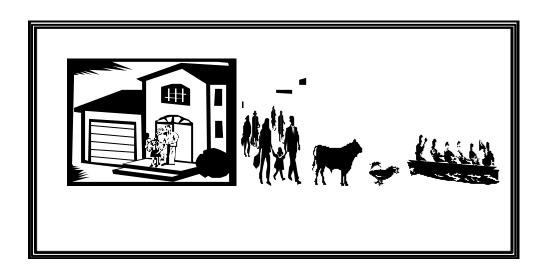
# GHANA LIVING STANDARDS SURVEY REPORT OF THE FOURTH ROUND (GLSS 4)



Ghana Statistical Service October 2000

# **GHANA LIVING STANDARDS SURVEY**

# **REPORT OF THE FOURTH ROUND (GLSS 4)**

# **Copyright © 2000 Ghana Statistical Service**

This report has been prepared by:

Prof. W. K. Asenso-Okyere (ISSER) with
Dr. K. A. Twum-Baah
Mr. Adams Kasanga
Mrs. Jacqueline Anum
Mr. Claus Pörtner

#### PREFACE AND ACKNOWLEDGEMENTS

This report presents the main results of the Fourth Round of the Ghana Living Standards Survey (GLSS 4) with labour force module. The fieldwork covered a period of 12 months (April 1998 to March 1999) and nearly seven years after the third round of the survey in 1991 /1992. The survey instruments and methodology were based on those of the third round with some minimal modifications.

Subsequent to the introduction of the Structural Adjustment Programmes (SAP), poverty reduction, including the set up of a monitoring and evaluation of welfare information system, has been the focal point of Government policy and programmes. Additionally, the need has been expressed for a labour information system to monitor levels of employment, underemployment and unemployment on a continuous basis to measure the effect of the Economic Recovery Programme (ERP) launched in 1983. GLSS 4 therefore carried a special module on the labour force.

The GLSS 4 is a nation-wide survey which collected detailed information on a variety of topics, including demographic characteristics of the population, education, health, employment and time use, migration, housing conditions, household agriculture and non-farm businesses. It is expected that together with the results of the earlier rounds, the GLSS 4 will provide needed information to policy-makers, business persons and academic analysts for evaluating living standards and labour force information systems in the country.

For purposes of comparability the income and expenditure module used in the third round survey was not modified. This is particularly useful as it will enable the evaluation of poverty trends over the survey period. Researchers who are interested in carrying out further analysis with the GLSS data sets are encouraged to apply to the Statistical Service for further details.

The methodology of the GLSS 4 is such that it required large human and material resources and monetary support. We wish, at this time, to express appreciation for the many contributions that brought such a complex survey to a successful end. The Ghana Statistical Service (GSS) would like to thank the selected households for their patience and cooperation in going through the frequent visits and questioning by the interviewers. Many thanks also go to the field staff, drivers and data entry operators for their courage, diligence and efficient work despite some difficulties. The regional and district administrators and traditional chiefs also deserve commendation for their support.

The GSS would like to acknowledge, with many thanks, the technical assistance, financial contribution and support from the Government of Ghana, the World Bank and the European Union. Special thanks go to Dr. Sudharshan Canagarajah, Mr. John Y. Ngwafon, Mr. Harold Coulombe, Mr. Pascal Heus, Mr. Claus Pörtner (all of the World Bank) and Mrs. Marian Ketting of the European Union for their contributions. Our appreciation also goes to Professor W. K. Asenso-Okyere (ISSER) for his assistance in writing the statistical report at the time the GSS was too busy with Census 2000. Finally, the devoted services of all project personnel and all others who may have contributed to the success of the survey are duly recognised.

DR. K. A. TWUM-BAAH (AG. GOVERNMENT STATISTICIAN AND PROJECT TECHNICAL DIRECTOR)



#### **EXECUTIVE SUMMARY**

The Ghana Living Standards Survey (GLSS), with its focus on the household as a key social and economic unit, provides valuable insights into living conditions in Ghana. This present report gives a summary of the main findings of the fourth round survey, which was carried out by the Ghana Statistical Service (GSS) over a 12-month period (April 1998 to March 1999).

A representative nationwide sample of more than 5,998 households, containing over 25,000 persons, was covered in GLSS 4. Detailed information was collected on all aspects of living conditions, including health, education, employment, housing, agricultural activities, the operation of non-farm establishments, remittances, savings, and credit and assets. The special focus of GLSS 4 was on collecting detailed labour force, income and expenditure data in respect of all household members.

The key findings of the survey are as follows (references are to the relevant sections of the report):

#### Education

Information are given on levels of educational attainment of the adult population, current school enrolment, educational expenditure by households, adult literacy rates, and apprenticeship training. About 32 percent of all adults (representing nearly three and a half million people) have never been to school, a quarter went to school but did not obtain any qualifications; about 33 percent have the MSLC/JSS certificate as their highest qualification, while the remaining 10 percent (a million adults) have secondary or higher-level qualifications (Section 2.1).

About 8 in every ten children aged 6-15, and about half of those aged 16-18, are currently attending school or college. Attendance rates for females are lower than those for males, especially in the northern half of the country (Section 2.2). The average annual cost to a household of maintaining a person at school or college was \$\psi\$163,500 per year in March 1999 cedis (Section 2.3). The survey results indicate that 50 percent of adults in Ghana are literate in English or a local language. There are substantial differences between the sexes, and between localities, with regard to literacy. A little over 6 out of every 10 men, but fewer than 4 out of every 10 women, are literate. More than two-thirds (66%) of adults in urban areas are literate, but in rural areas only 41 percent are literate (Section 2.4).

#### Health

The survey collected data on each person's health condition over the previous two weeks; on the fertility, pre-natal care and contraceptive use of women aged 15-49; on the post-natal care of children aged 5 years and under; and on the preventive health care and vaccination of children aged 7 years and under. About 26 percent of the sample reported having suffered from an illness or injury in the previous two weeks, 61 percent of whom had to stop their usual activities due to the indisposition (Section 3.2).

The survey found that 7.0 percent of women were currently pregnant, and a further 13.2

percent had been pregnant in the last 12 months. Only about 15 percent of all women aged 15-49 or their partners reported using contraceptives; about 11 percent use modern methods, and 4 percent use traditional methods, to prevent or delay pregnancy (Section 3.3). The level of breastfeeding in Ghana is very high; about 98 percent of all children under 5 have been breastfed at one time or another. About 7 percent of children below the age of 8 have never been vaccinated against any of the childhood killer diseases.

## **Employment**

As a major focus of the survey, a wide range of estimates of economic activity, employment, unemployment, underemployment and working conditions are given in the report. The survey also has detailed information about time spent on housekeeping activities. About 77 percent of the adult population (aged 15+) is currently economically active. The activity rates for males and females differ, with the rate for women in the age group (15-64) lower than those for men, but in the younger age group (7-14) and the older age group (65+) the rates for females exceed those for males. For each age group the activity rates for males and females are higher in rural areas (apart from rural savannah) than in urban areas (Section 4.2).

The majority of the working population is employed in agricultural activities (55.0%), followed by trading (18.3%) and then manufacturing (11.7%). Whereas 27.4 percent of working females are engaged in trading, only 7.4 percent of males are traders. The highest hourly wage rates are obtained in mining and quarrying, followed by financial services and then trading. For all areas of employment, females earn lower wages than males (Section 4.3). About 8 percent of the currently active population can be classified as unemployed, but there is also a high degree of underemployment, with some people having a job but wanting to do more work (Section 4.4).

In many households, particularly in rural areas, family members (especially women) spend a great deal of their time fetching water and firewood, in addition to the time spent on other household activities such as cooking and cleaning (Section 4.5).

## Migration

The report provides data on migration to create some awareness that would generate further discussions and research into the complex field of population relocation. Some 52 percent of all Ghanaians are migrants, having previously lived in a locality different from where they are living at present; a further 16 percent have moved away from their birthplace, but subsequently returned (Section 5.1).

## Housing

Detailed information is presented on a variety of housing characteristics: the occupancy status of the household; household size and room density; access to drinking water, toilet facilities, source of lighting and fuel, rubbish disposal, and materials used in house construction. A little over 40 percent (24 percent in urban areas and 60 percent in rural areas) of the households own the houses they live in. About 80 percent of the households in urban areas have access to pipe-borne water, compared with only 19 percent in rural areas. More than three-quarters of urban households have electricity for lighting, compared with only 17 percent of rural households. Most urban households use charcoal for cooking, whereas most households in

rural areas use firewood. Only 14 percent of urban households, and 2 percent of rural households, have access to a flush toilet (Section 6.3).

## Household agriculture

About 2.7 million households in Ghana own or operate a farm or keep livestock (Section 7.1). More than half of households, which cultivate crops hire labour for their operations. The major crops, in terms of sales, are cocoa, maize, groundnuts/peanuts, and rice (Section 7.2). About 2 and a half million households process crops or fish for sale, with the major responsibility for this activity falling on women.

## **Non-farm enterprises**

Approximately 1.9 million households or 49 percent of all households in Ghana operate a non-farm business with women operating two-thirds of these businesses. About 56 percent of all businesses involve retail trade, and most of the rest cover some kind of manufacturing (for instance food, beverages, textiles or clothing) (Section 8.1).

## **Total expenditure**

Average annual household expenditure (both cash and imputed) relative to March 1999 prices was about \$\psi4,244,000\$. Given an average household size of 4.3, this implies annual per capita expenditure of about \$\psi987,000\$ (Section 9.1). With an exchange rate of \$\psi2,394\$ to the US dollar prevailing at March 1999, the average annual household expenditure is US\$1,773 and the pre-capita expenditure is US\$412. Overall, cash expenditure on food represents 45.4 percent of total household expenditure, while the imputed value of own-produced food consumed by households represents a further 10.3 percent (Section 9.2).

#### Cash expenditure

Relative to March 1999 prices, Ghanaian households spend on average almost  $$\phi 3,500,000$ a year (at March 1999 prices), or <math>$\phi 804,000$ on per capita basis (Section 9.3). On national terms, just below half of total cash expenditure (46%) went to food and beverages; and alcohol and tobacco, and clothing and footwear, each accounted for about 10 percent of it. The next most important expenditure groups, in terms of amount spent, are recreation and education (7.5%), transport and communications (5.6%), housing and utility (6.4%) and household goods, operations and services (6.0%).$ 

#### **Food consumption**

At the time of the survey Ghanaian households (which number about 4.2 million) were spending on average an amount of almost ¢2.4 billion (at March 1999 prices) on food (Section 9.5), with own-grown food consumed amounting to the value of almost ¢435,000 (Section 8.7). The most important food consumption subgroups, in terms of cash expenditure are roots and tubers (22%), fish (16%), cereals and cereal products (15%), vegetables (9%), and meat (5%). Prepared meals account for 11 percent by value of total food consumption.

While the pattern of consumption, in terms of food subgroups, is broadly similar in urban and rural areas, residents in rural areas consume more roots and tubers, and pulses and nuts than their counterparts in urban areas. Expenditure on alcohol and tobacco is also higher in rural

areas. In contrast, the consumption of meat and prepared meal are much higher in urban areas than in rural areas, and urban residents spend much more on cereals and cereal products and poultry and poultry products than their rural counterparts (Section 9.5).

#### Remittances

About 76 percent of all households reported having remitted money or goods in the previous 12 months to persons who were not their household members. The bulk of these remittances to non-household members went to relatives (93%), and in particular to parents or children (50%), brothers or sisters (18%), and other relatives (23%). Such income flows from the household benefited females (64%) more than their male counterparts (36%).

Whilst annual remittances to people overseas total only about ¢6 billion in March 1999 cedis, the value of remittances received from abroad is about ¢339 billion, which represents 40 percent of all remittances received.

#### **Assets**

In general, the level of ownership of most assets is much higher in urban areas than it is in rural areas. It is higher in Accra than in other urban areas, and higher in the rural coastal and rural forest than it is in the rural savannah.

## TABLE OF CONTENTS

| PREFACE AND ACKNOWLEDGEMENT  | V                          |
|--|----------------------------|
| EXECUTIVE SUMMARY  | vii                        |
| LIST OF TABLES   | xiii                       |
| LIST OF FIGURES  | xviii                      |
| LIST OF ABBREVIATIONS  | xix                        |
| 1 DEMOGRAPHIC CHARACTERISTICS  | 1                          |
| <ul><li>1.1 Household composition</li><li>1.2 Age and sex distribution</li><li>1.3 Nationality, ethnicity and religion</li></ul>   | 1<br>4<br>5                |
| 2 EDUCATION  | 8                          |
| <ul><li>2.1 Educational attainment</li><li>2.2 School attendance</li><li>2.3 Educational expenses</li><li>2.4 Literacy</li><li>2.5 Apprenticeship training</li></ul>   | 8<br>8<br>11<br>11<br>13   |
| 3 HEALTH   | 14                         |
| <ul> <li>3.1 Introduction</li> <li>3.2 Health condition in the past two weeks</li> <li>3.3 Fertility, pre-natal care and contraceptive use</li> <li>3.4 Post-natal care</li> <li>3.5 Preventive health care</li> </ul> | 14<br>14<br>17<br>22<br>23 |
| 4 EMPLOYMENT   | 26                         |
| <ul> <li>4.1 Introduction</li> <li>4.2 Economic activity</li> <li>4.3 Employment and working conditions</li> <li>4.4 Unemployment and underemployment</li> <li>4.5 Housekeeping activities</li> </ul>                  | 26<br>26<br>29<br>35<br>38 |
| 5 MIGRATION  | 41                         |
| <ul><li>5.1 Introduction</li><li>5.2 Migration patterns</li><li>5.3 Reasons for moving</li></ul>   | 41<br>41<br>43             |
| 6 HOUSING  | 44                         |
| <ul><li>6.1 Type of dwelling</li><li>6.2 Household size and housing density</li><li>6.3 Housing conditions</li></ul>   | 44<br>46<br>48             |
| 7 HOUSEHOLD AGRICULTURE  | 53                         |
| <ul><li>7.1 Agricultural activities and assets</li><li>7.2 Harvesting and disposal of crops</li><li>7.3 Seasonal patterns</li></ul>  | 53<br>55<br>60             |

| 7.4   | Other agricultural income                               | 63  |
|-------|---|-----|
| 7.5   | Agricultural inputs                                     | 64  |
| 7.6   | Home processing of agricultural produce                 | 66  |
| 7.7   | Home consumption of own produce                         | 67  |
| 8     | NON-FARM ENTERPRISES                                    | 74  |
| 8.1   | Characteristics of non-farm enterprises                 | 74  |
|       | Expenditure on inputs, assets, revenues, and net income | 75  |
| 9     | TOTAL HOUSEHOLD INCOME AND EXPENDITURE AND THEIR        |     |
|       | COMPONENTS  | 83  |
| 9.1   | Total household expenditure                             | 83  |
| 9.2   | Components of household expenditure                     | 85  |
| 9.3   | Cash expenditure on major expenditure groups            | 87  |
|       | Cash expenditure at the subgroup and item level         | 91  |
|       | Total food consumption expenditure                      | 92  |
|       | Availability of consumer items                          | 100 |
|       | Total household income                                  | 100 |
|       | Components of household income                          | 103 |
|       | Comparison of income and expenditure                    | 104 |
| 9.1   | 0 Transfers   | 107 |
| 10. C | REDIT, ASSETS AND SAVINGS                               | 111 |
| 10.   | 1 Credit  | 111 |
| 10.   | 2 Assets and durable consumer goods                     | 111 |
| 10.   | 3 Savings   | 113 |
| Appe  | ndix 1: Sample Design for Round 4 of the GLSS           | 114 |
|       | ndix 2: Contents of GLSS4 Questionnaire                 | 118 |
| Appe  | ndix 3: Description of Income and Expenditure Variables | 120 |
|       | ndix 4: Supplementary Tables                            | 124 |
| Appe  | ndix 5: List of Survey Personnel                        | 170 |

