitative data indicate that the lack of soap might be due to cost and to its being lower on potential beneficiaries' list of priorities. In addition, as described in the previous section of this report, collecting water is burdensome and sometimes dangerous, which may explain why soap and water are not always present.

Key informants and household survey data indicate that most do not wash their hands and bathe infrequently. According to one key informant, the lack of proper hygiene leads to other health problems and is a difficult issue to tackle, requiring behavioral change:

> So the health problems are a high level of dietetic diseases. This is caused largely by poor hygiene within the households. There is not widespread use of latrines or other more appropriate, more sanitary methods of defecation, and there are not strong practices of hand washing and, in general, body hygiene. For instance, [the] reasoning for that which is coming up is that people perceive that if you are clean that means you are lazy because you are not working. While this is a perception, it is not necessarily a held belief. But as a perception, it's driving some behavior for people to behave as they do, and of course poor hygiene leads to ready transmission of diarrheal diseases and of course impacts the child's nutrition.

Yet qualitative interview data suggest that people bathe regularly and wash hands during key moments in the day. When asked when they wash their hands, respondents most frequently said after returning from work or the garden, prior to eating, and after using the latrine. When asked what they used, respondents said either water only or water with local plant substances or sand. Few said they had access to soap. A key informant stated, "Resources for a household to buy soap are very limited. It's a luxury, not [a] necessity, and there is a wide range of alternatives to soap for hand washing, such as ashes or other plant substances."

The qualitative team did not visit latrines, nor did the team inspect hand washing or bathing facilities as the household survey team did. Yet qualitative findings illustrate a high level of social desirability to responding positively about latrine use, regular bathing, and hand washing. In one community, an individual was observed walking around wearing a vest that read "Clean Hand Patrol." He was responsible for ensuring that individuals wash their hands. While the percentages are likely lower than what was self-reported, it is an important finding that individuals are aware of favorable hygienic practices (bathing, hand washing, etc.).

4.3 Agricultural Indicators

Agriculture and agricultural production are key features of both the household survey and the qualitative component of the baseline study. During qualitative interviews, potential beneficiaries and key informants discussed matters related to agricultural production, including animals/livestock, market access, pest management, farming techniques, income and subsistence farming, and hired labor. As indicated earlier in this report, the traditional Karamojong economy was based on livestock, with opportunistic cultivation of sorghum and other crops. Historically, women's roles and responsibilities revolved around cultivation of food to feed the family, and men's roles revolved around taking care of the animals. According to a key informant, with the decimation of the herds over the past decades, there has been an increasing shift toward cropping as a mainstay. Therefore, men as well as women are increasingly involved in producing crops. Presented below are the results of the agricultural indicators from the household survey and the qualitative data regarding individuals' roles and responsibilities with regard to farming. The final part of this section examines the practices farmers use when producing crops as a source of income.

The agricultural component of the household survey was completed by 5,820 farmers—2,750 in the northern Karamoja program area and 3,070 in the southern Karamoja program area. Of these farmers, 54 percent are female and 46 percent are male. The majority of farmers (91 percent) reported raising crops, and 28 percent reported raising animals. The average number of crops produced per household is 2.6. The most commonly planted crops are red sorghum (65 percent), white sorghum (25 percent) maize (44 percent), and beans (27 percent). The most commonly raised animals are goats (19 percent), cattle (14 percent), and chickens (9 percent).

The household survey data were used to calculate FFP agricultural indicators for financial services, value chain activities, and use of agricultural and storage practices. Table 4.3a provides the results for these agricultural indicators. Tables A10.3 to A10.6 in Annex 10 provide breakdowns of the individual components of the FFP agricultural indicators.

About 30 percent of farmers reported accessing financial services in the past 12 months—savings (13 percent), credit (12 percent), or insurance (18 percent). Agricultural credit included village savings groups, farmers associations, government or private institutions, non-cash loans (i.e., saved seeds), and inputs from buyers.

The value chain activities included as part of the survey were purchase of inputs; tillage of land; sorting produce; grading produce; drying or processing produce; and trading or marketing (wholesale, retail, or export). Overall, 80 percent of farmers reported practicing at least two of these value chain activities. More farmers in the northern Karamoja program area practice at least two of the activities (82 percent) than farmers in the southern Karamoja program area (77 percent). The most common value chain activities practiced are tillage of land (49 percent) and purchase of inputs (46 percent).

Sustainable agricultural practices were categorized as (1) crop practices, (2) livestock practices, or (3) natural resource management (NRM) practices. Overall, 17 percent of farmers reported using at least two sustainable crop practices, and 12 percent reported using at least two sustainable livestock practices (for goats and cattle). Although most farmers still prepare their soil by hand (89 percent), soil preparation with ox plow (23 percent of farmers) and intercropping (20 percent of farmers) are the most commonly reported sustainable practices. About 16 percent of farmers reported using at least one sustainable NRM practice. For NRM, "management of watershed" or "reforestation and agroforestry or cultivation of fruit trees" were the two most frequently reported practices.

About half of farmers who raised livestock reported using animal shelters and vaccinating or deworming their animals; 65 percent reported accessing government or private veterinary care for their livestock, as shown in Table 4.3b.

Table 4.3a Food for Peace Indicators - Agriculture
FFP agricultural indicators by program area [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Percentage using financial services (past 12 months) [1]	29.5	31.6	27.1
Male farmers	30.3	33.7	26.3
Female farmers	28.9	29.9	27.7
Percentage practicing at least two value chain activities (past 12 months) [2]*	80.0	82.1	77.4
Male farmers*	81.5	85.9	76.3
Female farmers	78.7	79.0	78.4
Percentage using three sustainable agricultural practices (past 12 months)	17.7	16.7	19.0
Male farmers	21.8	20.8	22.9
Female farmers	14.3	13.3	15.5
Percentage using two sustainable agricultural (crop) practices (past 12 months) [3]	16.5	19.2	13.2
Percentage using two sustainable agricultural (livestock) practices (past 12 months) [4]	12.4	10.5	14.9
Percentage using one sustainable agricultural (NRM) practice (past 12 months) [5]	16.2	16.4	15.9
Percentage using improved storage practices (past 12 months) [6]	50.3	48.7	52.3
Male farmers	53.5	56.3	50.2
Female farmers*	47.6	42.4	54.1
Number of responding farmers	5,834	2,754	3,080
Male farmers	2,674	1,256	1,418
Female farmers	3,160	1,498	1,662

[1] Financial services include savings, credit, and insurance.
[2] Value chain activities include purchase inputs, tillage of land, sorting produce, grading produce, drying or processing produce, trading or marketing (wholesale, retail, or export).
[3] Sustainable agricultural practices for crops include soil preparation by ox plow, planting seeds in rows, crop rotation, use of fertilizer, and intercropping. This subindicator is based on all farmers, not just those that reported raising crops.
[4] Sustainable livestock practices include use of animal shelters, vaccination, deworming, homemade animal feeds made of locally available products, use the services of community animal health workers, and purchased drugs/medicines to give to animals. This subindicator is based on all farmers, not just those that reported raising livestock.
[5] Sustainable NRM practices include agroforestry or cultivation of fruit trees, management of natural regeneration, soil conservation on hillsides, and construction of water catchments.
[6] Improved storage practices include cereal banks, silos, and granaries.

* Difference between PVO program areas is statistically significant at $p < .05$

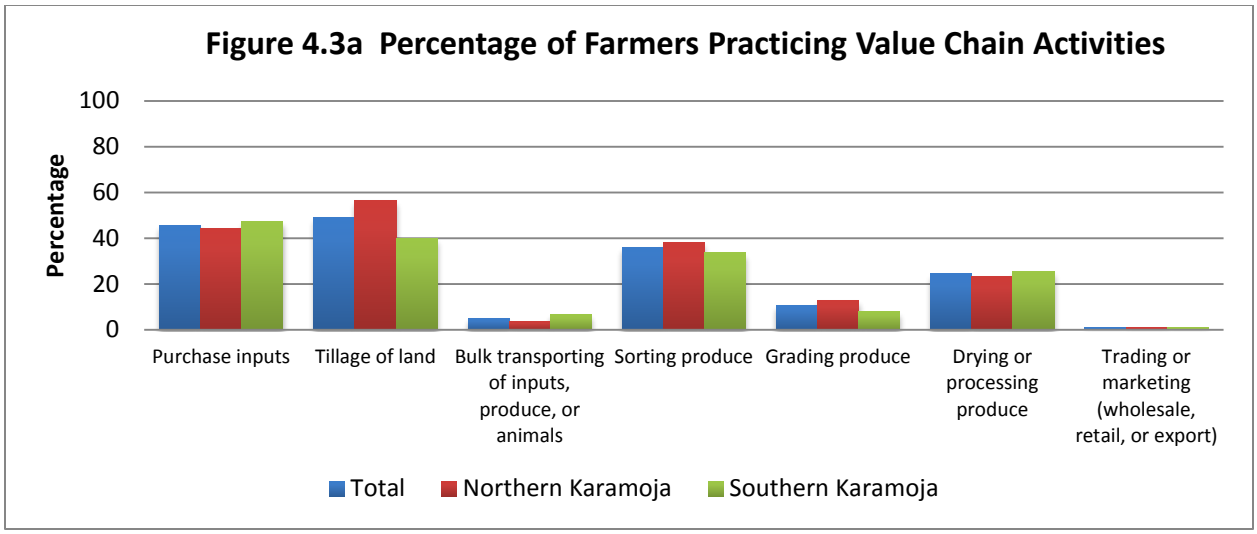


Figure 4.3a Percentage of Farmers Practicing Value Chain Activities
Percentage
100
80
60
40
20
0
Purchase inputs
Tillage of land
Bulk transporting of inputs, produce, or animals
Sorting produce
Grading produce
Drying or processing produce
Trading or marketing (wholesale, retail, or export)
Total
Northern Karamoja
Southern Karamoja

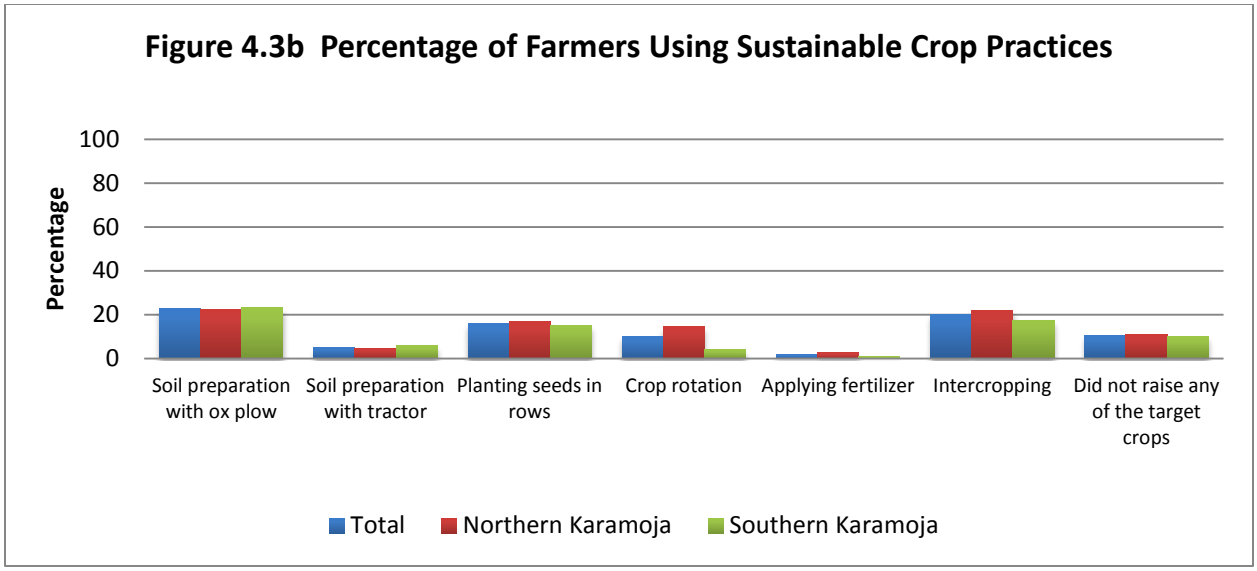


Figure 4.3b Percentage of Farmers Using Sustainable Crop Practices
Percentage
100
80
60
40
20
0
Soil preparation with ox plow
Soil preparation with tractor
Planting seeds in rows
Crop rotation
Applying fertilizer
Intercropping
Did not raise any of the target crops
Total
Northern Karamoja
Southern Karamoja

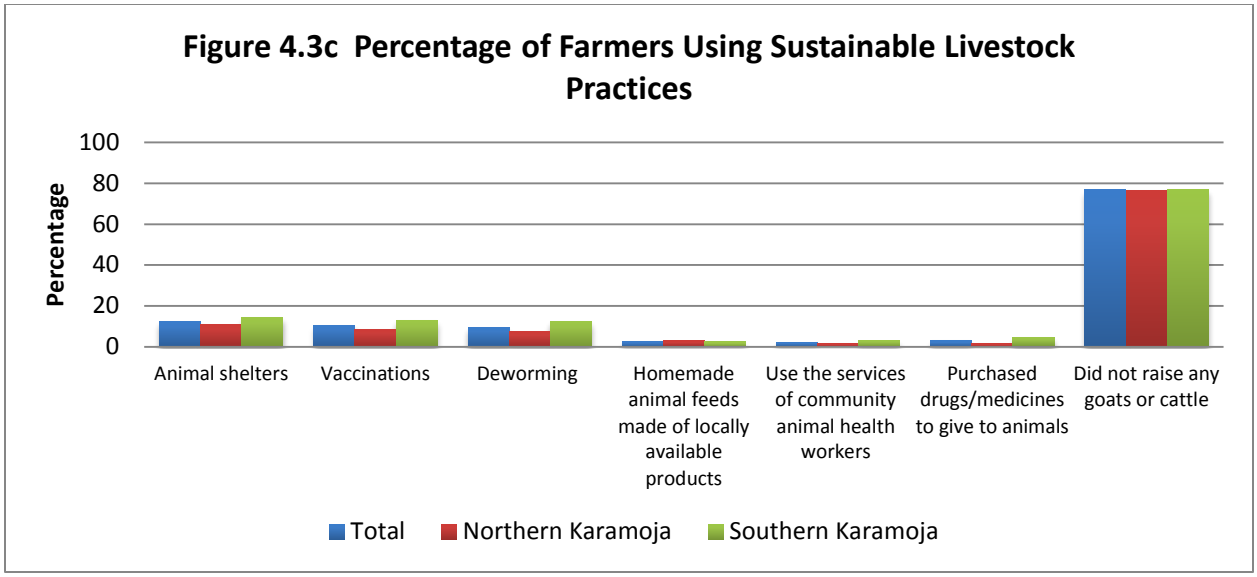
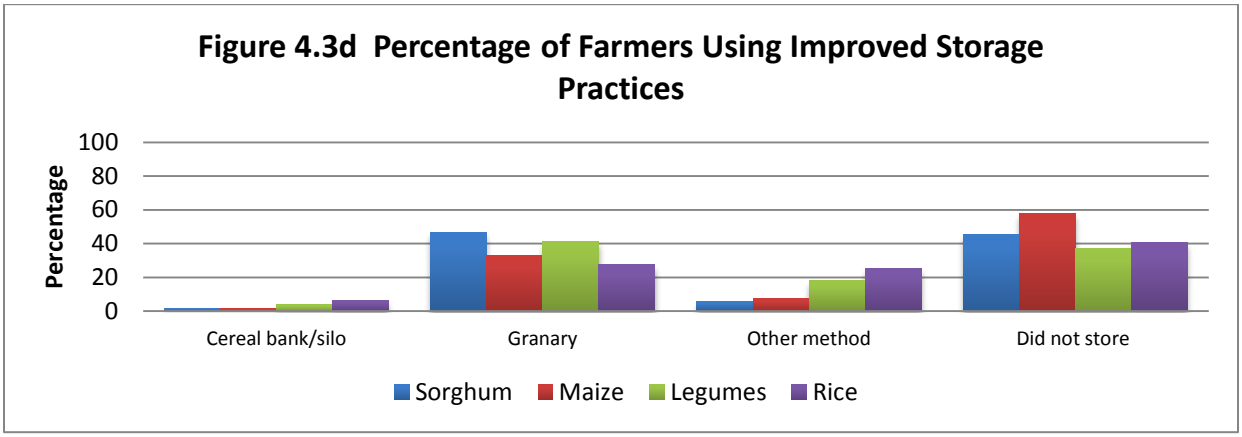


Figure 4.3c Percentage of Farmers Using Sustainable Livestock Practices
Percentage
100
80
60
40
20
0
Animal shelters
Vaccinations
Deworming
Homemade animal feeds made of locally available products
Use the services of community animal health workers
Purchased drugs/medicines to give to animals
Did not raise any goats or cattle
Total
Northern Karamoja
Southern Karamoja

Table 4.3b Program-specific Indicators - Agricultural Practices and Veterinary Care
Program-specific indicators by program area [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Agricultural Practices (Farmers)			
Average number of crops produced - past 12 months	2.6	2.6	2.5
Percentage adopting farmer managed natural regeneration practices - past 12 months	16.2	16.4	15.9
Number of responding farmers	5,834	2,754	3,080
Veterinary Care (Livestock owners)			
Percentage accessing government or private sector veterinary care - past 12 months	65.6	63.1	69.3
Number of responding livestock owners	1,734	791	943

As shown in Figure 4.3d, half of the interviewed farmers reported using improved storage practices, most using cereal banks/silos or granaries. More farmers who cultivated legumes use improved storage practices (63 percent) than those who cultivated sorghum (55 percent) or maize (42 percent).



Qualitative data indicate that the majority of decisions about agriculture are made either solely by men or jointly by men and women. When women and men make decisions jointly, women's input tends to focus on the storage of crops for future use, and men tend to decide which crops the household will cultivate. In cases of female-headed households, where males either are not present or are unable to contribute to the household, women are the primary decision makers for all aspects of agriculture.

Although, traditionally, women were primarily responsible for farming, both men and women reported that males are increasingly involved in activities such as digging and weeding. Both men and women reported participating in farming, but the division of labor within households can vary, as illustrated by the following statements:

- Female farmer from Nakapiripirit: "If it is weeding, a man is supposed to do that, but when it comes to digging, we all dig."
- Female farmer from Napak: "We apportion work in [the] following ways: clearing the land for cultivation before cultivation and weeding, that's my work and my daughter's, while my sons do the harvesting."

- Male farmer, in a focus group interview in Abim: "The work of the men is to cut trees, burn them; the woman is to clean the small shrubs and when it is done then digging is done together.… Weeding is for women but today, you leave weeding for the women, and then you will not get anything at the end."
- A male farmer from Napak: "It depends on the existing work, and I portion work according to people's abilities. When my wife is pregnant she deserves less work and sometimes I employ external labor to do the work. As per now I have a person I trained to work in the fruit garden."

In some cases, respondents hire individuals to help with the duties, yet in cases where animals are used to tend crops, the primary responsibilities are still in the hands of the men.

A. Agriculture as a Livelihood

The shift to agriculture as a primary form of livelihood is a recent trend in Karamojong. According to one key informant, because of limited indigenous knowledge on cropping, fundamental errors are made that result in significant or catastrophic losses. Further, the reliance on crop production also increases vulnerability, particularly in the event of extended dry periods or droughts. The decimation of the herds has also affected potential agricultural outputs. The household survey data identified soil preparation through handheld tools as the most common practice (89 percent of farmers); only 23 percent of farmers reported using an ox plow. As one female farmer from Nakapiripirit stated,

> I practice farming, but I do not have oxen because that time when raids were persistent, all the animals I had were raided. So in the case of livestock, I do not have any animal kept at home, but before I did.

Limited access to land and small plot sizes is a factor in utilizing agriculture as a form of livelihood. Respondents stated that land is something they either inherit from their grandparents or borrow. As one key informant describes it,

> Generally, land is communally owned…. The elders just allocate land. Therefore, accessing it for cultivation is not a problem, but if you wanted to own that land, then I think that is a problem …. The limitation normally [is in] not having enough of an area to plow and get enough food to feed them for beyond the three to four months. Because they just have about two to three acres.

Although most respondents stated that they are able to access land, they usually mentioned having to travel long distances or migrate in order to access the land.

All three categories of respondents to the qualitative study (i.e., heads of household, farmers, and caregivers) reported participation in subsistence farming. Yet the extent to which respondents rely on farming as a primary form of subsistence varies; the majority said they find it necessary to supplement through food purchases or food assistance programs.

Discussion with the groups of farmers and heads of household showed patterns similar to those found in the household survey. In addition to planting crops, some of these respondents mentioned rearing animals; those most commonly mentioned were goats, sheep, cattle, and chickens, with one respondent mentioning pigs and another mentioning turkeys. Even when they cited farming as the primary form of income, respondents indicated that fluctuating crop yields result in reliance on additional sources of income to meet household needs. The following exchange with a female farmer from Napak exemplifies this trend:

> **Respondent:** Farming is the primary source of income in my household, and besides that, there are also sources which include casual labor and animal rearing. It is the father and the mother who are the ones who are responsible for bringing in this source of income.
> **Interviewer:** Is the income you, or in combination with others in the household, bring in sufficient in sustaining the basic needs of the family?

> **Respondent:** It does only if harvesting period has been done because part of that food is being sold and even sometimes I brew alcohol hence raising some income which can help to sustain the family.

Individuals who participate in farming as their primary form of income generation tend to diversify their crop selection, although the majority does not distinguish between what is cultivated for consumption and what they sell. Even respondents who self-identified as farmers said the primary objective is subsistence, with sales occurring in the event of excess yields. As a female farmer from Abim stated,

> We grow crops for consumption and sale together. When the yield is good, we do sell some, but if the yield is poor, we eat everything because it would not be enough for the family…. When a good yield has been realized we divide some and sell.

A male farmer from Kaabong gave a similar account:

> We do subsistence farming and rear animals like goats, sheep, and cattle. We both consume and sell foods like maize, sorghum, millet, and bulrush. We just sell a little percentage of the produce and keep the rest for our own consumption. Yes, it varies; when we harvest a lot, we sell a lot, but when it's little we hardly sell anything. We also use our produce for other purposes; for example, sorghum is used for making local brew.

As reflected in the household survey, sorghum is the most common crop raised by farmers. However, respondents mentioned the importance of diversifying crops to generate more income. A female head of household from Abim stated,

> You see, you don't need to grow for consumption; only when you cultivate you need to get something that can bring for you some little money—for example, millet, simsim (sesame), cassava, and even maize. These are what I see that can generate some income because if I grow only sorghum its market may not be there.

Although respondents mentioned farming as a form of income, the amount of income generated varies greatly and is largely dependent on excess yield. Farmers who do well tend to have formal or semiformal training in farming techniques. They also use the methods discussed in Section 4.3, such as distinguishing which crops are for sale versus which are to be consumed, diversifying crop type, storing food for consumption separate from goods for sale, and putting money into a VSG. For example, one male farmer from Napak stated,

> I deal in fruit growing and as per now I have 400 trees of oranges. I also grow other fruits like bananas, mangoes, and recently I acquired some seedlings of apples and they are also doing well. Not only that, I also do some subsistence farming for home consumption where I grow crops like maize, sorghum, beans, sunflower. Lastly, I rear some animals like sheep, goats, and a few cows.

The Napak farmer, however, seems to represent a minority. With limited farming techniques, unstable climate conditions, limited numbers of animals or mechanized plowing techniques, and small plot sizes, the majority of respondents are unable to produce enough through agriculture to comfortably meet all household needs.

4.4 Women's Health and Nutrition Indicators

A. General Health Issues in the Community

Before examining women's health in particular, it is important to examine some of the qualitative findings about the types of illnesses encountered within the villages, the types of health care services utilized, access to health care, and perceptions about it. The majority of respondents to the qualitative survey acknowledged an improvement in the general health of the community over the past few years. Overall, potential beneficiaries reported trust in all health service providers and mentioned an improvement in health care services. Still, discussions about community needs frequently included health facilities, medication, and illness prevention measures. Respondents and key informants alike identified health care as a primary concern for the residents of Karamoja.

Across all regions, the most commonly mentioned illnesses were malaria, diarrhea, and cough/cold. Also mentioned were chest pain, cholera, headaches, human immunodeficiency virus (HIV), injuries (i.e., snake bites and falls), jiggers, measles, pneumonia, trachoma, typhoid, and yellow fever.

When discussing causes of disease, respondents stated limited or difficult access to health care facilities; lack of proper hygiene practices; and specifically, with regard to malaria, the rainy season/stagnant waters and limited use of prevention mechanisms such as mosquito nets.

Malaria was a topic of concern for many respondents. Although a male farmer from Abim mentioned a decrease in malaria due to the widespread distribution of mosquito nets, the only other respondent who mentioned receiving a mosquito net resided in Kaabong and received the net from the hospital when his child was admitted for malaria. Respondents who mentioned the need for mosquito nets reside in Nakapiripirit, Napak, and Kaabong.

B. Access and Use of Health Care Services

During the qualitative interviews, respondents mentioned several sources of health care services, including health centers, private clinics, the village health team/village health trainees (VHTs), traditional birth attendants, midwives, and traditional healers and herbalists. Of these sources of care, VHTs were said to be the most accessible. VHTs are community volunteers trained by the Ministry of Health to extend the health center's reach for preventative and basic curative services to the community levels. According to one key informant, because VHTs are located within the *manyattas,* they are able to help identify community-level health needs and administer medication for some of the common illnesses. VHTs serve as a bridge between individuals needing health care and the health centers. Respondents described VHTs as the individuals they go to before seeking other forms of care. VHTs then provide the needed treatment or refer the individual to the health center. Respondents described VHTs' services as effective, mainly with regard to children's health and the treatment of common diseases through the distribution of medication. A female farmer from Nakapiripirit stated, "These village health providers are reliable and I trust them and also appreciate them for their efforts when they provide health services."

However, respondents from Nakapiripirit and Kaabong stated that VHTs are either no longer available or do not have an adequate supply of medication. For example, one male caregiver said, "Drugs were distributed to village health teams [VHTs], but since this program stopped, diseases are now common and we are to go to hospital, which is far." The respondent said his only option for care was a hospital located far from his residence.

The majority said the greatest hindrance to receiving care is the distance to the health centers. Cost was also cited as a barrier. A female farmer from Nakapiripirit stated,

> We get health services mainly from the health centers but in some cases we are referred to clinics to buy if you have money, and we also get some service from the traditional healers but they demand some money or sorghum for payment.

Access to traditional healers seems to vary. Some respondents described them as being very accessible or more accessible than health care facilities; while others said no traditional healer was located in their village. A few respondents reported that negative experiences at health facilities caused individuals to seek care from other sources such as traditional healers or herbalists. For example, a male caregiver from Kaabong stated,

> One day, my child fell sick. My wife reported the issue to me, and I had to respond positively. We went together up to the Kocolo Health Centre II. We waited for the health worker for more than eight hours. I made up my mind and went to the traditional herbalist, the child became okay, and from there and then I started trusting [the] traditional herbalist. I believe health workers are just working for money but not for people.

C. Women's Health and Nutrition

The household survey focused on health and nutrition indicators in two populations: women and children. The women's module of the household survey was administered to one woman between the ages of 15 and 49 in each household. A total of 4,452 women were interviewed; 2,246 in the northern Karamoja program area and 2,206 in the southern Karamoja program area. Anthropometry measurements were taken for all women except those who were pregnant or postpartum. The average age of all women ages 15-49 was 29.1 years, and the average age of pregnant or postpartum women was 28.8 years. Valid anthropometry measurements were taken for 3,554 women. The results for the two FFP indicators, prevalence of underweight women and women's dietary diversity, are presented in Table 4.4a.

Table 4.4a Food for Peace Indicators - Women's Nutritional Status
Women-level FFP indicators by program area [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Prevalence of underweight women [1]	23.4	20.9	26.8
Number of eligible women (15-49 years) with valid measurements	3,554	1,776	1,778
Women's Dietary Diversity Score*	2.3	2.1	2.6
Number of responding women (15-49 years)	4,452	2,246	2,206

[1] Excludes pregnant and postpartum (birth in the preceding 2 months) women.

* Difference between PVO program areas is statistically significant at $p < .05$

The Women's Dietary Diversity Score is computed based on nine critical food groups. This validated indicator aims to measure the micronutrient adequacy of the diet and reports the mean number of food groups consumed in the previous day by women of reproductive age (15-49 years). The indicator is tabulated by averaging the number of food groups consumed (of the nine food groups) across all women. The survey results indicate that women consume, on average, 2.3 of the nine basic food groups. Grains, roots, and tubers (90 percent) and green leafy vitamin A-rich vegetables (52 percent) are the most frequently consumed food groups, while organ meat (5 percent) and eggs (3 percent) are the basic food groups that women consume least often.

The nutritional status of women was further assessed with two anthropometric indicators: BMI and height. These indices were derived from the height and weight measurements of women ages 15-49 who were not pregnant. Short stature reflects poor socioeconomic conditions and inadequate nutrition during childhood and adolescence. A woman is considered to be at risk if her height is below 145 cm. Only 1.7 percent of the women in the survey population are less than 145 cm tall.

BMI, expressed as the ratio of weight in kilograms to the square of height in meters (kg/m^2), was used to measure the prevalence of underweight women. A BMI below 18.5 indicates underweight or acute malnutrition, and a BMI of 25.0 or above indicates overweight or obesity. A BMI below 17 indicates moderate and severe malnutrition and is associated with increased mortality. The majority (72 percent) of women in the survey population have a BMI within the normal range (18.5-24.9); 23 percent can be considered underweight (BMI < 18.5), and 7 percent are in the moderately to severely underweight range (BMI < 17.0). Table 10.8 in Annex 10 provides results for height and BMI measurements.

Additional data were collected during the household survey to explore decision-making practices by women with regard to health care, family planning, antenatal care, infant and young feeding practices, and maternal child care (MCC) practices. Table 4.4b provides the results for these indicators.

Female caregivers of children under five years of age who are married or in a union were asked about decision making for their own health care and for that of their children under five years of age. Overall,

77 percent of these women reported that they make decisions about health care for themselves and for their children either alone or jointly with their partner.

Female caregivers of children under five years of age were asked to give as many examples as they could of important infant and young child feeding (IYCF) and MCC practices. A total of 23 percent were able to identify at least seven of 15 important IYCF and MCC practices.

When asked about family planning, responses from 43 percent of women ages 15-49 indicated an awareness of where to get family planning services.

Of the 1,805 mothers of children 0-23 months asked about antenatal care during their last pregnancy, 60 percent reported attending four or more antenatal visits. More women in the southern Karamoja program area (75 percent) reported attending four or more antenatal visits than women in the northern Karamoja program area (49 percent).

Table 4.4b Program-specific Indicators - Women's Heatlh Care Decision Making and Practices
Program-specific indicators by program area [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Health Care Seeking Decision Making (Female caregivers of children 0-59 months - married or in a union)			
Percentage making decisions about health care for themselves[1]*	77.2	79.6	74.1
Percentage making decisions about health care for children 0-59 months[1]*	77.4	79.9	74.1
Number of responding female caregivers of children 0-59 months that are married or in a union	3,234	1,653	1,581
IYCF and MCC Practices Awareness (Female caretgivers of children 0-59 months)			
Percentage of caregivers who know at least 7 of 14 IYCF and MCC practices*	22.8	13.6	35.5
Number of responding female caregivers of children 0-59 months	3,545	1,825	1,720
Family Planning Awareness (Women 15-49)			
Percentage who are aware of where to go for family planning services*	43.1	48.5	35.5
Number of responding women (15-49 years)	4,531	2,320	2,211
Antenatal Care (Mothers of children 0-23 months)			
Percentage attending 4 or more antenatal care visits with youngest child*	60.0	49.2	75.2
Number of responding mothers of children 0-23 months	1,806	944	862

[1] Includes joint decision making.

* Difference between PVO program areas is statistically significant at $p < .05$

D. Antenatal Care and Delivery

Both the household survey and qualitative findings indicate that women make decisions about their own antenatal care and delivery. Respondents described an increasing number of women going to health centers for delivery. Health centers and antenatal clinics were described not only as facilities where women give birth, but also as places where women receive supplemental food; postpartum care; and information about breastfeeding, children's nutrition, and immunizations. Some women stated that although they used to give birth at home, due to the increased availability and reliability of the hospitals,

they now deliver at health centers. The following exchange with a female caregiver in Nakapiripirit illustrates this trend:

> **Moderator**: Where do you give birth from?
> **Respondent**: We give birth in the Nakapiripirit Health Center and [for] one of my children I gave birth in Lolachat Health Center.
> **Moderator**: Who advised you to go and give birth at the health facility?
> **Respondent**: When we go for antenatal care, the health workers advise us to always be giving birth at the health facility, and they even inform us to be coming to the health facility 3 days before the day of giving birth.

When women are unable to deliver at the health center, usually because of distance, respondents mentioned the availability of traditional birth attendants, midwives, or VHTs to aid in the delivery process. Even when deliveries take place at home, the majority of respondents still go to health centers for postpartum care and for their child's immunizations. The next section of this report discusses children's health and nutrition indicators.

4.5 Children's Health and Nutrition Indicators

A. Stunting and Underweight

Anthropometric indicators for children under five years of age provide outcome measures of nutritional status. Height (length) and weight measurements are taken using standardized procedures and compared with the 2006 WHO Child Growth Standards, which are based on an international sample of ethnically, culturally, and genetically diverse healthy children living under optimum conditions conducive to achieving a child's full genetic growth potential. Use of the 2006 WHO Child Growth Standards is based on the finding that well-nourished children of all population groups for which data exist follow similar growth patterns before puberty.

Weight-for-age takes into account both chronic and acute malnutrition and is often used to monitor nutritional status on a longitudinal basis. Children who are less than two standard deviations (SDs) below the median of the WHO Standards population in terms of weight-for-age may be considered underweight.

The height-for-age index provides an indicator of linear growth retardation (stunting) among children. Children who are less than two SDs below the median of the WHO Standards population in terms of height-for-age may be considered short for their age ("stunted") or chronically malnourished. Severe linear growth retardation ("stunting") reflects the outcome of a failure to receive adequate nutrition over a number of years and is also affected by recurrent and chronic illness. Height-for-age, therefore, represents a measure of the long-term effects of malnutrition in a population and does not vary appreciably according to the season of data collection.

Age, height, and weight measurements were obtained for a total of 5,335 children ages 0-59 months—2,747 in the northern Karamoja program area and 2,588 in the southern Karamoja program area. These measurements were used to calculate two indicators:

- Prevalence of underweight children 0-59 months (weight-for-age)
- Prevalence of stunted children 0-59 months (height-for-age)

Table 4.5a provides the results for the anthropometric indicators.

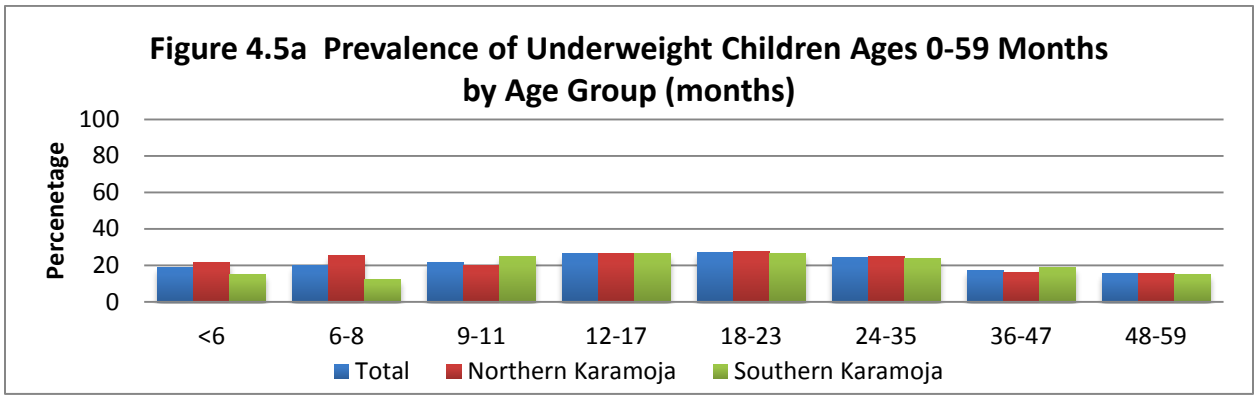
A total of 21 percent of children under five years of age in the survey population show signs of being moderately or severely underweight (less than two SDs below the median). As shown in Figure 4.5a, the proportion of underweight children is lowest among children 48-59 months old (17 percent) and highest among those 18-23 months old (27 percent). Male children are slightly more likely to be underweight than female children (24 percent versus 19 percent).

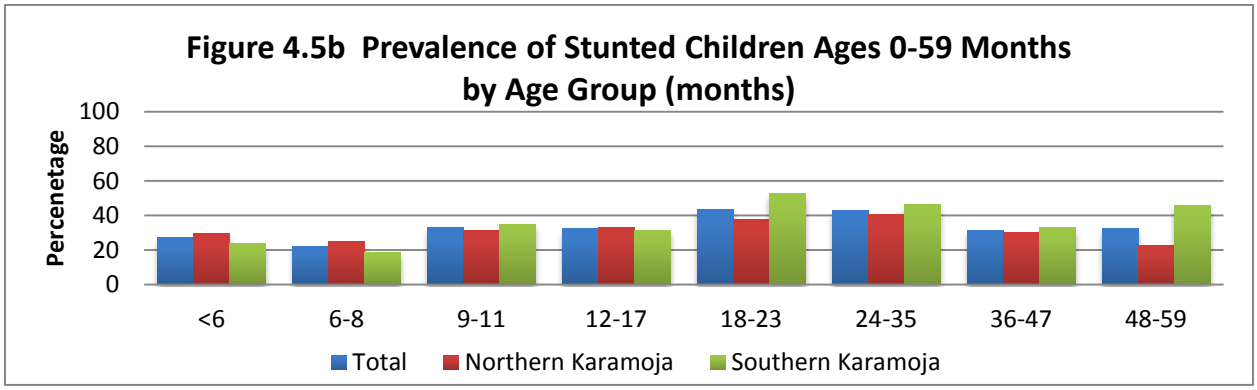
A total of 35 percent of children under five years of age in the survey population show signs of being moderately or severely stunted (less than two SDs below the median). The prevalence of stunting is

higher in male children (37 percent) than in female children (32 percent). As shown in Figure 4.5b, the prevalence of stunting increases as the age of the child increases, with the highest prevalence of chronic malnutrition found in children ages 18-35 months (43 percent) and the lowest in children 6-8 months (22 percent).

Table 4.5a Food for Peace Indicators - Children's Nutritional Status
Child-level FFP indicators by program area and sex [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Children's Nutritional Status (Children 0-59 months)			
Prevalence of underweight children			
Male	23.5	23.8	23.1
Female	18.7	19.2	17.9
Total	21.0	21.5	20.4
Number of children (0-59 months)	5,335	2,747	2,588
Prevalence of stunted children			
Male	37.3	33.7	42.6
Female	31.7	30.4	33.6
Total	34.5	32.0	38.0
Number of children (0-59 months)	5,335	2,747	2,588





A.1 Predictors of Stunting

To understand factors that might influence stunting, OLS regression models were run for HAZ scores of children under five years of age for the overall Karamoja region and separately for each program area. Table A9.2 in Annex 9 shows statistical results for these models. Table A9.2 also shows the β coefficients

for each individual predictor. In a multiple OLS regression model, the β coefficient indicates the change in the outcome for a unit increase in the predictor, with all other predictors in the model held constant.

HAZ is a continuous variable that indicates the difference, in SDs, between the child's height and the median height for children of the same sex and age in the reference population used for the WHO anthropometry standards. Children are considered "moderately and severely stunted" when they are two SDs below the WHO standard height for their age. Thus, even though "stunting" is a categorical variable and HAZ is a continuous variable, the two are related so that when HAZ scores increase, stunting rates decrease. Independent variables in the model include the following:

- Demographic characteristics of the child: Sex, age, age squared, a sex-by-age interaction term, and diarrhea status in the last two weeks
- Household composition: Number of prime-aged adults (15-49 years old), number of elder dependents (50 or older), number of young dependents (5-14 years), number of children (0-4 years)
- Demographic characteristics of the head of household: Sex, age
- Education level of primary caregiver
- Socioeconomic status: Household hunger, household poverty, and food consumption
- Household water and sanitation: Improved source of drinking water, water treatment prior to drinking, improved, not shared sanitation facility, cleansing agent and water available at hand washing station
- Household agricultural status: Raised crops in the last 12 months, number of farmers in the household, used at least two sustainable livestock practices, used at least two sustainable crop practices, used at least one sustainable NRM practice, practiced value chain activities, used improved storage practices
- District

The overall model showed that the models were significantly different between program areas; therefore predictors are presented separately for each program. Both the northern Karamoja and southern Karamoja models show a low explanatory power, with $R^2 = .06$ (Mercy Corps) and $R^2 = .05$ (ACDI/VOCA), indicating that the independent variables in the models explain 5 to 6 percent of the variance in HAZ.

Significant predictors for the northern Karamoja HAZ model include the following:

- Number of young dependents (5- to 14-year-olds): Each additional young dependent living in the household is associated with an increase in HAZ of 0.10.
- Education level of primary caregiver: Having a primary caregiver with a postsecondary education level increases HAZ by 0.56, relative to the remaining groups.
- Natural resource management: Practicing at least one sustainable NRM practice in the past 12 months is associated with an increase in HAZ of 0.57. Post hoc analyses indicate that the only NRM practice associated with higher HAZ scores is agroforestry (β=-.42, p=.01).
- District: Living in Abim is associated with a 0.42 increase in HAZ, relative to children in the Kotido and Kaabong program areas.

For the southern Karamoja program areas, significant predictors include the following:

- Sex of child: Being female increases HAZ by 0.38.
- Child diarrhea: Child diarrhea in the last two weeks is associated with a decrease in HAZ of 0.31.
- Daily per capita food consumption (log): Each additional log of UGX spent on food is associated with a decrease of 0.20 in HAZ. Using untransformed food consumption, the decrease in HAZ is 0.01 for every additional 1,000 UGX daily per capita, or 0.02 for every additional USD in constant 2010 prices, a fairly modest effect, considering that average daily per capita expenditures in the southern Karamoja areas are $0.52 USD in constant 2010 prices.

- Number of prime-aged adults (15-49): Each additional prime-aged adult living in the household is associated with an increase in HAZ of 0.09.
- Raised crops in the last 12 months: Holding other factors in the model constant, average HAZ is 0.27 lower for children living in households that raise crops.
- District: Other factors in the model held constant, children in Nakapiripirit have higher HAZ than those in other districts.

B. Diarrhea and ORT

Dehydration caused by severe diarrhea is a major cause of morbidity and mortality among young children, although the condition can be easily treated with oral rehydration therapy (ORT). Exposure to diarrhea-causing agents is frequently related to the use of contaminated water and to unhygienic practices in food preparation and disposal of excreta. Caregivers were asked whether any children under five years of age had diarrhea at any time during the two-week period preceding the survey. If the child had diarrhea, the caregiver was asked about feeding practices during the diarrheal episode, whether they sought advice or treatment, and whether ORT was given to the child. Types of ORT type included fluids made from a special packet (Zinkid or RESTORE), reconstituted ORT liquid provided through government health facilities, and a government-recommended homemade fluid. Caregivers were also asked whether there was blood in the child's stools. Diarrhea with blood in the stools is a more urgent condition that should be treated differently from diarrhea that is not accompanied by blood in the stools.

Table 4.5b shows the results for the two FFP indicators—the percentage of children with diarrhea in the past two weeks and the percentage of children with diarrhea treated with ORT. Overall, 22 percent of all children under five years of age had diarrhea in the two weeks preceding the survey. Of the children with diarrhea, caregivers reported that 31 percent had blood in their stools. No differences were found in the prevalence of diarrhea between the two program areas.

Caregivers reported seeking advice or treatment for 85 percent of the children with diarrhea, and 88 percent of those children were treated with ORT. More children in the northern Karamoja program area were treated with ORT (93 percent) than children in the southern Karamoja program area (83 percent). ORT treatment of Zinkid or RESTORE was used for 73 percent of children, reconstituted ORT fluids were used for 40 percent of children, and government-recommended homemade fluids were used for 17 percent of children.

Table 4.5b Food for Peace Indicators - Children's Diarrhea and ORT
Child-level FFP indicators by program area and sex [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Children's Diarrhea and ORT (Children 0-59 months)			
Percentage of children who had diarrhea in the last two weeks			
Male	22.7	22.6	22.9
Female	21.3	20.1	22.9
Total	22.0	21.3	22.9
Number of children (0-59 months)	5,662	2,903	2,759
Percentage of children with diarrhea treated with ORT [1]			
Male	89.3	92.9	84.0
Female	87.5	92.4	81.7
Total	88.4	92.7	82.8
Number of children (0-59 months) with diarrhea	1,166	581	585

[1] Includes oral rehydration salts (ORS) (e.g., Zinkin or RESTORE); ORS liquid provided through government health facilities, government-recommended home fluids (RHF) or increased fluids.

C. Minimum Acceptable Diet (MAD)

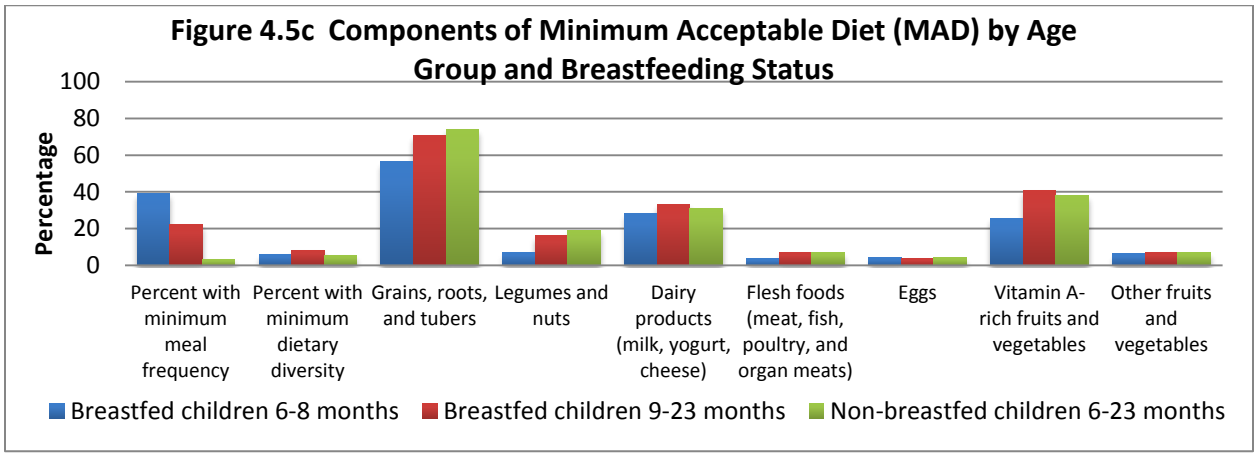
Adequate nutrition during the period from birth to two years of age is critical for a child's optimal growth, health, and development. This period is one marked for growth faltering, micronutrient deficiencies, and common childhood illnesses such as diarrhea and acute respiratory infection (ARI). Adequate nutrition requires a minimum dietary diversity, which is measured in terms of seven key food groups. In addition to dietary diversity, feeding frequency (i.e., the number of times the child is fed) and consumption of breast milk (or other types of milk or milk products) needs to be considered. All three dimensions are aggregated in the MAD indicator. This indicator measures the percentage of children 6-23 months of age who receive a MAD, apart from breast milk. The MAD indicator measures both the minimum feeding frequency and minimum dietary diversity, as appropriate for various age groups. If a child meets the minimum feeding frequency and minimum dietary diversity for his or her age group and breastfeeding status, the child is considered to be receiving a MAD.

Table 4.5c shows the results for the MAD indicator. A total of 1,725 children ages 6-23 months were included in the survey—859 in the northern Karamoja program area and 866 in the southern Karamoja program area. Overall, only 4 percent of these children are receiving a MAD. More children in the southern Karamoja program area (7 percent) are receiving a MAD than in the northern Karamoja program area (2 percent).

As Figure 4.5c shows, the percentage of breastfed children 6-8 months of age with a minimum meal frequency of two or more meals is higher (39 percent) than the percentage of breastfed children 8-23 months of age with a minimum meal frequency of three meals (22 percent) and the percentage of nonbreastfed children 6-23 months of age with a minimum meal frequency of four meals plus two servings of milk (3 percent). The proportion of children 6-23 months of age with a minimum dietary diversity of four or more food groups is low: 6 percent for breastfed children 6-8 months, 8 percent for breastfed children 8-23 months, and 6 percent for nonbreastfed children 6-23 months of age.

Table 4.5c Food for Peace Indicators - Children's Minimum Acceptable Diet (MAD)
Child-level FFP indicators by program area and sex [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Minimum Acceptable Diet (Children 6-23 months)			
Prevalence receiving a minimum acceptable diet			
Male	4.2	2.3	6.9
Female	4.2	1.9	7.1
Total	4.2	2.1	7.0
Number of children (6-23 months)	1,725	859	866



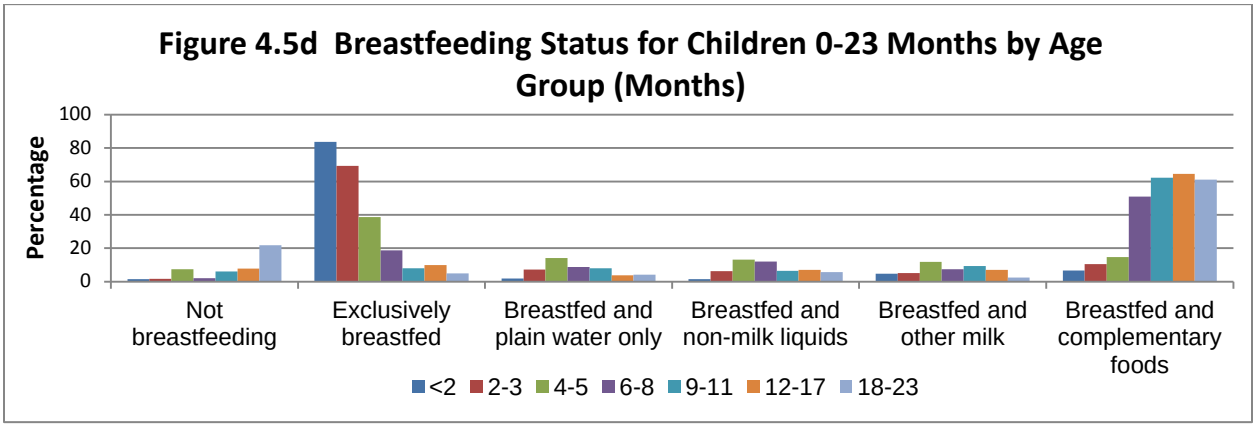
D. Breastfeeding

Breastfeeding is an important factor in predicting the future health of children. Research indicates a strong link between breastfeeding and the development of a child's immune system.[53] UNICEF and WHO recommend that children be exclusively breastfed (no other liquid or solid food or plain water) during the first six months of life and that children be given solid/semisolid complementary food in addition to continued breastfeeding beginning when the child is six months old and continuing to two years and beyond. Introducing breast milk substitutes to infants before six months of age can contribute to limiting breastfeeding, which has negative implications for a child's health and development. Substitutes such as formula, other kinds of milk, and porridge are often watered down and provide too few calories. The lack of appropriate complementary feeding may lead to malnutrition, frequent illnesses, and possibly death.

Table 4.5d shows the results of the household survey for the prevalence of exclusive breastfeeding. Of the 602 children 0-6 months in the survey households, 60 percent are exclusively breastfed. No differences were noted between program areas or between male and female children. As Figure 4.5d shows, the prevalence of exclusive breastfeeding is highest in the 0- to 2-month range (82 percent) and gradually decreases with each age group thereafter. About 20 percent of children 18-23 months of age are not breastfed. At six months and older, 50 to 60 percent of children are breastfed with the addition of complementary foods.

Table 4.5d Food for Peace Indicators - Exclusive Breastfeeding
Child-level FFP indicators by program area and sex [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Exclusive Breastfeeding (Children 0-5 months)			
Prevalence of exclusive breastfeeding			
Male	59.2	61.4	56.0
Female	60.7	60.1	61.4
Total	59.9	60.8	58.5
Number of children (0-5 months)	602	320	282



[53] See the following for more information on breast milk and the immune system: Slade, H. B., & Schwartz, S. A., Mucosal immunity: The immunology of breast milk, *J Allergy Clin Immunol* 1987 Sep;80(3 Pt 1):348-58; Cunningham, A. S., Jelliffe, D. B., & Jelliffe, E. F. Breast-feeding and health in the 1980s: A global epidemiologic review, *J Pediatr* 1991 May;118(5):659-66; and Goldman, A. S., The immune system of human milk: Antimicrobial, anti-inflammatory and immunomodulating properties. *Pediatr Infect Dis J* 1993 Aug;12(8):664-71.

During the qualitative interviews, an overwhelming majority of respondents indicated that they breastfeed their children, and those who did not reported being physically unable to do so. It is unclear what physical conditions prevent them from breastfeeding or what factors lead them to use other methods to feed infants. Many respondents indicated breastfeeding is a strong cultural tradition within their community: "Right from our tradition, when a child is born, there is no other food given to an infant born except breast milk because a child can't eat the food that adults eat." Men and women alike reported that as soon as the mother gives birth, or shortly thereafter (within the hour), the infant starts to breastfeed. Respondents shared that when there is a delay of an hour or two between the time the woman gives birth and the time she starts breastfeeding, it is either due to the fact that the milk has not yet come in or to time needed to "clean up" after the delivery. One woman describes this process as follows: "When I give birth, now as a mother, I go and bathe, and if there is any porridge made, I take before the baby breastfeeds because by then there is no milk in the breast."

In most cases, both men and women indicated that the woman makes the decision to breastfeed. Individuals gave three common responses when asked where they learned about breastfeeding. Most frequently, they said that they just knew how to do it or that it had been passed down by family tradition and a mother or mother-in-law had helped with the process. The second most frequent response was that they had learned from village health teams or a traditional birth attendant.

When asked at what age women start introducing other foods, most indicated they begin to introduce soft foods such as porridge when the infant is 4-6 months old. Individuals said they introduce foods when the baby starts to indicate that it is still hungry after eating or when the mother becomes pregnant again. As one father in Kaabong shared,

> When a child reaches six months, it will be introduced to porridge because the breast milk may be getting less and less as the child grows. After the porridge, you start giving like simsim (sesame) or groundnut paste to accompany breast milk.

