



Republic of Sierra Leone

2004 Population and Housing Census

Analytical Report on Agriculture

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LIST OF ACRONYMS

AGOA	African Growth and Opportunity Act
ARS	Agricultural Sector Review
CAADP	Comprehensive African Agricultural Development Programme
CBO	Community Based Organization
ECOWAS	Economic Committee of West African States
FAO	Food and Agricultural Organization
FBO	Farmers Based Organization
GDP	Gross Domestic Product
GOSL	Government of Sierra Leone
IARS	Institute of Agricultural Research Station
IVS	Inland Valley Swamp
M&E	Monitoring and Evaluation
MAFFS	Ministry of Agriculture, Forestry and Food Security
NAAS	National Agricultural Advisory Service
NaCSA	National Commission for Social Action
NAFSL	National Association of Farmers in Sierra Leone
NARCC	National Agricultural Research Coordinating Council
NARs	National Agricultural Research Institutes
NEPAD	New Partnership for Africa's Development
NGO	Non- Governmental Organization
PEMSD	Planning Evaluation Monitoring Statistics Division
SSL	Statistics Sierra Leone
UNDP	United Nations Development Programme
VAM	Vulnerability Analysis and Mapping

EXECUTIVE SUMMARY

Sierra Leone, like most developing countries, is an agrarian economy. The agriculture sector accounts for almost half of the Gross Domestic Product (GDP) as well as employs the majority of the economically active labour force.

The country is endowed with good natural resources, climatic and agro-ecological conditions that support all year round agricultural production. This is in addition to a favorable macro-economic environment, high potential commitment to agricultural development, comparative advantage and increased empowerment of farmers and stakeholders.

Sierra Leone has 5.4 million hectares (ha) of potentially cultivable land area, which constitutes about 74 percent of the total land area. Despite this, only 34 percent of the arable land is under cultivation. Increased pressures and threats to macro-economic stability, limited possibility for expansion, declining soil fertility and low crop productivity, inadequate research system, poor extension services and lack of agricultural finance have been identified as weaknesses and constraints affecting the sector.

Given the importance of agriculture and food security in the national development policy, data was collected on agriculture in the 2004 Population and Housing Census. These included: labour force participation in agriculture by economic activity, status and gender, crops cultivated and acreages, livestock reared, proportion of farming households, farm families' access to production and processing facilities and ownership of assets. Data analysis was done at national, regional and district levels, while tables, graphs and charts were used to present the results.

Of the 4,976,871 people in Sierra Leone, 1,724,844 people in the age range of 15-64 years were economically active. This constituted about 34.7 percent of the total population. The economically active people engaged in twenty-one (21) economic activities, which ranged from agriculture to mining, manufacturing, construction, trade/repair and services. Of the 1,724,844 economically active persons, 1,144,439 (66.4%) were engaged in agriculture and related activities for their livelihood. One million, eighty two thousand, eight hundred and thirty four - 1,082,834 (94.6%) of those in agriculture were crop farmers, 46,042 (4.0 %) were in fishery, 6,850 (0.6%) kept livestock, 5,882 (0.5%) were in forestry, 1,689 (0.1%) were in poultry production while 1,142 (0.001 %) were engaged in hunting.

The analysis further showed that household members of all employment categories are involved in agriculture. This is particularly so for the crop sub-sector, where majority of the household members whether employed, self employed, unpaid farm workers, looking for work, not working and not looking for work, household workers, students and the retired are engaged.

Sex disaggregated data at national, regional and district levels showed that women are more engaged in agriculture (51.0 percent), particularly in the crop and livestock sub-sectors, than their male counterparts (49.0 percent).

Agricultural activities by status and gender at national, regional and districts indicated that the males dominate the paid and self-employed, students and the retired categories while women dominate the unpaid family workforce, household work, not working/not looking for work and other categories in all the six agricultural sub-sectors.

Out of a total 819,854 households in the country, 729,440 (89 percent) were involved in farming and related activities. On a regional basis, of the farm households, Northern Province recorded the highest 239,182 (32.8 percent), followed by the Eastern Province 188,656 (25.9 percent), Southern Province 167,227 (22.9 percent) and the Western Area 134,375 (18.4 percent). At district levels, Western Urban Area had the highest number of farm families (14.7 %) followed by Bo (9.5 %), Kenema (9.4 %) and Kailahun (8.8 %).

Out of a total of 5,360,000ha (74.0%) of available arable land in the country, 1,995,830.4 ha (35.6 %) were cultivated while 38.4 percent remain uncultivated. Of the cultivated land, 609707.6 ha (30.5%) were cultivated to upland and inland swamp rice, 344548.0 ha (17.3%) to coffee, 254410 (12.7%) to cassava, 232012 ha (11.6%) to oil palm, 148665.2 (7.4%) to cocoa, 131037.6ha (6.6%) to groundnut, 89719.2 (4.5%) to sweet potato, 73570.0 (3.7%) to vegetables, 60238.0 (3.0%) to Maize and 51922.8 (2.7%) to citrus. Eastern Province had the highest percentage of land under cultivation-730788.4ha (36.6%), followed by the Northern - 639556.8ha (32.0%) and Southern-599802.4ha (30.1%) Provinces, and the Western Area-25682.2ha (1.3 %). District level analysis revealed that Kailahun (13.4%), Kenema (12.3 %), Kono (10.9 %), Bo (10.4 %), Moyamba (9.0 %) and both Koinadugu and Pujehun (7.5 %) districts accounted for most of the land cultivated.

On crop basis, Portloko-69016.0ha (11.3%), Kailahun-66841.2ha (11.0 %) and Moyamba-63378.0ha (10.4 %) cultivated the highest acreage of rice followed by Koinadugu-57004.8ha (9.3%), Kenema-55641.2ha (9.1%), Bo-54268.4ha (8.9 %), Kono-53826.0ha (8.8 %) and Tonkolili-48828.8ha (8.0%). For cassava, Moyamba (14.4%), Portloko (12.0 %) and Bo (10.5 %) accounted for most of the cropped area followed by Bonthe (7.8%), Kambia and Pujehun (7.6 %), Bombali (7.5 %), Kono (6.9%) and Kenema district. Port Loko (11.8 %) followed by Koinadugu (10.7%), Moyamba (9.9 %), Kono (9.8 %), Kambia (9.7%) and Bombali (8.9%) had more land under sweet potato than the other districts. Koinadugu (15.4 %), Bombali (13.9 %) and Moyamba (12.1%) districts were among the largest cultivators of ground-nuts while Moyamba district (19.5 %) reported the highest acreage followed by Koinadugu (12.0 %), Kono (9.8 %) and Tonkolili (9.3 %) for maize. Hence the least cropped areas were Bonthe and Western Area Rural and Urban districts.

Coffee and cacao are predominantly grown in the Eastern region of the country (67.9 % and 78.2 %) followed by the Southern and Northern regions. At district level, Kailahun (23.3 % and 35.9 %), Kenema (22.8% and 24.5%), Kono (21.9% and 17.9%), Bo (10.9% and 7.8%) and Pujehun (10.4% and 7.8 %) cultivated the largest acreages.

Although oil palm is cultivated in all districts in the country, including Western Area, the Southern region (45.2 %) had the largest acreage under oil palm followed by the Eastern (26.5 %) and Northern (25.1%) regions. At district level, Bo (19.8 %),

Kenema (13.8 %), Pujehun (12.6 %) and Kailahun (11.2 %) recorded the highest acreages than the other districts.

Citrus is more widely grown in the Northern than the Eastern, Southern and Western regions. Across districts, Kenema, Bo, Moyamba, Kambia and Kono were in the lead.

Kono, Moyamba, Kailahun, Bombali, Koinadugu, Port Loko and Kambia were among the districts with the largest acreages under vegetable production in that order.

A total of 4,150,596 livestock were owned by farm families in Sierra Leone of which 77.8 % are chicken, 11.7 % are ducks, 6.5 % combination of both goats and sheep, 2.4 % cattle and 1.6 % pigs. The Northern Province reported the highest percentage of livestock followed by the Southern, Eastern and Western regions.

Access of farm families to agricultural production assets and services is limited. Only 22% of the 729440 farm families had access to both production and post-harvest processing facilities whilst the rest (78 %) did not have any such access. Specifically, 32.7%, 23.7 % and 17.5% of the households had access to drying floors, storage facilities and graters, respectively. An even lower percentage had access to rice mills (9.6 %), power tillers (8.9%), tractors (3.8 %), rice threshers (2.9%) and oil pressers (1.0%). At regional level, except for rice mills and drying floors to which more farmers had access in the North, the Southern region had more access to the other facilities than the Northern, Eastern and western regions.

A total of 690,434 of assorted assets were reportedly owned by household members country wide. Of these, radio was the most commonly owned asset and constituted about 55.1 % of the total assets, followed by 9.2 %, 7.5 %, 6.5 % and 5.2 % for cell phones, bicycles, televisions and stoves, respectively. The other assets, refrigerators, irons, computers, motor bikes, land phones and vehicles were the least owned and made up less than 5 % of the national share. Results at regional level showed that 48 % of all the assets owned were in the Western Area, followed by the Northern (19.5 %), Southern (17 %) and Eastern (15.5 %) regions. Noticeably at district level, the Western Area Urban district has more than forty percent (42.9 %) of the national share followed by Bo (9.9 %), Kenema (8.4 %), Port Loko (6.3 %), Western area Rural (5.0 %), Bombali (4.8 %) and Kono (4.0 %) districts. The other remaining districts together possessed less than 4 % share of the national assets.

Women's high participation in agriculture does not reflect their employment status in that they dominate the unpaid family and household workers categories compared to their men. Hence there is need to improve on women's access to both formal and informal education and also to make the working environment gender sensitive and friendly to facilitate their sustained participation in both paid and unpaid employment.

The severely depleted animal population in the country calls for an urgent need to acquire and restock more livestock of all species in order to establish viable population in the country. There is also need to rehabilitate the damaged livestock infrastructures, improve the moral of livestock staff through increased incentives and working conditions and manpower training, improve on veterinary services and financial assistance to livestock farmers.

The high percentage of farm families without access to production and post harvest facilities may have serious implications for improved agricultural productivity and the achievement of food security, which is a major development priority of the government. Availability of credit, foreign exchange to import spare agriculture machinery and spare parts, availability and reliability of supplies, availability of repair and maintenance services, availability of trained operators and training, provision of production and post-harvest equipment at affordable cost, provision of post-harvest structures are all needed to improve on agricultural productivity in the country.

The low percentage of household members who owned basic household assets, particularly in the provinces, is an indication of the level of poverty, which is pervasive in the country. Providing skills training, education and gainful employment, particularly in the provinces, could improve the incomes of people and affordability of household assets.

There is need for a well designed agricultural statistical system that will provide not only a better understanding of the present situation but also benchmarks from which to monitor socio-economic development over time. Such agricultural data should encompass all the agricultural sub-sectors and components.

SECTION 1

1.0 AGRICULTURE IN SIERRA LEONE

1.1 The Agricultural Sector

Sierra Leone covers 72,300 Km of which 5.4 million hectares (ha) are potentially cultivable land. The upland agro-ecology represents approximately 80 percent; and the rest are lowlands with potential for high crop yields under sound management practices. The lowlands comprise 690,000 ha inland swamps, 145,000 ha of naturally grassy drainage depressions (bolilands), 130,000 ha of river rain and 20,000 ha of mangrove swamps.

Sierra Leone's economy is largely based on two sectors: agriculture and mining. Both sectors have been declining over the last two decades. Presently, in spite of the vast resource endowment, the country is considered as one of the poorest with a GDP per capita income estimated at about US\$120 in 2003, which is less than half of what it was in 1980. Agriculture is the sector in the economy that was accounting for almost half of GDP in 1993/94, and it still contributes about 47 percent. In spite of that, it employs the highest proportion of the economically active labour force (15-64 years) in the country.

The crop sub-sector, with rice dominating, contributes about 75 percent of agricultural GDP. Annual per capita consumption of rice is amongst the highest in sub-Saharan Africa. It is estimated that domestic production of rice currently accounts for up to 60 percent of the total annual national requirement for rice. The fisheries sub-sector contributes 21 percent and livestock represents 4 percent of GDP. The contribution of forestry to the agricultural sector's GDP has varied between 9 and 13 percent since 1984/85. Over 90 percent of the domestic energy needs for heating and cooking are provided by fuel wood.

Tree crops plantations, which are found mostly in the Eastern part of the country, constitute the bulk of agricultural exports and of the domestic palm oil supply. The main export crops are coffee, cocoa, kola nut and oil palm. Present yields are low because of lack of maintenance.

Fuel wood and charcoal production is the most important forestry activity and provides a supplementary source of income for most farmers. The uncontrolled logging practice has a negative impact on the remaining forest reserves.

Mainly semi-nomadic herders in the Northern part of the country keep livestock. Birth rates of livestock are low (45 percent), mortality rate is high and off take is only 7 percent, due mainly to feed deficiencies and uncontrolled parasites and diseases. Poultry are the mostly widely owned form of livestock and also the most numerous. Pigs are the least widely owned but nevertheless they are widely distributed and many are found in urban areas. The country's livestock population has been very severely depleted during the conflict period and many years will be required to rebuild stock numbers to pre-war levels.

Fisheries are dominated by artisanal marine capture systems, and by small-scale fishing in inland waters. Foreign fleets mainly do industrial fishing. Total catch is currently estimated at 65,000 metric tons with artisanal production accounting for up to 70 percent.

1.2 Constraints and Opportunities.

The Agricultural Sector Review (ASR) identified a number of weaknesses and constraints as well as strengths and opportunities for the development of the agricultural sector. Elements of a development strategy that might address the constraints and opportunities were also delineated.

The weaknesses and constraints the agriculture sector is faced with are as follows: increased pressures and threats to macroeconomic stability; limited possibilities for expansion of annual crop area; declining soil fertility and low crop productivity; inadequate research system; poor extension service; poor and inadequate rural infrastructure and lack of agricultural finance.

The strengths and opportunities the agriculture sector has is that it has a currently favorable macroeconomic environment; high political commitment to agricultural development; the country has comparative advantage in domestic production of rice for import substitution; agricultural growth rates for economic development and poverty alleviation are not excessive; suitable agro-ecologic conditions exist; improved organization and increased empowerment of farmers and stakeholders and a limited stock of improved technologies exists.

1.3 Strategy for Growth

Despite the constraints highlighted above, the potential for agriculture sector growth is substantial in Sierra Leone, given the favourable population/Land ratio, abundant and diversified resources, and present low yields for almost all the crops (hence the potential for yield increase is great). These strategies aim at the following:

- (i) From the demand side, a growing population in Sierra Leone and neighboring countries could create demand for locally produced food, a world market for traditional exports is available with a niche for organic produce, and potential untapped demand exist outside the ECOWAS sub-region for tropical fruits and transformed products.
- (ii) Sierra Leone will have to rely on factors such as effective extension advice, research for higher yields, and the existence of an appropriate rural infrastructure.
- (iii) Environmental degradation is also a cause for concern in highly populated areas, like the Western Area, and in the mining areas of the Eastern and Southern Provinces.
- (iv) There is an urgent need to develop community-based organizations, which will form the basis of effective grassroots private sector.

In the light of the above, GOSL's draft policy statement sets out a framework for support to agriculture with the objectives of:

- a) Increased and diversified domestic production of food, with a view of achieving food security in the medium to long- term;
 - b) Increased agricultural productivity, output, rural incomes and employment, while ensuring adequate protection of the environment;
 - c) Balanced regional agricultural growth and equitable distribution of income;
- and
- d) Maximized foreign exchange earnings from agriculture.

1.4 Developmental Proposals

The development proposal aims at achieving the following: implementing a Right to Food, and Food Safety Net Programme; improving rural/village infrastructure; commercialization of agriculture and export promotion; effective provision of agricultural services; research; extension services; data collection and market information systems; rural finance; human resource development-empowering the people; expansion and diversification of crop and livestock production to ensure food security and sustainable natural resource management (Land, Forestry, and Fisheries).

1.5 Setting Medium Term Priorities

GOSL and its donor partners need to set priorities in selecting major programmes/projects for implementation in the short to medium term. One of the major programme/project selection criteria should be GOSL's priority. It is envisaged that specific projects, in context of the priorities highlighted above, will be formulated as per the following additional criteria:

Technical Feasibility and sustainability; Financial and economic sustainability and the Ability to implement the project in the context of ongoing programmes.

SECTION 2

2.0 AGRICULTURAL PRODUCTION, OWNERSHIP AND ASSETS IN SIERRA LEONE

2.1 Data Source and Analysis

The data collected in the 2004 population and housing census was analysed using different variables and their measurements as was asked in the questionnaire.

2.1.1 Variables and their Measurement

2.1.1.1 Economic Activities

The agricultural, manufacturing and mining and services are the major economic activities pursued by the people of Sierra Leone. Of these, majority of the labour force are in agriculture. The agricultural sector is, however, further divided into the crop, livestock, fishery and forestry sub-sectors. To this end the report analyzed the level of involvement of household members in these sub-sectors.

The variable measured the size and activity rates of the labor force by industry i.e. the activity of the establishment or enterprise in which the household is engaged in by type of activity and status. Considering the international standard of those in the active labour force, the age cut off for the analysis is between 15-64 years. Since this chapter is on agriculture, only agricultural activities were identified for discussion. Information on employment status and operation of farms as well as livestock, poultry, hunting, forestry and fishing were also obtained and disaggregated by sex.

2.1.1.2 Number of Farm Families Cultivating Various Food and Cash Crops

This variable measured the number of farm families cultivating each of the seven food crops-upland rice, swamp rice, cassava, sweet potatoes, maize, ground-nut and vegetable- and four cash crops- cocoa, coffee, citrus and oil palm. Upland and Swamp rice were grouped as one for analysis because the 10% analysis recorded zero for swamp rice cultivation for some districts which in reality is incorrect. Either the respondents did not quite differentiate between these two production systems or the enumerators may have entered the responses wrongly. Percentages were used to present and discuss the results.

2.1.1.3 Acreage Cultivated to Various Food and Cash Crops

The area cultivated under each of the crops was recorded in acres and later converted to hectares by dividing by 2.5. The average areas as well as percentages of areas cultivated per crop were calculated.

2.1.1.4 Number of Livestock Reared by Farm Families

Livestock in the Census comprise cattle, sheep, goats, chicken, ducks and pigs. The number of each of this livestock owned by farm families was recorded. However, sheep and goats were grouped together as one. This is because either the respondents did not differentiate or understand the difference between sheep and goat or the wrong entries were made by the enumerators during field work. The average number of herds was calculated and percent contribution to the total national herd.

2.1.1.5 Access to Agricultural Production Resources

Farm families were asked to indicate whether they had access to agricultural production facilities- power-tillers, tractors, drying floors, stores, rice mills and threshers. Responses were converted to percentages for discussion.

2.1.1.6 Ownership of Household Assets

Household members were asked whether they owned basic household assets such as television, radio, vehicle, bicycle, motor bikes, land phone and mobile phone and to indicate the number owned. Like access to agricultural production resources, responses were converted to percentages.

Data analysis was done at the national, regional and district levels. Tables, graphs and pie charts were use to present the data.

2.2 RESULTS

2.2.1 Economic Activities

Twenty-one economic activities were reported for the 2004 population and housing census but six activities were recorded for agriculture. The twenty-one economic activities ranged from agriculture, to mining, manufacturing, construction, trade/repair and services. A total of 1,724,844 people were engaged in these activities. Of these, 1,144,439 (66.4 %) were in agriculture, followed by trade/repair and community services. The above data confirms the assertion that Sierra Leone is an agrarian economy, with the majority of the labour found in the agriculture sector.

Table 1 below depicts that of the 1,144,439 people involved in agricultural activities in Sierra Leone, 1,082,834 (94.6%) owned or operate a crop farm, 46042 (4.0 %) are involved in fishing activities, 6850 (0.6%) keep livestock, 5882 (0.5%) were in forestry, 1689 (0.1%) in poultry production while 1142 are engaged in hunting. From the above, it can be concluded that crop farming is the most common activity engaged in by farmers in the country. Very few people (less than 5%) are engaged in livestock, poultry, hunting, forestry and fishing.

Table 1: Sierra Leone's Agriculturally Active Population by Gender

Activity	Economically Active Population by Sex			Percentage by Sex		
	Male	Female	Total	% Male	% Female	% Total
Crop Farming	508421	574413	1082834	47.0	53.0	94.6
Livestock	3637	3213	6850	53.1	46.9	0.6
Poultry	806	883	1689	47.7	52.3	0.1
Hunting	699	443	1142	61.2	38.8	0.1
Forestry	3849	2033	5882	65.4	34.6	0.5
Fishing	29832	16210	46042	64.8	35.2	4.0
	547244	597195	1144439	47.8	52.2	100.0

Source: SSL, Population and Housing Census 2004

The analysis was taken further by determining which household members were responsible for each of these specific activities in relation to their employment status (See Table 2 below). The analysis shows that household members of all employment categories are involved in agriculture. This is particularly so for the crop sub-sector, where the majority (between 73-97%) of the household members whether employed, self employed, unpaid farm workers, looking for work, not working and not looking for work, household workers, students and the retired are engaged in crop farming. Paid employees are probably those employed by the Ministry of Agriculture and agriculture related Non-Governmental Organizations, while the self employed, unpaid farm workers and retired persons are made up of subsistence farmers.

Table 2: Percentage Distribution of Economic Activity by Employment Status in Sierra Leone

Activity	EMPLOYMENT STATUS								
	Paid Employee	Self Employed	Unpaid Farm Worker	Looking for Work	Not Working Not Look	HH Work	Student	Retired	Others
Crop Farming	72.6	94.4	96.8	93.2	92.3	95.8	92.9	80.0	92.3
Livestock	3.8	0.5	0.5	0.5	1.2	0.9	1.0	1.8	2.4
Poultry	1.6	0.1	0.2	1.2	1.0	0.3	0.0	0.0	0.8
Hunting	1.2	0.1	0.1	0.5	0.9	0.1	1.6	1.8	0.4
Forestry	5.9	0.5	0.3	0.7	2.1	0.3	0.8	7.3	0.8
Fishing	14.8	4.4	2.1	3.8	2.6	2.5	3.7	9.1	3.3
	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

Source: SSL, Population and Housing Census 2004

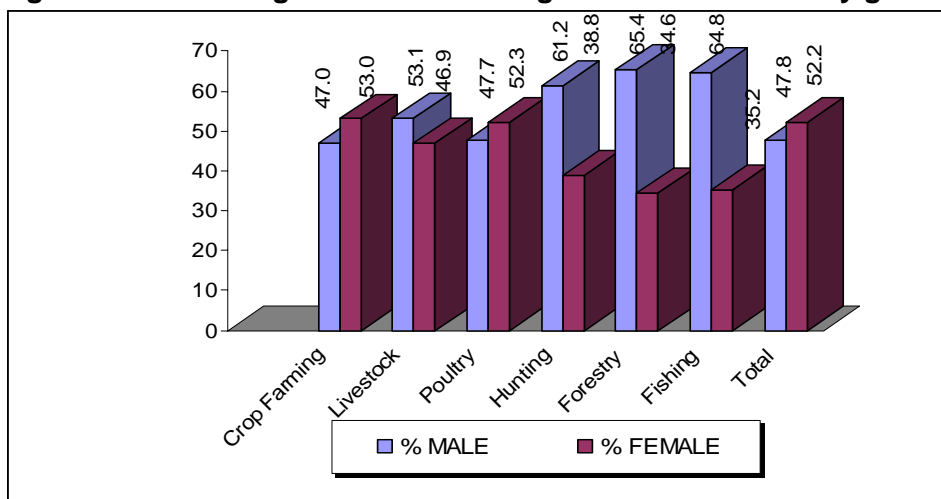
2.2.1.1 Economic Activity by Gender in Sierra Leone

A gender division of labour for agricultural activities and enterprises exist in Sierra Leone. This division, however, varies from place to place and from culture to culture. Crop farming, backyard poultry (chicken and ducks), fish processing and marketing and gathering of fuel wood, vegetables, herbs, fruits and nuts from forests are mostly dominated by females, while cattle, small ruminants (goat and sheep), hunting and logging for timber, fuel wood and charcoal are the preserve of males. These gender

roles are, however, reported to be changing as a result of social, economic, technological and political factors.

Given the above, the data was disaggregated by sex with a view to substantiate or refute the above claims. As shown in Figure 1 below, overall more women (52.2 %) than men (47.8 %) were involved in agriculture. This tends to agree with the notion that agriculture is a female dominated activity. Specifically, women dominated the crop (53.0 %) and poultry sub-sectors (52.3 %), while the men dominated the livestock (53.1%), hunting (61.2 %), forestry (65.4%) and fishery sub-sectors (64.8%). Even though women are the major fish processors and gatherers of fuel wood, fruits, vegetables, nuts and herbs from forests, these activities may not have been properly captured in the census, hence women’s low participation in forestry and fishing and their overall. Increased migration of skilled and semi-skilled male labour from agriculture to non-agriculture related jobs, rural to urban migration and the war which greatly decimated the male population, and increased disability among males are likely factors for the increased participation of women, especially in the crop sub-sector.

Figure 1: Percentage distribution of agricultural activities by gender



Regional analysis also reveals similar pattern of gender division of responsibility for crop farming and poultry in which women dominated. However, more women in the Eastern and Southern Provinces, unlike their counterparts in the Northern Province and Western Area, were involved in the livestock and poultry sub-sectors than men. Hunting (78.4 %, 62.1 %, 58.5 %, 58.8 %), forestry (81.2 %, 59.3 %, 67.1 %, 63.3 %) and fishing (77.0 %, 60.9 %, 62.7 %, 68.3 %) activities in the regions are associated mainly with males (See annexes 8.2.1d, 8.2.1e, 8.2.1f and 8.2.1g).

District level analysis show that women dominated crop farming in Bombali, Kambia, Koinadugu, Port Loko, Tonkolili, Bo, Bonthe and Moyamba Districts and Western Area compared to their male counterparts. For livestock, Kailahun, Kenema, Port Loko, Bo, Bonthe and Pujehun had more women involved in this sector than men. Women in Kailahun, Kenema, Bombali, Kambia, Koinadugu, Portloko, Tonkolili, Bo, Bonthe and Pujehun participated more in the poultry sub-sector compared to men. Except for Bombali District, in which women slightly dominate in forestry, livestock,

hunting and fishing remain male-dominated enterprises across districts (See annex 8.2.1k).

2.2.2 Distribution of Agricultural Activities by Status and Gender in Sierra Leone

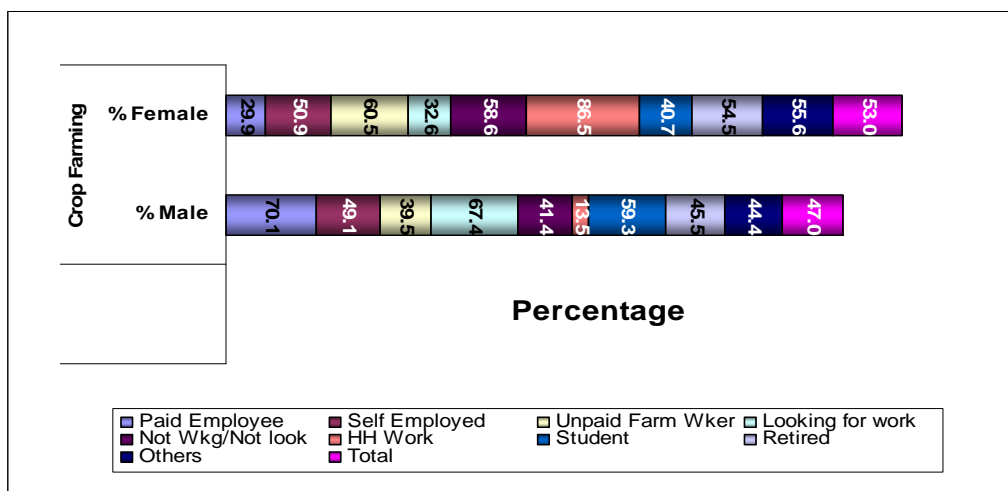
The labour sector in Sierra Leone has been described as a male dominated sector in which males dominate the paid and self-employed sectors, while women dominate the unpaid family and household labour sectors. Exclusion of women’s work in national accounts, low share of women in non-agricultural sector, low wages for women, gender unfriendly workplaces and low prospects for promotion and career developments and women’s low educational levels have all been advanced for women’s low participation in formal and paid employment.