## LIST OF TABLES

| Table 1.1  | Mean household size, estimated population in private households, and estimated number of                              |        |
|------------|---|--------|
|            | households, by region   | 1      |
| Table 1.2  | Average age of household heads, by locality and sex   | 3      |
| Table 1.3  | Composition of households   |        |
| Table 1.4  | Age distribution of the population, by locality and sex (percent)   | 4      |
| Table 1.5  | Distribution of the population by sex and nationality (percent)   | 5      |
| Table 1.6  | Household heads by region and ethnicity (percent)   | 5      |
| Table 1.7  | Household heads by religion and locality (percent)  | 6      |
| Table 1.8  | Household heads by religion and region (percent)  | 7      |
| Table 2.1  | Levels of educational attainment, by sex, and estimates of educational attainment for the                             | 0      |
| Table 2.2  | population aged 15 and above  | 8<br>9 |
| Table 2.2  | School Attendance rate by age, locality and sex   | 10     |
| Table 2.3  | School attendance rate, by region, age and sex (percent)  | 10     |
| Table 2.4  | Proportion of adults in each region who have been to school, by sex and locality (percent)                            |        |
| Table 2.5  | Average amount paid per person attending school/college in the last 12 months, by locality                            | 11     |
| Table 2.6  | Adult literacy rates, by sex and locality (percent)   | 12     |
| Table 2.7  | Adult literacy rates in English and Ghanaian language, by sex and locality (percent)                                  | 12     |
| Table 2.8  | Distribution of apprentices by main trade learnt, by sex and locality (percent)                                       | 13     |
| Table 2.9  | Average length of apprenticeship training by main trade learnt, sex and locality (months)                             | 13     |
| Table 3.1  | Percent of people suffering from an illness or injury during the previous two weeks,                                  |        |
|            | by age group, locality and sex (percent)  | 15     |
| Table 3.2  | Percent of people suffering from an illness or injury who had to stop their usual activity during                     |        |
|            | the previous two weeks, by age group, locality and sex  | 16     |
| Table 3.3  | Percent of people who reported ill and consulted a health practitioner or dentist, during the                         |        |
|            | previous two weeks, by age group, locality and sex  | 16     |
| Table 3.4  | Percent of people who reported ill and consulted a health practitioner or dentist, during the                         |        |
|            | previous two weeks, by type of provider, locality and sex   | 17     |
| Table 3.5  | The situation of pregnancy for women aged 15-49 years, by age group and locality (percent)                            | 18     |
| Table 3.6  | Percentage of pregnancies in the last 12 months not resulting in a live birth, by age of woman and locality (percent) | 19     |
| Table 3.7  | Percent of women aged 15-49 years (or their partners) who are using any contraceptives to                             |        |
|            | prevent or delay pregnancy, by age and locality   | 20     |
| Table 3.8  | Distribution of women aged 15-49 years (or their partners), by age group and contraceptive                            |        |
|            | method used (percent)   | 21     |
| Table 3.9  | Distribution of women aged 15-49 years (or their partners), by locality group and contraceptive                       | e      |
|            | method used (percent)   | 21     |
| Table 3.10 | Percent of children aged five years and under who had post-natal care in the previous                                 |        |
|            | 12 months, by age and locality  | 22     |
| Table 3.11 | Distribution of amount paid for post-natal consultation, by locality (percent)  | 23     |
| Table 3.12 | Distribution of children aged 2-5, by age of child and age in months at weaning (percent)                             | 23     |
| Table 3.13 | Percent of children aged 7 years and under who have not been vaccinated, by age of child and                          |        |
|            | locality  | 24     |
| Table 4.1  | National estimates of total population and currently economically active population, and                              |        |
|            | sex-age specific activity rates   | 27     |
| Table 4.2  | Current activity rates, by sex, age and locality (percent)  | 28     |
| Table 4.3  | Employment status of population aged 15+, by sex and locality (percent)   | 29     |
| Table 4.4  | Type of work engaged in by the population aged 15-64 years during the last 7 days, by                                 |        |
|            | locality and sex (percent)  | 30     |
| Table 4.5  | Type of employer for population aged 15-64 years in the last 7 days, by locality and sex (%)                          | 30     |
| Table 4.6  | Main occupation of the population aged 15-64 years in the last 7 days, by locality and sex (%)                        | 31     |

| Table 4.7   | Distribution of population aged 15-64 years in the last 7 days, by type of work and sex (%)   | 32  |
|-------------|---|-----|
| Table 4.8   | Educational levels of the active population, by sex and main occupation                       | 33  |
| Table 4.9   | Distribution of hours worked per week by main occupation of active population                 |     |
|             | aged 15 and over (%)  | 34  |
| Table 4.10  | Distribution of hours worked per week, by industry of active population                       |     |
|             | aged 15 years and over (percent)  | 34  |
| Table 4.11  | Average basic hourly earnings in main job, by sex and industry, and by sex and main           |     |
|             | occupation of active population aged 15+ (cedis)  | 35  |
| Table 4.12  | Unemployment rates, by sex, age and locality of population aged 15-64 years                   | 36  |
| Table 4.13  | Activity status of the adult population in the last seven days, by sex and locality           | 37  |
| Table 4.14  | Average time spent on various housekeeping activities by population aged 7+, by sex and       | 51  |
| 1 autc 4.14 | locality (percent)  | 38  |
| Table 4.15  |   | 30  |
| 1 able 4.13 | Average time spent per day on various housekeeping activities by population aged 7+,          | 20  |
| T-1.1. 4.16 | by sex and locality (minutes per day)   | 39  |
| Table 4.16  | Average time spent per day on housekeeping activities, by age and sex (minutes)               | 40  |
| Table 5.1   | Extent of migration by present locality and sex (percent)                                     | 41  |
| Table 5.2   | Migration status by region (percent)  | 42  |
| Table 5.3   | Migration flows by previous residence and current residence (percent)                         | 42  |
| Table 5.4   | Current residence of migrants by previous residence   | 43  |
| Table 5.5   | Distribution of migrants by current locality and reason for most recent migration (percent)   | 43  |
| Table 6.1   | Distribution of households by type of dwelling and locality (percent)                         | 44  |
| Table 6.2   | Distribution of households by present occupancy status and locality (percent)                 | 45  |
| Table 6.2   | Distribution of households in different localities, by housing provider (percent)             | 45  |
|             | Distribution of households in different localities, by number of rooms occupied (percent)     | 46  |
| Table 6.4   | , ,   | 46  |
| Table 6.5   | Distribution of households by household size, and locality (percent)                          |     |
| Table 6.6   | Indicators of household density, for different localities                                     | 47  |
| Table 6.7   | Distribution of households by locality and main construction material of walls, floor         | 40  |
| T 11 60     | and roof (percent)  | 48  |
| Table 6.8   | Distribution of households by locality and source of drinking water (percent)                 | 49  |
| Table 6.9   | Distribution of households by locality and use of basic utilities (percent)                   | 51  |
| Table 6.10  | Distribution of households by locality and type of toilet used by the households (percent)    | 51  |
| Table 7.1   | Distribution of households owning or operating a farm or keeping livestock, and national      |     |
|             | estimates, by locality (percent)  | 53  |
| Table 7.2   | Estimated number of households raising different livestock, the number of livestock, and the  |     |
|             | estimated value of livestock, sales and purchases   | 54  |
| Table 7.3   | Estimated distributions of livestock by locality  | 54  |
| Table 7.4   | Estimated number of households in each ecological zone harvesting various staple grains,      |     |
|             | field and cash crops in the previous 12 months  | 55  |
| Table 7.5   | Estimated number of households harvesting various staple grains and field and cash crops,     |     |
| 14010 7.5   | percentage selling their crops, and estimated annual value of harvest and sales               | 56  |
| Table 7.6   | Estimated annual value of harvested crops and value of sales by households of unprocessed     | 20  |
| 1 4010 7.0  | staple grains, field and cash crops, by ecological zone                                       | 57  |
| Table 7.7   | Estimated number of households harvesting various fruits, root crops and vegetables in the    | 31  |
| Table 7.7   | previous 12 months, by ecological zone  | 58  |
| Table 7.8   | Estimated number of households harvesting various fruits, root crops and vegetables,          | 30  |
| 1 able 7.8  | percentage harvesting or selling in the previous two weeks, and estimated annual value of     |     |
|             | harvest and sales   | 59  |
| Table 7.0   |   | 33  |
| Table 7.9   | Estimated annual value of the harvest and sales of root crops, fruits and vegetables,         | (0  |
| T-1.1 7 10  | by ecological zone  | 60  |
| Table 7.10  | Estimates of number of agricultural households selling various types of agricultural produce, | , . |
| m 11 = ::   | and estimated value of sales  | 64  |
| Table 7.11  | Availability and cost of purchasing farm inputs   | 65  |
| Table 7.12  | Distribution of households processing crops or fish for sale or use by the household,         |     |
|             | by locality   | 66  |
| Table 7.13  | Estimated number of households processing various agricultural items, value of labour         |     |
|             | and other inputs, percentage selling the items, and estimated annual value of sales           | 67  |

| Table 7.14   | Value of average annual household and per capita consumption of home-produced food, and   |     |
|--------------|---|-----|
| T-1-1- 7-15  | estimate of total national value, by food subgroup  | 68  |
| Table 7.15   | Value of average annual household and per capita consumption of home produced food, and national estimate, for urban and rural households, by food subgroup | 69  |
| Table 7.16   | Value of average annual household and per capita consumption of home produced food, and   | 03  |
| 1 abic 7.10  | national estimate, by ecological zone and food subgroup   | 7   |
| Table 7.17   | Distribution of consumption of own produce across food subgroups, by region (percent)   | 73  |
| Table 8.1    | Basic Characteristics of non-farm enterprises   | 74  |
| Table 8.2    | Expenditure on inputs to non-farm enterprises   | 7   |
| Table 8.3    | Sources of revenue, and allocation of income, from non-farm enterprises   | 78  |
| Table 8.4    | Estimates of depreciation for assets of non-farm enterprises  | 80  |
| Table 8.5    | Summary of incomes and expenditures for non-farm enterprises  | 82  |
| Table 9.1    | Mean annual household and per capita expenditure, by quintile group   | 83  |
| Table 9.2    | Distribution of households in each region, by quintile, and mean annual household and per capita expenditure (Percent).                                     | 84  |
| Table 9.3    | Mean annual household and per capita expenditure, and estimated total expenditure, for different localities and zones                                       | 85  |
| Table 9.4    | Components of household and per capita expenditure, and estimates of total annual household expenditure   | 85  |
| Table 9.5    | Components of household expenditure by locality (percent)   | 86  |
| Table 9.6    | Components of household expenditure by quintile (percent)   | 87  |
| Table 9.7    | Average annual household and per capita cash expenditure, and estimated total national  | 0,  |
| 14010 3.7    | expenditure, by expenditure group   | 88  |
| Table 9.8    | Mean annual household cash expenditure by locality and expenditure group  | 88  |
| Table 9.9    | Mean annual per capita cash expenditure, and estimated total annual ash expenditure,  |     |
|              | by locality and expenditure group.  | 89  |
| Table 9.10   | Mean annual per capita cash expenditure, by quintile and expenditure group  | 90  |
| Table 9.11   | Average annual household cash expenditure, per capita expenditure and estimated total national expenditure, by subgroup of expenditure                      | 91  |
| Table 9.12   | Average value of annual household and per capita food consumption (both cash  |     |
|              | expenditure and home-produced), and estimated total value, by food subgroup,  |     |
|              | and food budget shares  | 94  |
| Table 9.13   | Value of average annual household food consumption and estimated total food   |     |
|              | consumption (both cash expenditure and home-produced), by food subgroup and locality.   | 96  |
| Table 9.14   | Value of average per capita food consumption (both cash expenditure and home-produced)  |     |
|              | and food budget shares, by food subgroup and locality.  | 98  |
| Table 9.15   | Food budget shares (including both cash expenditure and home-produced), by locality.  | 99  |
| Table 9.16   | Percentage of all households reporting items unavailable in the last 12 months, by locality.  | 100 |
| Table 9.17   | Mean annual household and per capita income, by quintile.   | 101 |
| Table 9.18   | Mean annual household and per capita income by region.  | 102 |
| Table 9.19   | Mean annual household and per capita income, and estimated total income, by locality  | 102 |
| Table 9.20   | Components of household and per capita income, and estimates of total annual household  | 100 |
| T. 1.1. 0.21 | income.   | 103 |
| Table 9.21   | Distribution of household income by component, locality and quintile (percent).   | 104 |
| Table 9.22   | Decile for per capita income and per capita expenditure, and means of each decile.  | 105 |
| Table 9.23   | Comparison of per capita income and per capita expenditure  | 106 |
| Table 9.24   | Mean annual household expenditure on, and receipts from remittances, and estimated total  | 100 |
| Table 0.25   | remittances, by locality.   | 108 |
| Table 9.25   | Estimated total annual expenditure on remittances, by locality of destination, and total  | 109 |
| Table 9.26   | annual income from remittances, by locality of person remitting  Mean annual amounts of income received by urban and rural households from a variety        | 109 |
| 1 aut 7.20   | of sources by locality  | 110 |
| Table 9.27   | Mean annual amounts of expenditure paid by urban and rural households for a variety   | 110 |
| 1 4010 9.27  | of purposes, and estimated total miscellaneous expenditure  | 110 |
|              | or purposes, and communications intoconditions experientally  | 110 |
| Table 10.1   | Proportion of households owning various assets and consumer durables by locality (%)  | 112 |