One woman indicated that she starts to introduce foods at four months to prepare the baby's stomach for the time when she returns to the garden, when someone else in the home will be responsible for feeding the child. While this explanation was reported only in a single case, additional formative research may be necessary to establish the relationship between the age at which infants 0-6 months are introduced to foods other than breast milk and mothers' work in gardening in farming. Qualitative data confirms the practice of continued breastfeeding of infants while foods are being introduced. When asked when a child stops breastfeeding, most respondents indicated that breastfeeding stops when the child begins to move around on its own through crawling or walking.

E. Childhood Illness and Prevention

During qualitative interviews, questions about childhood illness and prevention focused primarily on illnesses that commonly occur in the villages and measures taken by parents and other family members to prevent childhood illness. As indicated in the section on health care and maternal health, the illnesses most frequently named by respondents are respiratory problems, gastrointestinal problems (commonly referred to as a stomach ache), diarrhea, and malaria. When asked whether children suffer the same ailments as adults, most respondents indicated that they do. The ailments most frequently associated with children are diarrhea and malaria. When asked what treatment their children receive when they become ill, the majority of respondents said they take them either to a health care facility or to the village health team. Some, however, indicated that at times they take children to be treated by traditional healers or through the use of local herbs. Many reported selecting these treatments because a previous visit to the health facility was "unsuccessful," because the facility is too far away, or because they cannot afford it.

As described in the section on health, access to health care is one of the biggest challenges for all family members, not only the children, though children are, clearly, among the most vulnerable. Aside from mosquito nets and good hygiene, one of the most commonly agreed-upon measures families reported for preventing childhood illness is immunization. Key informants and community members indicate that

village health teams play a key role in encouraging vaccination and in helping community members understand how vaccinations might benefit their children. For example, when one respondent was asked why he had taken his children to be immunized, he responded, "It is what the community has agreed on, which is from the ministry of health. They mobilize all people to take the children for immunization and I also took mine." When another woman was asked why she took her children to be vaccinated, she stated,

> The reason is to protect my children from killer diseases. Especially when I am pregnant, I have to go for antenatal care to avoid giving birth to crippled children or a baby with complications. Even after giving birth, I still have to continue taking my children for immunization because the child can still be crippled after growing up.

It is clear that community members' responses to the "why" question reflect messages delivered by the village health teams. Respondents had been taught that vaccinations would help prevent diseases and that it is important to continue with the vaccination cycle, even as the children age, to prevent future illness.

When asked about what diseases vaccinations prevent, some respondents named certain diseases by memory, such as polio, tuberculosis, and measles. However, others responded by providing information about how the vaccine was administered, such as drops or an injection in a particular part of the body. When asked what vaccinations her child had received, one woman responded,

> The first time you take the child, the first injection is on the right-arm side, together with a vitamin A dropped in the baby's mouth. The second time the baby gets the injection on the left leg and also the third one on the same leg.

While quality of care may need to be strengthened and accessibility increased, the interview and focus group data indicate that, overall, respondents are able to seek treatment for their children when needed. Although respondents rarely mentioned the death of a child, it is possible that infrequent mentions of child deaths are due to the sensitivity of the topic; therefore, qualitative research findings should be collaborated with child mortality rates and causes of death in the Karamoja region of Uganda.

5. Conclusions

Data for the baseline study of title II development food assistance programs in Uganda were collected from February to April of 2013 in approximately 4,800 households in the seven districts of Karamoja. The household survey collected data for FFP and program indicators with regard to household hunger and food access; sanitation and hygiene; agriculture, household expenditures, and assets; and dietary diversity and anthropometry among women and children. The qualitative surveys collected additional data through interviews and focus groups with potential beneficiaries and key informants.

In line with the overall objective of the baseline study, key findings and conclusions with respect to the FFP and program-specific indicators are described below. These conclusions are based on findings from the household survey and the qualitative component. Additional analysis of data is possible, and the household survey data files are available to IPs for in-depth analyses to inform program design and monitoring.

5.1 Household Hunger

The household survey data show that about 73 percent of households suffer from moderate or severe hunger, with a higher prevalence in the northern Karamoja program area (76 percent) compared to the southern Karamoja program area (69 percent). Most of these households suffer from moderate hunger (65 percent), and 8 percent suffer from severe hunger. The prevalence of severe hunger is higher in the northern Karamoja program area (12 percent) than in the southern Karamoja program area (4 percent). The lean season for 2013 came early, with food supplies depleted two to three months before the normal

start to the lean season in March.[54] Since the prevalence of household hunger is based on the occurrence and frequency of food deprivation experiences within the past four weeks, the early depletion of food supplies may have contributed to these high rates of moderate and severe hunger.

Assuming that the multivariate regression model is causal, results for the southern Karamoja program areas suggest that increasing the use of sustainable agricultural practices, particularly in the case of intercropping; increasing the practice of value chain activities, particularly grading; and the use of improved storage practices might help reduce household hunger. Also, increasing the education level of the head of household may contribute to reducing household hunger. The model identifies several segments in the southern Karamoja program area that activities aimed at reducing household hunger might consider prioritizing. Households with elder dependents, households with younger heads of household, and households in districts other than Amudat are more likely than other households to suffer from hunger.

For the northern Karamoja program area, results from the multivariate models indicate that households in the Kotido and Abim districts are more likely to suffer from household hunger than households in Kaabong and households with a male head of household are more likely to suffer from household hunger than those with a female head of household.

5.2 Household Dietary Diversity

The HDDS score of 2.4 indicates that households are typically able to access and consume 2.4 of 12 basic food groups. Diets are primarily composed of cereals and tubers, with some legumes and vegetables. The HDDS is significantly higher in the southern Karamoja program area (2.7) than in the northern Karamoja program area (2.2). Again, the early depletion of food supplies may have impacted the availability and access to foods, leading to a lower HDDS score for the 2013 lean season. The DHO-ACF Nutritional Surveillance Program[55] reported an HDDS of 4.3 for the Karamoja region in the 2012 year lean season, and the World Food Program[56] reported an HDDS of 4.8 for Uganda as a whole (data collected from the UNPS in 2009-2010).

Data from the qualitative study indicate that accessibility of food is variable and is influenced by a number of factors, such as the season (rainy versus dry), the success of crop production, and access to an income that allows for the purchase of food. Wild foods during the rainy season add diversity to the diet that may not be available during the dry season. However, some individuals and families are solely dependent on such foods due to failure to raise their own crops and animals or insufficient economic resources to purchase what they need. How individuals fare during the dry season depends on their success with production and on their access to other sources of livelihood. In times of scarcity, individuals reported consuming one or two meals a day along with local brew to help keep them full.

The majority of food that individuals consume, according to qualitative data, is food they produce or forage. Most interview responses indicate that the primary female in the household, along with other women and girls in the household, makes decisions about what foods to prepare and perform the work of preparing food. Respondents identified three primary drivers for food selection and preparation: (1) availability, (2) taste or preferences, and (3) desire to diversify.

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[54] FEWS NET, Uganda Food Security Outlook, Jan.-June 2013. Retrieved from http://www.fews.net/docs/Publications/UG_OL_2013_01_en.pdf

[55] DHO-ACF and UNICEF Nutrition Surveillance Report (May 2012) *Nutrition Surveillance Karamoja Region, Uganda, Round 8, 2012*. Retrieved from: http://www.actionagainsthunger.org/sites/default/files/publications/DHO-ACF_Karamoja_Nutrition_Surveillance_Round_8_-_Final_Report_2012.05.pdf

[56] United Nations World Food Program (2013). *Comprehensive Food Security and Vulnerability Analyses (CFSVA): Uganda*. Retrieved from http://documents.wfp.org/stellent/groups/public/documents/ena/wfp256989.pdf

5.2 Poverty Levels

A total of 94 percent of the population in the survey areas lives in extreme poverty (less than $1.25 USD per day). Daily per capita expenditures are, on average, $0.56 USD per day, per person, with similar values in both program areas. The mean depth of poverty in the survey areas is 63.7 percent of the poverty line, with significantly deeper poverty in the southern Karamoja area (67 percent) than the northern Karamoja areas (62 percent).

Data from the Uganda National Household Survey IV[57] (Table 6.8) show that 25 percent of the Uganda population lives under the poverty line.[58] Additionally the UNHS survey data show that 75 percent of the population in the Northeast region (Table 6.9) is reported to live under the poverty line, noticeably higher than any other region of the country. The Northeast region, as defined in the UNHS survey, consists of the entire Karamoja region and a number of neighboring districts.

Analysis of qualitative findings identified six primary sources of income: making charcoal, gathering firewood, producing local brew, engaging in small-scale agricultural production, working as hired labor in private gardens, and "casual labor." Most of this work, as reported by potential beneficiaries, is inconsistent and undertaken on an as-needed basis. The incomes of those interviewed were generally insufficient to cover all nutritional needs, health care needs, and other necessities.

The qualitative data indicate that, while the man or head of household is named as the primary decision maker for finances in the household, women are beginning to contribute to decision-making responsibilities for the household in conjunction with the male head of household, as well as other members of the household.

5.3 Water, Sanitation, and Hygiene

About 40 percent of households reported using an improved drinking water source, mainly boreholes and 77 percent of households said they did nothing to ensure the water was safe to drink. There were no differences between program areas for these indicators. These rates are much lower than those reported in the 2011 DHS,[59] wherein approximately 66 percent of all rural Ugandan households reported using an improved drinking water source and 38 percent of households reported boiling their water.

Qualitative data suggest that a major contributing factor to the low level of hygiene in the program area is lack of access to a water source. Most respondents in the qualitative study indicated that there are not a sufficient number of boreholes, that they break down often, or that they are a substantial distance from where individuals live. In fact, when asked about the greatest needs in the villages, respondents frequently named new boreholes or closer access to water as a basic need.

Only 15 percent of households reported using an improved sanitation facility (non-shared) during the daytime, either a ventilated pit latrine or a pit latrine slab. The majority of households do not use any facility (70 percent) or use an open pit (12 percent). About 28 percent of households reported having access to a sanitation facility of any type. The results for the sanitation indicator are similar to those reported in the DHS survey, with 15 percent of all rural Uganda households using a non-shared improved sanitation facility.

Soap or another cleansing agent was observed at the hand washing station in only 8 percent of households. The 2011 DHS survey reported a rate of 27 percent with water and soap at the hand washing stations for rural Ugandan households and only 1.6 percent with water and soap in the Karamoja region

[57] Uganda National Household Survey, Socio-economic Module. Abridged Report (November 2011). Retrieved from http://www.ubos.org/UNHS0910/unhs200910.pdf
[58] The poverty line in the UNHS is not clearly defined and is likely to differ from the $1.25/day USD used in the Title II baseline study
[59] Uganda Demographic and Health Survey (2011). Retrieved from http://www.measuredhs.com/pubs/pdf/FR264/FR264.pdf

(note that the DHS survey was conducted in about 22 villages in the Karamoja region, a much smaller sample than that of the Title II baseline study).

The household survey results indicate that 70 percent of household survey respondents are able to name three of five critical moments for hand washing. This finding is supported by the qualitative interviews, during which individuals identified preferable hygiene practices.

5.4 Agriculture

Overall, 91 percent of farmers reported raising crops (mainly maize, sorghum, and beans) and one-quarter reported raising animals (mainly cattle, goats, and chickens). The average number of crops produced per household is 2.6.

According to qualitative findings, agriculture is a major source for generating income and livelihood for the family. The primary objective of farming is subsistence, with sales occurring in the event of excess yields. Because of the fluctuating nature of the crop yield, respondents rely on additional sources of income to meet household needs.

Overall, 17 percent of farmers reported using at least two sustainable crop practices, and 12 percent reported using at least two sustainable livestock practices (for goats and cattle). Although most farmers still prepare their soil by hand (89 percent), soil preparation with ox plow (23 percent of farmers) and intercropping (20 percent of farmers) are the most commonly reported sustainable practices. About 16 percent of farmers reported using at least two sustainable NRM practices, and half of farmers reported using improved storage practices, including cereal banks/silos or granaries.

The qualitative data indicate that the majority of agricultural decisions are made either solely by males or jointly between men and women. In cases where women and men make decisions jointly, women's input tends to focus on the storage and preparation of crops for future use, whereas men tend to decide which crops the household will cultivate. The results for the five domains of empowerment index from the WEAI indicate that 42.4 percent of women are considered empowered in agriculture, compared to 62.3 percent of men.

5.5 Women's Health and Nutrition

The nutritional status of women ages 15-49, as measured by BMI and height, indicate that almost one-quarter (23 percent) are underweight (BMI < 18.5. DHS survey results show 13 percent of woman 15-49 in rural Uganda households are considered underweight, but 33 percent of women ages 15-49 in Karamoja are underweight (only 63 women were measured).

Only 1.7 percent of women ages 15-49 are short in stature (less than 145 cm). Short maternal height has been shown to be a risk factor for poor child health outcomes including stunting, underweight, wasting, low birth weight and intrauterine growth retardation.[60,61]

The household survey results show poor dietary diversity among women, with an extremely low consumption of eggs and organ meats. Women consume, on average, 2.3 of nine basic food groups. Almost all consume grains, roots, and tubers, while only half consume green leafy vitamin A-rich vegetables.

Overall, three-quarters (77 percent) of female caregivers of children ages 0-59 months reported that they make decisions about health care for themselves and for their children either alone or jointly with their partner. When asked about family planning, almost half of women ages 15-49 indicated they are aware of

[60] Subramanian SV, Ackerson LK, Davey Smith G, John NA. Association of Maternal Height with Child Mortality, Anthropometric Failure, and Anemia in India. *JAMA.* 2009;301(16):1691-1701. doi:10.1001/jama.2009.548.

[61] Maternal anthropometry and pregnancy outcomes: a WHO Collaborative Study. *Bull World Health Organ*. 1995;73:(suppl) 1-98

where to go to receive family planning services. Less than 25 percent of female caregivers of children under five years of age were able to identify at least seven of 14 important IYCF and MCC practices.

According to the qualitative data, the majority of respondents acknowledged an improvement in the health of the community in recent years, yet discussions about community needs frequently included health facilities, medication, and illness prevention. Across all regions, the most common illnesses discussed were malaria, diarrhea, and cough/cold. In discussing causes of disease, major topics of concern for many respondents were limited access to health care facilities, lack of proper hygiene, and limited prevention mechanisms for diseases like malaria. Overall, respondents have trust in health service providers and mentioned an improvement in health care services; however, they also rely on traditional medicine, including traditional birth attendants and what some respondents refer to as "witch doctors."

More than half of women (60 percent) reported attending four or more antenatal visits, which is higher than the DHS rate of 46 percent in rural households (includes women who had a live birth within the past five years). This rate may be influenced by other ongoing maternal and child health programs in the areas and possibly over-reporting of a more socially acceptable behavior. More women in the southern Karamoja program area reported attending four or more antenatal visits (75 percent) than women in the northern Karamoja program area (49 percent).

With regard to decision making around antenatal care, the majority of women and men interviewed in the qualitative study, regardless or region, said women are the main decision makers. In cases where women are unable to deliver at the health center, usually because of distance, traditional birth attendants, midwives, or VHTs help in the delivery process. Even when births take place at home, the majority of women interviewed still take their children to the health center for immunizations.

5.6 Children's Health and Nutrition

More than one-third (37 percent) of children under five years of age in the household survey are moderately or severely stunted, and 21 percent of children under five years of age show signs of being moderately or severely underweight. In comparison, rates of stunting in the 2011 DHS were 36 percent in rural households and 19 percent in urban households, and rates of underweight children were 15 percent in rural households and 7 percent in urban households.

Results from the multivariate regression models indicate that increasing the general education level of primary caregivers might improve stunting rates in the northern Karamoja program area. The model also indicates that stunting rates are higher in the Kotido and Kaabong districts compared to the Abim district.

In the southern Karamoja program area, the regression results indicate that reducing diarrhea in children under five years of age may help to improve stunting outcomes. Children in districts other than Nakapiripirit have higher stunting rates, as well as households that raised crops and those with fewer adults.

Overall, 22 percent of all children under five years of age had diarrhea in the two weeks preceding the survey (similar to the DHS 2011 rate of 24 percent in rural households and 22 percent in urban households). Of the children with diarrhea, caregivers reported that 31 percent had blood in their stools, giving cause for concern at this high level of complicated diarrhea (7 times higher than the DHS rate of 4 percent in rural households). There are no differences in the prevalence of diarrhea between the two program areas.

Caregivers seek advice or treatment for a majority of the children with diarrhea and 88 percent of children with diarrhea are treated with ORT. More children in the northern Karamoja program area with diarrhea are treated with ORT (93 percent) than children in the southern Karamoja program area (83 percent). While these results appear to be high, they are similar to results obtained in the 2011 DHS in the Karamoja region, which found that 77 percent of children under age five who had diarrhea in the two weeks preceding the survey were receiving fluid from ORS packets, and as many as 93 percent were receiving any type of ORT, including increased fluids.

Overall, 60 percent of children ages 0-5 months are exclusively breastfed (the 2011 DHS rate is 63 percent for all of Uganda). Only 4 percent of children ages 6-23 months are receiving a MAD, with the dietary diversity component contributing more to this result than the feeding frequency component. A higher percentage of children in the southern Karamoja area are receiving a MAD (7 percent) than in the northern Karamoja program area (2 percent). The DHO-ACF and UNICEF Nutrition Surveillance Report (May 2012) reported that 18 percent of children ages 6-23 months in Karamoja were receiving a MAD.[62]

The overwhelming majority of women interviewed in the qualitative study indicated they breastfeed their children. Many indicated that this is a strong cultural tradition within their community. In most cases, both men and women indicated that the woman makes the decision to breastfeed, or implied that it is a natural course of action. This high level of breastfeeding is an important factor in predicting the future health of children, and might possibly be a reason that stunting levels are lowest for children ages 6-8 months. When asked at what age they begin to introduce other foods, most women indicated they begin to introduce soft foods such as porridge when an infant is 4-6 months old. Even as solid foods are introduced, many infants continue to breastfeed until they begin to walk.

[62] The definition for MAD for the DHS is similar but not directly comparable.

Annex 1: Sampling Plan for Title II Baseline Studies

Annex 1
Sampling Plan for Studies of Title II Development Assistance Programs in Guatemala, Niger and Uganda

Background

In accordance with the evaluation policy of the U.S. Agency for International Development (USAID), Food for Peace (FFP) has contracted with ICF International to conduct a baseline study in Guatemala, Niger, and Uganda for new Title II program awards (July 2012) in these countries. The quantitative component of the baseline survey will be standardized across the participating countries to permit comparative analysis and will collect data for 20 FFP indicators as described in the USAID FFP *Standard Indicator Handbook*. These indicators are related to food access; children's nutritional status and feeding practices; women's nutritional status and dietary diversity; water, sanitation, and hygiene; agricultural practices; and measurements of poverty. In addition to the required FFP indicators, the quantitative survey will also include a small set of program-specific indicators identified by the Title II implementing partners as key measures for their individual programs. The survey design for the quantitative baseline survey will be described in detail in the following document. Most of the details of the survey design were decided upon at a joint meeting with the ICF International in October, 2012. See Appendix A for the minutes of that meeting.

Survey Research Design

These baseline surveys will serve as the first phase of a pre-post survey cycle with the second phase being conducted at the end of the five-year Title II program. Thus, the primary objective of the baseline surveys will be to assess the status of the FFP and program indicators prior to program implementation. The baseline measurements will then be used to calculate change in these indicators (and to undertake a statistical test of differences in the indicators) at completion of the five-year Title II cycle when the same survey will be conducted again in the program areas. This pre-post design will allow the measurement of change in indicators between the baseline and final evaluation; but will not allow statements about attribution or causation to be made.

The baseline surveys will be designed as population-based surveys in the villages/communities selected by the Title II implementing partners in the designated geographic regions of operation. Thus, the sampling frame for each country will only include villages/communities in the geographic regions where the Title II partners are implementing their programs, and will exclude villages/communities where programs are not active. From this frame, a representative sample of villages/communities will be drawn for each Title II partner within each country. Within each sampled community, a representative sample of households and individuals (that includes both beneficiaries and non-beneficiaries) will then be drawn.

Sampling Frame

The sampling frames for each country will be constructed from lists of communities/villages provided by the Title II partners and complemented with census-level household and population

information in order to assign a measure of size to each selected community. The last available census level information for the geographic regions in each country at the lowest enumeration level will be used. Since the most current census data available in all of these countries is ten or more years old, it is expected that household and population counts will have changed and that newly formed communities will not be represented. ICF will work with the Title II partners to add missing communities and match census-level data with their implementation communities in order to obtain the most up-to-date size information. Appendix B provides summary counts of the implementation communities for each country and program.

Sample Design

Given the availability of size measures for each selected community, cluster sampling with a method that approximates PPS (probability proportional to size) will be used to select communities for each Title II program (two in Guatemala, two in Uganda, and three in Niger). The sample size for each program will be determined based on the selection of one FFP indicator. At the sampling meeting held with FANTA in October 2012, it was agreed that stunting will be used as the primary indicator for deriving sample size estimates since it is a key measure for food insecurity and will provide enough households to measure desired change levels for most other indicators. Additionally, some criteria for sample size calculations were adjusted from ICF's original proposal based on feedback from FANTA. Assumptions for updated sample size calculations for each Title II program are as follows:

- design effect of 2,
- confidence level of 95%,
- power level of 80%,
- expected change in stunting over the life of the program of 6 percentage points,
- use of the Stukel/Deitchler Inflation and Deflation Factors to determine the appropriate number of households (with children aged 0-59 months) to select, as described in the FANTA Sampling Guide Addendum, and
- inflation of the sample size of households by 10% to account for anticipated household nonresponse;

The formula used for deriving sample size is based on a statistical test of the difference of proportions (or prevalence) for an indicator (e.g., from baseline to final evaluation), controlling for inferential error as described in Appendix 1 of the Addendum to FANTA Sampling Guide (March 2012). The table below provides the target sample sizes for each Title II partner program in each country using currently available estimates for the prevalence of stunting and household size in each country. Use of the above assumptions and the revised formula did not significantly alter the sample size calculations provided in ICF's original proposal and, therefore, have no significant cost implications.

Annex 1
Sampling Plan for Studies of Title II Development Assistance Programs in Guatemala, Niger and Uganda

	Target population for Stunting	Estimated proportion of Population (A)*	Average Household size (B)*	Individuals per HH (A*B/100)	Estimated Prevalence of Stunting*	Detectable Change |P2-P1|	Individual Sample Size Needed	Household Sample Size Needed	Households with 10% Non-response
Guatemala	Children 0-59 months	16.0	5.2	0.8	0.48	0.06	1,694	2,695	2,965
Uganda	Children 0-59 months	19.2	5.0	1.0	0.38	0.06	1,557	2,208	2,429
Niger	Children 0-59 months	20.0	6.1	1.2	0.47	0.06	1,686	1,981	2,377

**Source for Guatemala: 1995 DHS; Niger & Uganda: 2006 DHS*

Note: For Niger, nonresponse rate was assumed to be 20%

Based on the target sample sizes calculated above, ICF will sample 75 clusters with 40 households per cluster for each Title II program in Guatemala (2 programs), and 80 clusters with 30 households per cluster for each Title II program in Uganda (2 programs) and Niger (3 programs); resulting in an overall household sample size of 6,000 in Guatemala, 4,800 in Uganda, and 7,200 in Niger.

Treatment of small villages/communities on the frame

At the October 2012 meeting, two options were identified for handling communities on the sampling frame that are smaller (as defined by the number of households in the community) than the projected sample take of households per community at the second stage of sampling. These options are:

1. Eliminating such communities from the frame before sampling, provided the total of such eliminated communities constitutes a very small proportion of all households on the frame (2%-3%); or
2. Combining small communities together on the frame before sampling. It was noted that this second approach could lead to logistical issues related to travel between the combined communities (given their potential non-contiguity), should a combined pair be selected in the sample.

After assessment of the communities with less than the required number of households in each of the community lists provided by the Title II partners, it was decided to adopt the first option since these communities constituted a very small percentage (<2%) of the overall number of households for each program area.

First stage cluster sampling of villages/communities

Although surveys typically use PPS sampling (with replacement) at the first stage of sampling, the drawback of this method is that there is an inherent chance of selecting the same community twice. Therefore, an alternative method that essentially approximates PPS sampling will be used instead. For this method, communities on the frame are ordered in decreasing size (relative to the number of households within), and then separate strata are formed for large, medium, and small communities (for example). The precise number of strata that are formed depends on the

overall number of communities to be sampled and the number of communities on the sampling frame. Finally, an identical number of communities are randomly selected within each size stratum using systematic sampling. This method has the advantage of ensuring that large, medium, and small communities are selected in the sample. Furthermore, this method minimizes the possibility of selecting the same community twice. See Appendix C for an illustrative description of the method.

An additional consideration for the first stage of sampling is to ensure that some sampled communities fall within each of the departments and/or districts in which each program operates. In order to ensure representation in each of the specific geographic departments/districts, the "universe" of communities will first be stratified by department/district and a fraction of the total communities per Title II partner will be proportionately allocated to each department/district for sampling. Then the "universe" of communities within each department/district stratum will be ordered by decreasing household size to form "size strata", in accordance with the method described in the paragraph above.

See Appendix D for further details of the first stage sampling methods used for each Title II program in each country.

Treatment of large villages/communities: potential segmentation of communities

ICF will work with their subcontractors to develop boundary maps for each cluster using GIS coordinates provided by the Title II partners or the Census files. Prior to the second stage sampling of households, the selected communities will either be canvassed on the ground OR Google earth maps will be produced (using GIS boundary coordinates) in order to assess the density and placement of households within the community; and to identify barriers that might prevent free access to households (such as rivers, mountains, impassable roads, etc.). After assessment of each cluster, decisions regarding segmentation of larger clusters will be made. For those clusters where segmentation is needed (i.e., in very large clusters where an enumeration would be difficult to undertake by one interviewer), interviewers will be dispersed among the segments and random starting points will be selected within each segment. Note that if segmentation is deemed necessary, sampling will take place in *all* segments. Note also that if a cluster is segmented into three parts (for example), 10 households per segment will be selected at the second stage of sampling to ensure that a total of 30 households are selected across the entire cluster as originally envisaged (for Uganda and Niger).

Second stage sampling of households

The selection of households will be done in the field using a systematic sampling method. This method entails: 1) randomly choosing a starting point between 1 and n (the sampling interval) where the household labeling 1, 2, …., n commences at one end of the cluster; 2) conducting an interview in the first household represented by the random starting point; and 3) choosing every

n^{th} household from the previous one thereafter for an interview (where n is the sampling interval and equals the total number of households in the cluster divided by 30 or 40), until the entire cluster has been covered and the target number of interviews has been obtained. Specific instructions on implementing the systematic sampling will be provided to supervisors during training and in the field procedures manual.

Third stage of sampling: Multiple households within dwellings and/or polygamous households

The standard DHS definition of a household will be used: "a person or group of people who live together and share meals ("eating from the same pot"). The DHS Interviewer manual provides several definitions and examples for different types of living arrangements. For men with more than one wife (polygamous situations), the norm is to count him where he spends most of his time. So if he has three wives, but "eats from the pot" of one of the wives most often, then he would be listed as being a usual resident in her household in order to avoid duplicate counting. However, if the man is considered to be the primary farmer in all three households and the household in which he is listed is not selected for sampling (although one of the other two households is selected), than it will be preferable to interview him as the respondent for the information related to the agricultural indicators

Another common living arrangement in the Karamoja region is the so-called "big girls". These are young women, linked to a man, who has not yet paid the dowry. These women may have children, but their work is still related to the father's household. The "husband" is only a visitor. These women live in individual huts belonging to the father's compound. For the Title II surveys, these women will be considered part of their father's household as long as they are "eating from the same pot"; otherwise they will be consider as a separate, distinct household.

If there is more than one household (family) living in a dwelling, but all members of the dwelling eat from the same pot, then all members will be treated as one household and all members will be listed on the same household roster, for the purposes of sampling. However, if related households live in distinct huts in a compound dwelling (such as a manyatta in Uganda), then one household will be randomly selected from amongst them. Note that this case implies an additional stage of sampling with an associated additional sampling weight.

Fourth stage of sampling: Selection of individuals within households

The quantitative survey is broken into several modules with different individuals eligible to be interviewed, depending on the target groups relevant to the various FFP indicators. This means that, depending on the composition of a sampled household, it may or may not contain children aged 0-6 months (relevant to exclusive breastfeeding indicator), children aged 0-23 months (relevant to minimum acceptable diet indicator), children aged 0-59 months (relevant to the diarrhea, oral rehydration therapy, stunting and underweight indicators), women of reproductive age (relevant to woman's dietary diversity and BMI indicators), farmers (relevant to agricultural

indicators), or heads of households/responsible adults (relevant to the household dietary diversity scale and expenditures indicators).

The household roster will be completed at the beginning of the interview, thus identifying all members of the selected household. Based on discussions during the baseline planning workshops held in each country with ICF, FANTA, FFP, and the Title II partners, the protocol for selection of individuals within households is defined as follows:

- For the modules requiring data about the household, the head of household or any responsible adult will be interviewed.
- For the children's module, the mother or caretaker of the children under age 5 will be interviewed. Data and anthropometry measures will be collected for *all* eligible children and thus *no* additional sampling weight will be needed in this case.
- For the woman's module, one woman between the ages of 15-49 will be selected. If there are multiple women eligible to be interviewed within a sampled household, a Kish grid will be used to select only one and the associated sampling weight will be computed. Note that if a pregnant or lactating woman is selected, her anthropometric measurements will be collected, although her measurement will not contribute to the estimation of the BMI indicator.
- For the agricultural module, farmers within the household who have ownership or decision-making power over all plots of land and/or livestock that are part of the "farm" will be interviewed. If in a particular household, this implies one farmer then only that farmer will be interviewed. If, however, one farmer makes decisions about the crop management practices and another farmer makes decisions about the livestock management, then each farmer will be interviewed for their respective decision-making areas. *It was also* agreed that if the primary farmer has migrated for an extended period to work outside of the household, the spouse and/or another responsible adult farmer that can answer the agricultural questions will be interviewed. For the agricultural module, since the "farm" (including the plots of land, livestock, etc) is the sampling unit and the farmer(s) are respondents in relation to the farm, there is no random selection implied and thus no additional sampling weight required.

Sampling Weights

Sample weights will be computed and used in the final data analyses. This will involve computing an overall sampling weight consisting of the product of the weights from each of the stages of sampling, as well as an adjustment to compensate for household non-response at the second and third stages of sampling. Separate sampling weights will be derived for each program area and for each target population, i.e. households, women, children and farmers.

APPENDIX A
NOTES FROM OCTOBER 10, 2012 MEETING ON SURVEY DESIGN

Summary Notes for Meeting on Survey Design for the Baseline Studies for Title II Programs in Guatemala, Uganda and Niger (written and sent by [redacted] from FANTA)

Date: Wednesday, October 10, 2012, 11 am-5 pm

In Attendance: ICF International ([redacted]); FANTA ([redacted])

Apologies: Alexandra Riboul (FFP)

Agenda Items for Discussion and Summary of Decisions Made:

1. *Meaning of "Population-Based" Survey*
    - It was agreed that for the purposes of title II, the sample frame would include all villages/communities in which the PVOs were implementing their programs, and would exclude those in which programs were not active. From this frame, a representative sample of households and individuals (that would include both beneficiaries and non-beneficiaries alike) would be randomly drawn.

2. *Choice of Indicator to drive sample size*
    - FANTA distributed a hand-out (see attachment) with a table that reworked some of the sample size calculations given by ICF (Table 1 in their original proposal), based on a few revised assumptions (different detectible change, different inflation factor, different household response rate). Regardless, in both the original ICF table and the reworked table, the indicator related to stunting seemed to give rise to a sample size that was both adequate and feasible (and both versions of the table gave identical sample sizes of roughly 3,000 households). Therefore, it was decided that stunting should drive the sample size calculation and that the overall sample size should be roughly 3,000 households (per PVO in each country). Given this, it could be expected that this would yield roughly 2,700 responding households (per PVO in each country), and after screening, roughly 1,700 children (per PVO in each country) under the age of 5 years old (relevant for the stunting and underweight indicators).

3. *Choice of formula to drive sample size calculation*
    - FANTA mentioned that a somewhat different formula was used to calculate the sample size in the revised table based on a test of differences for proportions – from that which was given in the original FANTA Sampling Guide. In FANTA's opinion, the new formula is preferable to the one in the Sampling Guide because it more aptly characterizes the test of hypothesis that should be undertaken. Regardless, the original sample size formula and the new one render results that differ only negligibly (less than 5 units), and therefore, it was noted that there are no cost implications to using the new formula. Diana mentioned that she would send ICF the new formula (that would also appear in the future updated FANTA Sampling Guide) and ICF agreed to use the new formula in all future calculations.

4. *Choice of inflator to determine number of households to sample to ensure the required sample size of individuals (if indicator to drive sample size is based on individual)*
    - FANTA noted that in their original proposal, ICF had used the sample size inflator indicated in the original FANTA Sampling Guide (1997) – but that instead they should

use the updated sample size inflator given in the recently published Addendum (2012) to the FANTA Sampling Guide. ICF agreed with this.

5. *Choice of non-response inflation factor and field strategy for non-response follow-up*
    - FANTA suggested that the assumed 5% non-response rate in Table 1 of the ICF proposal might be somewhat of an underestimate of what is truly required, and that 10% might be a more realistic non-response rate to expect at the household level. ICF noted that their value of 5% was based on the assumption of a short questionnaire that would not invoke much household non-response. ICF agreed to revisit this issue later.

6. *Source and content for frame of clusters*
    - ICF noted that it would not be difficult for them to obtain Census information to build a frame of communities for Uganda and Niger. However, they noted that Guatemala would present more of a challenge. ICF asked if it might be possible to contact FTF (through FFP) to enquire after the source of the frame for FEEDBACK.
    - It was noted that ICF would put together draft frames for each country, based on the broad geographic areas in which the PVOs proposed to work - and that the PVOs should then indicate in which of the communities on the draft frames they intend to implement their programs. ICF could then eliminate the communities where PVOs do not intend to implement programs from the draft frame, and use this refinement to form their final frame from which to draw communities randomly.
    - ICF wondered if it would be possible to obtain from the PVOs detailed maps of the geographic areas in which they intend to work.
    - ICF mentioned that they may need assistance with regards to community names on the sampling frame. They noted that, in their experience, often the same community could have more than one name. ICF hoped that the PVOs could help them arrive at a common set of names for the communities on the frame that both parties could adhere to.

7. *Stratification – by PVO and potentially by other levels*
    - It was agreed that in each country, separate strata would be formed for each PVO, and that estimates would be produced by stratum/program as well as at the overall cross-program level within each country.
    - FANTA mentioned that sometimes, PVOs implement the MCHN component of their programs in a subset of the communities where the agricultural component is implemented. Given that the intention is to spread the baseline sample across the entire geographic area where PVOs implement their programs, this could lead to results on indicators relating to MCHN showing diluted results, given that some of the sample could fall in the non-MCHN implementation zones. This was simply noted as a potential issue and but that no action need be taken other than indicating this in the analytical reporting.
    - FANTA introduced the idea that there could be further stratification by other geographies (and a potential further refinement of sample allocation of communities to those strata). However, later in the meeting, it was agreed that in light of the discussion in 8 a), it might be best to put this idea to one side, as the alternative methodology discussed in 8 a) already invokes further stratification.

APPENDIX A
NOTES FROM OCTOBER 10, 2012 MEETING ON SURVEY DESIGN

8. *First stage sampling*

   a) *PPS/WR of clusters or alternative method*
      - FANTA introduced the issue that traditional PPS sampling *with replacement* has the disadvantage that the same communities have the potential to be selected twice in the sample. FANTA distributed a handout and discussed a possible alternative to traditional PPS WR (see attachment). For this alternative strategy, the communities on the frame are ordered in decreasing size, and then a number of separate strata are formed for large, medium and small communities. Finally, communities are randomly selected with each stratum using systematic sampling. This alternative method has the advantages of i) it being very unlikely that the same community is selected twice and ii) ensuring that some large, some medium-sized and some small communities are selected in the sample. ICF said they would review the methodology and come back at a later date with a final decision. (Note: ICF ultimately decided to adopt this methodology.)

   b) *Treatment of small villages/communities*
      - FANTA asked ICF how they intended to treat communities on the sampling frame that are smaller (as defined by the number of households in the community) than the projected sample take of households per community at the second stage of sampling. Several options were discussed including:
        - i) eliminating such communities from the frame before sampling, provided the total of such eliminated communities would only constitute a very small proportion of all communities on the frame (2%-3%); or
        - ii) combining such small communities together on the frame before sampling. It was noted that the second approach could lead to logistical issues related to travel between the combined communities (given their potential non-contiguity), should a combined pair be selected in the sample.

        ICF agreed to revisit this issue after the frame was constructed.

   c) *Issue of segmentation of large villages/communities*
      - ICF mentioned that the DHS typically uses segmentation of large communities and that they also intend to do so for the Title II baseline surveys. The variant of segmentation that ICF uses divides large communities into smaller segments, and then different teams cover the divided pieces. No sub-sampling is typically undertaken.

   d) *Potential shadow sample of replacement village/communities*
      - It was mutually agreed that the discussion of this topic should be relegated to the workshops to take place in each country, given that the PVOs would be in a better position to give advice regarding communities that might be potentially problematic for interviewing – because of security, access, or other reasons.

9. *Second stage sampling – systematic with listing or alternative methods*

- ICF agreed that they would adopt a second stage sampling scheme involving canvassing of the selected communities followed by the random selection of households using systematic sampling. ICF explained that they typically establish the boundaries of a selected community using GPS. They then obtain a rough count of the community by canvassing. Two teams are typically used per community, where each team consists of 5 enumerators/supervisors. ICF confirmed that alternate non-probability-based methods, such as Random Walk, would not be employed for the Title II baseline surveys.

10. *Treatment of multiple households within dwellings and/or polygamous households*
    - It was mutually agreed that the discussion of this topic should be relegated to the workshops to take place in each country, as each country has its own specific context that needs to be considered.

11. *Selection of individuals within households*
    - ICF agreed that they would interview all eligible individuals belonging to the target groups relevant to the various indicators for which data is to be collected within each sampled household. This means that, depending on the composition of a sampled household, it may or may not contain children aged 0-6 months (relevant to EBF indicator), children aged 0-23 months (relevant to MAD indicator), children aged 0-59 months (relevant to stunting and underweight indicators), women of reproductive age (relevant to WDDS and BMI indicators), farmers (relevant to agricultural indicators), etc. It was agreed that, when a selected household contains individuals falling in any of the target groups, all individuals in the target group relevant to the indicators for which data is to be collected will be interviewed.

12. *Sampling weighting*
    - ICF agreed that they would compute and use sample weights in the final data analyses. This will involve computing an overall sampling weight consisting of the product of the weights from each of the stages of sampling, as well as a final adjustment to compensate for household non-response.

APPENDIX B
SUMMARY OF COMMUNITY LISTS USED FOR SAMPLING FRAMES

Guatemala

1. CRS SEGAMIL Program
    - 259 communities in 2 departments, 8 municipalities
    - 117 of these were new communities not on census list
    - all communities have size measure (number of households); CRS provided size measures for new communities
    - 33 communities with fewer than 40 households (1.9% of all households)
2. SAVE PAISANO Program
    - 198 communities in 3 departments, 13 municipalities
    - 28 of these were new communities not on census list
    - all communities have size measure (number of households); SAVE provided size measures for new communities
    - 27 communities with fewer than 40 households (1.2% of all households)

Uganda

1. Mercy Corps SUSTAIN Program
    a. 762 villages in 3 districts
    b. Size measures available for 722 villages, 548 matched to census list, 174 provided by Mercy Corps from World Food Program
    c. Size measures missing for 40 villages
    d. 61 of the 722 villages with size measures with fewer than 30 households (1% of all households with size measures)
2. ACDI/VOCA RWANU Program
    a. 402 villages in 4 districts
    b. Size measures available for 266 villages matched to census files, missing for 136 new villages
    c. 8 of the 266 matched villages with fewer than 30 households (0.6% of all households with size measures)

Niger

1. SAVE LAHIA Program
    a. 207 villages in 1 department, 5 communes
    b. 55 of these are new villages not on census list
    c. All villages have size measures (SAVE provided updated household and population counts for all 207 villages)
    d. No communities with fewer than 30 households (smallest is 39)

2. CRS PASAM TAI
    a. Provided CRS with list of 1,824 villages in selected departments and communes, based on census files
    b. 777 villages on census list were confirmed by CRS for program area, 422 were identified as maybes, the remaining 625 were not included in program area
    c. CRS provided a second list with household and population counts for 897 selected villages
    d. Of the 897 villages provided on second list, 149 of them had fewer than 30 households (0.2% of all households)
3. Mercy Corps SAWKI Program
    a. Mercy Corps sent list of 81 villages (80 after one duplicate was removed) in 2 departments, 7 communes
    b. 75 villages matched to census files representing 107 enumeration areas
    c. Size measures missing for 5 villages
    d. Of the 107 enumeration areas with household counts, 6 had fewer than 30 households (1% of all households with size measures)

APPENDIX C
ILLUSTRATIVE EXAMPLE OF MODIFIED PPS SAMPLING METHOD

Scenario: Want to select 30 villages at first stage of sampling, and 30 HH per village at second stage of sampling. Typically use PPS with Replacement (WR) at first stage and systematic sampling at second stage. Assume the frame has 60,000 HH overall

1) *Alternative Method to Traditional PPS With Replacement*

- Order all villages on frame in decreasing order of size (# households per village)
- Divide villages into arbitrary number of strata (say, 6), ***each of roughly equal size***
- Stratum 1 has a small number of large villages and stratum 6 has a large number of small villages.
- E.g.,
    - Stratum 1 has 10 villages each with roughly 1,000 households each (***10,000 HH overall***)
    - Stratum 2…….
    - Stratum 6 has 100 villages each with roughly 100 households each (***10,000 HH overall***)

- Then
    - Stratum 1 – Select 5 villages from ordered list using systematic sampling; Select 30 HH per selected village using systematic sampling
    - Stratum 2….
    - Stratum 6 – Select 5 villages from ordered list using systematic sampling; Select 30 HH per selected village using systematic sampling

- What is the combined probability of selection from the combined stages?
    - Stratum 1: Pr(overall)= Pr(stage one)*Pr(stage two) = (5/10) * (30/1,000) = **15/1,000**
    - Stratum 2: ….
    - Stratum 6: Pr(overall)= Pr(stage one)*Pr(stage two) = (5/100) * (30/100) = **15/1,000**

- Overall probability of selection is approximately same for each stratum: 15/1,000!!!

2) *Traditional PPS WR Sampling*

- No stratification, simply select 30 village with PPS WR at first stage, followed by 30 HH per selected village using systematic sampling at second stage
    - For a village from Stratum 1,

    Pr(overall)= Pr(stage one)*Pr(stage two) = (30*1,000/60,000) * (30/1,000) = **15/1,000**

    - For a village from Stratum 2,….

    - For a village from Stratum 6,

    Pr(overall)= Pr(stage one)*Pr(stage two) = (30*100/60,000) * (30/100) = **15/1,000**

Overall Advantages of Alternative Method

- Approximately same overall probabilities using alternative method as with PPS WR followed by systematic sampling
- Closer to PPS without replacement sampling (PPS WOR) in that much less likely to select the same village twice (Key advantage)
- Very easy to implement since essentially systematic sampling at first stage

APPENDIX D
SUMMARY OF FIRST-STAGE SAMPLING METHODS FOR EACH TITLE II PROGRAM

Guatemala

Aim: Select 75 communities for each Title II program (SEGAMIL and PAISANO)

1. Remove communities with fewer than 40 households from the sampling frame.
2. Proportionately allocate the 75 communities to be sampled for each program to the departments where each program operates (two departments for CRS/SEGAMIL; three departments for SAVE/PAISANO); use total number of households in each department to determine the allocation.
3. Order the communities within each department/stratum by decreasing household size.
4. Examine the distribution of number of households for the communities within each department/stratum to determine appropriate cut-off points for the "size" strata to be used at the first stage of sampling (stratified systematic sampling)

Uganda

Aim: Select 80 villages for each Title II program (SUSTAIN and RWANU)

1. Remove villages with fewer than 30 households from the sampling frame.
2. Proportionately allocate the 80 villages to be sampled for each program to the districts where each program operates (three districts for Mercy Corps/SUSTAIN; four districts for ACDI/VOCA/RWANU); use total number of households in each district to determine the allocation.
3. For villages with size measures, select villages using the same sampling procedure described for Guatemala above in steps 3 and 4.
4. For villages without size measures, use stratified (by district) systematic sampling.
5. To determine the number of villages (from amongst the total of 80 for each program) to sample for each group (those with size measures and those without) at steps 3 and 4, calculate the proportion of total villages for each group and then multiply this number times 80. For example, 177 villages out of 207 have size measures for the SUSTAIN program which represents 86% of the 207 villages. So, 68 villages (0.86 times 80) will be sampled from this group, and the remaining 12 villages will be sampled from the group without size measures.
6. Sampled villages with unknown numbers of households may or may not meet the criteria for 30 or more households. Village sizes for these villages will be determined in the field. Any sampled villages found to have fewer than 30 households (after verification from the field), will be replaced with villages from the same group of villages (those without size measures). The sampling weight will be adjusted to remove these villages since they would not have been included had the number of households been known at the time of sampling.

Niger

APPENDIX D
SUMMARY OF FIRST-STAGE SAMPLING METHODS FOR EACH TITLE II PROGRAM

Aim: Select 80 villages for each Title II program (LAHIA, PASAM-TAI and SAWKI)

- Remove villages with fewer than 30 households from the sampling frame.
- For CRS and SAVE programs, use the same sampling method described for Guatemala above in steps 2 and 3 (and noting that there is 1 department for SAVE and 2 for CRS).
- For Mercy Corps, select all villages since there are only 80 villages on the village list provided by Mercy Corps and 80 are required to be sampled. Of the 80 villages on the list provided by Mercy Corps, 75 are represented by 102 enumeration areas on the Niger census files and 5 villages did not match to the census file. To meet the criteria for selecting the 80 enumeration areas to be surveyed, the following selections are made:
    a. 9 villages are represented by 2 enumeration areas each. One enumeration area is randomly selected for each of these 9 villages, giving a total of 9 enumeration areas sampled out of 18. First stage sampling probability is 0.50.
    b. 3 villages are represented by 3 enumeration areas each. One enumeration area is randomly selected for each of these 3 villages, giving a total of 3 enumeration areas sampled out of 9. First stage sampling probability is 0.33.
    c. 2 villages are represented by 5 enumeration areas each. Two enumeration areas are randomly selected for each of these two villages, giving a total of 4 enumeration areas sampled out of 10. First stage sampling probability is 0.40.
    d. Of the 65 remaining enumerations areas representing 65 villages, 59 villages with 30 or more households are selected (6 villages with less than 30 households are not sampled). First stage sampling probability is 1.0.
    e. All 5 villages that did not match to census files are selected. First stage sampling probability is 1.0.

Annex 2: Household Survey Questionnaires

Module A. Identification and Informed Consent

IDENTIFICATION (1)

A01 **HOUSEHOLD NUMBER (HH)** .....

A02 **VILLAGE NUMBER (VN)** .....

A03 **PARISH NAME** _____

A04 **SUBCOUNTY NAME** _____

A05 **DISTRICT**

KAABONG	1	KOTIDO	2	ABIM	3	MOROTO	4
NAPAK	5	NAKAPIRIPIRIT	6	AMUDAT	7		

INTERVIEWER VISITS

	A06 FIRST VISIT	A07 SECOND VISIT	A08 THIRD VISIT	**FINAL VISIT**
DATE				DAY
A09 **ENUMERATOR**				MONTH
DAY OF VISIT				YEAR
A10-A12 **RESULT OF VISIT**				INT. NUMBER
				RESULT
A13 NEXT VISIT: DATE				TOTAL NUMBER OF VISITS
TIME				

A14 **FINAL OUTCOME OF INTERVIEW**

1 COMPLETED
2 NO HOUSEHOLD MEMBER AT HOME OR NO COMPETENT RESPONDENT AT HOME AT TIME OF VISIT
3 ENTIRE HOUSEHOLD ABSENT FOR EXTENDED PERIOD OF TIME
4 POSTPONED
5 REFUSED
9 OTHER _____ (SPECIFY)

TOTAL ELIGIBLE WOMEN 15-49 YRS

TOTAL ELIGIBLE FARMERS

TOTAL CHILDREN UNDER FIVE

A15 **PRIMARY DECISION-MAKER* NAME** _____

A16 **SECONDARY DECISION-MAKER* NAME** _____

LINE NO. OF RESPONDENT TO HOUSEHOLD QUESTIONNAIRE

A17 **TEAM LEADER**	A18 **FIELD COORDINATOR**	A19 OFFICE EDITOR	A20 DATA ENTRY
NAME _____	NAME _____	NAME _____	OPERATOR _____
CODE	CODE	CODE	DAY . MONTH . YEAR

*THE **PRIMARY AND SECONDARY DECISION MAKERS** ARE THOSE WHO SELF-IDENTIFY AS THE PRIMARY MALE AND FEMALE (OR FEMALE ONLY) MEMBERS RESPONSIBLE FOR DECISION MAKING, BOTH SOCIAL AND ECONOMIC, WITHIN THE HOUSEHOLD. IN MALE AND FEMALE ADULT HOUSEHOLDS, THEY ARE USUALLY THE HUSBAND AND WIFE; HOWEVER THEY CAN ALSO BE OTHER HOUSEHOLD MEMBERS AS LONG AS THEY ARE AGED 18 AND OVER. IN FEMALE ADULT ONLY HOUSEHOLDS, THERE WILL ONLY BE A PRIMARY DECISION-MAKER -- THE PRINCIPAL FEMALE DECISION-MAKER AGED 18 OR OLDER. PRIMARY AND SECONDARY DECISION-MAKERS DO NOT NEED TO BE REGISTERED FOR MALE ADULT ONLY AND CHILD ONLY HOUSEHOLDS.

INFORMED CONSENT

INFORMED CONSENT: IT IS NECESSARY TO INTRODUCE THE HOUSEHOLD TO THE SURVEY AND OBTAIN THE CONSENT OF ALL PROSPECTIVE RESPONDENTS TO PARTICIPATE. IF A PROSPECTIVE RESPONDENT (E.G. A WOMAN DECISION MAKER) IS NOT PRESENT AT THE BEGINNING OF THE INTERVIEW, BE SURE TO RETURN TO THIS PAGE AND OBTAIN CONSENT BEFORE INTERVIEWING HIM OR HER. ASK TO SPEAK WITH A RESPONSIBLE ADULT IN THE HOUSEHOLD.

HELLO. MY NAME IS _____. I AM WORKING WITH ICF/NIELSEN. WE ARE CONDUCTING A SURVEY TO LEARN ABOUT AGRICULTURE, FOOD SECURITY, FOOD CONSUMPTION, NUTRITION AND WELLBEING OF HOUSEHOLDS IN KARAMOJA REGION UGANDA. YOUR HOUSEHOLD WAS SELECTED FOR THE SURVEY. I WOULD LIKE TO ASK YOU SOME QUESTIONS ABOUT YOUR HOUSEHOLD. THE QUESTIONS USUALLY TAKE ABOUT 3 TO 4 HOURS. WE CAN RETURN TOMORROW IF YOU DON'T HAVE TIME TO FINISH ALL THE QUESTIONS TODAY. ALL OF THE ANSWERS YOU GIVE WILL BE CONFIDENTIAL AND WILL NOT BE SHARED WITH ANYONE OTHER THAN MEMBERS OF OUR SURVEY TEAM. YOU DON'T HAVE TO BE IN THE SURVEY, BUT WE HOPE YOU WILL AGREE TO ANSWER THE QUESTIONS SINCE YOUR VIEWS ARE IMPORTANT. IF I ASK YOU ANY QUESTION YOU DON'T WANT TO ANSWER, JUST LET ME KNOW AND I WILL GO ON TO THE NEXT QUESTION OR YOU CAN STOP THE INTERVIEW AT ANY TIME. IN CASE YOU NEED MORE INFORMATION ABOUT THE SURVEY, YOU MAY CONTACT THE PERSON LISTED ON THIS CARD.

GIVE CARD WITH CONTACT INFORMATION

Do you have any questions about the study or about your participation?

ASK THE FOLLOWING CONSENT QUESTIONS OF <u>ALL</u> PROSPECTIVE RESPONDENTS.
AS APPLICABLE, CHECK AND SIGN THE CONSENT BOX BELOW.

1. Who is the main male adult (18 years or older) decision-maker in the household?
   [NAME], do you agree to participate in the survey?
   NAME: _____ RESPONDENT AGREED ____ RESPONDENT DID NOT AGREE ____
2. Who is the main female adult (18 years or older) decision-maker in the household?
   [NAME], do you agree to participate in the survey?
   NAME: _____ RESPONDENT AGREED ____ RESPONDENT DID NOT AGREE ____
3. Are there other mothers or responsible persons for children under six years of age with whom I haven't talked yet?
   [NAME], do you agree to participate in the survey and allow that children are weighed and measured?
   NAME: _____ RESPONDENT AGREED ____ RESPONDENT DID NOT AGREE ____
   NAME: _____ RESPONDENT AGREED ____ RESPONDENT DID NOT AGREE ____
   NAME: _____ RESPONDENT AGREED ____ RESPONDENT DID NOT AGREE ____
   NO CHILDREN UNDER SIX IN THE HOUSEHOLD _____

ADDITIONAL ELIGIBLE HOUSEHOLD MEMBERS		RESPONDENT AGREED	RESPONDENT DIDN'T AGREE
4. NAME_____	Do you agree to participate in the survey?	___	___
5. NAME_____	Do you agree to participate in the survey?	___	___
6. NAME_____	Do you agree to participate in the survey?	___	___

My signature affirms that I have read the verbal informed consent statement to the respondent(s), and I have answered any questions asked about the study. The respondent consented to the interview.