Data on the distribution of agricultural activities by status and gender confirms the above observations given the high proportion of males that fall in the employed and self employed categories. For all the sub-sectors, more women than men accounted for the unpaid farm and household workers.

For crop farming specifically, 70.1 % of males and 29.9 % females are paid employees (see Figure 2 below). Amongst those that are self employed, 50.9 % were males and 49.1 % females. On the contrary, the result shows that 60.5 % of the females are unpaid farm workers compared to 39.5 % for males. Males are more likely to be available for work or looking for work than females given their less domestic and childcare responsibilities. This observation was further substantiated by the result, which revealed that 67.4 % of men involved in crop farming were those looking for work. The corresponding figure for women is 32.6%.

Whilst the male proportion declined for household work, more females engaged themselves in household work in agricultural dominated zones (86.5 %). Male students and retired people worked mainly in the crop sub-sector. Specifically, 59.3 % of the male students were actively involved in crop farming than their female counterparts (40.7 %). Of the retired people actively involved in crop farming, over 50 % were males and 45.5 % females.

Figure 2: Percentage distribution of crop farming by status and gender



The livestock industry in Sierra Leone has a lot of untapped potential. Before the civil war in 1991, livestock contributed about 2.7 percent to the GDP. Thus livestock was an important sector in the economy of the country. However, the sector is at lowest ebb after the war that affected every part of the country and resulted in near total decimation of the country's livestock population.

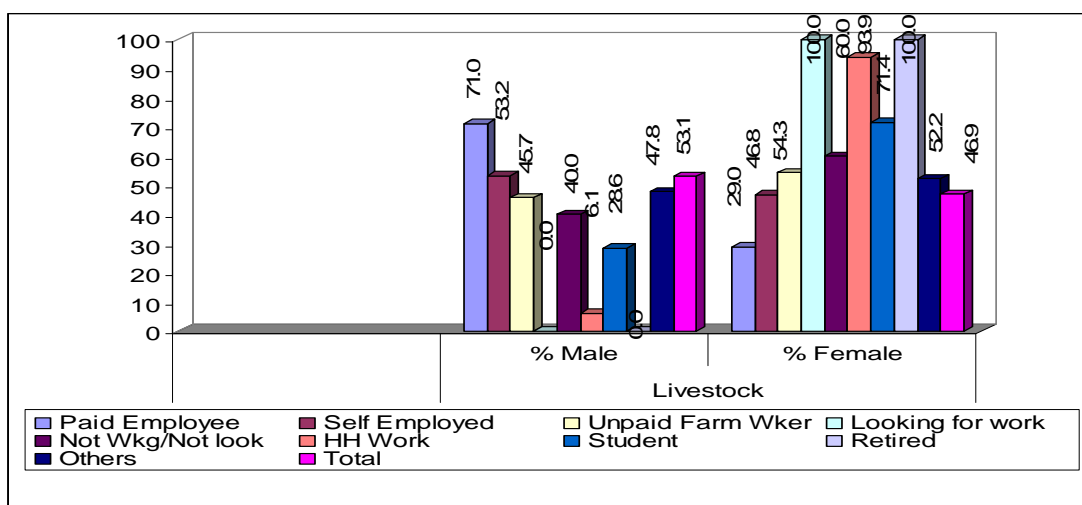
Livestock farming is very common in the North (Bombali and Koinadugu districts) and North-East (Kono district) of the country and few niches in the south of the country. These areas have natural vegetations of extensive grasslands, interspersed with leguminous weeds and a relatively lower population density and a less humid climate that make these areas ideal for livestock rearing.

Besides the destruction of livestock populations due to the war, the commercial rearing and processing of facilities were abandoned and most of them are in a state of disused. Commercial pig and poultry was abandoned as the war progressed. Consequently the livestock industry is in poor state and will require major financial support in order to get it back to its feet. In addition to the war, the sector has suffered from low priority for investment, poor institutional framework and inadequate cadres at both technical and professional staff levels to provide the requisite support to the industry.

A gender division of responsibility exists in the livestock industry. In many female-headed households, a small ruminant rearing is the main economic activity, while men are mainly responsible for cattle management. Despite this, like in crop farming, men tend to dominate the sector as paid workers compared to women.

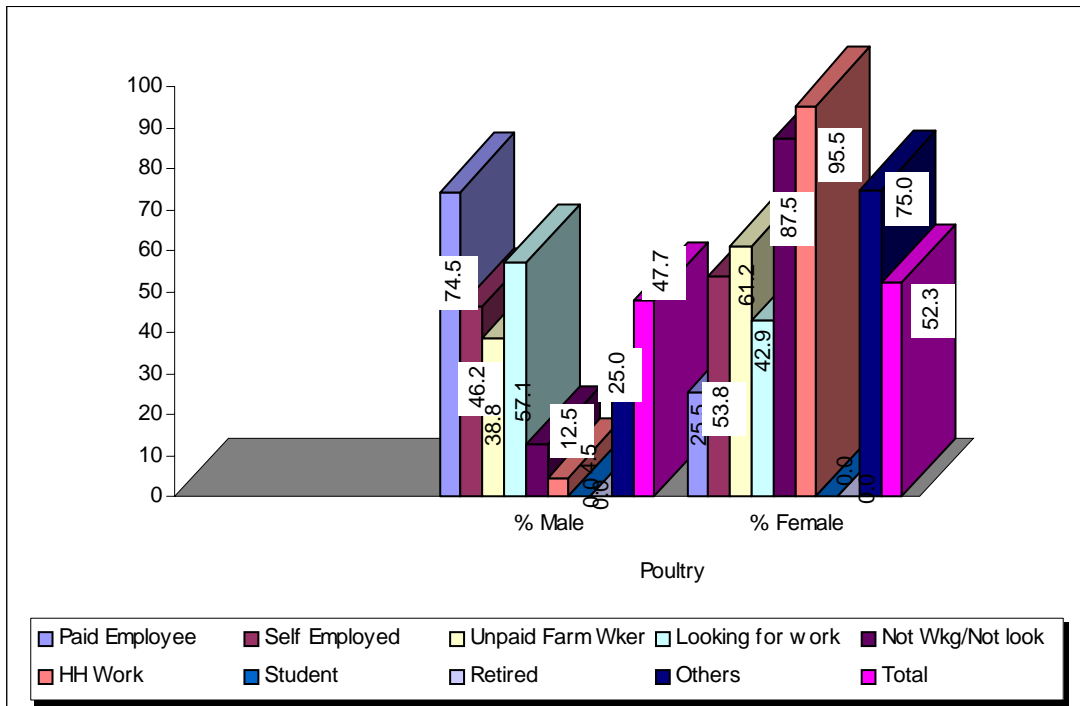
The data illustrated below in Figure 3 shows that, like crop farming, there were more paid (71.0%) and self employed (53.2 %) males in the livestock industry than females (29.0 % and 46.8 %, respectively). Quite contrary to that, 54.3 % of the population that are unpaid farm workers are females. Females also dominated the other employment status of those looking for work and not looking for work, household work, students and the retired. The above data thus reaffirm the above assertion of male dominance in paid employment for the sector.

Figure 3: Percentage distribution of livestock farmers by status and gender



Poultry is generally viewed as a woman's enterprise in Sierra Leone. The result in Figure 4 show that 52.3 % of the population involved in poultry are females, who domesticate local chickens and ducks at the backyard largely for food, with a few oriented towards commercial purposes. The remaining national share of 47.1 % poultry activities manned by males is largely for commercial purposes. Only male paid employees and those males looking for work (74.5 % and 57.1 %, respectively) out-numbered those of the females.

Figure 4: Percentage distribution of poultry farmers by employment status and by gender



The sub-sectors of hunting (61.2%), forestry (85.6 %) and fishing (64.8%), according to the data in Figures 5, 6, and 7 below are all dominated by males. According to employment status, except for household work, which was accounted for largely by females, all the other economic status categories were dominated by males.

Figure 5: Percentage Distribution of hunting activity by status and by gender in Sierra Leone

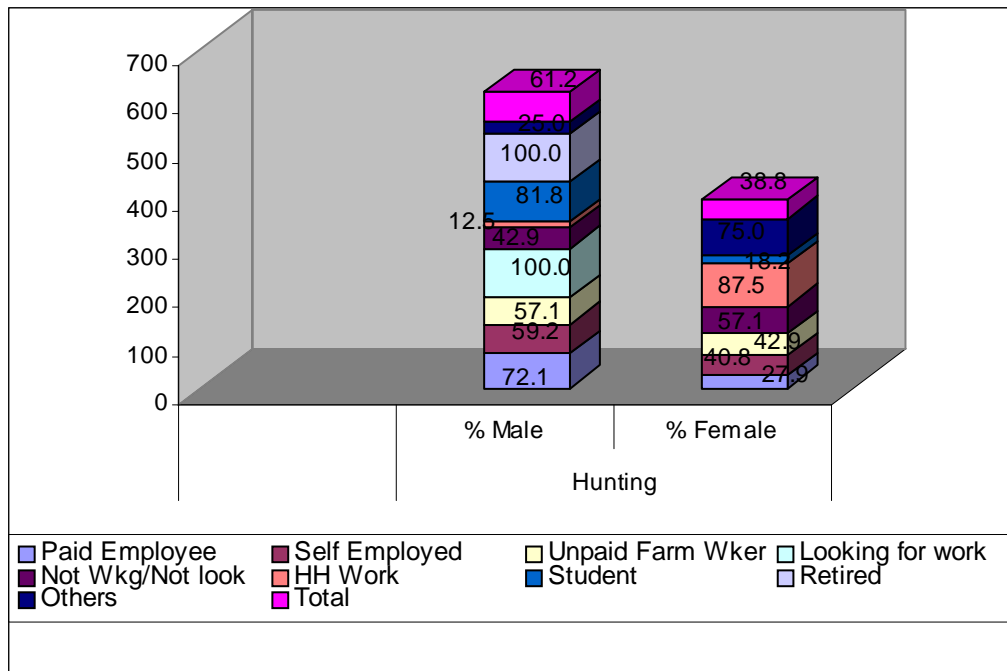
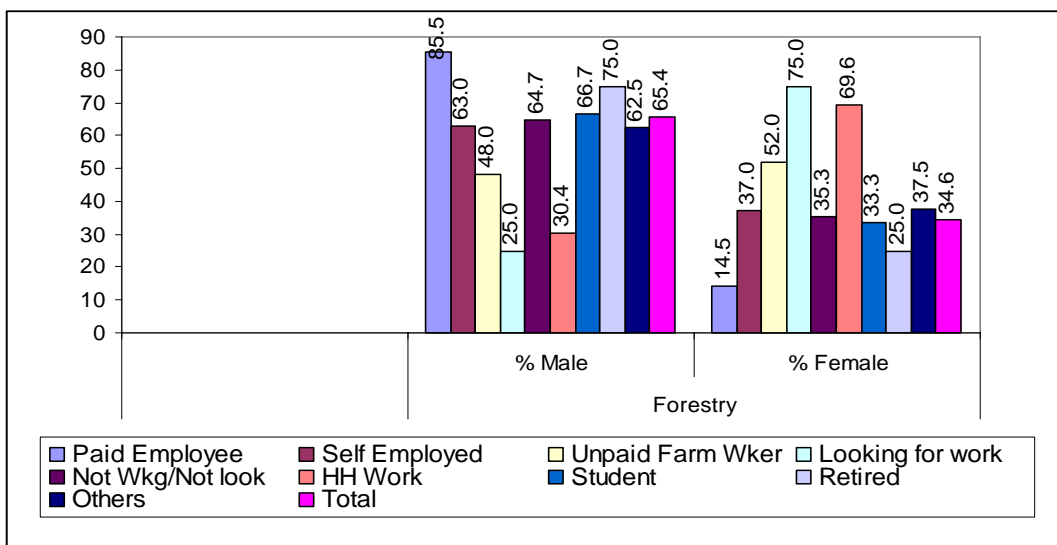
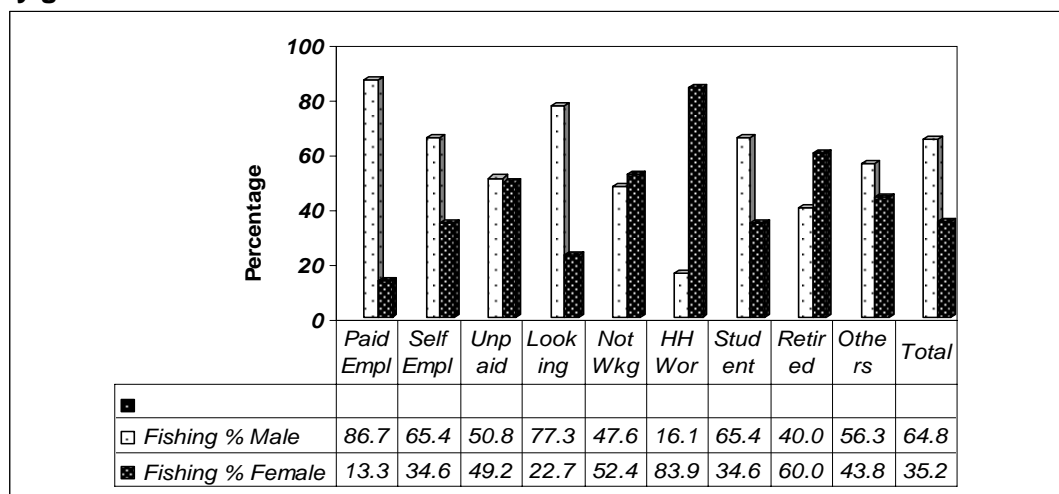


Figure 6: Percentage Distribution of forestry Activities status and by gender in Sierra Leone



Source: SSL, Population and Housing Census 2004

Figure7: Percentage Distribution of people involved in fishing by Employment status and by gender in Sierra Leone



Source: SSL, Population and Housing Census 2004

2.2.2.1 Economic activity by Status and Gender in the Regions and Districts

Across the regions, except for the Eastern region in which males (50.9 %) dominate cropping activities, more females than males participated in this sub sector in the Northern (55.7 %), Western (52.2 %) and the Southern (52.7 %) regions.

Despite the generally high female participation across regions, Annexes (8.2.1d- g) indicates that more males than females dominated the paid categories. Males dominated the self-employed in the Eastern (53.5 %) and Southern (51.2 %) regions while the females were in the majority in the Northern region (53.3 %) and Western Areas (53.0 %). The unpaid farm work and household workers were largely females across regions, while there were more male than female students and the retired in crop farming.

Analysis of livestock activities by status and gender in the regions showed although poultry production is dominated by females, in all the regions there are more paid male employees than females. Except for the Western Area, there were more self-employed females than males in the Eastern (55.5 %), Northern (63.3%) and Southern (57.6 %) Provinces. Women also dominated the other employment categories of unpaid farm and farm workers, students and the retired.

In hunting, forestry and fishing activities across the regions, males dominated the paid, self-employed, student and the retired categories whilst females dominated the category of household workers, unpaid farm worker.

As in the regions, males dominated the paid, self-employed, student and the retired categories whilst females dominated the categories of household workers and unpaid farm worker in almost all the districts.

SECTION 3

3.0 CROPPING ACTIVITIES AND ACREAGE CULTIVATED UNDER VARIOUS FOOD AND CASH CROPS IN SIERRA LEONE.

3.1 Number of Farm Families

Table 3 below gives percent distribution of farm families by region and district. The table depicts that there are 729,440 farming households in Sierra Leone out of a total of 819,845 normal households. Farming households constitute about 89 percent of households in the country. From the above data, it can be concluded that the population of Sierra Leone is predominantly made up of farmers.

On a regional basis, slightly over a third (32.8%) of these farm families are from the Northern province, followed by the Eastern (25.9%) and Southern (22.9%) and Western (18.4%) regions.

The data shows that, Western Area Urban (14.3 %), Bo (9.5%), Kenema (9.4%), Kailahun (8.8%), Port Loko (8.2%), Kono (7.7%) and Bombali (7.4%) accounted for most of these farm families. The relatively high percentage of farm families reported in the Western Area is surprising. It may be that respondents could not differentiate between backyard and or street gardening (which most people in Greater Freetown engage in) and farming.

Table 3: Percent distribution of farm families by region and district in Sierra Leone

LOCALITY	FARMING HOUSEHOLDS	%
NATIONAL	729440	100
EASTERN REGION	188656	25.9
Kailahun	63942	8.8
Kenema	68465	9.4
Kono	56249	7.7
NORTHERN REGION	239182	32.8
Bombali	54102	7.4
Kambia	35099	4.8
Koinadugu	41259	5.7
Port Loko	59844	8.2
Tonkolili	48878	6.7
SOUTHERN REGION	167227	22.9
Bo	69158	9.5
Bonthe	22672	3.1
Moyamba	40238	5.5
Pujehun	35159	4.8
WESTERN AREA	134375	18.4
Western Area Rural	27090	3.7
Western Area Urban	107285	14.7

Source: SSL, Population and Housing Census 2004

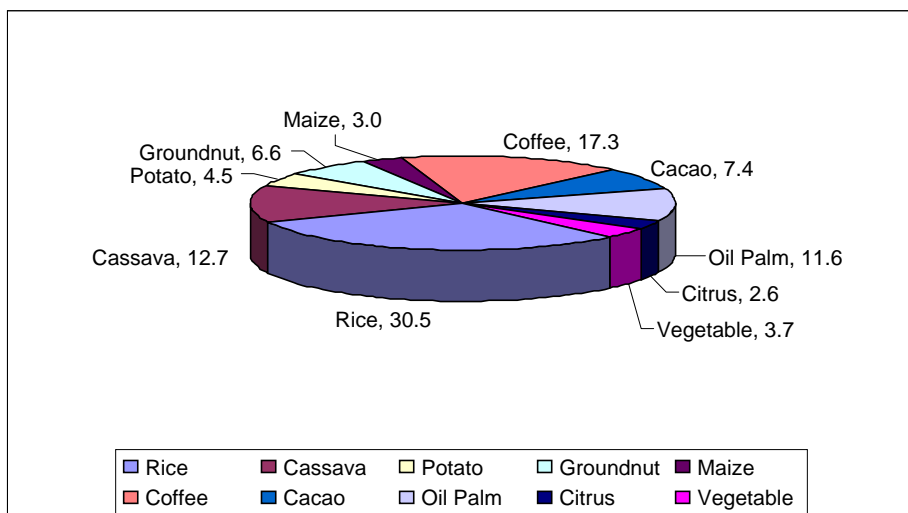
3.2. Acreage cultivated under various food and cash crops

Sierra Leone has a total of 5,360,000ha of available arable land. This constitutes about 74 percent of the total land area in the country (UNDP/FAO 1979). The data in Figure 8 on acreage cultivated to the various crops show that a total of 1,995,830.4 hectares were cultivated in 2004 with an average of 2.7 ha. This translates into 35.6 percent of land under cultivation. Thus there is 38.4 percent of arable land currently not under cultivation. From this data, it can be concluded that availability of arable land for farming may not be a serious production constraint. Rather security of land tenure, availability of labour, accessibility to capital and market, availability of relevant agricultural technology including seeds, planting materials and agro-chemicals, poor output price conditions, absence of appropriate infrastructure and poor irrigation facilities may limit what and how much land a farmer could cultivate.

Data analysis according to the acreages under the various crops indicated that 609707.6 ha (30.5%) of land was cultivated to upland and inland swamp rice, 344548.0 ha (17.3%) to

coffee, 254410 (12.7%) to cassava, 232012 ha (11.6%) to oil palm, 148665.2 (7.4%) to cocoa, 131037.6ha (6.6%) to groundnut, 89719.2 (4.5%) to sweet potato, 73570.0 (3.7%) to vegetable, 60238.0 (3.0%) to Maize and 51922.8 (2.7%) to citrus. Since rice is the staple of the country, it is not surprising that a third of all land under cultivation was to rice.

Figure 8: Percentage distribution of crops by acreage (Ha)

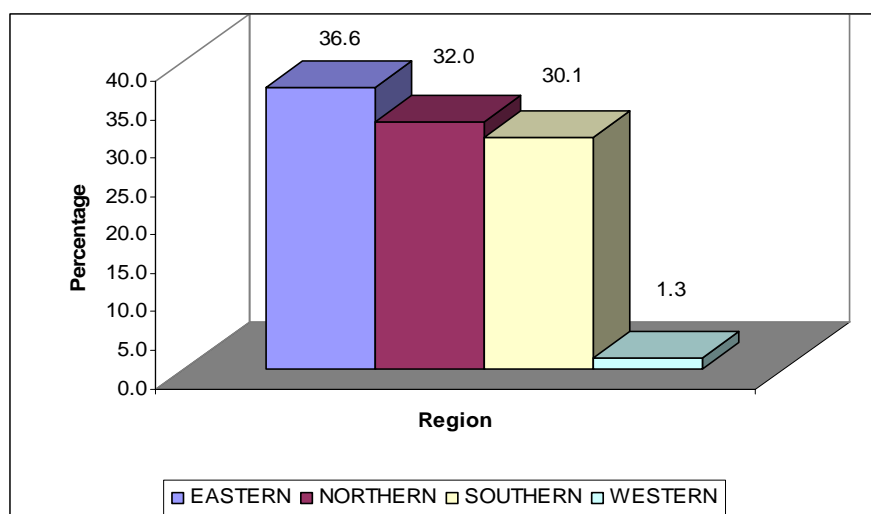


Source: SSL, Population and Housing Census 2004

However, these figures are higher than those reported in the Vulnerability Analysis and Mapping (2006) Report in which 517187 ha, 15865 ha, 134404 ha, 18304ha, 55660 ha, for rice, maize, cassava, sweet potato and ground-nut were cultivated for the 2004/2005 and 329029 ha, 20828 ha, 99484 ha, 11764 ha and 34486 ha, respectively for the 2003/2004 cropping seasons. What this means is that the area cultivated under these crops have substantially increased, with the bulk of the increase accounted for by rice, cassava, groundnut and sweet potato.

Figure 9 presents the percentage distribution of area cultivated by region. Analysis indicated that although there were more farm families in the Northern Province, yet Eastern Province had the highest percentage of land under cultivation-730788.4ha (36.6%), followed by the Northern-639556.8ha (32.0%), Southern-599802.4ha (30.1%) Provinces and Western Area-25682.2 ha (13%). The relatively high percentage of farm families in the Western Area did not, however, reflect in the acreage cultivated, which further justifies the explanation that in reality there may be fewer households in farming than was reported. Most of the inhabitants of Western Area work either in the offices or are traders.

Figure 9: Percentage distribution of area cultivated by region



Source: SSL, Population and Housing Census 2004

Further analysis reveals that on regional and crop basis, more land was put under cultivation for rice-266381.6ha (43.7%), cassava-99917.2ha (39.3%), sweet potato-42119.2ha (46.9%), groundnut-73684.8 (56.2%), maize-26419.2ha (43.9%), citrus-18741.2 (36.1%) and vegetable-30784.8 (41.8%) in the Northern region, where there are large expanse of *bolilands* and mangrove swamps most suitable to grain, legume and root and tuber cultivation. In the Eastern Province, it was rice-176308.4ha (28.9%), coffee-234011.2ha (67.9%), cocoa-116303.6ha (78.2%), oil palm-66068.4ha (28.5%), citrus-16089.4ha (31.0%) and vegetables-20732.8ha (28.2%) that accounted for the high acreage cultivated (Tables 4 and 5). The climatic condition in the Eastern Province, which is characterised by high rainfall and temperatures, provide conducive environment for coffee, cocoa and oil palm production. The existence of large Inland valley swamps in the Eastern Province is also suitable for rice production. That for the Southern Province was rice-160617.2 (26.3%), cassava-10236.0 (40.2%), maize-20241.6ha (33.6%), oil palm-104822.8ha (45.2%) and citrus-14936.4 (28.8%). The Southern region, especially Moyamba and Pujehun districts, have large stretches of riverine grassland, which is most suitable for rice production. Large oil palm plantations are also found in Matru Jong in the Bonthe and Saahan Malen in the Pujehun Districts (Tables 6 and 7).

Tables 6 and 7 below give district level data on the acreages under the various food crops captured in the Census. District level analysis revealed that Kailahun (13.4%),

Kenema (12.3 %), Kono (10.9 %), Bo (10.4 %), Moyamba (9.0 %) and both Koinadugu and Pujehun (7.5 %) districts accounted for most of the land cultivated.

Rice is the staple crop for Sierra Leone and cultivated everywhere in the country. It is grown in five main ecologies-upland, boliland, riverine grassland, inland valley and mangrove swamps. It is not surprising that it occupied slightly over a third of the total land cultivated to crops in the country. On a district basis, the data above indicate that Portloko-69016.0ha (11.3%), Kailahun-66841.2ha (11.0 %) and Moyamba-63378.0ha (10.4 %) cultivated the highest acreage of rice followed by Koinadugu-57004.8ha (9.3%), Kenema-55641.2ha (9.1%), Bo-54268.4ha (8.9 %), Kono-53826.0ha (8.8 %) and Tonkolili-48828.8ha (8.0%) The Western Area cultivated the least acreage although it reported a high percentage of farm families, especially the Western Area Urban -107285 (14.7%) involved in farming.

Cassava is the second largest staple food after Rice in Sierra Leone and is the first most important root and tuber crop in the country. It is cultivated every where in the country in both upland and inland valley swamps. The tubers are high in carbohydrate and are eaten either raw or in several processed forms such as *gari* and *fufu*. Its leaves are high in protein and vitamins and used as sauce for rice, our staple food.

At regional level, the highest contribution to total acreage for cassava came from the Southern Province with 40.2%, followed by North and East with 39.3% and 18.8 % respectively (see table 5 below). Acreage under cassava in the Western Region is infinitesimal recording only 1.7 % of national production. Across the districts, Moyamba (14.4%), Port Loko (12.0 %) and Bo (10.5 %) accounted for most of the cropped area followed by Bonthe (7.8%), Kambia and Pujehun (7.6 %), Bombali (7.5 %), Kono (6.9%) and Kenema district. The Western Areas combined show a maximum of 1.3 % of the total cropped area (see table 7 below).

Next in importance to cassava is sweet potato. Like cassava, both the tubers and leaves are high in carbohydrate and proteins and vitamins, respectively. It is grown throughout the country. Unlike cassava, the highest acreage under sweet potato came from the Northern Province accounting for about 46.9 % of the total cultivated area followed by the South and East with 27.8% and 22.7% respectively. Across the districts, the highest acreage was in Port Loko (11.8 %) followed by Koinadugu (10.7%), Moyamba (9.9 %), Kono (9.8 %), Kambia (9.7%) and Bombali (8.9%).

Groundnut production is assuming increasing importance, being cropped across the country as a cash earner. According to the agricultural sector review report, it is reported that it has engaged about half the rice area in the upland (125,000). The recent introduction of improved varieties in the country greatly accounts for increase in cropped area.

At regional level, it is widely grown in the North (56.2 %) followed by the South (26.9%), East (15.3%) and the West (1.6 %) respectively. Across the district, Koinadugu (15.4 %), Bombali (13.9 %) and Moyamba (12.1%) are among the largest cultivators (see table 6 and 7).

Maize is grown as a rain-fed or dry season crop in rice areas. It is often grown as pure stand after rice in the inland valley swamp but is also grown as a backyard crop. It is eaten green with a small proportion used as animal feed. New varieties that are short duration and high yielding have been introduced, which has facilitated the raising of two crops upland and one crop in the lowland.