## **Supplementary Tables**

| Table A1.1<br>Table A1.2   | Distribution of household heads by ethnicity and region (percent)<br>Household heads by religion and region   | 124<br>124 |
|----------------------------|---|------------|
| Table A2.1                 | Average amount paid per person attending primary school in the last 12 months, by locality (cedis)  | 125        |
| Table A2.2                 | Average amount paid per person attending junior secondary school in the last 12 months, by locality (cedis)   | 125        |
| Table A2.3                 | Average amount paid per person attending senior secondary school in<br>the last 12 months, by locality (cedis)  | 126        |
| Table A2.4                 | Average amount paid per person attending a school higher than a senior secondary school the last 12 months, by locality (cedis)   | in<br>126  |
| Table A3.1                 | Reasons for medical consultation during the previous two weeks, by locality and sex (percent of people reporting)   | 127        |
| Table A3.2                 | Women aged 15-49 years currently pregnant or pregnant during the previous 12 months, who have received pre-natal care, by age group and locality (percent)                | 127        |
| Table A3.3                 | Women aged 15-49 years currently pregnant or pregnant during the previous 12 months, who have never gone for pre-natal consultation, by locality and reason for not going | 128        |
| Table A3.4                 | Children aged 7 years or under who have never been vaccinated, by age, locality and sex of child (percent)  | 128        |
| Table A4.1                 | Educational levels of active population, by sex and type of work (percent)  | 129        |
| Table A4.2                 | Educational levels of active population, by sex and main employer (percent)   | 130        |
| Table A4.3                 | Educational levels of active population, by sex and main industry (percent)   | 131        |
| Table A4.4                 | Distribution of population aged 7+ years by hours spent per day on fetching wood, by sex and age group (percent)  | 132        |
| Table A4.5                 | Average minutes per day spent on fetching wood, by age, sex and region  | 132        |
| Table A4.6                 | Distribution of population aged 7+ years by hours spent per day   |            |
| Table A4.7                 | on fetching water, by sex and age group (percent)  Average minutes per day spent on fetching water, by age, sex and region  | 133        |
| Table A4.7 Table A4.8      | Distribution of population aged 7+ years by hours spent per day   | 133        |
| Table A4.6                 | on child care, by sex and age group (percent)   | 134        |
| Table A4.9                 | Average minutes per day spent on childcare, by age, sex and region  | 135        |
| Table A4.10                | Distribution of population aged 7+ years by hours spent per day   |            |
|                            | on sweeping, by sex and age group (percent)   | 135        |
| Table A4.11                | Average minutes per day spent on sweeping, by age, sex and region   | 136        |
| Table A4.12                | Distribution of population aged 7+ years by hours spent per day   |            |
|                            | on garbage disposal, by sex and age group (percent)   | 136        |
| Table A4.13<br>Table A4.14 | Average minutes per day spent on garbage disposal, by age, sex and region<br>Distribution of population aged 7+ years by hours spent per day                              | 137        |
|                            | on cooking, by sex and age group (percent)  | 137        |
| Table A4.15                | Average minutes per day spent on cooking, by age, sex and region  | 138        |
| Table A4.16                | Percentage employees that receive subsidies from employers  | 120        |
| T-1-1- A 4 17              | by industry, occupation and main employer   | 138        |
| Table A4.17                | Percentage employees that receive benefits from their employers by industry occupation and main employer  | 139        |
| Table A4.18                | Percentage employees that had taxes deducted from pay, had a  | 139        |
| 14010 714.10               | written contract and are registered with a trade union  | 140        |
| Table A6.1                 | Distribution of households by type of dwelling, locality and sex of   | 1.41       |
| Table A62                  | head of household (percent)   | 141        |
| Table A6.2                 | Distribution of households which rent their dwelling, by locality, sex of head of household, and person from whom they rent   | 141        |
| Table A7.1                 | Average value of reported household and per capita home consumption of food and beverages, by item and locality   | 142        |
| Table A7.2                 | Households reporting consumption of home-produced items during  | 1-⊤∠       |
|                            |   |            |

|              | the previous 12 months (percent)   | 144  |
|--------------|--|------|
| Table A7.3   | Average annual household cost of consumption of home-produced food                 |      |
|              | and beverages, by subgroup and region (cedis)                                      | 146  |
| Table A7.4   | Average annual per capita cost of home-produced food and                           |      |
|              | beverages, by subgroup and region (cedis)  | 147  |
| Table A7.5   | Estimated annual national cost of consumption of home-produced                     |      |
|              | food and beverage, by sub group and region (billion cedis)                         | 148  |
| Table A9.1   | Mean annual household cash expenditure by region and expenditure group (cedis)     | 149  |
| Table A9.2   | Distribution of mean annual household cash expenditure by                          |      |
|              | expenditure group, by region (percent)   | 149  |
| Table A9.3   | Mean annual per capita cash expenditure by region and expenditure group (cedis)    | 150  |
| Table A9.4   | Estimated total annual national cash expenditure, by region and                    |      |
|              | expenditure group (billion cedis)  | 150  |
| Table A9.5   | Mean annual household cash expenditure by locality and expenditure group           | 151  |
| Table A9.6   | Mean annual per capita cash expenditure, by locality and expenditure group         | 152  |
| Table A9.7   | Estimated total annual national cash expenditure, by locality and                  |      |
|              | expenditure group (billion cedis)  | 153  |
| Table A9.8   | Mean annual household cash expenditure by locality and expenditure group           | 154  |
| Table A9.9   | Mean annual per capita cash expenditure, by locality and expenditure group         | 155  |
| Table A9.10  | Estimated total annual national cash expenditure, by locality and                  |      |
|              | expenditure group (billion cedis)  | 156  |
| Table A9.11  | Mean annual household cash expenditure by ecological zone and                      |      |
|              | expenditure group (cedis and percent)  | 157  |
| Table A9.12  | Mean annual per capita cash expenditure, by ecological zone and                    |      |
|              | expenditure group (cedis)  | 158  |
| Table A9.13  | Estimated total annual national cash expenditure, by ecological zone               |      |
|              | and expenditure group (billion cedis)  | 159  |
| Table A9.14  | Average annual household and per capita cash expenditure on different              |      |
|              | items, in urban and rural areas (cedis)  | 160  |
| Table A9.15  | Value of average household and per capita food and beverage consumption (both cash |      |
|              | expenditure and home-produced), and estimated total annual                         |      |
| m.11. 10.15  | value, by subgroup: Accra (cedis)  | 165  |
| Table A9.16  | Value of average household and per capita food and beverage consumption (both cash |      |
|              | expenditure and home-produced), and estimated total annual                         |      |
| T 11 1015    | value, by subgroup: Other urban areas (cedis)                                      | 166  |
| Table A9.17  | Value of average household and per capita food and beverage consumption (both cash |      |
|              | expenditure and home-produced), and estimated total annual                         | 1.65 |
| T 11 40 10   | value, by subgroup: Rural coastal (cedis)  | 167  |
| Table A9.18  | Value of average household and per capita food and beverage consumption (both cash |      |
|              | expenditure and home-produced), and estimated total annual                         | 1.60 |
| T-1.1. AO 10 | value, by subgroup: Rural forest (cedis)   | 168  |
| Table A9.19  | Value of average household and per capita food and beverage consumption (both cash |      |
|              | expenditure and home-produced), and estimated total annual                         | 1.60 |
|              | value, by subgroup: Rural savannah (cedis)   | 169  |

## LIST OF FIGURES

| Figure 1.1:                               | Percentage of female-headed households, by locality  | 2              |
|---|--|----------------|
| Figure 2.1                                | School attendance rate in each age group, by sex   | 9              |
| Figure 3.1:<br>Figure 3.2:<br>Figure 3.3: | People suffering from illness or injury during the previous two weeks, by age group Women currently pregnant, by age group and locality Reasons why children were not vaccinated, by locality                              | 15<br>19<br>25 |
| Figure 4.1:                               | Activity status of the adult population in the last seven days   | 37             |
| Figure 6.1:                               | Source of drinking water, by locality  | 50             |
| Figure 7.1: Figure 7.2:                   | Seasonal patterns of harvesting, selling and buying various cereal crops amongst those households, which cultivate those crops.  Seasonal patterns of harvesting, selling and buying other crops amongst those households, | 61             |
| rigure 7.2.                               | which cultivate those crops  | 62             |
| Figure 9.1:                               | Inequalities in the distribution of income and expenditure   | 107            |
| Figure 10.1:                              | Proportion of householdsmaintaining savings account by locality  | 113            |

## LIST OF ABBREVIATIONS

The following abbreviations are used through out this report.

| GSS    | Ghana Statistical Service                              |
|--------|--|
|        |  |
| GLSS   | Ghana Living Standards Survey                          |
| GLSS 1 | Ghana Living Standards Survey Round 1                  |
| GLSS 2 | Ghana Living Standards Survey Round 2                  |
| GLSS 3 | Ghana Living Standards Survey Round 3                  |
| GLSS 4 | Ghana Living Standards Survey Round 4                  |
| MSLC   | Middle School Living Certificate                       |
| JSS    | Junior Secondary School                                |
| SAP    | Social Adjustment Programme                            |
| ERP    | Economic Recovery Programme                            |
| ISSER  | Institute of Statistical, Social and Economic Research |
| PNDC   | Provisional National Defence Council                   |
| GDHS   | Ghana Demographic and Health Survey                    |
| CWIQ   | Core Welfare Indicators Questionnaire                  |
| SAS    | Statistical Analysis System                            |
| IMPS   | Integrated Microcomputer Processing System             |
| INC    | Income   |
| EXP    | Expenditure  |
| AGG    | Aggregate  |

## SELECTED ENUMERATION AREAS FOR GLSS 4

# ECOLOGICAL ZONES OF GHANA (GLSS)

## **Technical Notes**

Because of the effects of rounding, percentages may not always add exactly to 100, and for the same reasons estimated numbers may not add exactly to the estimated totals shown in the table.

Where national estimates have been given, these have been obtained by grossing up the sample data, as described at the end of Appendix 1.

The word 'billion' used in this report means 'one thousand million'. The symbol '-' and '.' in the cell of a table indicates that the value for that cell is zero.

All income and expenditure data given in this report have been deflated to give values for March 1999. This was done using the monthly national Consumer Price Index, produced by the Ghana Statistical Service, and the price data collected as part of the survey.

## 1 DEMOGRAPHIC CHARACTERISTICS

## 1.1 Household Composition

The data from the fourth round of the Ghana Living Standards Survey (GLSS 4) covered a nationally representative sample of 5,998 households containing 25,855 household members. For the purposes of the survey, a household was defined as a person living alone or any group of persons staying together and sharing the same catering arrangements. Membership of a household was based on the same criterion but with the added condition that a person must have been living in the household for at least nine out of the last 12 months. The only exceptions to this rule were: absent household heads; children under nine months; and students and seasonal workers who had not been living as part of another household for the period they were absent.

Table 1.1 shows estimates of the total population and total number of households for March 1999 by locality. The estimation is based on a projection of the 1984 census population, using parameters obtained from the survey sample with an overall growth rate for the total population of 2.6 percent per annum. On this basis, the total number of persons in private households in Ghana is given as 18.1 million, and the total number of households as 4.2 million.

Table 1.1 Mean household size, estimated population in private households, and estimated number of households, by region

|                |                   |              |                   |                 | Estimated number |
|----------------|-------------------|--------------|-------------------|-----------------|------------------|
|                | Mean hou          | sehold size  |                   | n households in | of households    |
|                |                   | ~~~.         |                   | ch 1999         | based on         |
| Locality       | 1984 Census       | GLSS4        | Projected         | Based on        | GLSS4            |
|                | (March 1984)      | (March 1999) | from census       | GLSS4 results   | (March 1999)     |
|                |                   |              | (millions)        | (millions)      |                  |
| <u>Ghana</u>   | <u>4.9</u><br>4.4 | 4.3<br>4.5   | <u>18.1</u>       | <u>18.1</u>     | 4,210,000        |
| Western        | 4.4               | 4.5          | 1.7               | 1.9             | 420,000          |
| Central        | 3.8               | 3.8          | 1.7               | 2.1             | 540,000          |
| Greater Accra  | 3.9               | 3.7          | 2.1               | 2.6             | 730,000          |
| Volta          | 4.8               | 5.0          | 2.5               | 1.9             | 380,000          |
| Eastern        | 4.8               | 4.4          | 1.8               | 2.5             | 570,000          |
| Ashanti        | 4.7               | 4.0          | 3.1               | 3.2             | 740,000          |
| Brong Ahafo    | 5.1               | 3.9          | 1.8               | 1.6             | 450,000          |
| Northern       | 8.7               | 5.2          | 1.7               | 1.1             | 200,000          |
| Upper West     | 8.4               | 6.0          | 0.7               | 0.4             | 60,000           |
| Upper East     | 7.1               | 5.0          | 1.1               | 0.8             | 150,000          |
| <u>Urban</u>   | 4.3               | <u>3.9</u>   | 5.8               | <u>6.7</u>      | 1,700,000        |
| Accra          | 3.7               | 3.6          | <u>5.8</u><br>1.3 | 1.9             | 550,000          |
| Other urban    | 4.5               | 4.0          | 4.5               | 4.8             | 1,150,000        |
| Rural          | <u>5.2</u>        | 4.5          | <u>12.3</u>       | <u>11.4</u>     | 2,510,000        |
| Rural Coastal  | <u></u>           | 4.1          |                   | 2.7             | 650,000          |
| Rural Forest   |                   | 4.5          |                   | 5.8             | 1,290,000        |
| Rural Savannah |                   | 5.1          |                   | 2.9             | 570,000          |

Being derived from survey results, the information in Table 1.1 concerning the regional estimates obtained from the survey are subject to sampling error even if the national estimate of 18.1 million assumed from the projection is correct. This explains why the projected populations for each region using the survey results are different from the simple projections made from the census data. In terms of the urban/rural split, the survey produces higher estimates for urban areas and lower ones for rural areas than those obtained by a simple projection of census figures using the same growth rate; this reflects the fact that the urban population has grown faster than the rural population. Compared with the 2.6 percent overall annual population growth rate, results from the survey imply annual growth rates of 3.6 percent for urban areas, (5.3 percent for Accra and 3.0 percent for other urban areas) and 2.0 percent for rural areas.

The average household size is 4.3 as compared to 4.9 that was observed in the 1984 census (Table 1.1). The urban household size in 1984 dropped from 4.3 to 3.9 in 1999 while the rural household size dropped by a relatively bigger margin from 5.2 to 4.5.

While the Central, Greater Accra, Brong Ahafo, Western, Eastern and Ashanti Regions have average household sizes which are equal to or less than the national average, the averages for the Volta, Northern, Upper East and Upper West Regions are higher than that for the whole country. According to Table 1.1 average household sizes seemed to have increased slightly from 1984 to 1999 for the Western, Central and Volta Regions but decreased for all the other regions over the 1984-1999 period.

The survey results indicate that one in every three households in Ghana has a female as the head of the household, with distinct location differences (Figure 1.1). The proportion of female-headed households is higher in rural coastal areas (40%) and other urban areas (39%) apart from Accra than all the other areas. Females head only 20 percent of the households in the rural sayannah zone.

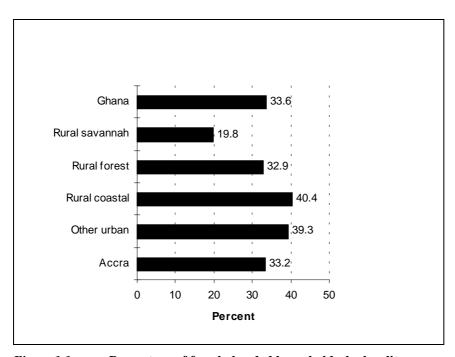


Figure 1.1: Percentage of female-headed households, by locality

For the country as a whole, the average age of a household head is estimated to be 44.9 years. Household heads in the rural areas tend to be older than those in the urban areas, including Accra (Table 1.2). In general, female-headed households are older than male-headed households.

Table 1.2: Average age of household heads, by locality and sex

| Locality       | Male | Female | All  |
|----------------|------|--------|------|
| <u>Urban</u>   | 43.1 | 45.2   | 43.8 |
| Accra          | 40.9 | 44.0   | 41.7 |
| Other urban    | 44.2 | 45.5   | 44.7 |
| Rural          | 44.4 | 48.3   | 45.6 |
| Rural Coastal  | 45.7 | 50.0   | 47.4 |
| Rural Forest   | 43.4 | 46.9   | 44.5 |
| Rural Savannah | 45.1 | 49.0   | 45.8 |
| All            | 44.0 | 47.0   | 44.9 |
| Sample Size    | 3981 | 2017   | 5998 |

Table 1.3 shows the composition of Ghanaian households. Out of the estimated total of 4.2 million households in Ghana, just over half (54%) contain at least one adult of each sex, together with one or more children aged under 15 years. Whereas 9.4 percent of households contain one woman living with one or more children only 1.2 percent of households have one man living with children. About 17 percent of households contain only one person; of these, about 446,000 are one-man households and 253,000 are one-woman households. Further information on household size is given in the section on housing.

Table 1.3 Composition of households

|                                | With Child          | lren       | Without C     | hildren    |
|--------------------------------|---------------------|------------|---------------|------------|
|                                | Percentage of total | Estimated  | Percentage of | Estimated  |
| Adults in household            |                     | households | total         | households |
| At least one adult of each sex | 54.4                | 2,290,000  | 9.7           | 408,000    |
| One man                        | 1.2                 | 50,000     | 10.5          | 446,000    |
| Two or more men                | 0.6                 | 25,000     | 0.9           | 34,000     |
| One woman                      | 9.4                 | 396,000    | 6.0           | 253,000    |
| Two or more women              | 5.6                 | 236,000    | 1.7           | 72,000     |
| Total                          | 71.3                | 2,997,000  | 28.7          | 1,213,000  |

Note: A child is defined as a person aged under 15.