INTERVIEWER'S NAME AND CODE _____ ☐☐

SIGNATURE AND DATE _____ ☐☐.☐☐.☐☐☐☐

INTERVIEWER'S NAME AND CODE _____ ☐☐

SIGNATURE AND DATE _____ ☐☐.☐☐.☐☐☐☐

LINE NO.	USUAL RESIDENTS NAME	RELATIONSHIP TO HEAD OF HOUSEHOLD	SEX M	SEX F
01			1	2
02			1	2
03			1	2
04			1	2
05			1	2
06			1	2
07			1	2
08			1	2
09			1	2
10			1	2
11			1	2
12			1	2
13			1	2
14			1	2
15			1	2
16			1	2
17			1	2

CODES FOR Q. 3: RELATIONSHIP TO HEAD OF HOUSEHOLD

01 = HEAD
02 = WIFE OR HUSBAND
03 = SON OR DAUGHTER
04 = SON-IN-LAW OR DAUGHTER-IN-LAW
05 = GRANDCHILD
06 = PARENT
07 = PARENT-IN-LAW
08 = BROTHER OR SISTER
09 = OTHER RELATIVE
10 = ADOPTED/FOSTER/ STEPCHILD
11 = NOT RELATED
98 = DON'T KNOW

MODULE B. HOUSEHOLD ROSTER

START TIME: HOUR [ ][ ] MINUTE [ ][ ]

							IF AGE IS UNDER 6 YEARS				IF AGE 15 OR OLDER	IF AGE 0-17 YEARS				5-24 YEARS			
LINE NO.	USUAL RESIDENTS	RELATIONSHIP TO HEAD OF HOUSEHOLD	SEX	AGE	ELIGIBILITY: MODULE C, H1	MODULE D	PRIMARY CAREGIVER	MODULE E	MODULE F, J3, H2-H5	MODULE G	MARITAL STATUS	SURVIVORSHIP AND RESIDENCE OF BIOLOGICAL PARENTS				EVER ATTENDED SCHOOL		CURRENT/RECENT SCHOOL ATTENDANCE	
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20
	Please tell me the name and sex of each person who lives here, starting with the head of the household. For our purposes today, members of a household are adults or children that live together and eat from the "same pot". It should include anyone who has lived in your house for 6 of the last 12 months, but it does not include anyone who lives here but eats separately. AFTER LISTING NAMES, RELATIONSHIP, AND SEX FOR EACH PERSON, ASK QUESTIONS 2A-2C TO BE SURE THAT THE LISTING IS COMPLETE. THEN ASK APPROPRIATE QUESTIONS IN COLUMNS 5-20 FOR EACH PERSON.	What is the relationship of (NAME) to the head of the household? SEE CODES BELOW.	Is (NAME) male or female?	How old is (NAME)? IF 95 OR MORE, RECORD '95'. '98'=DON'T KNOW. USE ONLY FOR PERSONS WHO ARE ≥ 50. USE '00' IF CHILD IS LESS THAN 1 YEAR	Was [NAME] in charge of the food preparation yesterday?	IS THIS CHILD UNDER 6 YEARS OF AGE?	Who is the primary caregiver of [NAME]? *SEE DEFINITION BELOW ENTER LINE NUMBER OF PRIMARY CAREGIVER	IS THIS A WOMAN 15-49 YEARS OF AGE?	IS THIS PERSON THE HEAD OF THE HH; OR A RESPON-SIBLE ADULT IF HEAD OF HH IS ABSENT?	IS THIS PERSON A FARMER? **SEE DEFINITION BELOW	What is (NAME)'s current marital status? 1 = MARRIED OR LIVING TOGETHER 2 = DIVORCED/ SEPARATED 3 = WIDOWED 4 = NEVER-MARRIED AND NEVER LIVED TOGETHER	Is (NAME)'s natural mother alive?	Does (NAME)'s natural mother usually live in this household? IF YES: What is his name? RECORD MOTHER'S LINE NUMBER. IF NO, RECORD '00'.	Is (NAME)'s natural father alive?	Does (NAME)'s natural father usually live in this household? IF YES: What is his name? RECORD FATHER'S LINE NUMBER. IF NO, RECORD '00'.	Has (NAME) ever attended school?	What is the highest level of school (NAME) has attended? SEE CODES BELOW. What is the highest grade (NAME) completed at that level? SEE CODES BELOW.	Did (NAME) attend school at any time during the 2012 school year?	During this/that school year, what level and grade [is/was] (NAME) attending? SEE CODES BELOW.
			M F	IN YEARS	Y N	Y N		Y N	Y N	Y N		Y N DK		Y N DK		Y N	LEVEL GRADE	Y N	LEVEL GRADE
01		[ ][ ]	1 2	[ ][ ]	1 2	1 2	[ ][ ]	1 2	1 2	1 2	[ ]	1 2 8 GO TO 14	[ ][ ]	1 2 8 GO TO 16	[ ][ ]	1 2 NEXT LINE	[ ][ ][ ]	1 2 NEXT LINE	[ ][ ][ ]
02		[ ][ ]	1 2	[ ][ ]	1 2	1 2	[ ][ ]	1 2	1 2	1 2	[ ]	1 2 8 GO TO 14	[ ][ ]	1 2 8 GO TO 16	[ ][ ]	1 2 NEXT LINE	[ ][ ][ ]	1 2 NEXT LINE	[ ][ ][ ]
03		[ ][ ]	1 2	[ ][ ]	1 2	1 2	[ ][ ]	1 2	1 2	1 2	[ ]	1 2 8 GO TO 14	[ ][ ]	1 2 8 GO TO 16	[ ][ ]	1 2 NEXT LINE	[ ][ ][ ]	1 2 NEXT LINE	[ ][ ][ ]
04		[ ][ ]	1 2	[ ][ ]	1 2	1 2	[ ][ ]	1 2	1 2	1 2	[ ]	1 2 8 GO TO 14	[ ][ ]	1 2 8 GO TO 16	[ ][ ]	1 2 NEXT LINE	[ ][ ][ ]	1 2 NEXT LINE	[ ][ ][ ]
05		[ ][ ]	1 2	[ ][ ]	1 2	1 2	[ ][ ]	1 2	1 2	1 2	[ ]	1 2 8 GO TO 14	[ ][ ]	1 2 8 GO TO 16	[ ][ ]	1 2 NEXT LINE	[ ][ ][ ]	1 2 NEXT LINE	[ ][ ][ ]
06		[ ][ ]	1 2	[ ][ ]	1 2	1 2	[ ][ ]	1 2	1 2	1 2	[ ]	1 2 8 GO TO 14	[ ][ ]	1 2 8 GO TO 16	[ ][ ]	1 2 NEXT LINE	[ ][ ][ ]	1 2 NEXT LINE	[ ][ ][ ]
07		[ ][ ]	1 2	[ ][ ]	1 2	1 2	[ ][ ]	1 2	1 2	1 2	[ ]	1 2 8 GO TO 14	[ ][ ]	1 2 8 GO TO 16	[ ][ ]	1 2 NEXT LINE	[ ][ ][ ]	1 2 NEXT LINE	[ ][ ][ ]
08		[ ][ ]	1 2	[ ][ ]	1 2	1 2	[ ][ ]	1 2	1 2	1 2	[ ]	1 2 8 GO TO 14	[ ][ ]	1 2 8 GO TO 16	[ ][ ]	1 2 NEXT LINE	[ ][ ][ ]	1 2 NEXT LINE	[ ][ ][ ]
09		[ ][ ]	1 2	[ ][ ]	1 2	1 2	[ ][ ]	1 2	1 2	1 2	[ ]	1 2 8 GO TO 14	[ ][ ]	1 2 8 GO TO 16	[ ][ ]	1 2 NEXT LINE	[ ][ ][ ]	1 2 NEXT LINE	[ ][ ][ ]

CODES FOR Q. 3: RELATIONSHIP TO HEAD OF HOUSEHOLD

01 = HEAD OF HOUSEHOLD
02 = WIFE OR HUSBAND
03 = SON OR DAUGHTER
04 = SON-IN-LAW OR DAUGHTER-IN-LAW
05 = GRANDCHILD
06 = PARENT
07 = PARENT-IN-LAW
08 = BROTHER OR SISTER
09 = OTHER RELATIVE
10 = ADOPTED/FOSTER/ STEPCHILD
11 = NOT RELATED
98 = DON'T KNOW

DEFINITIONS

*The primary caregiver is the person who knows the most about how and what the child is fed. Usually, but not always, this will be the child"s mother.

**Farmers, including herders and fishers, are: 1) men and women who have access to a plot of land (even if very small) over which they make decisions about what will be grown, how it will be grown, and how to dispose of the harvest; AND/OR 2) men and women who have animals and/or aquaculture products over which they have decision-making power. Farmers produce food, feed, and fiber, where "food" includes agronomic crops(crops grown in large scale, such as grains), horticulture crops (vegetables, fruit, nuts, berries, and herbs), animal and aquaculture products, as well as natural products (e.g., non-timber forest products, wild fisheries). These farmers may engage in processing and marketing of food, feed, and fiber and may reside in settled communities, mobile pastoralist communities, or refugee/internally displaced person camps. An adult member of the household who does farm work but does not have decision-making responsibility over the plot OR animals would not be considered a "farmer." For instance, a woman working on her husband's land who does not control a plot of her own would not be interviewed.

CODES FOR Qs. 18 AND 20: EDUCATION

LEVEL
1 = PRIMARY
2 = SECONDARY
3 = HIGHER
6 = PRE-PRIMARY
8 = DON'T KNOW

GRADE
00 = LESS THAN 1 YEAR COMPLETED. (USE '00' FOR Q. 18 ONLY. THIS CODE IS NOT ALLOWED FOR Q. 20)
98 = DON'T KNOW

							IF AGE IS UNDER 6 YEARS				IF AGE 15 OR OLDER	IF AGE 0-17 YEARS				IF AGE 5 YEARS OR OLDER		IF AGE 5-24 YEARS	
LINE NO.	USUAL RESIDENTS	RELATIONSHIP TO HEAD OF HOUSEHOLD	SEX	AGE	ELIGIBILITY						MARITAL STATUS	SURVIVORSHIP AND RESIDENCE OF BIOLOGICAL PARENTS				EVER ATTENDED SCHOOL		CURRENT/RECENT SCHOOL ATTENDANCE	
					MODULE C, H1	MODULE D	PRIMARY CAREGIVER	MODULE E	MODULE F, J3, H2-H5	MODULE G									
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20
	Please tell me the name and sex of each person who lives here, starting with the head of the household. For our purposes today, members of a household are adults or children that live together and eat from the "same pot". It should include anyone who has lived in your house for 6 of the last 12 months, but it does not include anyone who lives here but eats separately. AFTER LISTING NAMES, RELATIONSHIP, AND SEX FOR EACH PERSON, ASK QUESTIONS 2A-2C TO BE SURE THAT THE LISTING IS COMPLETE. THEN ASK APPROPRIATE QUESTIONS IN COLUMNS 5-20 FOR EACH PERSON.	What is the relationship of (NAME) to the head of the household? SEE CODES BELOW.	Is (NAME) male or female?	How old is (NAME)? IF 95 OR MORE, RECORD '95'. '98'=DON'T KNOW. USE ONLY FOR PERSONS WHO ARE ≥ 50. USE '00' IF CHILD IS LESS THAN 1 YEAR	Was [NAME] in charge of the food preparation yesterday?	IS THIS CHILD UNDER 6 YEARS OF AGE?	Who is the primary caregiver of [NAME]? *SEE DEFINITION BELOW ENTER LINE NUMBER OF PRIMARY CAREGIVER	IS THIS A WOMAN 15-49 YEARS OF AGE?	IS THIS PERSON THE HEAD OF THE HH; OR A RESPON-SIBLE ADULT IF HEAD OF HH IS ABSENT?	IS THIS PERSON A FARMER? **SEE DEFINITION BELOW	What is (NAME)'s current marital status? 1 = MARRIED OR LIVING TOGETHER 2 = DIVORCED/ SEPARATED 3 = WIDOWED 4 = NEVER-MARRIED AND NEVER LIVED TOGETHER	Is (NAME)'s natural mother alive?	Does (NAME)'s natural mother usually live in this household? IF YES: What is his name? RECORD MOTHER'S LINE NUMBER. IF NO, RECORD '00'.	Is (NAME)'s natural father alive?	Does (NAME)'s natural father usually live in this household? IF YES: What is his name? RECORD FATHER'S LINE NUMBER. IF NO, RECORD '00'.	Has (NAME) ever attended school?	What is the highest level of school (NAME) has attended? SEE CODES BELOW. What is the highest grade (NAME) completed at that level? SEE CODES BELOW.	Did (NAME) attend school at any time during the 2012 school year?	During this/that school year, what level and grade [is/was] (NAME) attending? SEE CODES BELOW.
10			M F 1 2	IN YEARS	Y N 1 2	Y N 1 2		Y N 1 2	Y N 1 2	Y N 1 2		Y N DK 1 2 8 GO TO 14		Y N DK 1 2 8 GO TO 16		Y N 1 2 NEXT LINE	LEVEL GRADE	Y N 1 2 NEXT LINE	LEVEL GRADE
11			1 2		1 2	1 2		1 2	1 2	1 2		1 2 8 GO TO 14		1 2 8 GO TO 16		1 2 NEXT LINE		1 2 NEXT LINE	
12			1 2		1 2	1 2		1 2	1 2	1 2		1 2 8 GO TO 14		1 2 8 GO TO 16		1 2 NEXT LINE		1 2 NEXT LINE	
13			1 2		1 2	1 2		1 2	1 2	1 2		1 2 8 GO TO 14		1 2 8 GO TO 16		1 2 NEXT LINE		1 2 NEXT LINE	
14			1 2		1 2	1 2		1 2	1 2	1 2		1 2 8 GO TO 14		1 2 8 GO TO 16		1 2 NEXT LINE		1 2 NEXT LINE	
15			1 2		1 2	1 2		1 2	1 2	1 2		1 2 8 GO TO 14		1 2 8 GO TO 16		1 2 NEXT LINE		1 2 NEXT LINE	
16			1 2		1 2	1 2		1 2	1 2	1 2		1 2 8 GO TO 14		1 2 8 GO TO 16		1 2 NEXT LINE		1 2 NEXT LINE	
17			1 2		1 2	1 2		1 2	1 2	1 2		1 2 8 GO TO 14		1 2 8 GO TO 16		1 2 NEXT LINE		1 2 NEXT LINE	

CODES FOR Q. 3: RELATIONSHIP TO HEAD OF HOUSEHOLD

01 = HEAD
02 = WIFE OR HUSBAND
03 = SON OR DAUGHTER
04 = SON-IN-LAW OR DAUGHTER-IN-LAW
05 = GRANDCHILD
06 = PARENT
07 = PARENT-IN-LAW
08 = BROTHER OR SISTER
09 = OTHER RELATIVE
10 = ADOPTED/FOSTER/ STEPCHILD
11 = NOT RELATED
98 = DON'T KNOW

DEFINITIONS

*The primary caregiver is the person who knows the most about how and what the child is fed. Usually, but not always, this will be the child"s mother.

**Farmers, including herders and fishers, are: 1) men and women who have access to a plot of land (even if very small) over which they make decisions about what will be grown, how it will be grown, and how to dispose of the harvest; AND/OR 2) men and women who have animals and/or aquaculture products over which they have decision-making power. Farmers produce food, feed, and fiber, where "food" includes agronomic crops(crops grown in large scale, such as grains), horticulture crops (vegetables, fruit, nuts, berries, and herbs), animal and aquaculture products, as well as natural products (e.g., non-timber forest products, wild fisheries). These farmers may engage in processing and marketing of food, feed, and fiber and may reside in settled communities, mobile pastoralist communities, or refugee/internally displaced person camps. An adult member of the household who does farm work but does not have decision-making responsibility over the plot OR animals would not be considered a "farmer." For instance, a woman working on her husband's land who does not control a plot of her own would not be interviewed.

CODES FOR Qs. 18 AND 20: EDUCATION

LEVEL
1 = PRIMARY
2 = SECONDARY
3 = HIGHER
6 = PRE-PRIMARY
8 = DON'T KNOW

GRADE
00 = LESS THAN 1 YEAR COMPLETED. (USE '00' FOR Q. 18 ONLY. THIS CODE IS NOT ALLOWED FOR Q. 20)
98 = DON'T KNOW

TICK HERE IF CONTINUATION SHEET USED ☐

2A) Just to make sure that I have a complete listing: are there any other persons such as small children or infants that we have not listed? YES NO → ADD TO TABLE

2B) Are there any other people who may not be members of your family, such as domestic servants, lodgers, or friends who usually live here? YES NO → ADD TO TABLE

2C) Does anyone else live here even if they are not at home now? INCLUDE CHILDREN IN SCHOOL OR HOUSEHOLD MEMBERS AT WORK OR MIGRATED. YES NO → ADD TO TABLE

END TIME:

HOUR ☐☐

MINUTE ☐☐

Module F. Water, Sanitation and Hygiene

NO.	QUESTIONS AND FILTERS	CODING CATEGORIES	SKIP
F00	INSERT TIME MODULE STARTED	HOUR [ ][ ] MINUTE [ ][ ]	
F01	HOUSEHOLD AND VILLAGE NUMBER	HH . . . . [ ][ ] VN. . . . . [ ][ ]	
F02	HEAD OF THE HOUSEHOLD OR RESPONSIBLE ADULT FROM COLUMN 10 ON HOUSEHOLD ROSTER	LINE NUMBER . . . . . [ ][ ]	
DRINKING WATER			
F04	What is currently the main source of drinking water for members of your household?	**PIPED WATER** PIPED INTO DWELLING . . . . . 11 PIPED TO YARD/PLOT . . . . . 12 PUBLIC TAP/STANDPIPE . . . . . 13 TUBE WELL OR BOREHOLE . . . . . 21 **DUG WELL** PROTECTED WELL . . . . . 31 UNPROTECTED WELL . . . . . 32 **WATER FROM SPRING** PROTECTED SPRING . . . . . 41 UNPROTECTED SPRING . . . . . 42 RAINWATER . . . . . 51 ROCK CATCHMENTS . . . . . 52 TANKER TRUCK . . . . . 61 CART WITH SMALL TANK . . . . . 71 SURFACE WATER (RIVER/DAM/ LAKE/POND/STREAM/CANAL/ IRRIGATION CHANNEL) . . . . . 81 BOTTLED WATER . . . . . 91 OTHER _____ 96 (SPECIFY)	11, 12 → F07 51 → F07
F05	Where is that water source located?	IN OWN DWELLING . . . . . 1 IN OWN YARD/PLOT . . . . . 2 ELSEWHERE 3	1, 2 → F07
F06	How long does it take to go there, get water, and come back?	MINUTES . . . . . [ ][ ][ ] DON'T KNOW 998	
F07	Is water available from this source all year round?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	
F08	In the last two weeks, was water unavailable from this source for a day or longer?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	
F09	Do you do anything to the water to make it safer to drink?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	8 → F10A
F10	What do you usually do to make the water safer to drink? Anything else? RECORD ALL MENTIONED.	BOIL . . . . . 01 ADD BLEACH/CHLORINE . . . . . 02 STRAIN THROUGH A CLOTH . . . . . 03 USE WATER FILTER (CERAMIC/ SAND/COMPOSITE/ETC.) . . . . . 04 SOLAR DISINFECTION . . . . . 05 LET IT STAND AND SETTLE . . . . . 06 MORINGA OLIFERA SEEDS . . . . . 07 OTHER _____ 96 (SPECIFY) DON'T KNOW 98	

Module F. Water, Sanitation and Hygiene

NO.	QUESTIONS AND FILTERS	CODING CATEGORIES	SKIP
F10A	During the wet season, does your household use a different main source of of drinking water?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	→ F11
F10B	During the wet season, what is the main source of drinking water for the members of your household?	**PIPED WATER** PIPED INTO DWELLING . . . . . 11 PIPED TO YARD/PLOT . . . . . 12 PUBLIC TAP/STANDPIPE . . . . . 13 TUBE WELL OR BOREHOLE . . . . . 21 **DUG WELL** PROTECTED WELL . . . . . 31 UNPROTECTED WELL . . . . . 32 **WATER FROM SPRING** PROTECTED SPRING . . . . . 41 UNPROTECTED SPRING . . . . . 42 RAINWATER . . . . . 51 ROCK CATCHMENTS . . . . . 52 TANKER TRUCK . . . . . 61 CART WITH SMALL TANK . . . . . 71 SURFACE WATER (RIVER/DAM/ LAKE/POND/STREAM/CANAL/ IRRIGATION CHANNEL) . . . . . 81 BOTTLED WATER . . . . . 91 OTHER _____ (SPECIFY) 96	
F11	What kind of toilet facility do members of your household usually use during the daytime?	**FLUSH OR POUR FLUSH TOILET** FLUSH TO PIPED SEWER SYTEM . . . . . 11 FLUSH TO SEPTIC TANK . . . . . 12 FLUSH TO PIT LATRINE . . . . . 13 FLUSH TO SOMEWHERE ELSE . . . . . 14 FLUSH, DON'T KNOW WHERE . . . . . 15 **PIT LATRINE** VENTILATED IMPROVED PIT LATRINE . . . . . 21 PIT LATRINE WITH SLAB . . . . . 22 PIT LATRINE WITHOUT SLAB/ OPEN PIT . . . . . 23 ECOSAN LATRINE . . . . . 31 BUCKET TOILET . . . . . 41 HANGING TOILET/HANGING LATRINE . . . 51 DESIGNATED AREA NOT ALREADY LISTED . . . . . 61 DIG AND BURY 62 NO FACILITY/BUSH/FIELD . . . . . 71 OTHER _____ (SPECIFY) 96	→ F11C
F11A	Does your household share the daytime toilet facility with other households?	YES . . . . . 1 NO 2	→ F11C
F11B	How many households share that daytime facility?	NUMBER OF HOUSEHOLDS IF LESS THAN 10 . . . . . [0][ ] 10 OR MORE HOUSEHOLDS . . . . . 95 DON'T KNOW 98	
F11C	Do the children of this household use a different daytime toilet facilities as the adult members?	YES . . . . . 1 NO 2	→ F12

Module F. Water, Sanitation and Hygiene

NO.	QUESTIONS AND FILTERS	CODING CATEGORIES	SKIP
F11D	What kind of facility do children use during the daytime?	**FLUSH OR POUR FLUSH TOILET** FLUSH TO PIPED SEWER SYTEM . . . . . 11 FLUSH TO SEPTIC TANK . . . . . 12 FLUSH TO PIT LATRINE . . . . . 13 FLUSH TO SOMEWHERE ELSE . . . . . 14 FLUSH, DON'T KNOW WHERE . . . . . 15 **PIT LATRINE** VENTILATED IMPROVED PIT LATRINE . . . . . 21 PIT LATRINE WITH SLAB . . . . . 22 PIT LATRINE WITHOUT SLAB/ OPEN PIT . . . . . 23 ECOSAN LATRINE . . . . . 31 BUCKET TOILET . . . . . 41 HANGING TOILET/HANGING LATRINE . . . 51 DESIGNATED AREA NOT ALREADY LISTED . . . . . 61 DIG AND BURY 62 NO FACILITY/BUSH/FIELD . . . . . 71 OTHER _____ 96 (SPECIFY)	
F12	What kind of toilet facility do members of your household usually use during the nighttime?	**FLUSH OR POUR FLUSH TOILET** FLUSH TO PIPED SEWER SYTEM . . . . . 11 FLUSH TO SEPTIC TANK . . . . . 12 FLUSH TO PIT LATRINE . . . . . 13 FLUSH TO SOMEWHERE ELSE . . . . . 14 FLUSH, DON'T KNOW WHERE . . . . . 15 **PIT LATRINE** VENTILATED IMPROVED PIT LATRINE . . . . . 21 PIT LATRINE WITH SLAB . . . . . 22 PIT LATRINE WITHOUT SLAB/ OPEN PIT . . . . . 23 ECOSAN LATRINE . . . . . 31 BUCKET TOILET . . . . . 41 HANGING TOILET/HANGING LATRINE . . . 51 DESIGNATED AREA NOT ALREADY LISTED . . . . . 61 DIG AND BURY 62 NO FACILITY/BUSH/FIELD . . . . . 71 OTHER _____ 96 (SPECIFY)	→ F12C
F12A	Does your household share the nighttime toilet facility with other households?	YES . . . . . 1 NO 2	→ F12C
F12B	How many households share that nighttime facility?	NUMBER OF HOUSEHOLDS IF LESS THAN 10 . . . . . [0][ ] 10 OR MORE HOUSEHOLDS . . . . . 95 DON'T KNOW 98	
F12C	Do the children of this household use a different nighttime toilet facility as the adult members?	YES . . . . . 1 NO 2	→ F14

Module F. Water, Sanitation and Hygiene

NO.	QUESTIONS AND FILTERS	CODING CATEGORIES	SKIP
F12D	What kind of facility do children use during nighttime?	**FLUSH OR POUR FLUSH TOILET** FLUSH TO PIPED SEWER SYTEM ..... 11 FLUSH TO SEPTIC TANK .... 12 FLUSH TO PIT LATRINE .... 13 FLUSH TO SOMEWHERE ELSE ..... 14 FLUSH, DON'T KNOW WHERE ..... 15 **PIT LATRINE** VENTILATED IMPROVED PIT LATRINE .... 21 PIT LATRINE WITH SLAB .... 22 PIT LATRINE WITHOUT SLAB/ OPEN PIT .... 23 ECOSAN LATRINE .... 31 BUCKET TOILET ..... 41 HANGING TOILET/HANGING LATRINE ... 51 DESIGNATED AREA NOT ALREADY LISTED .... 61 DIG AND BURY 62 NO FACILITY/BUSH/FIELD .... 71 OTHER _____ 96 (SPECIFY)	
F14	Please show me where members of your household most often wash their hands.	OBSERVED ..... 1 NOT OBSERVED, NOT IN DWELLING/YARD/PLOT ..... 2 NOT OBSERVED, NO PERMISSION TO SEE ..... 3 NOT OBSERVED, OTHER REASON ..... 4 (SKIP TO F17)	
F15	OBSERVATION ONLY: OBSERVE PRESENCE OF WATER AT THE PLACE FOR HANDWASHING.	WATER IS AVAILABLE ..... 1 WATER IS NOT AVAILABLE 2	
F16	OBSERVATION ONLY: OBSERVE PRESENCE OF SOAP, DETERGENT, OR OTHER CLEANSING AGENT AT THE PLACE FOR HANDWASHING	SOAP OR DETERGENT (BAR, LIQUID, POWDER, PASTE) ..... 1 ASH, MUD, SAND ..... 2 NONE 3	
F17	OBSERVATION ONLY: OBSERVE PRESENCE OF DAYTIME TOILET FACILITY THAT HOUSEHOLD SAID THEY USED.	TOILET FACILITY IS AVAILABLE ..... 1 TOILET FACILITY IS NOT AVAILABLE 2	
F18	INSERT TIME MODULE FINISHED	HOUR [ ][ ] MINUTE [ ][ ]	**GO TO MODULE J3**

MODULE J3. COUNTRY-PROGRAM INDICATORS (HEAD OF HOUSEHOLD)

NO.	QUESTIONS AND FILTERS	CODING CATEGORIES	SKIP
J3.00	**INSERT TIME MODULE STARTED**	HOUR [ ][ ] MINUTE [ ][ ]	
J3.01	**HOUSEHOLD IDENTIFICATION** HOUSEHOLD (HH) AND ENUMERATION AREA (EA)	HH . ..... [ ][ ] VN . . . . [ ][ ]	
J3.02	HEAD OF THE HOUSEHOLD OR RESPONSIBLE ADULT FROM COLUMN 10 ON HOUSEHOLD ROSTER	LINE NUMBER . . . . . [ ][ ]	
HANDWASHING			
J3.03	Please list five critical moments for handwashing. DO NOT READ THE ANSWERS. WHEN ZERO, ONE, OR MORE ANSWERS ARE GIVEN BY THE RESPONDENT, ASK TWO MORE TIMES IF THERE IS ANYTHING ELSE. RECORD RESPONSES. CIRCLE ALL THAT APPLY. IF THE RESPONDENT INDICATES THAT HE/SHE DOES NOT KNOW, DO NOT PROBE FOR ADDITIONAL RESPONSES. ATER RECORDING ALL RESPONSES, PROBE TWICE ASKING FOR ANY OTHER OCCASIONS.	BEFORE EATING ..... 1 AFTER EATHING ..... 2 BEFORE PRAYING ..... 3 BEFORE BREASTFEEDING OR FEEDING A CHILD ..... 4 BEFORE COOKING OR PREPARING FOODS ..... 5 AFTER DEFECATION OR URINATION ..... 6 AFTER CLEANING A CHILD WHO HAS DEFICATED OR CHANGING A CHILD'S NAPPY ..... 7 WHEN MY HANDS ARE DIRTY ..... 8 AFTER CLEANING TOILET/POTTY ..... 9 OTHER _____ (SPECIFY) 96 DON'T KNOW 98	
MOBILITY AND SECURITY			
J3.04	Are there areas in your community that you were unable to visit due to insecurity, that you are now able to access, such as grazing land, farmland, markets, or social events?	YES ..... 1 NO ..... 2 DON'T KNOW 8	
J3.05	**INSERT TIME MODULE ENDED**	HOUR [ ][ ] MINUTE [ ][ ]	→ GO TO MODULE G

Module G. Agriculture

NO.	QUESTIONS AND FILTERS	FIRST FARMER NAME _____	SECOND FARMER NAME _____	THIRD FARMER NAME _____
G00	INSERT TIME MODULE STARTED		HOUR [ ][ ]	MINUTE [ ][ ]
G01	HOUSEHOLD AND VILLAGE NUMBER		HH . . . . [ ][ ]	VN. . . . . [ ][ ]
	REGISTER NAME, SEX AND LINE NUMBER FROM THE HOUSEHOLD ROSTER FOR THE FIRST FARMER. ASK THE QUESTIONS FROM THE FIRST FARMER. RECORD NAME AND LINE NUMBER FOR ADDITIONAL FARMERS AS NEEDED.			
G02	NAME FROM HOUSEHOLD ROSTER	NAME _____	NAME _____	NAME _____
G02A	FARMER'S SEX FROM THE ROSTER	MALE . . . . . 1 FEMALE 2	MALE . . . . . 1 FEMALE 2	MALE . . . . . 1 FEMALE 2
G03	LINE NUMBER FORM THE HOUSEHOLD ROSTER	LINE NUMBER..... [ ][ ]	LINE NUMBER..... [ ][ ]	LINE NUMBER..... [ ][ ]
G03A	IS THIS RESPONDENT A RESPONSIBLE ADULT WHO IS BEING INTERVIEWED ABOUT A FARMER	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G04**) ←	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G04**) ←	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G04**) ←
G03B	RESPONDENT'S LINE NUMBER FORM THE HOUSEHOLD ROSTER	LINE NUMBER..... [ ][ ]	LINE NUMBER..... [ ][ ]	LINE NUMBER..... [ ][ ]
G03C	RESPONDENT'S SEX FROM THE ROSTER	MALE . . . . . 1 FEMALE 2	MALE . . . . . 1 FEMALE 2	MALE . . . . . 1 FEMALE 2
	INSTRUCTION TO INTERVIEWER WHEN THE FARMER IS ABSENT: I WANT TO KNOW ABOUT ALL THE FARMING ACTIVITIES IN THIS HOUSEHOLD. BECAUSE (NAME OF ABSENT FARMER) IS ABSENT, PLEASE ANSWER THESE QUESTIONS ABOUT HIS/HER FARMING			
G04	Do you have access to a plot of land (even if very small) over which you make decisions about what will be grown, how it will be grown, and how to dispose of the harvest?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
G05	Do you have animals and/or aquaculture products over which you make decisions about how to dispose of the production?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
G06	CHECK ANSWERS TO QUESTIONS **G04** AND **G05.** IF THE ANSWERS TO QUESTIONS **G04** AND **GO5** INCLUDE AT LEAST ONE "YES," PROCEED WITH MODULE.	YES . . . . . 1 NO . . . . . 2 (SKIP TO G02 FOR NEXT FARMER OR GO TO G27 IF NO MORE FARMERS)	YES . . . . . 1 NO . . . . . 2 (SKIP TO G02 FOR NEXT FARMER OR GO TO G27 IF NO MORE FARMERS)	YES . . . . . 1 NO . . . . . 2 (SKIP TO G02 FOR NEXT FARMER OR GO TO G27 IF NO MORE FARMERS)
	FINANCIAL SERVICES			
G07	Did you take any agricultural credit, in cash or in kind, in the [PAST 12 MONTHS]? PROBES: village savings groups, farmers associations, government or private institutions, non-cash loans (saved seeds), inputs from buyers	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
G08	Did you save any cash in the [PAST 12 MONTHS]? In other words, did you put any cash aside to use later?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
G09	Some people insure their agricultural production against negative unexpected circumstances, such as drought, floods, and pests. Did you have agricultural insurance in the [PAST 12 MONTHS]?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8

Module G. Agriculture

NO.	QUESTIONS AND FILTERS	FIRST FARMER NAME _____	SECOND FARMER NAME _____	THIRD FARMER NAME _____
	VALUE CHAIN ACTIVITIES Now I want to ask you about farming and animal husbandry practices about which you make decisions. This includes practices about crops, animals and aquaculture products.			
G10	Which of the following activities related to farming and animal husbandry have you practiced during the [PAST 12 MONTHS]? PROBE TO IDENTIFY ANY OTHER ACTIVITIES REGISTER ALL ACTIVITIES THAT RESPONDENT MENTIONS PROBE TO CORRECTLY CLASSIFY ALL ACTIVITIES	PURCHASE INPUTS …….. 01 TILLAGE OF LAND …… ….02 BULK TRANSPORTING OF INPUTS, PRODUCE, OR ANIMALS…..... 03 SORTING PRODUCE …….. 04 GRADING PRODUCE …….. 05 DRYING OR PROCESSING PRODUCE…….....06 TRADING OR MARKETING (WHOLESALE, RETAIL, OR EXPORT)…….07 OTHER ACTIVITY _____….08 (SPECIFY NAME AND TYPE OF ACTIVITY) OTHER ACTIVITY _____….09 (SPECIFY NAME AND TYPE OF ACTIVITY) DID NOT PRACTICE ANY OF THESE ACTIVITIES IN PAST 12 MONTHS……97		
	CIRCLE ALL ACTIVITIES STATED	1 2 3 4 5 6 7 8 9 97	1 2 3 4 5 6 7 8 9 97	1 2 3 4 5 6 7 8 9 97
	AGRICULTURAL PRACTICES			
G11	REFER TO G04 TO DETERMINE WHETHER THE RESPONDENT HAS ACCESS TO A PLOT OF LAND OVER WHICH HE/SHE MAKES DECISIONS.	"YES" CIRCLED ☐ NO CIRCLED ☐ (SKIP TO **G14**)	"YES" CIRCLED ☐ NO CIRCLED ☐ (SKIP TO **G14**)	"YES" CIRCLED ☐ NO CIRCLED ☐ (SKIP TO **G14**)
G12	In the past 12 months, did you plant any crops in the plot(S) over which you make decisions?	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G14**) DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G14**) DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G14**) DON'T KNOW 8
G13	What crops did you plant during the [PAST 12 MONTHS] in the plot(S) over which you make decisions. REGISTER THE NAME OF ALL CROPS NAMED BY THE RESPONDENT REGISTER RED SORGHUM AND WHITE SORGHUM AS TWO DIFFERENT CROPS	1 _____ 2 _____ 3 _____ 4 _____ 5 _____ 6 _____	1 _____ 2 _____ 3 _____ 4 _____ 5 _____ 6 _____	1 _____ 2 _____ 3 _____ 4 _____ 5 _____ 6 _____
G13A	For each crop you planted, did you use any of these practices In the [PAST 12 MONTHS]? CIRCLE ALL PRACTICES THAT ARE MENTIONED FOR EACH CROP PROBE TO IDENTIFY ANY OTHER PRACTICES REGISTER ALL PRACTICES THAT RESPONDENT MENTIONS	SOIL PREPARATION BY HAND…….. 1 SOIL PREPARATION WITH OX PLOW…….. 2 SOIL PREPARATION WITH TRACTOR…….3 BROADCASTING SEED……..…… 4 PLANTING SEEDS IN ROWS…….. 5 CROP ROTATION…….. 6 APPLY FERTILIZER……. 7 INTERCROPPING…… 8 OTHER PRACTICE _____ ……..... 9 (SPECIFY NAME AND TYPE OF PRACTICE) OTHER PRACTICE _____ …….. 10 (SPECIFY NAME AND TYPE OF PRACTICE) DID NOT USE ANY OF THESE PRACTICES IN PAST 12 MONTHS…….. 97		
	CROP #1	1 2 3 4 5 6 7 8 9 10 97	1 2 3 4 5 6 7 8 9 10 97	1 2 3 4 5 6 7 8 9 10 97
	CROP #2	1 2 3 4 5 6 7 8 9 10 97	1 2 3 4 5 6 7 8 9 10 97	1 2 3 4 5 6 7 8 9 10 97
	CROP #3	1 2 3 4 5 6 7 8 9 10 97	1 2 3 4 5 6 7 8 9 10 97	1 2 3 4 5 6 7 8 9 10 97
	CROP #4	1 2 3 4 5 6 7 8 9 10 97	1 2 3 4 5 6 7 8 9 10 97	1 2 3 4 5 6 7 8 9 10 97
	CROP #5	1 2 3 4 5 6 7 8 9 10 97	1 2 3 4 5 6 7 8 9 10 97	1 2 3 4 5 6 7 8 9 10 97
	CROP #6	1 2 3 4 5 6 7 8 9 10 97	1 2 3 4 5 6 7 8 9 10 97	1 2 3 4 5 6 7 8 9 10 97

Module G. Agriculture

NO.	QUESTIONS AND FILTERS	FIRST FARMER NAME _____	SECOND FARMER NAME _____	THIRD FARMER NAME _____
G13B	What did you do with the red sorghum you harvested during the [PAST 12 MONTHS]?	CONSUMED…… 1 SOLD UNPROCESSED.. 2 SOLD BREWED……3 DID NOT HARVEST…… 9 (SKIP TO 1**3C**)	CONSUMED…… 1 SOLD UNPROCESSED. 2 SOLD BREWED……3 DID NOT HARVEST……9 (SKIP TO 1**3C**)	CONSUMED…… 1 SOLD UNPROCESSED. 2 SOLD BREWED……3 DID NOT HARVEST……9 (SKIP TO 1**3C**)
G13B1	What portion of the red sorghum you harvested was sold?	_____ PERCENT	_____ PERCENT	_____ PERCENT
G13B2	To whom did you sell the red sorghum? RECORD THE TYPES OF BUYERS	1. _____ 2._____ DON'T KNOW……..8 DID NOT SELL……X9	1. _____ 2._____ DON'T KNOW……..8 DID NOT SELL…… 9	1. _____ 2._____ DON'T KNOW……..8 DID NOT SELL……9
G13C	What did you do with the white sorghum you harvested during the [PAST 12 MONTHS]?	CONSUMED…… 1 SOLD UNPROCESSED.. 2 SOLD BREWED……3 DID NOT HARVEST…… 9 (SKIP TO **13D**)	CONSUMED…… 1 SOLD UNPROCESSED. 2 SOLD BREWED……3 DID NOT HARVEST……9 (SKIP TO **13D**)	CONSUMED…… 1 SOLD UNPROCESSED. 2 SOLD BREWED……3 DID NOT HARVEST……9 (SKIP TO **13D**)
G13C1	What portion of the white sorghum you harvested was sold?	_____ PERCENT	_____ PERCENT	_____ PERCENT
G13C2	To whom did you sell the white sorghum? RECORD THE TYPES OF BUYERS	1. _____ 2._____ DON'T KNOW……..8 DID NOT SELL……X9	1. _____ 2._____ DON'T KNOW……..8 DID NOT SELL…… 9	1. _____ 2._____ DON'T KNOW……..8 DID NOT SELL……9
G13D	What did you do with the maize you harvested during the [PAST 12 MONTHS]?	CONSUMED…… 1 SOLD UNPROCESSED.. 2 SOLD BREWED……3 DID NOT HARVEST…… 9 (SKIP TO **13E)**	CONSUMED…… 1 SOLD UNPROCESSED. 2 SOLD BREWED……3 DID NOT HARVEST……9 (SKIP TO **13E)**	CONSUMED…… 1 SOLD UNPROCESSED. 2 SOLD BREWED……3 DID NOT HARVEST……9 (SKIP TO **13E)**
	What portion of the maize you harvested was sold?	_____ PERCENT	_____ PERCENT	_____ PERCENT
	To whom did you sell the maize? RECORD THE TYPES OF BUYERS	1. _____ 2._____ DON'T KNOW……..8 DID NOT SELL……X9	1. _____ 2._____ DON'T KNOW……..8 DID NOT SELL…… 9	1. _____ 2._____ DON'T KNOW……..8 DID NOT SELL……9
G13E	What was the origin of the seeds that you planted during the [PAST 12 MONTHS]? MULTIPLE ANSWERS ARE POSSIBLE	BOUGHT AT MARKET….1 FROM NGO……..2 FROM GOVERNMENT…3 LOCAL SEEDS SAVED FROM LAST HARVEST…… 4	BOUGHT AT MARKET….1 FROM NGO……..2 FROM GOVERNMENT…3 LOCAL SEEDS SAVED FROM LAST HARVEST…… 4	BOUGHT AT MARKET….1 FROM NGO……..2 FROM GOVERNMENT…3 LOCAL SEEDS SAVED FROM LAST HARVEST…… 4
G14	CHECK **G05**: DETERMINE WHETHER THE RESPONDENT HAS ANY ANIMALS OR AQUACULTURAL PRODUCTS OVER WHICH HE/SHE MAKES DECISIONS	☐ CODE "YES" CIRCLED CODE "NO" CIRCLED ☐ (SKIP TO **G18**)	☐ CODE "YES" CIRCLED CODE "NO" CIRCLED ☐ (SKIP TO **G18**)	☐ CODE "YES" CIRCLED CODE "NO" CIRCLED ☐ (SKIP TO **G18)**
G15	What animal species did you raise/care for and make decisions about during the [PAST 12 MONTHS]? REGISTER THE NAME OF ALL ANIMAL SPECIES LISTED BY THE RESPONDENT	1 _____ 2 _____ 3 _____ 4 _____ 5 _____ 6 _____	1 _____ 2 _____ 3 _____ 4 _____ 5 _____ 6 _____	1 _____ 2 _____ 3 _____ 4 _____ 5 _____ 6 _____

Module G. Agriculture

NO.	QUESTIONS AND FILTERS	FIRST FARMER NAME _____	SECOND FARMER NAME _____	THIRD FARMER NAME _____
G16	Did you use any of the following practices when you cared for the animals during the [PAST 12 MONTHS]? CIRCLE ALL THE PRACTICES THAT ARE MENTIONED FOR EACH SPECIES.	ANIMAL SHELTERS . . . . . 1 KRAALS . . . . . 2 VACCINATIONS . . . . . 3 DEWORMING . . . . . 4 HOMEMADE ANIMAL FEEDS MADE OF LOCALLY AVAILABLE PRODUCTS 5 USE THE SERVICES OF COMMUNITY ANIMAL HEALTH WORKERS . . . . . 6 PURCHASED DRUGS/MEDICINES TO GIVE TO ANIMALS . . . . . 7 DID NOT PRACTICE ANY OF THESE ACTIVITIES IN PAST 12 MONTHS 9		
	SPECIES #1	1 2 3 4 5 6 7 9	1 2 3 4 5 6 7 9	1 2 3 4 5 6 7 9
	SPECIES #2	1 2 3 4 5 6 7 9	1 2 3 4 5 6 7 9	1 2 3 4 5 6 7 9
	SPECIES #3	1 2 3 4 5 6 7 9	1 2 3 4 5 6 7 9	1 2 3 4 5 6 7 9
	SPECIES #4	1 2 3 4 5 6 7 9	1 2 3 4 5 6 7 9	1 2 3 4 5 6 7 9
	SPECIES #5	1 2 3 4 5 6 7 9	1 2 3 4 5 6 7 9	1 2 3 4 5 6 7 9
	SPECIES #6	1 2 3 4 5 6 7 9	1 2 3 4 5 6 7 9	1 2 3 4 5 6 7 9
G17	If you purchased drugs or medicines to give to animals, where did you purchase the drugs?	VETINARIAN . . . . . 1 COMMUNITY ANIMAL HEALTH WORKER. . 2 OTHER SOURCE. . . . . 3 _____ (SPECIFY) DID NOT PURCHASE DRUGS/MEDICINES 9	VETINARIAN . . . . . 1 COMMUNITY ANIMAL HEALTH WORKER. . 2 OTHER SOURCE. . . . . 3 _____ (SPECIFY) DID NOT PURCHASE DRUGS/MEDICINES 9	VETINARIAN . . . . . 1 COMMUNITY ANIMAL HEALTH WORKER. . 2 OTHER SOURCE. . . . . 3 _____ (SPECIFY) DID NOT PURCHASE DRUGS/MEDICINES 9
G18	Did you use any of the following natural resources management practices or techniques that were not related directly to your on-farm production during the [PAST 12 MONTHS]?	MANAGEMENT OF WATERSHED OR REFORESTATION . . . . . 1 AGRO-FORESTRY OR CULTIVATION OF FRUIT TREES. . . . . 2 MANAGEMENT OF FOREST PLANTATION . . . . . 3 MANAGEMENT OF NATURAL REGENERATION . . . . . 4 COLLECTING PRODUCTS FROM FOREST PLANTS (SUCH AS GUM ARABIC) 5 SOIL CONSERVATION ON HILLSIDES 6 CONSTRUCTION OF WATER CATCHMENTS 7 DID NOT PRACTICE ANY OF THESE ACTIVITIES FOR THE PAST 12 MONTHS 9		
	CIRCLE ALL PRACTICES MENTIONED BY THE RESPONDENT	1 2 3 4 5 6 7 9	1 2 3 4 5 6 7 9	1 2 3 4 5 6 7 9
	IMPROVED STORAGE PRACTICES			
G19	CHECK **G04:** DETERMINE WHETHER THE RESPONDENT HAS ACCESS TO A PLOT OF LAND OVER WHICH HE/SHE MAKES DECISIONS.	CODE "YES" CIRCLED CODE "NO" CIRCLED (SKIP TO G26)	CODE "YES" CIRCLED CODE "NO" CIRCLED (SKIP TO G26)	CODE "YES" CIRCLED CODE "NO" CIRCLED (SKIP TO G26)
G20	During [THE LAST 12 MONTHS], did you store any crops from the plot over which you make decisions?	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G26)** DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G26)** DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G26)** DON'T KNOW 8
G21	Did you store sorghum?	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G22**)	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G22**)	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G22**)
G21A	What was the main method that you used to store sorghum?	CEREAL BANK. . . . . 1 GRANARY . . . . . 2 OTHER METHOD. . . . . 3 _____ (SPECIFY)	CEREAL BANK. . . . . 1 GRANARY . . . . . 2 OTHER METHOD. . . . . 3 _____ (SPECIFY)	CEREAL BANK. . . . . 1 GRANARY . . . . . 2 OTHER METHOD. . . . . 3 _____ (SPECIFY)
G22	Did you store maize?	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G23**)	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G23**)	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G23**)

Module G. Agriculture

NO.	QUESTIONS AND FILTERS	FIRST FARMER NAME _____	SECOND FARMER NAME _____	THIRD FARMER NAME _____
G22A	What was the main method that you used to store maize?	SILO 1 GRANARY . . . . . 2 OTHER METHOD. . . . . 3 _____ (SPECIFY)	SILO 1 GRANARY . . . . . 2 OTHER METHOD. . . . . 3 _____ (SPECIFY)	SILO 1 GRANARY . . . . . 2 OTHER METHOD. . . . . 3 _____ (SPECIFY)
G23	Did you store legumes (beans, cowpeas, pigeon peas, or green grams/mung beans)?	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G24**) ←	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G24**) ←	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G24**) ←
G23A	What was the main method that you used to store legumes (beans, cowpeas, pigeon peas, or green orams/muno beans)?	SILO 1 GRANARY . . . . . 2 OTHER METHOD. . . . . 3 _____ (SPECIFY)	SILO 1 GRANARY . . . . . 2 OTHER METHOD. . . . . 3 _____ (SPECIFY)	SILO 1 GRANARY . . . . . 2 OTHER METHOD. . . . . 3 _____ (SPECIFY)
G24	Did you store rice?	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G25**) ←	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G25**) ←	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G25**) ←
G24A	What was the main method that you used to store rice?	SILO 1 GRANARY . . . . . 2 OTHER METHOD. . . . . 3 _____ (SPECIFY)	SILO 1 GRANARY . . . . . 2 OTHER METHOD. . . . . 3 _____ (SPECIFY)	SILO 1 GRANARY . . . . . 2 OTHER METHOD. . . . . 3 _____ (SPECIFY)
G25	In addition to sorghum, maize, rice and legumes, did you store any additional crops from the plot over which you make decisions during the [PAST 12 MONTHS]?	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G26**) ←	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G26**) ←	YES . . . . . 1 NO . . . . . 2 (SKIP TO **G26**) ←
G25A	What other crops did you store during the [PAST 12 MONTHS] REGISTER THE NAMES OF THE ADDITIONAL CROPS THAT WERE STORED BY EACH RESPONDENT	1 _____ 2 _____ 3 _____ 4 _____	1 _____ 2 _____ 3 _____ 4 _____	1 _____ 2 _____ 3 _____ 4 _____
G25B	What was the main method that you used to store each of the additional crops? CIRCLE THE MAIN METHOD MENTIONED TO STORE ANY ADDITIONAL CROPS	CEREAL BANK . . . . . 1 SILO . . . . . 2 GRANARY . . . . . 3 OTHER METHOD . . . . . 4 _____ (SPECIFY)		
	ADDITIONAL CROP #1	1 2 3 4	1 2 3 4	1 2 3 4
	ADDITIONAL CROP #2	1 2 3 4	1 2 3 4	1 2 3 4
	ADDITIONAL CROP #3	1 2 3 4	1 2 3 4	1 2 3 4
	ADDITIONAL CROP #4	1 2 3 4	1 2 3 4	1 2 3 4
G26	Do you support the bolus (electronic cattle branding or identification scheme?	YES . . . . . 1 NO . . . . . 2 UNAWARE OF BOLUS SCHEME . . . 3 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 UNAWARE OF BOLUS SCHEME . . . 3 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 UNAWARE OF BOLUS SCHEME . . . 3 DON'T KNOW 8
	THERE ARE NO MORE QUESTIONS IN MODULE G AGRICULTURE	GO TO **G02** FOR ANOTHER FARMER. IF THERE ARE NO MORE FARMERS, GO TO G27.	GO TO **G02** FOR ANOTHER FARMER. IF THERE ARE NO MORE FARMERS, GO TO G27.	GO TO **G02** FOR ANOTHER FARMER. IF THERE ARE NO MORE FARMERS, GO TO G27.
G27	INSERT TIME MODULE ENDED HOUR [ ][ ] MINUTE [ ][ ] →			**GO TO MODULE C**

Module C. Food Access (HDDS and HHS)

NO.	QUESTIONS AND FILTERS	CODING CATEGORIES	SKIP
C00	**INSERT TIME MODULE STARTED**	HOUR [ ][ ] MINUTE [ ][ ]	
C01	**HOUSEHOLD IDENTIFICATION** HOUSEHOLD (HH) AND ENUMERATION AREA (EA)	HH [ ][ ] VN . . . . [ ][ ]	
C01A	LINE NUMBER IN THE HOUSEHOLD LISTING (COLUMN 6) OF THE PERSON IN CHARGE OF FOOD PREPARATION THE DAY BEFORE THE INTERVIEW OR A RESPONSIBLE ADULT WHO WAS PRESENT AND ATE IN THE HOUSEHOLD THE PREVIOUS DAY.	LINE NUMBER . . . . . [ ][ ]	
	HDDS QUESTIONS		
C02	Was yesterday an unusual or special day (Festival, Funeral, etc.) or were most household members absent?	YES . . . . . 1 NO 2	→ C16
C03	Now I would like to ask you about the types of foods that you or anyone else in your household ate yesterday during the day and at night.	**YES NO DK**	
C04	Any bread, biscuits, rice, noodles, posho, porridge, cereals or other foods made from wheat, maize, rice, sorghum, millet?	. . . . . 1 2 8	
C05	Any Irish potatoes, yams, sweet potatoes, cassava, matoke, or any other foods made from roots or tubers?	. . . . . 1 2 8	
C06	Any vegetables? (pumpkin, squash)	. . . . . 1 2 8	
C07	Any fruits?	. . . . . 1 2 8	
C08	Any beef, pork, lamb, goat, rabbit, field rats, wild game, chicken, duck, or other birds, liver, kidney, heart, or other organ meats or blood?	. . . . . 1 2 8	
C09	Any eggs?	. . . . . 1 2 8	
C10	Any fresh or dried fish or shellfish?	. . . . . 1 2 8	
C11	Any foods made from beans, peas, lentils, green grams, cowpeas, pigeon peas, nuts, or sunflower seeds?	. . . . . 1 2 8	
C12	Any cheese, yogurt, milk, or other milk products?	. . . . . 1 2 8	
C13	Any foods made with oil, fat, or butter?	. . . . . 1 2 8	
C14	Any sugar or honey?	. . . . . 1 2 8	
C15	Any other foods, such as condiments, coffee or tea?	. . . . . 1 2 8	
	HHS QUESTIONS		
C16	In the past **[4 WEEKS/30DAYS]** was there ever no food to eat of any kind in your house because of lack of resources to get food?	YES . . . . . 1 NO 2	→ C18
C17	How often did this happen in the past **[4 WEEKS/30 DAYS]**?	RARELY (1-2 TIMES) . . . . . 1 SOMETIMES (3-10 TIMES) . . . 2 OFTEN (MORE THAN 10) . . . 3	
C18	In the past **[4 WEEKS/30 DAYS]** did you or any household member go to sleep at night hungry because there was not enough food?	YES . . . . . 1 NO 2	→ C20
C19	How often did this happen in the past **[4 WEEKS/30 DAYS]**?	RARELY (1-2 TIMES) . . . 1 SOMETIMES (3-10 TIMES) . . . 2 OFTEN (MORE THAN 10) . . . 3	
C20	In the past [4 WEEKS/30 DAYS] did you or any household member go a whole day and night without eating anything at all because there was not enough food?	YES . . . . . 1 NO 2	→ C22
C21	How often did this happen in the past [4 WEEKS/DAYS]?	RARELY (1-2 TIMES) . . . 1 SOMETIMES (3-10 TIMES) . . . 2 OFTEN (MORE THAN 10) . . . 3	
C22	**INSERT TIME MODULE ENDED**	HOUR [ ][ ] MINUTE [ ][ ] → GO TO MODULE D	

Module D. Children's Nutritional Status and Feeding Practices

NO.	QUESTIONS AND FILTERS	FIRST ELIGIBLE CHILD FROM ROSTER NAME_____	SECOND ELIGIBLE CHILD FROM ROSTER NAME_____	THIRD ELIBIBLE CHILD FROM ROSTER NAME_____
D00	INSERT TIME MODULE STARTED	HOUR	MINUTE	
D01	**HOUSEHOLD IDENTIFICATION** HOUSEHOLD NUMBER . . . . . . VILLAGE NUMBER	HH . . . . . VN . .	HH . . . . . VN . .	HH . . . . . VN . .
D02	CAREGIVER'S ID CODE FROM THE HOUSEHOLD ROSTER	CAREGIVER	CAREGIVER	CAREGIVER
D03	CHILD'S ID CODE FROM THE HOUSEHOLD ROSTER	LINE NUMBER .	LINE NUMBER .	LINE NUMBER .
D04	What is [CHILD NAME]'s sex?	MALE . . . . . 1 FEMALE 2	MALE . . . . . 1 FEMALE 2	MALE . . . . . 1 FEMALE 2
D05	I would like to ask you some questions about [CHILD'S NAME]. Does [CHILD'S NAME] have a health/vaccination card or other document with the birth date recorded? IF A DOCUMENT WITH THE BIRTHDATE IS SHOWN AND THE RESPONDENT CONFIRMS THE INFORMATION IS CORRECT, RECORD THE DATE AS DOCUMENTED AND SKIP TO D07 IF A DOCUMENT WITH THE BIRTHDATE IS NOT SHOWN THEN ASK: In what month and year was [child's name] born? What is [his/her] birthday?	DAY . . . . . MONTH . . . YEAR	DAY . . . . . MONTH . . . YEAR	DAY . . . . . MONTH . . . YEAR
D06	How old was [child's name] at [his/her] last birthday? RECORD AGE IN COMPLETED YEARS	YEARS	YEARS	YEARS
D07	How many months old is [child's name]? RECORD AGE IN COMPLETED MONTHS REFER TO BIRTHDATE TABLE	MONTHS .	MONTHS .	MONTHS .
D08	CHECK D05, D06, AND D07 TO VERIFY CONSISTENCY A) IS THE YEAR RECORDED IN D05 CONSISTENT WITH THE AGE IN YEARS RECORDED IN D06? B) ARE YEAR AND MONTH OF BIRTH RECORDED IN D05 CONSISTENT WITH AGE IN MONTHS RECORDED IN D07? IF THE ANSWER TO A OR B IS "NO" RESOLVE ANY INCONSISTENCIES. IF THE BIRTHDATE WAS RECORDED FROM A HEALTH CARD, THIS SHOULD BE USED AS THE CORRECT DATA SOURCE.			