The analysis of maize production also revealed that Northern Province (43.9 %) cropped the largest area for maize, followed by the South (33.6 %), East (21.3 %) and the Western area (1.2 %) respectively. Across the districts, Moyamba district (19.5 %) reported the highest acreage followed by Koinadugu (12.0 %), Kono (9.8 %) and Tonkolili (9.3 %). Hence the least cropped areas are Bonthe and Western Area Rural and Urban districts.

For coffee and cacao cultivation, the analysis shows that these two crops are predominantly grown in the Eastern region of the country (67.9 % and 78.2 %) followed by the south and North respectively. At district level, Kailahun (23.3 % and 35.9 %), Kenema (22.8% and 24.5%), Kono (21.9% and 17.9%), Bo (10.9% and 7.8%) and Pujehun (10.4% and 7.8 %) cultivated these crops the largest.

The results of oil palm cultivation show that although oil palm is cultivated in all districts in the country, including Western Area, the Southern Region (45.2 %) grew this crop more than any other region followed by the East (26.5 %) and the North (25.1%). At district level, Bo (19.8 %), Kenema (13.8 %), Pujehun (12.6 %) and Kailahun (11.2 %) grow oil palm more than the other districts

Citrus is widely grown in the Northern Province followed by the East and South and Western regions respectively. Across districts, citrus is widely grown in the Kenema, Bo, Moyamba, Kambia and Kono districts respectively.

Vegetables, especially exotic, which are grown mainly for cash and sold to the urban population, is an emerging economic activity that farming households especially in urban and big towns are embarking on to sustain their livelihood. Most vegetable crops are cultivated and harvested all year round and provide important sources of cash and food for families. The data shows Kono, Moyamba, Kailahun, Bombali, Koinadugu, Port Loko and Kambia to be among the districts with the largest acreage under vegetable production. Bonthe, Western Area Rural and Urban grow less of vegetables.

Table 4: Area cultivated by crop and by region (ha)

REGION	Farm HH'S	AREA CULTIVATED										
		Rice	Cassava	Potato	G/nut	Maize	Coffee	Cocoa	Oil Palm	Citrus	Veg.	Total(Ha)
EASTERN	188656	176308.4	47954	20410.4	20053.2	12857.2	234011.2	116303.6	66068.4	16089.2	20732.8	730788.4
NORTHERN	239182	266381.6	99917.2	42119.2	73684.8	26419.2	18378.4	4799.6	58330.8	18741.2	30784.8	639556.8
SOUTHERN	167227	160617.2	102326	24907.6	35184	20241.6	90568	26624	104822.8	14936.4	19574.8	599802.4
WESTERN	134375	6400.4	4212.8	2282	2115.6	720	1590.4	938	2790	2156	2477.6	25682.8
	729440	609707.6	254410	89719.2	131037.6	60238	344548	148665.2	232012	51922.8	73570	1995830.4

Table 5: Percent distribution of area cultivate (Ha)

REGION	Farm HH'S	AREA CULTIVATED										
		Rice	Cassava	Potato	G/nut	Maize	Coffee	Cacao	Oil Palm	Citrus	Veg.	Total %
EASTERN	25.9	28.9	18.8	22.7	15.3	21.3	67.9	78.2	28.5	31.0	28.2	36.6
NORTHERN	32.8	43.7	39.3	46.9	56.2	43.9	5.3	3.2	25.1	36.1	41.8	32.0
SOUTHERN	22.9	26.3	40.2	27.8	26.9	33.6	26.3	17.9	45.2	28.8	26.6	30.1
WESTERN	18.4	1.0	1.7	2.5	1.6	1.2	0.5	0.6	1.2	4.2	3.4	1.3
	100	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100

Source: SSL, Population and Housing census 2004.

Table 6: Area Cultivated by Crop and by District (ha)

DISTRICT	Farm HHs	AREA CULTIVATED										
		Rice	Cassava	Potato	G/nut	Maize	Coffee	Cocoa	Oil Palm	Citrus	Veg	Total
KAILAHUN	63942	66841.2	15996	5600.8	6254.8	3344.4	80110	53401.6	25984.8	3124.8	7448	268106.4
KENEMA	68465	55641.2	14374.8	5974.8	5698.4	3616.8	78494.8	36364.8	31930.8	8166.4	4293.6	244556.4
KONO	56249	53826	17583.2	8834.8	8100	5896	75406.4	26537.2	8152.8	4798	8991.2	218125.6
BOMBALI	54102	43321.6	19163.6	7986.4	18230.8	4986	900.4	714.4	9071.2	2488	7106	113968.4
KAMBIA	35099	48218.4	19358	8699.6	10841.2	3933.6	615.6	366.8	10831.2	4832.4	5597.2	113294
KOINADUGU	41259	57004.8	15695.6	9572.8	20115.2	7236	11165.2	2632.8	7337.2	4390.4	7145.6	142295.6
PORT LOKO	59844	69016	30448	10554	11863.2	4654.4	676	237.6	11350	3728	6785.6	149312.8
TONKOLILI	48878	48820.8	15252	5306.4	12634.4	5609.2	5021.2	848	19741.2	3302.4	4150.4	120686
BO	69158	54268.4	26712.8	6414.8	9173.6	4684.4	37704.8	11602.8	45897.6	5321.6	5792	207572.8
BONTHE	22672	10409.2	19720	5426.8	2576	997.2	4596.8	774.4	14162.4	1690.8	2112.8	62466.4
MOYAMBA	40238	63378	36550.8	8926.4	15840.8	11765.6	12378.8	2695.6	15494.8	4950.4	7578.8	179560
PUJEHUN	35159	32561.6	19342.4	4139.6	7593.6	2794.4	35887.6	11551.2	29268	2973.6	4091.2	150203.2
W/A RURAL	27090	3405.6	2483.2	1499.2	1292.8	508.8	478	232.4	1268	1147.2	1866	14181.2
W/A URBAN	107285	2994.8	1729.6	782.8	822.8	211.2	1112.4	705.6	1522	1008.8	611.6	11501.6
GRAND TOTAL	729440	609707.6	254410	89719.2	131037.6	60238	344548	148665.2	232012	51922.8	73570	1995830.4

Source: SSL, Population and Housing census 2004.

Table 6: Percent distribution of area cultivated by crop and by district (ha)

DISTRICT	FHH	AREA CULTIVATED										
		% Rice (Ha)	% Cassava (Ha)	% Potato (Ha)	% Groundnut (Ha)	% Maize (Ha)	% Coffee (Ha)	% Cacao (Ha)	% Oil Palm (Ha)	% Citrus (Ha)	% Veg (Ha)	%Total
KAILAHUN	8.8	11.0	6.3	6.2	4.8	5.6	23.3	35.9	11.2	6.0	10.1	13.4
KENEMA	9.4	9.1	5.7	6.7	4.3	6.0	22.8	24.5	13.8	15.7	5.8	12.3
KONO	7.7	8.8	6.9	9.8	6.2	9.8	21.9	17.9	3.5	9.2	12.2	10.9
BOMBALI	7.4	7.1	7.5	8.9	13.9	8.3	0.3	0.5	3.9	4.8	9.7	5.7
KAMBIA	4.8	7.9	7.6	9.7	8.3	6.5	0.2	0.2	4.7	9.3	7.6	5.7
KOINADUGU	5.7	9.3	6.2	10.7	15.4	12.0	3.2	1.8	3.2	8.5	9.7	7.1
PORTLOKO	8.2	11.3	12.0	11.8	9.1	7.7	0.2	0.2	4.9	7.2	9.2	7.5
TONKOLILI	6.7	8.0	6.0	5.9	9.6	9.3	1.5	0.6	8.5	6.4	5.6	6.0
BO	9.5	8.9	10.5	7.1	7.0	7.8	10.9	7.8	19.8	10.2	7.9	10.4
BONTHE	3.1	1.7	7.8	6.0	2.0	1.7	1.3	0.5	6.1	3.3	2.9	3.1
MOYAMBA	5.5	10.4	14.4	9.9	12.1	19.5	3.6	1.8	6.7	9.5	10.3	9.0
PUJEHUN	4.8	5.3	7.6	4.6	5.8	4.6	10.4	7.8	12.6	5.7	5.6	7.5
W/A RURAL	3.7	0.6	1.0	1.7	1.0	0.8	0.1	0.2	0.5	2.2	2.5	0.7
W/A URBAN	14.7	0.5	0.7	0.9	0.6	0.4	0.3	0.5	0.7	1.9	0.8	0.6
GRAND TOTAL	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100

Source: SSL, Population and housing census 2004

SECTION 4

4.0 PRODUCTION OF LIVESTOCK

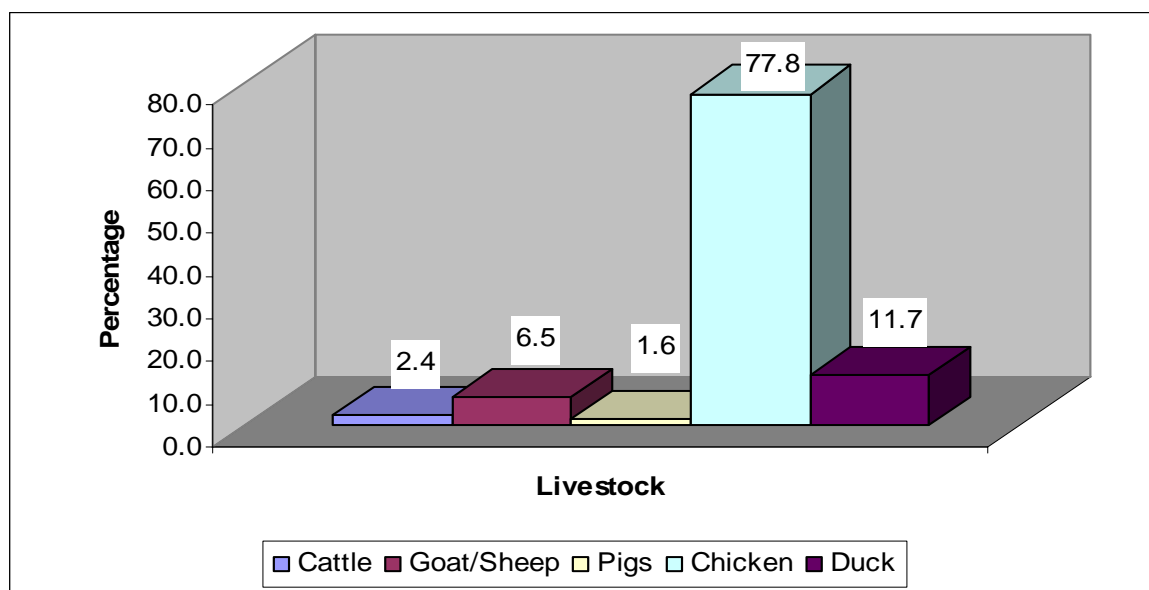
4.1 The Number of livestock owned by Household members in Sierra Leone

The Livestock industry is not well developed in Sierra Leone as in other West African countries. Most of the Livestock is produced by the farm households through the free range system in the backyards. According to the last livestock Census in 1979, the country had about 333,200 head of cattle, 264,000 sheep, 145,000 goats, 17,000 pigs and 3,000,000 birds. Immediately after the civil war, Ministry of Agriculture, Forestry and Food Security (MAF&FS) estimated that there were 102,000 head of cattle, 79,200 sheep, 43,500 goats, 5,100 pigs and 900,000 birds. These figures clearly showed that the civil war had a devastating impact on livestock population. However, since 2002, government and many non-governmental organisations have embarked on livestock restocking, especially of chickens and small ruminants (goats and sheep).

But it is also important to acknowledge that the civil conflict is not the only reason for the poor state of the livestock sector. The industry was on the decline for many years before the war due to low priority given to the industry in terms of budgetary allocation, poor institutional framework and inadequate cadres at both technical and professional staff levels to support the industry, lack of finance to livestock farmers, poor health facilities, use of traditional animal husbandry and lack of operational feed meals.

Figure 11 below depicts that out of the total of 4150596 livestock's owned by farming families in Sierra Leone, 77.8 % are chicken, 11.7 % are ducks, 6.5 % combination of both goats and sheep, 2.4 % cattle and 1.6 % pigs. Similar result was obtained by the Vulnerability Analysis and Mapping Report (2006). The high percentage of chicken may be due to several reasons. One factual evidence is that poultry farming is gaining significant momentum in the country as is the most common economic activity and can easily maximize profit if properly managed. Another reason for the increase in chicken rearing is that almost all farming families, particularly in the rural settlements, are involved in the domestication of this livestock to augment their protein needs. The government's program of restocking could be another reason.

Figure 10: Percentage distribution of livestock ownership by households in Sierra Leone



Source: SSL, Population and Housing Census 2004

4.2 Number of Livestock owned by Household Members in the Regions

The analysis in figure 11 below shows that livestock is reared in all regions of the country. As expected, Northern Province recorded the highest percentage of livestock, followed by the Southern and Eastern Provinces and the Western Area.

Specifically, cattle are reared all over the country, including Western Area. The highest number of herd was recorded in the Northern (63.6 %) province. Similar result was obtained in the Vulnerability Analysis and Mapping Report (2006). This was followed by Eastern (20.1 %) and Southern (9.0 %) provinces and Western Area (7.36 %).

With regards to goats and sheep, the analysis shows that at the Provincial level, Northern Province registered the highest number of goats and sheep (54.6 %) of the total national herd, followed by the Southern (22.7 %) and Eastern (16.5%) and Western (6.2 %) regions. Livestock is predominantly reared in the Northern region, which has a savannah type of vegetable that is free of tsetse flies and suitable for grazing. The close proximity of the Northern Province to the Republic of Guinea also encourages trade in livestock.

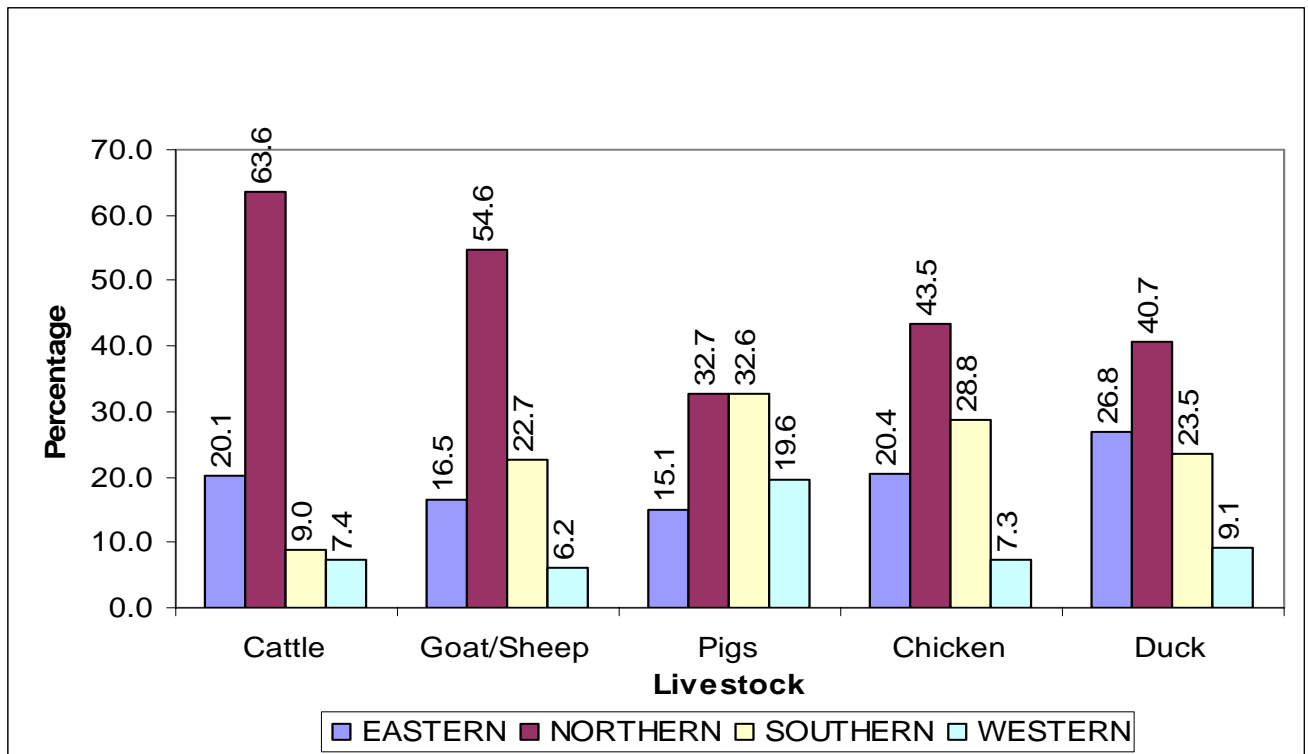
Although commercial pig rearing is common in the Western Area, however, the census results recorded the highest number of pigs in the Northern (32.74 %) and Southern (32.56 %) region of the country. It is very possible that commercial piggery was not captured in the census because the questionnaire was administered at the household level.

Poultry is raised by most farm families in backyards on a free range basis. It is the most common livestock reared in the country mainly for household consumption and

for cash. The most common poultry is chicken and as the analysis revealed Northern Province (43.5 %) has the highest number followed by the South (28.8 %), East (20.4 %) and West (7.3 %).

Similarly the Northern region had more of ducks than the other regions, but unlike chicken, it is followed by Eastern (26.7%) and Southern (23.5%) regions in that order.

Figure 11: Percentage distribution of livestock owned by households in the region



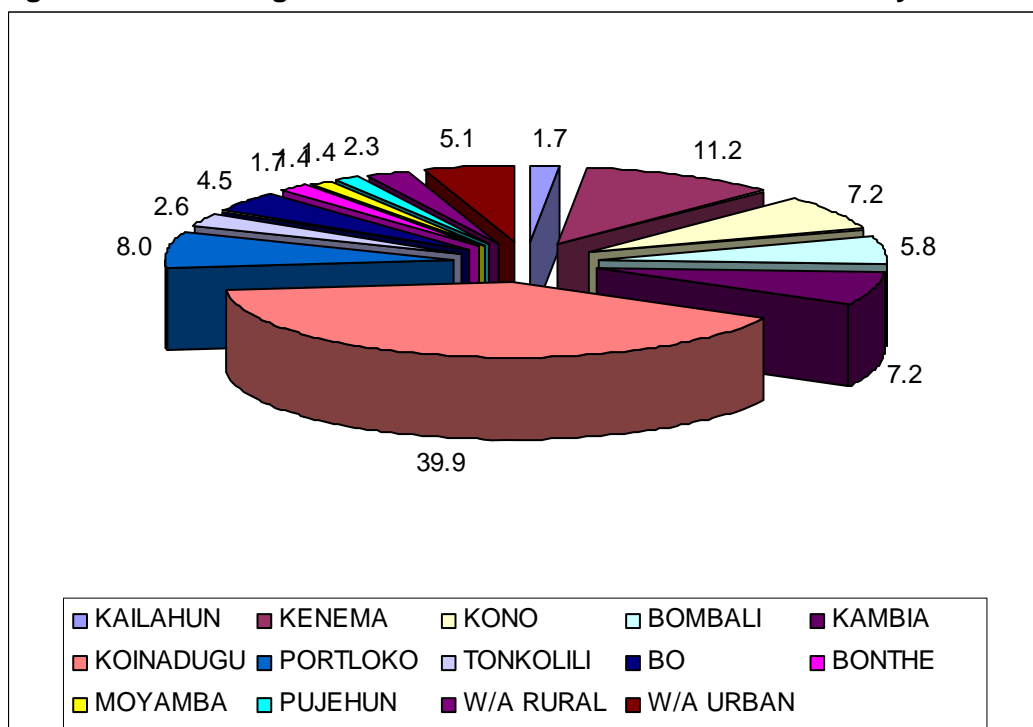
Source: SSL, Population and Housing Census 2004

4.3 Number of livestock owned by Household members in the Districts

4.3.1 Cattle ownership by households at District Level

At district level, Koinadugu recorded the highest number of cattle heads (39357), which is 39.9 % of the national figure, followed by Kenema (11039) with 11.2 %, Port Loko, Kambia and Kono (8 %, 7.2 % and 7.2 %) respectively. The location of Koinadugu district at the Guinea border probably encourages cattle trading. (Figure 12).

Figure 12: Percentage distribution of cattle owned households by districts

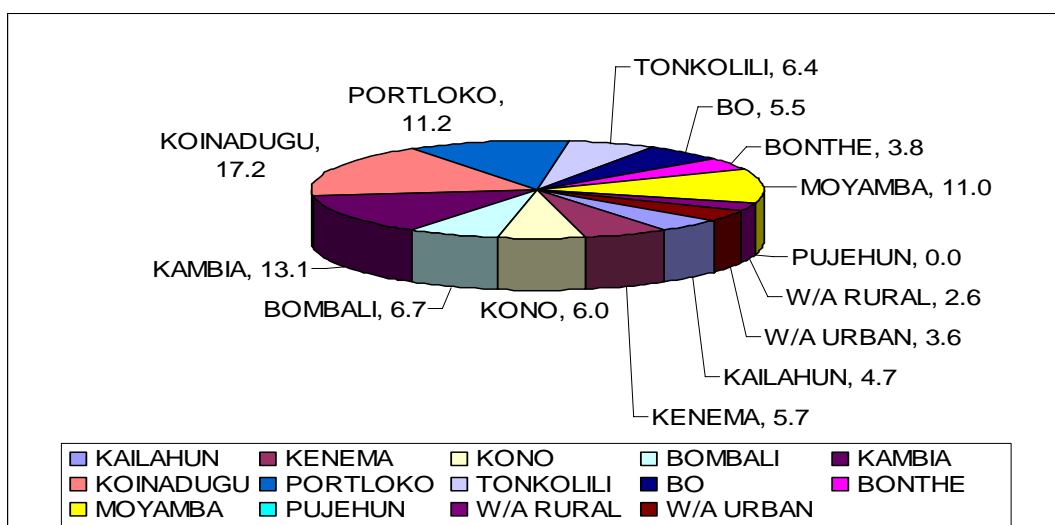


Source: SSL, Population and Housing Census 2004

4.3.2 Goat and sheep ownership by households at District Level

Goat and sheep are most widely distributed of all the ruminant species and are found all over the country. At the district level, Koinadugu District recorded the highest number of goats and sheep (17.2 %), followed by Kambia (13.1%), Port Loko (11.2 %) and Moyamba (11.0%). All other districts together reported less than 10% of the total national herd (Figure 13). These results are also confirmed by the Vulnerability Analysis and Mapping Report (2006).

Figure 13: Percentage distribution of goats/sheep owned by household by district



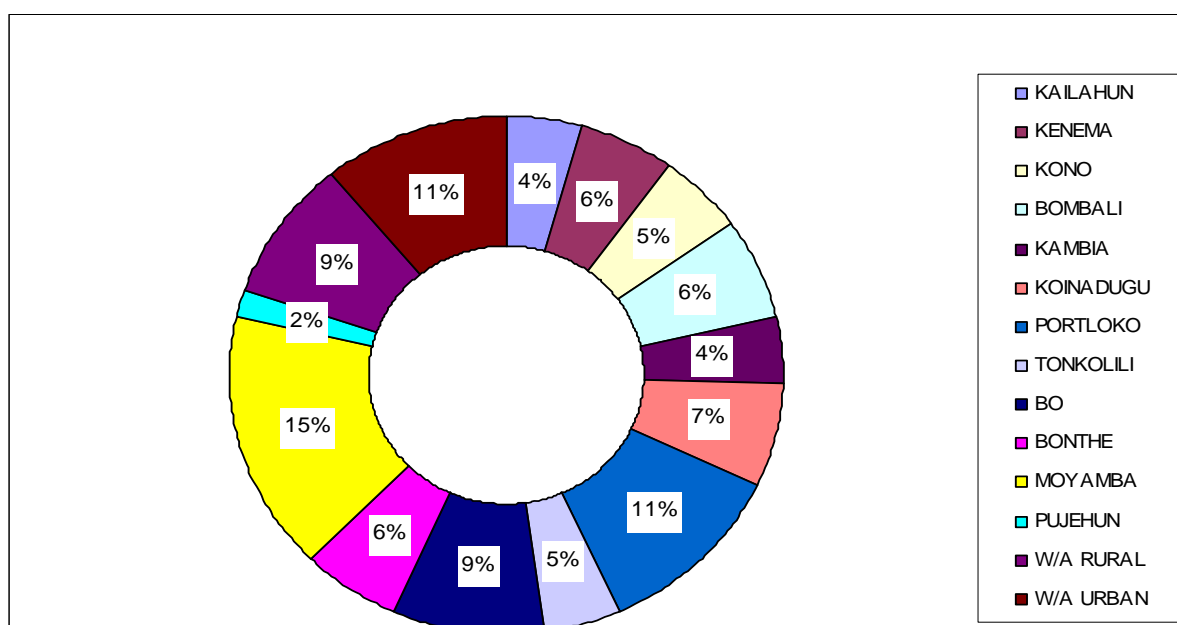
Source: SSL, Population and Housing Census 2004

4.3.3 Piggery ownership by households at District Level

Pigs are widely distributed in the country. However the concept that pigs are commonly reared in the Western Area is diminishing. The census result shows that Moyamba district had the highest percentage (16.3%) of the national share, followed by Port Loko (11.2 %) and Western Area (10.8%). The rest of the other districts recorded less than 10 percent each. See figure 14 below,

It is very possible that commercial piggery, which is widely practised in the Western area, was not captured whilst the lowest number was found in Pujehun district with 1103 or 2.4%, which may be due to the fact that the district is Muslim dominated and eating and commercialization of this livestock if forbidden.

Figure 14: Percentage Distribution of pigs owned by households by district

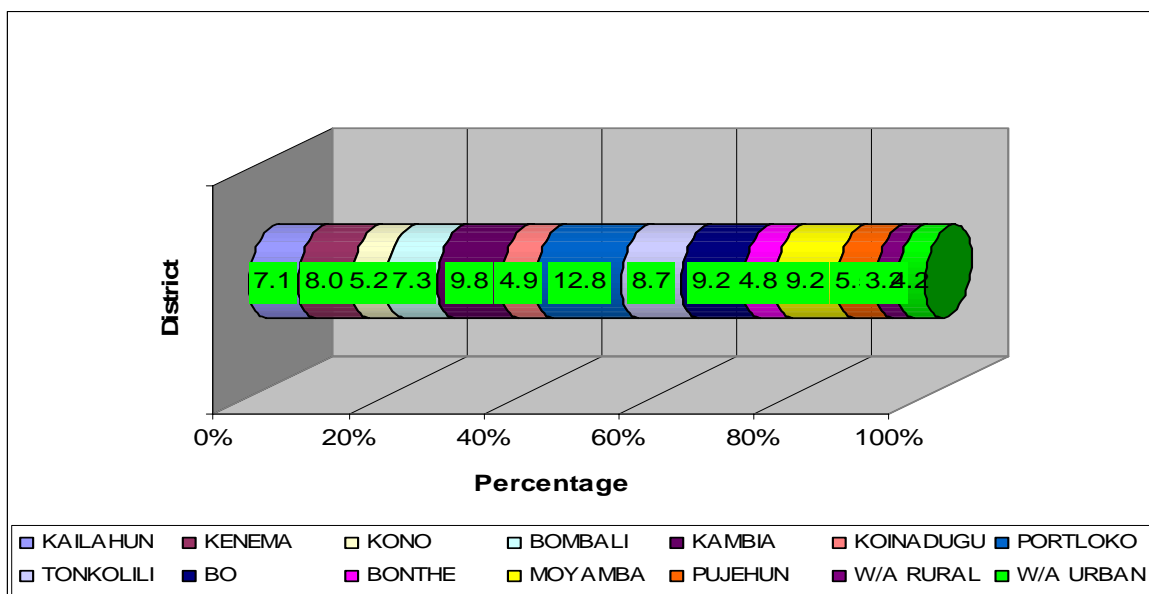


Source: SSL, Population and Housing Census 2004

4.3.4 Chicken Ownership by Households at District Level

Across districts, Port Loko had the highest number of chickens with 413,274 or 12.8% followed by Kambia with 315,333 (9.8%), Moyamba and Bo (9.2 % each) respectively. All the other districts have less than (9%) of the national figure whilst Pujehun recorded the lowest (3.2 %). See figure 15 below.