## 1.2 Age and sex distribution

The population in general is quite young; about 5 out of every 10 persons are less than 20 years of age and about 69 percent of the population is under 30 years of age. Children (under 15 years) account for 44 percent of the total population while older persons (65+) account for only 5 percent. There is however a higher proportion of children in rural areas (46%) than in Accra (35%) and other urban areas (40.7%). This age structure implies a dependency ratio of 96, which means that on average each person of working age (15-64) has one additional person to support (Table 1.4).

Results of the survey give a distribution of 47.8 percent males and 52.2 percent females, indicating an overall sex ratio of 92 males to every 100 females. A larger proportion of female population is observed in all localities and age groups except for the youthful population (under 24 years of age) in the rural areas, where males outnumber females. The larger proportion of females in the higher age groups is a reflection of the demographic fact that in general women live longer than men.

Table 1.4 Age distribution of the population, by locality and sex (percent)

|             | Accra | ı      | Other url | ban    | Rural |        | All   |        |
|-------------|-------|--------|-----------|--------|-------|--------|-------|--------|
| Age group   | Male  | Female | Male      | Female | Male  | Female | Male  | Female |
| 0-4         | 4.6   | 5.2    | 5.4       | 5.4    | 7.2   | 7.1    | 6.6   | 6.5    |
| 5-9         | 6.2   | 6.2    | 7.4       | 7.3    | 8.4   | 8.0    | 7.9   | 7.7    |
| 10-14       | 6.2   | 6.7    | 7.2       | 8.0    | 7.5   | 7.3    | 7.3   | 7.5    |
| 15-19       | 5.4   | 6.1    | 6.0       | 6.0    | 5.2   | 4.5    | 5.4   | 5.0    |
| 20-24       | 4.4   | 5.3    | 3.9       | 4.3    | 3.2   | 3.0    | 3.5   | 3.5    |
| 25-29       | 4.7   | 4.4    | 2.6       | 4.1    | 2.3   | 3.7    | 2.6   | 3.8    |
| 30-34       | 3.0   | 4.3    | 2.4       | 3.4    | 2.2   | 3.3    | 2.3   | 3.4    |
| 35-39       | 2.7   | 3.8    | 2.5       | 2.9    | 2.4   | 3.1    | 2.4   | 3.1    |
| 40-44       | 2.6   | 2.5    | 1.8       | 3.0    | 2.0   | 2.3    | 2.0   | 2.5    |
| 45-49       | 2.1   | 2.1    | 2.1       | 2.0    | 1.8   | 2.1    | 1.9   | 2.1    |
| 50-54       | 1.9   | 1.6    | 1.3       | 1.6    | 1.7   | 1.9    | 1.6   | 1.8    |
| 55-59       | 0.9   | 1.4    | 1.2       | 1.1    | 1.1   | 1.2    | 1.1   | 1.2    |
| 60-64       | 0.8   | 0.7    | 0.9       | 1.3    | 1.0   | 1.4    | 0.9   | 1.3    |
| 65+         | 1.7   | 2.1    | 2.1       | 2.9    | 2.4   | 2.8    | 2.2   | 2.8    |
| All         | 47.3  | 52.7   | 46.6      | 53.4   | 48.3  | 51.7   | 47.8  | 52.2   |
| Sample size | 1103  | 1184   | 2920      | 3391   | 8425  | 8832   | 12448 | 13407  |

The ages shown in Table 1.4 are those reported by the respondents in each household. Where possible, the statement of age was based directly on the information provided on birth or baptismal certificates. Where there was no documentary proof of age, a calendar of events was used to assist in estimating the respondent's age. While the overall group distribution as shown in Table 1.4 is fairly accurate, an examination of individual estimates of age revealed a strong heaping of ages, with respondents preferring ages ending with zero and to a lesser extent 5.

## 1.3 Nationality, ethnicity and religion

The survey sample is predominantly Ghanaian with about 99 percent of those interviewed reported as Ghanaians; the rest are foreign nationals, majority of whom are Togolese and Burkinabes (Table 1.5). It should be noted that diplomatic households were excluded from the survey.

Table 1.5 Distribution of the population by sex and nationality (percent)

|        | Nationality |                 |      |         |                  |      |                  |       |       |             |
|--------|-------------|-----------------|------|---------|------------------|------|------------------|-------|-------|-------------|
| Sex    | Ghana       | Burkina<br>Faso | Mali | Nigeria | Cote<br>d'Ivoire | Togo | Other<br>African | Other | Total | Sample size |
| Male   | 98.6        | 0.3             | 0.1  | 0.1     | 0.1              | 0.7  | 0.1              | 0.0   | 100.0 | 12448       |
| Female | 98.7        | 0.2             | 0.1  | 0.1     | 0.1              | 0.6  | 0.1              | 0.0   | 100.0 | 13407       |
| All    | 98.7        | 0.3             | 0.1  | 0.1     | 0.1              | 0.6  | 0.1              | 0.1   | 100.0 | 25855       |

With regard to ethnicity, Table 1.6 shows that a little over half (53%) of the heads of households are Akans (18% Asante, 13% Fanti and 22% other Akan). A further 13 percent of heads of households identified themselves as Ewes, and 10 percent as Ga/Adangbes. About 4 percent identified themselves with the Dagomba ethnic group while Hausa household heads constitute 3 percent. Other groups like Mamprusi, Kusasi, Kasema Nankani, Konkomba, Nanumba and several others form about 12 percent of the heads of households covered in the survey.

Table 1.6 Household heads by region and ethnicity (percent)

| Ethnicity     | Western | Centra | G.Accra | Volta | Eastern | Ashanti | B/A   | Northern | U.West | U/East | Total |
|---------------|---------|--------|---------|-------|---------|---------|-------|----------|--------|--------|-------|
|               |         | 1      |         |       |         |         |       |          |        |        |       |
| Asante        | 4.1     | 2.7    | 6.8     | 0.2   | 7.9     | 76.4    | 13.7  | 0.6      | _      | _      | 17.6  |
| Fanti         | 20.5    | 66.3   | 7.7     | 0.5   | 5.4     | 5.1     | 1.7   | -        | _      | _      | 12.9  |
| Other Akan    | 45.1    | 23.3   | 14.7    | 0.9   | 46.2    | 4.7     | 57.4  | 0.3      | _      | 0.4    | 22.1  |
| Ga-Adangbe    | 4.5     | 1.0    | 48.3    | 0.9   | 16.8    | 0.8     | 0.7   | 0.8      | _      | _      | 10.2  |
| Ewe           | 3.3     | 1.4    | 12.0    | 71.7  | 11.8    | 2.5     | 2.2   | 5.0      | _      | _      | 12.4  |
| Guan          | 1.6     | 2.9    | 1.5     | 13.0  | 5.9     | -       | 3.5   | -        | -      | -      | 3.2   |
| Hausa         | -       | 0.4    | 2.8     | 1.7   | 1.3     | 0.8     | 2.0   | 1.7      | -      | 1.5    | 1.3   |
| Dagomba       | 1.1     | 0.3    | 1.7     | 0.8   | 0.9     | 1.3     | 0.6   | 47.5     | 0.8    | 1.9    | 3.8   |
| Grussi/Frafra | 0.8     | _      | 0.9     | -     | 0.4     | 1.2     | 1.7   | 2.2      | -      | 25.8   | 1.9   |
| Dagarti       | 0.5     | -      | -       | -     | 0.4     | 0.5     | 1.9   | 5.3      | 99.2   | 0.4    | 2.7   |
| Other         | 18.6    | 1.7    | 3.6     | 10.3  | 3.0     | 6.6     | 14.6  | 36.7     | -      | 70.0   | 11.9  |
| All           | 100.0   | 100.0  | 100.0   | 100.0 | 100.0   | 100.0   | 100.0 | 100.0    | 100.0  | 100.0  | 100.0 |
| Sample size   | 639     | 700    | 859     | 640   | 820     | 1060    | 540   | 360      | 120    | 260    | 5998  |

Table 1.6 also shows the composition of ethnic groups in all the ten regions of Ghana. The Western and Central Regions are inhabited largely by Fantis and other Akans while Ashanti Region is dominated by Asantes. Household heads in Volta and Upper East Regions are also quite homogeneous; Volta Region is largely inhabited by Ewes and to some extent Guans,

and almost all heads in Upper West are reported as Dagarti. The regions that are heterogeneous include Eastern, Brong Ahafo and Greater Accra. A greater proportion of other household heads in the Greater Accra Region identified themselves as mostly Ga/Adangbe, other Akans and Ewes. Although the "other Akans" group has a greater percentage share of household heads in the Eastern and Brong Ahafo Regions, all the ethnic groups also live in these two regions (see Appendix Table A1.1 for the distribution of the ethnic groups in the country).

In terms of religious affiliation, the survey indicates that more than two-thirds (72%) of heads of households in Ghana are Christians; Catholics account for 16 percent of total population, Pentecostals 13 percent, Presbyterians 11 percent, and Methodists 10 percent. The Spiritualist group form about 5 percent, the Anglicans about 2 percent while other Christian denominations account for a sizable proportion of the population (16 percent).

About 12 percent of heads of households are Muslims, and 15 percent hold traditional or animist beliefs (Table 1.7). Translated in absolute terms, this implies that about three and a half million household heads are Christians, a little over one million are Muslims, traditionalists or animists. Very few rural household heads in the savannah zone belong to other Christian denominations apart from the Catholic Church. Islam, on the one hand, appears strongest in the urban areas and in the rural savannah. Animism (no religion group) appears to be spread fairly evenly between the different ecological zones. Traditional religion, on the other hand, is common with some rural households, particularly rural households in the savannah and coastal areas.

Table 1.7 Household heads by religion and locality (percent)

| Religion        | Accra | Other Urban | Rural Coastal | Rural Forest | Rural Savannah | All   |
|-----------------|-------|-------------|---------------|--------------|----------------|-------|
|                 |       |             |               |              |                |       |
| Catholic        | 6.0   | 16.1        | 15.7          | 15.9         | 22.6           | 16.0  |
| Anglican        | 6.8   | 2.7         | 0.8           | 1.5          | 0.3            | 2.1   |
| Presbyterian    | 18.9  | 11.5        | 8.0           | 12.7         | 6.4            | 11.3  |
| Methodist       | 11.9  | 9.8         | 15.7          | 10.3         | 1.7            | 9.8   |
| Pentecostal     | 21.3  | 13.4        | 10.2          | 16.6         | 4.1            | 13.3  |
| Spiritualist    | 3.4   | 3.7         | 9.7           | 5.8          | 0.8            | 4.8   |
| Other Christian | 12.7  | 17.1        | 15.6          | 19.3         | 7.1            | 15.5  |
| Muslim          | 11.3  | 17.4        | 6.3           | 6.0          | 19.7           | 11.8  |
| Traditional     | 0.6   | 2.2         | 11.0          | 2.2          | 29.7           | 7.8   |
| No religion     | 6.8   | 6.0         | 6.9           | 9.4          | 7.5            | 7.6   |
| Other           | 0.3   | 0.1         | 0.1           | 0.1          | 0.2            | 0.1   |
| All             | 100.0 | 100.0       | 100.0         | 100.0        | 100.0          | 100.0 |
| Sample size     | 620   | 1579        | 899           | 1940         | 960            | 5998  |

In terms of regional distribution, Christian heads of households are found largely in the south of the country, with Presbyterians in large numbers in the Eastern Region, Methodists mostly in the Central Region and Pentecostals mostly in the Greater Accra and Ashanti Regions (Table 1.8). The Catholic Church dominates the population in four regions: Western Region, Volta Region, Brong Ahafo Region and Upper West Region, where 7 in every 10 heads of households are Catholics. The population in Northern Region is mainly Muslim and that of Upper East is

mainly traditional, with each religious group accounting for more than half of the total population in the respective region. Muslim heads of households account for about 58 percent of all household heads in the Northern Region, while traditionalists account for about two-thirds (66.5%) of heads of households in Upper East Region (see Appendix Table A1.2 for details on the distribution of religious groups in the country).

Table 1.8 Household heads by religion and region (percent)

| Religion        | Western | Central | G.Accra | Volta | Eastern | Ashanti | B/A   | Northern | U.West | U/East | Total |
|-----------------|---------|---------|---------|-------|---------|---------|-------|----------|--------|--------|-------|
|                 |         |         |         |       |         |         |       |          |        |        |       |
| Catholic        | 21.4    | 17.3    | 6.3     | 24.2  | 9.5     | 13.6    | 20.4  | 11.7     | 71.7   | 11.9   | 16.0  |
| Anglican        | 4.7     | 2.7     | 5.6     | 0.3   | 1.3     | 1.3     | -     | -        | -      | 0.4    | 2.1   |
| Presbyterian    | 3.3     | 3.1     | 18.0    | 21.3  | 26.0    | 6.7     | 8.3   | 3.6      | -      | 0.8    | 11.3  |
| Methodist       | 16.0    | 19.0    | 12.3    | 0.8   | 6.1     | 13.2    | 9.1   | 0.3      | -      | -      | 9.8   |
| Pentecostal     | 16.0    | 8.3     | 20.1    | 8.9   | 16.0    | 17.6    | 14.4  | 3.3      | -      | _      | 13.3  |
| Spiritualist    | 7.8     | 13.1    | 3.3     | 2.5   | 5.7     | 4.2     | 1.1   | 0.8      | -      | -      | 4.8   |
| Other Christian | 16.9    | 18.4    | 14.8    | 7.0   | 17.9    | 23.7    | 18.1  | 3.9      | -      | 5.0    | 15.5  |
| Muslim          | 8.1     | 8.7     | 9.9     | 7.5   | 5.7     | 10.1    | 10.9  | 57.8     | 2.5    | 14.6   | 11.8  |
| Traditional     | 0.3     | 4.1     | 1.6     | 20.3  | 1.5     | 0.6     | 6.9   | 13.1     | 12.5   | 66.5   | 7.8   |
| No religion     | 5.5     | 5.1     | 7.8     | 7.0   | 10.0    | 8.9     | 10.7  | 5.6      | 13.3   | -      | 7.6   |
| Other           | -       |         | 0.2     | 0.2   | 0.2     | 0.1     | -     | -        | -      | 0.8    | 0.1   |
| All             | 100.0   | 100.0   | 100.0   | 100.0 | 100.0   | 100.0   | 100.0 | 100.0    | 100.0  | 100.0  | 100.0 |
| Sample size     | 639     | 700     | 859     | 640   | 820     | 1060    | 540   | 360      | 120    | 260    | 5998  |

## 2 EDUCATION

## 2.1 Educational attainment

Table 2.1 highlights educational attainment of people aged 15 years and over. The use of this age as the cut-off point is based on the fact that the legislated minimum age for entering primary school is 6, and that a new entrant will have to do at least 10 years of schooling to qualify to sit the middle school leaving certificate (MSLC) examination or 9 years of schooling to qualify to sit the Basic Education Certificate of Examination (BECE). Also included in Table 2.1 are estimates of educational attainment for all adults in Ghana, obtained by grossing up the survey data (see Appendix 3 for the calculation of the estimates).