BIRTH DATE TO AGE IN MONTHS CONVERSION TABLES

Birth Date - 2013	Study Date 2013 Feb.	Mar.	Apr.
Jan.	1	2	3
Feb.	0	1	2
Mar.	--	0	1
Apr.	--	--	0
May	--	--	--
June	--	--	--
July	--	--	--
Aug.	--	--	--
Sept.	--	--	--
Oct.	--	--	--
Nov.	--	--	--
Dec.	--	--	--

Birth Date - 2012	Study Date 2013 Feb.	Mar.	Apr.
Jan.	13	14	15
Feb.	12	13	14
Mar.	11	12	13
Apr.	10	11	12
May	9	10	11
June	8	9	10
July	7	8	9
Aug.	6	7	8
Sept.	5	6	7
Oct.	4	5	6
Nov.	3	4	5
Dec.	2	3	4

Birth Date - 2011	Study Date 2013 Feb.	Mar.	Apr.
Jan.	25	26	27
Feb.	24	25	26
Mar.	23	24	25
Apr.	22	23	24
May	21	22	23
June	20	21	22
July	19	20	21
Aug.	18	19	20
Sept.	17	18	19
Oct.	16	17	18
Nov.	15	16	17
Dec.	14	15	16

Birth Date - 2010	Study Date 2013 Feb.	Mar.	Apr.
Jan.	37	38	39
Feb.	36	37	38
Mar.	35	36	37
Apr.	34	35	36
May	33	34	35
June	32	33	34
July	31	32	33
Aug.	30	31	32
Sept.	29	30	31
Oct.	28	29	30
Nov.	27	28	29
Dec.	26	27	28

Birth Date - 2009	Study Date 2013 Feb.	Mar.	Apr.
Jan.	49	50	51
Feb.	48	49	50
Mar.	47	48	49
Apr.	46	47	48
May	45	46	47
June	44	45	46
July	43	44	45
Aug.	42	43	44
Sept.	41	42	43
Oct.	40	41	42
Nov.	39	40	41
Dec.	38	39	40

Birth Date - 2008	Study Date 2013 Feb.	Mar.	Apr.
Jan.	61	62	63
Feb.	60	61	62
Mar.	59	60	61
Apr.	58	59	60
May	57	58	59
June	56	57	58
July	55	56	57
Aug.	54	55	56
Sept.	53	54	55
Oct.	52	53	54
Nov.	51	52	53
Dec.	50	51	52

Birth Date - 2007	Study Date 2013 Feb.	Mar.	Apr.
Jan.	--	--	--
Feb.	72	--	--
Mar.	71	72	--
Apr.	70	71	72
May	69	70	71
June	68	69	70
July	67	68	69
Aug.	66	67	68
Sept.	65	66	67
Oct.	64	65	66
Nov.	63	64	65
Dec.	62	63	64

Module D. Children's Nutritional Status and Feeding Practices

NO.	QUESTIONS AND FILTERS	FIRST ELIGIBLE CHILD FROM ROSTER NAME_____	SECOND ELIGIBLE CHILD FROM ROSTER NAME_____	THIRD ELIBIBLE CHILD FROM ROSTER NAME_____
	EXCLUSIVE BREAST FEEDING AND MINIMUM ACCEPTABLE DIET			
D14	CHECK **D07:** IS THE CHILD UNDER 60 MONTHS (5 YEARS)?	YES . . . . . 1 NO . . . . . 2 (GO TO D01 FOR NEXT CHILD OR TO D66 IF NO MORE CHILDREN) DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 (GO TO D01 FOR NEXT CHILD OR TO D66 IF NO MORE CHILDREN) DON'T KNOW . . . 8	YES . . . . . 1 NO . . . . . 2 (GO TO D01 ON NEW PAGE FOR NEXT CHILD OR TO D66 IF NO MORE CHILDREN) DON'T KNOW . . . 8
D15	CHECK **D07:** IS THE CHILD UNDER 24 MONTHS (2 YEARS)?	YES . . . . . 1 NO . . . . . 2 (SKIP TO D54) DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 (SKIP TO D54) DON'T KNOW . . . 8	YES . . . . . 1 NO . . . . . 2 (SKIP TO D54) DON'T KNOW . . . 8
D16	Has [CHILD'S NAME] ever been breastfed?	YES . . . . . 1 NO . . . . . 2 (SKIP TO D18) DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 (SKIP TO D18) DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 (SKIP TO D18) DON'T KNOW 8
D17	Was [CHILD'S NAME] breastfed yesterday during the day or at night?	YES . . . . . 1 (SKIP TO D19) NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 (SKIP TO D19) NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 (SKIP TO D19) NO . . . . . 2 DON'T KNOW 8
D18	Sometimes babies are fed breast milk in different ways, for example by spoon, cup, or bottle. This can happen when the mother cannot always be with her baby. Sometimes babies are breastfed by another woman or given breast milk from another woman by spoon, cup, bottle, or some other way. This can happen if a mother cannot breastfeed her own baby. Did [CHILD'S NAME] consume breast milk in any of these ways yesterday during the day or at night?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D19	Now I would like to ask you about some medicines and vitamins that are sometimes given to infants. **Was [CHILD'S NAME] given any vitamin drops or other medicines as drops yesterday during the day or at night?**	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D20	Was [CHILD'S NAME] given oral rehydration solution yesterday during the day or at night?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
	Next I would like to ask you about some liquids that [CHILD'S NAME] may have had yesterday during the day or at night. Did [CHILD'S NAME] have:			
D21	Plain water?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D22	Infant formula such as Nani, SMA, Nestle?	YES . . . . . 1 NO . . . . . 2 (SKIP TO **D24**) DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 (SKIP TO **D24**) DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 (SKIP TO **D24**) DON'T KNOW 8

Module D. Children's Nutritional Status and Feeding Practices

NO.	QUESTIONS AND FILTERS	FIRST ELIGIBLE CHILD FROM ROSTER NAME_____	SECOND ELIGIBLE CHILD FROM ROSTER NAME_____	THIRD ELIBIBLE CHILD FROM ROSTER NAME_____
D23	How many times yesterday during the day or at night did [CHILD'S NAME] consume any formula?	TIMES . . . [ ][ ]	TIMES . . . . [ ][ ]	TIMES . . . . [ ][ ]
D24	Did [CHILD'S NAME] have any milk such as tinned, powdered, or fresh animal milk?	YES . . . . . 1 NO . . . . . 2 (SKIP TO **D26**) DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 (SKIP TO **D26**) DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 (SKIP TO **D26**) DON'T KNOW 8
D25	How many times yesterday during the day or at night did [CHILD'S NAME] consume any milk?	TIMES . . . [ ][ ]	TIMES . . . . [ ][ ]	TIMES . . . . [ ][ ]
D26	Did [CHILD'S NAME] have any juice or juice drinks?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D27	Clear broth?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D28	Yogurt?	YES . . . . . 1 NO . . . . . 2 (SKIP TO **D30**) DON'T KNOW 8	YES ..... 1 NO . . . . . 2 (SKIP TO **D30**) DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 (SKIP TO **D30**) DON'T KNOW 8
D29	How many times yesterday during the day or at night did [CHILD'S NAME] consume any yogurt?	TIMES . . . [ ][ ]	TIMES . . . . [ ][ ]	TIMES . . . . [ ][ ]
D30	Did [CHILD'S NAME] have any thin porridge such as [INSERT LOCAL EXAMPLES]?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D31	Any other liquids such as [LIST OTHER WATER-BASED LIQUIDS AVAILABLE IN THE LOCAL SETTING]? (e.g. sorghum beer)	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D32	Any other liquids?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
	Next I would like to ask you about foods that [CHILD'S NAME] may have eaten yesterday during the day or at night. Yesterday, during the day and night, did (CHILD'S NAME) eat any (ASK QUESTIONS D33-D49)?			
D33	Food made from grains such as bread, biscuits, rice, noodles, chapati, posho, porridge, cereals, or sorghum mash/residue?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D34	Pumpkin, carrots, squash, orange fleshed sweet potatoes, yams, or other foods that are yellow or orange inside?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D35	White irish potatoes, white yams, white sweet potato, cassava, matoke, or any other foods made from roots?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D36	Any dark green leafy vegetables such as spinach, lettuce, chard, dodo (amaranthis), pumkin leaves, cassava leaves, bean leaves, kales/sukumawiki, cowpea leaves or okra?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D37	Ripe mangoes, ripe papayas, melon, or passionfruit?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D38	Any other fruits or vegetables such as: eggplant, cucumber, watermelon, tomatoes, cabbage, broccoli, cauliflower, etc.	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8

Module D. Children's Nutritional Status and Feeding Practices

NO.	QUESTIONS AND FILTERS	FIRST ELIGIBLE CHILD FROM ROSTER NAME_____	SECOND ELIGIBLE CHILD FROM ROSTER NAME_____	THIRD ELIBIBLE CHILD FROM ROSTER NAME_____
D39	Liver, kidney, heart, or other organ meats, blood?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D40	Any meat, such as beef, pork, lamb, goat, chicken, or duck, game meat, bush rats?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D41	Eggs?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D42	Fresh or dried fish, shellfish, or seafood?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D43	Any foods made from beans, peas, lentils, nuts, or seeds such as sunflower, groundnuts, simsim, cowpeas, pigeon peas, or green grams	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D44	Cheese, yogurt, or other milk products?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D45	Any shea nut oil or other oils, fats, or butter, or foods made with any of of those products?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D46	Any sugary foods such as chocolates, sweets, candies, pastries, cakes, or biscuits	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D47	Condiments for flavor, such as chilies, spices, herbs, or fish powder?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D48	Grubs, snails, or insects?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D49	Foods made with red palm oil, red palm nut, or red palm nut pulp sauce?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
	CHECK QUESTIONS **D33-D49**:	"NO" TO ALL → **D50** AT LEAST ONE "YES" OR "DK" TO ALL → **D51**	"NO" TO ALL → **D50** AT LEAST ONE "YES" OR "DK" TO ALL → **D51**	"NO" TO ALL → **D50** AT LEAST ONE "YES" OR "DK" TO ALL → **D51**
D50	Did [CHILD'S NAME] eat any solid, semi-solid, or or soft foods yesterday during the day or at night? **IF "YES"** PROBE: What kind of solid, semi-solid, or soft foods did [CHILD'S NAME] eat?	YES . . . . . 1 GO BACK TO D33-D49 AND RECORD FOODS EATEN. THEN CONTINUE WITH **D51**. NO . . . . . 2 GO TO D54 FIRST COLUMN DON'T KNOW 8	YES . . . . . 1 GO BACK TO D33-D49 AND RECORD FOODS EATEN. THEN CONTINUE WITH **D51**. NO . . . . . 2 GO TO D54 SECOND COLUMN DON'T KNOW . . . 8	YES . . . . . 1 GO BACK TO D33-D49 AND RECORD FOODS EATEN. THEN CONTINUE WITH **D51**. NO . . . . . 2 GO TO D54 THIRD COLUMN DON'T KNOW . . . 8
D51	How many times did [child's name] eat solid, semi-solid, or soft foods other than liquids yesterday during the day or at night?	TIMES . . . [ ][ ] DON'T KNOW 98	TIMES . . . . [ ][ ] DON'T KNOW 98	TIMES . . . . [ ][ ] DON'T KNOW 98
		GO TO **D54** FIRST COLUMN	GO TO **D54** SECOND COLUMN	GO TO **D54** THIRD COLUMN

Module D. Children's Nutritional Status and Feeding Practices

NO.	QUESTIONS AND FILTERS	FIRST ELIGIBLE CHILD FROM ROSTER NAME _____	SECOND ELIBIBLE CHILD FROM ROSTER NAME _____	THIRD ELIGIBLE CHILD FROM ROSTER NAME _____
D54	Has (NAME) had diarrhea in the last 2 weeks? **(1)** DIARRHEA IS DEFINED AS 3 OR MORE WATERY STOOLS	YES . . . . . 1 NO . . . . . 2 **(GO TO D01 FOR NEXT CHILD OR TO D66 IF NO MORE CHILDREN)** DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 **(GO TO D01 FOR NEXT CHILD OR TO D66 IF NO MORE CHILDREN)** DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 **(GO TO D01 ON NEW PAGE FOR NEXT CHILD OR TO D66 IF NO MORE CHILDREN)** DON'T KNOW 8
D55	Was there any blood in the stools?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
D56	Now I would like to know how much (NAME) was given to drink during the diarrhea (including breastmilk). Was he/she given less than usual to drink, about the same amount, or more than usual to drink? IF LESS, PROBE: Was he/she given much less than usual to drink or somewhat less?	MUCH LESS . . . . . 1 SOMEWHAT LESS..... 2 ABOUT THE SAME .... 3 MORE . . . . . 4 NOTHING TO DRINK..... 5 DON'T KNOW 8	MUCH LESS . . . . . 1 SOMEWHAT LESS..... 2 ABOUT THE SAME .... 3 MORE . . . . . 4 NOTHING TO DRINK..... 5 DON'T KNOW 8	MUCH LESS . . . . . 1 SOMEWHAT LESS..... 2 ABOUT THE SAME .... 3 MORE . . . . . 4 NOTHING TO DRINK..... 5 DON'T KNOW 8
D57	When (NAME) had diarrhea, was he/she given less than usual to eat, about the same amount, more than usual, or nothing to eat? IF LESS, PROBE: Was he/she given much less than usual to eat or somewhat less?	MUCH LESS . . . . . 1 SOMEWHAT LESS..... 2 ABOUT THE SAME..... 3 MORE . . . . . 4 STOPPED FOOD..... 5 NEVER GAVE FOOD.... 6 DON'T KNOW 8	MUCH LESS . . . . . 1 SOMEWHAT LESS..... 2 ABOUT THE SAME..... 3 MORE . . . . . 4 STOPPED FOOD..... 5 NEVER GAVE FOOD.... 6 DON'T KNOW 8	MUCH LESS . . . . . 1 SOMEWHAT LESS..... 2 ABOUT THE SAME..... 3 MORE . . . . . 4 STOPPED FOOD..... 5 NEVER GAVE FOOD.... 6 DON'T KNOW 8
D58	Did you seek advice or treatment for the diarrhea from any source?	YES . . . . . 1 NO . . . . . 2 (SKIP TO D62)	YES . . . . . 1 NO . . . . . 2 (SKIP TO D62)	YES . . . . . 1 NO . . . . . 2 (SKIP TO D62)

Module D. Children's Nutritional Status and Feeding Practices

NO.	QUESTIONS AND FILTERS	FIRST ELIGIBLE CHILD FROM ROSTER NAME _____	SECOND ELIBIBLE CHILD FROM ROSTER NAME _____	THIRD ELIGIBLE CHILD FROM ROSTER NAME _____
D59	Where did you seek advice or treatment? Anywhere else? PROBE TO IDENTIFY EACH TYPE OF SOURCE. IF UNABLE TO DETERMINE IF PUBLIC OR PRIVATE SECTOR, WRITE THE NAME OF THE PLACE. _____ (NAME OF THE PLACE) _____	**PUBLIC SECTOR** GOVT HOSPITAL 01 HEALTH CTR 2 02 HEALTH CTR 3 03 HEALTH CTR 4 04 VILLAGE HEALTH TEAM 05 OTHER PUBLIC SECTOR 06 _____ 07 (SPECIFY) **PRIVATE MEDICAL SECTOR** PVT. HOSPITAL/ CLINIC . . . . . 08 MISSION HOSPITAL 09 PHARMACY . . . . 10 FIELDWORKER 11 DRUG SHOP 12 OTHER PRIVATE MED. SECTOR _____ 13 (SPECIFY) OTHER SOURCE SHOP . . . . . 14 TRADITIONAL PRACTITIONER 15 MARKET . . . . . 16 OTHER _____ 17 (SPECIFY)	**PUBLIC SECTOR** GOVT HOSPITAL 01 HEALTH CTR 2 02 HEALTH CTR 3 03 HEALTH CTR 4 04 VILLAGE HEALTH TEAM 05 OTHER PUBLIC SECTOR 06 _____ 07 (SPECIFY) **PRIVATE MEDICAL SECTOR** PVT. HOSPITAL/ CLINIC . . . . . 08 MISSION HOSPITAL 09 PHARMACY . . . . 10 FIELDWORKER 11 DRUG SHOP 12 OTHER PRIVATE MED. SECTOR _____ 13 (SPECIFY) OTHER SOURCE SHOP . . . . . 14 TRADITIONAL PRACTITIONER 15 MARKET . . . . . 16 OTHER _____ 17 (SPECIFY)	**PUBLIC SECTOR** GOVT HOSPITAL 01 HEALTH CTR 2 02 HEALTH CTR 3 03 HEALTH CTR 4 04 VILLAGE HEALTH TEAM 05 OTHER PUBLIC SECTOR 06 _____ 07 (SPECIFY) **PRIVATE MEDICAL SECTOR** PVT. HOSPITAL/ CLINIC . . . . . 08 MISSION HOSPITAL 09 PHARMACY . . . . 10 FIELDWORKER 11 DRUG SHOP 12 OTHER PRIVATE MED. SECTOR _____ 13 (SPECIFY) OTHER SOURCE SHOP . . . . . 14 TRADITIONAL PRACTITIONER 15 MARKET . . . . . 16 OTHER _____ 17 (SPECIFY)
D60	CHECK **D59**: NUMBER OF CODES CIRCLED.	TWO OR MORE CODES CIRCLED ☐ ONLY ONE CODE CIRCLED ☐ (SKIP TO **D62**)	TWO OR MORE CODES CIRCLED ☐ ONLY ONE CODE CIRCLED ☐ (SKIP TO **D62**)	TWO OR MORE CODES CIRCLED ☐ ONLY ONE CODE CIRCLED ☐ (SKIP TO **D62**)
D61	Where did you first seek advice or treatment? USE LETTER CODE FROM **D59**.	FIRST PLACE . . . . ☐☐	FIRST PLACE . . . . ☐☐	FIRST PLACE . . . . ☐☐
D62	Was he/she given any of the following to drink at any time since he/she started having the diarrhea: a) A fluid made from a special packet called ORS Sachet such as Zinkid or RESTORE? b) A reconstituted ORS liquid provided through government health facilities? c) A government-recommended homemade fluid?	YES NO DK FLUID FROM ORS PKT 1 2 8 ORS LIQUID . . . . . 1 2 8 HOMEMADE FLUID . . . 1 2 8	YES NO DK FLUID FROM ORS PKT 1 2 8 ORS LIQUID . . . . . 1 2 8 HOMEMADE FLUID . . . 1 2 8	YES NO DK FLUID FROM ORS PKT 1 2 8 ORS LIQUID . . . . . 1 2 8 HOMEMADE FLUID . . . 1 2 8

Module D. Children's Nutritional Status and Feeding Practices

NO.	QUESTIONS AND FILTERS	FIRST ELIGIBLE CHILD FROM ROSTER NAME _____	SECOND ELIBIBLE CHILD FROM ROSTER NAME _____	THIRD ELIGIBLE CHILD FROM ROSTER NAME _____
D63	Was anything (else) given to treat the diarrhea?	YES . . . . . 1 NO . . . . . 2 **(GO TO D01 FOR NEXT CHILD OR TO D66 IF NO MORE CHILDREN)** DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 **(GO TO D01 FOR NEXT CHILD OR TO D66 IF NO MORE CHILDREN)** DON'T KNOW 8	YES . . . . . 1 NO . . . . . 2 **(GO TO D01 ON NEW PAGE FOR NEXT CHILD OR TO D66 IF NO MORE CHILDREN)** DON'T KNOW 8
D64	What (else) was given to treat the diarrhea? Anything else? RECORD ALL TREATMENTS GIVEN.	**PILL OR SYRUP** ANTIBIOTIC . . . . . 01 ANTIMOTILITY . . . . . 02 ZINC . . . . . 03 OTHER (NOT ANTIBIOTIC, ANTIMOTILITY, OR ZINC) . . . . . 04 UNKNOWN PILL OR SYRUP . . . . . 05 **INJECTION** ANTIBIOTIC . . . . . 06 NON-ANTIBIOTIC . . . . 07 UNKNOWN INJECTION . . . . . 08 (IV) INTRAVENOUS . . . 09 HOME REMEDY/ HERBAL MEDICINE . 10 OTHER _____ 96 (SPECIFY)	**PILL OR SYRUP** ANTIBIOTIC . . . . . 01 ANTIMOTILITY . . . . . 02 ZINC . . . . . 03 OTHER (NOT ANTIBIOTIC, ANTIMOTILITY, OR ZINC) . . . . . 04 UNKNOWN PILL OR SYRUP . . . . . 05 **INJECTION** ANTIBIOTIC . . . . . 06 NON-ANTIBIOTIC . . . . 07 UNKNOWN INJECTION . . . . . 08 (IV) INTRAVENOUS . . . 09 HOME REMEDY/ HERBAL MEDICINE . 10 OTHER _____ 96 (SPECIFY)	**PILL OR SYRUP** ANTIBIOTIC . . . . . 01 ANTIMOTILITY . . . . . 02 ZINC . . . . . 03 OTHER (NOT ANTIBIOTIC, ANTIMOTILITY, OR ZINC) . . . . . 04 UNKNOWN PILL OR SYRUP . . . . . 05 **INJECTION** ANTIBIOTIC . . . . . 06 NON-ANTIBIOTIC . . . . 07 UNKNOWN INJECTION . . . . . 08 (IV) INTRAVENOUS . . . 09 HOME REMEDY/ HERBAL MEDICINE . 10 OTHER _____ 96 (SPECIFY)
D65		GO TO **D01** FOR NEXT CHILD OR, IF NO MORE CHILDREN, GO TO D66	GO TO **D01** FOR NEXT CHILD OR, IF NO MORE CHILDREN, GO TO D66	GO TO **D01 ON NEW PAGE** FOR NEXT CHILD OR, IF NO MORE CHILDREN, GO TO D66
D66	INSERT TIME MODULE ENDED	HOUR [ ][ ] MINUTE [ ][ ] → GO TO MODULE J1		

(1) The term(s) used for diarrhea should encompass the expressions used for all forms of diarrhea, including bloody stools (consistent with dysentery), watery stools, etc.

MODULE J1. PROGRAM INDICATORS (PRIMARY CARETAKER)

NO.	QUESTIONS AND FILTERS	CODING CATEGORIES	SKIP
J1.00	**INSERT TIME MODULE STARTED**	HOUR . . . . . [ ][ ] MINUTES . . . . . [ ][ ]	
J1.01	**HOUSEHOLD IDENTIFICATION** HOUSEHOLD (HH) AND ENUMERATION AREA (EA)	HH . ..... [ ][ ] VN . . . . [ ][ ]	
J1.02	LINE NUMBER IN THE HOUSEHOLD LISTING (COLUMN 8) OF THE CARETAKER OF A CHILD	LINE NUMBER . . . . . [ ][ ]	
J1.02A	INTERVIEWER CHECK IS THE PRIMARY CARETAKER MALE OR FEMALE?	MALE ..... 1 FEMALE 2	→ GO TO J1.10
HEALTH CARE			
J1.03	Are you currently married or living together with a man as if married?	YES, CURRENTLY MARRIED . . . . . 1 YES, LIVING WITH A MAN . . . . . 2 NO, NOT IN UNION 3	→ GO TO J1.06
J1.04	Who usually makes decisions about health care for yourself: you, your husband/partner, or you and your (husband/partner) jointly?	RESPONDENT . . . . . 1 HUSBAND/PARTNER . . . . . 2 RESPONDENT AND HER HUSBAND/PARTNER JOINT. . . . . 3 OTHER _____ (SPECIFY) 6	
J1.05	Who usually makes decisions about health care for your children [NAMES OF CHILDREN O-59 MONTHS]: you, your husband/partner, or you and your(husband/partner) jointly?	RESPONDENT . . . . . 1 HUSBAND/PARTNER . . . . . 2 RESPONDENT AND HER HUSBAND/PARTNER JOINTLY . . . . . 3 OTHER _____ (SPECIFY) 6	
ANTENATAL CARE			
J1.06	During your last pregnancy, did you see anyone for antenatal care? (Select all that apply)	DOCTORS ..... 1 NURSE/MIDWIFE ..... 2 TRADITIONAL BIRTH ATTENDANT ..... 3 VILLAGE HEALTH TEAMS ..... 4 Other (Specify) ..... 5 No one ..... 6 NEVER PREGNANT 9	→ GO TO J1.10
J1.07	Where did you receive antenatal care for this pregnancy?	GOVERNMENT HOSPITAL ..... 1 GOVERNMENT CLINIC/ GOVERNMENT FACILITY ..... 2 PRIVATE HOSPITAL ..... 3 PRIVATE MATERNITY ..... 4 HOME OF TRADITIONAL BIRTH ATTENDANT ..... 5 YOUR HOME ..... 6 OTHER (SPECIFY) 7	
J1.08	How many times did you receive antenatal care during this pregnancy?	NUMBER OF TIMES [ ][ ]	
J1.09	Did your partner accompany you to the health facility any time during your antenatal visits?	YES ..... 1 NO 2	

MODULE J1. PROGRAM INDICATORS (PRIMARY CARETAKER)

NO.	QUESTIONS AND FILTERS	CODING CATEGORIES	SKIP
J1.10	Please list as many examples as you can of important maternal child care practices DO NOT READ THEM THE RESPONSES. ASK THEM TO LIST AND THEN CIRCLE COORDINATING NUMBER	INITIATE BREASTFEED W/IN 1 HR OF DELIVERY ..... 1 EXCLUSIVE BREASTFEED FOR SIX MONTHS ..... 2 INTRO OF APPROPRIATE, SAFE, AND ADEQUATE COMPLEMENT FOODS AT 6 MONTHS UP TO 2 YEARS AND BEYOND .....3 BREASTFEED FREQUENTLY ON DEMAND, BOTH DAY AND NIGHT .....4 PROMOTION OF USE OF VARIETY OF NUTRITIOUS, LOCALLY AVAILABLE FOODS FOR INFANTS AND YOUNG CHILDREN ..... 5 PREGNANT/LACTATING WOMEN RECEIVE APPROPRIATE CARE AND ENCOURAGED TO CONSUME ADQUATE QUANT OF NUTRITIOUS FOOD .....6 CONTINUE OR INCREASE BRESASTFEEDING WHEN MOTHER OR CHILD IS SICK .....7 WHEN INFANT UNABLE TO SUCKLE, EXPRESSED BREASTMILK FED BY CUP OR TUBE .....8 MOTHER MAINTAINS HEALTH CARD TO MONITOR GROWTH AND DEVELOPMENT OF CHILD ..... 9 TAKE THEIR CHILD/REN TO HEALTH PROMOTION SESSIONS OR HEALTH FACILITY .....10 ENSURE TIMELY IMMUNIZATIONS ..... 11 ENSURE CHILD SLEEPS UNDER TREATED MOSQUITO NET (ITN) ..... 12 CONTINUE BREASTFEEDING FOR 1 YEAR OR 2 YEARS ..... 13 FEEDING FREQUEENT MEALS AND SNACKS ..... 14 FEEDING FOODS RICH IN IRON 15	
J1.11	**INSERT TIME MODULE ENDED**	HOUR . . . . . . MINUTES	→ GO TO WOMEN'S KISH GRID

KISH GRID for random selection of women in HHs with more than 1 woman age 15-49

INSTRUCTIONS

1. Check Column 9. If there is more than one woman 15-49 in the HH, then select one using the procedure below
2. List all women age 15-49 in the household, in descending order by age (oldest first)
3. Look up the last digit of the household number in the cover, and circle the corresponding column number below
4. Look up where last digit of questionnaire (columns) crosses the number of women 15-49 in HH (rows)
5. The digit in the cell where the column and row meet is the woman to interview for the Women Questionnaire

EXAMPLE: If No of women 15-49 = 3 & last digit = 5, select the 2nd woman listed.

No of Women 15-49	Line No.	Name	Age	Last digit of the household number (See Cover)									
				1	2	3	4	5	6	7	8	9	0
1				1	1	1	1	1	1	1	1	1	1
2				1	2	1	2	1	2	1	2	1	2
3				1	2	3	1	2	3	1	2	3	3
4				1	2	3	4	1	2	3	4	1	4
5				1	2	3	4	5	1	2	3	4	5
6				1	2	3	4	5	6	4	2	6	1
7				1	2	3	4	5	6	7	1	4	7
8				1	2	3	4	5	6	7	8	4	3
9				1	2	3	4	5	6	7	8	9	2
10				1	2	3	4	5	6	7	8	9	10

Module E. Women's Nutritional Status and Dietary Diversity

NO.	QUESTIONS AND FILTERS	WOMAN'S NAME _____
E00	INSERT TIME MODULE STARTED	HOUR . . . . . [ ][ ] MINUTE . . . . . [ ][ ]
E01	HOUSEHOLD IDENTIFICATION FROM THE COVER PAGE . . . . . . VILLAGE NUMBER	HH . . . . . [ ][ ] VN . . . . . [ ][ ]
E02	WOMAN'S ID CODE FROM THE HOUSEHOLD ROSTER	LINE NUMBER . . . . . [ ][ ]
E03	In what month and year were you born? IF DON'T KNOW MONTH RECORD "98" IF DON'T KNOW YEAR RECORD "9998"	MONTH . . . . . [ ][ ] YR [ ][ ][ ][ ]
E04	Please tell me how old you are. What was your age at your last birthday? RECORD AGE IN COMPLETED YEARS AND SKIP TO E06. IF RESPONDENT CANNOT REMEMBER HOW OLD SHE IS, CIRCLE 98 AND ASK QUESTION E05.	AGE . . . . . [ ][ ] DON'T KNOW 98
E05	Are you between the ages of 15 and 49 years old?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
E06	CHECK E03, E04 AND E05 (IF APPLICABLE): IS THE RESPONDENT BETWEEN THE AGES OF 15 AND 49 YEARS? IF THE INFORMATION IN E03, E04 AND E05 CONFLICTS, DETERMINE WHICH IS MOST ACCURATE.	YES . . . . . 1 NO . . . . . 2 GO BACK TO WOMEN'S KISH GRID AND SELECT ANOTHER WOMAN
	WOMAN'S DIETERY DIVERSITY	
	Yesterday during the day or night did you drink/eat any [ASK QUESTIONS E11 to E27]?	
E11	Food made from grains such as bread, biscuits, rice, noodles, chapati, posho, porridge, cereals, or sorghum mash/residue?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
E12	Pumpkin, carrots, squash, orange fleshed sweet potatoes, yams, or other foods that are yellow or orange inside?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
E13	White irish potatoes, white yams, white sweet potato, cassava, matoke, or any other foods made from roots?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
E14	Any dark green leafy vegetables such as spinach, lettuce, chard, dodo (amaranthis), pumkin leaves, cassava leaves, bean leaves, kales/sukumawiki, cowpea leaves, or okra?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
E15	Ripe mangoes, ripe papayas, melon, or passionfruit?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
E16	Any other fruits or vegetables such as: broccoli, cauliflower, eggplant, cucumber, watermelon, tomatoes, cabbage, etc.?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
E17	Liver, kidney, heart, or other organ meats, blood?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8

Module E. Women's Nutritional Status and Dietary Diversity

NO.	QUESTIONS AND FILTERS	WOMAN'S NAME _____
E18	Any meat, such as beef, pork, lamb, goat, chicken, or duck, game meat, bush rats?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
E19	Eggs?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
E20	Fresh or dried fish, shellfish, or seafood?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
E21	Any foods made from beans, peas, lentils, nuts, or seeds such as sunflower, groundnuts, simsim, cowpeas, pigeon peas, green grams?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
E22	Cheese, yogurt, or other milk products?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
E23	Any shea nut oil or other oils, fats, or butter, or foods made with any of of those products?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
E24	Any sugary foods such as chocolates, sweets, candies, pastries, cakes, or biscuits	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
E25	Condiments for flavor, such as chilies, spices, herbs, or fish powder?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
E26	Grubs, snails, or insects?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
E27	Foods made with red palm oil, red palm nut, or red palm nut pulp sauce?	YES . . . . . 1 NO . . . . . 2 DON'T KNOW 8
E28	I WOULD LIKE TO ASK YOU ABOUT PREGNANCIES AND BIRTHS YOU MAY HAVE HAD. Are you currently pregnant?	YES . . . . . 1 (SKIP TO E33) ↵ NO . . . . . 2 DON'T KNOW 8
E29	Have you ever been pregnant? IF "NO" PROBE BY ASKING Were you ever pregnant, even if this pregnancy did not result in the birth of a live child?	YES . . . . . 1 NO . . . . . 2 (SKIP TO E33) ↵
E30	Have you ever given birth? IF "NO" PROBE BY ASKING I mean, to a child even if the child lived only a few minutes or hours, or was born dead?	YES . . . . . 1 NO . . . . . 2 (SKIP TO E33) ↵
E31	When was the last time you gave birth (even if your child is no longer living)? IF THE RESPONDENT DOES NOT KNOW THE BIRTHDATE ASK: Do you have a health/vaccination card for that child with the birthdate recorded? IF THE HEALTH/VACCINATION CARD IS SHOWN, RECORD THE DATE OF BIRTH AS DOCUMENTED ON THE CARD	Date of Last Birth DAY..... |___|___| If day is not known, enter '98' above MONTH..... |___|___| YEAR..... |___|___| |___|___|
E33	**INSERT TIME MODULE ENDED** HOUR [ ][ ] MINUTE [ ][ ]	→ GO TO MODULE J5

MODULE J5. PROGRAM INDICATORS (WOMAN 15-49)

NO.	QUESTIONS AND FILTERS	CODING CATEGORIES	SKIP
J5.00	**INSERT TIME MODULE STARTED**	HOUR [ ][ ] MINUTE [ ][ ]	
J5.01	**HOUSEHOLD IDENTIFICATION** HOUSEHOLD (HH) AND ENUMERATION AREA (EA)	HH . ..... [ ][ ] VN . . . . [ ][ ]	
J5.02	LINE NUMBER IN THE HOUSEHOLD LISTING (COLUMN 9) OF ONE WOMAN AGED 15-49	LINE NUMBER . . . . . [ ][ ]	
FAMILY PLANNING (P8)			
J5.03	At this time, do you know of a place where you can go to receive services for family planning?	YES ..... 1 NO 2	
J5.04	Are you and your partner currently doing something to delay or prevent you from getting pregnant?	YES ..... 1 NO 2	→ GO TO J5.08
J5.05	If yes, which method? CIRCLE ALL THAT APPLY	FEMALE STERILIZATION ..... 1 MALE STERILIZATION ..... 2 PILLS ..... 3 IUD ..... 4 INJECTION ..... 5 IMPLANTS ..... 6 MALE CONDOMS ..... 7 FEMALE CONDOMS ..... 8 DIAPHRAM ..... 9 JELLY ..... LACTATION AMENORRHEA ..... 11 WITHDRAWAL ..... 12 RHYTHM ..... 13 OTHER (SPECIFY) 14	
J5.06	If you are receiving family planning services, where do you go for them? CIRCLE ALL THAT APPLY	GOVERNMENT HEALTH FACILITY ..... 1 NGO HEALTH FACILITY ..... 2 PRIVATE CLINIC/DRUG SHOP ..... 3 COMMUNITY DISTRIBUTOR ..... 4 COMMUNITY OUTREACH ..... 5 OTHER (SPECIFY) 6	
J5.07	If not, what is the reason? CIRCLE ALL THAT APPLY	DISTANCE TO FACILITY ..... 1 COST ..... 2 RELIABILITY ..... 3 OTHER (SPECIFY) 5	
J5.08	**INSERT TIME MODULE ENDED**	HOUR [ ][ ] MINUTE [ ][ ]	→ GO TO MODULE H1

MODULE H. POVERTY MEASUREMENT

HOUSEHOLD NUMBER FROM MODULE A .... [ ][ ]

VILLAGE NUMBER FROM MODULE A .... [ ][ ]

INFORMANT'S LINE NUMBER IN HOUSEHOLD ROSTER (COLUMN 6) .... [ ][ ]

INSERT TIME MODULE STARTED

HOUR [ ][ ]

MINUTES [ ][ ]

MODULE H1. FOOD, BEVERAGES AND TOBACCO CONSUMPTION OVER PAST 7 DAYS

ITEM CODE	PRODUCT	YES = 1 NO = 2	FOOD CONSUMPTION OVER PAST 7 DAYS		FROM PURCHASES		TOTAL SPENT	FROM AGRICULTURAL PRODUCTION		FROM GIFTS AND OTHER SOURCES	
	Over the past one week (7 days), did you or others in your household eat any [ITEM]? INCLUDE FOOD BOTH EATEN COMMUNALLY IN THE HOUSEHOLD AND SEPARATELY BY INDIVIDUAL HOUSEHOLD MEMBERS. DO NOT INCLUDE FOOD OR DRINKS EATEN IN RESTAURANTS.	IF "NO" SKIP TO NEXT ITEM	How much in total did your household eat in the past week?		How much from [ITEM] came from purchases?		How much did you spend on what was eaten If the family ate part but not all of something they purchased, estimate only cost of what was consumed.	How much came from own production?		How much came from gifts and other sources?	
H1.01		**H1.02**	**H1.03A QUANTITY**	**H1.03B UNIT**	**H1.04A QUANTITY**	**H1.04B UNIT**	**H1.05 SHILLING/UGX**	**H1.06A QUANTITY**	**H1.06B UNIT**	**H1.07A QUANTITY**	**H1.07B UNIT**
101	Matooke	1 2									
105	Sweet Potatoes	1 2									
107	Cassava	1 2									
109	Irish Potatoes	1 2									
110	Rice	1 2									
111	Maize	1 2									
114	Bread	1 2									
115	Millet	1 2									
116	Sorghum	1 2									
119	Goat Meat	1 2									
120	Other Meat	1 2									
121	Chicken	1 2									
122	Fish	1 2									
124	Eggs	1 2									
125	Fresh Milk	1 2									
126	Infant Formula Foods	1 2									
127	Cooking oil	1 2									
129	Margarine, Butter, Ghee, etc	1 2									
130	Fruits	1 2									

UNIT CODES

Kilogramme . . . 1	NO.12 PLATE . 7	BASKET (DENGU)	LITRE. 15	BASIN. 21
50 kg. Bag 2	BUNCH. 8	(SHELLED). 12	CUP. 16	SATCHET/TUBE. . .22
90 kg. Bag 3	PIECE. 9	BASKET (DENGU)	TIN. 17	TOTAL 23
Pail (small) . . .4	HEAP 10	(UNSHELLED) . . 13	GRAM 18	OTHER _____96
Pail (large) . . .5	BALE 11	OX-CART	MILLILITRE . . . 19	(SPECIFY)
No. 10 plate . . .6		(UNSHELLED) . . 14	TEASPOON. 20	

Bags: Uganda normally uses 100kg bags.

MODULE H1. FOOD, BEVERAGES AND TOBACCO CONSUMPTION OVER PAST 7 DAYS

ITEM CODE	PRODUCT	YES = 1 NO = 2	FOOD CONSUMPTION OVER PAST 7 DAYS		FROM PURCHASES		TOTAL SPENT	FROM AGRICULTURAL PRODUCTION		FROM GIFTS AND OTHER SOURCES	
	Over the past one week (7 days), did you or others in your household eat any [ITEM]? INCLUDE FOOD BOTH EATEN COMMUNALLY IN THE HOUSEHOLD AND SEPARATELY BY INDIVIDUAL HOUSEHOLD MEMBERS. DO NOT INCLUDE FOOD OR DRINKS EATEN IN RESTAURANTS.	IF "NO" SKIP TO NEXT ITEM	How much in total did your household eat in the past week?		How much from [ITEM] came from purchases?		How much did you spend on what was eaten If the family ate part but not all of something they purchased, estimate only cost of what was consumed.	How much came from own production?		How much came from gifts and other sources?	
H1.01		**H1.02**	**H1.03A QUANTITY**	**H1.03B UNIT**	**H1.04A QUANTITY**	**H1.04B UNIT**	**H1.05 SHILLING/UGX**	**H1.06A QUANTITY**	**H1.06B UNIT**	**H1.07A QUANTITY**	**H1.07B UNIT**
135	Onions	1 2									
136	Tomatoes	1 2									
139	Other vegetables	1 2									
140	Beans	1 2									
142	Ground nuts	1 2									
145	Peas	1 2									
146	Sim sim	1 2									
147	Sugar	1 2									
148	Coffee	1 2									
149	Tea	1 2									
150	Salt	1 2									
151	Soda (NOT AT RESTAURANTS)	1 2									
152	Alcoholic Drinks (NOT AT RESTAURANTS)	1 2									
154	Other drinks	1 2									
155	Cigarettes	1 2									
156	Other Tobacco	1 2									
	EXPENDITURE AT RESTAURANTS										
157	Food	1 2									
158	Drinks	1 2									
	OTHER FOOD NOT LISTED										
161	SPECIFY _____	1 2									
161	SPECIFY _____	1 2									
161	SPECIFY _____	1 2									

UNIT CODES

Kilogramme . . . 1	NO.12 PLATE . 7	BASKET (DENGU)	LITRE. 15	BASIN. 21
50 kg. Bag 2	BUNCH. 8	(SHELLED). 12	CUP. 16	SATCHET/TUBE. . .22
90 kg. Bag 3	PIECE. 9	BASKET (DENGU)	TIN. 17	TOTAL 23
Pail (small) . . .4	HEAP 10	(UNSHELLED) . . 13	GRAM 18	OTHER _____96
Pail (large) . . .5	BALE 11	OX-CART	MILLILITRE . . . 19	(SPECIFY)
No. 10 plate . . .6		(UNSHELLED) . . 14	TEASPOON. 20	

MODULE H2. NON-DURABLE GOODS AND FREQUENTLY PURCHASED SERVICES OVER PAST MONTH

H2.01	HOUSEHOLD AND VILLAGE NUMBER	HH. [ ][ ] VN. . . . . [ ][ ]
H2.02	LINE NUMBER IN THE HOUSEHOLD LISTING (COLUMN 10) OF HEAD OF HOUSEHOLD OR RESPONSIBLE ADULT	. . . . . [ ][ ]

ITEM NO.	QUESTIONS FOR A REFERENCE PERIOD OF ONE MONTH	CODING CATEGORIES	COST IN SHILLING/UGX
	Over the past one month, did your household use or buy any [ITEM]:		How much did you pay (how much did they cost) in total?
	HOUSE/FUEL/POWER		
304	Maintenance and repair expenses?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
305	Water?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
306	Electricity?	YES . . . . . 1 NO . . . . . 2 NEXT ITEM)	TOTAL COST _____
307	Generators/lawn mower fuels?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
308	Paraffin (Kerosene)?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
309	Charcoal?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
310	Firewood?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
311	Other expenditures? What?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
	NON-DURABLE OR PESONAL GOODS		
451	Matches?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
452	Soap?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
454	Tooth paste?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
455	Cosmetics?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
456	Handbags, travel bags, etc?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
457	Batteries (Dry cells)?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
458	Newspapers and Magazines?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____

MODULE H2. NON-DURABLE GOODS AND FREQUENTLY PURCHASED SERVICES OVER PAST MONTH

H2.01	HOUSEHOLD AND VILLAGE NUMBER	HH. ☐☐	VN. . . . . ☐☐
H2.02	LINE NUMBER IN THE HOUSEHOLD LISTING (COLUMN 10) OF HEAD OF HOUSEHOLD OR RESPONSIBLE ADULT	. . . . . ☐☐	

ITEM NO.	QUESTIONS FOR A REFERENCE PERIOD OF ONE MONTH	CODING CATEGORIES	COST IN SHILLING/UGX
	Over the past one month, did your household use or buy any [ITEM]:		How much did you pay (how much did they cost) in total?
459	Security protection (weapons, bows, bullets, etc.)	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
460	Other non-durable and personal goods? What?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
461	Tires, tubes, spares, etc	YES . . . . . 1 NO . . . . . 2 NEXT ITEM)	TOTAL COST _____
462	Petrol, diesel etc	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
463	Transport Fares (taxi, bus, boda boda)?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
466	Stamps, envelopes?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
467	Phone fees (fixed/ mobile phones)?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
469	Mobile money fees	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
471	Other transport and communications expenditures? What? LIST EXPENDITURE _____ LIST EXPENDITURE _____	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____ _____
501	Health and medical care services?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
502	Medicines, etc?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
601	Sports, theaters, etc?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
602	Dry cleaning and laundry?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____

MODULE H2. NON-DURABLE GOODS AND FREQUENTLY PURCHASED SERVICES OVER PAST MONTH

H2.01	HOUSEHOLD AND VILLAGE NUMBER	HH. [ ][ ]	VN. . . . . [ ][ ]
H2.02	LINE NUMBER IN THE HOUSEHOLD LISTING (COLUMN 10) OF HEAD OF HOUSEHOLD OR RESPONSIBLE ADULT	. . . . . [ ][ ]	
ITEM NO.	**QUESTIONS FOR A REFERENCE PERIOD OF ONE MONTH**	**CODING CATEGORIES**	**COST IN SHILLING/UGX**
	Over the past one month, did your household use or buy any [ITEM]:		How much did you pay (how much did they cost) in total?
603	Houseboys/ girls, Shamba boys etc?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
604	Barber and beauty shops?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
605	Expenses in hotels, lodging, etc?	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
606	Other expenditures? What? LIST EXPENDITURE _____ LIST EXPENDITURE _____	YES . . . . . 1 NO . . . . . 2 (NEXT MODULE)	TOTAL COST _____ _____

MODULE H3. NON-FOOD EXPENDITURES OVER PAST 12 MONTHS

ITEM NO.	QUESTIONS AND FILTERS (ONE YEAR REFERENCE)	CODING CATEGORIES	TOTAL COST IN SHILLING/UGX
	Over the past twelve months (one year), did your household use or buy any [ITEM]:		How much did you pay (how much did they cost) in total?
	CLOTHING AND FOOTWEAR		
201	Clothing (mens, womens, childrens)	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
202	Other clothing and clothing materials	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
203	Tailoring and Materials	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
204	Footwear (mens, womens, childrens)	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
205	Other Footwear and repairs	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
301	Furniture Items	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
302	Carpets, mats, etc.	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
303	Bedding (curtains, bed sheets, mattresses, blankets, etc.)	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
304	Others and Repairs	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
401	Charcoal and Kerosene Stoves	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
402	Electronic Appliances or Equipment (iron, kettle, TV, radio cassette, etc.)	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
403	Transport equipment (bicycles, motor cycles, motors, pick-ups, etc.)	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
404	Radio	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
405	Computers for household use	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____

MODULE H3. NON-FOOD EXPENDITURES OVER PAST 12 MONTHS

ITEM NO.	QUESTIONS AND FILTERS (ONE YEAR REFERENCE)	CODING CATEGORIES	TOTAL COST IN SHILLING/UGX
	Over the past twelve months (one year), did your household use or buy any [ITEM]:		How much did you pay (how much did they cost) in total?
406	Phone Handsets (both fixed and mobile)	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
407	Agricultural tools	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
408	Security/protection - weapons, bows, bullets	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
409	Other equipment and repairs	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
410	Jewelry, Watches, etc	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
501	Plastics (basins, plates, tumblers, buckets, jerry canes)	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
504	Enamel and metallic utensils	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
505	Switches, plugs, cables, etc	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
506	Others and repairs	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
601	Educational expenses (fees, PTA, boarding, uniforms, books & supplies)	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
602	Other educational expenses	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
701	Expenditure on household functions	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
702	Expenditure on agricultural services	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
703	Other services N.E.S.	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____

MODULE H3. NON-FOOD EXPENDITURES OVER PAST 12 MONTHS

ITEM NO.	QUESTIONS AND FILTERS (ONE YEAR REFERENCE)	CODING CATEGORIES	TOTAL COST IN SHILLING/UGX
	Over the past twelve months (one year), did your household use or buy any [ITEM]:		How much did you pay (how much did they cost) in total?
801	Taxes (income, local services, etc.)	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
802	Property rates (taxes)	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
803	User fees and charges	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
805a	Pension and social security payments	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
805b	Insurance premiums	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
806	Remittances, gifts, and other transfers	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
807	Funerals and other social functions	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
808	Interest on Loans	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
809	Dowry and/or debt payments	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
810	Animal sales letter/market fee	YES . . . . . 1 NO . . . . . 2 (NEXT ITEM)	TOTAL COST _____
811	Other expenditures, what? LIST EXPENDITURE _____ LIST EXPENDITURE _____	YES . . . . . 1 (GO TO NEXT MODULE)	TOTAL COST _____ _____

MODULE H4. HOUSING EXPENDITURES

NO.	QUESTIONS AND FILTERS	CODING CATEGORIES	SKIP
101	Do you own or are you purchasing this house, is it provided to you by an employer, do you use it for free, or do you rent this house?	OWN . . . . . 01 BEING PURCHASED . . . . . 02 EMPLOYER PROVIDES . . . . . 03 FREE, AUTHORIZED . . . . . 04 FREE, NOT AUTHORIZED . . . . . 05 RENTED . . . . . 06 OTHER_____ 96 (SPECIFY) DON'T KNOW/NO RESPONSE/ NOT APPLICABLE 98	→104 →104 →104 →105 →104 →H5
102	If you sold this dwelling today, how much would you receive for it?	SHILLING/UGX_____ DON'T KNOW/NO RESPONSE/ NOT APPLICABLE 98	
103	How many years ago was this house built? How old is it?	YEARS. . . . . [ ][ ] DON'T KNOW 98	
104	If you rented this dwelling today, how much rent would you receive?	SHILLING/UGX_____ DAY . . . . . 1 WEEK . . . . . 2 MONTH . . . . . 3 YEAR . . . . . 4 DON'T KNOW/NO RESPONSE/ NOT APPLICABLE 8	→H5 →H5 →H5 →H5 →H5
105	How much do you pay to rent this dwelling?	SHILLING/UGX_____ DAY . . . . . 1 WEEK . . . . . 2 MONTH . . . . . 3 YEAR . . . . . 4 DON'T KNOW/NO RESPONSE/ NOT APPLICABLE 8	

MODULE H5. VALUE OF ASSETS

ITEM CODE	PRODUCT	YES = 1 NO = 2	NUMBER OF UNITS OF EACH ITEM	AGE OF ITEMS	PRICE IF SOLD	ITEMS BOUGHT IN LAST 12 MONTHS	AMOUNT PAID FOR ALL ITEMS BOUGHT IN THE LAST 12 MONTHS
	Does your household own a [ITEM]? CIRCLE 1 (YES) OR 2 (NO) IN THE FOLLOWING COLUMN. IF THE ANSWER IS "NO" ASK THE QUESTIONS FOR THE FOLLOWING ITEM.		How many [ITEMS] do you own?	What is the age of these [ITEM]s? IF MORE THAN ONE ITEM, AVERAGE AGE	If you wanted to sell one of these [ITEM]s today, how much would you receive? IF MORE THAN ONE ITEM, AVERAGE VALUE	Did you purchase or pay for any of these [ITEM]s in the last 12 months? "NO": CIRCLE "2" AND GO TO NEXT ITEM.	How much did you pay for all these [ITEM]s all together (total) in the last 12 months?
H5.1		**H5.2**	**H5.3 NUMBER OF ITEMS**	**H5.4 NUMBER OF YEARS**	**H5.5 SHILLING/UGX**	**H5.6**	**H5.7 SHILLING/UGX**
02	Other Buildings besides House	1 2				1 2	
03	Land	1 2				1 2	
04	Furniture/Furnishings	1 2				1 2	
05	Household Appliances e.g. Kettle, Flat iron, etc.	1 2				1 2	
06	Television	1 2				1 2	
07	Radio/Cassette	1 2				1 2	
08	Generators	1 2				1 2	
09	Solar panel/electric inverters	1 2				1 2	
10	Bicycle	1 2				1 2	
11	Motor cycle	1 2				1 2	
12	Motor vehicle	1 2				1 2	
13	Boat	1 2				1 2	
14	Other Transport equipment	1 2				1 2	
15	Jewelry and Watches	1 2				1 2	
16	Mobile phone	1 2				1 2	
17	Computer	1 2				1 2	
18	Internet Access	1 2				1 2	
19	Other electronic equipment	1 2				1 2	
20	Agricultural equipment	1 2				1 2	
21	Goats	1 2				1 2	
22	Chickens	1 2				1 2	
23	Cattle	1 2				1 2	
24	Pigs	1 2				1 2	