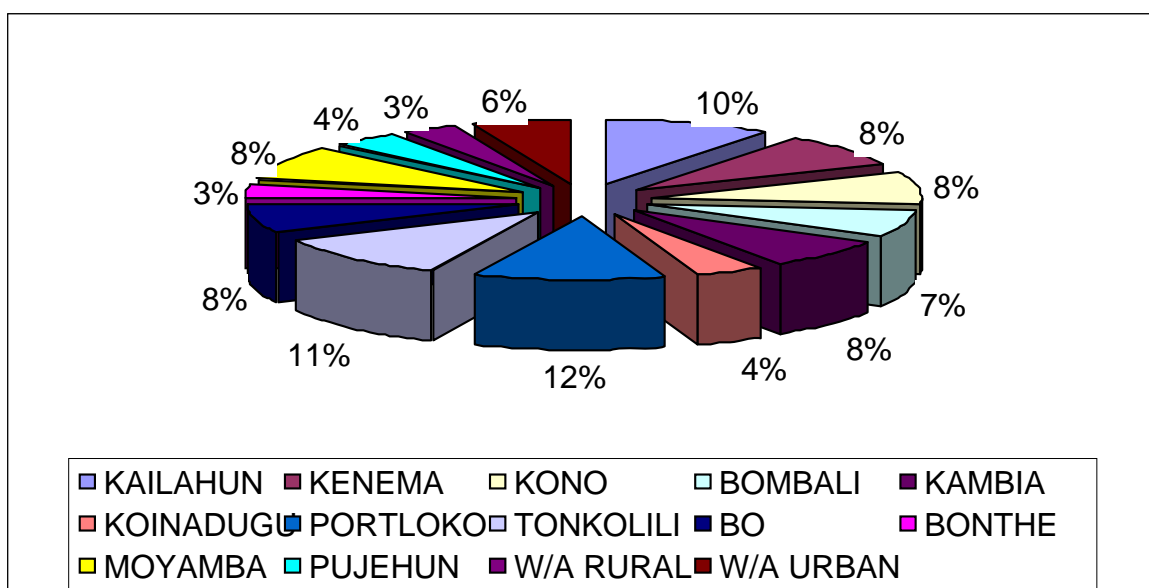
Figure 15: Percentage distribution of chicken owned by households by district



4.3.5 Ducks Ownership by Households at District Level

Ducks are not as common as chicken in the backyard poultry, even though they are raised throughout the country. Across districts, Port Loko (11.4 %) again had the highest number of ducks followed by Tonkolili (11.1 %) and Kailahun (10.0 %). The lowest numbers of ducks raised were in Bonthe district (3.4 %) and the Western Rural Area (3.4 %) (Figure 16).

Figure 16: Percentage distribution of ducks owned by households by district



Source: SSL, Population and Housing Census 2004

SECTION 5

5.0 ACCESS TO AGRICULTURAL PRODUCTION INPUT (ASSETS)

5.1 Introduction

Agricultural mechanisation in crop production and processing reduce the drudgery from the farmer and contribute in providing optimum conditions for growing or processing a crop as near as possible to the optimum time that the crop can perform best so that the best yield can be obtained. Some operations must be carried out within a few days or several weeks depending on the crop, weather, soil conditions and the operation. The effect of not carrying out operations near the optimum time is a reduction in crop yield, a loss of crop quality or both as well as income. Post harvest loss has also been identified as one of the causes for the short fall in food production. Post harvest technologies in country are still traditional in outlook and tend to focus on subsistence scale of production.

Farm mechanisation in Sierra Leone consists of hand tools, draught animal and mechanical power technologies. Hand tools technology is the oldest and most basic level of agricultural mechanisation practiced in Sierra Leone. This technology comprised of the hoe and cutlass or knife for clearing and land tillage, harvesting, weeding for crop production and simple equipment like hand threshers, hand mills, hand graters for food processing. Draught animal technology, consist of oxen, while mechanical technology consist of power tillers, tractors, threshers, mills, graters, and pressers.

Studies have identified lack of trained personnel, ineffective maintenance, importation of wrong parts, lack of rurally-sited spare parts and repair facilities, ineffective use of agricultural machinery and equipment and lack of an environment that encourages participation by the private sector and labour shortage as affecting the use of farm mechanisation.

Households' possession of basic agricultural machinery for both production and post-harvest processing are key factors to increase agricultural production. Limited access to agricultural tools is often cited as one of the major production constraints faced, especially by small-scale farmers.

Of the total number of farming families (729440) in Sierra Leone, about 22% have access to both production and post harvest processing facilities. More than three-fourth (78 %) do not have access to any of these facilities. The high percentage of farm families without access to production and post harvest facilities may have serious implications for improved agricultural productivity and the achievement of food security, which is a major development priority of government.

5.2 Access to Specific Agricultural Assets in Sierra Leone

The data in Figure 17 below revealed that very few farming households have access to agricultural tools and post harvest facilities. Specifically, 32.7%, 23.7 % and 17.5%

of the households have access to drying floors, storage facilities and graters, respectively. An even lower percentage has access to mills (9.6 %), tillers (8.9%), tractors (3.8 %), threshers (2.9%) and pressers (1.0%).

The low percentage of households having access to drying floors, stores, graters, mills and threshers has profound implications in terms of post harvest losses. Without drying floors farmers use mud floors and sometimes tarmac roads to dry their produce, which would lead to contamination and thus affect product quality. Similarly, the lack of improved storage facilities results in households losing significant part of their crop to pests, disease and theft. The storage of produce in baskets or bag stacked in huts and barns with thatched roof that provided limited protection from insects, rodents and fungi.

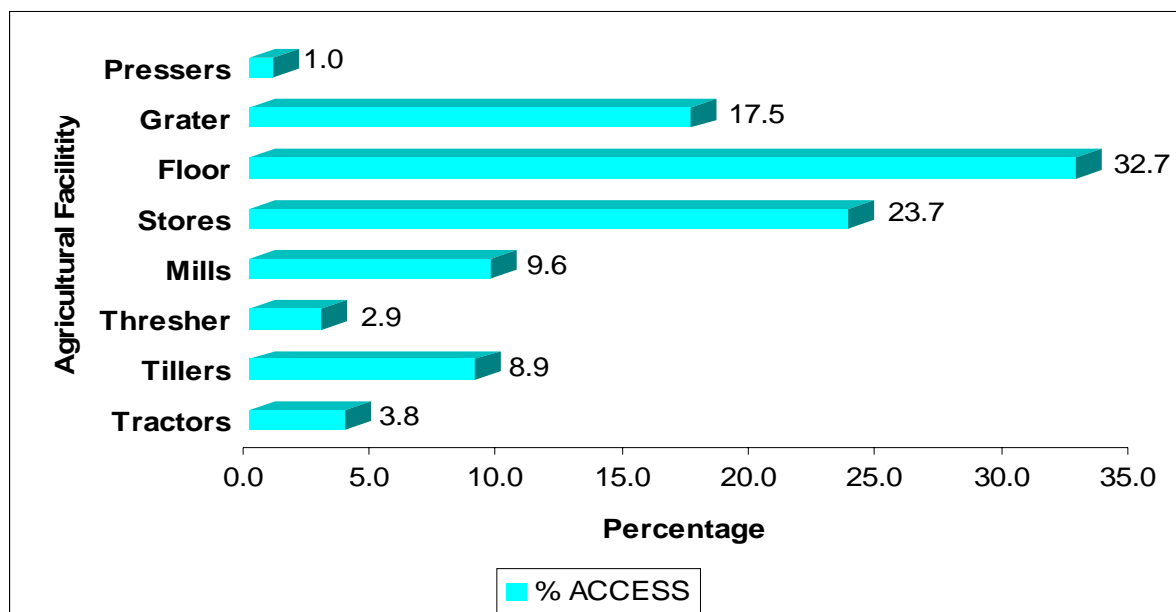
In the absence of rice mill and threshers, farmers use the traditional method of the mortar and pestle to mill and thresh rice. This method has a recovery rate of 60% and 50% or more of broken grains whereas the recovery rate and broken grains when modern rice mill machines are used are 14% and 32% respectively. Milling quality of domestic rice is important if it is to compete with imported rice. Commercial operators own almost all of the existing rice millings in the country and provide services to small farmers in few local within the country.

Low access to pressers means that most farmers produce oil using traditional methods and manually with very low recovery rate of 40%-50% compared to 65%-70% with mechanical oil presser. This means that farmers incur greater processing losses as a result of lack of access to improve extraction facilities.

This situation is bound to affect the timely and efficient execution of farming activities as well as the quality and quantity of produce.

A combination of factors, including low incomes of farmers and high cost of these facilities, may explain farmers' poor access to these production assets.

Figure 17: Percentage distribution of farming households with access to agricultural facilities/ assets in Sierra Leone



Source: SSL, Population and Housing Census 2004

5.3 Access to Agricultural Assets by Region

Figure 18 below presents the distribution of farming families that have access to the agricultural facilities in the regions. The data show that generally, access was high for farm families in the Southern Province (48.2 %) than the Northern (34.6 %), Eastern (16.0 %) and Western Area (1.1 %) in that order.

With regards to specific assets, the analysis shows that more farm families in the Southern (59.7 %), than in the Northern (33.3%) and Eastern (4.5%) and Western (2.5 %) regions had access to tractors. The Southern and Northern regions are endowed with large areas of riverine grassland, bolilands and mangroves swamps which are well suited to tractorisation, which partly explains the above result.

Power tiller usage by farmers is now on the increase in the region. The Ministry of Agriculture, with support from the government and international donors, has supplied power tillers to all regions in the country, especially in agro-ecologies suitable to power tiller use. The number of farmers captured in the census indicates that 69.9%, 5.7%, 13.6% and 0.8% of households in the Southern, Northern, Eastern and Western regions, respectively, have access to this implement.

About 70% of farm households in the Southern Province reported having access to threshers. This is followed by the Northern (14.3%) and Eastern Provinces (4.5%). It is widely believed that threshers are more common in rice growing areas. The low level of rice production in the Western Areas, perhaps reflect the low access of farm families (1.4 %) to threshers.

On a regional basis, Northern (67%), Southern (17.4 %), Eastern (14.5 %) and Western (1.1 %) regions reported access to milling machines.

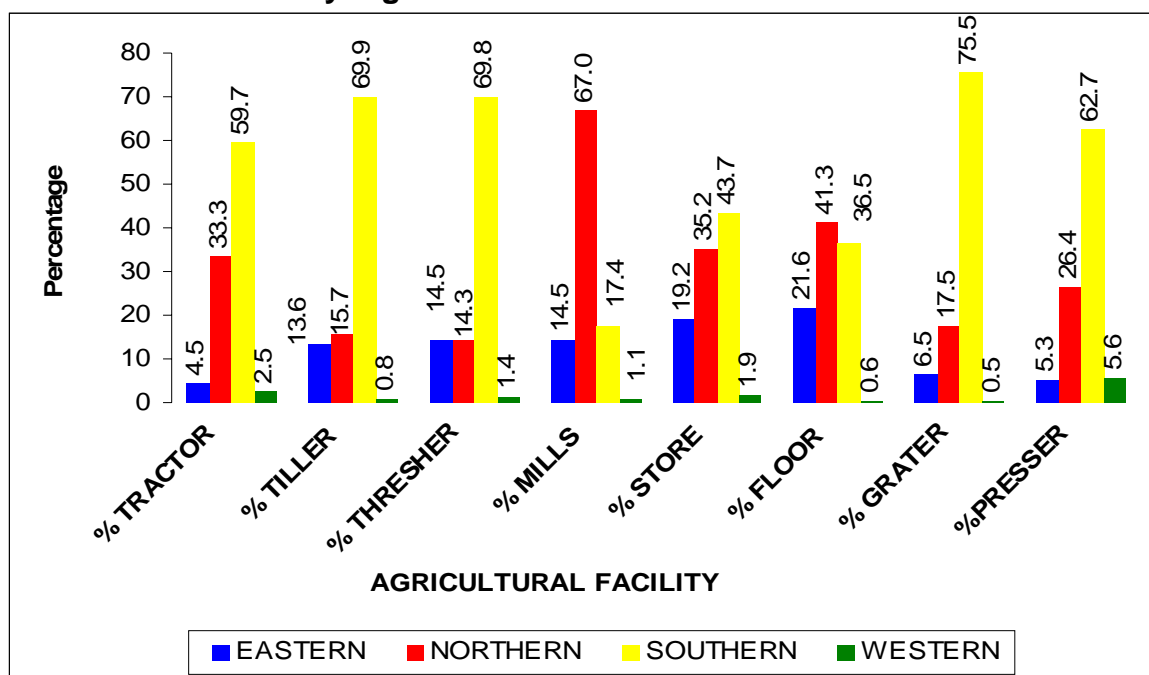
Data on access to storage facilities confirmed that these are predominantly used in the provinces, where agricultural activities are on the increase as compared to the Western Area. There are more households in the South (43.7 %) who affirmed having access to stores compared to households in the North (35.2%) and East (19.2%) regions. Western Area farmers had limited access to stores, which might be due to the fact that most of the crops they grow are perishable and are sold immediately.

Like stores, access to drying floors is highest in the North (41.3 %), followed by Southern (36.5%) and Eastern (21.6%) regions. The Western Area has the least number (0.6 %) of farm families with access to drying floors.

Graters are more popular in use in households in the Southern (75.5 %) and Northern (17.5 %) regions than in the Eastern and Western regions. The Southern region grows more of cassava than the other regions. As such there is high demand for graters by farmers for processing cassava into *fufu* and *gari* for both domestic and commercial purposes.

Disaggregating the result by region, pressers are more in use by households in the Southern (62.7 %), followed by households in the Northern (26.4 %) and Eastern (5.3%) regions in that order. Further studies reveal that there are large oil palm plantations in the South and North of the country, which require the use of pressers. Most of these pressers are owned either by communities or corporate companies.

Figure 18: Percentage distribution of farm families with access to agricultural facilities by region.



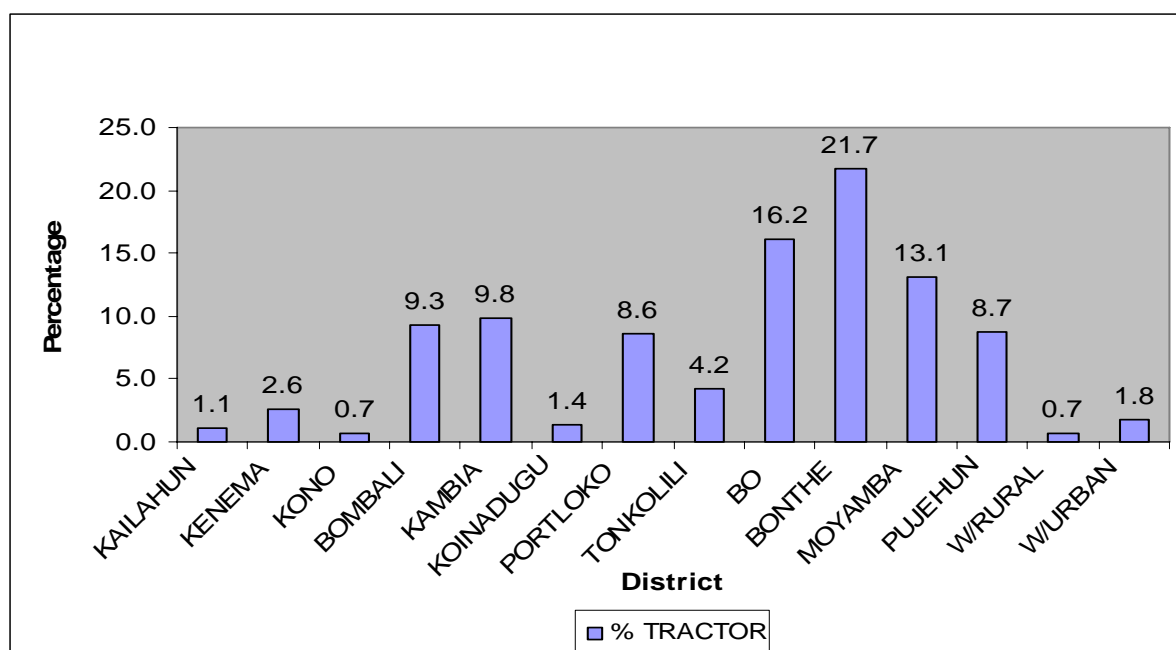
Source: SSL, Population and Housing Census 2004

5.4 Households Access to Agricultural facilities by districts

5.4.1 Access to Tractors

As demonstrated in Figure 19 below, Bonthe, Bo, Moyamba, Kambia, Bombali Pujehun and Portloko districts had more farm families with access to tractors than the other districts. Western Area Rural district has the least number of farm families having access to tractors. The districts with the higher number of farm families with access to tractors have ecologies (bolilands and riverine) that are most suited to tractorisation.

Figure 19: Percentage distribution of farming households with access to tractors by districts



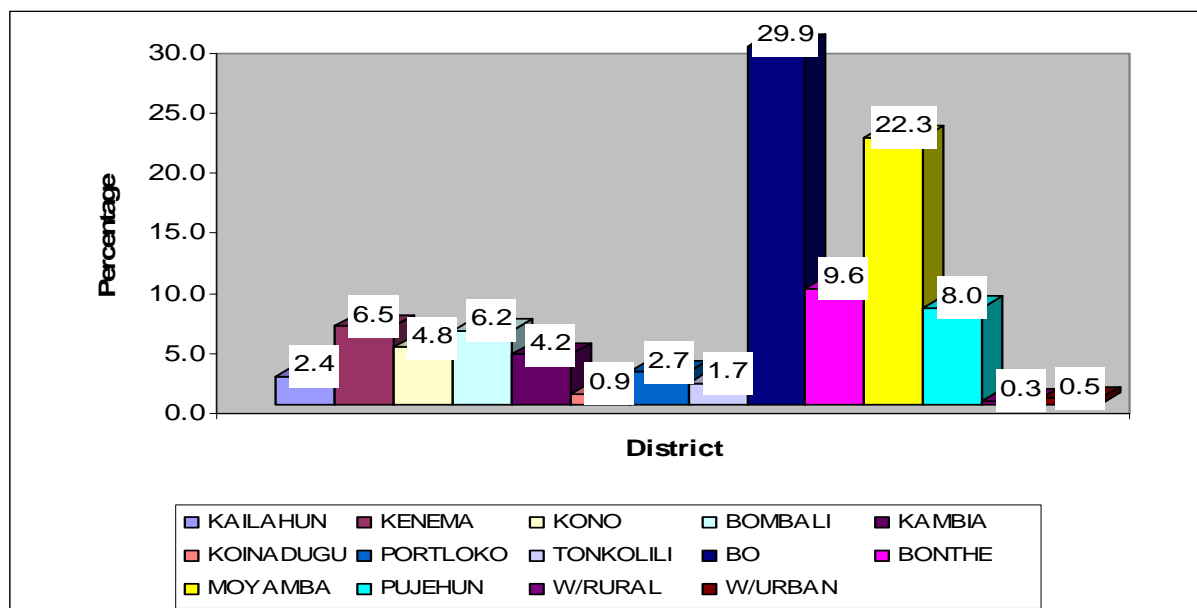
Source: SSL, Population and Housing Census 2004

5.4.2 Access to Power Tillers

Figure 20 below present's data on access to power tillers. The data revealed that Bo (29.9 %), Moyamba (22.3%), Bonthe (9.6%) and Pujehun (8.0 %) districts had the highest number of farm families with access to power tillers. Between 4-7% of households in Kambia, Kono, Bombali and Kenema districts also had access to power tillers. The remaining districts reported an insignificant proportion of households with such access.

These districts and regions have large expanse of riverine and boli ecologies, which are best suited to power tiller use.

Figure 20: Percentage distribution of households with access to power tillers by districts

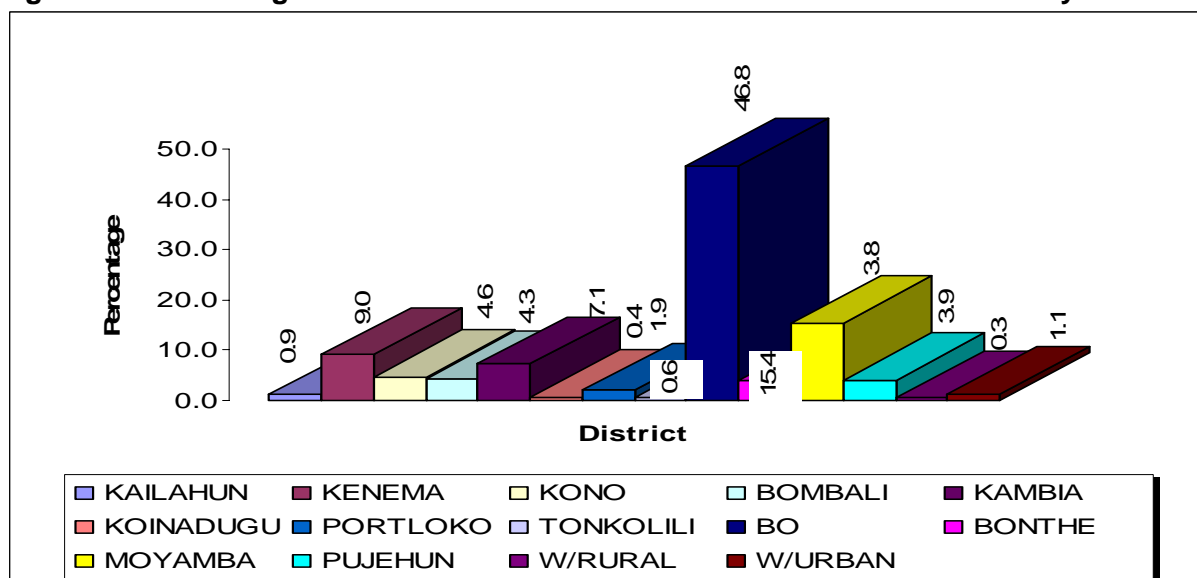


Source: SSL, Population and Housing Census 2004

5.4.3. Access to Thresher Use

In general, only a few districts reported having access to threshers (see Figure 21 below). Most districts rarely use threshers. Bo district (46.8 %) had the highest percentage of households with access to threshers, followed by Moyamba (15.4%), Kenema (9.0 %) and Kambia (7.1 %) districts. Most farm households cannot afford the high cost of threshers, which largely explains this poor access. In the absence of threshers, most farmers use local methods (mortal and pestle, feet and sticks) to thresh their grains for marketing and consumption.

Figure 21: Percentage distribution of households with access to threshers by district

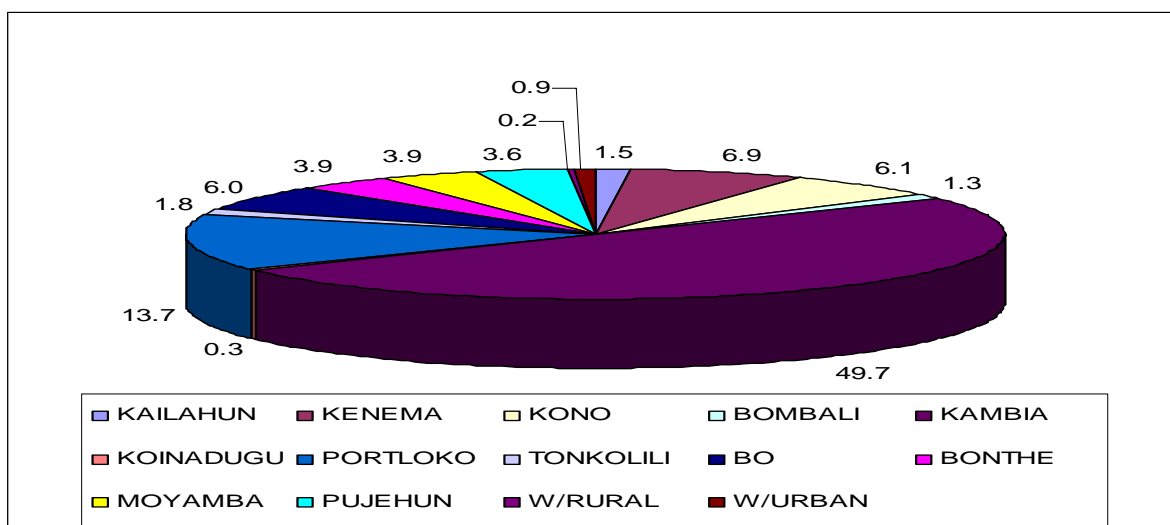


Source: SSL, Population and Housing Census 2004

5.4.3 Access to Milling Machine

Milling machines are very important, particularly in the processing of rice. Despite this, access to rice milling machines is low and range from 0% to 50 %. Kambia district had the highest number of farm families (49.7%) who use milling machines to process rice. Next to Kambia are Portloko (13.7 %), Kenema (6.9%), Kono (6.1%) and Bo (6.0 %) districts (See figure 22 below). All the other districts in the country rarely use rice mills for rice processing. The traditional mortar and pestle are used largely by households with no access.

Figure 22: Percentage distribution of households with access to rice mills by district

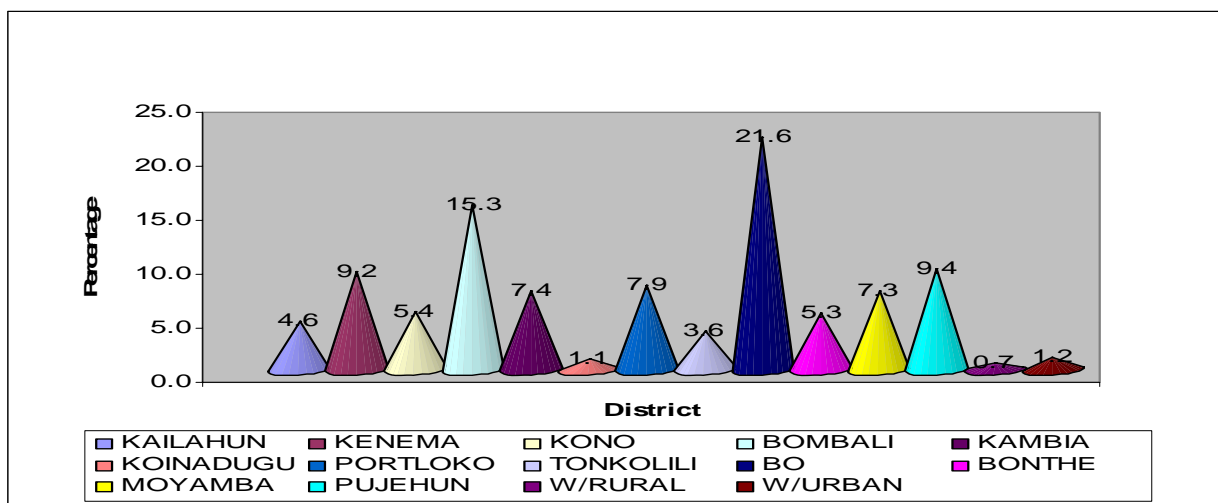


Source: SSL, Population and Housing Census 2004

5.4.4 Access to Stores

Good and hygienic storage facility in modern agriculture is of paramount importance to crop shelf-life, quality and market price. The Figure below illustrates the distribution of households that have access to stores. As demonstrated in Figure 23 below, Bo (21.6 %), followed by Bombali (15.3 %), Pujehun(9.4 %), Kenema(9.2 %), Port Loko (7.9 %), Kambia(7.4 %) and Moyamba (7.3 %) districts had the largest percentage of farm families with access to stores in that order . Western Area Rural/Urban and Koinadugu districts had less than 2 % of its farm families with access to stores.