Table 2.1 Levels of educational attainment, by sex, and estimates of educational attainment for the population aged 15 and above

|                        |       | Percent |       | Estimates (millions) |         |      |  |  |
|------------------------|-------|---------|-------|----------------------|---------|------|--|--|
| Highest level attained | Males | Females | All   | Males                | Females | All  |  |  |
| Never been to school   | 21.1  | 41.0    | 31.8  | 1.0                  | 2.3     | 3.3  |  |  |
| Less than MSLC/BECE    | 24.6  | 25.6    | 25.1  | 1.2                  | 1.4     | 2.6  |  |  |
| MSLC/BECE              | 38.6  | 27.8    | 32.8  | 1.8                  | 1.5     | 3.3  |  |  |
| Secondary or higher    | 15.8  | 5.7     | 10.4  | 0.7                  | 0.3     | 1.0  |  |  |
| Total                  | 100.0 | 100.0   | 100.0 | 4.7                  | 5.5     | 10.2 |  |  |

About 32 percent of all adults (representing about three and a half million people) have never been to school. A further 25 percent (almost three million adults) went to school but did not obtain any qualifications. About 33 percent (three million and three hundred adults) have the MSLC/JSS certificate as their highest qualification, while the remaining 10 percent (a million adults) have secondary or higher-level qualifications.

There is a marked contrast between females and males in levels of educational attainment. For instance, more than twice as many females as males (2.4 million as against 1.1 million) have never been to school; in contrast, only half as many females as males have secondary or higher qualifications.

#### 2.2 School attendance

Two aspects of formal schooling, current and past school attendance are presented in this section of the report. The first section reports on current school attendance of people who are more likely to be in school at all the levels of the education ladder in Ghana. Tables 2.2 and 2.3 present school attendance rates by age, sex and locality.

The results on school attendance show that some 5.2 million (59%) of the total school age population of 8.3 million people are currently in school. Figure 2.1 illustrates the difference in

attendance rates between males and females for different age group; in each age group, the proportion of females attending school is lower than the corresponding proportion for males, and the differences are most marked in the 19-25 age group, thus indicating a higher female dropout rate than males.

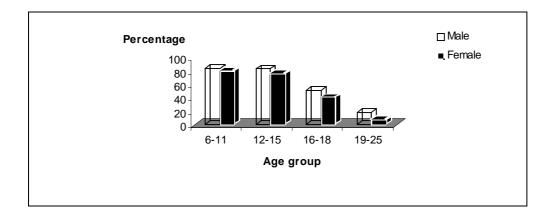


Figure 2.1: School attendance rate in each age group, by sex

Table 2.2 highlights the links between school attendance and place of residence. Not only are a higher proportion of urban dwellers of school going age actually in school, but also attendance rates rise with increased urbanisation. For example, 95 percent of all boys in Accra aged 6 to 11, and 91 percent in other urban areas, were enrolled in school at the time of the survey, whereas in rural savannah the corresponding figure is only 66 percent.

Table 2.2 School Attendance rate by age, locality and sex

|           | Ac   | ecra   | Othe | r urban | Rural | Coastal | Rura | Forest | Rural S | avannah |      | Ghana  |      |
|-----------|------|--------|------|---------|-------|---------|------|--------|---------|---------|------|--------|------|
| Age group | Male | Female | Male | Female  | Male  | Female  | Male | Female | Male    | Female  | Male | Female | All  |
| 6-11      | 95.0 | 85.6   | 91.1 | 87.4    | 82.7  | 85.7    | 90.8 | 88.2   | 66.3    | 61.3    | 84.4 | 81.6   | 83.1 |
| 12-15     | 85.9 | 85.2   | 89.9 | 81.2    | 91.0  | 81.4    | 86.8 | 81.0   | 66.5    | 55.2    | 83.8 | 76.8   | 80.4 |
| 16-18     | 70.9 | 42.1   | 58.2 | 50.5    | 55.6  | 37.5    | 41.6 | 40.2   | 48.3    | 29.1    | 51.9 | 41.8   | 47.0 |
| 19-25     | 25.1 | 17.3   | 22.5 | 10.3    | 12.2  | 9.8     | 10.9 | 4.5    | 25.7    | 4.6     | 19.0 | 8.5    | 13.5 |
|           |      |        |      |         |       |         |      |        |         |         |      |        |      |
| All       | 69.2 | 57.9   | 70.6 | 60.5    | 70.0  | 63.6    | 67.7 | 61.8   | 55.6    | 45.8    | 66.2 | 58.4   | 62.3 |

A similar pattern is noticeable in respect of school attendance among girls. On the whole, however, the proportion of females in school is significantly lower in all localities and for all ages (apart from age group 6-11 in rural coastal) when compared with their male counterparts.

Table 2.3 highlights the substantial differences in school attendance, both between the sexes and between the south and the north of the country. In terms of the sexes, male attendance rates are, in general, higher than the rates for females throughout the country and across age groups. There are a few exceptions though; female attendance rates for age group 6-11 in Volta, Eastern and Upper West, for age group 12-15 in Upper West and for age group 16-18 in Ashanti and Upper West Regions are higher than the males' attendance rates. Over 80 percent of children aged 6-11 are currently attending school in all regions except Upper West,

Upper East and Northern Regions. Turning to the older school age category, 19-25, higher rates of attendance were noted among residents in Volta, Greater Accra and Upper West Regions. For this age group too, females have a low attendance rate; only 9 percent of females aged 19-25 are currently in school, compared with 19 percent of males of the same age.

Table 2.3 School attendance rate, by region, age and sex (percent)

|               |      |        |      | Age    | group |        |      |        |      |        |      |
|---------------|------|--------|------|--------|-------|--------|------|--------|------|--------|------|
|               | 6    | -11    | 12   | 2-15   | 16    | -18    | 19   | -25    |      | 6 - 25 |      |
| Region        | Male | Female | Male | Female | Male  | Female | Male | Female | Male | Female | All  |
| Western       | 93.6 | 90.8   | 93.0 | 84.3   | 50.1  | 41.1   | 11.0 | 4.5    | 70.3 | 62.4   | 66.0 |
| Central       | 84.7 | 82.6   | 89.1 | 81.6   | 49.2  | 32.5   | 12.3 | 4.8    | 71.3 | 62.1   | 66.6 |
| Greater Accra | 91.7 | 85.9   | 87.3 | 85.4   | 68.4  | 43.4   | 27.5 | 17.9   | 69.5 | 60.2   | 64.8 |
| Volta         | 81.4 | 83.6   | 84.6 | 82.0   | 57.9  | 50.1   | 22.9 | 14.3   | 65.2 | 63.9   | 64.6 |
| Eastern       | 89.0 | 90.4   | 87.1 | 77.4   | 46.1  | 42.8   | 13.7 | 8.0    | 69.1 | 59.6   | 64.5 |
| Ashanti       | 90.8 | 87.8   | 85.4 | 78.3   | 40.1  | 43.4   | 9.2  | 6.4    | 65.1 | 57.7   | 61.2 |
| Brong Ahafo   | 91.6 | 83.9   | 88.7 | 82.3   | 55.6  | 37.9   | 14.2 | 2.4    | 72.6 | 61.8   | 67.2 |
| Northern      | 67.2 | 57.3   | 71.9 | 46.1   | 38.6  | 32.1   | 24.4 | 4.0    | 56.1 | 40.9   | 49.2 |
| Upper West    | 60.3 | 73.2   | 62.6 | 71.6   | 62.9  | 68.7   | 49.1 | 18.2   | 59.0 | 64.5   | 61.6 |
| Upper East    | 64.9 | 54.6   | 60.2 | 47.2   | 59.9  | 18.5   | 28.4 | 6.8    | 56.3 | 41.6   | 50.0 |
| All           | 84.4 | 81.6   | 83.8 | 76.8   | 51.9  | 41.8   | 19.0 | 8.5    | 66.2 | 58.4   | 62.3 |

The second aspect of schooling looks at the historicity of adults' attendance in formal education. All household members aged 15 years and over were asked whether they have ever been to school. The results for adults are summarised in Table 2.4 by region, sex and rural-urban location. School attendance here also increases with urbanisation, and female attendance is consistently lower than that of male attendance. The rates for the northern sector of the country are significantly lower than the rates in the south; while more than two-thirds of adults in almost all the regions in the south have been to school before, only about a third of adults in the north had done the same. Another notable observation is the differences between males and females' rates in urban areas, as compared to the variation in rural areas; the situation for females in this case is worse in rural areas than in urban areas.

Table 2.4 Proportion of adults in each region who have been to school, by sex and locality (percent)

|               | •    | Urban  |      |      | Rural  |      |      | Ghana  |      |
|---------------|------|--------|------|------|--------|------|------|--------|------|
| Region        | Male | Female | All  | Male | Female | All  | Male | Female | All  |
| Western       | 91.5 | 79.4   | 84.8 | 87.3 | 58.2   | 72.0 | 88.3 | 63.6   | 75.2 |
| Central       | 84.1 | 64.6   | 72.6 | 79.2 | 54.5   | 64.9 | 80.6 | 57.5   | 67.1 |
| Greater Accra | 93.0 | 80.4   | 86.6 | 85.8 | 61.9   | 72.5 | 92.6 | 79.1   | 85.6 |
| Volta         | 89.8 | 70.4   | 80.1 | 80.4 | 55.0   | 67.0 | 82.7 | 58.5   | 70.2 |
| Eastern       | 87.7 | 74.6   | 80.2 | 86.3 | 62.3   | 73.5 | 86.6 | 65.1   | 74.9 |
| Ashanti       | 92.6 | 82.6   | 86.7 | 88.8 | 64.8   | 75.5 | 90.2 | 72.1   | 80.0 |
| Brong Ahafo   | 85.8 | 69.1   | 75.9 | 83.9 | 58.4   | 70.8 | 84.4 | 61.9   | 72.3 |
| Northern      | 59.4 | 20.1   | 41.4 | 42.6 | 23.0   | 32.8 | 46.0 | 22.5   | 34.5 |
| Upper West    | 56.2 | 56.2   | 56.2 | 52.3 | 23.8   | 38.7 | 53.6 | 34.8   | 44.5 |
| Upper East    | 85.7 | 50.0   | 66.7 | 29.6 | 12.3   | 21.0 | 35.7 | 16.9   | 26.3 |
| All           | 87.8 | 73.8   | 80.2 | 74.5 | 51.5   | 62.4 | 79.2 | 59.6   | 68.8 |

## 2.3 Educational expenses

In the survey, detailed information was collected on the educational expenses incurred by households for each household member attending school or college during the last 12 months preceding the interview. Table 2.5 presents average amount of money spent on different expenditure items for the last 12 months preceding the survey.

On average, households spent about &psi(163,500) a year for each household member attending school or college. The annual amount spent is much higher in Accra (&psi(447,821)) than in other urban (&psi(214,203)) or rural areas where the average expenses were far less than the national average. In general, rural savannah's average figure is the lowest, rounding to a low average of about &psi(50,393). The four main items of expenditure are: school and registration fees (accounting for 36 percent of total educational expenditure); food, board and lodging at school (34 percent); uniforms and sports clothes (8 percent); and books and school supplies (8 percent).

Table 2.5: Average amount paid per person attending school/college in the last 12 months, by locality (cedis)

|                                       |         |         | Locality |         |          | All     |       |  |
|---------------------------------------|---------|---------|----------|---------|----------|---------|-------|--|
| Item                                  | Accra   | Other   | Rural    | Rural   | Rural    | Amount  | %     |  |
|                                       |         | urban   | coastal  | forest  | Savannah |         |       |  |
| School & registration fees            | 185,549 | 86,075  | 18,170   | 39,790  | 7,283    | 59,158  | 36.2  |  |
| Contributions to PTA                  | 4,993   | 2,543   | 870      | 2,063   | 1,569    | 2,231   | 1.4   |  |
| Uniforms & sports clothes             | 24,201  | 15,665  | 9,153    | 11,132  | 11,344   | 13,393  | 8.2   |  |
| Books & school supplies               | 43,847  | 15,940  | 6,260    | 7,544   | 5,919    | 13,056  | 8.0   |  |
| Transportation to/from school         | 29,736  | 9,333   | 3,969    | 3,383   | 1,529    | 7,515   | 4.6   |  |
| Food, board & lodging at school       | 134,751 | 66,033  | 44,318   | 44,961  | 17,411   | 55,803  | 34.1  |  |
| Other expenses (clubs, extra classes) | 26,541  | 13,632  | 5,550    | 4,965   | 1,812    | 9,168   | 5.6   |  |
| Other in-kind expenses                | 8,203   | 4,982   | 636      | 1,254   | 3,526    | 3,198   | 2.0   |  |
| Total                                 | 457,821 | 214,203 | 88,926   | 115,092 | 50,393   | 163,522 | 100.0 |  |

Note: All figures have been rounded to the nearest 100 cedis.

The figures are based on those who attended or were attending school/college in the last 12 months.

Apart from rural-urban differences, the amount spent on education also increases as one moves higher on the education ladder. This is particularly so with the proportion of total amount spent on school and registration fees as well as amount spent on books and school supplies (see Appendix Tables A2.1, A2.2, A2.3 and A2.4).

## 2.4 Literacy

Questions concerning literacy were asked to find out whether respondents could read or write a simple letter in English or in a local language, in which they were most proficient. Questions involving calculations were also asked to elicit information about numeracy levels of respondents. The data have been analysed separately for males and females and also for the type of locality people live in.

The results indicate that 50 percent of adults in Ghana are literate in English or a local language (Table 2.6). There are substantial differences between the sexes, and between localities. A little over 6 out of every 10 men, but fewer than 4 out of every 10 women, are literate. Almost two-thirds (66%) of adults in urban areas are literate, but in rural areas only 41 percent are literate.

Table 2.6 Adult literacy rates, by sex and locality (percent)

|        |       | Urban       |     |         | Rur    | al       |     |       |
|--------|-------|-------------|-----|---------|--------|----------|-----|-------|
|        | Accra | Other urban | All | Coastal | Forest | Savannah | All | Ghana |
|        |       |             |     |         |        |          |     |       |
| Male   | 84    | 76          | 78  | 63      | 70     | 35       | 57  | 65    |
| Female | 66    | 51          | 55  | 26      | 36     | 13       | 27  | 37    |
| All    | 74    | 62          | 66  | 42      | 52     | 24       | 41  | 50    |

Note: Adult refers to those aged 15 and over. All those who said they could write a letter in English or in a Ghanaian language were considered as being literate.

Table 2.7 gives information similar to that in Table 2.6, but the information is separated into those literate only in a Ghanaian language, those literate in both a Ghanaian language and English, and those literate only in English. If those who said they were literate in only a Ghanaian language are excluded, the proportion literate (in English) drops by just 5 percentage points from 50 percent to 45 percent; if literacy in Ghanaian language is considered, the proportion who are literate drops by 12 percentage points, from 50 to 38 percent. There is therefore considerable overlap in literacy, with 34 percent of adults being literate in both English and a Ghanaian language. The only exception to this pattern is in Accra, where more than a quarter of all adults are literate in English but not in a Ghanaian language.