MODULE H5. VALUE OF ASSETS

ITEM CODE	PRODUCT	YES = 1 NO = 2	NUMBER OF UNITS OF EACH ITEM	AGE OF ITEMS	PRICE IF SOLD	ITEMS BOUGHT IN LAST 12 MONTHS	AMOUNT PAID FOR ALL ITEMS BOUGHT IN THE LAST 12 MONTHS
	Does your household own a [ITEM]? CIRCLE 1 (YES) OR 2 (NO) IN THE FOLLOWING COLUMN. IF THE ANSWER IS "NO" ASK THE QUESTIONS FOR THE FOLLOWING ITEM.		How many [ITEMS] do you own?	What is the age of these [ITEM]s? IF MORE THAN ONE ITEM, AVERAGE AGE	If you wanted to sell one of these [ITEM]s today, how much would you receive? IF MORE THAN ONE ITEM, AVERAGE VALUE	Did you purchase or pay for any of these [ITEM]s in the last 12 months? "NO": CIRCLE "2" AND GO TO NEXT ITEM.	How much did you pay for all these [ITEM]s all together (total) in the last 12 months?
H5.1		**H5.2**	**H5.3 NUMBER OF ITEMS**	**H5.4 NUMBER OF YEARS**	**H5.5 SHILLING/UGX**	**H5.6**	**H5.7 SHILLING/UGX**
25	Camels	1 2				1 2	
26	Donkeys	1 2				1 2	
27	Solar lanterns/chargers	1 2				1 2	
28	Fuel efficient stoves	1 2				1 2	
29	Mosquito nets	1 2				1 2	
30	Other household assets e.g. lawn mowers, etc.	1 2				1 2	
31	Other, what? _____	1 2				1 2	
32	Other, what? _____	1 2				1 2	
33	Other, what? _____	1 2				1 2	

H5.8 **INSERT TIME MODULE ENDED** **HOUR** [ ][ ] **MINUTE** [ ][ ]

INTERVIEWER'S OBSERVATIONS

TO BE FILLED IN AFTER COMPLETING INTERVIEW

COMMENTS ABOUT RESPONDENT:

COMMENTS ON SPECIFIC QUESTIONS:

ANY OTHER COMMENTS:

TEAM LEADER'S OBSERVATIONS

NAME OF TEAM LEADER: _____ DATE: _____

EDITOR'S OBSERVATIONS

NAME OF EDITOR: _____ DATE: _____

ANTHROPOMETRY

HOUSEHOLD NUMBER ☐☐ **VILLAGE NUMBER** ☐☐ **START TIME** **HOUR:** ☐☐ **MINUTE:** ☐☐

CHILDREN LESS THAN 5 YEARS OF AGE (0-59 Months)						WEIGHT AND HEIGHT OF CHILDREN LESS THAN 5 YEARS OF AGE (0-59 MONTHS)				
D67	D68	D69	D70	D71	D72	D73	D74	D75	D76	D77
LINE NO. FROM HH ROSTER	NAME	SEX MALE: 1 FEMALE: 2	AGE IN MONTHS	CHILD'S DATE OF BIRTH DD/MM/YY	SOURCE BIRTH DATE	WEIGHT (KILOGRAMS)	HEIGHT (CENTIMETERS)	HEIGHT MEASURED LAYING DOWN: 1 OR STANDING UP: 2	RESULT MEASURED: 1 NOT PRESENT: 2 REFUSED: 3 OTHER: 6 (explain in comment box)	EDEMA YES: 1 NO: 2
☐☐	_____	☐	☐☐	DAY ☐☐ MONTH ☐☐ YEAR ☐☐	☐	☐☐.☐☐ KG	☐☐☐.☐ CM	☐	☐	☐
☐☐	_____	☐	☐☐	☐☐ ☐☐ ☐☐	☐	☐☐.☐☐ KG	☐☐☐.☐ CM	☐	☐	☐
☐☐	_____	☐	☐☐	☐☐ ☐☐ ☐☐	☐	☐☐.☐☐ KG	☐☐☐.☐ CM	☐	☐	☐
☐☐	_____	☐	☐☐	☐☐ ☐☐ ☐☐	☐	☐☐.☐☐ KG	☐☐☐.☐ CM	☐	☐	☐
☐☐	_____	☐	☐☐	☐☐ ☐☐ ☐☐	☐	☐☐.☐☐ KG	☐☐☐.☐ CM	☐	☐	☐

COMMENTS:

SOURCE OF BIRTH DATE
1. BIRTH CERTIFICATE
2. BAPTISMAL/CHURCH RECORD
3. HEALTH REGISTRATION CARD
4. HOME RECORD
5. PARENT STATEMENT
6. OTHER _____

SELECTED WOMAN'S (15-49) INFORMATION			WEIGHT AND HEIGHT OF SELECTED WOMAN (15-49)		
E34	E35	E36	E37	E38	E39
LINE NO. FROM HH ROSTER	NAME	AGE IN YEARS	HEIGHT (CENTIMETERS)	WEIGHT (KILOGRAMS)	RESULT MEASURED: 1 NOT PRESENT: 2 REFUSED: 3 OTHER: 6 (explain in comment box)
☐☐		☐☐	☐☐☐.☐ CM	☐☐.☐☐ KG	☐

COMMENTS:

END TIME

HOUR: ☐☐

MINUTE: ☐☐

ANTHROPOMETRIST PRINT NAME: _____ SIGNATURE: _____ ☐☐☐ ID # ☐☐ DAY ☐☐ MONTH ☐☐ YEAR

SUPERVISOR PRINT NAME: _____ SIGNATURE: _____ ☐☐☐ ID # ☐☐ DAY ☐☐ MONTH ☐☐ YEAR

BIRTH DATE TO AGE IN MONTHS CONVERSION TABLES

Birth Date - 2013	Study Date 2013 Feb.	Mar.	Apr.
Jan.	1	2	3
Feb.	0	1	2
Mar.	--	0	1
Apr.	--	--	0
May	--	--	--
June	--	--	--
July	--	--	--
Aug.	--	--	--
Sept.	--	--	--
Oct.	--	--	--
Nov.	--	--	--
Dec.	--	--	--

Birth Date - 2012	Study Date 2013 Feb.	Mar.	Apr.
Jan.	13	14	15
Feb.	12	13	14
Mar.	11	12	13
Apr.	10	11	12
May	9	10	11
June	8	9	10
July	7	8	9
Aug.	6	7	8
Sept.	5	6	7
Oct.	4	5	6
Nov.	3	4	5
Dec.	2	3	4

Birth Date - 2011	Study Date 2013 Feb.	Mar.	Apr.
Jan.	25	26	27
Feb.	24	25	26
Mar.	23	24	25
Apr.	22	23	24
May	21	22	23
June	20	21	22
July	19	20	21
Aug.	18	19	20
Sept.	17	18	19
Oct.	16	17	18
Nov.	15	16	17
Dec.	14	15	16

Birth Date - 2010	Study Date 2013 Feb.	Mar.	Apr.
Jan.	37	38	39
Feb.	36	37	38
Mar.	35	36	37
Apr.	34	35	36
May	33	34	35
June	32	33	34
July	31	32	33
Aug.	30	31	32
Sept.	29	30	31
Oct.	28	29	30
Nov.	27	28	29
Dec.	26	27	28

Birth Date - 2009	Study Date 2013 Feb.	Mar.	Apr.
Jan.	49	50	51
Feb.	48	49	50
Mar.	47	48	49
Apr.	46	47	48
May	45	46	47
June	44	45	46
July	43	44	45
Aug.	42	43	44
Sept.	41	42	43
Oct.	40	41	42
Nov.	39	40	41
Dec.	38	39	40

Birth Date - 2008	Study Date 2013 Feb.	Mar.	Apr.
Jan.	61	62	63
Feb.	60	61	62
Mar.	59	60	61
Apr.	58	59	60
May	57	58	59
June	56	57	58
July	55	56	57
Aug.	54	55	56
Sept.	53	54	55
Oct.	52	53	54
Nov.	51	52	53
Dec.	50	51	52

Birth Date - 2007	Study Date 2013 Feb.	Mar.	Apr.
Jan.	--	--	--
Feb.	72	--	--
Mar.	71	72	--
Apr.	70	71	72
May	69	70	71
June	68	69	70
July	67	68	69
Aug.	66	67	68
Sept.	65	66	67
Oct.	64	65	66
Nov.	63	64	65
Dec.	62	63	64

INTERVIEWER'S OBSERVATIONS

TO BE FILLED IN AFTER COMPLETING INTERVIEW

COMMENTS ABOUT RESPONDENT:

COMMENTS ON SPECIFIC QUESTIONS:

ANY OTHER COMMENTS:

SUPERVISOR'S OBSERVATIONS

NAME OF TEAM LEADER: _____ DATE: _____

EDITOR'S OBSERVATIONS

NAME OF EDITOR: _____ DATE: _____

WOMEN'S EMPOWERMENT IN AGRICULTURE INDEX

Enumerator: This questionnaire should be administered separately to the primary and secondary respondents identified in the household questionnaire. You should complete this coversheet for each individual identified in the "selection section" even if the individual is not available to be interviewed for reporting purposes.

Please double check to ensure:

- *You have completed the roster section of the household questionnaire to identify the correct primary and/or secondary respondent(s);*
- *You have noted the household ID and individual ID correctly for the person you are about to interview;*
- *You have gained informed consent for the individual in the household questionnaire;*
- *You have sought to interview the individual in private or where other members of the household cannot overhear or contribute answers.*
- *Do not attempt to make responses between the primary and secondary respondent the same—it is ok for them to be different.*

MODULE 1. INDIVIDUAL IDENTIFICATION

	Code			Code
1.01. Household Identification:	☐☐		1.09. Name of respondent currently being interviewed (ID Code from roster in Section B, Household Roster): Surname, First name:	☐☐
1.02. Village number	☐☐		1.10. Outcome of interview	☐
1.03 Parish name	_____		1.11. Ability to be interviewed alone:	☐
1.04. Subcounty name	_____			
1.05 District Name	_____			
1.06. Primary Decision-Maker Name and ID (from Module A and B) _____	☐☐			
1.07. Secondary Decision-Maker Name and ID (from Module A and B) _____	☐☐			
1.08. Type of household Male and female adult ……....1 Female adult only……2 Male adult only……3 Child only (no adults 18 or older)…..4	☐		1.10 Completed .....1 Incomplete .....2 Absent.....3 Refused .....4 Could not locate.....5 Household not eligible for interview…… …6	1.11 Alone.....…1 With adult females present.....…2 With adult males present.....…3 With adults mixed sex present…… .....…4 With children present.....…5 With adults mixed sex and children present…..6

The **primary and secondary decision makers** are those who <u>self-identify</u> as the primary male and female (or female only) members responsible for the decision making, both social and economic, within the household. In Male and Female Adult Households, they are usually the husband and wife; however they can also be other household members as long as they are aged 18 and over. In Female Adult Only households, there will only be a Primary Decision-Maker -- the principal female decision-maker aged 18 or older. Primary and Secondary Decision-Makers do not need to be noted for Male Adult Only and Child Only Households, and the WEAI should not be applied in Male Adult Only and Child Only Households.

MODULE 2: ROLE IN HOUSEHOLD DECISION-MAKING AROUND PRODUCTION AND INCOME GENERATION

Activity		Did you (singular) participate in [ACTIVITY] in the past 12 months (that is during the last [one/two] cropping seasons)? Yes.....1 No.....2 >> next activity	How much input did you have in making decisions about [ACTIVITY]?	How much input did you have in decisions on the use of income generated from [ACTIVITY]
ActivityCode	Activity Description	2.01	2.02	2.03
A	Food crop farming: crops that are grown primarily for household food consumption			
B	Cash crop farming: crops that are grown primary for sale in the market			
C	Livestock raising			
D	Non-farm economic activities: Small business, self-employment, buy-and-sell			
E	Wage and salary employment: in-kind or monetary work both agriculture and other wage work			
F	Fishing or fishpond culture			
			2.02/2.03: Input into decision making No input.....1 Input into very few decisions.....2 Input into some decisions .....3 Input into most decisions .....4 Input into all decisions.....5 No decision made 6	

MODULE 3: ACCESS TO PRODUCTIVE CAPITAL

.

Productive Capital		Does anyone in your household currently have any [ITEM]? Yes .....1 No.....2 >> next item	How many of [ITEM] does your household currently have?	Who would you say owns most of the [ITEM]?	Who would you say can decide whether to sell [ITEM] most of the time?	Who would you say can decide whether to give away [ITEM] most of the time?	Who would you say can decide to mortgage or rent out [ITEM] most of the time?	Who contributes most to decisions regarding a new purchase of [ITEM]?
Productive Capital		3.01a	3.01b	3.02	3.03	3.04	3.05	3.06
A	Agricultural land (pieces/plots)							
B	Large livestock (oxen, cattle)							
C	Small livestock (goats, pigs, sheep)							
D	Chickens, Ducks, Turkeys, Pigeons							
E	Fish pond or fishing equipment							
F	Farm equipment (non-mechanized)							
G	Farm equipment (mechanized)							
H	Nonfarm business equipment							
I	House (and other structures)							
J	Large consumer durables (fridge, TV, sofa)							
K	Small consumer durables (radio, cookware)							
L	Cell phone							
M	Other land not used for agricultural purposes (pieces, residential or commercial land)							
N	Means of transportation (bicycle, motorcycle, car)							

3.02-3.06: Decision-making and control over productive capital

Self.....1
Partner/Spouse.....2
Self and partner/spouse jointly 3
Other household member ……..4
Self and other household member(s)……..5
Partner/Spouse and other household member(s)……...6
Someone (or group of people) outside the household……..7
Self and other outside people……...8
Partner/Spouse and other outside people…..9
Self, partner/spouse and other outside people.....10

MODULE 3 continued: ACCESS TO CREDIT

Lending sources		Has anyone in your household taken any loans or borrowed cash/in-kind from [SOURCE] in the past 12 months?	Who made the decision to borrow from [SOURCE]?	Who makes the decision about what to do with the money/ item borrow from [SOURCE]?
Lending source names		3.07	3.08	3.09
A	Non-governmental organization (NGO)			
B	Informal lender			
C	Formal lender (bank/financial institution)			
D	Friends or relatives			
E	Group based micro-finance or lending including VSLAs / SACCOs/ merry-go-rounds			
		G3.07 Taken loans Yes, cash ..... 1 Yes, in-kind ..... 2 Yes, cash and in-kind ..... 3 No ..... 4 >> next source Don't know……..5 >> next source	3.08/3.09: Decision-making and control over credit Self…….....1 Partner/Spouse.....……..2 Self and partner/spouse jointly…….....……..3 Other household member.....……..4 Self and other household member(s)……..5 Partner/Spouse and other household member(s).....6 Someone (or group of people) outside the household….7 Self and other outside people.....…….....8 Partner/Spouse and other outside people……..9 Self, partner/spouse and other outside people.....10	

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MODULE 4: INDIVIDUAL LEADERSHIP AND INFLUENCE IN THE COMMUNITY

QNo.	Question	Response	Response codes
4.01	Do you feel comfortable speaking up in public to help decide on infrastructure (like small wells, roads, water supplies) to be built in your community?		No, not at all comfortable ..... 1 Yes, but with a great deal of difficulty ..... 2 Yes, but with a little difficulty ..... 3 Yes, fairly comfortable..... 4 Yes, very comfortable 5
4.02	Do you feel comfortable speaking up in public to ensure proper payment of wages for public works or other similar programs?		
4.03	Do you feel comfortable speaking up in public to protest the misbehavior of authorities or elected officials?		

MODULE 4 continued: GROUP MEMBERSHIP AND INFLUENCE IN THE GROUP

Group membership		Is there a [GROUP] in your community? Yes ..... 1 No ..... 2 >> next group	Are you an active member of this [GROUP]? Yes .. 1 No ... 2
	Group Categories	4.04	4.05
A	Agricultural / livestock/ fisheries producer's group (including marketing groups)		
B	Water users' group		
C	Forest users' group		
D	Credit or microfinance group (including SACCOs/merry-go-rounds/ VSLAs)		
E	Mutual help or insurance group (including burial societies)		
F	Trade and business association		
G	Civic groups (improving community) or charitable group (helping others)		
H	Local government		
I	Religious group		
J	Other women's group (only if it does not fit into one of the other categories)		
K	Other (specify)		

MODULE 5: DECISION MAKING

ENUMERATOR: Ask G5.01 for all categories of activities before asking G5.02. Do not ask G5.02 if G5.01 response is 1 and respondent is male OR G5.01 response is 2 and respondent is female. *If household does not engage in that particular activity, enter 98 and proceed to next activity.*		When decisions are made regarding the following aspects of household life, who is it that normally takes the decision?	To what extent do you feel you can make your own personal decisions regarding these aspects of household life if you want(ed) to? Ask only if G5.01 is 1 and respondent is female, G5.01 is 2 and respondent is male, or G5.01 is 3-7.
		5.01	5.02
A	Getting inputs for agricultural production		
B	The types of crops to grow for agricultural production		
C	Taking crops to the market (or not)		
D	Livestock raising		
E	Your own (singular) wage or salary employment		
F	Major household expenditures (such as a large appliance for the house like refrigerator)		
G	Minor household expenditures (such as food for daily consumption or other household needs)		
		5.01: Who makes decision Main male or husband……. ..... ……1 Main female or wife..... ……....2 Husband and wife jointly..... ……3 Someone else in the household ..... ……4 Jointly with someone else inside the household... ……5 Jointly with someone else outside the household ……6 Someone outside the household/other..... ……7 Household does not engage in activity/Decision not made…….98	5.02: Extent of participation in decision making Not at all ……1 Small extent……..2 Medium extent……..3 To a high extent……4

ENUMERATOR: This set of questions is very important. I am going to give you some reasons why you act as you do in the aspects of household life I just mentioned. You might have several reasons for doing what you do and there is no right or wrong answer. Please tell me how true it would be to say: *[If household does not engage in that particular activity, enter 98 and proceed to next activity.]*		My actions in [ASPECT] are partly because I will get in trouble with someone if I act differently. [READ OPTIONS: Always True, Somewhat True, Not Very True, or Never True]	Regarding [ASPECT] I do what I do so others don't think poorly of me. [READ OPTIONS: Always True, Somewhat True, Not Very True, or Never True]	Regarding [ASPECT] I do what I do because I personally think it is the right thing to do. . [READ OPTIONS: Always True, Somewhat True, Not Very True, or Never True]
		5.03	5.04	5.05
A	Getting inputs for agricultural production			
B	The types of crops to grow for agricultural production			
C	Taking crops to the market (or not)			
D	Livestock raising			
		5.03/5.04/5.05: Motivation for activity Never true .....1 Not very true .....2 Somewhat true.....3 Always true .....4 Household does not engage in activity/Decision not made……98		

MODULE 6: TIME ALLOCATION

Enumerator: 6.01: Please record a log of the activities for the individual in the last complete 24 hours (starting yesterday morning at 4 am, finishing 3:59 am of the current day). The time intervals are marked in 15 min intervals and one to two activities can be marked for each time period by drawing a line through that activity. If two activities are marked, they should be distinguished with a P for the primary activity and S for the secondary activity written next to the lines. Please administer using the protocol in the enumeration manual.

		Night								Morning								Day																															
	Activity	4				5				6				7				8				9				10				11				12				13				14				15			
A	Sleeping and resting																																																
B	Eating and drinking																																																
C	Personal care																																																
D	School (also homework)																																																
E	Work as employed																																																
F	Own business work																																																
G	Farming/livestock/fishing																																																
J	Shopping/getting service (incl health services)																																																
K	Weaving, sewing, textile care																																																
L	Cooking																																																
M	Domestic work (incl fetching wood and water)																																																
N	Care for children/adults/elderly																																																
P	Travelling and communiting																																																
Q	Watching TV/listening to radio/reading																																																
T	Exercising																																																
U	Social activities and hobbies																																																
W	Religious activities																																																
X	Other, specify…																																																

MODULE 6 continued: TIME ALLOCATION

				Evening		Night							
	Activity	16	17	18		19	20	21	22	23	24	1	2	3
A	Sleeping and resting												
B	Eating and drinking												
C	Personal care												
D	School (also homework)												
E	Work as employed												
F	Own business work												
G	Farming/livestock/fishing												
J	Shopping/getting service (incl health services)												
K	Weaving, sewing, textile care												
L	Cooking												
M	Domestic work (incl fetching wood and water)												
N	Care for children/adults/elderly												
P	Travelling and commuting												
Q	Watching TV/listening to radio/reading												
T	Exercising												
U	Social activities and hobbies												
W	Religious activities												
X	Other, specify												

MODULE 6 continued: SATISFACTION WITH TIME ALLOCATION

QNo.	Question	Response	
6.02	How satisfied are you with your available time for leisure activities like visiting neighbors, watching TV, listening to the radio, seeing movies or doing sports?		READ: Please give your opinion on a scale of 1 to 10. 1 means you are not satisfied and 10 means you are very satisfied. If you are neither satisfied or dissatisfied this would be in the middle or 5 on the scale.

Annex 3: Indicator Definition

Annex 3
Household Survey Indicator Definitions

Table A3.1. Food for Peace Title II Baseline Survey Indicators

Indicator	Disaggregation	Data Points
1. Average Household Dietary Diversity Score (HDDS)[1]	None	Indicator, CI*, # households in target area
2. Prevalence of households with moderate or severe hunger - Household Hunger Scale (HHS)[2]	Gendered Household Type	Indicator, CI, # households in target area
3. Prevalence of underweight children under five years of age[3]	Sex	Indicator, CI, # children 0–59 months in target area
4. Prevalence of stunted children under five years of age[3]	Sex	Indicator, CI, # children 0–59 months in target area
5. Percentage of children under age five who had diarrhea in the last two weeks[4]	Sex	Indicator, CI, # children 0–59 months in target area
6. Percentage of children under age five with diarrhea treated with Oral Rehydration Therapy (ORT)[4]	Sex	Indicator, CI, # children 0–59 months in target area who had diarrhea in the last two weeks
7. Prevalence of exclusive breast-feeding of children under six months of age[5]	Sex	Indicator, CI, # children < 6 months in target area
8. Prevalence of children 6-23 months of age receiving a minimum acceptable diet (MAD)[5]	Sex	Indicator, CI, # children 6-23 months in target area
9. Prevalence of underweight women of reproductive age[4]	None	Indicator, CI, # women 15-49 years in target area
10. Women's Dietary Diversity Score[6]	None	Indicator, CI, # women 15-49 years in target area
11. Percentage of households using an improved drinking water source[4]	None	Indicator, CI, # households in target area
12. Percentage of households using improved sanitation facilities[4]	None	Indicator, CI, # households in target area
13. Percent of households with soap and water at a hand washing station commonly used by family members[4]	None	Indicator, CI, # households in target area
14. Percentage of farmers who used financial services in the past 12 months	Sex	Indicator, CI, # farmers in target area
15. Percentage of farmers who practiced the value chain activities promoted by the project in the past 12 months	Sex	Indicator, CI, # farmers in target area
16. Percentage of farmers who used a minimum number of sustainable agricultural practices in the past 12 months	Sex	Indicator, CI, # farmers in target area
17. Percentage of farmers who used improved storage practices in the past 12 months	Sex	Indicator, CI, # farmers in target area
18. Prevalence of poverty: Percent of people living on less than $1.25/day	Gendered Household Type	Indicator, CI, # individuals in target area
19. Mean depth of poverty	Gendered Household Type	Indicator, CI, # individuals in target area
20. Per capita expenditures (as a proxy for income) of USG targeted beneficiaries	Gendered Household Type	Indicator, CI, # individuals in target area

[1]Anne Swindale and Paula Bilinsky. 2006. *Household Dietary Diversity Score (HDDS) for Measurement of Household Food Access: Indicator Guide.*Version 2.Available at http://www.fantaproject.org/publications/hdds_mahfp.shtml.

[2]Terri Ballard, Jennifer Coats, Anne Swindale, and Megan Deitchler. 2011. *Household Hunger Scale: Indicator Definition and Measurement Guide*. Available at http://www.fantaproject.org/publications/hhs_2011.shtml.

[3]Bruce Cogill. 2003. *Anthropometric Indicators Measurement Guide*. Revised Edition.Available at http://www.fantaproject.org/publications/anthropom.shtml.

[4]Demographic Household Survey (DHS). Phase 6 (2008-2013). Available at http://www.measuredhs.com/

[5]WHO. 2008. *Indicators for assessing infant and young child feeding practices – Part 1: Definitions*. Available at http://www.who.int/nutrition/publications/infantfeeding/9789241596664/en/index.html.

WHO. 2010. *Indicators for assessing infant and young child feeding practices – Part 2: Measurement*. Available at http://www.who.int/nutrition/publications/infantfeeding/9789241599290/en/index.html

[6]Mary Arimond et al. 2010. 'Developing Simple Measures of Women's Diet Quality in Developing Countries: Methods and Findings.' *Journal of Nutrition* 140(11): Supplement. Available at http://www.fantaproject.org/publications/JofN_Oct2010.shtml.

Annex 3
Household Survey Indicator Definitions

Table A3.2 Definition of Agricultural Indicators

Indicator	Definition – Categories Included	Questionnaire Item Number
Percentage of farmers who used at least two sustainable agricultural (crop) practices and/or technologies in the past 12 months	For sorghum, red sorghum, white sorghum, maize, beans, cow peas, pigeon peas, green grams, ground nuts: 2. Soil preparation with ox plow 3. Soil preparation with tractor 5. Planting seeds in rows 6. Crop rotation 7. Apply fertilizer 8. Intercropping	G13A
Percentage of farmers who used at least two sustainable agriculture (livestock) practices and/or technologies in the past 12 months	For goats and cattle: 1. Animal shelters 3. Vaccinations 4. Deworming 5. Homemade animal feeds made of locally available products 6. Use the services of community animal health workers 7. Purchased drugs/medicines to give to animals	G16
Percentage of farmers who used at least one sustainable agriculture (NRM) practices and/or technologies in the past 12 months	2. Agro-forestry or cultivation of fruit trees 4. Management of natural regeneration 6. Soil conservation on hillsides 7. Construction of water catchments	G18
Percentage of farmer farmers using at least three sustainable agricultural practices and/or technologies in the past 12 months	This indicator is set based on whether at least three of any of the activities listed for all three sub-indicators above are used.	NA
Percentage of farmers who used improved storage practices in the past 12 months	1. Cereal bank 2. Silo 3. Granary	G21 - SORGHUM G22 - MAIZE G23 - LEGUMES G24 – RICE G25A – OTHER CROPS
Percentage of farmers who practiced the value chain activities promoted by the project in the past 12 months	1. Purchase inputs 2. Tillage of land 4. Sorting produce 5. Grading produce 6. Drying or processing produce 7. Trading or marketing (wholesale, retail, or export)	G10
Percentage of farmers who used financial services in the past 12 months	1. Savings 2. Agricultural credit 3. Agricultural insurance	1. Question G08 2. Question G07 3. Question G09

NOTE: The labeling for the first four agricultural indicators was originally "productivity improving" but was later changed during the FFP indicator change process to "sustainable". Although the label changed, the question and responses didn't, as indicated by the fact that the range of possible answers doesn't really speak to the sustainability of agricultural practices.

Annex 3
Household Survey Indicator Definitions

Table A3.3. Definition of Program-Specific Indicators

Program-specific indicators for Uganda	
P1	% of mothers of children (0-23 months) attending 4 or more ANC visits with youngest child • Numerator: J1.06<6 + J1.08>3 • Denominator: Total number of mothers of children 0-23 months
P2	% respondents who know 3 of 5 critical moments for handwashing • Numerator: Household respondents giving 3 to 5 responses 1, 4, 5, 6, 7 in J3.03. • Denominator: Total number of households respondents
P3	% of caregivers who know at least 7 of 14 IYCF and MC practices • Numerator: 7 or more responses to 1 to 15 in J1.15 with J1.14 and J1.15 combined as 1 response. • Denominator: Total number of female caregivers of children 0-59 months
P0.2	Average number of crops produced per farmer in the past 12 months • Numerator: Count of G13 • Denominator: Total number of farmers
P0.3	% livestock owners accessing government or private sector vet care in the past 12 months • Numerator: G14=1 + (G17=1 or G17 = 2) • Denominator: Total number of livestock owners (G14=1)
P0.4	% farmers adopting farmer managed natural regeneration practices in the past 12 months • Numerator: Any response 2, 4, 6 or 7 in G18 • Denominator: Total number of farmers
P0.5	% farmers using at least three productivity improving agricultural practices and/or technologies in the past 12 months • Numerator: 3 or more responses to: 2, 3, 5, 6, 7 in G13A for sorghum, red sorghum, white sorghum, maize, beans, cow peas, pigeon peas, green grams, ground nuts or 1, 3, 4, 5, 6, 7 in G16 for cattle or goats or 2, 4, 6, 7 in G18 • Denominator: Total number of farmers
P4	% of respondents reporting increased movement in areas that were previously not accessible due to insecurity • Numerator: J3.04=1 • Denominator: Total number of households respondents
P5	% of female caretakers married or in a union that report making health-related decisions on own or jointly for themselves • Numerator: J1.02A=1 + (J1.03=1 or J1.03=2) + (J1.04=1 or J1.04=3). • Denominator: Total female caretakers that are married or in a union
P6	% of female caretakers married or in a union that report making health-related decisions on own or jointly for their children aged 0-59 months • Numerator: J1.02A=1 + (J1.03=1 or J1.03=2) + (J1.05=1 or J1.05=3). • Denominator: Total female caretakers that are married or in a union
P7	% of HHs with access to a sanitation facility (not necessarily improved) • Numerator: Any response to 11 to 62 in F11 • Denominator: Total number of households respondents
P8	% of women 15-49 who are aware of where to go for family planning services • Numerator: J5.03=1 • Denominator: Total number of women 15-49

Annex 4: Poverty Indicators

Annex 4
Description of Methodology to Derive Poverty Indicators

The World Bank defines poverty as whether households or individuals have enough resources or abilities today to meet their needs. Poverty is usually measured based on consumption levels rather than other measures such as income. Actual consumption is more closely related to a person's well-being in the sense of having enough to meet current basic needs. Also, in poor agrarian economies and in urban economies with large informal sectors, income may be difficult to estimate. It may be seasonal and erratic, and it may be difficult to estimate particularly for agricultural households whose income may not be monetized.

The prevalence of household poverty was measured using information on household expenditures to compute a household consumption aggregate. The consumption aggregates was constructed following guidelines from Deaton & Zaidi (2002)[1] and Grosh & Muñoz (1996)[2] by adding together the various goods and services consumed by each household during a period of 12 months. The various components of consumption were grouped together into 6 main categories, including food, usual expenses (expenses in the last 7 days), occasional expenses (expenses in the last 30 days), unusual expenses (expenses in the last 12 months), housing, and durable assets.

In general consumption was calculated by adding the value in local currency units (LCU) of the items consumed by the household, as reported by household informants. These items were collected according to different time horizons, but were then transformed into daily per capita consumption.

Whenever a household missed data on the value consumed for a given item, that value was imputed using the closest local median value for that item. That is, if a household missed consumption information on a given item, it was assigned the median value reported by other households in the vicinity. Whenever the item is reported frequently enough, this imputation was done at the cluster level. However some items were consumed by few households. In those cases the level of imputation was at a higher level, depending on how rare the item was. These imputed amounts were subject to checks that the imputed prices are plausible to avoid undue influence from outliers.

The reported values for each item and each consumption component were checked for outliers to detect possible coding errors or extreme values. Values that were 5 standard deviations (SD)

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[1] Deaton, A. and S. Zaidi (2002), A Guide to Aggregating Consumption Expenditures, Living Standards Measurement Study, Working Paper 135. Available at: http://siteresources.worldbank.org/INTPA/Resources/429966-1092778639630/deatonZaidi.pdf

[2] Margaret Grosh and Juan Muñoz (1996). A Manual for Planning and Implementing the Living Standards Measurement Study Surveys. LSMS Working Paper #126, The World Bank. Available at: http://documents.worldbank.org/curated/en/1996/05/438573/manual-planning-implementing-living-standards-measurement-study-survey

over the average were flagged and checked for plausibility. Values deemed implausible were imputed using the methodology described above.

Besides this general methodology, some components required specific computations.

- **Food Consumption**

Computation of food consumption is complex because it involves products that are purchased in the market, where price information is available, and products that are home-produced or received as a gift, where price information is not available. Even when products are purchased, it is often difficult for household informants to report the precise market value of the amounts consumed by the household over the reference period, which often results in missing data.

The value of non-purchased food (and of any food missing value information), was imputed by first transforming the amounts consumed by the household to a common metric unit (kilograms or liters). In Uganda, food consumption was measured using a set of non-standard units (heap, bunch, tin etc.), commonly used in the Karamoja region. Conversion factors for thes non-standard units were obtained from several sources, including the market survey from the 2006 Uganda National Household Survey, as provided by the Uganda Bureau of Statistics, the Food and Agriculture Organization, the World Food Programme and the Famine Early Warning Systems Network.

Once amounts consumed were transformed into a common metric unit, they were multiplied by the local median value of that unit for imputation of home production and gifts. If a product was reportedly consumed, but amount information was missing or implausible, the median per capita value consumed by local households was imputed.

- **Assets**

Purchases of durable goods represent large and relatively infrequent expenses. While almost all households incur relatively large expenditures on these at some point, only a small proportion of all households are expected to make such expenditures during the reference period covered by the survey. As indicated by Deaton & Zaidi (2002) "From the point of view of household welfare, rather than using expenditure on purchase of durable goods during the recall period, the appropriate measure of consumption of durable goods is the value of services that the household receives from all the durable goods in its possession over the relevant time period" (p. 33).

Consumption of durable goods was calculated as the annual rental equivalent of owning the asset. As the value of the item when new was not available in the data sets, consumption of durable goods was calculated based on the estimated remaining life of the asset, as recommended

by Deaton & Zaidi (2002): First, the average age for each durable good, $\bar{T}$, was calculated from the data on the current age of the particular respondent's asset recorded in the survey (T). The average lifetime of each durable good was estimated as $2\bar{T}$ under the assumption that purchases are uniformly distributed through time. This uniform distribution is defined over the continuum 0 to $2\bar{T}$ and has a mean of $\bar{T}$. The remaining life of each good was calculated as $2\bar{T} - T$. A rental equivalent estimating the daily per capita flow of services from the durable goods is then derived by dividing the current replacement value of the good by its expected remaining life.

- **Housing**

The case of housing is similar to other durable goods, in that it is better measured as an annual consumption of housing services, either annual rent expenditures for renters, or an annual rental equivalent for non-renters.

The baseline survey collected information on rent paid among renters, and an estimated rental equivalent for non-renters. It is likely that the housing rental market is small and a significant amount of non-renters were unable to provide an estimated rental equivalent. Missing responses were imputed using two approaches. First, the age of the house and its current replacement value was used to estimate a housing rental equivalent, using the methodology described above for durable goods.

For those cases were an estimated current value or age of the house were not available, an hedonic OLS regression model was used, as suggested by Grosh & Muñoz (1996). The model was built on the sample of households reporting non-zero rent or rental equivalents, with the log of rent paid by renters as a dependent variable, and several sets of independent variables, that included:

- Housing characteristics: number of members, type of water access, type of sanitation services.
- Socio-economic status: consumption sub-aggregates (in log form), asset ownership, Household Dietary Diversity Score.
- Location: District and community, all expressed as a set of dummy variables taking the value of 1 when the code was applicable to a given case, and a value of 0 when it was not.

The final model was estimated based on the following regression equation,

$$\log(R_i) = \beta_0 + \beta X_i + \varepsilon_i$$

where R_i represents the reported non-zero rent paid by household i, β_0 is the constant term, X_i is the final vector of independent variables and ε_i is the error term accounting for unexplained variance. The unstandardized beta weights resulting from this regression equation were applied to the vector of independent variables among non-renting households to estimate their annual rent equivalent.

Total daily consumption per capita was computed as the sum of daily per capita values for all the components of the expenditure module, except those categories that Deaton and Zaidi (2002) recommend excluding:

- Factors that are considered productive assets (e.g. farm equipment, trucks)
- Large and unusual expenditures (ceremonies, marriages, funerals, parties, etc.)
- Gifts, charitable contributions, and remittances to other households
- Taxes and levies

Poverty indicators were computed based on this total consumption aggregate, including the prevalence of poverty, average daily per capita expenditures, and mean depth of poverty. Each of these three indicators is defined below.

- **Prevalence of Poverty**

The prevalence of poverty, or poverty headcount ratio, is the proportion of the population in the survey area living in extreme poverty, defined as having average daily consumption of less than US$1.25 per capita, converted into LCU at 2005 Purchasing Power Parity (PPP) exchange rates. This poverty line was calculated using the following two steps:

- First, the $1.25 line was converted into LCU, using the 2005 PPP exchange rate for Uganda[3], of 744.62.

- Second, the resulting figure was adjusted for cumulative price inflation since 2005. The adjustment was done using the average monthly inflation in 2005 as the base factor[4], and the monthly inflation for each of the survey months as the numerator. Poverty lines were computed using these CPI values, one for each month of data collection ($CPI_{Jan.2013}$ = 205.87, $CPI_{Feb.2013}$ = 206.79, $CPI_{Mar.2013}$ = 208.58, $CPI_{Apr.2013}$ = 211.51).

The final poverty lines were:

[3] Global Purchasing Power Parities and Real Expenditures, 2005 International Comparison Program. Available at: http://data.worldbank.org/indicator/PA.NUS.PRVT.PP?page=1
[4] CPI data for Uganda obtained from: http://elibrary-data.imf.org

Annex 4
Description of Methodology to Derive Poverty Indicators

- January 2013 Poverty Line = 1.25 * 744.62 * 2.0587 = 1,916.14 UGX
- February 2013 Poverty Line = 1.25 * 744.62 * 2.0679 = 1,924.71 UGX
- March 2013 Poverty Line = 1.25 * 744.62 * 2.0858 = 1,941.44 UGX
- March 2013 Poverty Line = 1.25 * 744.62 * 2.1151 = 1,968.65 UGX

Note that the poverty line is converted to LCUs to enable a computation of prevalence of poverty using per capita expenditures figures in LCUs, given that the currency units must be standardized in the computation. It is also possible to compute the prevalence of poverty by using the $1.25 poverty line and converting the per capita expenditure figures from 2013 UGX to 2005 US dollars instead. This is because the prevalence of poverty figures that are reported do not explicitly state which currency underpinned the calculation.

- **Average daily per capita expenditures**

This indicator was computed as the average of daily per capita expenditures, expressed in constant 2010 US dollars at 2005 PPP adjusted to 2010 US prices. The steps to covert daily per capita expenditure in 2013 UGX to constant 2010 US$ (2005 PPP adjusted to 2010 US prices) were:

- Convert LCU at the time of the survey to LCU at 2005 prices, by dividing by the CPI for the survey month ($CPI_{Jan.2013}$ = 205.87, $CPI_{Feb.2013}$ = 206.79, $CPI_{Mar.2013}$ = 208.58, $CPI_{Apr.2013}$ = 211.51).
- Convert 2005 LCU to 2005 US$ by dividing by the 2005 PPP conversion rate (744.62).
- Convert US$ in 2005 prices to US$ in 2010 prices by multiplying by 111.65, which is the US CPI for 2010.

Note that average daily per capita expenditure is expressed in US$ in 2010 prices in order to enable comparisons with other countries.

- **Mean depth of poverty**

This indicator is useful to understand the average, over all people, of the gaps between poor people's living standards and the poverty line. It indicates the extent to which individuals fall below the poverty line (if they do).

Mean depth of poverty is computed based on the poverty gap index (PGI). This index is defined as the ratio of the Poverty Gap (PG) to the poverty line. The PG is computed as the average of the differences between an individual's total daily per capita consumption and the poverty line,

divided by the poverty line, with individuals over the poverty line having a PG = 0. The PGI is given by the formula:

$$PGI = \left(\frac{1}{N}\sum_{i=1}^{q}\left(\frac{z-y_i}{z}\right)\right)\times 100$$

Where N is the total number of individuals in the population, z is the poverty line and y_i is the daily per capita consumption of individual i.

Annex 5: Qualitative Study Sample Villages

Annex 5
Sampled Villages for Qualitative Surveys

Table A5.1
Districts and Villages for Mercy Corps IDI and FGD

District	County	Village visited	New # of Households	Strategic Objective	Respondent type
Kaabong	Losongolo	Naporukolong	98	Livelihood MCHN	PILOT FGD-Male Head Household IDI-Male Farmer IDI-Female Household Lead IDI-Male Head of Household
Kaabong	Kawalakol/ Kapedo	Lopelipel	34	MCHN	FGD Male Head of Household IDI-Female Caregiver/Mother IDI-Male Caregiver/Father IDI-Female Farmer
Abim	Abim S/C	Geregere East	55	Livelihood Governance	FGD-Male Caregiver/Father IDI-Male Farmer IDI-Female Household Lead IDI-Male Head Household
Abim	Alerek	Olem East	84	MCHN	FGD-Female Household Lead IDI-Female Caregiver/Mother IDI-Male Caregiver/Father IDI-Female Farmer

KEY:
IDI: In-depth interview
FGD: Focus group discussion
SO: Strategic Objective
MCHN: SO focused on maternal and child health and nutrition
Livelihood: SO focused on strengthening livelihoods
AG: SO focused on agriculture
Governance: SO focused on governance and conflict mitigation
IDI: Individual interview
FGD: Focus group discussion

Annex 5
Sampled Villages for Qualitative Surveys

Table A5.2
Districts and Villages for ACDI/VOCA IDI and FGD

District	County	Village	New # of Households	Strategic Objective	Respondent type
Napak	Bokora	Iriiri	501	Ag & MCHN	FGD Male Farmers IDI-Male Farmer IDI-Male Head of Household IDI-Female Household Lead
Napak	Lopeii	Lomusia	73	Ag & MCHN	FGD-Female Farmer IDI-Mother/Female Caregiver IDI-Female Farmer IDI-Male Caregiver/Father
Nakapiripirit	Kakomangole	Kilimanjaro	79	Ag & MCHN	FGD-Mother/Female Caregiver IDI-Female Farmer IDI: Female Caregiver/Mother IDI: Male Caregiver/Father
Nakapiripirit	Pian	Cucu	776	Ag & MCHN	IDI: Male Farmer IDI: Female Household Lead IDI: Male Head of Household

KEY:
IDI: In-depth interview
FGD: Focus group discussion
SO: Strategic Objective
MCHN: SO focused on maternal and child health and nutrition
Livelihood: SO focused on strengthening livelihoods
AG: SO focused on agriculture
Governance: SO focused on governance and conflict mitigation
IDI: Individual interview
FGD: Focus group discussion

Annex 5
Sampled Villages for Qualitative Surveys

Table A5.3
Breakdown of Number of PDB Interviews by District and Respondent Type

	Number of Respondents by Program and District				Total
	Mercy Corps- SUSTAIN		ACDI/VOCA- RWANU		
	Kaabong	Abim	Napak	Nakapirpirt	
In-Depth Interview, Potential Direct Beneficiaries (PDB)					
Male Head of Household	1	1	1	1	4
Female Lead in Household	1	1	1	1	4
Male Caregiver or Father	1	1	1	1	4
Female Caregiver or Mother	1	1	1	1	4
Male Farmer	1	1	1	1	4
Female Farmer	1	1	1	1	4
TOTALS	**6**	**6**	**6**	**6**	**24**
Focus Group Discussions, Potential Direct Beneficiaries (PDB)					
Male Head of Household	1+ 1 pilot				2
Female Lead in Household		1			1
Male Caregiver or Father		1			1
Female Caregiver or Mother				1	1
Male Farmer			1		1
Female Farmer			1		1
TOTALS	**2 (1 pilot)**	**2**	**2**	**1**	**7 (1 pilot)**

Annex 6: Qualitative Study Instruments

USAID/FFP TITLE II BASELINE QUESTION GUIDE

KEY INFORMANT: HEALTH AND NUTRITION

Background: Before we begin our conversation around food security, I want to learn a little bit about who you are and the nature of your position.

1. What organizations do you work with?
2. What is your current title?
3. What are the roles and responsibilities related with that position?
    a. Tell me specifically about the roles and responsibilities related to health and nutrition, especially with respect to MCHN.
    b. What portion of your time do you dedicate to the activities you spoke about in reference to the prior question?
    c. Which districts, sub-counties, villages, etc. do you work?
4. What type of work did you do in MCHN prior to this project?
5. What is your past work experience in the Karamoja region of Uganda?

Food Access and Utilization: The primary objective of this section is to gain insight about the access the community has to various food sources and decision making processes that determine what food is consumed. The survey questionnaire asks specifics about the access to various food types, in this interview we are trying to understand where the food comes from, what the level of access is, how the foods are chosen, and who makes those decisions.

6. Please tell me about the typical food consumption habits in this community.
    a. Have you observed how often people eat a cooked meal during the day? What are the particular patterns? What times?
    b. Do these patterns change at particular times of the year? (Rainy vs. Dry Seasons)
    c. What are the primary foods that families would have consumed in the last week? Does this change during different seasons?

7. Now I would like to ask about the different members of a household?
    a. How is food distributed amongst family members?
    b. What are some of the beliefs or traditions that may influence eating patterns in a household? (Think about cultural or religious traditions.)
    c. If there is not enough food available to feed an entire family, how do households typically manage that situation?
    d. Who makes these decisions regarding the distribution of food and types of food and how?

8. What do you think is the primary reason that there is a lack of food at particular times of year? What times of year does that happen? And during those times are there changes in the eating patterns of particular household members? (differences by age, gender, work status, etc.).

9. Where does the majority of food consumed come from? (Are they purchased, produced, or provided by another source)? Has that changed over time? Change through different seasons?

10. What are the primary beverages (water, milk, juice, coffee, tea, alcohol/spritis, sorghum beer) that community members consumed in households over the last week?
    a. What is the purpose for consuming alcohol?
    b. Does this vary by community member? Or household member?
    c. How much is typically consumed? (Use this as an opportunity to probe on alcohol consumption and its purpose-stave off hunger?)

11. Are there any customs, traditions, or beliefs that involve food in your community? For example, is there a period in which people fast, or eat a particular food type, or avoid a particular food type? Are there beliefs that interfere with breastfeeding? Are there beliefs as to the kinds of foods children need when they are sick?

Nutritional Status of Women and Children and Access to Health Care: Now that we've learned a little bit about eating and drinking habits of individuals in the community, we would like to discuss some issues around the health and nutritional status of the women and children in the community.

12. Do women in the community typically receive pre and ante-natal care? What does this care consist of? Who provides this care?

13. Where do women typically give birth in this community?

14. Are there particular patterns related to breastfeeding in this community?
    a. When do individuals typically start breast feeding their children (at what age/stage)? At what age/stage do individuals typically stop breastfeeding? Do women typically make this decision? If the men do play a role in this decision-making process please explain their role.
    b. Do children in this community receive breast milk using methods other than breast feeding?
    c. At what point do children stop breastfeeding and other liquids and/or food is introduced? Why is breastfeeding stopped?
    d. Are there particular cultural beliefs in this community that influences the practice of breastfeeding?
    e. Are local health workers trained on the benefits and practice of breastfeeding? Do they teach? And what do they teach?

15. What types of health care services are available to community members?

a. What do people do if there is a health emergency?
b. What do people do for pregnancy care and delivery?
c. What is the quality of the health services that are available?
d. Where are they? How far must individuals travel or how long does it take to reach a health center?
e. How do individuals access them?
f. When (under what circumstances) do community members typically access those facilities?
g. Who in families make the primary decisions regarding health care?
h. Are the health care providers reliable?

16. Is there trust in the community of health care providers? Why or why not? Is there fear of health care providers? What are they afraid of? Is it around certain treatments or conditions? If so, why? Is there variation in trust of health care providers by sex? Please explain this variance.

17. Is there someone in particular in the community individuals turn to for guidance about health other than western health care providers? (traditional healers, elders, relatives, etc.)

18. What are some of the patterns in illnesses that individuals in this community face? What kinds of illnesses are there? Are there variances by age, sex, SES, or other demographic characteristics?

    a. What are some of the symptoms?
    b. Do you know the cause?
    c. How was it treated?
    d. Is this a recurring problem? If so, is there something that could be done to address it?

19. Is there a practice of vaccinating children in the community? What were the vaccinations for? How do community members make the decision to vaccinate or not vaccinate children? How are children vaccinated?

20. Is there a need in the community for particular types of medications that are currently lacking? Or sources of health care? Please tell me a little bit about that situation.

Water, Sanitation, and Hygiene (WASH): Now I would like to ask you a few questions about living arrangements and access to water in the community.

21. What is the main source of drinking water for members of the community? In the dry season? In the rainy season?

22. Please tell me about the quality of water in the dry and rainy seasons.

23. Tell me about the daily routine for fetching water.

a. How do people carry water?
b. How do they store it?
c. How long does it take to fetch water?
d. What time does it occur?
e. Who in the household is responsible for that activity?
f. Do those who are fetching water have different eating and drinking habits from other individuals in the household?

24. Who maintains the water source in the community?

25. Are there periods of time when water is not available? During those times what do community members do to secure water?

26. Are there common habits in the community regarding the treatment of water to ensure that it is safe to drink? What type of awareness-raising has been conducted in the past around this issue? Do individuals change their practices regarding water treatment following the awareness-raising? Why or why not?

27. What types of things are children taught about how to keep clean? What about washing hands? Do households have washbasins and soap or other cleaning materials? Are children's clothes washed?

28. Do most families have a latrine in their home or near their home? Please describe a typical set up. If latrines are available, are they used? Why or why not?

Socio-Cultural and Political Context: In this last part of our interview, I would like to learn a little bit more about the community as a whole and some of the practices put in place to assist individuals in their everyday lives.

29. Are there particular groups of people in the community who struggle with severe food scarcity on a day to day basis? What do you think is the reason for this hunger or lack of food security? What could the community itself do to improve the situation? What kinds of external help does the community need?

30. Have there been food security programs implemented in the past by the government, foreign donors, or community based organizations? If so, please tell me a little bit about your experiences with those programs. What were some of the strengths of those programs? And weaknesses?

31. What impact do conflict/disputes have on food security in the community?

32. Are there locations/resources in your community that members would wish to access but have not for the past year due to insecurity/or avoidance of disputes? How has the level of access to this resource changed? How free are you to move around? And how has this changed over time? How

has your freedom to move freely changed over time (during day and at night/evening)? Do crimes vary by sex?

33. How often do community members interact with people from other communities? What is the nature of interaction? What types of economic interactions are associated with good/bad relationship? Are there variations by sex? Who are the aggravators of conflict?

USAID/FFP TITLE II BASELINE QUESTION GUIDE

KEY INFORMANT: LIVELIHOODS, BUSINESS AND/OR AG EXPERT

Background: Before we begin our conversation around food security, I want to learn a little bit about who you are and the nature of your position.

1. What organizations do you work with?
2. What is your current title?
3. What are the roles and responsibilities related with that position?
    a. Tell me specifically about the roles and responsibilities related to agriculture or business/livelihood development.
    b. What portion of your time do you dedicate to the activities you spoke about in reference to the prior question?
    c. Which districts, sub-counties, villages, etc. do you work in?

Agricultural Development and Farming: Now I'd like to ask about agriculture as a source of income in the community.

4. Tell me about the type of farming that happens in this community? Are they primarily subsistence farming? Or farming for income generation? Or both? Does this change throughout the year? Please explain. What are the patterns in access to land for cultivation?

5. Who are the primary decision-makers regarding farming in the community? Are there variances by age and sex in who undertakes subsistence versus farming for income generation? Please tell me a little bit about the various roles and responsibilities. Has this shifted over time?

6. For those individuals who are producing food for consumption, please tell me the following:
    a. What type of crops and livestock are normally grown/raised? (particular plant or animal?)
    b. Who makes the primary decisions about this farm work?
    c. And what types of decisions do they make?
    d. Tell me a little bit about the typical roles and responsibilities of individuals in a household for farming as well as household work.

7. I would like to learn a little bit more about farming that is undertaken to produce goods for sale in this community.
    a. What type of crops and livestock are normally grown/raised? (particular plant or animal?)
    b. Who makes the primary decisions about this farm work at the community level?
    c. And what types of decisions do they make?
    d. Do the community members who are farmers collaborate in decision making regarding what types of goods are being produced? Do they pool resources? Where do the resources come from?

e. Tell me a little bit about the typical roles and responsibilities of individuals in the community for farming for the production of goods for sale.

8. For the products that are being sold, please tell me the about that process?
    a. Do individuals sell the goods here locally? Where? To whom? In what quantities?
    b. What part of the process do community members undertake in the process of selling goods?
    c. Is there collective sharing of the money that is earned through community sales?
    d. How often is livestock sold?
    e. In what form are goods sold - raw or processed? What are the challenges involved in processing and sale of processed goods?

9. Has the community experienced any events in the past that have impacted individuals' ability to farm? Is it typical for community members to have any insurance that helped them through that event? If not, how do they manage that?

10. Where or how do most community members learn their farming techniques? Whom do they believe knows about farming? Whom do they trust?

11. If the community keeps food to eat throughout the year, where do they store it? Which foods are stored? How is it stored??

12. Do men, women, or youth migrate to distant locations at particular times of year? Please tell me about that process.
    a. Who migrates?
    b. Why do they migrate?
    c. When do they migrate?
    d. Where do they go?
    e. Do eating habits change during that period of time? How?
    f. Do they have regular access to healthcare during that period of time?
    g. How do roles and responsibilities shift within families and within the community when migration occurs?
    h. What are some of the challenges and or dangers community members face with migration?
    i. What are some of the benefits in migrating?
    j. If children also migrate, do they have access to school during the time they are away from home?

Livelihood and Business Development: Now I'd like to ask you about other sources of income in the community.

13. What would you say are the primary sources of income for the majority of households in this community? Agriculture, livestock, trading? Services? Combination? Others – e.g. selling wild food? Firewood, charcoal, etc.? And who is involved in those activities?

14. Are there business development opportunity that you believe would help build food security in this area? Please explain your thoughts?

15. Is it common for individuals or families to save money? Why or why not? And if so, what are savings commonly directed towards? Are people members of saving groups?

16. Is it possible to secure business loans in your community that may help inspire development? What are some of the roadblocks to securing loans?

17. Are there other structural features in the community that may prevent successful economic growth? Please explain.

18. Is there a reliable source of water in the community? Who maintains that source? Does the availability of water vary by season?

Socio-Cultural and Political Context: In this last part of our interview, I would like to learn a little bit more about the community as a whole and some of the practices put in place to assist individuals in their everyday lives.

19. Are there particular groups of people in the community who struggle with severe food scarcity on a day to day basis? What do you think is the reason for this hunger or lack of food security? What could the community itself do to improve the situation? What kinds of external help does the community need?

20. Have there been food security programs implemented in the past by the government, foreign donors, or community based organizations? If so, please tell me a little bit about your experiences with those programs. What were some of the strengths of those programs? And weaknesses?