Figure 23: Percentage distribution of household with access to storage facilities by district

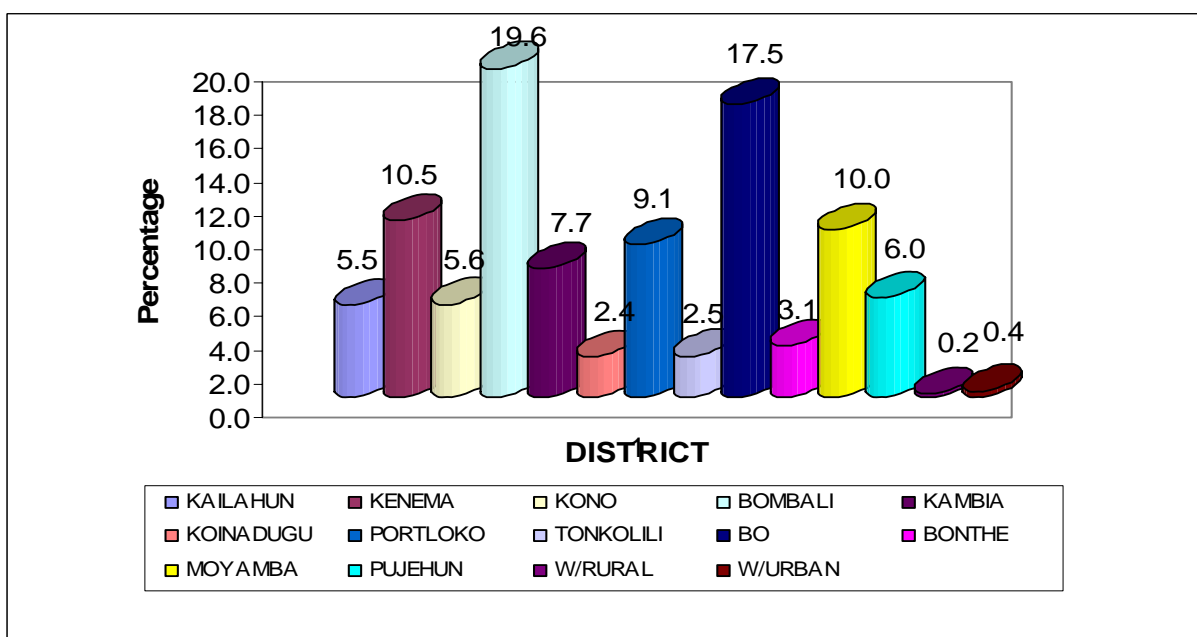


Source: SSL, Population and Housing Census 2004

5.4.5 Access to drying floors

Like storage facilities, drying floors are also very important in post-harvest processing as these contribute greatly to product quality and price. Again more households in the Bombali district (19.6 %) have access to drying floors. Bombali district's high percentage may be due to the fact that more grains (rice, maize, sorghum and millet) are predominantly grown within the district. Bo (17.5%) and Kenema (10.5%) Moyamba (10.0 %), Portloko (9.1 %) and Kambia (7.7 %) districts are next to Bombali district. All the other districts have less than 10% access to drying floors (Figure 24).

Figure 24: Percentage distribution of households with access to drying floors by district



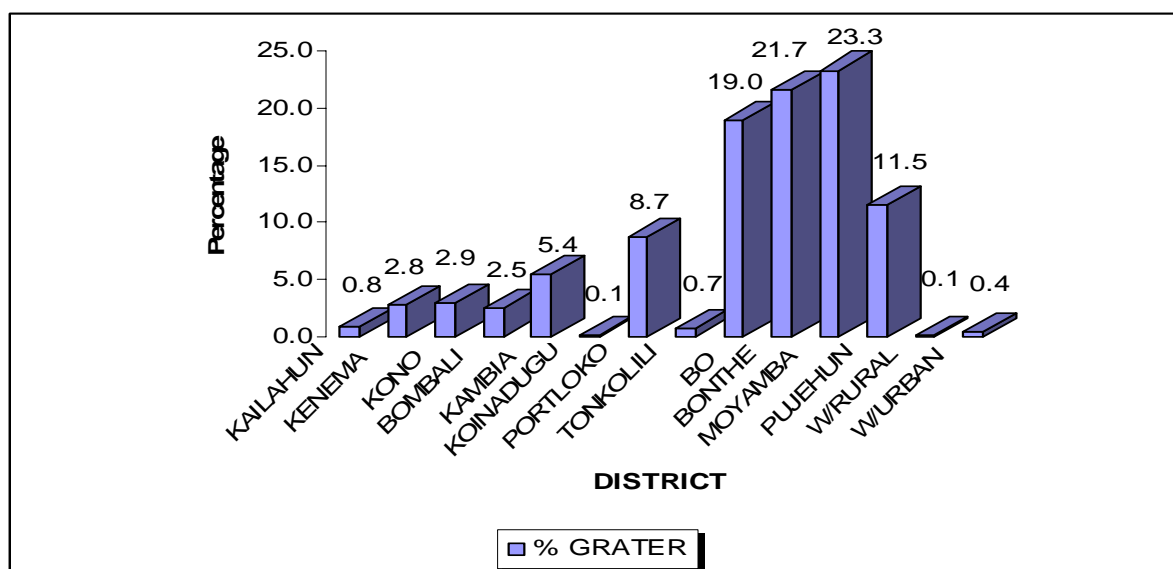
Source: SSL, Population and Housing Census 2004

5.4.6 Access to Graters and Pressers

Figures 25 and 26 below depict the percentage distribution of households having access to graters and pressers. Data in Figure 25 reveals that farm households in Moyamba (23.3 %), Bonthe (21.7 %), Bo (19.0 %), Pujehun (11.5 %), Portloko (8.7 %) and Kambia District (5.4 %) had more access to graters than the other districts. The household's residence in Kailahun, Tonkolili, Western Area Rural and Urban virtually had little access to these facilities.

Further analysis reveals that the districts and regions with relatively high access to graters cultivate large acreages of cassava which they usually transform into *fofoo* or *gari* either for consumption and or for cash.

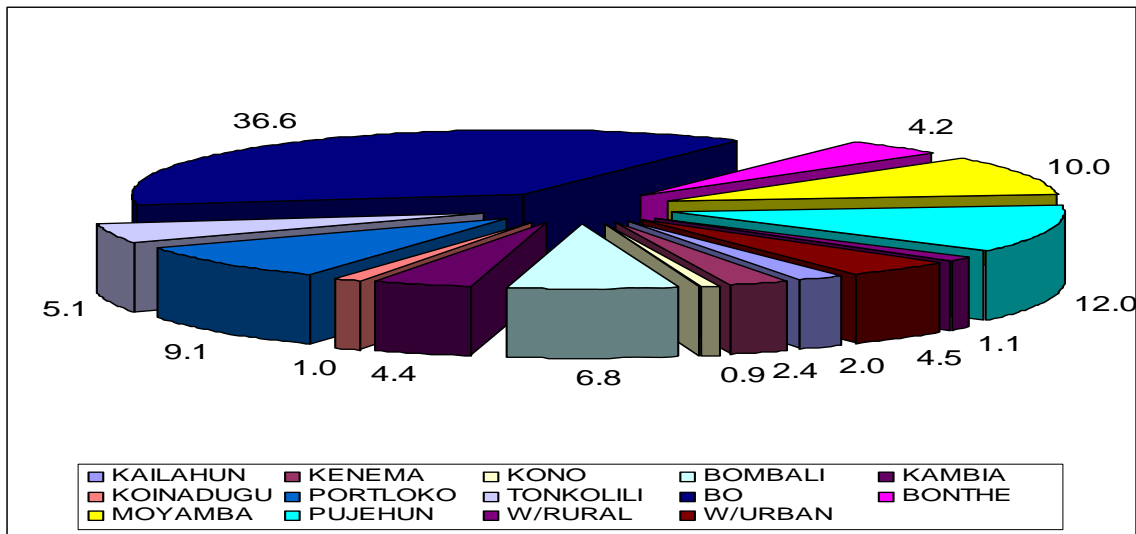
Figure 25: Percentage distribution of households that have access to grater Machines



Source: SSL, Population and Housing Census 2004

Figure 26 below shows that most households in Bo district (36.6 %), Pujehun (12.0 %), Moyamba (10.0 %) and Portloko (9.1 %) have access to and/or are owners of pressers. The other districts have very few or no households with access to pressers. The earning power of most of these households is poor and so they cannot afford the cost of pressers. Other studies have revealed that only households engaged in large scale farming, community owned and corporate companies have access to pressers. Presser use is generally limited to areas with large oil palm acreages.

Figure 26: Percentage distribution of farming households with access to pressers by district



Source: SSL, Population and Housing Census 2004

SECTION 6

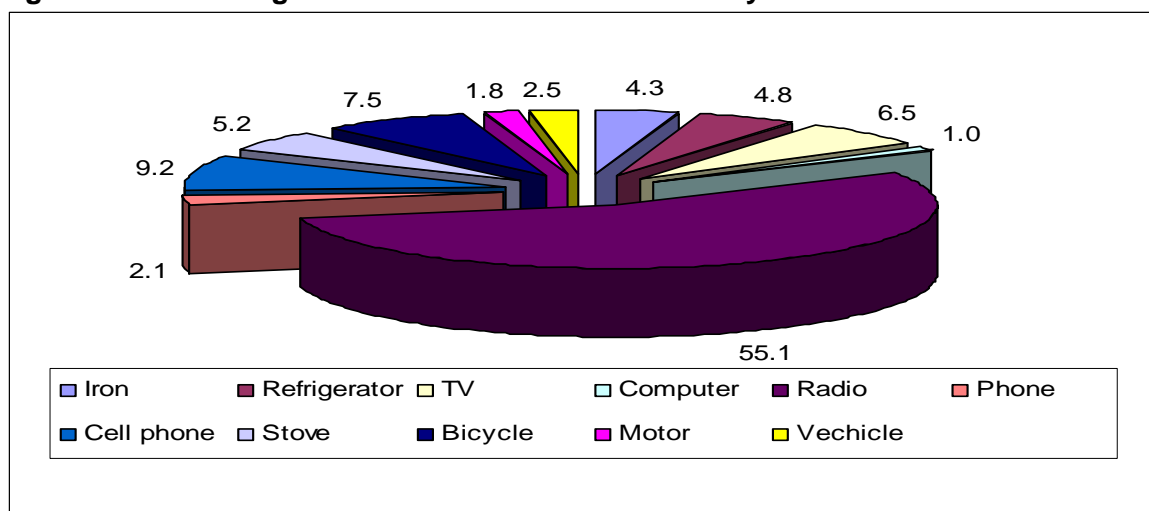
6.0 HOUSEHOLD OWNERSHIP OF ASSETS

6.1 Household Ownership of Assets in Sierra Leone

Possession of basic household assets such as televisions, computers, radios, electric irons, land and cell phones, stoves, bicycles, motor bikes, vehicles and refrigerators are important for a decent standard of living. Access to these assets is the most basic necessities for human development. Without these things, many choices are simply not available and many opportunities in life remain inaccessible. Given this, ownership of and/or access to these assets is usually used to measure poverty level.

Country wide, a total of 690434 of assorted assets were reportedly owned by household members (Figure 27). Of these, radio was the most commonly owned asset and constituted about 55.1 % of the total assets, followed by 9.2 %, 7.5 %, 6.5 % and 5.2 % for cell phones, bicycles, televisions and stoves. The other assets, refrigerators, irons, computers, motor bikes, land phones and vehicles were the least owned and made up less than 5 % of the national share. Being that the typical Sierra Leonean households are severely poor, the costs of these assets are not easily affordable by many families. Hence the most common and easily affordable asset, like the radio, is owned by most families. The Vulnerability Analysis and Mapping Report (2006) also reported radio as one of the most common assets owned by households.

Figure 27: Percentage Distribution of Assets owned by Households in Sierra Leone

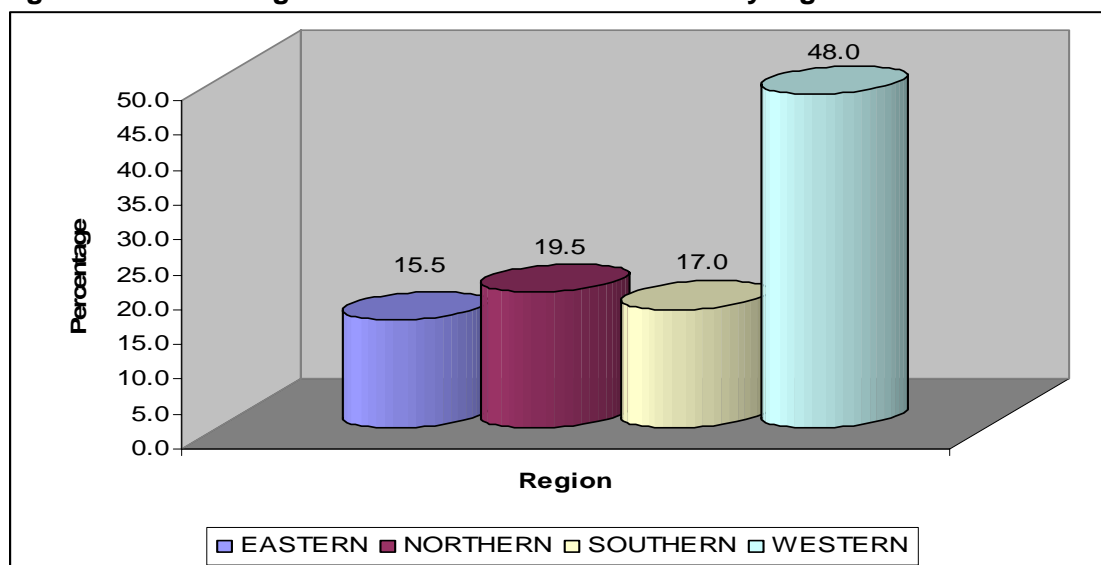


Source: SSL, Population and Housing Census 2004

6.2 Assets Owned by Household by Region

Disaggregating the census data at regional level shows 48 % of all the assets owned were in the Western Area, followed by the Northern (19.5 %), Southern (17 %) and Eastern (15.5 %) regions. see figure 28 below.

Figure 28: Percentage Distribution of Assets owned by region



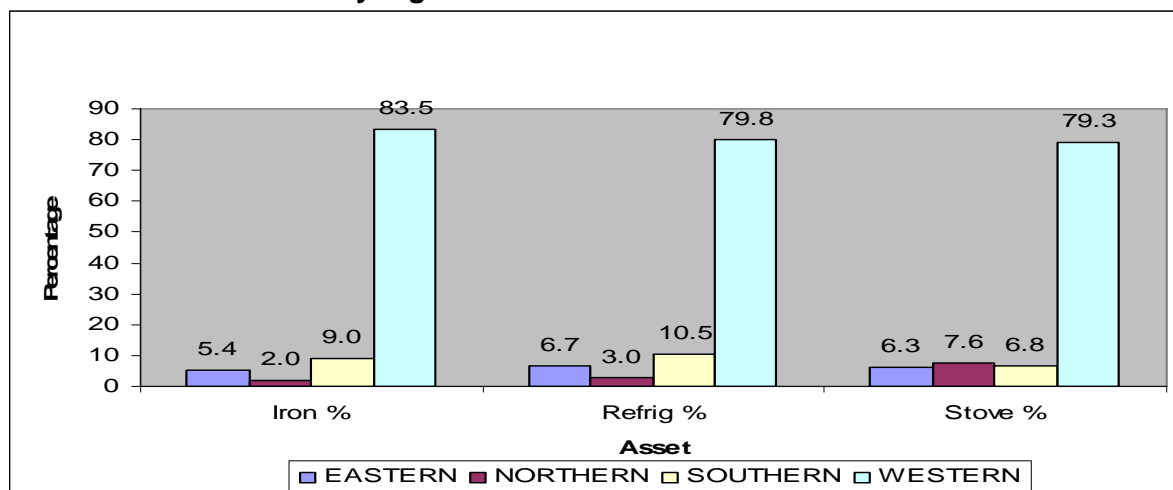
Source: SSL, Population and Housing Census 2004

6.2.1 Number of Iron, Refrigerator and Stove Owned By Households in the Region

Figure 29 shows that the Western Area differed largely from the provinces in terms of ownership of irons, refrigerators and stoves. Western area owned between 79% and 84% of all the irons, refrigerators and stoves owned. This was followed by the Southern, Eastern and Northern regions. Very little differences were observed in the provinces in the ownership of these assets.

Western Area has more people in paid employment than the other regions, and as such can afford most of these necessary items regardless their costs. Further analysis revealed that the low percentage of households, who used these facilities, may be due to government's inability to provide electricity supply for its inhabitants. Thus most households see it as unnecessary or a waste of resources to buy these items which they rarely used. Furthermore fire wood is predominantly used for cooking in the east, south and north of the country as opposed to stoves, kerosene and gas cookers which are common in the Western Area.

Figure 29: Percentage Distribution of iron, refrigerators and stoves owned by Households by region

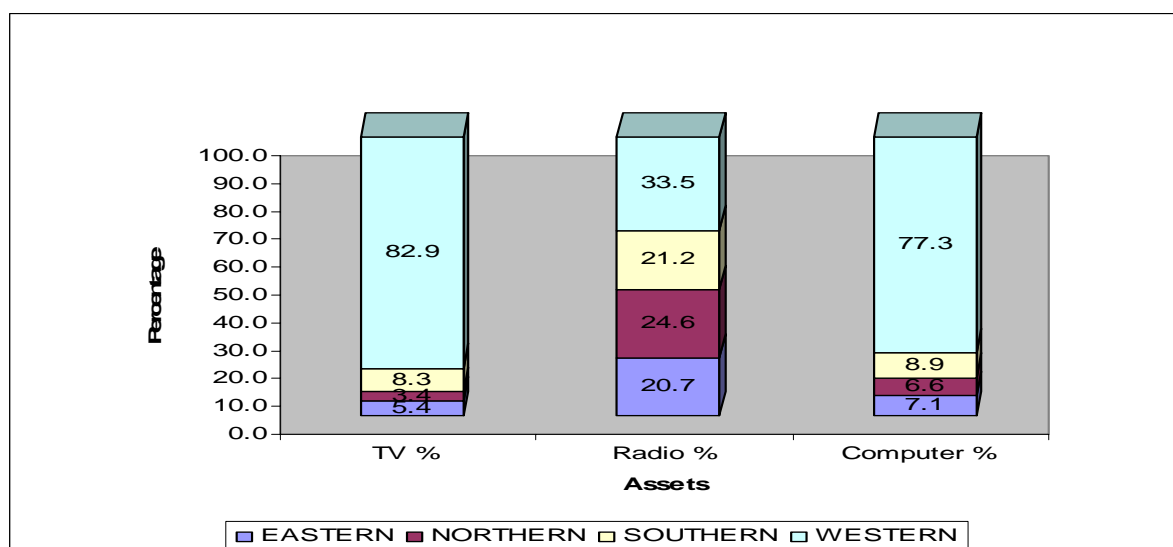


Source: SSL, Population and Housing Census 2004

6.2.2 Number of Television, Radios and Computers Owned By Households by Region

Western Area had between 77% and 83 % of all televisions and computers, respectively, as well as a third of radios. Northern Province reported more radios than the Southern and Eastern Provinces. However, the regions did not differ much from each other in terms of ownership of refrigerators and computers (See figure 30 below). The high cost of refrigerators and computers as well as the high illiteracy levels among Sierra Leoneans, especially in the provinces, partly accounts for the above observations.

Figure 30: Percentage distribution of Television, radios and computers owned by Households by Region

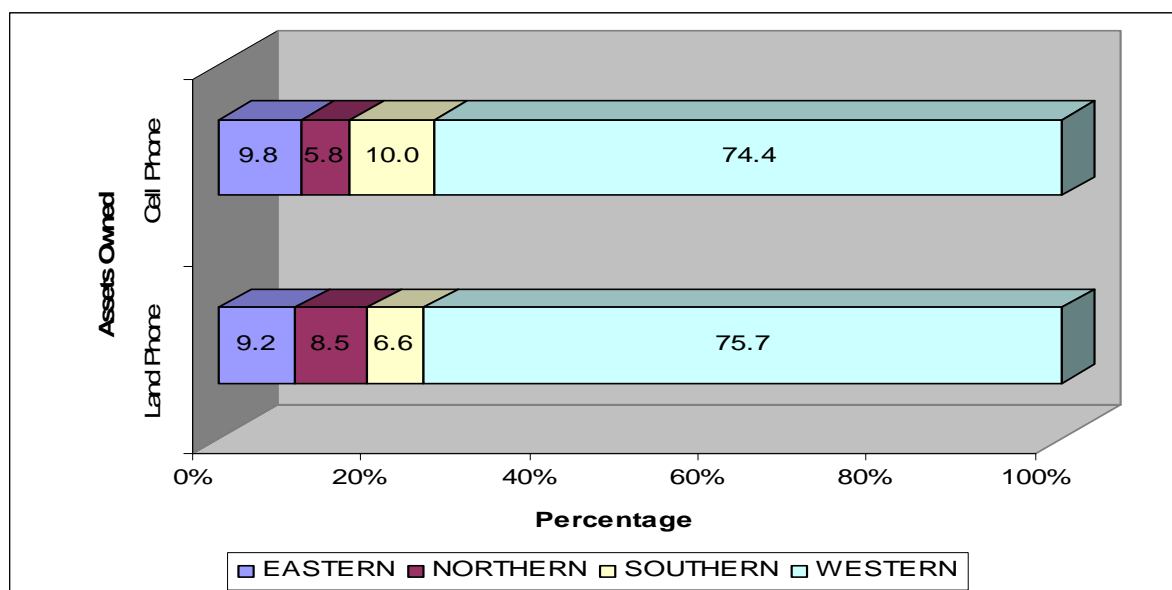


Source: SSL, Population and Housing Census 2004

6.2.3 Number of Land Phones and Cell Phones Owned by Households by Region

Figure 31 depicts that of the land and cell phones reported in the country, over 70 % were in the Western Area. The Southern (10%) and Eastern (9.8%) regions had more land phones than the Northern region while the Eastern (9.2%) and Northern (8.5%) had more cell phones than the Southern (6.6%) region. These differences were, however, insignificant.

Figure 31: Percent distribution of land and cell phones owned by households by region

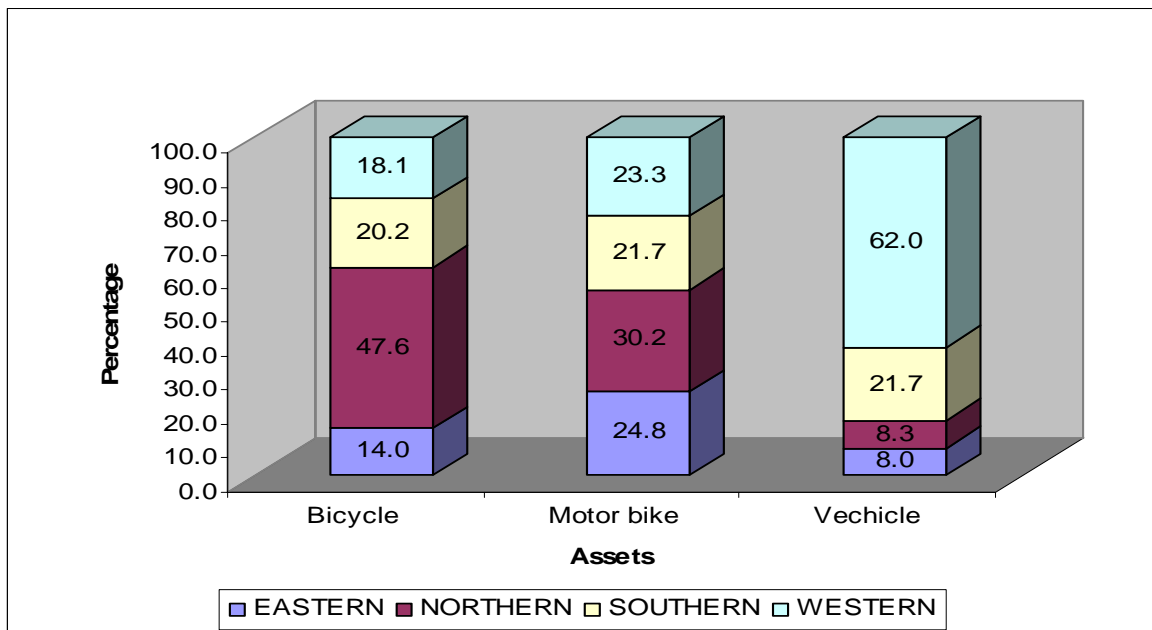


Source: SSL, Population and Housing Census 2004

6.2.4 Number of Bicycles, Motorcycles and Vehicles Owned By Households by Region

The availability of reliable means of transport has been a major impediment to achieving the free movement of people and goods in Sierra Leone. In most communities, household members' movement by whatever convenient or available means depends on the availability of bicycles, motorcycles and vehicles. The results of the survey indicate that Northern region had more bicycles (47.6%) and motor bikes (30.2%), while Western Area had more vehicles (62%) than the other regions. The difference between the regions was great for vehicles than for bicycles and motor bikes (see figure 32 below).

Figure 32: Percentage distribution of bicycle, motorcycle and Vehicle owned by households by region

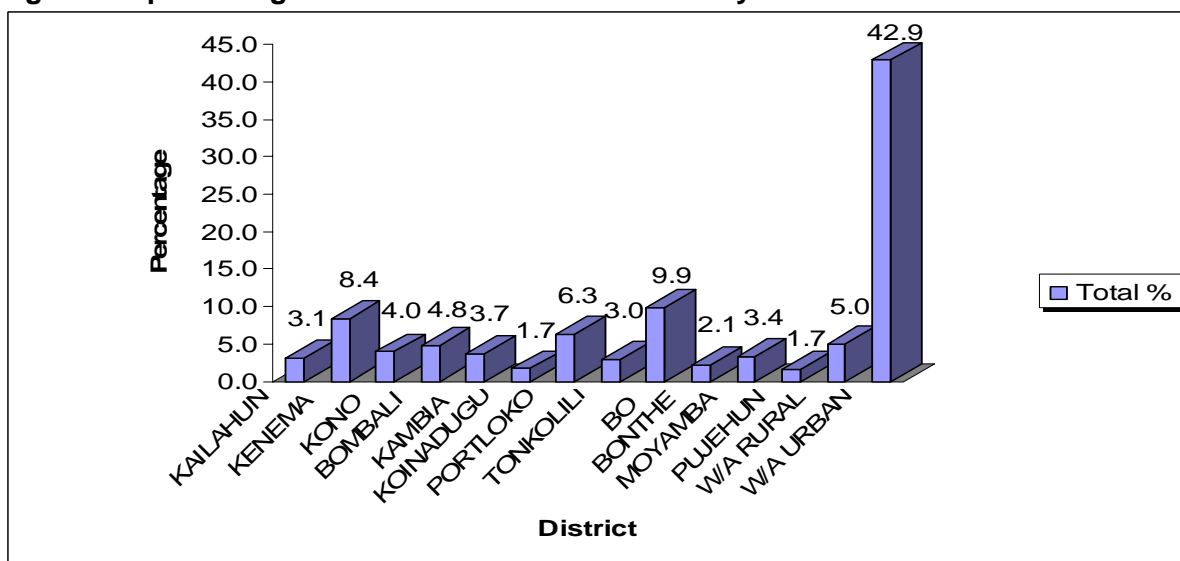


Source: SSL, Population and Housing Census 2004

6.3 Ownership at District Level

Figure 33 show the percentage distribution of assets owned at district level. Noticeably, the western area urban district has more than forty percent (42.9 %) of the national share followed by Bo (9.9 %), Kenema (8.4 %), Port Loko (6.3 %), western area rural (5.0 %), Bombali (4.8 %) and Kono(4.0 %) districts respectively. All the other districts posses less than 4 % share of the national assets.