Table 2.7 Adult literacy rates in English and Ghanaian language, by sex and locality (percent)

|        |                |                   | Literate in              |         |            |       |        |
|--------|----------------|-------------------|--------------------------|---------|------------|-------|--------|
|        |                | Ghanaian          | Ghanaian                 | English | Illiterate | Total | Sample |
| Sex    | Locality       | languages<br>only | languages<br>and English | only    |            |       | size   |
| Male   | Accra          | 1.3               | 50.2                     | 32.6    | 16.0       | 100.0 | 690    |
| Maic   | Other Urban    |                   |                          |         | 24.9       | 100.0 | 1686   |
|        |                | 3.9               | 53.3                     | 18.0    |            |       |        |
|        | Rural Coastal  | 5.0               | 46.4                     | 10.9    | 37.6       | 100.0 | 875    |
|        | Rural Forest   | 6.5               | 52.2                     | 9.3     | 32.0       | 100.0 | 2063   |
|        | Rural Savannah | 2.9               | 23.8                     | 8.1     | 65.2       | 100.0 | 1419   |
|        | All            | 4.5               | 46.1                     | 13.7    | 35.8       | 100.0 | 6733   |
| Female | Accra          | 3.4               | 35.4                     | 27.4    | 33.7       | 100.0 | 744    |
|        | Other Urban    | 5.4               | 31.4                     | 12.7    | 50.5       | 100.0 | 2057   |
|        | Rural Coastal  | 2.7               | 16.9                     | 7.2     | 73.2       | 100.0 | 1154   |
|        | Rural Forest   | 6.7               | 23.1                     | 6.0     | 64.2       | 100.0 | 2323   |
|        | Rural Savannah | 2.5               | 8.5                      | 3.7     | 85.3       | 100.0 | 1408   |
|        | All            | 4.8               | 23.1                     | 9.6     | 62.6       | 100.0 | 7687   |
| All    | Accra          | 2.4               | 42.3                     | 29.9    | 25.4       | 100.0 | 1435   |
|        | Other Urban    | 4.7               | 41.2                     | 15.1    | 39.0       | 100.0 | 3743   |
|        | Rural Coastal  | 3.7               | 29.5                     | 8.8     | 58.0       | 100.0 | 2029   |
|        | Rural Forest   | 6.6               | 36.6                     | 7.5     | 49.2       | 100.0 | 4386   |
|        | Rural Savannah | 2.7               | 16.1                     | 5.9     | 75.3       | 100.0 | 2828   |
|        | All            | 4.6               | 33.7                     | 11.5    | 50.2       | 100.0 | 14420  |

\*Note: Adult refers to those aged 15 and over. All those who said they could write a letter were considered as being literate.

## 2.5 Apprenticeship training

Results in Table 2.8 show the distribution of apprentices in various industrial sectors of the Ghanaian economy. The major trade groups, which take young persons as apprentices are tailoring, carpentry and mechanical work. Tailoring is very common among both females and males. In a sample of 3,438 trainees in Ghana, about 37 percent (66 percent of females and 13 percent of males) of them are estimated to be engaged in tailoring. The other major trades like carpentry, masonry, blacksmithing, mechanical, electronics/electrical, and painting/spraying are dominated by males, with less than 2 percent of females engaged in them.

Table 2.8 Distribution of apprentices by main trade learnt, by sex and locality (percent)

|                        | Locality |        |       |       |        |       |       |        |       |  |
|------------------------|----------|--------|-------|-------|--------|-------|-------|--------|-------|--|
|                        |          | Urban  |       |       | Rural  |       |       | Ghana  |       |  |
| Main trade learnt      | Male     | Female | All   | Male  | Female | All   | Male  | Female | All   |  |
| Carpentry              | 16.0     | 0.4    | 8.5   | 15.7  | -      | 9.0   | 15.8  | 0.2    | 8.8   |  |
| Masonry                | 8.5      | -      | 4.4   | 11.4  | -      | 6.6   | 10.2  | -      | 5.7   |  |
| Tailoring              | 13.2     | 64.4   | 37.8  | 12.5  | 68.1   | 36.0  | 12.8  | 66.4   | 36.8  |  |
| Blacksmithing          | 4.0      | -      | 2.1   | 3.4   | -      | 2.0   | 3.6   | -      | 2.0   |  |
| Mechanical             | 17.2     | 0.3    | 9.1   | 11.2  | 0.4    | 6.6   | 13.6  | 0.3    | 7.7   |  |
| Electronics/Electrical | 8.9      | -      | 4.6   | 5.0   | -      | 2.9   | 6.5   | -      | 3.6   |  |
| Painting/spraying      | 4.8      | 1.1    | 3.0   | 3.1   | 0.7    | 2.1   | 3.7   | 0.9    | 2.5   |  |
| Other                  | 27.5     | 33.7   | 30.5  | 37.7  | 30.8   | 34.8  | 33.6  | 32.1   | 33.0  |  |
| All                    | 100.0    | 100.0  | 100.0 | 100.0 | 100.0  | 100.0 | 100.0 | 100.0  | 100.0 |  |

In terms of duration of training, blacksmithing, mechanical work and training in electrical work take the longest time among the trade groups covered. On average it takes about two and half years for an apprentice to complete training in the other trades, but apprenticeship in the above trade groups could take the trainee about four years and over to master the trade properly. Duration of training for males is also estimated to be longer than for females. It takes nearly three years (34 months) for a male to complete the apprenticeship, whereas for females it takes about two years (26 months) to do so. The average length of apprenticeship training in urban areas was found to be longer than the length in rural areas (Table 2.9). These differences are not gender or location related but are due to the type of trade involved.

Table 2.9 Average length of apprenticeship training by main trade learnt, sex and locality (months)

|                        | Locality |        |       |      |        |       |      |        |      |
|------------------------|----------|--------|-------|------|--------|-------|------|--------|------|
|                        | Urban    |        | Rural |      |        | Ghana |      |        |      |
| Main trade learnt      | Male     | Female | All   | Male | Female | All   | Male | Female | All  |
| Carpentry              | 39.5     | 29.6   | 39.2  | 29.4 | _      | 29.4  | 33.4 | 29.6   | 33.4 |
| Masonry                | 31.2     | -      | 31.2  | 30.0 | -      | 30.0  | 30.4 | -      | 30.4 |
| Tailoring              | 37.1     | 29.4   | 30.8  | 31.4 | 26.0   | 27.0  | 33.7 | 27.5   | 28.6 |
| Blacksmithing          | 55.5     | -      | 55.5  | 39.3 | -      | 39.3  | 46.3 | -      | 46.3 |
| Mechanical             | 36.9     | 19.1   | 36.5  | 35.9 | 29.2   | 35.8  | 36.4 | 22.7   | 36.2 |
| Electronics/Electrical | 36.7     | -      | 36.7  | 41.7 | -      | 41.7  | 39.0 | -      | 39.0 |
| Painting/spraying      | 32.6     | 16.6   | 29.1  | 37.1 | 23.7   | 35.2  | 35.4 | 20.1   | 32.8 |
| Other                  | 35.3     | 24.1   | 28.9  | 29.7 | 21.5   | 26.5  | 31.5 | 22.8   | 27.4 |
| All                    | 37.2     | 27.3   | 32.4  | 31.8 | 24.5   | 28.7  | 33.9 | 25.8   | 30.2 |

#### 3 HEALTH

## 3.1 Introduction

The health section sought information on the general health condition of all household members in the two weeks preceding the interview. For those who had suffered from an injury or illness during the previous two weeks, further information was collected about the health effects on usual activities, the type of health care received and the expenditure incurred.

Information was also collected about preventive health care and vaccination against DPT, polio, measles and BCG in respect of all children aged 7 years and under. For those aged five years and under, some data on post-natal care, particularly breast-feeding, were collected. The child's mother or other responsible household member provided information about each child. The last part of the health section applied to female household members aged 15 to 49 years. The section has information on fertility, pre-natal care and contraceptive use.

## 3.2 Health condition in the past two weeks

A little over a quarter (26%) of the population in the survey reported that they had suffered from an illness or injury during the two weeks preceding the interview (Figure 3.1). As one would expect, older people and young children are most vulnerable to illness or injury. More than a third of those aged 50 and over (37%), and 5 years and lower (36%) suffered from illness or injury during the two weeks preceding the interview. About a quarter (27%) of those in age group 20-49 suffered from illness or injury during the previous two weeks. The results indicate that school age children are least likely to be indisposed; only 1 in 6 of those aged 6 to 19 were reported to have suffered from an illness or injury during the two weeks under consideration.

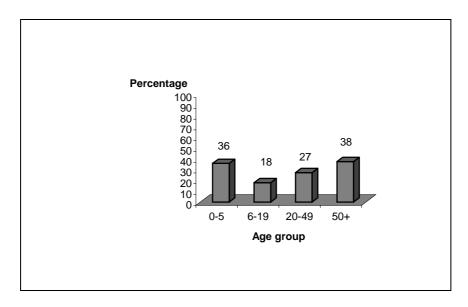


Figure 3.1: People suffering from illness or injury during the previous two weeks, by age group

Table 3.1 suggests that there is little difference between the sexes in the lower age groups, although males in the age categories (0-5 and 6-19) appear to have suffered from an illness or injury more than females. The only exception to this is found in Accra where females in the 0-5 age group tend to have suffered significantly more than males of the same age. Across all ecological zones older females (20 years and above) tend to suffer from illness and injury more than males.

Table 3.1 Percent of people suffering from an illness or injury during the previous two weeks, by age group, locality and sex (percent)

|           | Accra |        | Other Urban |        | Rural Coastal |        | Rural | Forest | Rural S | avannah |      | Country |      |
|-----------|-------|--------|-------------|--------|---------------|--------|-------|--------|---------|---------|------|---------|------|
| Age group | Male  | Female | Male        | Female | Male          | Female | Male  | Female | Male    | Female  | Male | Female  | All  |
|           |       |        |             |        |               |        |       |        |         |         |      |         |      |
| 0 - 5     | 17.6  | 32.0   | 36.7        | 36.8   | 40.4          | 29.7   | 43.4  | 36.9   | 35.1    | 29.9    | 37.9 | 33.9    | 35.9 |
| 6 - 19    | 11.1  | 8.4    | 18.6        | 18.0   | 18.6          | 17.1   | 20.5  | 18.7   | 18.5    | 18.9    | 18.6 | 17.4    | 18.0 |
| 20 - 49   | 15.1  | 16.8   | 22.0        | 31.0   | 24.4          | 31.7   | 29.8  | 36.0   | 20.8    | 27.9    | 23.6 | 30.5    | 27.4 |
| 50+       | 24.6  | 28.5   | 30.9        | 41.0   | 35.9          | 44.1   | 33.5  | 49.0   | 29.1    | 38.1    | 31.6 | 42.8    | 37.6 |
|           |       |        |             |        |               |        |       |        |         |         |      |         |      |
| All       | 15.0  | 16.8   | 23.6        | 28.0   | 26.3          | 28.3   | 28.9  | 31.7   | 23.7    | 26.3    | 24.9 | 27.9    | 26.5 |

About 61 percent (representing about 15% of the total population) of those who suffered from illness or injury in the previous two weeks, had to stop their usual activities due to the indisposition (Table 3.2). Apart from Accra, the data from both urban and rural areas show little difference between the sexes in the effects of illness or injury on usual activity, but generally females were rather more likely than males to stop their usual activities if they were indisposed. In general, the effects of illness and injury appear to be slightly greater in urban areas than in rural areas; this is particularly so for Accra when the information is compared to what pertains in rural savannah.

Table 3.2 Percent of people suffering from an illness or injury who had to stop their usual activity during the previous two weeks, by age group, locality and sex

|           | Accra |        | Other urban |        | Rural | coastal | Rural | forest | Rural S | Savannah |      | Country |      |
|-----------|-------|--------|-------------|--------|-------|---------|-------|--------|---------|----------|------|---------|------|
| Age group | Male  | Female | Male        | Female | Male  | Female  | Male  | Female | Male    | Female   | Male | Female  | All  |
|           |       |        |             |        |       |         |       |        |         |          |      |         |      |
| 0 - 5     | 85.9  | 61.9   | 70.2        | 67.1   | 70.0  | 54.5    | 64.2  | 65.8   | 56.2    | 58.9     | 65.0 | 62.9    | 64.0 |
| 6 - 19    | 92.5  | 67.1   | 53.4        | 65.4   | 64.6  | 58.2    | 55.7  | 58.3   | 57.9    | 57.2     | 58.6 | 60.4    | 59.5 |
| 20 - 49   | 67.6  | 74.0   | 54.6        | 56.1   | 60.0  | 62.6    | 69.8  | 60.9   | 57.1    | 49.5     | 62.6 | 58.6    | 60.1 |
| 50+       | 70.6  | 67.1   | 51.8        | 65.4   | 54.9  | 69.4    | 61.7  | 64.9   | 55.1    | 64.3     | 57.4 | 65.9    | 62.6 |
|           |       |        |             |        |       |         |       |        |         |          |      |         |      |
| All       | 77.3  | 68.8   | 57.0        | 61.9   | 63.2  | 61.9    | 63.2  | 62.1   | 56.8    | 55.8     | 61.2 | 61.2    | 61.2 |

About 44 percent of all people who reported ill or suffered from injury consulted a health practitioner (including traditional healer), dentist or visited a health centre, in the previous two weeks (Table 3.3). The other half did not consult any health care provider, although some of them did purchase medicines or medical supplies for their ailments. People in the urban areas especially Accra, are more likely to seek consultation with a health care provider than those in the rural areas. School-age children and adults above 50 years of age are less likely to consult a health care provider than people in other age groups.

Table 3.3 Percent of people who reported ill and consulted a health practitioner or dentist, during the previous two weeks, by age group, locality and sex

|           | Accra |        | Other urban |        | Rural coastal |        | Rura | l forest | Rural | Savannah |      | Country |      |
|-----------|-------|--------|-------------|--------|---------------|--------|------|----------|-------|----------|------|---------|------|
| Age group | Male  | Female | Male        | Female | Male          | Female | Male | Female   | Male  | Female   | Male | Female  | All  |
|           |       |        |             |        |               |        |      |          |       |          |      |         |      |
| 0 - 5     | 67.2  | 64.3   | 66.0        | 56.6   | 54.0          | 46.7   | 46.9 | 40.3     | 54.8  | 33.6     | 53.9 | 45.1    | 49.7 |
| 6 - 19    | 57.4  | 48.9   | 47.7        | 46.1   | 46.7          | 43.0   | 31.6 | 30.5     | 39.5  | 35.1     | 40.6 | 38.4    | 39.5 |
| 20 - 49   | 62.9  | 67.9   | 44.6        | 55.3   | 45.0          | 49.8   | 41.3 | 41.4     | 41.5  | 35.4     | 44.2 | 46.7    | 45.7 |
| 50+       | 83.6  | 70.4   | 44.6        | 44.6   | 53.1          | 36.1   | 29.5 | 31.1     | 32.9  | 29.8     | 41.4 | 36.8    | 38.6 |
|           |       |        |             |        |               |        |      |          |       |          |      |         |      |
| All       | 65.2  | 64.0   | 50.0        | 51.4   | 49.4          | 44.5   | 38.5 | 36.9     | 42.4  | 34.0     | 45.2 | 42.7    | 43.8 |

Regarding the type of health practitioner consulted (Table 3.4), almost half (46%) of those who consulted a health practitioner reported that they had seen a doctor; 18 percent saw medical assistants, a further 16 percent saw a nurse. Consultation with traditional provider, spiritualist and TBA formed less than 10 percent of those who reported ill or had injuries in the country. The great majority of medical consultations in urban areas, and Accra in particular, take place with a doctor, but in rural areas the consultation is almost as likely to be with a doctor, medical assistant as a nurse. This is particularly so in rural savannah where people are more likely to see medical assistant than a doctor. There are not many differences in the pattern of choice of health providers by males and females.