21. What impact do conflict/disputes have on food security in the community?

22. Are there locations/resources in your community that members would wish to access but have not for the past year due to insecurity/or avoidance of disputes? How has the level of access to this resource changed? How free are you to move around? And, how has this changed over time? How has your freedom to move freely changed over time (during day and at night/evening)? Do crimes vary by sex?

23. How often do community members interact with people from other communities? What is the nature of interaction? What types of economic interactions are associated with good/bad relationship? Are there variations by sex? Who are the aggravators of conflict?

USAID/FFP TITIEL II BASELINE QUESTION GUIDE

PVO Interview Guide

Background: Before we begin our conversation around food security, I want to learn a little bit about who you are and the nature of your position.

1. What organization(s) do you work with?
2. Which districts do you work in?
3. What is your current title?
4. What are the roles and responsibilities related with that position?
    a. Tell me specifically about the roles and responsibilities related to food security, nutrition, health, and/or agriculture.
    b. What portion of your time do you dedicate to the activities you spoke about in reference to the prior question?
    c. Which districts, sub-counties, villages, etc. are covered by these activities?

Food Access and Utilization: The primary objective of this next section is to gain insight about the access the communities you work in have to various food sources and decision making processes that determine what food is consumed.

5. Please tell me about the typical food consumption habits in the communities where you are working?

6. Have you observed how often people eat a cooked meal during the day? What are the particular patterns? What times?

7. Do these patterns change at particular times of the year? (Rainy vs. Dry Seasons)

8. What are the primary foods that families would have consumed in the last week? Does this change during different seasons?

9. What do you think is the primary reason that there is a lack of food at particular times of year? What times of year does that happen?

10. Where does the majority of food consumed come from? (Are they purchased, produced, or provided by another source)? Has that changed over time? Change through different seasons?

11. What are the primary beverages (water, milk, juice, coffee, tea, alcohol/spritis, sorghum beer) that community members consumed in households over the last week?

12. What is the purpose for consuming alcohol? Does this vary by community member? Or household member? How much is typically consumed? (Use this as an opportunity to probe on alcohol consumption and its purpose-stave off hunger?)

13. Are there any customs, traditions, or beliefs that involve food in your community? For example, is there a period in which people fast, or eat a particular food type, or avoid a particular food type? Are there beliefs that interfere with breastfeeding? Are there beliefs as to the kinds of foods children need when they are sick?

Nutritional Status of Women and Children and Access to Health Care: Now that we've learned a little bit about eating and drinking habits of individuals in the community, we would like to discuss some issues around the health and nutritional status of the women and children in the community.

14. Are there particular patterns related to breastfeeding in the communities you work with?
    a. When do individuals typically start breast feeding their children (at what age/stage)? At what age/stage do individuals typically stop breastfeeding? Do women typically make this decision? If the men do play a role in this decision-making process please explain their role.
    b. Do children receive breast milk using methods other than breast feeding?
    c. At what point do children stop breastfeeding and other liquids and/or food is introduced? Why is breastfeeding stopped?
    d. Are there particular cultural beliefs in this community that influences the practice of breastfeeding?
    e. Are local health workers trained on the benefits and practice of breastfeeding? Do they teach? And what do they teach?

15. What types of health care services are available in the communities where you are working?
    a. What do people do if there is a health emergency?
    b. What do people do for pregnancy care and delivery?
    c. What is the quality of the health services that are available?
    d. Who in families make the primary decisions regarding health care?
    e. Are the health care providers reliable?

16. Is there trust in the community of health care providers? Why or why not? Is there fear of health care providers? What are they afraid of? Is it around certain treatments or conditions? If so, why? Is there variation in trust of health care providers by sex? Please explain this variance.

17. Is there someone in particular in the community individuals turn to for guidance about health other than western health care providers? (traditional healers, elders, relatives, etc.)

18. What are some of the patterns in illnesses that individuals in this community face? What kinds of illnesses are there? Are there variances by age, sex, SES, or other demographic characteristics?

    a. What are some of the symptoms?
    b. Do you know the cause?
    c. How was it treated?
    d. Is this a recurring problem? If so, is there something that could be done to address it?

19. Is there a practice of vaccinating children in the community? What were the vaccinations for? How do community members make the decision to vaccinate or not vaccinate children? How are children vaccinated?

Water, Sanitation, and Hygiene (WASH): Now I would like to ask you a few questions about living arrangements and access to water in the community.

20. What is the main source of drinking water in the majority of communities where you are working? In the dry season? In the rainy season?

21. Are there common habits in the community regarding the treatment of water to ensure that it is safe to drink? What type of awareness-raising has been conducted in the past around this issue? Do individuals change their practices regarding water treatment following the awareness-raising? Why or why not?

22. What types of things are children taught about how to keep clean? What about washing hands? Do households have washbasins and soap or other cleaning materials? Are children's clothes washed?

Agriculture and Livelihood: Now I'd like to ask about agriculture and livelihood in the community.

23. Tell me about the type of farming that happens in the communities where you are working? Are they primarily subsistence farming? Or farming for income generation? Or both? Does this change throughout the year? Please explain. What are the patterns in access to land for cultivation?

24. Who are the primary decision-makers regarding farming in the communities? Are there variances by age and sex in who undertakes subsistence versus farming for income generation? Please tell me a little bit about the various roles and responsibilities related to farming in the community? At the household level. Has this shifted over time?

25. What type of crops and livestock are normally grown/raised for consumption in the communities you are working in? (particular plant or animal?) What are the reasons for this?

26. What type of crops and livestock are normally grown/raised for sale in the communities you are working in? (particular plant or animal?) What are the reasons for this?

27. Do men, women, or youth in the communities where you are working migrate to distant locations at particular times of year? Please tell me about that process.

Poverty and Income:

28. What would you say are the primary sources of income for the majority of households in the communities where you are working? Agriculture, livestock, trading? Services? Combination? Others – e.g. selling wild food? Firewood, charcoal, etc.? And who is involved in those activities?

29. Is it common for individuals or families to save money? Why or why not? And if so, what are savings commonly directed towards? Are people members of saving groups?

Socio-Cultural and Political Context: In this last part of our interview, I would like to learn a little bit more about the community as a whole and some of the practices put in place to assist individuals in their everyday lives.

30. Are there particular groups of people in the community who struggle with severe food scarcity on a day to day basis? What do you think is the reason for this hunger or lack of food security? What could the community itself do to improve the situation? What kinds of external help does the community need?

31. Have there been food security programs implemented in the past by the government, foreign donors, or community based organizations? If so, please tell me a little bit about your experiences with those programs. What were some of the strengths of those programs? And weaknesses?

32. What impact do conflict/disputes have on food security in the community?

33. Are there locations/resources in your community that members would wish to access but have not for the past year due to insecurity/or avoidance of disputes? How has the level of access to this resource changed? How free are you to move around and how has this changed over time? How has your freedom to move freely changed over time (during day and at night/evening)? Do crimes vary by sex?

34. How often do community members interact with people from other communities? What is the nature of interaction? What types of economic interactions are associated with good/bad relationship? Are there variations by sex? Who are the aggravators of conflict?

Program Design and Implementation: I've asked a lot of questions about food security in the community, and issues related to it, now I'd like to ask you a few questions about the program activities that will be implemented as a part of the Title II project.

35. How did you identify the strategies you have identified for implementation as a part of this program?

36. What are some of the more successful strategies that have been implemented in the past? What about less successful strategies? Did you modify them to improve them? How have your past experiences influenced your current strategies? Please explain. Have past strategies ever negatively impacted a particular group, such as women, children, ethnic minorities?

37. What do you anticipate will be some of your biggest challenges in implementing your program? Are there particular groups of individuals that target who are especially challenging to reach? Please explain. What strategies will you use to overcome challenges?

38. Please describe how you work with your current partners. E.g. grantees, government, NGOs, donors.

USAID/FFP Title II BASELINE QUESTION GUIDE

Focus Group Discussion with Father/ Male Caregiver or Female Caregiver of children ages 5 and under

(This should be stated prior to giving them the consent form). Hello, thank you so much for joining us today for this discussion. In a few minutes I will give you a paper that allows us to ask for your permission to talk with you today. Before I have you make that decision, I would like to talk with you a little bit about what this group discussion will involve.

My name is (NAME OF INTERVIEWER), I am here with my colleague from ICF International and (NAME OF INTERPRETER) who will be helping her participate in our conversation today. All of us are contracted by USAID to complete a baseline study to understand the communities where they, along with their partners Mercy Corps and ACDI VOCA will be starting new programs.

To help us understand your communities and get to know the way you live, we would like to discuss with you a number of broad topics with you. The topics include the structure of your household, the types of food and beverages you and your family members eat and drink, the type of health care you have access to and have used specifically for the women and children in your family, farming practices, access to food and latrines, and cultural practices and beliefs in your community.

We welcome to answer all of the questions we ask. However, if something makes you feel uncomfortable or prefer not to answer, that is okay. Or if you don't know an answer, it is fine to just say, "I don't know." We ask that you be respectful of the other participants. I have given you a pen and notebook, so if you want to write down a thought while another person is speaking please feel free to do so. Or if you don't feel comfortable providing a specific answer in the group, you may approach us after the group. You may keep the pen and notebook as a "thank you" for participating. Also, you can raise your hand and this will let us know that you have something you want to contribute while someone else is speaking, and we will make sure you have an opportunity to speak.

Okay, now we are going to go through a consent form, to ask your permission for you to participate in our conversation today. (Distribute the consent form…the interviewer and interpreter will read through the form with each participant and seek their consent).

……

Background Information: Before we begin our specific questions related to food, agriculture, health and nutrition, I wanted to learn a little bit about the typical structure of a household in your community.

1. Please describe tell me who you consider to be a part of your household? Do you all have similarly structured households? Or are there differences amongst you? Please explain

   PROBES:

   a. What are the ages of these individuals that are part of the household?
   b. Do all the members of the household live and sleep under the same roof?
   c. How do you determine who is a part of your household?

2. How is the head of household determined?

3. Who makes the primary decisions in most households for the care of the children? We will explore this a little bit more in a bit. But it would be helpful to get a preliminary idea.

4. What are the various roles and responsibilities individuals have in a typical household regarding child care? Is there a difference in the roles and responsibilities by sex?

5. Is there a school in your community for children to attend? Do most children attend school? Why or why not? Who makes the decision in most families about who will attend school?

Food Access and Utilization: Now that I have a better understanding of the structure of your households, I want to ask you some questions about the various foods and drinks, people in your community typically consume or use.

6. Please tell me a little bit about the typical eating habits here in your community?
   PROBES:
   a. What kinds of foods do you typically eat? (Think about the foods that you and the members of your household ate over the last week)?
   b. What times of day do people eat?
   c. Who prepares the food?

7. Please tell me a little bit about the liquids individuals in your community typically drink.
   a. What do they typically drink?
   b. What times of day?

8. Where do most of the foods and beverages you consume come from?

9. Are there particular special events or holidays you celebrate that effect your food choices? Tell me about those occasions. How frequently do these events occur?

Nutritional Status of Women and Children and Access to Health Care: Now that we've learned a little bit about you're the eating and drinking habits of people in your community, we would like to discuss some issues around the health of the women and children in your community. While I know that you may have children in your household who are over the age of five, I'd like for you to answer the questions about your children who are five and under.

10. Do most members of your community breastfeed their children?

11. Did you and/or other members of your household breastfeed your children? Why or why not?

a. How old was the child when s/he started to breastfeed? Did it occur immediately after the child was born? Why or why not?
b. Who made this decision regarding breastfeeding?
c. Some children receive breast milk in different ways such as a spoon, cup, or bottle, was that the case for any children in your household?
d. At what stage/age did you begin to introduce either beverages or food instead of breast milk? Why did you choose that age/stage?
e. Where did you learn about your practices and beliefs surrounding breastfeeding?

12. I would like for you as a group to tell me a little bit about the health care that is available to you in your community.

13. Do any of you have particular experiences you want to share about seeking out health care for either you or your child?

14. Are there facilities available that you can go to in order to have your children vaccinated? Please tell me about the experiences you have had when vaccinating your children.

15. When you have a health problem, to whom in the community do you turn? Do you trust your health care providers? Have any of you had a negative experience with a health care provider?

16. What are some of the typical practices of what happens in your community when a woman learns that she is pregnant? If someone want to share their own experiences, that would be very helpful.
    a. Do women seek health care prior to deciding to have children?
    b. Where do women go to seek health care once they have determined they are pregnant?
    c. How about when a baby is born?

17. Are there particular services that you need in your community that are not currently available to you?

Water, Sanitation, and Hygiene (WASH): Now I would like to ask you a few questions about your access to water.

18. What is the main source of water for your community?

19. Tell me about the typical daily routine for fetching water. Does this activity happen individually for each household? Or is there a community system that is in place for fetching water?
    a. How long does it take to fetch water and return, including travel and waiting time?
    b. How is water carried?
    c. What time does it occur? And how often in the week?
    d. Who in the household is typically responsible for that activity?

e. Do those who fetch water face any risk s? What are these risks and what steps have been taken, if any, to reduce the risk?

20. Does this change in the dry versus the rainy season?

21. Are there times when water is not available in your community? If so, what do you do when this happens?

Socio-Cultural and Political Community Context: In this last part of our interview, I would like to learn a little bit more about your community as a whole

22. What do you think are some of the greatest needs for your community? Have there been programs implemented in the past by the government, foreign donors, or community based organizations? If so, please tell me a little bit about your experiences with those programs. What were some of the strengths of those programs? And weaknesses?

23. How has the overall context and living situations changed within the last 2 years? Especially relating to security, food, health, women's rights, and agricultural production?

24. Are there locations/resources in your community that members would wish to access but have not for the past year due to insecurity/or avoidance of disputes? How has the level of access to this resource changed? How free are you to move around? Has this changed over time?

25. How often do you or your family members interact with individuals from other communities? What is the nature of interaction? What types of economic interactions are associated with good/bad relationship? Are there variations by sex? Who are the aggravators of conflict?

26. Is there any other additional information you would like to share with us about your access to food, your consumption of food and beverages, your work/livelihood, and healthcare practices?

USAID/FFP TITLE II BASELINE QUESTION GUIDE

Focus Group Discussion with Male or Female Farmer

(This should be stated prior to giving them the consent form). Hello, thank you so much for joining us today for this discussion. In a few minutes I will give you a paper that allows us to ask for your permission to talk with you today. Before I have you make that decision, I would like to talk with you a little bit about what this group discussion will involve.

My name is (NAME OF INTERVIEWER), I am here with my colleague from ICF International and (NAME OF INTERPRETER) who will be helping her participate in our conversation today. All of us are contracted by USAID to complete a baseline study to understand the communities where USAID Food for Peace, along with their partners Mercy Corps and ACDI/VOCA will be starting new programs.

To help us understand your communities and get to know the way you live, we would like to discuss a number of broad topics with you. The topics include the structure of your household, the types of food and beverages you and your family members eat and drink, the type of health care you have access to and have used specifically for the women and children in your family, farming practices, access to food and latrines, and cultural practices and beliefs in your community.

We welcome you to answer all of the questions we ask. However, if something makes you feel uncomfortable or prefer not to answer, that is okay. Or if you don't know an answer, it is fine to just say, "I don't know." We ask that you be respectful of the other participants. I have given you a pen and notebook, so if you want to write down a thought while another person is speaking please feel free to do so. Or if you don't feel comfortable providing a specific answer in the group, you may approach us after the group. You may keep the pen and notebook as a "thank you" for participating. Also, you can raise your hand and this will let us know that you have something you want to contribute while someone else is speaking, and we will make sure you have an opportunity to speak.

Okay, now we are going to go through a consent form, to ask your permission for you to participate in our conversation today. (Distribute the consent form…the interviewer and interpreter will read through the form with each participant and seek their consent).

……

Background Information: Before we begin our specific questions related to food, agriculture, health and nutrition, I wanted to learn a little bit about the typical structure of a household in your community.

1. Please describe tell me who you consider to be a part of your household? Do you all have similarly structured households? Or are there differences amongst you? Please explain
   PROBES:

a. What are the ages of these individuals that are part of the household?
b. Do all the members of the household live and sleep under the same roof?
c. How do you determine who is a part of your household?

2. How is the head of household determined?

3. Who makes the primary decisions in most households for the care of the children? We will explore this a little bit more in a bit. But it would be helpful to get a preliminary idea.

4. What are the various roles and responsibilities individuals have in a typical household regarding child care? Is there a difference in the roles and responsibilities by sex?

5. Is there a school in your community for children to attend? Do most children attend school? Why or why not? Who makes the decision in most families about who will attend school?

Food Access and Utilization:

Now that I have a better understanding of the structure of your households, I want to ask you some questions about the various foods and drinks, people in your community typically consume or use.

6. Please tell me a little bit about the typical eating habits here in your community?
   PROBES:
   a. What kinds of foods do you typically eat? (Think about the foods that you and the members of your household ate over the last week)?
   b. What times of day do people eat?
   c. Who prepares the food?

7. Please tell me a little bit about the liquids individuals in your community typically drink.
   d. What do they typically drink?
   e. What times of day?

8. Where do most of the foods and beverages you consume come from?

9. Are there particular special events or holidays you celebrate that effect your food choices? Tell me about those occasions. How frequently do these events occur?

Agriculture and Livelihood: Now I would like to ask you some questions about farming in your community. When I use the term farming, I not only mean growing food, but also raising and tending animals as well as fishing. I am going to ask you both about the farming that happens at the community level as well as farming you do at your home both for subsistence and to earn income.

10. What are some of the most common products that are farmed in this community?
    a. For sale?
    b. For consumption?

11. What type of farming do members of the community do? For food to consume? For food to sell? Or both? If both, what percentage for each? Does this vary by time of year? Or do people typically farm for some other purpose. If so, what is that other purpose?

12. I would like to learn a little bit more about the type of farming families do here for subsistence
    a. What type of products are farmed? (particular plant or animal?)
    b. Who typically makes the primary decisions about the farming in a household in your community? Tell me a little bit about the typical roles and responsibilities of individuals in households in your community for farming as well as household work.
    c. Please tell me a little bit about the processes that occur once food has been harvested for consumption. What is the process for storing it? How do is it processed? Who makes the decisions regarding the production and storage of the food that has been harvested?

13. I would like to learn a little bit more about the type of farming that happens in this community to generate income.
    a. What type of products are farmed? (particular plant or animal?)
    b. Who typically makes the primary decisions about the farming in a household in your community? Tell me a little bit about the typical roles and responsibilities of individuals in households in your community for farming as well as household work.
    c. Please tell me a little bit about the processes that occur once food has been harvested for income generation. What is the process for storing it? How do is it processed? Who makes the decisions regarding the production and storage of the food that has been harvested?

14. If community members are selling any part of the goods produced, please describe that process for me.
    a. Does the farming occur here locally or do community members go elsewhere to farm?
    b. What part of the process do household members in this community typically undertake in the preparation and sale of foods?
    c. Do you work with other community members?
    d. Who makes decisions regarding how the money will be allocated if farming and sales are a communal process?

15. Has the community experienced any events in the past that have impacted the ability to farm either for sustenance or for income? (illness, environmental episode, accident, community event, national event?) How did members of the community get through that event?

16. Where do community members typically learn their farming techniques? Are there techniques you or others in the community would like to learn, but have not had access to?

a. Techniques for farming for consumption?
b. Techniques for farming for income generation?

17. What are some of the customs, traditions and/or beliefs related to work in the household? What differences are there in men's versus women's work roles? Who owns livestock? Who is responsible for processing different kinds of crops and livestock? Are there specific gender issues that affect food security?

18. What is your primary source of water in this community? Is this water used both for consumption and for farming?

19. What are some of the biggest challenges faced in this community with farming?

Socio-Cultural and Political Community Context: In this last part of our interview, I would like to learn a little bit more about your community as a whole

20. What do you think are some of the greatest needs for your community? Have there been programs implemented in the past by the government, foreign donors, or community based organizations? If so, please tell me a little bit about your experiences with those programs. What were some of the strengths of those programs? And weaknesses?

21. How has the overall context and living situations changed within the last 2 years? Especially relating to security, food, health, women's rights, and agricultural production?

22. Are there locations/resources in your community that members would wish to access but have not for the past year due to insecurity/or avoidance of disputes? How has the level of access to this resource changed? How free are you to move around? Has this changed over time?

23. How often do members of your community interact with individuals from other communities? What is the nature of interaction? What types of economic interactions are associated with good/bad relationship? Are there variations by sex? Who are the aggravators of conflict?

24. Is there any other additional information you would like to share with us about your access to food, your consumption of food and beverages, your work/livelihood, and healthcare practices?

USAID/FFP TITLE II BASELINE QUESTION GUIDE

Focus Group Discussion with Head of Household or Lead Female in Household

(This should be stated prior to giving them the consent form). Hello, thank you so much for joining us today for this discussion. In a few minutes I will give you a paper that allows us to ask for your permission to talk with you today. Before I have you make that decision, I would like to talk with you a little bit about what this group discussion will involve.

My name is (NAME OF INTERVIEWER), I am here with my colleague from ICF International and (NAME OF INTERPRETER) who will be helping her participate in our conversation today. All of us are contracted by USAID to complete a baseline study to understand the communities where they are providing supports through their partners Mercy Corps and ACDI/VOCA will be starting new programs.

To help us understand your communities and get to know the way you live, we would like to discuss a number of broad topics with you. The topics include the structure of your household, the types of food and beverages you and your family members eat and drink, the type of health care you have access to and have used specifically for the women and children in your family, farming practices, access to food and latrines, and cultural practices and beliefs in your community.

We welcome you to answer all of the questions we ask. However, if something makes you feel uncomfortable or prefer not to answer, that is okay. Or if you don't know an answer, it is fine to just say, "I don't know." We ask that you be respectful of the other participants. I have given you a pen and notebook, so if you want to write down a thought while another person is speaking please feel free to do so. Or if you don't feel comfortable providing a specific answer in the group, you may approach us after the group. You may keep the pen and notebook as a "thank you" for participating. Also, you can raise your hand and this will let us know that you have something you want to contribute while someone else is speaking, and we will make sure you have an opportunity to speak.

Okay, now we are going to go through a consent form, to ask your permission for you to participate in our conversation today. (Distribute the consent form…the interviewer and interpreter will read through the form with each participant and seek their consent).

……

Background Information: Before we begin our specific questions related to food, agriculture, health and nutrition, I wanted to learn a little bit about the typical structure of a household in your community.

1. Please describe tell me who you consider to be a part of your household? Do you all have similarly structured households? Or are there differences amongst you? Please explain
   PROBES:

a. What are the ages of these individuals that are part of the household?
b. Do all the members of the household live and sleep under the same roof?
c. How do you determine who is a part of your household?

2. How is the head of household determined?

3. Who makes the primary decisions in most households for the care of the children? We will explore this a little bit more in a bit. But it would be helpful to get a preliminary idea.

4. What are the various roles and responsibilities individuals have in a typical household regarding child care? Is there a difference in the roles and responsibilities by sex?

5. Is there a school in your community for children to attend? Do most children attend school? Why or why not? Who makes the decision in most families about who will attend school?

Food Access and Utilization: Now that I have a better understanding of the structure of your households, I want to ask you some questions about the various foods and drinks, people in your community typically consume or use.

6. Please tell me a little bit about the typical eating habits here in your community?
   PROBES:
   a. What kinds of foods do you typically eat? (Think about the foods that you and the members of your household ate over the last week)?
   b. What times of day do people eat?
   c. Who prepares the food?

7. Please tell me a little bit about the liquids individuals in your community typically drink.
   d. What do they typically drink?
   e. What times of day?

8. Where do most of the foods and beverages you consume come from?

9. Are there particular special events or holidays you celebrate that effect your food choices? Tell me about those occasions. How frequently do these events occur?

Water, Sanitation, and Hygiene (WASH): Now I would like to ask you a few questions about your access to water.

10. What is the main source of water for members in your community?

11. Tell me about the typical daily routine for fetching water. Does this activity happen individually for each household? Or is there a community system that is in place for fetching water?
    a. How long does it take to fetch water and return, including travel and waiting time?
    b. How is water carried?
    c. What time does it occur? And how often in the week?
    d. Who in the family is responsible for that activity?
    e. Who makes the decision regarding who will be responsible for fetching the water?
    f. Do those who fetch water face any risk s? What are these risks and what steps have been taken, if any, to reduce the risk?
    g. Do you typically sanitize your water before use? If so, what process do you follow? If not, why not?

12. Does this change in the dry versus the rainy season?

13. Are there times when water is not available to you? If so, what do you do when this happens?

Agriculture and Livelihood: Now I would like to ask you some questions about how the farming in your community is typically done.

14. What type of products do you or other members of your community farm (plants, animals, fish, etc)?

15. Typically who is in charge of the farming in the household regarding the decisions that are made? Who is in charge of the activities that take place for farming? Are these the same person? Or distinct people? Tell me a little bit about the breakdown of roles and responsibilities.
    PROBES:
    f. Do the children in the household participate in farming?
    g. Are there differences in the types of activities you undertake if you are a man or a woman?

16. Are there farming activities that you all participate in as a community? Or is this taken on by individual households?
    PROBES:
    h. What types of farming activities are taken on as a community versus individually?
    i. What about during particular holidays or celebrations?
    j. Who in the community is responsible for decision-making for community farming?

17. What are some of the challenges individuals in the community have faced with farming?

18. Where did the members of your community learn their farming practices?

Socio-Cultural and Political Community Context: In this last part of our interview, I would like to learn a little bit more about your community as a whole

19. What do you think are some of the greatest needs for your community? Have there been programs implemented in the past by the government, foreign donors, or community based organizations? If so, please tell me a little bit about your experiences with those programs. What were some of the strengths of those programs? And weaknesses?

20. How has the overall context and living situations changed within the last 2 years? Especially relating to security, food, health, women's rights, and agricultural production?

21. Are there locations/resources in your community that members would wish to access but have not for the past year due to insecurity/or avoidance of disputes? How has the level of access to this resource changed? How free are you to move around? Has this changed over time?

22. How often do you or your family members interact with individuals from other communities? What is the nature of interaction? What types of economic interactions are associated with good/bad relationship? Are there variations by sex? Who are the aggravators of conflict?

23. Is there any other additional information you would like to share with us about your access to food, your consumption of food and beverages, your work/livelihood, and healthcare practices?

USAID/FFP BASELINE QUESTION GUIDE

Individual Interview with Father, Mother, or Male/Female Caregiver of children ages 5 and under

Background Information: Before we begin our specific questions related to food, agriculture, health and nutrition, I wanted to learn a little bit about the people who live in your household.

1. Please list for me the people, their ages, and sex, who are a part of your household.
    a. Do they all live under the same roof? If no, please explain to me where they live.
    b. Who do you consider to be the head of the household? Is this person also the main decision-maker? What are the types of decisions they make for the family?
    c. Does the head of the household always live and sleep in the same home? Please explain this pattern for me.

2. Do you or your family members migrate to distant locations at particular times of year? Please tell me about that process.
    a. Who in your family migrates? And who does not? Why do you or other family members migrate?
    b. Who in the family makes decision regarding migration?

3. Who in your family goes to school?
    a. Who in your family makes the decision about who will attend school?
    b. When do they attend?
    c. Are there periods of the year that they do not attend? Why?

Food Access and Utilization: The primary objective of this section is to understand the access you have to various foods and drinks, and how you decide which foods your family members consume and the liquids they drink.

4. Please describe what a typical day in the last week looks like in terms of the food you eat…
    a. What are typical times of day you eat? What do you eat at those times?
    b. How do you decide what you are going to eat for each meal? If you do not decide who decides and how?
    c. Have there been times you would like to eat, but there is no food? Please tell me a little about how that influences your food choices and the times of day you eat.
    d. Are there differences in the food that is provided to grown men and women in your family? How are those decisions made? Who makes those decisions?
    e. Which household members are typically responsible for food preparation?

5. Now I would like to ask some questions about the eating habits of the children in your home.
    a. Are there differences in when the children who live in your home eat compared to your own habits or the habits of other adults in the family?
    b. What are some of your beliefs or customs regarding how people in your family eat? For example, does whether the child is a boy or girl influence the food they are given
    c. If there is not enough food available to feed your entire family, how do you manage that situation?

6. How do you and your children's eating habits change at different times of the year (during the rainy versus dry season, school year or non-school year)?

7. Where does the majority of food you consume come from? Do you buy it, produce it, or receive it from another source? Has that changed over time?

8. What is the primary beverage (water, milk, juice, tea, coffee, alcohol) that has been consumed in your household over the last week?

    a. Are there differences in the primary beverage intake by household member? What determines what beverages a household member consumes? Who makes that decision?
    b. Have there been times in the last month that you have wanted to have a particular beverage that was not available to you? Please tell me about that experience.
    c. What types of beverages do you take with your meals?

Nutritional Status of Women and Children and Access to Health Care: Now that we've learned a little bit about your eating and drinking habits, we would like to discuss some issues around the health of the women and children in your family.

9. Did you or the woman who gave birth to the children you care for receive health care prior to giving birth?
    a. From whom did you seek those services?
    b. Where were the children born? What lead to the decision about where to deliver the baby?
    c. Did you or the women who gave birth to the children you care for continue or start to seek health care services after giving birth?

10. Did you make the decision to breastfeed your children? Why or why not?
    a. How old was the child when s/he started to breastfeed? Did it occur immediately after the child was born? Why or why not?
    b. Who made this decision regarding breastfeeding?
    c. Some children receive breast milk in different ways such as a spoon, cup, or bottle, was that the case for any children in your household?

d. At what stage/age did you begin to introduce either beverages or food instead of breast milk? Why did you choose that age/stage?
e. Where did you learn about your practices and beliefs surrounding breastfeeding?

11. What are some of the health conditions that you or your children have faced over the last year? Two years? Please tell me about that experience. Do you see, health care as a preventative measure?

12. When someone in your family needs healthcare, what do you do?
    a. What health care services are available to you? (Probe: public, private, traditional healers, etc).
    b. Where are the health care facilities located? And how long does it take you to reach the health care facilities you need to attend?
    c. In what moment do you seek out health care services? Who makes the decision if a household member will seek treatment?
    d. Is there someone aside from a health care facility within in the community that you turn to for health care advice?
    e. Do you feel that your healthcare providers are reliable? Why or why not? Do you trust them? Why or why not? Do you fear them? If so, why?

13. Have your children been vaccinated? Why did you have your child vaccinated? Why not? What type of vaccines did they receive? Who make the decision to have your children vaccinated?If you did vaccinate your children, where did you go? Was it difficult or easy to have the vaccinations done?

14. Are there health services that you need for your children that are not available to you? Tell me about that.

Water, Sanitation, and Hygiene (WASH): Now I would like to ask you a few questions about your living arrangements and your access to water, and toilet facilities.

15. What is the main source of drinking water for members of your household? In the dry season? In the rainy season? How is the quality of water?

16. Tell me about the daily routine for fetching water.
    a. How long does it take to fetch water and return, including travel and waiting time?
    b. How is water carried?
    c. What time does it occur? And how often in the week?
    d. Who in the family is responsible for that activity?
    e. Who makes the decision regarding who will be responsible for fetching the water?
    f. Do those who fetch water face any risk s? What are these risks and what steps have been taken, if any, to reduce the risk?

g. Do you typically sanitize your water before use? If so, what process do you follow? If not, why not?

17. Is the water source you identified always available? What do you do if it isn't?

18. In your household, when do the [men, women, children] bathe? Where and how do they do it? How often? Do they use soap or another cleansing agent? What practices do you teach your children about washing?

19. When do you wash your hands? In addition to water, what do you and your family members use to wash your hands?

20. Do you and your family have access to a latrine? What is the typical set up of the latrine? Is it of use both to the men and women in your family? Are there times you or your family members elect not to use a latrine? Please explain.

Socio-Cultural and Political Community Context: In this last part of our interview, I would like to learn a little bit more about your community as a whole

21. What do you think are some of the greatest needs for your community, especially the children in your community? Have there been programs implemented in the past by the government, foreign donors, or community based organizations to address these issues? If so, please tell me a little bit about your experiences with those programs. What were some of the strengths of those programs? And weaknesses?

22. How has the overall context and living situations changed within the last 2 years? Especially relating to security, food, health, women's rights, and agricultural production?

23. Are there locations/resources in your community that members would wish to access but have not for the past year due to insecurity/or avoidance of disputes? How has the level of access to this resource changed? How free are you to move around? Has this changed over time?

24. How often do you or your family members interact with individuals from other communities? What is the nature of interaction?

25. Is there any other additional information you would like to share with us about your access to food, your consumption of food and beverages, your work/livelihood, and healthcare practices especially as it relates to your children?

USAID/FFP TITLE II BASELINE QUESTION GUIDE

Individual Interview with Male or Female Farmer

Background Information: Before we begin our specific questions related to food, agriculture, health and nutrition, I wanted to learn a little bit about the people who live in your household.

1. Please list for me the people, their ages, and sex, who are a part of your household.
    a. Do they all live under the same roof? If no, please explain to me where they live.
    b. Who do you consider to be the head of the household? Is this person also the main decision-maker? What are the types of decisions they make for the family?
    c. Does the head of the household always live and sleep in the same home? Please explain this pattern for me.

2. Do you or your family members migrate to distant locations at particular times of year? Please tell me about that process.
    a. A. Who in your family migrates? And who does not? Why do you or other family members migrate?
    b. Who in the family makes decision regarding migration?
    c. Is the migration due to farming?

3. Who in your family goes to school?
    a. Who in your family makes the decision about who will attend school?
    b. When do they attend?
    c. Are there periods of the year that they do not attend? Why?

Food Access and Utilization: The primary objective of this section is to understand the access you have to various foods and drinks, and how you decide which foods your family members consume and the liquids they drink.

4. Please describe what a typical day in the last week looks like in terms of the food you eat…
    a. What are typical times of day you eat? What do you eat at those times?
    b. How do you decide what you are going to eat for each meal? If you do not decide who decides and how?
    c. Have there been times you would like to eat, but there is no food? Please tell me a little about how that influences your food choices and the times of day you eat.
    d. Which household members are typically responsible for food preparation?

5. How do your eating habits change at different times of the year (during the rainy versus dry season)? Other family members?

6. Where does the majority of food you consume come from? Do you buy it, produce it, or receive it from another source? Has that changed over time?

7. What is the primary beverage (water, milk, juice, tea, coffee, alcohol) that you have consumed over the last week?

    a. Have there been times in the last month that you have wanted to have a particular beverage that was not available to you? Please tell me about that experience.
    b. What types of beverages do you take with your meals?

Agriculture and Livelihood: Now I would like to ask you some questions about experiences with farming. I want to focus on the farming you do over which you make the primary decisions.

8. What type of farming do you and your family members do or animals do you raise? For food to consume? For food to sell? Or both? If both, what percentage for each? Does this vary by time of year? Or some other purpose? If for some other purpose? What is that purpose?

9. I would like to learn a little bit more about the type of farming you do here for subsistence
    a. What type of products do you and your family farm at the various times of year? (particular plant or animal?)
    b. Who makes the primary decisions about the farming you undertake to sustain the family
    c. How did you/they decide to farm that particular product?
    d. What other decisions did individuals in your household make regarding your farm?
    e. Tell me a little bit about the roles and responsibilities of individuals in your household for farming as well as household work.
    f. Please tell me a little bit about your processes once you have harvested your food for your family consumption. What is your process for storing it? How do you process it? Who makes the decisions regarding the production and storage of food your harvested?

10. I would like to learn a little bit more about the type of farming you do here to generate income.
    a. What type of product do you farm? (particular plant or animal?)
    b. Who makes the primary decisions about the farming you undertake for income generation?
    c. How did you/they decide to farm that particular product?
    d. What other decisions did individuals in your household make regarding your farm?
    e. Tell me a little bit about the roles and responsibilities of individuals in your household for farming (grandmothers, grandfathers, mothers, fathers, children, etc.)

f. Please tell me a little bit about your processes once you have harvested your food for sale. What is your process for storing it? How do you process it? Who makes the decisions regarding the production and storage of food your harvested?

11. If you are selling any part of your products, please describe that process for me.
    a. Do you farm here locally or do you have to go elsewhere?
    b. What part of the process do you or other household members undertake in the preparation and sale of foods?
    c. Do you work with other community members?
    d. What do you do with the money you earn selling your goods?
    e. Who makes decisions regarding how the money will be allocated?

12. Have you experienced any events in the past that have impacted your ability to farm either for sustenance or for income? (Family illness, environmental episode, accident, community event, national event?) Did you have any insurance that helped you through that event? If not, how did you manage that period in your life?

13. Where did you learn your farming techniques? Who gave you this information? Are there techniques you would like to learn, but have not had access to?

    a. Techniques for farming for consumption?
    b. Techniques for farming for income generation?

14. What are some of the customs, traditions and/or beliefs related to work in the household? What differences are there in men's versus women's work roles? Who owns livestock? Who is responsible for processing different kinds of crops and livestock?

Poverty and Income: In this section we will ask you a few questions about your income sources, aside from farming and agriculture, your saving practices, and how you obtain the items you need for daily living.

15. What is the primary source of income for your household? Are there other secondary sources?

If it something other than agriculture or farming, I have some additional questions for you.

16. Does income coming in both from you as well as other household members from farming as well as other sources provide you with enough economic support to sustain your daily life? Please explain.

a. If your income does not sustain you, what other means do you use to obtain items you need for daily life including housing, health care, transportation, schooling, food, etc.
b. Are there times when you trade goods and services? Tell me about that experience?

17. Do you have any savings? Where is that from? Do you currently have a savings plan in place? What is the purpose of that plan? Are there particular items for which you are saving? Who in your household makes decisions regarding money saving practices?

Socio-Cultural and Political Community Context: In this last part of our interview, I would like to learn a little bit more about your community as a whole and some of the practices put in place by the national government to aid you in your everyday life.

18. What do you think are some of the greatest needs for your community? Have there been programs implemented in the past by the government, foreign donors, or community based organizations? If so, please tell me a little bit about your experiences with those programs. What were some of the strengths of those programs? And weaknesses?

19. What impact do conflict/disputes have on food security in the community?

20. How has the overall context and living situations changed within the last 2 years? Especially relating to security, food, health, women's rights, and agricultural production?

21. Are there locations/resources in your community that members would wish to access but have not for the past year due to insecurity/or avoidance of disputes? How has the level of access to this resource changed? How free are you to move around? Has this changed over time?

22. How often do you or your family members interact with individuals from other communities? What is the nature of interaction? What types of economic interactions are associated with good/bad relationship? Are there variations by sex? Who are the aggravators of conflict?

23. Is there any other additional information you would like to share with us about your access to food, your consumption of food and beverages, your work/livelihood, and healthcare practices?

USAID/FFP BASELINE QUESTION GUIDE

Individual Interview with Head of Household or Lead Female in Household

Background Information: Before we begin our specific questions related to food, agriculture, health and nutrition, I wanted to learn a little bit about the people who live in your household.

1. Please list for me the people, their ages, and sex, who are a part of your household.
    a. Do they all live under the same roof? If no, please explain to me where they live.
    b. Who do you consider to be the head of the household? Is this person also the main decision-maker? What are the types of decisions they make for the family?
    c. Does the head of the household always live and sleep in the same home? Please explain this pattern for me.

2. Do you or your family members migrate to distant locations at particular times of year? Please tell me about that process.
    a. A. Who in your family migrates? And who does not? Why do you or other family members migrate?
    b. Who in the family makes decision regarding migration?

3. Who in your family goes to school?
    a. Who in your family makes the decision about who will attend school?
    b. When do they attend?
    c. Are there periods of the year that they do not attend? Why?

Food Access and Utilization: The primary objective of this section is to understand the access you have to various foods and drinks, and how you decide which foods your family members consume and the liquids they drink.

4. Please describe what a typical day in the last week looks like in terms of the food you eat…
    a. What are typical times of day you eat? What do you eat at those times?
    b. How do you decide what you are going to eat for each meal? If you do not decide who decides and how?
    c. Have there been times you would like to eat, but there is no food? Please tell me a little about how that influences your food choices and the times of day you eat.
    d. Which household members are typically responsible for food preparation?

5. Now I would like to ask the same question but about the different members of your family
    a. Are there differences in when the children who live in your home eat compared to your own habits or the habits of other adults in the family?
    b. What are some of your beliefs or customs regarding how people in your family eat? For example, does whether the child is a boy or girl influence the food they are given? Or the

child's age? Are there differences in the food that is provided to grown men and women in your family? How are those decisions made? Who makes those decisions?

c. If there is not enough food available to feed your entire family, how do you manage that situation?

6. How do your eating habits change at different times of the year (during the rainy versus dry season)? Other family members?

7. Where does the majority of food you consume come from? Do you buy it, produce it, or receive it from another source? Has that changed over time?

8. What is the primary beverage (water, milk, juice, tea, coffee, alcohol) that has been consumed in your household over the last week?

    a. Are there differences in the primary beverage intake by household member? What determines what beverages a household member consumes? Who makes that decision?
    b. Have there been times in the last month that you have wanted to have a particular beverage that was not available to you? Please tell me about that experience.
    c. What types of beverages do you take with your meals?

Nutritional Status of Women and Children and Access to Health Care: Now that we've learned a little bit about your eating and drinking habits, we would like to discuss some issues around the health of the women and children in your family.

9. Did you make the decision to breastfeed your children? Why or why not?
    a. How old was the child when s/he started to breastfeed? Did it occur immediately after the child was born? Why or why not?
    b. Who made this decision regarding breastfeeding?
    c. Some children receive breast milk in different ways such as a spoon, cup, or bottle, was that the case for any children in your household?
    d. At what stage/age did you begin to introduce either beverages or food instead of breast milk? Why did you choose that age/stage?
    e. Where did you learn about your practices and beliefs surrounding breastfeeding?

10. What are some of the health conditions that you or members of your household have faced over the year? Two years? Please tell me about that experience. Do you see health care as a preventative measure?

11. When someone in your family needs health care, what do you do?
    a. What health services are available to you? (Probe: public, private, traditional healers, etc).

b. Where are the health care facilities located? And how long does it take you to reach the health care facilities you need to attend?
c. In what moment do you go to seek out health care services? Who makes the decision if a household member will seek treatment?
d. Is there someone aside from a health care facility within in the community that you turn to for health care advice?
e. Do you feel that your healthcare providers are reliable? Why or why not? Do you trust them? Why or why not? Do you fear them? If so, why?

12. Have your children been vaccinated? Why did you have your child vaccinated? Why not? What type of vaccines did they receive? Who make the decision to have your children vaccinated? If you did vaccinate your children, where did you go? Was it difficult or easy to have the vaccinations done?

Water, Sanitation, and Hygiene (WASH): Now I would like to ask you a few questions about your living arrangements and your access to water, and toilet facilities.

13. What is the main source of drinking water for members of your household? In the dry season? In the rainy season? How is the quality of water?

14. Tell me about the daily routine for fetching water.
    a. How long does it take to fetch water and return, including travel and waiting time?
    b. How is water carried?
    c. What time does it occur? And how often in the week?
    d. Who in the family is responsible for that activity?
    e. Who makes the decision regarding who will be responsible for fetching the water?
    f. Do those who fetch water face any risks? What are these risks and what steps have been taken, if any, to reduce the risk?
    g. Do you typically sanitize your water before use? If so, what process do you follow? If not, why not?

15. Is the water source you identified always available? What do you do if it isn't?

16. In your household, when do the [men, women, children] bathe? Where and how do they do it? How often? Do they use soap or another cleansing agent? What practices do you teach your children about washing?

17. When do you wash your hands? In addition to water, what do you and your family members use to wash your hands?

18. Do you and your family have access to a latrine? What is the typical set up of the latrine? Is it of use both to the men and women in your family? Are there times you or your family members elect not to use a latrine? Please explain.

Agriculture and Livelihood: Now I would like to ask you some questions about the farming you do here at your home.

19. Do you farm or do you raise animals? If so…
    a. What type of products do you and your family farm at the various times of year? (particular plant or animal?)
    b. Who makes the primary decisions about the farming you undertake to sustain the family?
    c. How did you/they decide to farm that particular product?
    d. Tell me a little bit about the roles and responsibilities of individuals in your household for farming as well as household work.
    e. Please tell me a little bit about your processes once you have harvested your food for your family consumption. What is your process for storing it? How do you process it?
    f. Who makes the decisions regarding the production and storage of food your harvested?
    g. Where did you learn your farming techniques? Who gave you this information? Are there techniques you would like to learn, but have not had access to?

Poverty and Income: In this section we will ask you a few questions about your income sources, your saving practices, and how you obtain the items you need for daily living.

20. What is the primary source of income for your household? Are there other secondary sources? Who is responsible for bringing in these sources of income?

Do you pool your money into a single fund or do the individuals who earn the income have "ownership" over the income they bring in?

21. Does the income you or you in combination with other in your household brings in provide you with enough economic support to sustain your daily life? Please explain.

    a. If your income does not sustain you, what other means do you use to obtain items you need for daily life including housing, health care, transportation, schooling, food, etc.
    b. Are there times when you trade goods and services? Tell me about that experience?

22. Do you have any savings? Are your savings part of a savings plan? Please tell me more about that. Is there something in particular for which you are saving? What is the main income source for your savings?

Socio-Cultural and Political Community Context: In this last part of our interview, I would like to learn a little bit more about your community as a whole

23. What do you think are some of the greatest needs for your community? Have there been programs implemented in the past by the government, foreign donors, or community based organizations? If so, please tell me a little bit about your experiences with those programs. What were some of the strengths of those programs? And weaknesses?

24. What impact do conflict/disputes have on food security in the community? Do these conflicts have a negative or positive impact on economic development in your community? Please explain.

25. How has the overall context and living situations changed within the last 2 years? Especially relating to security, food, health, women's rights, and agricultural production?

26. Are there locations/resources in your community that members would wish to access but have not for the past year due to insecurity/or avoidance of disputes? How has the level of access to this resource changed? How free are you to move around? Has this changed over time?

27. How often do you or your family members interact with individuals from other communities? What is the nature of interaction? Are there variations by sex?

28. Is there any other additional information you would like to share with us about your access to food, your consumption of food and beverages, your work/livelihood, and nutritional status of women and children or other healthcare practices?

Annex 7: Tabular Summary of Indicators

Table A7.1. Title II Baseline Indicators
Indicators, 95% Confidence Intervals and Base Population [Uganda, 2013]

	Indicator Value	95% CI Lower	95% CI Upper	Number of Records	Weighted Population	Standard Error	DEFT
HOUSEHOLD LEVEL INDICATORS							
Average Household Dietary Diversity Score (HDDS)	2.4	2.3	2.5	4,133	155,574	0.1	2.8
Prevalence of households with moderate or severe hunger (HHS)	72.8	70.0	75.5	4,766	155,574	1.4	2.2
Adult Female no Adult Male	71.7	66.0	76.7	452	15,340	2.7	1.3
Adult Male no Adult Female	70.7	55.7	82.3	70	1,749	6.7	1.2
Male and Female Adults	73.0	69.9	75.9	4,244	138,485	1.5	2.2
Child No Adults [1]	-	-	-	0	0	-	-
Percentage of households using an improved drinking water source	39.4	35.6	43.2	4,766	155,574	1.9	2.7
Percentage of households using improved sanitation facilities	8.9	7.1	11.1	4,766	155,574	1.0	2.4
Percentage of households with soap and water at a handwashing station commonly used by family members	8.1	5.4	11.9	4,478	155,574	1.6	4.0
Prevalence of poverty: Percent of people living on less than $1.25/day	94.3	92.6	95.6	29,659	983,906	0.8	2.2
Adult Female no Adult Male	93.8	87.9	97.0	2,385	84,105	2.2	1.9
Adult Male no Adult Female	87.2	58.1	97.1	302	8,135	8.8	2.2
Male and Female Adults	94.4	92.7	95.7	26,972	891,666	0.7	2.1
Child No Adults [1]	-	-	-	0	0	-	-
Mean depth of poverty	63.7	61.0	66.4	29,659	983,906	1.4	3.6
Adult Female no Adult Male	58.2	50.1	66.4	2,385	84,105	4.1	3.1
Adult Male no Adult Female	56.6	43.3	69.8	302	8,135	6.5	1.9
Male and Female Adults	64.3	61.9	66.7	26,972	891,666	1.2	3.1
Child No Adults [1]	-	-	-	0	0	-	-
Per capita expenditures (as a proxy for income) of USG targeted beneficiaries	0.56	0.51	0.60	29,659	983,906	0.02	2.3
Adult Female no Adult Male	0.62	0.50	0.75	2,385	84,105	0.06	2.4
Adult Male no Adult Female	0.66	0.43	0.88	302	8,135	0.11	1.7
Male and Female Adults	0.55	0.51	0.59	26,972	891,666	0.02	2.0
Child No Adults [1]	-	-	-	0	0	-	-
AGRICULTURAL INDICATORS							
Percentage of farmers who used financial services in the past 12 months	29.5	25.3	34.1	5,784	209,926	2.2	3.7
Male farmers	30.3	25.3	35.8	2,659	95,360	2.7	3.0
Female farmers	28.9	24.7	33.5	3,125	114,566	2.2	2.7
Percentage of farmers who practiced value chain activities promoted by the project in the past 12 months	80.0	77.8	82.0	5,784	209,926	1.1	2.0
Male farmers	81.5	78.9	83.8	2,659	95,360	1.2	1.6
Female farmers	78.7	75.8	81.5	3,125	114,566	1.4	2.0
Percentage of farmers who used three sustainable agricultural practices in the past 12 months	17.7	14.2	21.8	5,834	209,926	1.9	3.9
Male farmers	21.8	17.3	27.1	2,674	95,360	2.5	3.1
Female farmers	14.3	11.5	17.6	3,160	114,566	1.5	2.5
Percentage of farmers who used improved storage practices in the past 12 months	50.3	46.3	54.3	5,434	209,926	2.0	3.0
Male farmers	53.5	48.1	58.8	2,510	95,360	2.7	2.7
Female farmers	47.6	43.8	51.5	2,924	114,566	2.0	2.1
WOMEN'S EMPOWERMENT IN AGRICULTURE INDEX (WEAI)							
Women's empowerment in agriculture index (WEAI)	0.788	NA	NA	4,591	153,825	NA	NA

Table A7.1. Title II Baseline Indicators

Indicators, 95% Confidence Intervals and Base Population [Uganda, 2013]

	Indicator Value	95% CI		Number of Records	Weighted Population	Standard Error	DEFT
		Lower	Upper				
WOMEN'S HEALTH AND NUTRITION INDICATORS							
Prevalence of underweight women	23.4	20.1	27.2	3,554	202,672	1.8	2.5
Women's Dietary Diversity Score	2.3	2.2	2.4	4,417	202,672	0.1	2.4
CHILDREN'S HEALTH AND NUTRITION INDICATORS							
Prevalence of underweight children under 5 years of age (Total)	21.0	18.9	23.3	5,335	191,021	1.1	2.0
Prevalence of underweight children under 5 years of age (Male)	23.5	19.9	27.5	2,583	93,842	1.9	2.3
Prevalence of underweight children under 5 years of age (Female)	18.7	17.0	20.5	2,752	97,179	0.9	1.2
Prevalence of stunted children under 5 years of age (Total)	34.5	32.0	37.2	5,335	191,021	1.3	2.0
Prevalence of stunted children under 5 years of age (Male)	37.3	32.6	42.3	2,583	93,842	2.5	2.6
Prevalence of stunted children under 5 years of age (Female)	31.8	29.5	34.2	2,752	97,179	1.2	1.3
Prevalence of wasted children under 5 years of age (Total)	12.6	11.3	14.1	5,335	191,021	0.7	1.6
Prevalence of wasted children under 5 years of age (Male)	13.7	11.4	16.4	2,583	93,842	1.3	1.9
Prevalence of wasted children under 5 years of age (Female)	11.6	10.2	13.1	2,752	97,179	0.7	1.2
Percentage of children under age 5 with diarrhea in the last two weeks (Total)	22.0	19.9	24.3	5,642	191,021	1.1	2.0
Percentage of children under age 5 with diarrhea in the last two weeks (Male)	22.7	20.0	25.7	2,722	93,842	1.4	1.8
Percentage of children under age 5 with diarrhea in the last two weeks (Female)	21.3	19.1	23.7	2,920	97,179	1.1	1.5
Percentage of children under age 5 with diarrhea treated with ORT (Total)	88.4	85.3	90.9	1,166	41,909	1.4	1.5
Percentage of children under age 5 with diarrhea treated with ORT (Male)	89.3	85.5	92.1	574	21,272	1.7	1.3
Percentage of children under age 5 with diarrhea treated with ORT (Female)	87.5	83.0	90.9	592	20,637	2.0	1.5
Prevalence of exclusive breast-feeding of children under six months of age	59.9	53.8	65.7	587	21,553	3.0	1.5
Prevalence of exclusive breast-feeding of children under six months of age (Male)	59.2	50.3	67.5	299	11,424	4.4	1.5
Prevalence of exclusive breast-feeding of children under six months of age (Female)	60.7	54.0	66.9	288	10,129	3.3	1.1
Prevalence of children 6-23 months of age receiving a minimum acceptable diet (MAD)	4.2	3.0	5.8	1,621	59,976	0.7	1.4
Prevalence of children 6-23 months of age receiving a minimum acceptable diet (MAD) (Male)	4.2	2.5	7.0	805	30,266	1.1	1.6
Prevalence of children 6-23 months of age receiving a minimum acceptable diet (MAD) (Female)	4.2	2.7	6.5	816	29,710	0.9	1.3

Note: Prevalence of wasted children is included but is not a required FFP indicator

[1] No households of this type in the sample

Table A7.2. Title II Baseline Indicators - Northern Karamoja
Indicators, 95% Confidence Intervals and Base Population [Uganda, 2013]