Figure 33: percentage distribution of assets owned by district



Source: SSL, Population and Housing Census 2004

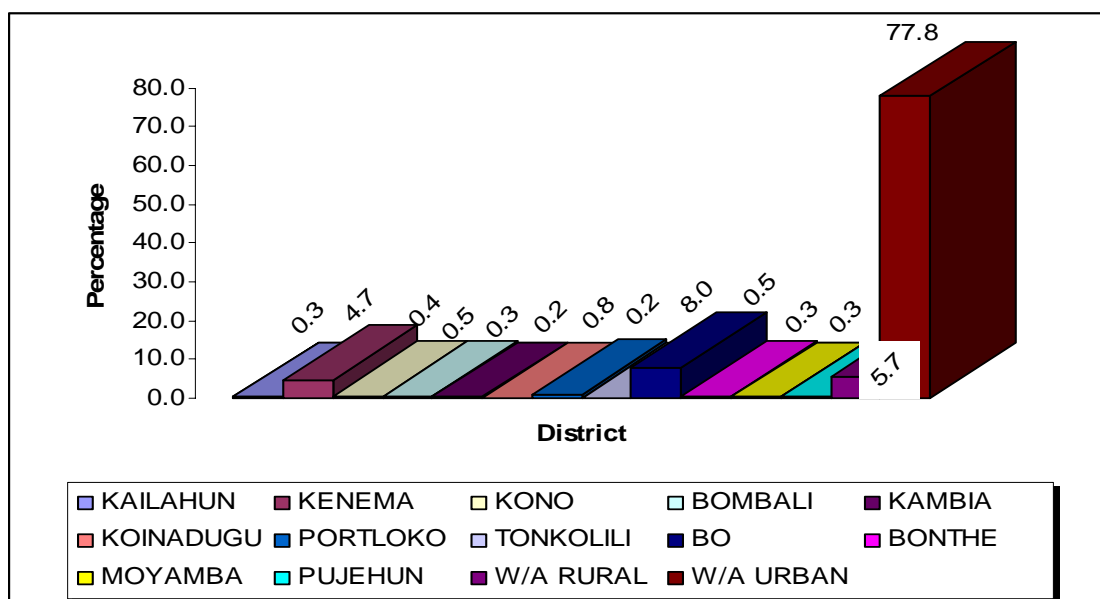
6.3.1 Number of Iron, Refrigerator and Stove Owned By Households by District

Figures 33a, 33b and 33c below show the data on households' ownership of iron, refrigerators and computers at the district level. The data revealed that Western Urban had the highest percentage (77.8%) of iron. This was followed by Bo (8.0 %) and Kenema (5.6%) districts and the Western Rural (5.0 %). None of the other districts had up to 1% of iron.

The situation is almost the same for the ownership of stove where Western Urban has the highest percentage of stoves (72.7 %), followed by Western Rural (6.6%), Bo (5.1%) and Kenema (3.9%) districts. The figure shows that with the exception of the Western Urban that had 72.7% of stoves, none of the other districts had up to 10% of stoves.

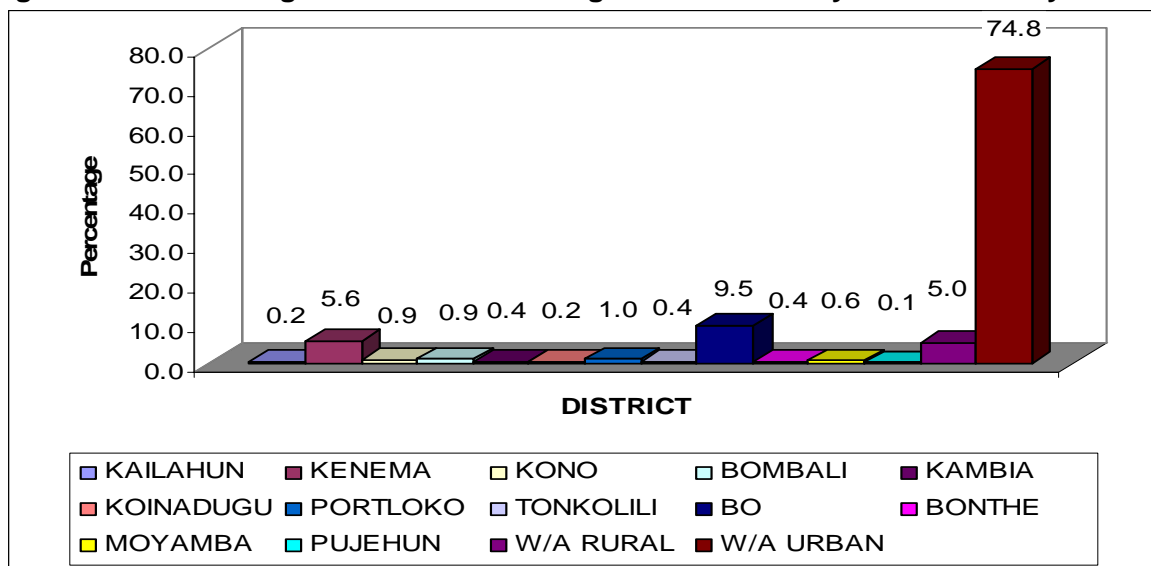
The high cost of energy requirements for the use of these assets as well as the high illiteracy rate may be important contributing factors for the low ownership.

Figure 34a: Percentage Distribution of iron owned by households by District



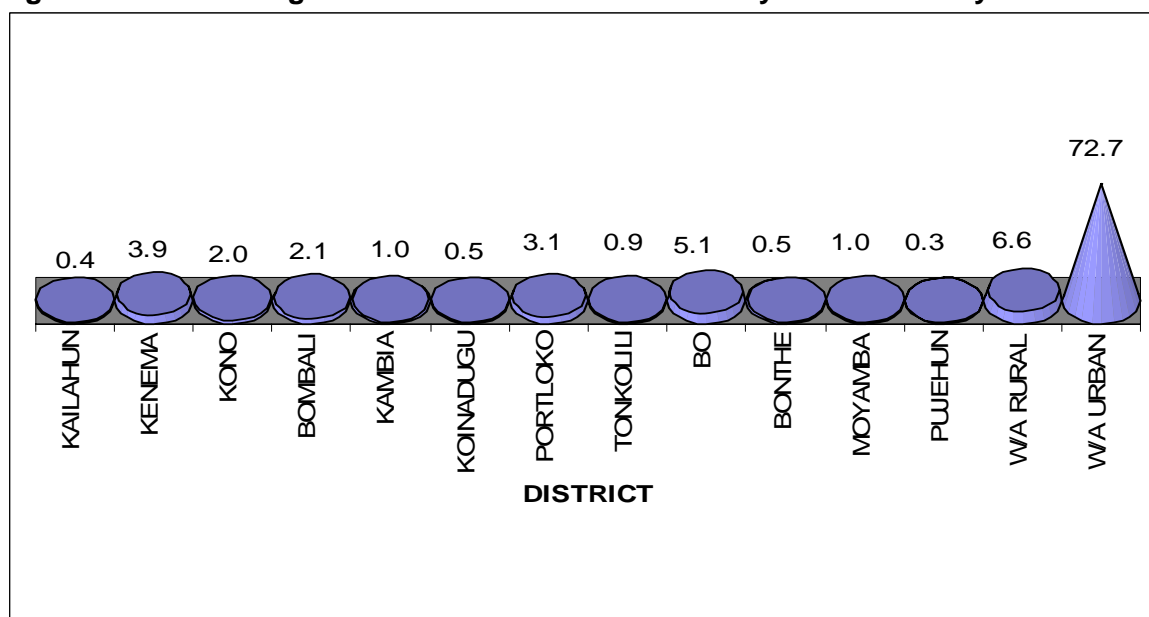
Source: SSL, Population and Housing Census 2004

Figure 34b: Percentage Distribution of refrigerators owned by households by district



Source: SSL, Population and Housing Census 2004

Figure 34c: Percentage Distribution of stoves owned by households by district



Source: SSL, Population and Housing Census 2004

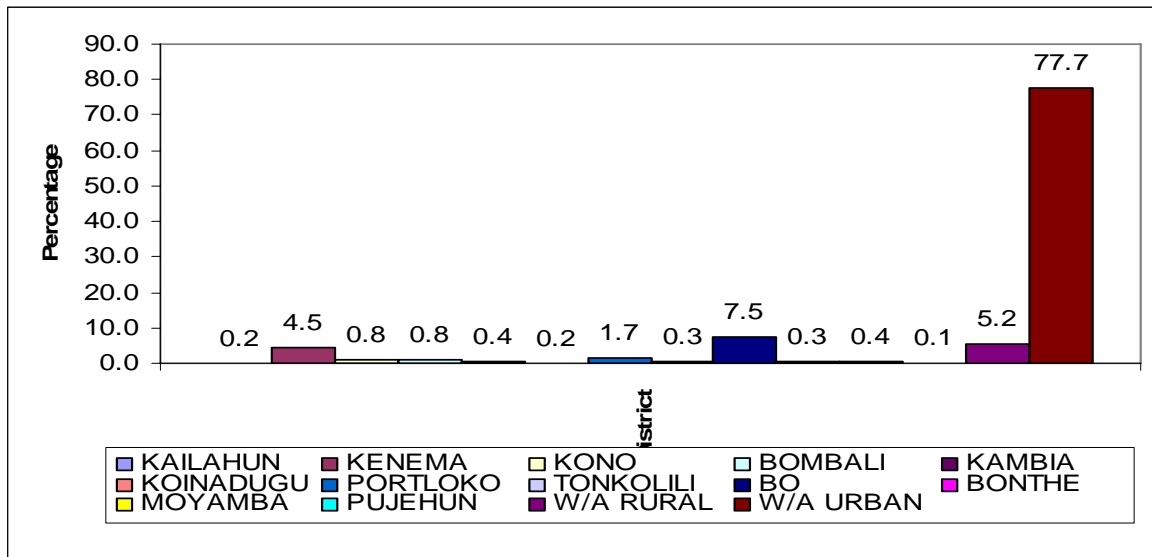
6.3.2 Number of Television, Radio and Computer owned by households by district

The chart in figure 35a below shows that over 75% of televisions were found in the Western Urban, followed by Bo district (7.5 %), Western Rural (5.2 %) and Kenema (4.5 %). None of the other districts had up to 2 % of televisions owned.

Radio was found to be owned by a good number of households. At district level, about 28.5% of the radios owned were in Western Urban. Bo districts had more than 11% of radios, followed by Kenema (10.4 %), Portloko (7.7 %) and Kambia (6 %) districts (see figure 35b below).

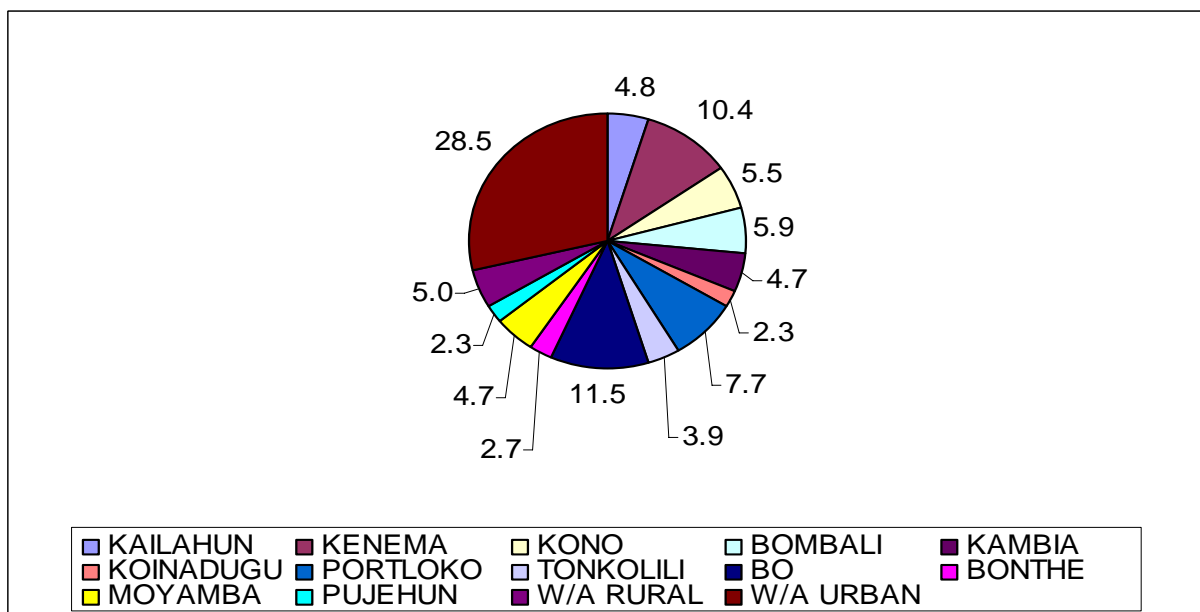
Figure 35c depicts that Computer usage is more common in the Western Urban (70.9 %) than in any other part of the country. Next to Western Urban are Bo (6.7 %), Western Area Rural (6.4 %) and Porkloko (2.1 %). The high illiteracy level in the country and high cost of computers are inhibiting factors that restrain many households access to this electronic device.

Figure 35a: Percentage distribution of television owned by household by district



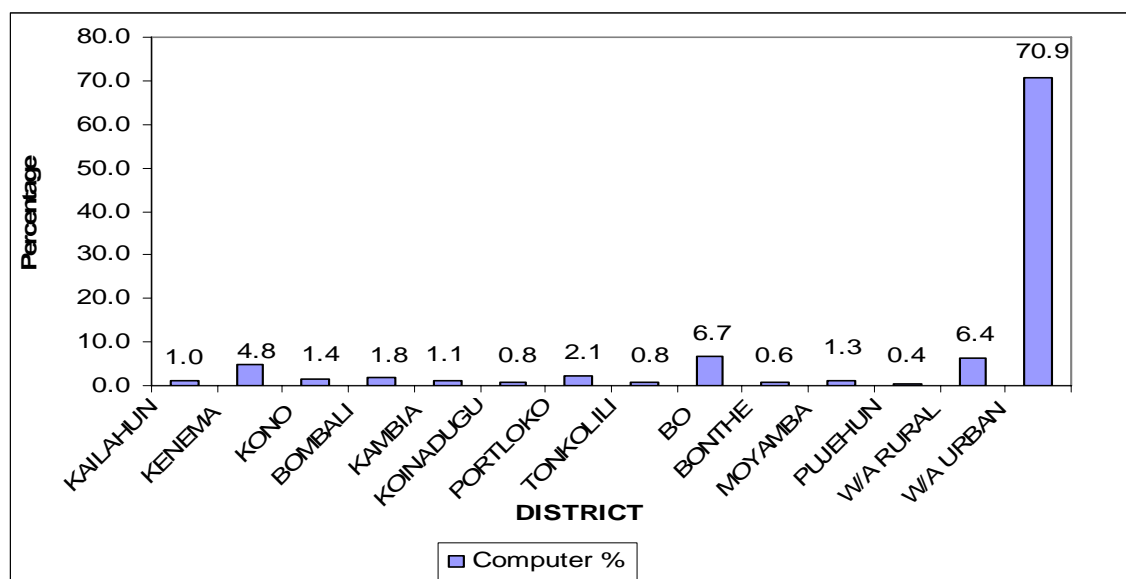
Source: SSL, Population and Housing Census 2004

Figure 35b: Percentage distribution of radio owned by households by district



Source: SSL, Population and Housing Census 2004

Figure 35c: Percentage distribution of computers owned by households by district



Source: SSL, Population and Housing Census 2004

6.3.3 Number of Telephones and Cell Phones Owned By Households by District

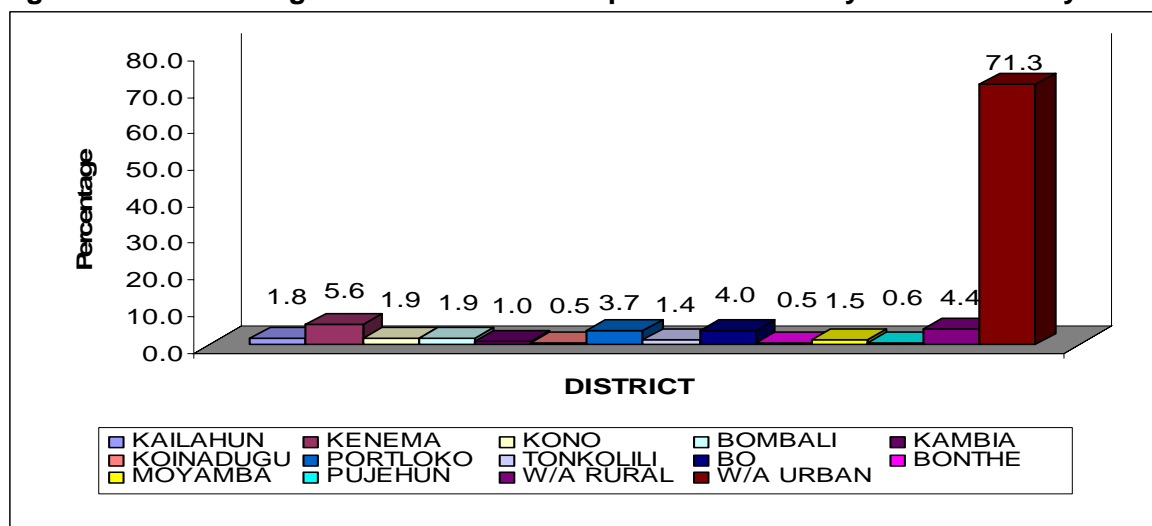
Figures 36a and 36b show the percentages of households that own telephones and cell phones.

Land phones or telephones are mostly used in district head quarter towns, where there are Government offices. In Sierra Leone, this service is been rendered by the Government to bridge communication gap between the Western Area and the provinces.

About 71.3% of land phones are in Western Urban. Kenema districts had 5.6 % of the total number of telephones followed by Western Area (4.4 %) and Bo (4.0 %).

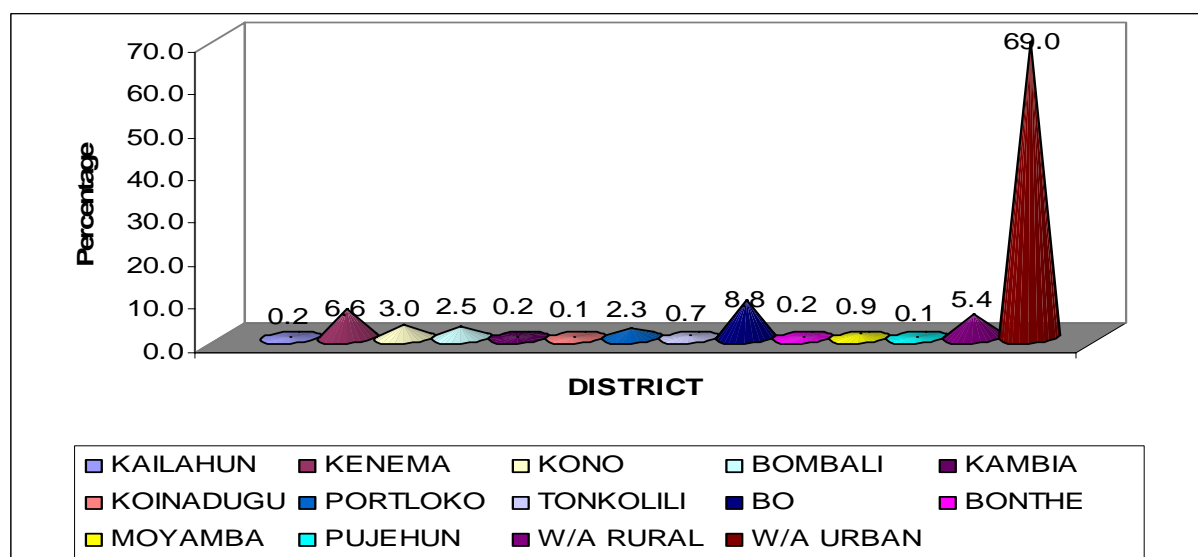
Figure 36b show that more households in the districts owned cell phones as compared to telephones. More than 60% of the cell phones owned were in the Western Urban. Bo district had about 8.8 % of cell phones, followed by Kenema (6.6 %) and Western Rural (5.4 %). In essence all the districts now have at least a mobile coverage. This has probably encouraged household members' ownership, given the fact that cell phones are faster and more convenient means of communication than land phone.

Figure 36a: Percentage Distribution of land phones Owned by Households by district



Source: SSL, Population and Housing Census 2004

Figure 36b: Percentage Distribution of cell phones owned by households by district



Source: SSL, Population and Housing Census 2004

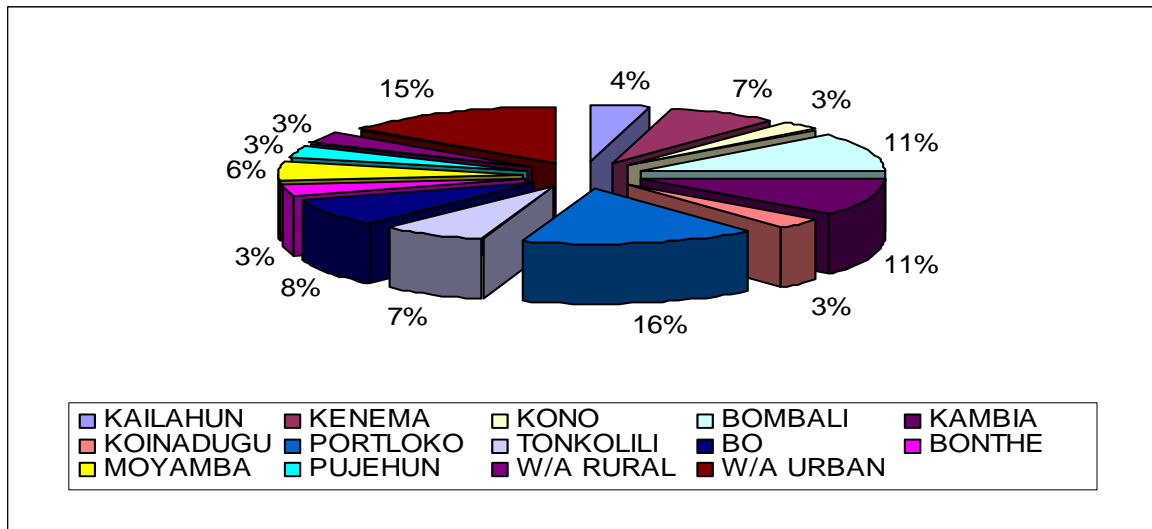
6.3.4 Number of bicycles, motor cycles and vehicles owned by households by districts

Figures 37a, 37b and 37c shows the percentages of the three major mobility assets in the country at the district level. The figures show that a bicycle is owned by most households, followed by motorcycles and vehicles. Portloko district had the highest percentage (about 15.5 %) of bicycles, seconded by Western Area Rural (about 14.9 %), and followed by Bombali (11.1%), Kambia (10.9 %), Bo (8.1 %) and Tonkolili (7.1%) districts.

The districts that had a higher percentage of motor cycles than others were Western Area Urban (20.3 %), Bo (15 %), followed by Bombali (9.8 %), Port Loko (6.8 %) and Kambia district(6.2 %).

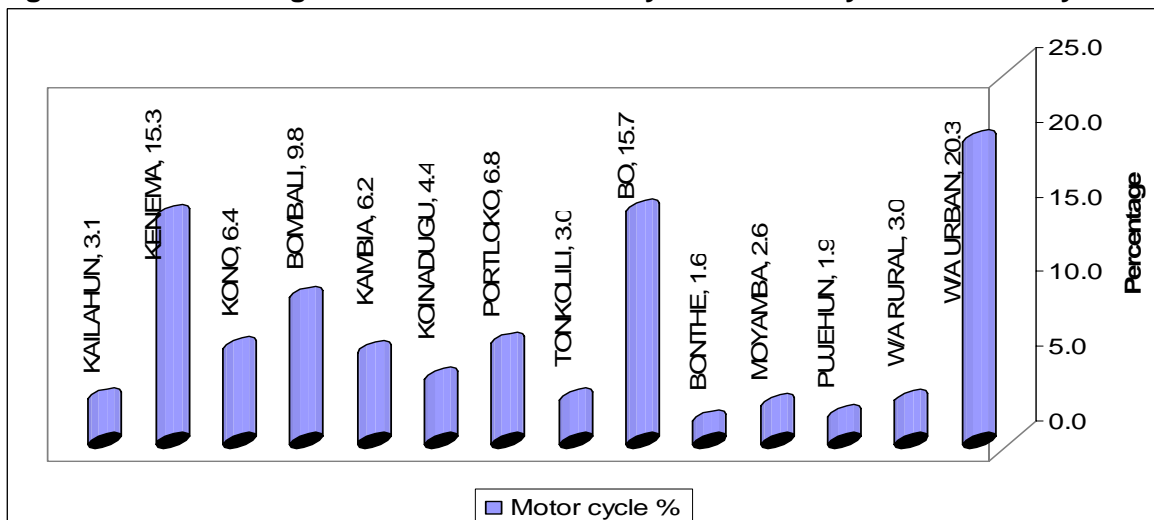
Western Area Urban (Freetown) had the highest percentage of vehicles. It was, however, surprising that Bonthe district (9.3 %) which happens to be one of the poorest districts in the country, had the second highest percentage of vehicles, followed by Bo (6.8 %), Western Area Rural (5.2 %) and Kono (4.7 %). All the other districts had less than 4 % of vehicles (see figure 37c below).

Figure 37a: Percentage distribution of bicycles owned by households by district



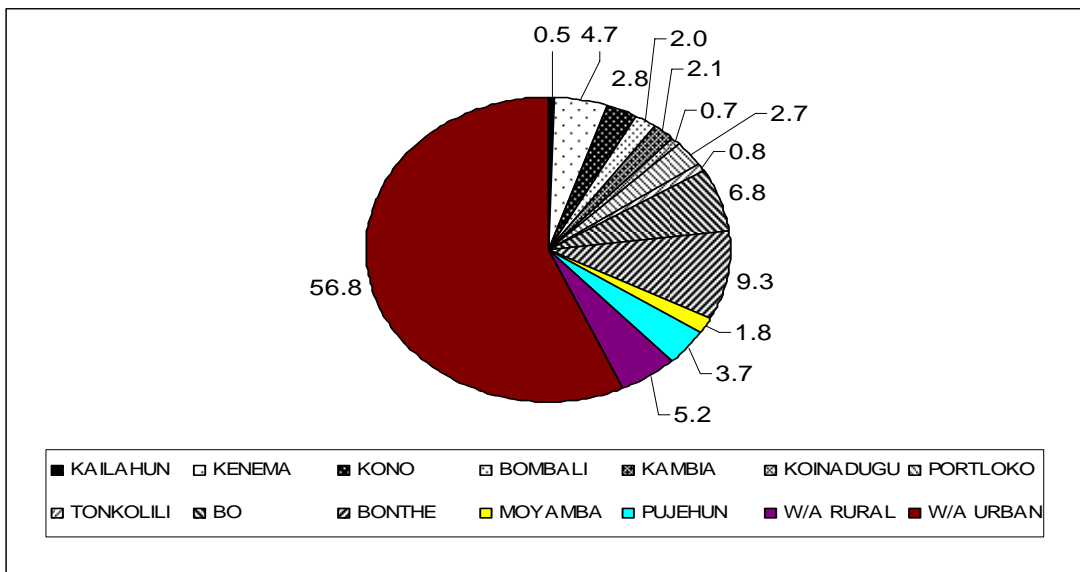
Source: SSL, Population and Housing Census 2004

Figure 37b: Percentage distribution of motor cycles owned by households by district



Source: SSL, Population and Housing Census 2004

Figure 37c: Percentage distribution of vehicles owned by households by district



Source: SSL, Population and Housing Census 2004

SECTION 7

7.0 SUMMARY, CONCLUSION AND RECOMMENDATIONS

7.1 Summary and Conclusion

7.1.1 Economic Activities

There were about 21 economic activities reported in the census of which 1,724,844 were reported economically active. Agriculture is the most vital component in the economic activities in the country that comprises of 1,144,439 economically population (66.4 %) of the labour force. Hence the census data confirms the assertion that sierra Leone is an agrarian economy with the bulk of the labour force found in this sector. The data disaggregated at National level shows that women are more engaged in agriculture 52.2 percent than their male counterparts 47.8 percent.