Table 3.4 Percent of people who reported ill and consulted a health practitioner or dentist, during the previous two weeks, by type of provider, locality and sex

|              |      |        |      |         | Loc   | cality  |      |          |         |          |      |        |      |
|--------------|------|--------|------|---------|-------|---------|------|----------|---------|----------|------|--------|------|
| Practitioner | A    | ccra   | Othe | r urban | Rural | coastal | Rura | l forest | Rural S | Savannah |      | Ghana  |      |
| Consulted    | Male | Female | Male | Female  | Male  | Female  | Male | Female   | Male    | Female   | Male | Female | All  |
|              |      |        |      |         |       |         |      |          |         |          |      |        |      |
| Trad. healer | 1.9  | 3.6    | 5.9  | 4.3     | 6.4   | 3.9     | 7.5  | 4.8      | 7.2     | 9.7      | 6.4  | 5.1    | 5.7  |
| Doctor       | 65.4 | 70.5   | 61.3 | 64.5    | 39.6  | 45.2    | 37.3 | 41.0     | 20.0    | 20.8     | 43.0 | 48.4   | 45.9 |
| Dentist      | 0.9  | -      | 0.3  | 0.2     | -     | 0.4     | 0.4  | 0.4      | 0.4     | -        | 0.4  | 0.3    | 0.3  |
| Nurse        | 1.9  | 2.2    | 10.3 | 12.4    | 23.3  | 20.6    | 15.9 | 15.6     | 22.1    | 26.4     | 15.5 | 15.7   | 15.6 |
| Med.Asst.    | 1.9  | 3.6    | 7.6  | 7.7     | 14.4  | 13.2    | 26.0 | 25.0     | 34.0    | 27.8     | 19.1 | 16.6   | 17.7 |
| Midwife      | -    | 0.7    | 1.2  | 2.8     | -     | 1.3     | 2.0  | 2.9      | 1.3     | 0.5      | 1.2  | 2.1    | 1.7  |
| Pharmacy     | 28.0 | 19.4   | 5.6  | 4.9     | 1.5   | 2.2     | 2.4  | 2.7      | 1.3     | 1.9      | 4.9  | 4.6    | 4.8  |
| TBA          | -    | -      | 0.3  | -       | -     | 0.4     | -    | 0.2      | -       | -        | 0.1  | 0.1    | 0.1  |
| Spiritualist | -    | -      | 0.3  | 0.9     | 0.5   | 1.3     | 0.4  | 1.3      | 1.3     | 0.5      | 0.5  | 1.0    | 0.8  |
| Other        | -    | -      | 7.3  | 2.4     | 14.4  | 11.4    | 7.9  | 6.3      | 12.3    | 12.5     | 8.9  | 6.2    | 7.4  |
|              |      |        |      |         |       |         |      |          |         |          |      |        |      |
| Total        | 100  | 100    | 100  | 100     | 100   | 100     | 100  | 100      | 100     | 100      | 100  | 100    | 100  |
| Sample size  | 108  | 127    | 344  | 487     | 226   | 253     | 438  | 489      | 279     | 232      | 1396 | 1588   | 2983 |
| Sample size  | 108  | 127    | 344  | 46/     | 220   | 233     | 430  | 409      | 219     | 232      | 1390 | 1300   | 2903 |

Illness was the main reason given for consultation (91%); the other most common reasons are injury (7%) or check-up (1%). Most consultations take place in clinics (40%) and hospitals (35%). The numbers of consultations that take place in public and private establishments are nearly equal. A few consultations (about 5%) take place in quasi-public facilities. For those who pay for the services of health care providers, the average amount paid for a consultation is ¢29,400, but this average conceals substantial variations in the amounts paid. About a third do not pay anything, and for those who pay, the minimum amount is ¢100 and the maximum is ¢350,000. About 80 percent of all clients paid less than or just ¢10,000 for health care in the last 2 weeks preceding the interview.

A third of those who sought medical consultation during the previous two weeks purchased medicines and medical supplies. Only 3 percent of this group received their medicines and supplies free of charge, half of them spent about  $\&ppercent{2}$ ,500, and another quarter paid up to  $\&ppercent{2}$ ,500. In a few cases (less than 1%) there were responses of more than  $\&ppercent{2}$ ,000 expenditure on medicines and supplies

Information on financiers of medical bills including cost of consultations and hospital admissions revealed that the expenditures are borne mostly by heads of household (80% of the cases). Most people settled their bills by themselves, while less than 5 percent are settled by employers or government.

# 3.3 Fertility, pre-natal care and contraceptive use

This section of the questionnaire was administered to women aged 15-49. Among this group, 74 percent had at some time been pregnant (Table 3.5). More than 97 percent of all women above the age of 30 reported that they have ever been pregnant. Among younger women, those in rural areas are much more likely to be become pregnant than those in urban areas. For instance, in the 20-24 year age group, 70 percent of rural women had already experienced at least one pregnancy, whereas amongst urban women in this age group only 50 percent had been pregnant before. Teenage pregnancy is also twice as common in rural areas as in urban areas.

Table 3.5 The situation of pregnancy for women aged 15-49 years, by age group and locality (percent)

|           | Ev    | er pregnant |       |       | t during prev<br>12 months | vious | Curr  | Currently pregnant |       |  |
|-----------|-------|-------------|-------|-------|----------------------------|-------|-------|--------------------|-------|--|
| Age group | Urban | Rural       | Ghana | Urban | Rural                      | Ghana | Urban | Rural              | Ghana |  |
| 15-19     | 6.9   | 15.1        | 11.6  | 2.3   | 5.0                        | 3.9   | 1.0   | 4.1                | 2.8   |  |
| 20-24     | 51.8  | 72.3        | 63.8  | 9.3   | 16.5                       | 13.5  | 7.1   | 12.9               | 10.5  |  |
| 25-29     | 81.5  | 94.2        | 89.7  | 19.3  | 28.3                       | 25.1  | 8.5   | 10.5               | 9.8   |  |
| 30-34     | 96.9  | 97.7        | 97.4  | 18.8  | 19.8                       | 19.4  | 8.0   | 11.5               | 10.3  |  |
| 35-39     | 99.1  | 99.7        | 99.5  | 11.7  | 17.5                       | 15.5  | 6.7   | 8.9                | 8.1   |  |
| 40-44     | 97.6  | 99.5        | 98.8  | 7.1   | 7.2                        | 7.2   | 1.8   | 4.2                | 3.3   |  |
| 45-49     | 99.9  | 98.7        | 99.1  | 3.1   | 4.2                        | 3.8   | 0.4   | 2.6                | 1.8   |  |
| All       | 66.9  | 78.6        | 74.2  | 10.3  | 15.0                       | 13.2  | 4.9   | 8.2                | 7.0   |  |

About 7 percent of all women aged 15-49 years were currently pregnant, and a further 13.2 percent had been pregnant sometime during the previous 12 months. Overall, rates of current pregnancy appear highest in the 20-24, 25-29 and 30-35 age groups, with around a tenth of women in those age groups currently pregnant. The 25-29 age group had the highest frequency of pregnancies in the previous 12 months with 25.1%.

Figure 3.2 illustrates the pattern of current fertility amongst women of different ages, separately for urban and rural areas with the two age groups, 40-44 and 45-49, having been combined, since the base figures are small. Rates of pregnancy in rural areas are consistently higher than those in urban areas.

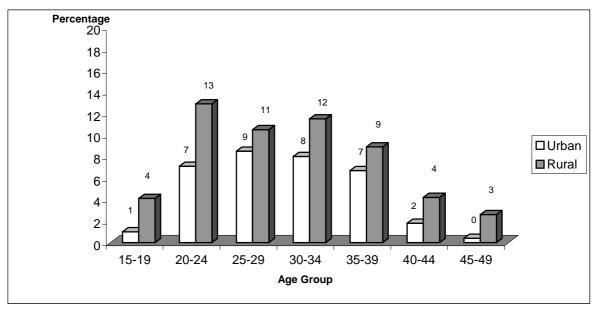


Figure 3.2: Women currently pregnant, by age group and locality

Women who had been pregnant in the previous 12 months were asked about the outcome of their pregnancy. Overall, some 14 percent of all pregnancies did not result in live births (Table 3.6). This figure includes both planned and unplanned termination of pregnancy. Older women, and women living in urban areas, were more likely to have a pregnancy which did not result in a live birth. Thus, while around 90 percent of pregnancies amongst rural women aged under 35 resulted in a live birth, only 77 percent of pregnancies amongst urban women aged 35 or over did so.

Table 3.6 Percentage of pregnancies in the last 12 months not resulting in a live birth, by age of woman and locality (percent)

|                | Age      |            |      |
|----------------|----------|------------|------|
| Locality       | Under 35 | 35 or over | All  |
| Urban          | 17.6     | 27.7       | 19.8 |
| Urban<br>Rural | 9.1      | 20.1       | 11.7 |
| All            | 11.6     | 22.3       | 14.1 |

Women aged 15-49 years who were currently pregnant or pregnant during the previous 12 months were asked whether they received any pre-natal care. In all, eight out of every 10 of them said they had received pre-natal care. The proportion receiving pre-natal care in rural areas is not very different from the proportion in urban areas but rural women in the age group 35-39 are less likely to receive pre-natal care than their counterparts in the urban areas.

Pregnant women who did not receive any pre-natal care were asked why they refused to do so. Amongst the reasons given by women in rural areas for not seeking pre-natal care, were that pre-natal care was not necessary (34% of respondents), and that they could not afford the care (33%)

of respondents). Other specific reasons given by rural women were that the health centre was too far away (5%) or that the service was not available (3%). The remaining 25 percent of rural women gave a variety of other reasons for not receiving pre-natal care (see Appendix Table A3.3 for details on locality differences).

Women aged 15-49 years were also asked whether they or their partners were using any method to prevent or delay pregnancy. Table 3.7 shows that, in the country as a whole, contraceptive use is very low among Ghanaian households; only about 15% of women reported that they or their partners were using a contraceptive method. The use of contraceptives was most common among women aged 25-39 years, but even among this group less than 30 percent were using any form of contraception. In terms of locality, there is little difference between urban and rural areas in the levels of contraceptive use by different age groups, except that there is a slightly higher rate of contraceptive use among those over 30 but less than 45 years living in Accra.

Table 3.7 Percent of women aged 15-49 years (or their partners) who are using any contraceptives to prevent or delay pregnancy, by age and locality

|           |       |             | Locality      |              |                |       |
|-----------|-------|-------------|---------------|--------------|----------------|-------|
| Age group | Accra | Other urban | Rural coastal | Rural forest | Rural Savannah | Ghana |
| 15-19     | 1.8   | 1.7         | 3.5           | 4.3          | 2.4            | 2.8   |
| 20-24     | 7.6   | 15.5        | 13.6          | 18.7         | 12.1           | 14.8  |
| 25-29     | 9.9   | 22.2        | 19.9          | 26.3         | 21.1           | 21.8  |
| 30-34     | 27.2  | 26.2        | 31.4          | 24.3         | 28.8           | 27.0  |
| 35-39     | 31.6  | 26.3        | 16.0          | 31.1         | 21.6           | 26.0  |
| 40-44     | 17.5  | 17.8        | 14.9          | 14.1         | 13.2           | 15.4  |
| 45-49     | 8.0   | 10.6        | 8.8           | 9.3          | 4.1            | 8.2   |
| All       | 14.2  | 16.0        | 15.4          | 18.7         | 15.7           | 16.5  |

Among women aged 15-49 (or their partners), about 11 percent use modern methods, and 4 percent use traditional methods, to prevent or delay pregnancy. Table 3.8 illustrates how the use of modern and traditional methods of contraception varies according to the age of the woman.

Of the modern methods, the pill was the one most often used (5.4%), followed by injectable (2.5%) and condom (1.9%). Of the traditional methods, the rhythm method (2.5%) and abstinence (1%) were the ones mentioned most often.

Table 3.8: Distribution of women aged 15-49 years (or their partners), by age group and contraceptive method used (percent)

|                      |       |       |       | Age group |       |       |       |       |
|----------------------|-------|-------|-------|-----------|-------|-------|-------|-------|
| Contraceptive method | 15-19 | 20-24 | 25-29 | 30-34     | 35-39 | 40-44 | 45-49 | Ghana |
| Modern Method        | 1.6   | 10.4  | 15.2  | 16.4      | 17.4  | 10.6  | 5.2   | 10.8  |
| Pill                 | 0.5   | 5.8   | 8.7   | 7.3       | 9.3   | 4.5   | 2.1   | 5.4   |
| Condom               | 1.1   | 2.7   | 2.4   | 2.3       | 1.8   | 2.2   | 0.8   | 1.9   |
| IUD                  | -     | -     | 0.4   | 0.5       | 1.0   | 0.3   | 0.2   | 0.3   |
| Injection            | -     | 1.5   | 3.4   | 4.9       | 3.7   | 2.8   | 2.3   | 2.5   |
| Douche               | -     | 0.1   | 0.1   | 0.2       | 0.4   | -     | -     | 0.1   |
| Female sterilisation | -     | -     | 0.1   | 0.3       | 1.0   | 0.8   | -     | 0.3   |
| Male sterilization   | -     | -     | -     | -         | -     | -     | -     | -     |
| Other sterilization  | -     | 0.3   | 0.1   | 0.7       | 0.3   | 0.2   | -     | 0.2   |
| Traditional Method   | 1.3   | 3.2   | 5.3   | 6.7       | 5.4   | 5.1   | 3.5   | 4.2   |
| Rhythm               | 0.7   | 2.6   | 2.9   | 4.1       | 3.0   | 3.2   | 1.9   | 2.5   |
| Withdrawal           | 0.2   | 0.1   | 0.6   | 0.2       | 0.5   | 0.3   | 0.4   | 0.3   |
| Abstinence           | 0.2   | 0.4   | 1.6   | 1.8       | 1.1   | 1.1   | 0.8   | 1.0   |
| Other                | 0.2   | 0.1   | 0.2   | 0.6       | 0.8   | 0.5   | 0.4   | 0.4   |
| No method used       | 97.1  | 86.4  | 79.5  | 76.9      | 77.2  | 84.3  | 91.3  | 85.0  |
| Total                | 100.0 | 100.0 | 100.0 | 100.0     | 100.0 | 100.0 | 100.0 | 100.0 |
| Sample size          | 1221  | 900   | 1032  | 951       | 800   | 639   | 502   | 6046  |

In Accra, the pill (3.7%) was most commonly reported (Table 3.9). This was followed by condom (3.2%), and rhythm method (2.3%). In the other urban areas, the pill (4.8%) was also the most commonly used method, followed by injectable, IUD and rhythm, with all of them sharing about 2.8% of the women population. Information from Table 3.9 also shows that women in rural forest appear to use contraceptives more than women in other areas.

Table 3.9 Distribution of women aged 15-49 years (or their partners), by locality group and contraceptive method used (percent)

|                      |       |             | Locality      |              |          |       |
|----------------------|-------|-------------|---------------|--------------|----------|-------|
| <del>-</del>         | Accra | Other urban | Rural coastal | Rural forest | Rural    | Ghana |
| Contraceptive method |       |             |               |              | Savannah |       |
| Modern Method        | 9.1   | 11.7        | 9.0           | 11.2         | 11.0     | 10.7  |
| Pill                 | 3.7   | 4.8         | 3.8           | 7.5          | 4.7      | 5.4   |
| Condom               | 3.2   | 2.8         | 1.0           | 1.4          | 1.4      | 1.9   |
| IUD                  | 0.5   | 0.4         | 0.3           | 0.3          | 0.2      | 0.3   |
| Injection            | 1.0   | 2.9         | 2.5           | 1.6          | 4.5      | 2.5   |
| Douche               | 0.2   | 0.2         | -             | 0.1          | 0.1      | 0.1   |
| Female sterilization | 0.2   | 0.4         | 0.4           | 0.3          | 0.1      | 0.3   |
| Male sterilization   | -     | -           | -             | -            | -        | -     |
| Other sterilization  | 0.3   | 0.2         | 1.0           | -            | -        | 0.2   |
| Traditional Method   | 3.3   | 4.6         | 3.0           | 5.5          | 2.6      | 4.2   |
| Rhythm               | 2.3   | 2.7         | 1.8           | 3.5          | 1.2      | 2.5   |
| Withdrawal           | 0.2   | 0.3         | 0.3           | 0.4          | 0.3      | 0.3   |
| Abstinence           | 0.5   | 1.3         | 0.6           | 1.0          | 0.9      | 1.0   |
| Other                | 0.3   | 0.3         | 0.3           | 0.6          | 0.2      | 0.4   |
| No method used       | 87.6  | 83.6        | 88.2          | 83.4         | 86.4     | 85.0  |
| Total                | 100.0 | 100.0       | 100.0         | 100.0        | 100.0    | 100.0 |
| Sample size          | 629   | 1638        | 836           | 1826         | 1117     | 6046  |

The national average cost of contraceptives for the month preceding the interview was about  $$\phi 1500$$ . About 17% of all the clients did not pay anything for the contraceptives they used, less than a quarter paid  $$\phi 2,000$$  and above with a maximum in this group reaching about  $$\phi 25,000$$  for the month preceding the interview. There are not much variation between the localities in terms of the amount paid; clients paid about  $$\phi 1,600$$  in urban areas and  $$\phi 1,400$$  in rural areas.