	Indicator Value	95% CI Lower	95% CI Upper	Number of Records	Weighted Population	Standard Error	DEFT
HOUSEHOLD LEVEL INDICATORS							
Average Household Dietary Diversity Score (HDDS)	2.2	2.0	2.4	2,078	87,812	0.1	3.1
Prevalence of households with moderate or severe hunger (HHS)	76.0	72.2	79.3	2,399	87,812	1.8	2.2
Adult Female no Adult Male	73.2	65.9	79.3	254	9,660	3.4	1.3
Adult Male no Adult Female	61.7	36.1	82.1	25	658	12.2	1.3
Male and Female Adults	76.4	72.4	80.0	2,120	77,495	1.9	2.2
Child No Adults [1]	-	-	-	0	0	-	-
Percentage of households using an improved drinking water source	37.4	32.2	43.0	2,399	87,812	2.7	2.9
Percentage of households using improved sanitation facilities	12.7	9.9	16.1	2,399	87,812	1.6	2.4
Percentage of households with soap and water at a handwashing station commonly used by family members	11.0	7.0	16.8	2,323	87,812	2.4	4.0
Prevalence of poverty: Percent of people living on less than $1.25/day	93.2	90.5	95.3	15,127	559,850	1.2	2.5
Adult Female no Adult Male	92.6	84.1	96.8	1,384	55,056	3.0	2.0
Adult Male no Adult Female	100.0	100.0	100.0	130	3,185	-	-
Male and Female Adults	93.3	90.6	95.2	13,613	501,609	1.1	2.2
Child No Adults [1]	-	-	-	0	0	-	-
Mean depth of poverty	61.5	57.4	65.5	15,127	559,850	2.1	4.1
Adult Female no Adult Male	57.1	45.3	68.8	1,384	55,056	5.9	3.5
Adult Male no Adult Female	64.3	54.9	73.7	130	3,185	4.6	1.3
Male and Female Adults	61.9	58.3	65.5	13,613	501,609	1.8	3.4
Child No Adults [1]	-	-	-	0	0	-	-
Per capita expenditures (as a proxy for income) of USG targeted beneficiaries	0.58	0.51	0.65	15,127	559,850	0.03	3.1
Adult Female no Adult Male	0.63	0.45	0.81	1,384	55,056	0.09	3.2
Adult Male no Adult Female	0.50	0.37	0.63	130	3,185	0.06	1.3
Male and Female Adults	0.58	0.51	0.64	13,613	501,609	0.03	2.6
Child No Adults [1]	-	-	-	0	0	-	-
AGRICULTURAL INDICATORS							
Percentage of farmers who used financial services in the past 12 months	31.6	24.5	39.6	2,721	116,926	3.8	4.7
Male farmers	33.7	25.4	43.0	1,245	52,043	4.5	3.6
Female farmers	29.9	22.9	37.9	1,476	64,884	3.8	3.5
Percentage of farmers who practiced value chain activities promoted by the project in the past 12 months	82.1	79.2	84.6	2,721	116,926	1.4	2.0
Male farmers	85.9	82.9	88.4	1,245	52,043	1.4	1.5
Female farmers	79.0	74.7	82.8	1,476	64,884	2.0	2.1
Percentage of farmers who used three sustainable agricultural practices in the past 12 months	16.7	12.4	21.9	2,754	116,926	2.4	3.7
Male farmers	20.8	15.2	27.9	1,256	52,043	3.2	3.0
Female farmers	13.3	10.0	17.5	1,498	64,884	1.9	2.3
Percentage of farmers who used improved storage practices in the past 12 months	48.7	42.9	54.5	2,519	116,926	2.9	3.2
Male farmers	56.3	48.5	63.8	1,167	52,043	3.9	2.9
Female farmers	42.4	37.5	47.5	1,352	64,884	2.5	2.1
WOMEN'S EMPOWERMENT IN AGRICULTURE INDEX (WEAI)							
Women's empowerment in agriculture index (WEAI)	0.774	NA	NA	2,332	87,154	NA	NA

Table A7.2. Title II Baseline Indicators - Northern Karamoja

Indicators, 95% Confidence Intervals and Base Population [Uganda, 2013]

	Indicator Value	95% CI		Number of Records	Weighted Population	Standard Error	DEFT
		Lower	Upper				
WOMEN'S HEALTH AND NUTRITION INDICATORS							
Prevalence of underweight women	20.9	16.2	26.6	1,776	118,040	2.6	2.9
Women's Dietary Diversity Score	2.1	2.0	2.2	2,233	118,040	0.1	2.2
CHILDREN'S HEALTH AND NUTRITION INDICATORS							
Prevalence of underweight children under 5 years of age (Total)	21.5	18.3	25.0	2,747	111,334	1.7	2.3
Prevalence of underweight children under 5 years of age (Male)	23.8	18.3	30.2	1,323	55,689	3.0	2.8
Prevalence of underweight children under 5 years of age (Female)	19.2	17.0	21.6	1,424	55,645	1.2	1.2
Prevalence of stunted children under 5 years of age (Total)	32.0	28.3	36.0	2,747	111,334	1.9	2.3
Prevalence of stunted children under 5 years of age (Male)	33.7	26.9	41.2	1,323	55,689	3.6	3.0
Prevalence of stunted children under 5 years of age (Female)	30.4	27.3	33.7	1,424	55,645	1.6	1.4
Prevalence of wasted children under 5 years of age (Total)	13.7	11.4	16.3	2,747	111,334	1.2	2.0
Prevalence of wasted children under 5 years of age (Male)	14.3	10.7	18.7	1,323	55,689	2.0	2.3
Prevalence of wasted children under 5 years of age (Female)	13.1	11.0	15.4	1,424	55,645	1.1	1.3
Percentage of children under age 5 with diarrhea in the last two weeks (Total)	21.3	18.6	24.3	2,886	111,334	1.4	2.0
Percentage of children under age 5 with diarrhea in the last two weeks (Male)	22.6	19.2	26.5	1,398	55,689	1.9	1.8
Percentage of children under age 5 with diarrhea in the last two weeks (Female)	20.1	17.2	23.2	1,488	55,645	1.5	1.6
Percentage of children under age 5 with diarrhea treated with ORT (Total)	92.7	88.1	95.6	581	23,663	1.8	1.8
Percentage of children under age 5 with diarrhea treated with ORT (Male)	92.9	87.5	96.1	290	12,541	2.1	1.5
Percentage of children under age 5 with diarrhea treated with ORT (Female)	92.4	86.4	95.8	291	11,123	2.3	1.5
Prevalence of exclusive breast-feeding of children under six months of age	60.8	51.6	69.3	311	12,645	4.5	1.7
Prevalence of exclusive breast-feeding of children under six months of age (Male)	61.4	47.8	73.5	159	6,712	6.6	1.8
Prevalence of exclusive breast-feeding of children under six months of age (Female)	60.1	50.3	69.2	152	5,933	4.8	1.3
Prevalence of children 6-23 months of age receiving a minimum acceptable diet (MAD)	2.1	1.0	4.4	803	34,540	0.8	1.7
Prevalence of children 6-23 months of age receiving a minimum acceptable diet (MAD) (Male)	2.3	0.6	8.4	407	18,039	1.6	2.2
Prevalence of children 6-23 months of age receiving a minimum acceptable diet (MAD) (Female)	1.9	0.7	4.7	396	16,501	0.9	1.4

Note: Prevalence of wasted children is included but is not a required FFP indicator

[1] No households of this type in the sample

Table A7.3. Title II Baseline Indicators - Southern Karamoja
Indicators, 95% Confidence Intervals and Base Population [Uganda, 2013]

	Indicator Value	95% CI Lower	95% CI Upper	Number of Records	Weighted Population	Standard Error	DEFT
HOUSEHOLD LEVEL INDICATORS							
Average Household Dietary Diversity Score (HDDS)	2.7	2.5	2.9	2,055	67,762	0.1	2.2
Prevalence of households with moderate or severe hunger (HHS)	68.8	65.3	72.1	2,367	67,762	1.7	1.7
Adult Female no Adult Male	69.1	60.4	76.7	198	5,681	4.1	1.2
Adult Male no Adult Female	76.2	59.4	87.5	45	1,091	7.0	1.1
Male and Female Adults	68.7	64.8	72.3	2,124	60,990	1.9	1.8
Child No Adults [1]	-	-	-	0	0	-	-
Percentage of households using an improved drinking water source	41.9	36.8	47.2	2,367	67,762	2.6	2.4
Percentage of households using improved sanitation facilities	4.0	3.1	5.1	2,367	67,762	0.5	1.2
Percentage of households with soap and water at a handwashing station commonly used by family members	4.0	2.6	6.2	2,155	67,762	0.9	2.0
Prevalence of poverty: Percent of people living on less than $1.25/day	95.6	93.9	96.9	14,532	424,056	0.8	1.7
Adult Female no Adult Male	96.2	91.2	98.4	1,001	29,049	1.6	1.0
Adult Male no Adult Female	78.9	40.3	95.4	172	4,950	14.0	2.2
Male and Female Adults	95.8	94.0	97.1	13,359	390,057	0.7	1.6
Child No Adults [1]	-	-	-	0	0	-	-
Mean depth of poverty	66.7	64.1	69.4	14,532	424,056	1.4	2.5
Adult Female no Adult Male	60.5	55.1	65.8	1,001	29,049	2.7	1.3
Adult Male no Adult Female	51.5	31.3	71.8	172	4,950	10.0	2.0
Male and Female Adults	67.4	64.7	70.0	13,359	390,057	1.3	2.4
Child No Adults [1]	-	-	-	0	0	-	-
Per capita expenditures (as a proxy for income) of USG targeted beneficiaries	0.52	0.47	0.58	14,532	424,056	0.03	1.5
Adult Female no Adult Male	0.61	0.50	0.72	1,001	29,049	0.06	1.1
Adult Male no Adult Female	0.76	0.41	1.10	172	4,950	0.17	1.7
Male and Female Adults	0.51	0.46	0.57	13,359	390,057	0.03	1.5
Child No Adults [1]	-	-	-	0	0	-	-
AGRICULTURAL INDICATORS							
Percentage of farmers who used financial services in the past 12 months	27.1	24.4	29.9	3,063	93,000	1.4	1.6
Male farmers	26.3	23.4	29.5	1,414	43,318	1.5	1.2
Female farmers	27.7	24.6	31.0	1,649	49,682	1.6	1.3
Percentage of farmers who practiced value chain activities promoted by the project in the past 12 months	77.4	73.6	80.8	3,063	93,000	1.8	2.2
Male farmers	76.3	72.5	79.7	1,414	43,318	1.8	1.5
Female farmers	78.4	73.9	82.3	1,649	49,682	2.1	1.9
Percentage of farmers who used three sustainable agricultural practices in the past 12 months	19.0	13.7	25.7	3,080	93,000	3.0	3.9
Male farmers	22.9	16.3	31.3	1,418	43,318	3.8	3.2
Female farmers	15.5	11.2	21.0	1,662	49,682	2.5	2.5
Percentage of farmers who used improved storage practices in the past 12 months	52.2	47.3	57.2	2,915	93,000	2.5	2.5
Male farmers	50.2	43.7	56.6	1,343	43,318	3.3	2.2
Female farmers	54.1	49.5	58.7	1,572	49,682	2.3	1.7
WOMEN'S EMPOWERMENT IN AGRICULTURE INDEX (WEAI)							
Women's empowerment in agriculture index (WEAI)	0.806	NA	NA	2,259	66,671	NA	NA

Table A7.3. Title II Baseline Indicators - Southern Karamoja
Indicators, 95% Confidence Intervals and Base Population [Uganda, 2013]

	Indicator Value	95% CI		Number of Records	Weighted Population	Standard Error	DEFT
		Lower	Upper				
WOMEN'S HEALTH AND NUTRITION INDICATORS							
Prevalence of underweight women	26.8	23.8	30.0	1,778	84,632	1.6	1.4
Women's Dietary Diversity Score	2.6	2.5	2.8	2,184	84,632	0.1	2.3
CHILDREN'S HEALTH AND NUTRITION INDICATORS							
Prevalence of underweight children under 5 years of age (Total)	20.5	17.9	23.2	2,588	79,687	1.3	1.6
Prevalence of underweight children under 5 years of age (Male)	23.1	19.4	27.3	1,260	38,153	2.0	1.5
Prevalence of underweight children under 5 years of age (Female)	17.9	15.4	20.9	1,328	41,534	1.4	1.2
Prevalence of stunted children under 5 years of age (Total)	38.0	35.6	40.5	2,588	79,687	1.2	1.2
Prevalence of stunted children under 5 years of age (Male)	42.6	38.9	46.5	1,260	38,153	1.9	1.3
Prevalence of stunted children under 5 years of age (Female)	33.7	30.4	37.1	1,328	41,534	1.7	1.2
Prevalence of wasted children under 5 years of age (Total)	11.2	10.1	12.4	2,588	79,687	0.6	0.9
Prevalence of wasted children under 5 years of age (Male)	12.9	10.9	15.1	1,260	38,153	1.1	1.0
Prevalence of wasted children under 5 years of age (Female)	9.6	7.8	11.8	1,328	41,534	1.0	1.2
Percentage of children under age 5 with diarrhea in the last two weeks (Total)	22.9	19.8	26.5	2,756	79,687	1.7	2.0
Percentage of children under age 5 with diarrhea in the last two weeks (Male)	22.9	18.9	27.5	1,324	38,153	2.2	1.7
Percentage of children under age 5 with diarrhea in the last two weeks (Female)	23.0	19.8	26.5	1,432	41,534	1.7	1.4
Percentage of children under age 5 with diarrhea treated with ORT (Total)	82.8	79.6	85.5	585	18,246	1.5	0.9
Percentage of children under age 5 with diarrhea treated with ORT (Male)	84.0	79.2	87.8	284	8,731	2.2	0.9
Percentage of children under age 5 with diarrhea treated with ORT (Female)	81.7	75.7	86.5	301	9,514	2.7	1.2
Prevalence of exclusive breast-feeding of children under six months of age	58.5	51.0	65.7	276	8,908	3.7	1.2
Prevalence of exclusive breast-feeding of children under six months of age (Male)	56.0	45.3	66.2	140	4,712	5.4	1.2
Prevalence of exclusive breast-feeding of children under six months of age (Female)	61.4	52.3	69.7	136	4,196	4.4	1.0
Prevalence of children 6-23 months of age receiving a minimum acceptable diet (MAD)	7.0	5.1	9.5	818	25,436	1.1	1.2
Prevalence of children 6-23 months of age receiving a minimum acceptable diet (MAD) (Male)	6.9	4.5	10.5	398	12,227	1.5	1.1
Prevalence of children 6-23 months of age receiving a minimum acceptable diet (MAD) (Female)	7.1	4.3	11.3	420	13,209	1.7	1.3

Note: Prevalence of wasted children is included but is not a required FFP indicator

[1] No households of this type in the sample

Table A7.4. Title II FFP Baseline Indicators - Program Comparisons
Indicators and P-values for Test of Differences [Uganda, 2013]

	Indicator Value		P-Value
	Northern Karamoja	Southern Karamoja	
HOUSEHOLD LEVEL INDICATORS			
Average Household Dietary Diversity Score (HDDS)	2.2	2.7	.00**
Prevalence of households with moderate or severe hunger (HHS)	76.0	68.8	.00**
Adult Female no Adult Male	73.2	69.1	.44
Adult Male no Adult Female	61.7	76.2	.28
Male and Female Adults	76.4	68.7	.00**
Child No Adults [1]	-	-	-
Percentage of households using an improved drinking water source	37.4	41.9	.25
Percentage of households using improved sanitation facilities	12.7	4.0	.00**
Percentage of households with soap and water at a handwashing station commonly used by family members	11.0	4.0	.00**
Prevalence of poverty: Percent of people living on less than $1.25/day	93.2	95.6	.10
Adult Female no Adult Male	92.6	96.2	.27
Adult Male no Adult Female	100.0	78.9	.00**
Male and Female Adults	93.3	95.8	.07
Child No Adults [1]	-	-	-
Mean depth of poverty	61.5	66.7	.04*
Adult Female no Adult Male	57.1	60.5	.61
Adult Male no Adult Female	64.3	51.5	.24
Male and Female Adults	61.9	67.4	.02*
Child No Adults [1]	-	-	-
Per capita expenditures (as a proxy for income) of USG targeted beneficiaries	0.58	0.52	.22
Adult Female no Adult Male	0.63	0.61	.83
Adult Male no Adult Female	0.50	0.76	.15
Male and Female Adults	0.58	0.51	.17
Child No Adults [1]	-	-	-
AGRICULTURAL INDICATORS			
Percentage of farmers who used financial services in the past 12 months	31.6	27.1	.26
Male farmers	33.7	26.3	.11
Female farmers	29.9	27.7	.60
Percentage of farmers who practiced value chain activities promoted by the project in the past 12 months	82.1	77.4	.04*
Male farmers	85.9	76.3	.00**
Female farmers	79.0	78.4	.83
Percentage of farmers who used three sustainable agricultural practices in the past 12 months	16.7	19.0	.55
Male farmers	20.8	22.9	.68
Female farmers	13.3	15.5	.47
Percentage of farmers who used improved storage practices in the past 12 months	48.7	52.3	.34
Male farmers	56.3	50.2	.23
Female farmers	42.4	54.1	.00**
WOMEN'S EMPOWERMENT IN AGRICULTURE INDEX (WEAI)			
Women's empowerment in agriculture index (WEAI)	0.774	0.806	NA

Table A7.4. Title II FFP Baseline Indicators - Program Comparisons
Indicators and P-values for Test of Differences [Uganda, 2013]

	Indicator Value		P-Value
	Northern Karamoja	Southern Karamoja	
WOMEN'S HEALTH AND NUTRITION INDICATORS			
Prevalence of underweight women	20.9	26.8	.07
Women's Dietary Diversity Score	2.1	2.6	.00**
CHILDREN'S HEALTH AND NUTRITION INDICATORS			
Prevalence of underweight children under 5 years of age (Total)	21.5	20.5	.64
Prevalence of underweight children under 5 years of age (Male)	23.8	23.1	.86
Prevalence of underweight children under 5 years of age (Female)	19.2	17.9	.50
Prevalence of stunted children under 5 years of age (Total)	32.0	38.0	.01*
Prevalence of stunted children under 5 years of age (Male)	33.7	42.6	.04*
Prevalence of stunted children under 5 years of age (Female)	30.4	33.7	.17
Prevalence of wasted children under 5 years of age (Total)	13.7	11.2	.06
Prevalence of wasted children under 5 years of age (Male)	14.3	12.9	.52
Prevalence of wasted children under 5 years of age (Female)	13.1	9.6	.03*
Percentage of children under age 5 with diarrheain the last two weeks (Total)	21.3	22.9	.47
Percentage of children under age 5 with diarrhea in the last two weeks (Male)	22.6	22.9	.93
Percentage of children under age 5 with diarrhea in the last two weeks (Female)	20.1	23.0	.19
Percentage of children under age 5 with diarrhea treated with ORT (Total)	92.7	82.8	.00**
Percentage of children under age 5 with diarrhea treated with ORT (Male)	92.9	84.0	.01*
Percentage of children under age 5 with diarrhea treated with ORT (Female)	92.4	81.7	.01**
Prevalence of exclusive breast-feeding of children under six months of age	60.8	58.5	.70
Prevalence of exclusive breast-feeding of children under six months of age (Male)	61.4	56.0	.53
Prevalence of exclusive breast-feeding of children under six months of age (Female)	60.1	61.4	.85
Prevalence of children 6-23 months of age receiving a minimum acceptable diet (MAD)	2.1	7.0	.00**
Prevalence of children 6-23 months of age receiving a minimum acceptable diet (MAD) (Male)	2.3	6.9	.12
Prevalence of children 6-23 months of age receiving a minimum acceptable diet (MAD) (Female)	1.9	7.1	.01*

* p <.05
** p <.01
[1] No households of this type in the sample

Table A7.5. Title II Program-specific Indicators - Both Program Areas
Indicators, 95% Confidence Intervals and Base Population [Uganda, 2013]

	Indicator Value	95% CI		Number of Records	Weighted Population	Standard Error	DEFT
		Lower	Upper				
Handwashing, Sanitation and Security (Household respondents)							
Percentage who know 3 of 5 critical moments for handwashing[1]	70.2	66.2	73.9	4,766	155,574	2.0	3.0
Percentage with access to a sanitation facility of any type	27.8	22.0	34.4	4,766	155,574	3.2	4.9
Percentage reporting increased movement in areas that were previously not accessible due to insecurity	60.7	56.7	64.5	4,766	155,574	2.0	2.8
Agricultural Practices (Farmers)							
Average number of crops produced - past 12 months	2.6	2.5	2.7	5,814	209,926	0.04	2.3
Percentage adopting farmer managed natural regeneration practices - past 12 months	16.2	13.7	19.0	5,782	209,926	1.3	2.8
Percentage using at least three productivity improving agricultural practices and/or technologies - past 12 months	17.7	14.2	21.8	5,834	209,926	1.9	3.9
Veterinary Care (Livestock owners)							
Percentage accessing government or private sector veterinary care - past 12 months	65.6	59.1	71.5	1,734	57,963	3.2	2.8
Health Care Seeking Decision-Making (Female caretakers of children 0-59 months - married or in a union)							
Percentage making decisions about health care for themselves[2]	77.2	74.6	79.7	3,234	109,230	1.3	1.8
Percentage making decisions about health care for children 0-59 months[2]	77.4	74.5	80.1	3,234	109,230	1.4	1.9
IYCF and MCC Practices Awareness (Caretakers of children 0-59 months)							
Percentage who know at least **7** of 15 IYCF and MCC practices	22.8	19.3	26.8	3,545	120,598	1.9	2.7
Family Planning Awareness (Women 15-49)							
Percentage who are aware of where to go for family planning services	43.1	39.5	46.8	4,531	206,195	1.8	2.5
Antenatal Care (Mothers of children 0-23 months)							
Percentage attending 4 or more antenatal care visits with youngest child	60.0	56.2	63.7	1,806	62,989	1.9	1.7

[1] Critical moments for handwashing include 1) after defecation, 2) after cleaning a child, 3) before preparing food, 4) before feeding a child, and 5) before eating.
[2] Includes joint decision making.

Table A7.6. Title II Program-specific Indicators - Northern Karamoja
Indicators, 95% Confidence Intervals and Base Population [Uganda, 2013]

	Indicator Value	95% CI		Number of Records	Weighted Population	Standard Error	DEFT
		Lower	Upper				
Handwashing, Sanitation and Security (Household respondents)							
Percentage who know 3 of 5 critical moments for handwashing[1]	69.6	63.7	74.9	2,399	87,812	2.8	3.2
Percentage with access to a sanitation facility of any type	40.5	32.0	49.6	2,399	87,812	4.5	4.8
Percentage reporting increased movement in areas that were previously not accessible due to insecurity	52.4	48.8	56.0	2,399	87,812	1.8	1.9
Agricultural Practices (Farmers)							
Average number of crops produced - past 12 months	2.6	2.5	2.7	2,739	116,926	0.06	2.3
Percentage adopting farmer managed natural regeneration practices - past 12 months	16.4	13.1	20.4	2,721	116,926	1.8	2.8
Percentage using at least three productivity improving agricultural practices and/or technologies - past 12 months	16.7	12.4	21.9	2,754	116,926	2.4	3.7
Veterinary Care (Livestock owners)							
Percentage accessing government or private sector veterinary care - past 12 months	63.1	52.9	72.2	791	34,514	4.9	3.3
Health Care Seeking Decision-Making (Female caretakers of children 0-59 months - married or in a union)							
Percentage making decisions about health care for themselves[2]	79.6	76.1	82.8	1,653	62,368	1.7	1.8
Percentage making decisions about health care for children 0-59 months[2]	79.9	76.2	83.2	1,653	62,368	1.8	1.9
IYCF and MCC Practices Awareness (Caretakers of children 0-59 months)							
Percentage who know at least **7** of 15 IYCF and MCC practices	13.6	10.0	18.1	1,825	69,576	2.0	2.7
Family Planning Awareness (Women 15-49)							
Percentage who are aware of where to go for family planning services	48.5	43.9	53.0	2,320	121,665	2.3	2.4
Antenatal Care (Mothers of children 0-23 months)							
Percentage attending 4 or more antenatal care visits with youngest child	49.2	45.5	53.0	944	36,945	1.9	1.2

[1] Critical moments for handwashing include 1) after defecation, 2) after cleaning a child, 3) before preparing food, 4) before feeding a child, and 5) before eating.
[2] Includes joint decision making.

Table A7.7. Title II Program-specific Indicators - Southern Karamoja
Indicators, 95% Confidence Intervals and Base Population [Uganda, 2013]

	Indicator Value	95% CI		Number of Records	Weighted Population	Standard Error	DEFT
		Lower	Upper				
Handwashing, Sanitation and Security (Household respondents)							
Percentage who know 3 of 5 critical moments for handwashing[1]	71.0	65.1	76.2	2,367	67,762	2.8	2.8
Percentage with access to a sanitation facility of any type	11.3	8.2	15.4	2,367	67,762	1.8	2.6
Percentage reporting increased movement in areas that were previously not accessible due to insecurity	71.4	67.3	75.0	2,367	67,762	1.9	2.0
Agricultural Practices (Farmers)							
Average number of crops produced - past 12 months	2.5	2.4	2.6	3,075	93,000	0.07	2.3
Percentage adopting farmer managed natural regeneration practices - past 12 months	15.9	12.5	20.0	3,061	93,000	1.9	2.6
Percentage using at least three productivity improving agricultural practices and/or technologies - past 12 months	19.0	13.7	25.7	3,080	93,000	3.0	3.9
Veterinary Care (Livestock owners)							
Percentage accessing government or private sector veterinary care - past 12 months	69.3	62.8	75.0	943	23,449	3.1	1.8
Health Care Seeking Decision-Making (Female caretakers of children 0-59 months - married or in a union)							
Percentage making decisions about health care for themselves[2]	74.1	69.7	78.0	1,581	46,863	2.1	1.8
Percentage making decisions about health care for children 0-59 months[2]	74.1	69.3	78.4	1,581	46,863	2.3	2.0
IYCF and MCC Practices Awareness (Caretakers of children 0-59 months)							
Percentage who know at least **7** of 15 IYCF and MCC practices	35.5	30.5	40.8	1,720	51,022	2.6	2.1
Family Planning Awareness (Women 15-49)							
Percentage who are aware of where to go for family planning services	35.5	31.5	39.7	2,211	84,530	2.1	1.9
Antenatal Care (Mothers of children 0-23 months)							
Percentage attending 4 or more antenatal care visits with youngest child	75.2	70.9	79.0	862	26,043	2.1	1.3

[1] Critical moments for handwashing include 1) after defecation, 2) after cleaning a child, 3) before preparing food, 4) before feeding a child, and 5) before eating.
[2] Includes joint decision making.

Table A7.8. Title II Program-specific Indicators - Program Comparisons
Indicators and P-values for Test of Differences [Uganda, 2013]

	Indicator Value		P-Value
	Northern Karamoja	Southern Karamoja	
Handwashing, Sanitation and Security (Household respondents)			
Percentage who know 3 of 5 critical moments for handwashing[1]	69.6	71.0	.73
Percentage with access to a sanitation facility of any type	40.5	11.3	.00**
Percentage reporting increased movement in areas that were previously not accessible due to insecurity	52.4	71.4	.00**
Agricultural Practices (Farmers)			
Average number of crops produced - past 12 months	2.6	2.5	.22
Percentage adopting farmer managed natural regeneration practices - past 12 months	16.4	15.9	.82
Percentage using at least three productivity improving agricultural practices and/or technologies - past 12 months	16.7	19.0	.55
Veterinary Care (Livestock owners)			
Percentage accessing government or private sector veterinary care - past 12 months	63.1	69.3	.28
Health Care Seeking Decision-Making (Female caretakers of children 0-59 months - married or in a union)			
Percentage making decisions about health care for themselves[2]	79.6	74.1	.04*
Percentage making decisions about health care for children 0-59 months[2]	79.9	74.1	.04*
IYCF and MCC Practices Awareness (Caretakers of children 0-59 months)			
Percentage who know at least **7** of 15 IYCF and MCC practices	13.6	35.5	.00**
Family Planning Awareness (Women 15-49)			
Percentage who are aware of where to go for family planning services	48.5	35.5	.00**
Antenatal Care (Mothers of children 0-23 months)			
Percentage attending 4 or more antenatal care visits with youngest child	49.2	75.2	.00**

[1] Critical moments for handwashing include 1) after defecation, 2) after cleaning a child, 3) before preparing food, 4) before feeding a child, and 5) before eating.

[2] Includes joint decision making.

Annex 8: WEAI

Annex 8
Women's Empowerment in Agriculture Index (WEAI)
Baseline Study of Title II Development Food Assistance Programs in Uganda, 2013

Overview

Women play a critical and potentially transformative role in agricultural growth in developing countries, but they face persistent obstacles and economic constraints limiting further inclusion in agriculture. The WEAI measures the empowerment, agency, and inclusion of women in the agriculture sector in an effort to identify ways to overcome those obstacles and constraints. The WEAI aims to increase understanding of the connections between women's empowerment, food security, and agricultural growth. This index measures the roles and extent of women's engagement in the agriculture sector in five domains: (1) decisions about agricultural production, (2) access to and decision-making power over productive resources, (3) control over use of income, (4) leadership in the community, and (5) time use. It also measures women's empowerment relative to men within their households.[1]

The WEAI was developed to track changes in women's empowerment levels that occur as a direct or indirect result of interventions under Feed The Future (FTF), the U.S. Government's global hunger and food security initiative. It was collaboratively developed by USAID, the International Food Policy Research Institute (IFPRI), and Oxford Poverty and Human Development Initiative (OPHI).

The WEAI is composed of two sub-indexes. The five domains of empowerment sub-index (5DE) assesses whether women are empowered across five domains. It consists of 10 indicators that range between the values of zero and one, with higher values representing greater empowerment. The gender parity sub-index (GPI) measures gender parity in empowerment within the household and also ranges between zero and one, with higher values representing greater gender parity. By definition, households without a primary adult male are excluded from this measure. The total WEAI score is computed as a weighted sum of the 5DE and the GPI. Based on both sub-indexes, the WEAI is thus an aggregate index that shows the degree to which women are empowered in their households and communities and the degree of inequality between women and men within the household.

WEAI results for the Title II program area in the Karamoja region of Uganda

In Uganda, the WEAI was administered to all eligible households in the villages sampled from the list of Title II beneficiary villages in the seven districts of Karamoja. The WEAI survey instrument consists of a series of six modules that are administered to both male and female primary decision makers in the household and is conducted only in households with either dual female and male adults or in households with a single female adult. After data cleaning, WEAI data were available for a total of 3,849 dual female and male adult households, and 742 single female adult households.

The WEAI results for the entire Title II program area in the Karamoja region are presented in Table 7A.1. The WEAI is computed as a weighted average of the 5DE index and the GPI index where the 5DE index has 90 percent of the weight and the GPI index has 10 percent of the weight.[2] The WEAI for the Title II districts in the Karamoja region of Uganda is 0.788. It is the weighted average of the 5DE sub-index value of 0.775 and the GPI sub-index value of 0.901.

The 5DE index is computed as: 1 – **Hn** x **Aa** where **Hn** is the disempowered headcount and **Aa** is the average inadequacy score**.** A woman is considered empowered in 5DE if she has adequate achievements in four of the five domains or has 80 percent total adequacy in some combination of the weighted indicators. For the women who are not yet empowered, the average adequacy score indicates the percentage of domains in which they meet the required threshold and thus experience adequacy.

The components of the 5DE as shown in Table 7A.1 indicate that 42.4 percent of women in the Karamoja region of Uganda are empowered (**He**), or conversely, 57.6 percent are disempowered **(Hn)**. Disempowered women have, on average, adequate achievements in 60.9 percent of the domains (1-**Aa**) and inadequacy achievements in

[1] International Food Policy Research Institute (IFPRI). (2012). *Woman's Empowerment in Agriculture Index Summary Brochure.*
[2] Alkire, S., Malapit, H., Meinzen-Dick, R., Peterman, A., Quisumbing, A., Seymour, G. and A. Vaz. 2013. "Instructional Guide on the Women's Empowerment in Agriculture Index," retrieved from: http://www.ifpri.org/book-9075/node/9077

39.1 percent of domains. Thus, the 5DE index for women is 1 minus 0.576 times 0.391, or 0.775. For men, 37.7 percent are disempowered, and the average inadequacy score among disempowered men is 36.7 percent, resulting in a 5DE index of 0.862.

The GPI is a relative equality measure that demonstrates the equality in 5DE profiles between the primary adult male and female in each household. For households that have not achieved gender parity, the GPI shows the gap that needs to be closed for women to reach the same level of empowerment as men. Households without a primary adult male are excluded from this measure, and thus the aggregate WEAI uses the mean GPI value of dual-adult households. The GPI is computed as: $\mathbf{1 - (H_{GPI} * I_{GPI})}$, where $\mathbf{H_{GPI}}$ is the percent of women with no gender parity and $\mathbf{I_{GPI}}$ is the average empowerment gap.

In the Karamoja region of Uganda, the GPI shows that 56 percent of women in dual-adult households have gender parity while 44 percent ($\mathbf{H_{GPI}}$) of women have an empowerment score lower than that of the primary male in their household. Of the 44 percent of women with no gender parity, the empowerment gap between the woman and the male in their household is 22.6 percent ($\mathbf{I_{GPI}}$). Thus, the overall GPI is: {1 - (.44 x .226)} or 0.901.

Table A7.1 Women's Empowerment in Agriculture Index (WEAI) – Karamoja region of Uganda (2013)

Indexes	Karamoja Region	
	Women	Men
Empowered Headcount (He)	42.4%	62.3%
Disempowered Headcount (Hn)	57.6%	37.7%
Average Adequacy Score (1-Aa)	60.9%	63.3%
Average Inadequacy Score (Aa)	39.1%	36.7%
5DE Index 1 – (Hn x Aa)	**0.775**	**0.862**
Number of observations	4,591	3,849
% of Data Used	62.7%	52.3%
% of women with no gender parity (H_{GPI})	44.0%	
Average Empowerment Gap (I_{GPI})	22.6%	
GPI 1 - (H_{GPI} x I_{GPI})	**0.901**	
WEAI (0.9 x 5DE) + (0.1 x GPI)	**0.788**	

Table A7.2 shows the contribution of each of the five dimensions and 10 indicators to women's and men's disempowerment while Figure A7.1 provides a graphic presentation of these results. The length of the bars represents the disempowerment index for women and men, respectively, while the composition of the bars represents the absolute contributions of each of the indicators to the disempowerment index. For women and men, control over the use of income, lack of access to or decision-making ability over credit and lack of group membership are the largest contributors to disempowerment; however, men report relatively less disempowerment in these areas compared to women. For women, work burden and lack of autonomy in production are also important contributors to disempowerment.

The WEAI results for the baseline study of the Title II development programs in the Karamoja region are very similar to the results of the pilot WEAI study conducted in Uganda in 2011. The pilot WEAI study surveyed 350 households in five spatially dispersed rural districts in the northern region (Amuru and Kole), central region (Luwero and Masaka), and eastern region (Iganga) in Uganda. For the pilot survey, the 5DE was 0.777 and the GPI was 0.898, resulting in a WEAI of 0.789.[3]

[3] Alkire, S., Meinzen-Dick, R., Peterman, A., Quisumbing, A. R., Seymour, G., & Vaz, A. (2012). *The Women's Empowerment in Agriculture Index.* IFPRI Discussion Paper No. 01240. Poverty, Health & Nutrition Division, International Food Policy Research Institute.

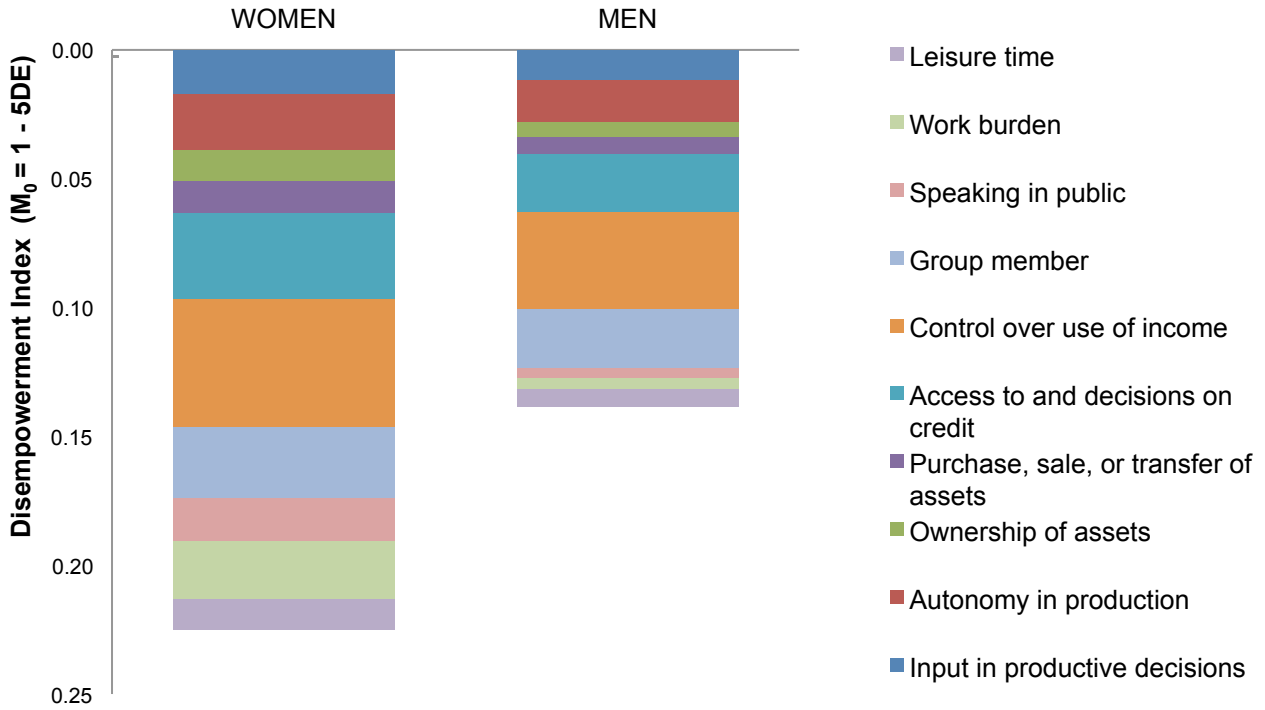
Annex 8
Women's Empowerment in Agriculture Index (WEAI)
Baseline Study of Title II Development Food Assistance Programs in Uganda, 2013

Table A7.2 Uganda Karamoja region - 5DE decomposed by dimension and indicator

Statistics	Production		Resources			Income	Leadership		Time	
	Input in productive decisions	Autonomy in production	Ownership of assets	Purchase, sale, or transfer of assets	Access to and decisions on credit	Control over use of income	Group member	Speaking in public	Work burden	Leisure time
Indicator weight	0.1	0.1	0.0667	0.0667	0.0667	0.2	0.1	0.1	0.1	0.1
WOMEN										
Censored headcount	0.171	0.217	0.179	0.187	0.501	0.249	0.275	0.164	0.227	0.119
% Contribution	7.6%	9.7%	5.3%	5.5%	14.8%	22.2%	12.2%	7.3%	10.1%	5.3%
Contribution	0.017	0.022	0.012	0.012	0.033	0.050	0.027	0.016	0.023	0.012
% Contr. by dimension	17.3%		25.7%			22.2%	19.5%		15.4%	
MEN										
Censored headcount	0.118	0.163	0.089	0.099	0.337	0.188	0.228	0.037	0.043	0.070
% Contribution	8.5%	11.8%	4.3%	4.8%	16.2%	27.2%	16.5%	2.7%	3.1%	5.0%
Contribution	0.012	0.016	0.006	0.007	0.022	0.038	0.023	0.004	0.004	0.007
% Contr. by dimension	20.3%		25.3%			27.2%	19.1%		8.1%	

Note: the highlighted rows represent the absolute contribution of each indicator to disempowerment and are used to create the graphic below.

Figure A7.1
Contribution of each indicator to disempowerment in the Karamoja region of Uganda



Annex 8
Women's Empowerment in Agriculture Index (WEAI)
Baseline Study of Title II Development Food Assistance Programs in Uganda, 2013

WEAI results for the northern and southern Karamoja Title II program areas separately

The WEAI results for each of the Title II program areas in northern and southern Karamoja are provided in Table A7.3. The WEAI for the northern Karamoja program area is 0.774 and for the southern Karamoja program area is 0.806. These results indicate that women's empowerment are relatively similar in both program areas. Further examination of the composition of the 5DE index confirms that the contributions of each of the 10 indicators to disempowerment for men and women are similar in both program areas and follow the same distributions as those for the overall WEAI.

Table A7.3 Women's Empowerment in Agriculture Index (WEAI) by Program Area – Karamoja region of Uganda (2013)

Indexes	Northern Karamoja		Southern Karamoja	
	Women	Men	Women	Men
Empowered Headcount (He)	42.4%	60.0%	45.2%	65.3%
Disempowered Headcount (Hn)	59.7%	40.0%	54.8%	34.7%
Average Adequacy Score (1-Aa)	60.9%	63.2%	62.2%	63.3%
Average Inadequacy Score (Aa)	40.0%	36.8%	37.8%	36.7%
5DE Index 1 – (Hn x Aa)	**0.761**	**0.853**	**0.793**	**0.873**
Number of observations	2,332	1,971	2,259	1,878
% of Data Used	62.0%	51.6%	63.4%	53.0%
% of women with no gender parity (H_{GPI})	47.0%		40.2%	
Average Empowerment Gap (I_{GPI})	24.0%		20.5%	
GPI 1 - (H_{GPI} x I_{GPI})	**0.887**		**0.918**	
WEAI (0.9 x 5DE) + (0.1 x GPI)	**0.774**		**0.806**	

Limitations of Data Collection

The data collection for the WEAI was conducted in conjunction with the household survey. The interview was typically conducted with the self-identified male and female head of each household; however, there were households where more than one woman was eligible to be interviewed due to polygamous marriages, which were fairly common. In these cases, the woman randomly selected for the household survey was also interviewed for the WEAI. This presents some difficulties with the interpretation of the data since the shared relationships between the women in these households may impact each woman's level of empowerment.

A second limitation of the WEAI data was the number of interviews with missing responses. As noted in Tables A7.1 and A7.3, about 50 to 60 percent of the responding households were used to calculate the WEAI. If there was any systematic reason for the nonresponse, this may have created a bias in the reported results.

Annex 9: Multivariate Model Results

Table A9.1. Multiple Logistic Regression Models of Moderate or Severe Household Hunger

Dependent: Moderate or Severe Household Hunger	Total (Pseudo R^2 = .07)		Northern Karamoja (Pseudo R^2 = .07)		Southern Karamoja (R^2 = .12)	
Independent Variables	Odds ratio (95% CI)	p-value	Odds ratio (95% CI)	p-value	Odds ratio (95% CI)	p-value
Household Composition						
Number of prime-aged adults (15-49)	0.98 (0.91 - 1.06)	*0.63*	1.01 (0.91 - 1.12)	*0.81*	0.93 (0.83 - 1.04)	*0.21*
Number of elder dependents (50 or older)	1.43 (1.08 - 1.88)	*0.01**	1.08 (0.73 - 1.60)	*0.70*	1.70 (1.17 - 2.46)	*0.01***
Number of young dependents (0-14)	1.04 (0.99 - 1.09)	*0.13*	1.02 (0.95 - 1.10)	*0.53*	1.06 (1.00 - 1.13)	*0.07*
Age of head of HH	0.99 (0.98 - 1.00)	*0.02**	0.99 (0.97 - 1.01)	*0.19*	0.98 (0.97 - 1.00)	*0.02**
Sex of head of HH (Female)	0.80 (0.60 - 1.06)	*0.12*	0.72 (0.54 - 0.96)	*0.03**	1.02 (0.64 - 1.62)	*0.93*
Education level of head of HH (Primary vs. None)	1.00 (0.78 - 1.27)	*0.98*	0.99 (0.70 - 1.41)	*0.96*	1.07 (0.75 - 1.52)	*0.72*
Education level of head of HH (Secondary vs. None)	0.64 (0.41 - 1.02)	*0.06*	0.69 (0.38 - 1.24)	*0.21*	0.44 (0.24 - 0.82)	*0.01**
Education level of head of HH (Higher vs. None)	0.80 (0.39 - 1.63)	*0.54*	1.06 (0.34 - 3.34)	*0.91*	0.48 (0.23 - 0.99)	*0.05**
Household Consumption						
Living below the poverty line	0.93 (0.65 - 1.31)	*0.66*	1.03 (0.72 - 1.48)	*0.88*	0.73 (0.39 - 1.38)	*0.34*
Daily per capita food consumption (log)	1.28 (0.97 - 1.68)	*0.08*	1.73 (1.16 - 2.59)	*0.01***	0.88 (0.61 - 1.27)	*0.49*
Household Agricultural Status						
Raised crops in the last 12 months	1.85 (1.41 - 2.42)	*0.00***	1.05 (0.71 - 1.55)	*0.80*	3.45 (2.34 - 5.09)	*0.00***
Number of farmers in the household	0.76 (0.61 - 0.95)	*0.02**	0.74 (0.55 - 1.01)	*0.06*	0.86 (0.64 - 1.17)	*0.34*
Used at least 2 sustainable livestock practices	1.18 (0.84 - 1.67)	*0.34*	1.38 (0.75 - 2.54)	*0.30*	0.99 (0.69 - 1.43)	*0.96*
Used at least 2 sustainable crop practices	0.70 (0.53 - 0.93)	*0.01**	0.68 (0.43 - 1.08)	*0.10*	0.66 (0.47 - 0.93)	*0.02**
Used at least one sustainable NRM practice	0.80 (0.54 - 1.17)	*0.24*	0.79 (0.46 - 1.35)	*0.39*	0.84 (0.46 - 1.53)	*0.58*
Practiced value chain activities	0.87 (0.63 - 1.21)	*0.41*	1.38 (0.92 - 2.05)	*0.12*	0.54 (0.37 - 0.79)	*0.00***
Using improved storage practices	0.76 (0.54 - 1.07)	*0.12*	0.80 (0.45 - 1.4)	*0.43*	0.65 (0.44 - 0.95)	*0.03**
District [1]						
District: Kotido	2.24 (1.53 - 3.29)	*0.00***	2.51 (1.71 - 3.68)	*0.00***	*N/A*	-
District: Abim	3.51 (1.68 - 7.33)	*0.00***	3.18 (1.33 - 7.6)	*0.01**	*N/A*	-
District: Moroto	2.58 (1.07 - 6.22)	*0.04**	*N/A*	-	2.12 (0.79 - 5.7)	*0.13*
District: Napak	1.36 (0.92 - 2.01)	*0.12*	*N/A*	-	*N/A*	-
District: Nakapiripirit	1.19 (0.82 - 1.73)	*0.35*	*N/A*	-	0.88 (0.61 - 1.23)	*0.49*
District: Amudat	0.55 (0.31 - 0.96)	*0.04**	*N/A*	-	0.56 (0.32 - 0.96)	*0.05**
(Constant)	1.77 (0.69 - 4.55)	*0.23*	0.89 (0.24 - 3.30)	*0.86*	5.93 (1.56 - 22.6)	*0.01**
Number of households in final model	4,603		2,325		2,278	

[1] The reference district is Kaabong for the total sample and the Northern Karamoja models, and Napak for the Southern Karamoja model.

* p <.05

** p <.01

Table A9.2.. Multiple Logistic Regression Model of Moderate or Severe Household Hunger for Southern Karamoja, including interaction terms

Dependent: Moderate or Severe Household Hunger	Southern Karamoja (R^2 = .12)	
Independent Variables	Odds ratio (95% CI)	p-value
Household Composition		
Number of prime-aged adults (15-49)	0.94 (0.84 - 1.05)	*0.24*
Number of elder dependents (50 or older)	1.71 (1.18 - 2.46)	*0.00***
Number of young dependents (0-14)	1.06 (1.00 - 1.12)	*0.07*
Age of head of HH	0.98 (0.97 - 1.00)	*0.01**
Sex of head of HH (Female)	1.02 (0.65 - 1.62)	*0.92*
Education level of head of HH (Primary vs. None)	1.04 (0.72 - 1.50)	*0.85*
Education level of head of HH (Secondary vs. None)	0.39 (0.22 - 0.69)	*0.00***
Education level of head of HH (Higher vs. None)	0.47 (0.22 - 0.98)	*0.05**
Household Consumption		
Living below the poverty line	0.69 (0.37 - 1.30)	*0.25*
Daily per capita food consumption (log)	0.89 (0.62 - 1.29)	*0.54*
Household Agricultural Status		
Raised crops in the last 12 months	4.01 (2.45 - 6.58)	*0.00***
Number of farmers in the household	0.72 (0.48 - 1.10)	*0.13*
Used at least 2 sustainable livestock practices	1.81 (0.70 - 4.66)	*0.22*
Used at least 2 sustainable crop practices	0.65 (0.46 - 0.93)	*0.02**
Used at least one sustainable NRM practice	0.21 (0.03 - 1.48)	*0.12*
Practiced value chain activities	2.17 (1.01 - 4.66)	*0.05**
Using improved storage practices	1.55 (0.51 - 4.65)	*0.43*
Agricultural Interaction Terms[1]		
Raised crops*Number of farmers	1.22 (0.78 - 1.93)	*0.38*
Raised crops*Sustainable livestock	0.52 (0.16 - 1.68)	*0.27*
Raised crops*Sustainable NRM	4.64 (0.62 - 34.7)	*0.13*
Raised crops*Value chain	0.22 (0.10 - 0.47)	*0.00***
Raised crops*Improved storage	0.39 (0.13 - 1.17)	*0.09*
District [2]		
District: Moroto	2.3 (0.83 - 6.13)	*0.11*
District: Nakapiripirit	0.91 (0.62 - 1.32)	*0.63*
District: Amudat	0.56 (0.32 - 0.97)	*0.05**
(Constant)	5.56 (1.30 - 23.7)	*0.02**
Number of households in final model	2,278	

[1] The "Raised crops*Sustainable crop practices" interaction term is ommitted because of collinearity

[2] The reference district is Napak

* p <.05

** p <.01

Table A9.3.. Multiple Regression Models of Height for Age Z-score of Children under 5 Years of Age

Dependent: Height for Age Z-score	Total (R^2 = .05)		Northern Karamoja (R^2 = .06)		Southern Karamoja (R^2 = .05)	
Independent Variables	β	p-value	β	p-value	β	p-value
Child Characteristics						
Sex (Female)	0.18	*0.24*	0.06	*0.78*	0.38	*0.02**
Age in months	-0.01	*0.13*	-0.02	*0.09*	-0.01	*0.50*
Age in months squared	0.00	*0.79*	0.00	*0.36*	0.00	*0.28*
Sex*age interaction	0.00	*0.53*	0.00	*0.18*	0.00	*0.76*
Child had diarrhea in the last 2 weeks	-0.26	*0.02**	-0.27	*0.07*	-0.31	*0.02**
Household Composition						
Number of prime-aged adults (15-49)	0.01	*0.83*	-0.03	*0.40*	0.09	*0.03**
Number of elder dependents (50 or older)	0.17	*0.34*	0.21	*0.37*	0.09	*0.54*
Number of young dependents (5-14)	0.04	*0.31*	0.10	*0.05**	-0.05	*0.13*
Number of children (0-4)	0.04	*0.46*	0.02	*0.70*	0.04	*0.52*
Age of head of HH	-0.01	*0.25*	-0.02	*0.22*	0.00	*0.81*
Sex of head of HH (Female)	-0.24	*0.20*	-0.40	*0.13*	0.01	*0.93*
Education level of primary caretaker (Primary vs. None)	-0.39	*0.06*	-0.47	*0.07*	0.00	*1.00*
Education level of primary caretaker (Secondary vs. None)	0.30	*0.07*	0.29	*0.14*	-0.11	*0.66*
Education level of primary caretaker (Higher vs. None)	0.56	*0.00***	0.60	*0.00***	0.98	*0.10*
Household Socioeconomic Status						
Moderate or Severe Hunger	-0.17	*0.14*	-0.24	*0.09*	-0.06	*0.67*
Living below the poverty line	-0.25	*0.16*	-0.37	*0.09*	0.07	*0.68*
Daily per capita food consumption (log)	-0.05	*0.43*	0.02	*0.87*	-0.20	*0.03**
Household Water and Sanitation						
Improved source of drinking water	-0.08	*0.30*	0.03	*0.73*	-0.20	*0.08*
Water treatment prior to drinking	0.15	*0.22*	0.22	*0.20*	0.08	*0.49*
Improved, not shared sanitation facility	0.16	*0.20*	0.23	*0.13*	-0.05	*0.85*
Cleansing agent and water available at handwashing station	0.43	*0.08*	0.47	*0.06*	0.10	*0.74*
Household Agricultural Status						
Raised crops in the last 12 months	-0.09	*0.52*	0.02	*0.90*	-0.27	*0.03**
Used at least two sustainable crop practices (past 12 months)	0.01	*0.94*	-0.09	*0.55*	0.29	*0.10*
Used at least two sustainable livestock practices (past 12 months)	0.09	*0.46*	0.08	*0.61*	0.04	*0.80*
Used at least one sustainable NRM practice (past 12 months)	0.32	*0.02**	0.57	*0.00***	-0.05	*0.76*
Practiced the value chain activities	0.01	*0.96*	-0.06	*0.60*	0.08	*0.52*
Used improved storage practices (past 12 months)	0.00	*0.98*	0.03	*0.77*	-0.10	*0.43*
Number of farmers in the household	-0.13	*0.20*	-0.20	*0.14*	-0.01	*0.94*
District [1]						
District: Kotido	0.07	*0.64*	0.11	*0.47*	*N/A*	-
District: Abim	0.36	*0.05**	0.42	*0.03**	*N/A*	-
District: Moroto	-0.18	*0.12*	*N/A*	-	*0.13*	*0.28*
District: Napak	-0.31	*0.00***	*N/A*	-	*N/A*	-
District: Nakapiripirit	0.00	*0.98*	*N/A*	-	0.30	*0.00***
District: Amudat	0.28	*0.40*	*N/A*	-	0.50	*0.09*
(Constant)	-0.1	*0.84*	0.04	*0.95*	-0.76	*0.10*
Number of children (0-59 months) in final model	4,749		2,524		2,225	

[1] The reference district is Kaabong for the total sample and the Northern Karamoja models, and Napak for the Southern Karamoja model.

* p <.05

** p <.01

Annex 10: Bivariate Analysis Results

Table A10.1. Household dietary diversity
Food groups consumed by household by PVO [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Cereals	75.8	71.9	80.8
Root and tubers	25.4	24.3	26.8
Vegetables	32.9	28.6	38.3
Fruits	9.5	9.4	9.6
Meat, poultry, organ meat	11.8	9.5	14.8
Eggs	3.9	2.6	5.5
Fish and seafood	8.4	7.6	9.4
Pulses/legumes/nuts	34.0	33.4	34.9
Milk and milk products	12.2	7.6	17.9
Oil/fats	11.2	11.0	11.4
Sugar/honey	7.0	5.7	8.6
Miscellaneous (tea, coffee, condiments, etc.)	8.1	4.8	12.3
Number of households	4,133	2,078	2,055

Note: Only includes households that reported that yesterday was not an unusual or special day.