The analysis shows that household members of all employment categories are involved in agriculture. This is particularly so for the crop sub-sector, where the majority (between 73-97%) of the household members whether employed, self employed, unpaid farm workers, looking for work, not working and not looking for work, household workers, students and the retired are engaged in crop farming.

Women dominated the crop and poultry sub-sectors, while the men dominated the livestock, hunting, forestry and fishery sub-sectors. These results show a similar pattern of gender division of responsibility for crop farming and poultry rearing in the regions as well as in the districts.

Agricultural activities by status and gender at national, regional and districts indicated that the males dominate the paid and self-employed, student and the retired categories while women dominate the unpaid family workforce, household work, not working/not looking for work and other categories in all the six agricultural activities.

7.1.2 Number of Farm Families Cultivating Various Food and Cash Crops

The results reveal that 89 percent of the households in Sierra Leone are farming households. Thus it can be concluded that the population of Sierra Leone is predominantly made up of farmers.

On a regional basis, more farm families are from the Northern Province, followed by the Eastern and Southern Provinces and Western Area respectively. At district level, the Western Urban had a higher share followed by Bo, Kenema, Kailahun, Port Loko, Kono, Tonkolili, Koinadugu, Moyamba, Kambia, Pujehun, Western Rural and Bonthe district, respectively. It may be that respondents could not differentiate between backyard and or street gardening, which most people in Greater Freetown engage in, and farming.

7.1.3 Acreage Cultivated Under Various Food and Cash Crops

Data on acreage cultivated to the various crops shows that a total of 1,995,830.4 hectares out of a total of 5,360,000ha (74%) of available arable land in the country were cultivated in 2004 (UNDP/FAO 1979), with an average of 2.7 ha. This translates into 35.6 percent of land under cultivation. Thus there is 38.4 percent of arable land currently not under cultivation, indicating that availability of arable land is not a limitation but rather availability of other production factors: labour, capital, inputs, infrastructure and commodity prices.

Data analysis according to the acreages under the various crops indicated that about a third of the area was cultivated to both upland and lowland rice, followed by coffee, cassava, oil palm, groundnut, cacao, vegetable, potato, citrus and maize respectively.

Regional analysis indicated that although there were more farm families in the Northern Province, yet Eastern Province had the highest percentage of land cultivated, followed by the Northern and Southern Provinces and Western Area. The relatively high percentage of farm families in the Western Area did not, however, reflect in the acreage cultivated.

7.1.4 Number of Livestock Reared By Farm Families

The result showed that livestock is reared in every part of the country. Chicken was the commonest livestock reared followed by goats and sheep, cattle and pigs respectively. The high percentage of chicken owned may be due to government's policy on re-stocking, the use of chicken meat to augment the protein requirements of household members, and the commercial importance of poultry farming.

The Northern Province recorded the highest number of livestock, followed by Eastern and Southern Provinces and the Western Area. At district level, Port Loko had the highest number of herd followed by Kambia, Moyamba, Tonkolil, Bo, Kenema, Kailahun/Bombali, Koinadugu, Kono and Pujehun districts respectively. All the remaining districts have less than five percent share each.

7.1.5 Access to Agricultural Production Resources

The result shows that at national level, farming families have little access to agricultural production and processing resources. The findings also revealed that access was higher for drying floors followed by storage facilities and graters, respectively. A very low percentage of household members had access to mills, tillers, tractors, threshers and pressers. This situation is bound to affect the timely and efficient execution of farming activities as well as the quality and quantity of produce. At regional level, the data shows that generally, access was higher for farm families in the Southern than the Northern and Eastern Provinces and Western Area. District level analysis indicated that households in Bo district had more access than Moyamba, Bombali, Kambia, Port Loko, Bonthe, Pujehun and Kenema districts.

7.1.6 Ownership of Household Assets

The result shows that radio was owned by almost every household and constituted more than fifty percent of total assets owned. This was followed by cell phones, bicycles, televisions and stoves. An insignificant proportion owned refrigerators and computers.

Western area had close to fifty percent of the total national assets followed by the Northern, Southern and the Eastern regions.

Disaggregating the result at district level indicated that more than three-fifth of these assets were owned by households in the Western Urban district of Freetown followed by Bo, Kenema, Port Loko, Western Area Rural, Bombali and Kono districts. The other districts owned less than four percent.

7.2 Recommendations

- Women's high participation in agriculture does not reflect their employment status in that they dominate the unpaid family and household workers categories compared to their men. Hence there is need to improve on women's access to both formal and informal education and also to make the working environment gender sensitive and friendly to facilitate their sustained participation in both paid and unpaid employment.
- More land need to be brought under cultivation. To achieve this, there is need to address the perennial problems of insecure tenancy, unavailability of labour, inaccessibility to capital and market, unavailability of relevant agricultural technology including seeds, planting materials and agro-chemicals, poor output price conditions, absence of appropriate infrastructure and poor irrigation facilities, factors that limit how much land a farmer could cultivate.
- The severely depleted animal population in the country calls for an urgent need to acquire and restock more livestock of all species in order to establish viable population in the country. There is also need to rehabilitate the damaged livestock infrastructures, improve the morale of livestock staff through increased incentives and working conditions and manpower training, improve on veterinary services and financial assistance to livestock farmers.
- The high percentage of farm families without access to production and post harvest facilities may have serious implications for acreage under cultivation, improved agricultural productivity and the achievement of food security, which is a major development priority of the government. Availability of credit, foreign exchange to import spare agriculture machinery and spare parts, availability and reliability of supplies, availability of repair and maintenance services, availability of trained operators and training, provision of production and post-harvest equipment at affordable cost, provision of post-harvest structures are all needed to improve on agricultural productivity in the country.
- The low percentage of household members who owned basic household assets, particularly in the provinces, is an indication of the level of poverty,

which is pervasive in the country. Providing skills training, education and gainful employment, particularly in the provinces, could improve the incomes of people and affordability of household assets.

- There is need for a well designed agricultural statistical system that will provide not only a better understanding of the present situation but also benchmarks from which to monitor socio-economic development over time. Such agricultural data should encompass all the agricultural sub-sectors and components.

8.0 REFERENCES AND ANNEXES

8.1 References

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8.2 ANNEXES

8.3 8.2.1 a Sierra Leone's Agriculturally Active Population by Gender

Activity	Economically Active Population by Sex			Percentage by Sex		
	Male	Female	Total	% Male	% Female	% Total
Crop Farming	508421	574413	1082834	47.0	53.0	94.6
Livestock	3637	3213	6850	53.1	46.9	0.6
Poultry	806	883	1689	47.7	52.3	0.1
Hunting	699	443	1142	61.2	38.8	0.1
Forestry	3849	2033	5882	65.4	34.6	0.5
Fishing	29832	16210	46042	64.8	35.2	4.0
Total	547244	597195	1144439	47.8	52.2	100.0

8.2.1 b: Percentage Distribution of Economic Activity by Employment Status in Sierra Leone

Activity	Employment Status								
	Paid Employee	Self Employed	Unpaid Farm Worker	Looking for Work	Not Working/ Not Look	HH Work	Student	Retired	Others
Crop Farming	72.6	94.4	96.8	93.2	92.3	95.8	92.9	80.0	92.3
Livestock	3.8	0.5	0.5	0.5	1.2	0.9	1.0	1.8	2.4
Poultry	1.6	0.1	0.2	1.2	1.0	0.3	0.0	0.0	0.8
Hunting	1.2	0.1	0.1	0.5	0.9	0.1	1.6	1.8	0.4
Forestry	5.9	0.5	0.3	0.7	2.1	0.3	0.8	7.3	0.8
Fishing	14.8	4.4	2.1	3.8	2.6	2.5	3.7	9.1	3.3
	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

8.2.1 c Sierra Leone Employment Status by Activity by Gender

Employment Status	Crop Farming		Livestock		Poultry		Hunting		Forestry		Fishing	
	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female
Paid Employee	70.1	29.9	71.0	29.0	74.5	25.5	72.1	27.9	85.5	14.5	86.7	13.3
Self Employed	49.1	50.9	53.2	46.8	46.2	53.8	59.2	40.8	63.0	37.0	65.4	34.6
Unpaid Farm Worker	39.5	60.5	45.7	54.3	38.8	61.2	57.1	42.9	48.0	52.0	50.8	49.2
Looking for work	67.4	32.6	0.0	100.0	57.1	42.9	100.0	0.0	25.0	75.0	77.3	22.7
Not Working/Not looking	41.4	58.6	40.0	60.0	12.5	87.5	42.9	57.1	64.7	35.3	47.6	52.4
HH Work	13.5	86.5	6.1	93.9	4.5	95.5	12.5	87.5	30.4	69.6	16.1	83.9
Student	59.3	40.7	28.6	71.4	0.0	0.0	81.8	18.2	66.7	33.3	65.4	34.6
Retired	45.5	54.5	0.0	100.0	0.0	0.0	100.0	0.0	75.0	25.0	40.0	60.0
Others	44.4	55.6	47.8	52.2	25.0	75.0	25.0	75.0	62.5	37.5	56.3	43.8
Total	47.0	53.0	53.1	46.9	47.7	52.3	61.2	38.8	65.4	34.6	64.8	35.2

8.2.1 d: Eastern Province

Employment Status	Crop Farming		Livestock		Poultry		Hunting		Forestry		Fishing	
	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female
Paid Employee	66.2	33.8	62.5	37.5	72.2	27.8	88.1	11.9	90.7	9.3	65.0	35.0
Self Employed	53.5	46.5	57.4	42.6	45.0	55.0	60.5	39.5	82.2	17.8	81.5	18.5
Unpaid Farm Worker	43.6	56.4	41.4	58.6	40.9	59.1	78.8	21.2	67.3	32.7	60.0	40.0
Looking for work	73.3	26.7	0.0	100.0	0.0	100.0	100.0	0.0	0.0	100.0	100.0	0.0
Not Working/Not looking	46.0	54.0	0.0	0.0	0.0	100.0	0.0	0.0	87.5	12.5	0.0	0.0
HH Work	12.9	87.1	6.3	93.8	0.0	100.0	25.0	75.0	0.0	100.0	28.6	71.4
Student	60.3	39.7	25.0	75.0	0.0	0.0	0.0	100.0	100.0	0.0	60.0	40.0
Retired	88.9	11.1	0.0	100.0	0.0	0.0	100.0	0.0	100.0	0.0	0.0	0.0
Others	46.6	53.4	60.0	40.0	16.7	83.3	0.0	100.0	50.0	50.0	50.0	50.0
Total	50.9	49.1	54.3	45.7	43.2	56.8	78.4	21.6	81.2	18.8	77.0	23.0

8.2.1 e: Northern Province

Employment Status	Crop Farming		Livestock		Poultry		Hunting		Forestry		Fishing	
	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female
Paid Employee	70.6	29.4	74.0	26.0	60.7	39.3	85.7	14.3	87.0	13.0	67.8	32.2
Self Employed	46.7	53.3	52.0	48.0	36.7	63.3	58.8	41.2	59.0	41.0	63.4	36.6
Unpaid Farm Worker	37.2	62.8	48.2	51.8	30.4	69.6	64.5	35.5	40.6	59.4	48.0	52.0
Looking for work	59.8	40.2	0.0	0.0	66.7	33.3	100.0	0.0	0.0	0.0	100.0	0.0
Not Working/Not looking	41.3	58.7	25.0	75.0	0.0	100.0	0.0	100.0	100.0	0.0	0.0	0.0
HH Work	5.1	94.9	6.7	93.3	8.3	91.7	0.0	0.0	20.0	80.0	15.8	84.2
Student	62.2	37.8	0.0	0.0	0.0	0.0	0.0	100.0	0.0	100.0	100.0	0.0
Retired	17.4	82.6	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Others	38.4	61.6	38.5	61.5	0.0	100.0	50.0	50.0	33.3	66.7	50.0	50.0
Total	44.3	55.7	52.1	47.9	37.3	62.7	62.1	37.9	59.3	40.7	60.9	39.1

8.2.1 f: Southern Province

Employment Status	Crop Farming		Livestock		Poultry		Hunting		Forestry		Fishing	
	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female
Paid Employee	76.2	23.8	64.9	35.1	83.3	16.7	57.1	42.9	90.8	9.2	88.0	12.0
Self Employed	48.8	51.2	47.3	52.7	42.4	57.6	58.6	41.4	65.0	35.0	63.6	36.4
Unpaid Farm Worker	39.0	61.0	36.0	64.0	40.4	59.6	60.0	40.0	28.6	71.4	50.4	49.6
Looking for work	64.0	36.0	0.0	0.0	0.0	100.0	100.0	0.0	100.0	0.0	75.0	25.0
Not Working/Not looking	37.7	62.3	50.0	50.0	0.0	0.0	0.0	0.0	0.0	0.0	46.7	53.3
HH Work	10.3	89.7	6.3	93.8	0.0	100.0	0.0	100.0	40.0	60.0	7.8	92.2
Student	51.6	48.4	0.0	100.0	0.0	0.0	0.0	0.0	0.0	0.0	68.4	31.6
Retired	66.7	33.3	0.0	0.0	0.0	0.0	100.0	0.0	0.0	0.0	0.0	100.0
Others	48.0	52.0	33.3	66.7	0.0	0.0	0.0	0.0	0.0	0.0	63.6	36.4
Total	47.3	52.7	47.3	52.7	47.4	52.6	58.5	41.5	67.1	32.9	62.7	37.3

8.2.1 g: Western Area Province

Employment Status	Crop Farming		Livestock		Poultry		Hunting		Forestry		Fishing	
	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female
Paid Employee	71.3	28.7	74.7	25.3	78.5	21.5	66.2	33.8	80.6	19.4	91.5	8.5
Self Employed	47.0	53.0	57.5	42.5	57.9	42.1	57.0	43.0	58.3	41.7	65.5	34.5
Unpaid Farm Worker	37.0	63.0	33.8	66.2	45.0	55.0	47.1	52.9	56.1	43.9	52.5	47.5
Looking for work	65.1	34.9	0.0	100.0	100.0	0.0	100.0	0.0	0.0	100.0	69.2	30.8
Not Working/Not looking	44.0	56.0	50.0	50.0	20.0	80.0	50.0	50.0	28.6	71.4	50.0	50.0
HH Work	23.0	77.0	0.0	100.0	0.0	100.0	33.3	66.7	33.3	66.7	20.9	79.1
Student	53.8	46.2	100.0	0.0	0.0	0.0	100.0	0.0	50.0	50.0	0.0	100.0
Retired	66.7	33.3	0.0	0.0	0.0	0.0	0.0	0.0	66.7	33.3	50.0	50.0
Others	33.3	66.7	100.0	0.0	100.0	0.0	0.0	100.0	100.0	0.0	55.6	44.4
Total	47.8	52.2	60.2	39.8	63.0	37.0	58.8	41.2	63.3	36.7	68.3	31.7

8.2.1 h: Kailahun District

Employment Status	Crop Farming		Livestock		Poultry		Hunting		Forestry		Fishing	
	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female
Paid Employee	64.4	35.6	61.0	39.0	27.3	72.7	71.4	28.6	93.8	6.3	78.7	21.3
Self Employed	50.9	49.1	48.1	51.9	33.3	66.7	52.4	47.6	69.5	30.5	82.3	17.7
Unpaid Farm Worker	45.7	54.3	28.1	71.9	44.4	55.6	40.0	60.0	44.2	55.8	51.2	48.8
Looking for work	72.3	27.7	0.0	100.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Not Working/Not looking	44.8	55.2	0.0	0.0	0.0	0.0	100.0	0.0	100.0	0.0	0.0	0.0
HH Work	19.0	81.0	25.0	75.0	0.0	100.0	0.0	0.0	0.0	100.0	60.0	40.0
Student	61.3	38.7	0.0	100.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	100.0
Retired	100.0	0.0	0.0	100.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Others	45.9	54.1	0.0	0.0	0.0	100.0	0.0	0.0	0.0	100.0	50.0	50.0
Total	49.3	50.7	46.4	53.6	37.6	62.4	52.3	47.7	63.1	36.9	76.2	23.8

8.2.1 i: Kenema District

Employment Status	Crop Farming		Livestock		Poultry		Hunting		Forestry	Fishing		
	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female
Paid Employee	74.9	25.1	61.2	38.8	90.9	9.1	71.4	28.6	89.0	11.0	68.4	31.6
Self Employed	55.5	44.5	49.2	50.8	59.6	40.4	62.3	37.7	86.9	13.1	75.0	25.0
Unpaid Farm Worker	41.2	58.8	31.1	68.9	32.8	67.2	42.9	57.1	81.3	18.8	70.6	29.4
Looking for work	52.1	47.9	0.0	0.0	0.0	100.0	0.0	0.0	0.0	100.0	100.0	0.0
Not Working/Not looking	55.9	44.1	0.0	0.0	0.0	100.0	0.0	0.0	80.0	20.0	0.0	0.0
HH Work	13.1	86.9	0.0	100.0	0.0	100.0	0.0	100.0	0.0	100.0	16.7	83.3
Student	58.2	41.8	50.0	50.0	0.0	0.0	0.0	0.0	100.0	0.0	100.0	0.0
Retired	75.0	25.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Others	43.4	56.6	33.3	66.7	50.0	50.0	0.0	100.0	100.0	0.0	25.0	75.0
Total	52.7	47.3	46.9	53.1	46.4	53.6	56.3	43.7	86.4	13.6	73.4	26.6

8.2.1 j: Kono District

Employment Status	Crop Farming		Livestock		Poultry		Hunting		Forestry		Fishing	
	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female
Paid Employee	59.5	40.5	68.2	31.8	92.9	7.1	76.0	24.0	100.0	0.0	58.3	41.7
Self Employed	53.2	46.8	64.0	36.0	40.9	59.1	69.1	30.9	73.3	26.7	84.0	16.0
Unpaid Farm Worker	42.3	57.7	52.5	47.5	42.5	57.5	66.7	33.3	63.3	36.7	50.0	50.0
Looking for work	85.6	14.4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Not Working/Not looking	42.6	57.4	0.0	0.0	0.0	0.0	0.0	0.0	100.0	0.0	0.0	0.0
HH Work	8.9	91.1	0.0	100.0	0.0	100.0	0.0	0.0	0.0	0.0	50.0	50.0
Student	60.3	39.7	0.0	100.0	0.0	0.0	50.0	50.0	100.0	0.0	50.0	50.0
Retired	100.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	100.0	0.0	0.0	0.0
Others	50.0	50.0	100.0	0.0	0.0	100.0	0.0	0.0	0.0	0.0	0.0	0.0
Total	50.5	49.5	61.2	38.8	44.0	56.0	72.1	27.9	75.4	24.6	79.2	20.8

8.2.1 k: Bombali District

Employment Status	Crop Farming		Livestock		Poultry		Hunting		Forestry		Fishing	
	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female
Paid Employee	73.8	26.2	84.1	15.9	60.0	40.0	87.5	12.5	85.5	14.5	87.9	12.1
Self Employed	44.5	55.5	52.3	47.7	40.0	60.0	51.2	48.8	52.2	47.8	81.4	18.6
Unpaid Farm Worker	35.5	64.5	40.1	59.9	52.0	48.0	50.0	50.0	16.3	83.7	69.0	31.0
Looking for work	65.6	34.4	0.0	0.0	100.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Not Working/Not looking	39.1	60.9	0.0	100.0	0.0	0.0	0.0	100.0	0.0	0.0	0.0	0.0
HH Work	17.8	82.2	0.0	100.0	0.0	100.0	0.0	0.0	0.0	0.0	100.0	0.0
Student	53.7	46.3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Retired	25.0	75.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Others	57.6	42.4	60.0	40.0	0.0	0.0	0.0	0.0	0.0	100.0	50.0	50.0
Total	42.6	57.4	51.4	48.6	45.3	54.7	54.7	45.3	49.2	50.8	80.1	19.9

8.2.1 l Kambia District

Employment Status	Crop Farming		Livestock		Poultry		Hunting		Forestry		Fishing	
	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female
Paid Employee	76.8	23.2	75.0	25.0	77.8	22.2	91.7	8.3	92.0	8.0	62.8	37.2
Self Employed	49.5	50.5	53.4	46.6	46.7	53.3	55.0	45.0	63.5	36.5	60.8	39.2
Unpaid Farm Worker	35.9	64.1	46.2	53.8	16.7	83.3	44.4	55.6	55.4	44.6	47.2	52.8
Looking for work	50.0	50.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	100.0	0.0
Not Working/Not looking	42.9	57.1	0.0	0.0	0.0	100.0	0.0	0.0	100.0	0.0	0.0	0.0
HH Work	20.6	79.4	0.0	100.0	0.0	0.0	0.0	0.0	0.0	100.0	12.5	87.5
Student	60.0	40.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	100.0	0.0
Retired	0.0	100.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Others	26.3	73.7	0.0	100.0	0.0	0.0	0.0	100.0	0.0	0.0	0.0	0.0
Total	45.4	54.6	51.5	48.5	44.2	55.8	61.9	38.1	64.7	35.3	56.5	43.5

8.2.1 m: Koinadugu District

Employment Status	Crop Farming		Livestock		Poultry		Hunting		Forestry		Fishing	
	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female
Paid Employee	71.0	29.0	76.2	23.8	75.0	25.0	60.0	40.0	90.9	9.1	90.0	10.0
Self Employed	46.0	54.0	54.0	46.0	17.6	82.4	61.2	38.8	60.3	39.7	52.3	47.7
Unpaid Farm Worker	38.9	61.1	54.7	45.3	58.3	41.7	62.5	37.5	28.6	71.4	60.0	40.0
Looking for work	63.2	36.8	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Not Working/Not looking	20.0	80.0	50.0	50.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
HH Work	15.1	84.9	33.3	66.7	0.0	100.0	0.0	0.0	0.0	100.0	0.0	100.0
Student	61.5	38.5	0.0	0.0	0.0	0.0	0.0	0.0	0.0	100.0	0.0	0.0
Retired	23.1	76.9	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Others	37.2	62.8	66.7	33.3	0.0	0.0	100.0	0.0	50.0	50.0	0.0	0.0
Total	44.3	55.7	55.0	45.0	29.6	70.4	61.9	38.1	60.0	40.0	57.7	42.3

8.2.1 n: Port Loko District

Employment Status	Crop Farming		Livestock		Poultry		Hunting		Forestry		Fishing	
	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female
Paid Employee	70.5	29.5	73.3	26.7	47.4	52.6	80.0	20.0	81.0	19.0	64.5	35.5
Self Employed	45.6	54.4	43.0	57.0	32.8	67.2	64.3	35.7	59.1	40.9	61.2	38.8
Unpaid Farm Worker	35.3	64.7	43.8	56.2	23.3	76.7	71.4	28.6	56.8	43.2	44.7	55.3
Looking for work	38.9	61.1	0.0	0.0	50.0	50.0	100.0	0.0	0.0	0.0	100.0	0.0
Not Working/Not looking	42.9	57.1	0.0	0.0	0.0	0.0	0.0	0.0	100.0	0.0	0.0	0.0
HH Work	12.0	88.0	0.0	100.0	0.0	100.0	0.0	0.0	50.0	50.0	12.5	87.5
Student	61.5	38.5	0.0	0.0	0.0	0.0	0.0	100.0	0.0	0.0	0.0	0.0
Retired	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Others	36.1	63.9	0.0	0.0	0.0	100.0	0.0	0.0	0.0	0.0	0.0	100.0
Total	43.4	56.6	45.5	54.5	31.6	68.4	66.1	33.9	61.1	38.9	59.5	40.5

8.2.1 o: Tonkolili District

Employment Status	Crop Farming		Livestock		Poultry		Hunting		Forestry		Fishing	
	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female
Paid Employee	64.7	35.3	52.6	47.4	66.7	33.3	100.0	0.0	91.2	8.8	60.0	40.0
Self Employed	49.5	50.5	52.5	47.5	44.2	55.8	55.7	44.3	60.4	39.6	55.9	44.1
Unpaid Farm Worker	40.0	60.0	45.8	54.2	22.0	78.0	75.0	25.0	37.5	62.5	88.5	11.5
Looking for work	73.7	26.3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Not Working/Not looking	50.0	50.0	0.0	100.0	0.0	0.0	0.0	100.0	0.0	0.0	0.0	0.0
HH Work	13.5	86.5	0.0	100.0	50.0	50.0	0.0	0.0	0.0	100.0	0.0	0.0
Student	67.7	32.3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Retired	0.0	100.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Others	42.6	57.4	0.0	100.0	0.0	0.0	0.0	0.0	0.0	0.0	100.0	0.0
Total	46.5	53.5	49.4	50.6	34.5	65.5	62.6	37.4	64.5	35.5	59.6	40.4

8.2.1 p: Bo District

Employment Status	Crop Farming		Livestock		Poultry		Hunting		Forestry		Fishing	
	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female
Paid Employee	73.8	26.2	57.9	42.1	94.4	5.6	53.3	46.7	87.2	12.8	88.1	11.9
Self Employed	46.7	53.3	47.4	52.6	45.6	54.4	50.0	50.0	65.8	34.2	73.6	26.4
Unpaid Farm Worker	41.3	58.7	32.5	67.5	48.3	51.7	57.1	42.9	52.4	47.6	67.5	32.5
Looking for work	60.6	39.4	0.0	0.0	0.0	100.0	100.0	0.0	100.0	0.0	100.0	0.0
Not Working/Not looking	31.3	68.7	100.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	50.0	50.0
HH Work	7.6	92.4	0.0	100.0	0.0	100.0	0.0	100.0	0.0	100.0	5.6	94.4
Student	52.7	47.3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	75.0	25.0
Retired	66.7	33.3	0.0	0.0	0.0	0.0	100.0	0.0	0.0	0.0	0.0	0.0
Others	50.6	49.4	0.0	100.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total	46.0	54.0	46.7	53.3	53.3	46.7	52.0	48.0	70.6	29.4	72.4	27.6

8.2.1 q: Bonthe District

Employment Status	Crop Farming		Livestock		Poultry		Hunting		Forestry		Fishing	
	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female
Paid Employee	79.8	20.2	70.0	30.0	33.3	66.7	100.0	0.0	100.0	0.0	89.4	10.6
Self Employed	47.5	52.5	47.6	52.4	33.3	66.7	66.7	33.3	67.7	32.3	65.5	34.5
Unpaid Farm Worker	43.0	57.0	50.0	50.0	60.0	40.0	50.0	50.0	30.6	69.4	62.3	37.7
Looking for work	58.8	41.2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	66.7	33.3
Not Working/Not looking	40.0	60.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	60.0	40.0
HH Work	16.8	83.2	0.0	100.0	0.0	0.0	0.0	0.0	50.0	50.0	7.7	92.3
Student	66.7	33.3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	50.0	50.0
Retired	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Others	14.3	85.7	0.0	100.0	0.0	0.0	0.0	0.0	0.0	0.0	83.3	16.7
Total	47.1	52.9	47.4	52.6	40.0	60.0	64.7	35.3	60.3	39.7	66.2	33.8

8.2.1 s: Moyamba District

Employment Status	Crop Farming		Livestock		Poultry		Hunting		Forestry		Fishing	
	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female
Paid Employee	73.3	26.7	78.1	21.9	83.3	16.7	66.7	33.3	92.0	8.0	96.4	3.6
Self Employed	48.1	51.9	56.9	43.1	28.6	71.4	60.6	39.4	72.0	28.0	68.0	32.0
Unpaid Farm Worker	35.4	64.6	36.7	63.3	28.6	71.4	61.5	38.5	25.0	75.0	53.0	47.0
Looking for work	57.1	42.9	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Not Working/Not looking	39.3	60.7	33.3	66.7	0.0	0.0	0.0	0.0	0.0	0.0	25.0	75.0
HH Work	9.8	90.2	0.0	100.0	0.0	0.0	0.0	100.0	0.0	0.0	0.0	100.0
Student	60.0	40.0	0.0	100.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	100.0
Retired	0.0	100.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	100.0
Others	36.7	63.3	100.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	100.0
Total	45.9	54.1	56.1	43.9	38.2	61.8	60.0	40.0	74.8	25.2	66.8	33.2