Table A10.2. Household sanitation and drinking water

Sanitation facility, source drinking water and treatment for drinking water by PVO [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Improved, not shared sanitation facility			
Flush to piped sewer system	0.0	0.0	0.0
Flush to septic tank	0.1	0.0	0.1
Flush to pit latrine	0.0	0.0	0.0
Ventilated improved latrine	4.5	5.9	2.6
Pit latrine with slab	4.2	6.7	1.0
Ecosan latrine	0.1	0.1	0.2
Improved, shared sanitation facility			
Flush to piped sewer system	0.0	0.0	0.0
Flush to septic tank	0.2	0.3	0.0
Flush to pit latrine	0.1	0.0	0.3
Ventilated improved latrine	2.6	2.9	2.2
Pit latrine with slab	3.7	4.9	2.1
Ecosan latrine	0.1	0.1	0.1
Non-improved sanitation facility			
Flush to somewhere else	0.0	0.0	0.1
Flush, don't know where	0.0	0.1	0.0
Pit latrine without slab/Open pit	11.8	19.0	2.5
Bucket toilet	0.0	0.0	0.0
Hanging toilet/hanging latrine	0.3	0.5	0.1
Designated area not already listed	0.8	1.4	0.0
Dig and bury	1.8	2.6	0.7
No facility	69.4	55.1	87.9
Other	0.3	0.4	0.1
Improved source of drinking water			
Piped water into dwelling	0.5	0.6	0.4
Piped water into yard/plot	0.2	0.3	0.2
Public tap/Standpipe	2.4	2.0	3.0
Tube well or borehole	85.5	87.8	82.4
Protected well	1.2	1.7	0.5
Protected spring	0.4	0.6	0.2
Rainwater	0.1	0.1	0.2
Non-improved source of drinking water			
Surface water (river/dam/ lake/ponds /stream/canal/irrigation channel)	3.7	2.4	5.4
Unprotected spring	2.0	2.1	1.9
Unprotected well	2.5	0.6	5.0
Tanker truck	0.0	0.0	0.0
Cart with small tank	0.5	0.5	0.4
Rock catchments	0.9	1.3	0.3
Bottled water	0.0	0.0	0.0
Other	0.0	0.0	0.0
DK/NR/Missing	0.1	0.0	0.1
Water treatment prior to drinking			
Boil	7.0	6.3	7.9
Bleach/chlorine added	1.6	2.1	0.9
Strain through a cloth	1.1	0.8	1.4
Water filter (ceramic, sand, composite, etc.)	0.9	1.1	0.7
Solar disinfection	0.1	0.0	0.2
Let it stand and settle	15.3	15.9	14.5
Moringa olifera seeds	0.3	0.5	0.1
Other	0.2	0.3	0.1
No treatment	77.2	76.3	78.3
DK/NR/Missing	0.2	0.2	0.1
Number of households	4,766	2,399	2,367

Note: Sanitation includes daytime sanitation facility.

Table A10.3. Crops Planted

Percentage of farmers planting crops by PVO [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Sorghum	8.3	8.6	7.8
Red Sorghum	65.0	61.4	69.5
White Sorghum	24.5	25.6	23.2
Maize	44.4	39.3	50.8
Rice	0.3	0.3	0.2
Beans	26.5	29.2	23.1
Cowpeas	9.7	10.5	8.7
Pigeon Peas	1.7	3.1	0.1
Green orums/muno beans	10.0	3.3	18.5
Sim sim	10.5	14.0	6.1
Millet	12.8	22.0	1.1
Sunflower	15.1	8.2	23.8
Groundnuts	16.9	20.9	11.2
Other crops	9.8	13.1	5.7
Number of farmers	5,770	2,717	3,053

Notes: Multiple responses allowed so totals may be greater than 100 percent.

Table A10.4. Value chain activities

Percentage of farmers by value chain activities by PVO [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Purchase inputs	45.7	44.4	47.4
Tillage of land	49.1	56.3	40.0
Bulk transporting of inputs, produce, or animals	5.0	3.8	6.5
Sorting produce	36.1	38.0	33.6
Grading produce	10.6	12.8	7.9
Drying or processing produce	24.4	23.4	25.6
Trading or marketing (wholesale, retail, or export)	0.9	0.9	0.8
Other activities	4.6	4.6	4.6
No activities	16.3	15.1	17.9
Number of farmers	5,784	2,721	3,063

Notes: Multiple responses allowed so totals may be greater than 100 percent.

Table A10.5. Sustainable agricultural practices

Percentage of farmers by sustainable agricultural practice by PVO [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Crops			
Soil preparation by hand	82.9	81.5	84.7
Soil preparation with ox plow	22.7	22.4	23.1
Soil preparation with tractor	5.2	4.7	5.8
Broadcasting seed	61.7	60.0	64.0
Planting seeds in rows	16.1	16.8	15.2
Crop rotation	9.9	14.6	4.0
Applying fertilizer	1.8	2.7	0.7
Intercropping	20.1	22.1	17.5
Other crop-related activities	1.4	1.8	0.9
No crop-related activities	0.3	0.5	0.0
Did not raise any of the target crops	10.5	11.0	10.0
Livestock			
Animal shelters	12.4	10.8	14.4
Kraals	12.0	10.6	13.6
Vaccinations	10.5	8.5	12.9
Deworming	9.6	7.4	12.4
Homemade animal feeds made of locally available products	2.6	2.8	2.4
Use the services of community animal health workers	2.3	1.6	3.2
Purchased drugs/medicines to give to animals	2.9	1.5	4.6
No livestock-related activities	1.5	2.4	0.2
Did not raise any goats or cattle	76.6	76.3	77.0
Natural Resource Management			
Management of watershed or reforestation	9.9	10.7	8.9
Agro-forestry or cultivation of fruit trees	7.0	7.1	6.9
Management of forest plantation	5.9	5.3	6.7
Management of natural regeneration	5.4	3.6	7.7
Collecting products from forest plants (such as gum arabic)	3.4	3.0	3.8
Soil conservation on hillsides	3.7	4.1	3.2
Construction of water catchments	3.0	3.5	2.4
No NRM-related activities	74.9	74.2	75.9
Number of farmers	5,834	2,754	3,080

Notes: Multiple responses allowed so totals may be greater than 100 percent.

Table A10.6. Storage practices

Percentage of farmers by storage practice by PVO [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Sorghum			
Cereal bank	1.8	2.0	1.5
Granary	46.6	45.1	48.6
Other method	5.9	5.7	6.2
Did not store sorghum	45.7	47.3	43.7
Number of farmers who cultivated or stored sorghum	4,677	2,370	2,307
Maize			
Silo	1.6	2.5	0.6
Granary	32.8	26.2	39.4
Other method	7.6	8.5	6.7
Did not store maize	58.0	62.8	53.3
Number of farmers who cultivated or stored maize	3,122	1,402	1,720
Legumes			
Silo	3.6	5.9	1.3
Granary	41.3	41.6	41.0
Other method	17.9	20.9	15.0
Did not store legumes	37.0	31.3	42.6
Number of farmers who cultivated or stored legumes	1,831	667	1,164
Rice			
Silo	6.5	-	-
Granary	27.4	-	-
Other method	25.2	-	-
Did not store rice	40.9	-	-
Number of farmers who cultivated or stored rice	34	19	15

Note: Denominator for each crop is those farmers who cultivated or stored that crop within the last 12 months.
Insufficient sample size for rice storage by PVO (N < 30).

Table A10.7. Women's dietary diversity
Food groups consumed by women 15-49 by PVO [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Grains, roots and tubers	89.7	88.5	91.2
Legumes and nuts	26.9	25.6	28.8
Dairy products (milk, yogurt, cheese)	8.2	4.1	13.9
Organ meat	4.9	4.0	6.1
Eggs	3.1	1.4	5.5
Flesh foods and other misc. small animal protein	14.2	10.3	19.7
Vitamin A dark green leafy vegetables	52.1	44.1	63.3
Other Vitamin A rich vegetables and fruits	21.4	20.4	22.8
Other fruits and vegetables	13.6	14.5	12.5
Number of women	4,452	2,246	2,206

Table A10.8. Women's nutritional status
Women below 145 cm, mean BMI and BMI levels by PVO [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Percent less than 145 cm	1.6	0.7	2.8
Mean Body Mass Index (BMI)	20.3	20.4	20.2
Normal			
18.5-24.9 (total normal)	71.5	73.9	68.3
Underweight			
<18.5 (total underweight)	23.4	20.9	26.8
17.0-18.4 (mildly underweight)	16.3	14.7	18.4
<17 (moderately and severely underweight)	7.2	6.2	8.4
Overweight/obese			
≥25 (total overweight or obese)	5.1	5.2	4.9
25.0-29.9 (overweight)	4.0	4.1	3.7
≥30.0 (obese)	1.1	1.1	1.2
Number of women	3,554	1,776	1,778

Note: Does not include pregnant or post-partum women

Table A10.9. Stunting by age

Prevalence of stunted and underweight children by age by PVO [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Prevalence of stunted children			
<6	27.2	29.4	24.1
6-8	22.4	25.1	18.6
9-11	32.9	31.6	35.1
12-17	32.3	33.1	31.3
18-23	43.5	37.7	52.9
24-35	43.1	40.9	46.2
36-47	31.5	30.3	33.2
48-59	32.5	22.5	46.1
Number of children	5,335	2,747	2,588
Prevalence of underweight children			
<6	19.0	21.8	15.2
6-8	20.0	25.6	12.2
9-11	21.8	19.9	24.9
12-17	26.4	26.4	26.4
18-23	27.2	27.7	26.5
24-35	24.5	24.9	24.1
36-47	17.4	16.3	19.1
48-59	15.5	15.6	15.2
Number of children	5,335	2,747	2,588

Table A10.10. Components of minimum acceptable diet
Components of MAD indicator for children 6-23 months by PVO [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Breastfed children 6-8 months			
Percent with minimum meal frequency (2 or more)	39.3	32.0	48.5
Percent with minimum dietary diversity (4 or more)	6.0	3.7	8.7
Grains, roots, and tubers	56.4	59.5	52.5
Legumes and nuts	7.2	5.4	9.4
Dairy products (milk, yogurt, cheese)	28.5	20.6	38.4
Flesh foods (meat, fish, poultry, and liver/organ meats)	3.7	2.0	5.8
Eggs	4.1	1.1	7.9
Vitamin A-rich fruits and vegetables	25.5	17.8	35.0
Other fruits and vegetables	6.3	4.5	8.6
Number of children	323	153	170
Breastfed children 9-23 months			
Percent with minimum meal frequency (3 or more)	22.4	22.1	22.9
Percent with minimum dietary diversity (4 or more)	8.3	5.6	11.9
Grains, roots, and tubers	70.8	73.2	67.7
Legumes and nuts	16.1	15.8	16.5
Dairy products (milk, yogurt, cheese)	33.2	24.6	44.2
Flesh foods (meat, fish, poultry, and liver/organ meats)	7.3	4.8	10.4
Eggs	3.8	1.4	6.8
Vitamin A-rich fruits and vegetables	40.7	35.9	46.9
Other fruits and vegetables	7.2	7.5	7.0
Number of children	1,115	555	560
Non-breastfed children 6-23 months			
Percent with minimum meal frequency (4 or more+2 milk)	3.4	2.4	5.0
Percent with minimum dietary diversity (4 or more)	5.5	2.0	11.3
Grains, roots, and tubers	74.1	71.4	78.7
Legumes and nuts	19.1	18.5	20.2
Dairy products (milk, yogurt, cheese)	31.0	23.0	44.9
Flesh foods (meat, fish, poultry, and liver/organ meats)	6.9	4.9	10.4
Eggs	4.2	2.2	7.5
Vitamin A-rich fruits and vegetables	38.0	31.5	49.3
Other fruits and vegetables	7.0	4.3	11.7
Number of children	191	97	94

Table A10.11. Breastfeeding status

Breastfeeding status for children 0-23 months by age by PVO [Uganda, 2013]

	Total	Northern Karamoja	Southern Karamoja
Not breastfeeding			
<2	1.4	1.1	2.0
2-3	1.6	0.7	2.8
4-5	7.5	11.3	3.3
6-8	2.1	1.8	2.5
9-11	6.1	7.8	3.3
12-17	7.9	9.7	5.8
18-23	21.8	23.3	19.5
Exclusively breastfed			
<2	83.7	84.7	81.7
2-3	69.4	69.2	69.6
4-5	38.6	35.3	42.2
6-8	18.7	21.9	14.4
9-11	7.9	4.7	13.2
12-17	9.8	7.6	12.3
18-23	4.9	4.7	5.2
Breastfed and plain water only			
<2	1.9	0.6	4.6
2-3	7.1	6.1	8.6
4-5	14.1	14.4	13.9
6-8	8.7	8.8	8.5
9-11	7.9	8.3	7.3
12-17	3.7	3.9	3.6
18-23	4.1	5.0	2.8
Breastfed and non-milk liquids			
<2	1.5	1.7	1.2
2-3	6.3	7.6	4.7
4-5	13.1	19.0	6.6
6-8	12.1	13.1	10.6
9-11	6.4	4.9	8.8
12-17	7.0	8.2	5.7
18-23	5.7	7.4	3.1
Breastfed and other milk			
<2	4.8	3.0	8.3
2-3	5.1	2.9	8.0
4-5	11.9	8.1	16.2
6-8	7.5	4.8	11.1
9-11	9.4	10.7	7.2
12-17	7.1	5.0	9.4
18-23	2.5	0.8	4.8
Breastfed and complementary foods			
<2	6.7	9.0	2.2
2-3	10.5	13.6	6.4
4-5	14.8	12.1	17.8
6-8	50.9	49.5	52.8
9-11	62.3	63.6	60.2
12-17	64.5	65.5	63.3
18-23	61.1	58.7	64.5
Number of children	2,265	1,153	1,112

Annex 11: Title II Baseline Study Scope of Work

Scope of Work for Baseline Study:

Title II Development Food Aid Programs in Guatemala, Niger, and Uganda

I. Introduction

A. Overview

In FY 2012, USAID's Office of Food for Peace (USAID/FFP) will enter into new awards for Title II development food aid programs in Guatemala, Niger, and Uganda. Subject to the availability of funds and commodities, USAID/FFP anticipates the following funding levels:

- Guatemala – up to two awards for a total of approximately $15 million annually for up to six years;
- Niger – up to three awards for a total of approximately $20 million annually for up to five years; and
- Uganda – up to two awards for a total of approximately $15-20 million annually for up to five years.

USAID/FFP is currently reviewing applications from private voluntary organizations and cooperatives submitted in response to a Request for Applications (RFA) for Title II Development Food Aid Programs.[1] The RFA provided information on funding opportunities for multi-year, development food aid programs that are integrated with USAID strategies to address the underlying causes of chronic food insecurity. USAID/FFP's goal for multi-year development programming is to reduce risks and vulnerabilities to food insecurity and increase food availability, access, and utilization/consumption. USAID/FFP anticipates issuing awards for programs in Guatemala by July 1, 2012, and in Niger and Uganda by August 1, 2012.

Through this solicitation, USAID/FFP seeks a survey firm (referred to in this document as "the Contractor") to conduct a baseline study to determine conditions in the three countries prior to the start of new Title II programs. USAID/FFP requires a quantitative population-based household study focused on the collection of required impact and outcome indicators for Title II programs' intervention areas. The study should also include a qualitative component that will add depth, richness, and context and serve to triangulate information from quantitative findings.

Given that each country has a different agricultural calendar, the baseline study for the three countries will be conducted at different times of the year. The Contractor should strive to conduct baseline surveys during the first year of the program cycle, prior to the start of program implementation, and, when possible, during each country's hunger season. Table 1 provides general dates for the most important hunger season in each of the three countries and the anticipated dates for baseline data

[1] The FY 2012 RFA for Title II Development Food Aid Programs can be found at http://www.usaid.gov/our_work/humanitarian_assistance/ffp/progpolicy.html.

collection. The Contractor should confirm with USAID/FFP and the respective USAID Mission when data collection will take place.

Table 1. Guatemala, Niger, and Uganda Hunger Seasons and Anticipated Baseline Data Collection[2]

COUNTRY	PEAK HUNGER SEASON	ANTICIPATED BASELINE DATA COLLECTION
Guatemala	March through August	September 2012
Niger	July through October	November – December 2012
Uganda	April through August	December 2012 – January 2013

B. Objective of Baseline Study

The purpose of the baseline study is to assess the current status of key indicators, have a better understanding of prevailing conditions and perceptions of the programs' populations in the implementation areas, and serve as a point of comparison for future final evaluations. Results will also be used to further refine program targeting and, where possible, to understand the relationship between variables to inform program design. The baseline study is designed as the first step in a two-part evaluation, with the final evaluation as the second step. In order to be comparable, both will be conducted at the same time of the year in each country. The baseline studies will be conducted in 2012 and early 2013, while USAID/FFP expects to conduct final evaluations as close as possible to the end of the program four or five years later, depending on the country.

The specific objectives of the baseline are the following:

- Determine the baseline values of key impact and outcome level indicators, including cross-cutting themes, disaggregated by implementing partner, age, and gender as appropriate;
- Collect data, including demographics in target areas and appropriate independent variables, comparable to what will be collected during the final evaluation to determine the level of change on impact and outcome indicators between baseline and final evaluation;
- Conduct bivariate analysis of impact and outcome indicators with independent variables identified for inclusion in survey as appropriate, with results provided by implementing partner;
- Help establish end-of-project targets for impact and outcome indicators;
- Identify appropriate conditions for criteria-based targeting to inform and refine program design;
- Perform multivariate analysis to deepen implementing partners' understanding of the causes of food insecurity and malnutrition and inform program design; and
- Collect and analyze qualitative data through the use of focus groups, key informant interviews, and observation to triangulate with quantitative data and shed light on potential causes of food insecurity and malnutrition to inform program design.

[2] The FEWSNET Seasonal Calendar for Food Security and Assistance Planning for peak hunger season provides estimates in each country of study: http://www.fews.net/docs/Publications/Food%20Sec%20%20Assist%20Calendar%2011-17-08.pdf.

While the baseline study will be externally designed, led, and reported on by the Contractor, staff from USAID/FFP and the USAID Missions of Guatemala, Niger, and Uganda will provide input and be involved during all the stages of the study. Title II awardees will also be involved throughout the process to maximize learning opportunities for staff and better acquaint them with the target areas and potential issues or challenges that may arise during the program. The Contractor will consult with Title II awardees to understand their program description and theory of change, obtain context information to properly develop a sampling frame for the household survey, and prepare the quantitative survey instrument to collect data on the set of USAID/FFP Standard Indicators (see Section III) and a limited number of USAID Mission and Title II awardee-specific indicators.

II. Program Background

A. USAID/FFP Strategy and Results Framework

In 2005, USAID/FFP adopted a new strategy to address the problem of food insecurity in accordance with the Title II program's authorizing legislation. The USAID/FFP Strategic Plan for 2006-2010 establishes a single Strategic Objective (SO)—*Food insecurity in vulnerable populations reduced*—for USAID/FFP[3]. With this strategy, USAID/FFP focuses Title II resources on reducing risk and vulnerability. USAID/FFP framed the new strategic objective in terms of reducing food insecurity, rather than increasing food security, because this formulation puts the focus on those populations already food insecure or vulnerable to food insecurity. The target groups under the strategy are populations who are at risk of food insecurity because of their physiological status, socioeconomic status, or physical security, and/or people whose ability to cope has been temporarily overcome by a shock. The strategy represents a significant change from USAID/FFP's previous strategic framework, which focused primarily on the implementation of programs in the field and had separate objectives for the emergency and non-emergency or development programs.

To achieve the SO, the strategy establishes two Intermediate Results (IRs), which complement and reinforce each other. The first IR is *USAID/FFP's global leadership in reducing food insecurity enhanced*, which adds a major new dimension to the Office's strategic framework and responds to the recognition that USAID/FFP will need the strategic support of a more active and expanded set of partners to reduce food insecurity. The second IR—*Title II program impact in the field increased*—reflects the decision to focus the Title II program on enhancing the ability of individuals, households, and communities to cope with shocks in order to reduce their vulnerability.

As part of the new strategy, USAID/FFP improved the allocation of Title II resources to ensure that the most vulnerable countries and populations are targeted. USAID/FFP developed and implemented a new set of criteria to capture the relative vulnerability of countries, as well as their performance with respect to food utilization, access, and availability. USAID/FFP also endeavored to improve the geographic targeting and timing of food resources within countries. Through this prioritization process, USAID/FFP focused on a smaller set of strategic countries to implement country-specific strategies for enhancing

[3] The USAID/FFP Strategic Plan for 2006-2010 can be found at http://www.usaid.gov/our_work/humanitarian_assistance/ffp/ffp_strategy.2006_2010.pdf.

the impact of programs on reducing food insecurity, in close cooperation and consultation with regional bureaus, USAID missions, cooperating sponsors, and international organizations.

In FY 2012, USAID/FFP selected the following countries to have new Title II development food aid programs: Guatemala, Niger, and Uganda.

B. Country-Specific Program Information

While specific information on each of the countries' programs is not yet available, the Country-Specific Information document for each country provides information on the food security situation and USAID/FFP's programming priorities. Please refer to the FY 2012 Country-Specific Information documents.[4] Program-specific information will be available to the Contractor when the cooperative agreements for Title II development food aid programs are awarded.

III. Indicators for Collection and Baseline Evaluation Questions

A. Indicators for Collection

The Contractor will be responsible for collecting data on all applicable indicators listed below for each of the countries detailed in this scope of work, plus a limited number of additional indicators for each Title II development food aid program, including women's status and empowerment indicators. The final list of indicators to be collected will be discussed and agreed upon in consultation with USAID/FFP and each of the FY 2012 Title II awardees.

The USAID/FFP Standard Indicators for Baseline and Final Evaluation Surveys are:

1. Average Household Dietary Diversity Score (HDDS)

2. Household Hunger Scale (HHS): Percentage of households with moderate or severe hunger

3. Percentage of underweight (WAZ < −2) children aged 0-59 months

4. Percentage of stunted (HAZ < −2) children aged 0-59 months

5. Percentage of children 0–5 months of age who are exclusively breastfed

6. Percentage of children 6-23 months of age receiving a minimum acceptable diet

7. Percentage of underweight (BMI < 18.5 kg/m2) women of reproductive age (15–49 years)

8. Women's Dietary Diversity Score (WDDS): Mean number of food groups consumed by women of reproductive age (15–49 years)

9. Percentage of households using an improved drinking water source

10. Percentage of households with access to an improved sanitation facility

[4] The FY 2012 Country-Specific Information documents can be found at http://www.usaid.gov/our_work/humanitarian_assistance/ffp/countryspec.html.

11. Percentage of households with children aged 0–23 months that have water and soap or locally available cleansing agent at a hand washing place

12. Percentage of farmers who used financial services (savings, agricultural credit, and/or agricultural insurance) in the past 12 months

13. Percentage of farmers who practiced the value chain activities promoted by the project in the past 12 months

14. Percentage of farmers who used at least [a project-defined minimum number of] sustainable agriculture (crop/livestock and/or NRM) practices and/or technologies in the past 12 months

15. Percentage of farmers who used at least [a project-defined minimum number of] improved storage techniques in the past 12 months

16. Women's status and empowerment indicator(s), depending on country and/or implementing partner gender objectives as identified in the results frameworks[5] (Note: USAID/FFP is interested in considering the cost of including the Feed the Future's (FTF) Women's Empowerment in Agriculture Index (WEAI) in the population-based household survey for each country. As such, offerors should provide the level of effort and cost required to include the WEAI as a separate line item in the budget.)

The Contractor will closely follow the guidance on the USAID/FFP Standard Indicator Handbook for indicator definition, collection, and analysis for the indicators listed above.[6] In several instances, the Contractor will have to refer to the source documents used to develop the USAID/FFP Standard Indicator Handbook for instructions on adapting questionnaires to the local context, as well as other important details on data collection and tabulation. The Contractor will also have to work closely with USAID/FFP, the USAID Mission in the country, and Title II awardees to develop questionnaires and tabulation instructions for the agriculture indicators (#12-15), program-specific gender indicator(s), and any additional indicator(s) not specified in the Handbook.

The Contractor will also collect data for the following indicators:

1. Poverty prevalence (assessed through food and non-food expenditure)

2. Mean depth of poverty (among poor households)

For the poverty prevalence indicator, the Contractor will closely follow FTF guidance for indicator definition, collection, and analysis.[7] For the mean depth of poverty indicator, the Contractor will use the same household level per capita expenditure data used to derive the poverty prevalence indicator. The

[5] Demographic and Health Survey (DHS) indicators on women's status and empowerment can be used as reference: http://www.measuredhs.com/topics/Womens-Status-and-Empowerment.cfm.
[6] The USAID/FFP Standard Indicator Handbook can be found at http://www.usaid.gov/our_work/humanitarian_assistance/ffp/ffpstdindicatorhb.pdf.
[7] For information and guidance on FTF indicators, visit http://feedthefuture.gov/progress.

Contractor will have to work closely with USAID/FFP and the Mission in country to develop tabulation and analysis instructions for this indicator.

The Contractor will ensure that rigorous practices are used to collect, tabulate, and analyze the indicator data. Refer to Section IV of this SOW for further information on the required quantitative methodology.

B. Evaluation Questions

The Contractor is expected to help formulate and incorporate evaluation questions into the survey in concert with the implementing partner for each program. The intent is to include additional variables or strata that will add to the formative analysis and help strengthen program design and targeting.

IV. Baseline Evaluation Design and Methodology

A. Quantitative Methodology

The Contractor is expected to take responsibility for all aspects of the baseline quantitative survey, including sampling design, questionnaire instrument development, field work, and data collection, entry, cleaning, treatment, and analysis.

1. **Sampling Design:** Before embarking on designing the sample survey, the Contractor should become familiar with the FANTA Sampling Guide (1997) and addendum (2012)[8], which provide an overview of the recommended design features for Title II baseline and final evaluation surveys. The 2012 addendum provides important corrections to the guide, which should be followed closely. The quantitative part of the baseline should be a population-based household survey, where the "population" is limited to those living in geographic areas where program implementation is intended to take place.

   The Contractor should plan to conduct one survey per country, with each implementing partner area representing one stratum in the survey design. A multi-stage cluster sampling design should be used. Given that USAID/FFP requires that the baseline survey be a performance evaluation (rather than an impact evaluation), the design may be limited to a simple pre-post design without control groups. If the Contractor intends to use a more elaborate design, this should be specified in the proposal.

   The Contractor should specify the details of the sampling design in a Sampling Plan document in advance of field implementation. This document should include all of the following elements:

   - The principal indicator and associated target group that will drive the sample size calculation for the entire survey. For example, if stunting is the principal indicator, the target group will be children 0-59 months.
   - The base sample size for this target group. The Contractor should show the equation used for this calculation and the parameters used in the equation, including the design effect assumed for the principal indicator driving the sample size calculation. The calculation should take into

[8] The FANTA Sampling Guide can be found at http://www.fantaproject.org/publications/sampling.shtml.

account statistical power. The Contractor should carry out sample size calculations separately for each implementing partner and then sum them to obtain the total sample size for the country survey.

- The number of households to be sampled in order to achieve the desired sample size for the target group (assuming that households may contain more than one or no eligible members from the target group). The Contractor should give an indication of how the base sample size will be adjusted to account for the number of households that need to be visited.
- The number of households to be sampled to account for anticipated household non-response. The Contractor should indicate by how much the number of households to be sampled will be pre-inflated to account for household non-response.
- Geographic or other criteria for stratification. The Contractor should specify all stratification criteria and the total number of strata for all criteria. At a minimum, the sample will be stratified by partner in countries where multiple partners are implementing programs. Additional strata are not required.
- The number of stages of sampling to be used.
- Explanation of how the number of clusters and of households per cluster in the sample will be determined.
- Definition of the clusters. Where multiple partners are implementing programs, stratification should be part of the design. In such cases, the implementation zone of each partner should constitute the highest level of stratification. Lower level strata within implementation zones may also be needed. If so, an indication should be provided on how the overall number of selected clusters will be allocated to the various strata within implementing partner zones. The Contractor should use tables to show the number of clusters that will be selected for each stratum.
- Explanation on the source of the information for the sampling frame, e.g. census lists or other national or internationally-sponsored surveys, such as the Demographic Health Surveys (DHS). The Contractor should indicate how reliable and recent the frame information is.
- A Probability Proportionate to Size (PPS) sampling mechanism should be used to randomly select the clusters. The Contractor should use the number of households per cluster as the size measure and include a table of size measure and another showing the final list of selected clusters along with their probabilities of selection.
- Indication that the Contractor will use systematic sampling to select dwellings within clusters. This implies that for the sampled clusters, a list of all households, with household identification and location indicated, within these clusters must be obtained through either a preliminary pass on the cluster prior to interviewing or other existing sources.
- Explanation of how households are defined by the Census office in the country in question. The Contractor should adopt a “take-all-households” approach to treat dwellings with multiple households. The Contractor should specify how polygamous households will be sampled, if applicable.
- The Contractor should adopt a “take-all-individuals” approach to select individuals within households from whom to collect data for each target group.

2. **Questionnaire Instrument:** USAID/FFP expects the Contractor to develop a questionnaire instrument incorporating modules specified in the USAID/FFP Indicator Handbook (disseminated in December 2011) to respond to the data collection needs of the Title II development food aid programs and USAID. Given the limited time and resources for development, it is recommended that the Contractor limit the instrument to a paper and pencil version. The questionnaire should include an informed consent statement for each respondent and commence with a set of questions to establish a household roster. The questions within the questionnaire should be organized by respondent type[9] and questions should follow international standard format, i.e. DHS, wherever possible. In general, the Contractor should ensure that questions are written following established questionnaire design principles and that rigorous practices are used to collect, tabulate, and analyze indicator data. These practices should include adding identifiers, such as cluster number, household number, and respondent identification number (line number from household roster) to each page of the questionnaire(s) to ensure that pages can be correctly correlated to a given household and respondent if separated and to enable the derivation of household-level sampling weights and a household non-response adjustment to be incorporated into the sampling weights for use in all data analyses.

3. **Field Procedure Manual:** USAID/FFP expects that the Contractor will develop a field manual to be used as part of the training materials for survey enumerators and supervisors and serve as reference material for staff in the field conducting the survey. The field manual should include instructions on how to sample dwellings within clusters, households within dwellings, and select individuals within households. The manual should also give recommended best practices for conducting interviews and dealing with specific challenging situations, e.g. households that refuse to participate, and provide a household and individual respondent non-response follow-up strategy. The manual should also describe the roles and responsibilities of the field staff and contain a detailed explanation of how to properly administer each question in the questionnaire.

4. **Data Treatment and Analysis Plan:** USAID/FFP expects that the Contractor will prepare a data treatment and analysis plan to address the following elements:
   - Indication of how and when data will be entered into the database, as well as the software to be used for data entry. Double-data entry is required;
   - Data quality checks and edits (data cleaning) planned to ensure logical consistency and coherence, as well as an indication of the software to be used;
   - Sampling weights to be included on the data file. The formulae used to calculate the sampling weights should be included as part of a data dictionary document. Different sampling weights will need to be calculated for separate analysis of each implementing partner area and of the

[9] Note that a respondent is an individual or set of individual(s) identified as most appropriate to respond to a set of questions on behalf of a specific target group. Such respondents can be the actual sampled members of the target group themselves (e.g., adults providing direct responses on behalf of themselves) or can be individuals not part of the target group providing proxy responses on behalf of sampled individuals in the target group (e.g., caregivers on behalf of young children).

aggregate Title II program data for the country. Note that a household non-response adjustment should be made to the sampling weights as part of the final weighting system;

- Indicator tabulation plan. Estimates should be produced for each implementing partner stratum and for the overall level;
- Indication of which sub-groups, if any, for which the Contractor will produced estimators;
- Any other planned data analyses. The Contractor should specify all intended bivariate and multivariate analysis here;
- Indication that confidence intervals associated with the indicators will be produced alongside the indicator estimates and that these will take into account the design effect associated with the complex sampling design. Additional statistical outputs are required for multivariate analysis, but should be provided in an appendix; and
- Software to be used for data analysis and for conversion of anthropometric data into Z-scores.

Note: All variables must be labeled in a clear and consistent manner for all baseline surveys to enable meta-analysis of data from different countries.

B. Preparation for Meta-Analysis

The Contractor will ensure that labeling and architecture of all datasets is consistent to help facilitate meta-analyses of datasets across Title II development programs and countries at a later date. During the period of performance for the baseline study, USAID/FFP will discuss with the Contractor specific details with respect to the requested architecture of the datasets. The meta-analysis of data is not part of this SOW.

C. Qualitative Methodology

The Contractor will undertake a qualitative study as part of the baseline study. The main objective of the qualitative study is to inform USAID/FPP and implementing partners about the overall food security situation in the programs' implementation areas. Qualitative information adds depth, richness, and context and will serve to triangulate information from quantitative findings. Quantitative and qualitative results should be combined to provide a more complete picture to the evaluation results. The qualitative study described in this SOW is not expected to replace any in-depth qualitative assessments or formative research that implementing partners may conduct at the beginning of a program to inform specific aspects of their program design. The qualitative research described in this SOW is expected to shed light on the quantitative survey findings.

A description of the qualitative study should include the following elements:

- Questions the qualitative component will answer;
- Sampling approach for selecting sites, key informants, focus group discussion participants, and direct observation sites for the qualitative component;
- Methods to be used for the qualitative study, e.g., rapid appraisal/participatory rural appraisal, focus groups, key informant interviews, structured/semi-structured interviews, anecdotal evidence, organizational capacity assessments, observations, or seasonal calendars;

- Brief description of the instruments that will be developed and the type of questions to be asked, e.g., key informant interview guides, focus group guides, or organizational capacity assessment questionnaires;
- Budget and timeline constraints for the qualitative component;
- When qualitative data collection will take place, i.e. prior, in parallel, or subsequent to the quantitative survey;
- Expected outputs of the qualitative data analysis;
- How the results of the qualitative study will be combined with the quantitative study; and
- Methods and specific software to be used to analyze qualitative data collected.

V. Baseline Study Products

A. Deliverables

The Contractor is responsible for:

1) Pertinent permissions, insurance, and other required permits
    a. Obtaining all the necessary permissions for implementing the baseline data collection.
    b. Adhering to country and local formalities and obtaining any required permits related to data collection from human subjects and logistics of survey implementation, including any necessary Internal Review Board (IRB) approvals, as well as health and accident insurance, salary, and taxes for all enumerators and supervisors.

    Deliverable: Evidence of insurances and permits for implementing survey and other data collection activities in each country in electronic form

2) Attendance at the USAID/FFP M&E Workshop in each country
    a. Contractor staff leading the baseline study per country and other key Contractor staff should attend and participate in the workshop that is organized by USAID/FFP's technical advisor, FANTA-III, for new Title II awardees in each country. The workshops will be held in French in Niger, in Spanish in Guatemala, and in English in Uganda. Dates for the workshops are to be determined, but will take place between July and September 2012.
    b. Understanding of the results frameworks and Indicator Performance Tracking Table (IPTT) for new Title II programs.

    Deliverable: Attendance and participation of key Contractor staff in the USAID/FFP M&E Workshop for new Title II awardees in each country

3) Inception report and detailed survey implementation plan (DSIP)
    a. Specifying details for methodology, critical tasks, anticipated outputs, date-bound timelines, resource needs, and responsible person(s). Composition of a standard field survey team, including expected tasks and responsibilities of each team member, should also be described.

    Deliverable: Inception report and DSIP reviewed and approved by USAID/FFP

4) Quantitative survey instrument
    a. Detailing a questionnaire instrument that responds to the elements specified in Section IV A, sub-section 2, above, and any supplemental questionnaire components, such as those that may be required to address the inclusion of gender and partner-specific indicators.

b. Adapting the questionnaire to the local context.
c. Translating the approved questionnaire instrument from English into the appropriate local language(s) in which the survey will be administered. Back translating the questionnaire from the local language(s) to English with a second translator to ensure it is accurately translated in the local language(s). Making any necessary changes to the local language questionnaire based on the back translation. Some questionnaire modules might already be provided in local language, thus the Contractor may not have to translate everything.

<u>Deliverable:</u> Final local language and corresponding English questionnaires reviewed and approved by USAID/FFP

5) Qualitative study description and guidance
   a. Detailing the methods to be used, general domain of questions to be asked, and instructions and guidance that will be provided to those collecting the qualitative data. The qualitative data collection plan should respond to the elements specified in Section IV C.

<u>Deliverable</u>: Qualitative study description and guidance reviewed and approved by USAID/FFP

6) Supervisor and enumerator training curriculum
   a. Developing training materials to address the quantitative and qualitative components of the baseline survey.
   b. Translating training curricula into local language(s), as necessary.
   c. Developing supporting materials and carrying out anthropometric standardization with enumerators.
   d. Pilot testing the quantitative survey instrument during enumerator training with a small number of households that are not included in the sampling frame. It is recommended that each enumerator team have the opportunity to carry out at survey with at least two households during the pilot testing phase.

<u>Deliverable:</u> Final local language and corresponding English training materials reviewed and approved by USAID/FFP

7) Sampling plan document
   a. Detailing a sampling plan for the quantitative population-based household survey that responds to the elements specified in Section IV A, sub-section 1.

<u>Deliverable</u>: Sampling plan reviewed and approved by USAID/FFP

8) Field procedure manual
   a. Detailing a field procedure plan for the quantitative population-based household survey that responds to the elements specified in Section IV A, sub-section 3.

<u>Deliverable</u>: Field procedure manual reviewed and approved by USAID/FFP

9) Data treatment and analysis plan
   a. Detailing a data treatment and analysis plan that responds to the elements specified in section IV A, sub-section 4.

<u>Deliverable</u>: Data treatment and analysis plan reviewed and approved by USAID/FFP

10) Data set, data dictionary/codebook, edit rules, and syntax for data analysis, including syntax for variable transformations

Deliverables:

a. **Raw data set;**
b. **Edit rules for cleaning data;**
c. **Data dictionary/codebook;**
d. **Syntax for all data analysis and variable transformations;**
e. **Final data set for each implementing partner that includes cleaned data, sampling weights at each stage, final sampling weights, and all derived indicators; and**
f. **Sampling weights used to tabulate the aggregate-level estimates for the USAID/FFP Standard Indicators**

11) Briefings for the USAID Mission in the country

a. Presenting findings, conclusions, lessons learned, and recommendations of the baseline study. Mid-term briefings of the baseline study are not required to include a PowerPoint presentation and will be done for the USAID Mission in the country. A formal, final briefing should include a PowerPoint presentation and cover the contents of the study's report, such as findings, conclusions, lessons learned, and recommendations at the overall country level and by implementing partner. The final briefing will be done for both the USAID Mission and USAID/FFP.

Deliverables:

a. **Monthly, mid-term, and final briefings to the USAID Mission and USAID/FFP in country**

12) Draft baseline study report

a. Not exceeding 50 pages, excluding appendices and attachments. The draft report must be presented in English.
b. Presenting the estimates and confidence interval for all indicators (impact and outcome) at the overall program level and by implementing partner.
c. Presenting bivariate and multi-variate analyses by implementing partner.

Deliverable: Draft baseline survey report reviewed and approved by USAID/FFP

13) Final baseline study report

This report will be a revised version of the draft baseline study report that incorporates the comments of USAID/FFP and the USAID Mission in the corresponding country. The final report must be presented in English for all countries, as well as in French for Niger and Spanish for Guatemala. Any translation costs must be considered in the Contractor's cost proposal. USAID must consider the translation quality to be acceptable before final payment is made.

Final submission of the report must be in the format required by USAID/FFP Information Bulletin 11-02 (August 11, 2011). USAID/FFP expects that the final report will adhere to the USAID Evaluation Policy's criteria to ensure the quality of the evaluation report (refer to USAID Evaluation Policy, page 11, Appendix 1).

Completed and approved study reports must be submitted to USAID's Development Experience Clearinghouse (DEC) and a cover sheet attached indicating the type of study conducted and design. Each completed study must include a three- to five-page summary of the purpose,

background of the project, main study questions, methods, findings, conclusions, recommendations, as applicable, of the study.

<u>Deliverable</u>: Final baseline study report reviewed and approved by USAID/FFP and submitted to the DEC

B. Reporting Format

The format for the baseline study report is as follows:

1. **Cover page, Table of Contents, List of Acronyms**;
2. **Executive Summary** should be a clear and concise stand-alone document that states the most salient findings, conclusions, and recommendations of the study and gives readers the essential contents of the baseline report in two or three pages. The Executive Summary helps readers to build a mental framework for organizing and understanding the detailed information within the report;
3. **Introduction** should include purpose, audience, and synopsis of task;
4. **Methodology** should describe sampling design, study methods, data collection techniques, constraints and limitations of the study process and rigor, and issues in carrying out the study;
5. **Overview of the Current Food Security Situation** should provide a brief overview of the current food security situation in the country related to food availability, access, and utilization; current and anticipated programming and stakeholders;
6. **Tabular summary of results** should present baseline findings in table form for all the indicators by implementing partner area and for the aggregate Title II program area in each country;
7. **Findings** should present findings in response to the study questions. Baseline values must be presented in quantitative format and complemented by descriptive analysis for each implementing partner and at the aggregate country level;
8. **Conclusions and Recommendations** should provide additional analysis of the data and results, drawing out programmatic and organizational recommendations for planning or modifying program design. Recommendations must be relevant to program and context and include concrete and realistic steps for implementing or applying the recommendation.
9. **Issues** should provide a list of key technical and/or administrative, if any, for the Title II programs for which the baseline study was conducted; and
10. **Annexes** should document the study methods, scope of work, schedules, interview lists and tables and be succinct, pertinent, and readable.
    a. References, including bibliographical documentation, meetings, interviews, and focus group discussions;
    b. List of stakeholder group with number, type, and date of interactions;
    c. Data collection instruments in English and the local language, including qualitative protocols developed and used;
    d. Data sets in electronic format;
    e. Data dictionary and program files used to process the data in electronic format;
    f. Baseline study SOW; and
    g. Other special documentation identified as necessary or useful.

VI. <u>Qualifications of Firm or Consortium</u>

The selected firm/consortium shall possess the following qualifications:

a. Legal status recognized to work in the country, enabling the organization to perform the above-mentioned tasks;
b. Demonstrated experience of organizing large-scale population-based household surveys in developing countries within the past five years;
c. Demonstrated experience of conducting qualitative research and data collection and analyzing results in developing countries within the past five years;
d. Demonstrated strong capacity and experience in planning and organizing large-scale population-based household survey logistics;
e. Good network of experienced enumerators, supervisors, and data entry clerks in the country where the field work will be conducted or demonstrated ability to effectively recruit skilled enumerators, supervisors, and data entry clerks in developing countries;
f. Demonstrated experience to engage and use statistical or evaluation firms and institutions in the country where the field work will be conducted or in developing countries;
g. Demonstrated strong capacity in sampling, data management, analysis, and statistics;
h. Strong knowledge in any of the following software programs: CS-Pro, SPSS, Stata, SAS, SUDAAN, or any other analytical software with the capacity to take into account complex survey designs; and
i. Demonstrated ability to deliver quality written and oral products (evaluation report and PowerPoint briefing).

VII. Team Composition and Qualifications

For planning purposes, the team for this study will consist of key personnel with defined technical expertise, a mix of consultants that will provide varying technical and subject matter expertise, and support staff. The team should include local consultants with expertise, knowledge, and experience in each country. Offerors may propose an alternative personnel configuration to implement the study based on the approach provided in their proposals.

The required areas of technical and subject matter expertise represented on the team should reflect the multi-sectoral nature of Title II food assistance and the expertise required to conduct qualitative research and quantitative population-based household surveys:

- Expertise in food security programming;
- Expertise in agriculture;
- Expertise in maternal and child health and nutrition;
- Expertise in qualitative data collection methods and analysis; and
- Expertise in the design, execution, and analysis of quantitative population-based household surveys. A high-level statistical background is required.

Key Personnel:

1. Baseline Study Team Leader – This individual will serve as team leader in a full-time position for the duration of the study and in all the countries. S/he will be the primary point of contact between USAID and the baseline study team and have responsibility for the overall compilation of the final baseline study reports. The incumbent must:
   - Have 10 years of food security programming in senior management positions;
   - Have managed or participated in at least two food security evaluations;

- Have a Master's or PhD degree in development studies, development evaluation and management, or other relevant field of study;
- Have excellent writing/organization skills and a demonstrated ability to deliver a quality written product (Evaluation Report and PowerPoint);
- Have excellent oral communication, presentation, and inter-personal skills;
- Have the technical and management skills to manage budget resources (dollars and staff) for the study, as well as assist and support the team with field logistics (e.g., coordinating with USAID and/or a government ministry to set up initial appointments for interviews);
- Have a broad range of subject matter expertise and demonstrated experience in the areas of food security, agriculture development, nutrition, and health, as well as in the USAID/FFP focus countries; and
- Experience on past Title II evaluations or baseline surveys would be a plus.

2. Senior Evaluation Specialist – This individual will be responsible for designing, managing, and coordinating the evaluation approach. The incumbent must:
   - Have eight years of evaluation experience;
   - Have demonstrated experience managing, leading, and coordinating quantitative and qualitative baseline studies or evaluations;
   - Have a Master's degree or PhD in statistics, development studies, development evaluation and management, or other relevant field of study;
   - Have extensive knowledge of sampling and demonstrated experience with designing complex surveys;
   - Have extensive experience with data management and database organization, including developing data entry programs and supervising data entry, cleaning, and quality control;
   - Have experience in various complex data analysis methods and working knowledge of at least one statistical software, such as CS-Pro, SPSS, Stata, SAS, and SUDAAN;
   - Have excellent writing and organization skills and a demonstrated ability to deliver a high-quality written product (evaluation report);
   - Have familiarity with a broad range of subject matter knowledge expertise in the areas of food security, agriculture development, nutrition, and health; and
   - Experience on past Title II evaluations or baseline surveys would be a plus.

3. Qualitative Research Specialist – This individual will be responsible for designing, managing, and supervising qualitative data collection. The incumbent must:
   - Have eight years of experience designing and implementing qualitative research studies to illuminate quantitative survey findings;
   - Have experience with a diverse range of qualitative instruments, such as rapid appraisal/participatory rural appraisal, focus groups, key informant interviews, structured/semi-structured interviews, anecdotal evidence, organizational capacity assessments, observations, or seasonal calendars;
   - Have experience with qualitative research in developing countries; and
   - Experience on past Title II evaluations or baseline surveys would be a plus.

4. Field Operation Manager – This individual will be responsible for planning, managing, and supervising survey data collection in-country. The incumbent must:
   - Have an undergraduate degree in agriculture, statistics, or economics;

- Have five years of experience supervising large-scale survey field work in developing countries, preferably involving anthropometric data collection;
- Have demonstrated experience hiring, training, and overseeing field supervisors and enumerators; coordinating field logistics, schedules, and equipment; and managing data quality control in the field; and
- Fluency in relevant local languages.

As per the criteria presented above and given the multi-sectoral approach of Title II programs, the Contractor will be expected to involve sectoral experts in the areas of agriculture, livelihoods, livestock, health, and nutrition, as needed. These experts can either be external consultants engaged on a full- or part-time basis or members of the selected firm with the necessary skills. The required skills of the agriculture and health and nutrition experts are outlined below; however, additional sectoral experts may be needed based on the country context and Title II program activities:

Agriculture Expert – This expert will provide technical guidance related to agriculture and agribusiness during the evaluation. The incumbent must:

- Have five years of food security implementation experience;
- Have demonstrated experience with agriculture extension, conservation agriculture, input management, post-harvest handling, livestock management, and agricultural marketing;
- Have demonstrated experience and knowledge of quantitative and qualitative evaluations methodologies, processes, and management;
- Have a strong knowledge of Title II programming, with experience on past evaluations of Title II evaluations or surveys is a plus;
- Have a Master's or PhD degree in agriculture, development studies, development evaluation or other relevant field of study;
- Have excellent writing/organization skills;
- Have excellent oral communication, presentation, and inter-personal skills; and
- Have excellent analytical and technical skills.

Health and Nutrition Expert – This expert will provide technical guidance related to maternal and child health and nutrition during the study. The incumbent must:

- Have five years of maternal and child health and nutrition expertise;
- Have three years of emergency or development food security implementation experience;
- Have a strong knowledge of health and nutrition indicators, supplementary and vulnerable group feeding practices, positive deviance, care group, and community healthcare methodologies;
- Have demonstrated experience and knowledge of quantitative and qualitative evaluations methodologies, processes, and management;
- Have a strong knowledge of emergency Title II programming, with experience on past evaluations of Title II evaluations or surveys a plus;
- Have a Master's or PhD degree in international public health, international nutrition, or other relevant field of study;
- Have excellent writing/organization skills;
- Have excellent oral communication, presentation, and inter-personal skills; and
- Have excellent analytical and technical skills.

Other team members:

The offeror will need to consider and budget accordingly to what extent the team will require junior or mid-level support (e.g., to assist in collecting, analyzing, and cleaning data, and preparing tabular or graphic materials).

As per the USAID Evaluation Policy, all baseline study team members will provide a signed statement attesting to a lack of conflict of interest or describing an existing conflict of interest relative to the program being evaluated.

VIII. Responsibilities/Tasks

After the award, the firm contracted to carry out the baseline study will submit to USAID/FFP an inception report and detailed survey implementation plan (DSIP) as a first deliverable. It is anticipated that the baseline study team will need to carry out the following tasks:

- Initial orientation meetings with USAID/FFP in Washington, including the M&E Advisor and the Country Backstop Officers for each country; the USAID Missions in Guatemala, Niger, and Uganda; and new Title II awardees in each country;
- Attendance at the USAID/FFP M&E Workshop to be held in each country;
- Review of project documentation provided by USAID/FFP and the Missions. Documents will be provided after the signing of the contract;
- Identification of any other relevant performance information sources, such as results frameworks, IPTTs, and/or performance monitoring systems;
- More in-depth interviewing of USAID/FFP and Mission staff, new Title II awardees, and stakeholders to confirm indicators to be surveyed and understand each program's results frameworks, planned program implementation, and the country context;
- Preparation of relevant summary tables, graphs, and annexes;
- Monthly and mid-term briefings of the baseline study (without PowerPoint presentation);
- Drafting of Evaluation narrative, including Executive Summary and other content (tables, graphs, and annexes);
- Preparation of a PowerPoint presentation on the study's findings, conclusions, lessons learned, and recommendations for final briefing of the baseline study;
- Final briefing to the USAID Missions;
- Revision of the Evaluation Report drafts to address comments provided by USAID/FFP and the Missions; and

- Submission of the final Baseline Study report in English and local language, data, and supporting information in accordance with the requirements described in USAID/FFP Information Bulletin 11-02 and in line with the USAID Evaluation Policy.

IX. Evaluation Management

A. Logistics

USAID/FFP will provide overall direction to the Contractor, identify key documents, and assist in facilitating a work plan. USAID/FFP staff in Washington and the USAID Missions in the respective countries will assist in arranging meetings with key stakeholders as identified by USAID prior to the initiation of field work. The Contractor is responsible for arranging other meetings as identified during the course of this evaluation and advising USAID/FFP prior to each of those meetings. The Contractor is also responsible for arranging vehicle rental and drivers as needed for site visits and field work. USAID/FFP in Washington and the Missions can assist with hotel arrangement if necessary, but the Contractor will be responsible for procuring its own work/office space, computers, internet access, printing, and photocopying. The Contractor will be required to make its own payments. USAID/FFP and Mission personnel will be made available to the team for consultations regarding sampling, geographical targeting, sources, and technical issues before and during the evaluation process.

B. Schedule/ Timeline

It is anticipated that a timeline will be submitted as part of the Offeror's proposal. The following is provided for illustrative purposes. Please note that USAID requires monthly meetings on the progress of the baseline study.

Pre Field-Work: Obtain key documents, make key contacts, and plan for interviews and discussions in the country with USAID, Title II awardees, government officials, food security-related organizations, and others as needed. Most of this work will be done through email or phone. The team may work through USAID to arrange meetings and interviews prior to arrival or start of formal data collection.

Field Work – Weeks 1 - 2: The focus will be on meeting with USAID and Title II awardees to negotiate the inclusion of USAID Mission and Title II awardee-specific indicators, gathering and reviewing data not already available, solidifying the Work and Methodology Plan, start recruitment of enumerators, developing or refining sampling frame and data collection methodology and tools (quantitative and qualitative), and arranging plans for site visits as needed.

Field Work – Weeks 3 - 4: The focus will be on completing the sampling frame and data collection methodology and tools. Translation of surveys instruments and testing and development of field manual will also be done in this timeframe. The team may also conduct interviews and discussions with Title II awardees, host government officials, USAID staff, food security organizations, and beneficiaries as time permits. The team will also conduct a monthly debriefing to USAID.

Field Work – Weeks 5 - 6: The focus will be on finalizing interviews and discussions with Title II awardees, government officials, food security organizations, and beneficiaries and training enumerators for quantitative and qualitative data collection. The team leader will also conduct the mid-term debriefing to USAID.

Field Work – Weeks 7 - 10: The focus will be on quantitative and qualitative data collection through surveys, questionnaires for interviews and discussions with Title II awardees, government officials, food security organizations, and beneficiaries. Data entry and cleaning will begin. The team will also conduct a monthly debriefing to USAID.

Field Work – Weeks 11 - 13: The focus will be on data entry, cleaning, and analysis. The team will also begin preparing sections of the draft analysis.

Post Field-Work: Preliminary debriefings with USAID, final debriefing meetings with USAID and stakeholders, and submission of draft reports. The final report will be submitted no later than two weeks following receipt of final comments from USAID.

C. Budget

A firm bidding on this activity must, in addition to a technical proposal, submit a Budget in Excel showing the projected Level of Effort (LOE) for each proposed full-time and/or short-time member of the Team, including subject matter expertise and administrative (logistical) support. Other costs that should be included are international travel and per diem, in-country costs for data collection and interviewing, communications, report preparation and reproduction, and other costs as appropriate. A six-day work week is authorized when working in country.

D. Evaluation Criteria for Proposals

Offeror proposals will be evaluated on the merit of the proposed approach including the following criteria:

1) Technical Approach as illustrated in the description of proposed methodology.
2) Timeline reflecting proposed activities, which emphasizes the ability to meet the proposed deadlines.
3) Key personnel and composition of the technical team, including CVs and commitment of availability. USAID/FFP would like the Team Leader and key personnel identified as practical. USAID/FFP will also consider the offeror's ability to engage and use local firms.
4) Past performance including a sample document (preferably on food security) provided as a writing sample to evaluate this criteria. The offeror should also include in the submission a list of references, preferably in USAID, related to the completion of a baseline study or final evaluation for a Title II or food security project.

X. Intellectual property

USAID shall, solely and exclusively, own all rights in and to any work created in connection with this agreement, including all data, documents, information, copyrights, patents, trademarks, trade secrets or other proprietary rights in and to the work. The Contractor is not allowed to withhold any information related to this agreement, as this will become public information.