8.2.1 t: Pujehun District

Employment Status	Crop Farming		Livestock		Poultry		Hunting		Forestry		Fishing	
	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female
Paid Employee	79.4	20.6	58.3	41.7	66.7	33.3	50.0	50.0	97.6	2.4	68.2	31.8
Self Employed	54.8	45.2	32.4	67.6	50.0	50.0	66.7	33.3	58.1	41.9	54.4	45.6
Unpaid Farm Worker	39.6	60.4	31.3	68.8	22.2	77.8	66.7	33.3	10.3	89.7	40.4	59.6
Looking for work	77.1	22.9	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Not Working/Not looking	48.1	51.9	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
HH Work	11.9	88.1	33.3	66.7	0.0	100.0	0.0	0.0	0.0	0.0	15.4	84.6
Student	35.0	65.0	0.0	100.0	0.0	0.0	0.0	0.0	0.0	0.0	75.0	25.0
Retired	100.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Others	52.4	47.6	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	100.0	0.0
Total	51.6	48.4	35.0	65.0	41.4	58.6	65.9	34.1	59.2	40.8	51.9	48.1

8.2.1 u: Western Rural District

Employment Status	Crop Farming		Livestock		Poultry		Hunting		Forestry		Fishing	
	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female
Paid Employee	71.5	28.5	62.7	37.3	72.7	27.3	28.6	71.4	88.0	12.0	95.8	4.2
Self Employed	46.9	53.1	64.8	35.2	51.1	48.9	58.9	41.1	60.0	40.0	68.7	31.3
Unpaid Farm Worker	40.3	59.7	0.0	100.0	44.4	55.6	54.5	45.5	60.0	40.0	42.0	58.0
Looking for work	66.0	34.0	0.0	0.0	100.0	0.0	0.0	0.0	0.0	0.0	87.5	12.5
Not Working/Not looking	66.7	33.3	0.0	0.0	0.0	0.0	33.3	66.7	0.0	0.0	33.3	66.7
HH Work	30.0	70.0	0.0	0.0	0.0	100.0	0.0	0.0	100.0	0.0	33.3	66.7
Student	66.7	33.3	0.0	0.0	0.0	0.0	100.0	0.0	0.0	0.0	0.0	100.0
Retired	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Others	28.6	71.4	0.0	0.0	0.0	0.0	0.0	0.0	100.0	0.0	50.0	50.0
Total	47.1	52.9	62.5	37.5	56.8	43.2	57.1	42.9	63.4	36.6	69.2	30.8

8.2.1 v: Western Urban District

Employment Status	Crop Farming		Livestock		Poultry		Hunting		Forestry		Fishing	
	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female	% Male	% Female
Paid Employee	71.2	28.8	77.5	22.5	79.4	20.6	70.1	29.9	79.7	20.3	89.3	10.7
Self Employed	47.5	52.5	53.2	46.8	59.5	40.5	54.9	45.1	57.7	42.3	59.1	40.9
Unpaid Farm Worker	32.0	68.0	39.7	60.3	45.1	54.9	43.5	56.5	54.5	45.5	67.7	32.3
Looking for work	60.0	40.0	0.0	100.0	0.0	0.0	100.0	0.0	0.0	100.0	40.0	60.0
Not Working/Not looking	31.3	68.8	50.0	50.0	20.0	80.0	100.0	0.0	28.6	71.4	66.7	33.3
HH Work	5.1	94.9	0.0	100.0	0.0	0.0	33.3	66.7	0.0	100.0	5.3	94.7
Student	42.9	57.1	100.0	0.0	0.0	0.0	100.0	0.0	50.0	50.0	0.0	0.0
Retired	66.7	33.3	0.0	0.0	0.0	0.0	0.0	0.0	66.7	33.3	50.0	50.0
Others	40.0	60.0	100.0	0.0	100.0	0.0	0.0	100.0	100.0	0.0	57.1	42.9
Total	49.2	50.8	59.3	40.7	64.3	35.7	59.9	40.1	63.3	36.7	66.8	33.2

8.2.2a Cropping Activities in Sierra Leone by Acre(Acre) and Hectare (Ha)

CROP	ACRE(Acre)	HECTARE (Ha)	%
RICE	1524269	609707.6	30.5
CASSAVA	636025	254410	12.7
POTATOES	224298	89719.2	4.5
GROUNDNUT	327594	131037.6	6.6
MAIZE	150595	60238	3.0
COFFEE	861370	344548	17.3
CACAO	371663	148665.2	7.4
OIL PALM	580030	232012	11.6
CITRUS	129807	51922.8	2.6
VEGETABLE	183925	73570	3.7
TOTAL	4989576	1995830.4	100.0

8.2.2b Cropping Activities Undertaken by Households in the Region by Acres(Acre)

REGION	Farm HHs	Rice	Cassava	Potatoes	Ground-nut	Maize	Coffee	Cacao	Oil Palm	Citrus	Vegetable	Total
EASTERN	188656	440771	119885	51026	50133	32143	585028	290759	165171	40223	51832	1826971
NORTHERN	239182	665954	249793	105298	184212	66048	45946	11999	145827	46853	76962	1598892
SOUTHERN	167227	401543	255815	62269	87960	50604	226420	66560	262057	37341	48937	1499506
WESTERN	134375	16001	10532	5705	5289	1800	3976	2345	6975	5390	6194	64207
	729440	1524269	636025	224298	327594	150595	861370	371663	580030	129807	183925	4989576

8.2.2c Cropping Activities Undertaken by Households in the Region by Hectares (HA)

REGION	Farm HHs	Rice	Cassava	Potatoes	Ground-nut	Maize	Coffee	Cocao	Oil Palm	Citrus	Vegetable	Total
EASTERN	188656	176308.4	47954	20410.4	20053.2	12857.2	234011.2	116303.6	66068.4	16089.2	20732.8	730788.4
NORTHERN	239182	266381.6	99917.2	42119.2	73684.8	26419.2	18378.4	4799.6	58330.8	18741.2	30784.8	639556.8
SOUTHERN	167227	160617.2	102326	24907.6	35184	20241.6	90568	26624	104822.8	14936.4	19574.8	599802.4
WESTERN	134375	6400.4	4212.8	2282	2115.6	720	1590.4	938	2790	2156	2477.6	25682.8
	729440	609707.6	254410	89719.2	131037.6	60238	344548	148665.2	232012	51922.8	73570	1995830.4

8.2.2d Cropping Activities Undertaken by Households in the Region by Hectares (HA) %

REGION	Farm HHs	%Rice	% Cassava	% Potato	% Groundnut	% Maize	% Coffee	% Cacao	% Oil Palm	% Citrus	% Vegetable	% Total
EASTERN	25.9	28.9	18.8	22.7	15.3	21.3	67.9	78.2	28.5	31	28.2	36.6
NORTHERN	32.8	43.7	39.3	46.9	56.2	43.9	5.3	3.2	25.1	36.1	41.8	32
SOUTHERN	22.9	26.3	40.2	27.8	26.9	33.6	26.3	17.9	45.2	28.8	26.6	30.1
WESTERN	18.4	1.0	1.7	2.5	1.6	1.2	0.5	0.6	1.2	4.2	3.4	1.3
	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100	100

8.2.2e Cropping Activities Undertaken By Households In The District By Acres

DISTRICT	Farm HHs	Rice	Cassava	Potatoes	Groundnut	Maize	Coffee	Cacao	Oil Palm	Citrus	Vegetable	Total
KAILAHUN	63942	167103	39990	14002	15637	8361	200275	133504	64962	7812	18620	670266
KENEMA	68465	139103	35937	14937	14246	9042	196237	90912	79827	20416	10734	611391
KONO	56249	134565	43958	22087	20250	14740	188516	66343	20382	11995	22478	545314
BOMBALI	54102	108304	47909	19966	45577	12465	2251	1786	22678	6220	17765	284921
KAMBIA	35099	120546	48395	21749	27103	9834	1539	917	27078	12081	13993	283235
KOINADUGU	41259	142512	39239	23932	50288	18090	27913	6582	18343	10976	17864	355739
PORTLOKO	59844	172540	76120	26385	29658	11636	1690	594	28375	9320	16964	373282
TONKOLILI	48878	122052	38130	13266	31586	14023	12553	2120	49353	8256	10376	301715
BO	69158	135671	66782	16037	22934	11711	94262	29007	114744	13304	14480	518932
BONTHE	22672	26023	49300	13567	6440	2493	11492	1936	35406	4227	5282	156166
MOYAMBA	40238	158445	91377	22316	39602	29414	30947	6739	38737	12376	18947	448900
PUJEHUN	35159	81404	48356	10349	18984	6986	89719	28878	73170	7434	10228	375508
W/A RURAL	27090	8514	6208	3748	3232	1272	1195	581	3170	2868	4665	35453
W/A URBAN	107285	7487	4324	1957	2057	528	2781	1764	3805	2522	1529	28754
GRAND TOTAL	729440	1524269	636025	224298	327594	150595	861370	371663	580030	129807	183925	4989576

8.2.2f Cropping Activities Undertaken By Households In The Districts By Hectare (HA)

DISTRICT	Farm HHs	Rice	Cassava	Potatoes	Groundnut	Maize	Coffee	Cacao	Oil Palm	Citrus	Vegetable	Total
KAILAHUN	63942	66841.2	15996	5600.8	6254.8	3344.4	80110	53401.6	25984.8	3124.8	7448	268106.4
KENEMA	68465	55641.2	14374.8	5974.8	5698.4	3616.8	78494.8	36364.8	31930.8	8166.4	4293.6	244556.4
KONO	56249	53826	17583.2	8834.8	8100	5896	75406.4	26537.2	8152.8	4798	8991.2	218125.6
BOMBALI	54102	43321.6	19163.6	7986.4	18230.8	4986	900.4	714.4	9071.2	2488	7106	113968.4
KAMBIA	35099	48218.4	19358	8699.6	10841.2	3933.6	615.6	366.8	10831.2	4832.4	5597.2	113294
KOINADUGU	41259	57004.8	15695.6	9572.8	20115.2	7236	11165.2	2632.8	7337.2	4390.4	7145.6	142295.6
PORTLOKO	59844	69016	30448	10554	11863.2	4654.4	676	237.6	11350	3728	6785.6	149312.8
TONKOLILI	48878	48820.8	15252	5306.4	12634.4	5609.2	5021.2	848	19741.2	3302.4	4150.4	120686
BO	69158	54268.4	26712.8	6414.8	9173.6	4684.4	37704.8	11602.8	45897.6	5321.6	5792	207572.8
BONTHE	22672	10409.2	19720	5426.8	2576	997.2	4596.8	774.4	14162.4	1690.8	2112.8	62466.4
MOYAMBA	40238	63378	36550.8	8926.4	15840.8	11765.6	12378.8	2695.6	15494.8	4950.4	7578.8	179560
PUJEHUN	35159	32561.6	19342.4	4139.6	7593.6	2794.4	35887.6	11551.2	29268	2973.6	4091.2	150203.2
W/A RURAL	27090	3405.6	2483.2	1499.2	1292.8	508.8	478	232.4	1268	1147.2	1866	14181.2
W/A URBAN	107285	2994.8	1729.6	782.8	822.8	211.2	1112.4	705.6	1522	1008.8	611.6	11501.6
GRAND TOTAL	729440	609707.6	254410	89719.2	131037.6	60238	344548	148665.2	232012	51922.8	73570	1995830.4

8.2.2g Cropping Activities Undertaken By Households In The Districts By Hectare(HA) %

DISTRICT	FHH	% Rice (Ha)	% Cassava (Ha)	% Potato (Ha)	% G/nut (Ha)	% Maize (Ha)	% Coffee (Ha)	% Cacao (Ha)	% Oil Palm (Ha)	%Citrus (Ha)	% Veg (Ha)	Total %
KAILAHUN	8.8	11	6.3	6.2	4.8	5.6	23.3	35.9	11.2	6	10.1	13.4
KENEMA	9.4	9.1	5.7	6.7	4.3	6.0	22.8	24.5	13.8	15.7	5.8	12.3
KONO	7.7	8.8	6.9	9.8	6.2	9.8	21.9	17.9	3.5	9.2	12.2	10.9
BOMBALI	7.4	7.1	7.5	8.9	13.9	8.3	0.3	0.5	3.9	4.8	9.7	5.7
KAMBIA	4.8	7.9	7.6	9.7	8.3	6.5	0.2	0.2	4.7	9.3	7.6	5.7
KOINADUGU	5.7	9.3	6.2	10.7	15.4	12.0	3.2	1.8	3.2	8.5	9.7	7.1
PORTLOKO	8.2	11.3	12.0	11.8	9.1	7.7	0.2	0.2	4.9	7.2	9.2	7.5
TONKOLILI	6.7	8.0	6.0	5.9	9.6	9.3	1.5	0.6	8.5	6.4	5.6	6
BO	9.5	8.9	10.5	7.1	7.0	7.8	10.9	7.8	19.8	10.2	7.9	10.4
BONTHE	3.1	1.7	7.8	6.0	2.0	1.7	1.3	0.5	6.1	3.3	2.9	3.1
MOYAMBA	5.5	10.4	14.4	9.9	12.1	19.5	3.6	1.8	6.7	9.5	10.3	9
PUJEHUN	4.8	5.3	7.6	4.6	5.8	4.6	10.4	7.8	12.6	5.7	5.6	7.5
W/A RURAL	3.7	0.6	1.0	1.7	1.0	0.8	0.1	0.2	0.5	2.2	2.5	0.7
W/A URBAN	14.7	0.5	0.7	0.9	0.6	0.4	0.3	0.5	0.7	1.9	0.8	0.6
	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100	100

8.2.3a Number Of Livestock Owned By Households In Sierra Leone

LIVESTOCK	NUMBER	%
Cattle	98632	2.4
Goat/Sheep	271781	6.5
Pigs	65423	1.6
Chicken	3227252	77.8
Duck	487508	11.7
Total	4150596	100.0

8.2.3b Number of Livestock Owned By Household Members by Region

REGION	Farm H/H's	Cattle	Goat/Sheep	Pigs	Chicken	Total
EASTERN	188656	19783	44734	9867	658544	863402
NORTHERN	239182	62706	148490	21422	1403791	1834698
SOUTHERN	167227	8881	61799	21299	928316	1134810
WESTERN	134375	7262	16758	12835	236601	317686
	729440	98632	271781	65423	3227252	4150596

8.2.3c Percentage Distribution of Livestock Owned By Household Members by Region

REGION	% Farm H/H	% Cattle	% Goat/Sheep	% Pigs	% Chicken	% Total
EASTERN	25.9	20.1	16.5	15.1	20.4	20.8
NORTHERN	32.8	63.6	54.6	32.7	43.5	44.2
SOUTHERN	22.9	9.0	22.7	32.6	28.8	27.3
WESTERN	18.4	7.4	6.2	19.6	7.3	7.7
	100.0	100.0	100.0	100.0	100.0	100.0

8.2.3d Number Of Livestock Owned By Household Members By District

DISTRICT	Farm H/H	Cattle	Goat/Sheep	Pigs	Chicken	Duck	Total
KAILAHUN	63942	1641	12896	2931	230493	48720	296681
KENEMA	68465	11039	15526	3644	258873	41180	330262
KONO	56249	7103	16312	3292	169178	40574	236459
BOMBALI	54102	5734	18255	4065	235958	32061	296073
KAMBIA	35099	7121	35700	2797	315333	36887	397838
KOINADUGU	41259	39357	46856	4259	158862	19586	268920
PORTLOKO	59844	7922	30397	7344	413274	55744	514681
TONKOLILI	48878	2572	17282	2957	280364	54011	357186
BO	69158	4402	14932	5814	295950	36905	358003
BONTHE	22672	1689	10457	3746	154913	16574	187379
MOYAMBA	40238	1388	30016	10636	298402	40547	380989
PUJEHUN	35159	1402	6394	1103	179051	20489	208439
W/A RURAL	27090	2274	7039	5744	101985	16450	133492
W/A URBAN	107285	4988	9719	7091	134616	27780	184194
TOTAL	729440	98632	271781	65423	3227252	487508	4150596

8.2.3e Percentage Distribution Of Livestock Owned By Household Members By District

DISTRICT	% Farm H/H	% Cattle	% Goat/Sheep	% Pigs	% Chicken	% Duck	% Total
KAILAHUN	8.8	1.7	4.7	4.5	7.1	10.0	7.1
KENEMA	9.4	11.2	5.7	5.6	8.0	8.4	8.0
KONO	7.7	7.2	6.0	5.0	5.2	8.3	5.7
BOMBALI	7.4	5.8	6.7	6.2	7.3	6.6	7.1
KAMBIA	4.8	7.2	13.1	4.3	9.8	7.6	9.6
KOINADUGU	5.7	39.9	17.2	6.5	4.9	4.0	6.5
PORTLOKO	8.2	8.0	11.2	11.2	12.8	11.4	12.4
TONKOLILI	6.7	2.6	6.4	4.5	8.7	11.1	8.6
BO	9.5	4.5	5.5	8.9	9.2	7.6	8.6
BONTHE	3.1	1.7	3.8	5.7	4.8	3.4	4.5
MOYAMBA	5.5	1.4	11.0	16.3	9.2	8.3	9.2
PUJEHUN	4.8	1.4	2.4	1.7	5.5	4.2	5.0
W/A RURAL	3.7	2.3	2.6	8.8	3.2	3.4	3.2
W/A URBAN	14.7	5.1	3.6	10.8	4.2	5.7	4.4
TOTAL	100.0	100.0	100.0	100.0	100.0	100.0	100.0

8.2.4a Access To Agricultural Facilities In Sierra Leone

INPUT	ACCESS	% ACCESS	HH POP WITH ACCESS AND NO ACCESS		
			ACCESS	F H/H'S	%
TRACTORS	6004	3.8			
TILLERS	14007	8.9	NO ACCESS	157271	21.6
THRESHER	4497	2.9		572169	78.4
MILLS	15080	9.6		729440	100
STORES	37286	23.7			
FLOOR	51389	32.7			
GRATER	27502	17.5			
PRESSERS	1506	1.0			
TOTAL	157271	100.0			

8.2.4b Farming Households Access To Agricultural Facility by Region

REGION	Farm HHs	Tractor	Tiller	Thresher	Mill	Store	Floor	Grater	Presser	Total
EASTERN	188656	271	1911	650	2187	7176	11103	1797	80	25175
NORTHERN	239182	2001	2195	642	10103	13113	21232	4805	397	54488
SOUTHERN	167227	3582	9784	3140	2628	16281	18752	20756	945	75868
WESTERN	134375	150	117	65	162	716	302	144	84	1740
	729440	6004	14007	4497	15080	37286	51389	27502	1506	157271

8.2.4c Percentage Distribution Of Farming Households Access To Agricultural Facility By Region

REGION	Farm HHs	Tractor%	Tiller%	Thresher%	Mill%	Store%	Floor%	Grater%	Presser%	Total %
EASTERN	25.9	4.5	13.6	14.5	14.5	19.2	21.6	6.5	5.3	16.0
NORTHERN	32.8	33.3	15.7	14.3	67.0	35.2	41.3	17.5	26.4	34.6
SOUTHERN	22.9	59.7	69.9	69.8	17.4	43.7	36.5	75.5	62.7	48.2
WESTERN	18.4	2.5	0.8	1.4	1.1	1.9	0.6	0.5	5.6	1.1
	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

8.2.4d Farming Households Access To Agricultural Facility By District

DISTRICT	Farm HH's	Tractors	Tillers	Thresher	Mills	Stores	Floor	Grater	Pressers	Total
KAILAHUN	63942	67	330	42	228	1710	2830	229	30	5466
KENEMA	68465	159	915	403	1037	3436	5415	760	36	12161
KONO	56249	45	666	205	922	2030	2858	808	14	7548
BOMBALI	54102	557	864	192	202	5698	10078	695	102	18388
KAMBIA	35099	588	586	321	7502	2754	3965	1488	66	17270
KOINADUGU	41259	85	122	17	51	393	1255	36	15	1974
PORTLOKO	59844	519	382	86	2073	2937	4674	2385	137	13193
TONKOLILI	48878	252	241	26	275	1331	1260	201	77	3663
BO	69158	971	4186	2104	909	8048	8972	5212	551	30953
BONTHE	22672	1303	1350	169	587	1992	1582	5959	63	13005
MOYAMBA	40238	786	3122	693	595	2720	5137	6413	150	19616
PUJEHUN	35159	522	1126	174	537	3521	3061	3172	181	12294
W/RURAL	27090	44	42	14	27	260	111	41	16	555
W/URBAN	107285	106	75	51	135	456	191	103	68	1185
	729440	6004	14007	4497	15080	37286	51389	27502	1506	157271

8.2.4e Percentage Distribution of Farming Households Access to Agricultural Facility by District

DISTRICT	Farm HHs	Tractor%	Tiller%	Thresher%	Mills%	Store%	Floor%	Grater%	Presser%	Total %
KAILAHUN	8.8	1.1	2.4	0.9	1.5	4.6	5.5	0.8	2.0	3.5
KENEMA	9.4	2.6	6.5	9.0	6.9	9.2	10.5	2.8	2.4	7.7
KONO	7.7	0.7	4.8	4.6	6.1	5.4	5.6	2.9	0.9	4.8
BOMBALI	7.4	9.3	6.2	4.3	1.3	15.3	19.6	2.5	6.8	11.7
KAMBIA	4.8	9.8	4.2	7.1	49.7	7.4	7.7	5.4	4.4	11.0
KOINADUGU	5.7	1.4	0.9	0.4	0.3	1.1	2.4	0.1	1.0	1.3
PORTLOKO	8.2	8.6	2.7	1.9	13.7	7.9	9.1	8.7	9.1	8.4
TONKOLILI	6.7	4.2	1.7	0.6	1.8	3.6	2.5	0.7	5.1	2.3
BO	9.5	16.2	29.9	46.8	6.0	21.6	17.5	19.0	36.6	19.7
BONTHE	3.1	21.7	9.6	3.8	3.9	5.3	3.1	21.7	4.2	8.3
MOYAMBA	5.5	13.1	22.3	15.4	3.9	7.3	10.0	23.3	10.0	12.5
PUJEHUN	4.8	8.7	8.0	3.9	3.6	9.4	6.0	11.5	12.0	7.8
W/RURAL	3.7	0.7	0.3	0.3	0.2	0.7	0.2	0.1	1.1	0.4
W/URBAN	14.7	1.8	0.5	1.1	0.9	1.2	0.4	0.4	4.5	0.8
	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

8.2.5a Household Asset Ownership In Sierra Leone

ASSETS OWNED	NO.	%
Iron	29583	4.3
Refrigerator	33451	4.8
TV	45122	6.5
Computer	6800	1.0
Radio	380723	55.1
Phone	14339	2.1
Cell phone	63419	9.2
Stove	35989	5.2
Bicycle	51760	7.5
Motorcycle	12083	1.8
Vehicle	17165	2.5
Total	690434	100.0

8.2.5b Number Of Assets Owned By Households In The Region

REGION	HH	Iron	Refrig	TV	Computer	Radio	Phone	Cell phone	Stove	Motor cycle	Vehicle	Total
EASTERN	212300	1596	2228	2440	485	78946	1323	6198	2259	2994	1371	107098
NORTHERN	261204	602	1002	1513	451	93675	1224	3663	2728	3648	1420	134576
SOUTHERN	182146	2669	3515	3767	607	80529	942	6354	2455	2626	3727	117655
WESTERN	164198	24716	26706	37402	5257	127573	10850	47204	28547	2815	10647	331105
	819848	29583	33451	45122	6800	380723	14339	63419	35989	12083	17165	90434

8.2.5c Percentage Distribution Of Assets Owned By Households By Region

REGION	% HH	Iron %	Refrig %	TV %	Computer %	Radio %	Phone %	Cell phone %	Stove %	Motor cycle %	Vehicle %	Total %
EASTERN	25.9	5.4	6.7	5.4	7.1	20.7	9.2	9.8	6.3	24.8	8.0	15.5
NORTHERN	31.9	2.0	3.0	3.4	6.6	24.6	8.5	5.8	7.6	30.2	8.3	19.5
SOUTHERN	22.2	9.0	10.5	8.3	8.9	21.2	6.6	10.0	6.8	21.7	21.7	17.0
WESTERN	20.0	83.5	79.8	82.9	77.3	33.5	75.7	74.4	79.3	23.3	62.0	48.0
	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

8.2.5d Number Of Assets Owned By Households By District

DISTRICT	HH	Iron	Refrig	TV	Computer	Radio	Phone	Cell phone	Stove	Motor cycle	Vehicle	Total
KAILAHUN	64922	88	75	81	66	18291	255	112	153	370	89	21577
KENEMA	88553	1385	1862	2019	324	39581	796	4203	1400	1845	803	58007
KONO	58825	123	291	340	95	21074	272	1883	706	779	479	27514
BOMBALI	61911	152	305	344	124	22585	275	1597	756	1190	342	33392
KAMBIA	37138	94	130	202	77	17809	145	107	347	748	361	25668
KOINADUGU	43700	50	76	92	51	8941	76	53	178	529	116	11749
PORTLOKO	65592	239	346	759	143	29368	530	1433	1121	820	465	43265
TONKOLILI	52863	67	145	116	56	14972	198	473	326	361	136	20502
BO	75800	2357	3167	3378	456	43599	578	5610	1820	1892	1170	68226
BONTHE	25485	141	119	140	40	10328	68	135	169	190	1601	14678
MOYAMBA	45223	96	189	200	87	17995	212	547	352	319	313	23218
PUJEHUN	35638	75	40	49	24	8607	84	62	114	225	643	11533
W/A RURAL	30060	1695	1677	2363	438	19110	630	3434	2372	357	900	34675
W/A URBAN	134138	23021	25029	35039	4819	108463	10220	43770	26175	2458	9747	296430
TOTAL	819848	29583	33451	45122	6800	380723	14339	63419	35989	12083	17165	690434

8.2.5e Percentage Distribution Of Assets Owned By Households By District

DISTRICT	% HH	Iron %	Ref %	TV %	Computer %	Radio %	Phone %	Cell phone %	Stove %	Motor cycle %	Vehicle %	Total %
KAILAHUN	7.9	0.3	0.2	0.2	1.0	4.8	1.8	0.2	0.4	3.1	0.5	3.1
KENEMA	10.8	4.7	5.6	4.5	4.8	10.4	5.6	6.6	3.9	15.3	4.7	8.4
KONO	7.2	0.4	0.9	0.8	1.4	5.5	1.9	3.0	2.0	6.4	2.8	4.0
BOMBALI	7.6	0.5	0.9	0.8	1.8	5.9	1.9	2.5	2.1	9.8	2.0	4.8
KAMBIA	4.5	0.3	0.4	0.4	1.1	4.7	1.0	0.2	1.0	6.2	2.1	3.7
KOINADUGU	5.3	0.2	0.2	0.2	0.8	2.3	0.5	0.1	0.5	4.4	0.7	1.7
PORTLOKO	8.0	0.8	1.0	1.7	2.1	7.7	3.7	2.3	3.1	6.8	2.7	6.3
TONKOLILI	6.4	0.2	0.4	0.3	0.8	3.9	1.4	0.7	0.9	3.0	0.8	3.0
BO	9.2	8.0	9.5	7.5	6.7	11.5	4.0	8.8	5.1	15.7	6.8	9.9
BONTHE	3.1	0.5	0.4	0.3	0.6	2.7	0.5	0.2	0.5	1.6	9.3	2.1
MOYAMBA	5.5	0.3	0.6	0.4	1.3	4.7	1.5	0.9	1.0	2.6	1.8	3.4
PUJEHUN	4.3	0.3	0.1	0.1	0.4	2.3	0.6	0.1	0.3	1.9	3.7	1.7
W/A RURAL	3.7	5.7	5.0	5.2	6.4	5.0	4.4	5.4	6.6	3.0	5.2	5.0
W/A URBAN	16.4	77.8	74.8	77.7	70.9	28.5	71.3	69.0	72.7	20.3	56.8	42.9
	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0