#### 3.4 Post-natal care

In the country as a whole, 39 percent of the children aged five years and under had received post-natal care (Table 3.10). As one would expect, very young children are the ones who are most likely to receive post-natal care; two-thirds of all children aged less than 12 months, and 73 percent of children aged 12 to 23 months, were reported to have received post-natal care in the last 12 months. The lower value for children aged less than one year is probably due to their age, since on average these children will only be six months old, and will therefore not have had a chance of receiving post-natal care over the full 12-month period.

Table 3.10 Percent of children aged five years and under who had post-natal care in the previous 12 months, by age and locality

|         |       |             | Locality      |              |                |       |  |
|---------|-------|-------------|---------------|--------------|----------------|-------|--|
| Age     | Accra | Other urban | Rural coastal | Rural forest | Rural Savannah | Ghana |  |
| 0 year  | 76.1  | 74.0        | 63.6          | 64.8         | 59.7           | 66.0  |  |
| 1 year  | 83.2  | 74.5        | 69.1          | 71.8         | 74.1           | 73.3  |  |
| 2 years | 56.0  | 35.5        | 37.3          | 39.2         | 37.1           | 39.1  |  |
| 3 years | 42.0  | 17.3        | 10.3          | 22.4         | 31.2           | 23.7  |  |
| 4 years | 30.7  | 23.5        | 17.8          | 24.6         | 22.1           | 23.0  |  |
| 5 years | 7.9   | 17.2        | 14.8          | 18.8         | 20.3           | 17.5  |  |
| All     | 48.4  | 39.4        | 34.6          | 39.9         | 38.5           | 39.2  |  |

More than half (52%) of those who have had post-natal care paid ¢1000 or over for the service. Less than one percent did not pay any money for the care (Table 3.11). People living in Accra usually pay more for a post-natal consultation than those in other areas. This may be due to the use of private facilities for the purpose for some Accra residents.

Table 3.11 Distribution of amount paid for post-natal consultation, by locality (percent)

|                         |       |             | Locality      |              |                |       |
|-------------------------|-------|-------------|---------------|--------------|----------------|-------|
| Amount paid             | Accra | Other urban | Rural coastal | Rural forest | Rural Savannah | Ghana |
|                         |       |             |               |              |                |       |
| Nothing                 | 1.1   | 0.8         | -             | 0.6          | -              | 0.5   |
| Less than ¢100          | -     | 0.4         | -             | -            | 2.4            | 0.6   |
| ¢100 to less than ¢200  | -     | 2.3         | 2.6           | 0.6          | 9.6            | 3.2   |
| ¢200 to less than ¢500  | 1.1   | 26.0        | 28.4          | 18.3         | 18.2           | 19.8  |
| ¢500 to less than ¢1000 | 11.7  | 23.3        | 25.8          | 26.7         | 20.9           | 23.4  |
| ¢1000 or over           | 86.2  | 47.3        | 43.2          | 53.7         | 49.0           | 52.4  |
| Total                   | 100.0 | 100.0       | 100.0         | 100.0        | 100.0          | 100.0 |
| Sample size             | 108   | 263         | 163           | 493          | 311            | 1339  |

Questions were also asked about breastfeeding. The level of breastfeeding in Ghana is very high, with 98 percent of all children under 5 having been breastfed at one time or another. In trying to estimate the average age at weaning, it is most useful to look at the distribution of age at weaning for children aged at least 24 months, since most children of a younger age are still being breastfed. Table 3.12 shows the distribution of average age at weaning, by age of child, for children aged 2, 3, 4 and 5 years. The pattern of weaning seems very consistent across the age groups. At each age, about 6 percent were weaned before they were 12 months old, 22 percent before they were 18 months, and 48 percent before they were 24 months old. This leaves almost 51 percent of children aged 2-5 who were not weaned until after 24 months, and 2 percent of children who were not breastfed beyond 24 months.

Table 3.12 Distribution of children aged 2-5, by age of child and age in months at weaning (percent)

| Age | Not breast-fed | < 12 | 12-17 | 18-23 | 24+  | Total | Sample size |
|-----|----------------|------|-------|-------|------|-------|-------------|
| 2   | 0.8            | 6.5  | 16.5  | 29.4  | 46.7 | 100.0 | 702         |
| 3   | 1.2            | 5.7  | 15.3  | 28.4  | 49.3 | 100.0 | 692         |
| 4   | 2.2            | 5.4  | 15.6  | 25.3  | 51.5 | 100.0 | 760         |
| 5   | 2.0            | 6.2  | 14.6  | 21.1  | 56.1 | 100.0 | 706         |
| All | 1.6            | 5.9  | 15.5  | 26.0  | 51.0 | 100.0 | 2860        |

### 3.5 Preventive health care

This section of the questionnaire focused on children who were aged seven or under. Its purpose is to find out whether children had been vaccinated against each of the six childhood killer diseases, the source of the vaccination, and the expenses incurred. In addition, it seeks to find the reasons why some children are not vaccinated against these diseases. Although detailed information was collected about different vaccinations, for simplicity, the information presented below relates only to whether the child has had any vaccination at all, and not necessarily the complete set of vaccinations.

Table 3.13 indicates that about 7 percent of children below the age of 8 have never received any vaccination. While the coverage of the vaccination programme in urban areas appears fairly high, at least with regard to children receiving some vaccinations, more than 5 percent of rural

children under 8 years old have apparently never been vaccinated. The percentage of these children is as high as 12 percent in rural savannah.

Nearly one fifth (19.5%) of children aged under one year have apparently never been vaccinated. This is quite high especially in rural areas but it should be noted that the proportion of children under one year who have never been vaccinated is somewhat misleading, because very young babies may not be old enough to have had a chance of having some of the vaccinations; for instance, vaccination against measles is not normally given until around nine months.

Table 3.13 Percent of children aged 7 years and under who have not been vaccinated, by age of child and locality

|         |       |             | Locality      |              |                |       |
|---------|-------|-------------|---------------|--------------|----------------|-------|
| Age     | Accra | Other urban | Rural coastal | Rural forest | Rural Savannah | Ghana |
| 0 year  | 11.1  | 12.1        | 19.5          | 19.9         | 28.0           | 19.5  |
| 1 year  | 0.0   | 0.9         | 8.0           | 5.2          | 7.3            | 4.9   |
| 2 years | 0.0   | 1.2         | 7.8           | 4.8          | 9.0            | 5.2   |
| 3 years | 0.0   | 1.4         | 0.7           | 5.1          | 9.9            | 4.7   |
| 4 years | 3.0   | 0.0         | 1.0           | 3.9          | 7.8            | 3.6   |
| 5 years | 0.0   | 2.7         | 3.6           | 3.4          | 10.8           | 4.9   |
| 6 years | 0.0   | 1.3         | 2.0           | 4.8          | 14.4           | 5.5   |
| 7 years | 0.0   | 2.6         | 1.3           | 3.8          | 13.9           | 4.9   |
| All     | 1.4   | 2.6         | 5.2           | 6.4          | 12.4           | 6.5   |

For all children receiving vaccinations, the average amount paid for the last vaccination was  $\not$ e710; a little over a quarter (27%) of parents did not have to pay anything for their child's vaccination, about a quarter of all clients paid  $\not$ e200, another quarter paid  $\not$ e500 and only a third paid more than  $\not$ e1,000.

Reasons parents gave for not sending their children for vaccinations varied among respondents. The most common and specific reasons were three: about 28 percent of them mentioned that the vaccination centre was too far, while a further 26 percent said they did not know they had to vaccinate the child and about one eighth of them said their children were too young for vaccination. Figure 3.3 shows the distribution of reasons given, separately for urban and rural areas.

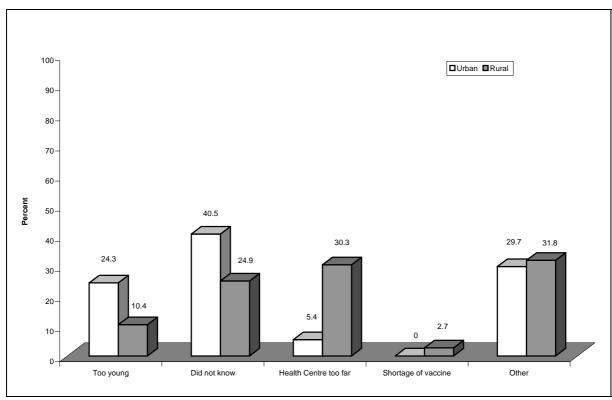


Figure 3.3: Reasons why children were not vaccinated, by locality

### 4 EMPLOYMENT

#### 4.1 Introduction

The survey questionnaire contained a wide range of questions on the economic activity, employment, and working conditions of all household members aged 7 years and above. Questions asked concerned each person's activity status and employment search in the last seven days, as well as the person's economic activity status over the previous 12 months. There were other questions that sought individuals' employment history and their current housekeeping activities.

Information was sought on all jobs which a person had done during the previous 12 months preceding the interview, including working for a wage, being self-employed, being engaged in agricultural activity, or having worked unpaid in a household enterprise. Up to four jobs were allowed, but most parts of the report present summaries on the main job of individuals. Full details were collected on the pay and conditions for each job. The analyses of the employment section look at the activity status of the individual, employment situation in the main occupation and industrial classifications, the type of work people do and their main employers. Simple time use analysis for both economic and non-economic activities, including house keeping has also been done. Age, sex, education and locality differences have been explored in almost all the tables presented.

# 4.2 Economic activity

The economic activity of the entire population is divided into two broad groups; the economically active and the non-economically active. The economically active is that part of the population which actually engages or is available to engage in the production of economic goods and services, while the non-active is that part which for reasons such as age, education or incapacitation cannot engage in production. At any given time, an economically active person may either be employed or unemployed.

To avoid difficulties associated with recall of responses pertaining to the last 12 months, the report dwells heavily on the information concerning the activity status of individuals in the past seven days preceding the interview. People were therefore described as employed if they did some work for profit or family gain in the past 7 days. In this connection, it should be noted that a person is counted as being employed during a week if they did any work at all during that week; no account is taken of the amount of time spent. The others in the active group were described as unemployed if they were recorded as actively seeking work, or were at least available to take up work if they were offered some.

Using an estimate of 18.1 million for the population in private households in March 1999, comprising 8.7 million males and 9.4 million females, and assuming that all children under the age of 7 are usually economically inactive, the survey results indicate a crude activity rate of 64 percent. Table 4.1 provides estimates, separately for males and females, of the economically active population in each age group, and it also shows the specific activity rates for different age groups.

The data suggest that out of a total population of about 14.7 million (7 years and above), some 11.3 million people are currently economically active, giving an economic activity rate of around 77 percent. The economic activity rate for women in the age group (15-64) are lower than those for men, but in the younger age group (7-14) and the older age group (65+) the rates for females exceed those for males.

Table 4.1 National estimates of total population and currently economically active population, and sex-age specific activity rates

|           | Tota       | l Populatio | n     | -    | economical<br>Population | ly active | Current activity rates |           |      |  |
|-----------|------------|-------------|-------|------|--------------------------|-----------|------------------------|-----------|------|--|
| Age group | Male       | Female      | All   | Male | Female                   | All       | Male                   | Female    | All  |  |
|           | (millions) |             |       |      | (millions)               |           |                        | (percent) |      |  |
| 7-14      | 2.21       | 2.19        | 4.40  | 0.72 | 0.74                     | 1.47      | 25.5                   | 30.3      | 27.8 |  |
| 15-24     | 1.62       | 1.55        | 3.17  | 1.15 | 1.02                     | 2.16      | 69.3                   | 64.3      | 66.6 |  |
| 25-44     | 1.69       | 2.33        | 4.02  | 1.48 | 1.92                     | 3.40      | 87.8                   | 80.9      | 83.8 |  |
| 45-64     | 1.01       | 1.15        | 2.17  | 0.90 | 1.01                     | 1.92      | 77.1                   | 78.3      | 87.9 |  |
| 65 +      | 0.41       | 0.51        | 0.91  | 0.32 | 0.41                     | 0.73      | 77.1                   | 78.3      | 77.7 |  |
| All       | 6.94       | 7.73        | 14.67 | 5.57 | 6.01                     | 11.59     | 78.1                   | 75.8      | 77.2 |  |

Table 4.2 provides similar sex-age specific activity rates, separately for the different localities and ecological zones. For each age group the activity rates for males and females are higher in rural areas (apart from rural savannah) than in urban areas, and this difference is most noticeable amongst the younger age groups and the elderly. The activity rates in Accra and rural coastal for the younger age group (7-14) are particularly high.

Table 4.2 also sheds light on the activities of young children aged 7 to 14 years. Although children are usually considered economically inactive, the survey still recorded 25.5 percent of children in this age group as being economically active. As already mentioned, there are great variations among different parts of the country in the level of economic activity amongst young children.

Table 4.2 Current activity rates, by sex, age and locality (percent)

|            |       | Urban |      |         | R      | ural     |      |       |
|------------|-------|-------|------|---------|--------|----------|------|-------|
| Age group  | Accra | Other | All  | Coastal | Forest | Savannah | All  | Ghana |
| Males      |       |       |      |         |        |          |      |       |
| 7-14       | 47.9  | 14.2  | 18.0 | 94.4    | 13.6   | 23.3     | 26.9 | 25.5  |
| 15-24      | 67.4  | 59.4  | 61.4 | 79.7    | 71.1   | 70.5     | 72.1 | 69.3  |
| 25-44      | 80.5  | 83.8  | 82.7 | 95.0    | 94.3   | 82.0     | 90.6 | 87.8  |
| 45-64      | 86.2  | 89.0  | 88.2 | 88.4    | 93.8   | 84.6     | 89.6 | 77.1  |
| 65 +       | 62.7  | 76.0  | 73.9 | 76.6    | 88.8   | 66.1     | 78.2 | 77.1  |
| 7 +        | 79.0  | 77.0  | 77.5 | 89.2    | 83.0   | 69.6     | 79.2 | 78.1  |
| Females    |       |       |      |         |        |          |      |       |
| 7-14       | 93.2  | 24.0  | 32.6 | 85.8    | 20.4   | 25.4     | 29.7 | 30.3  |
| 15-24      | 65.5  | 59.1  | 60.7 | 71.4    | 66.0   | 63.2     | 66.1 | 64.3  |
| 25-44      | 76.5  | 80.4  | 79.3 | 86.2    | 86.1   | 71.7     | 81.7 | 80.9  |
| 45-64      | 88.6  | 87.1  | 87.5 | 90.1    | 89.6   | 79.3     | 86.5 | 78.3  |
| 65 +       | 92.7  | 73.4  | 76.4 | 89.5    | 84.6   | 54.7     | 79.0 | 78.3  |
| 7 +        | 77.7  | 74.7  | 75.5 | 85.2    | 79.4   | 65.2     | 76.0 | 75.8  |
| Both Sexes |       |       |      |         |        |          |      |       |
| 7-14       | 73.9  | 19.6  | 26.0 | 90.4    | 16.8   | 24.2     | 28.2 | 27.8  |
| 15-24      | 66.2  | 59.2  | 61.0 | 74.9    | 68.5   | 67.1     | 69.0 | 66.6  |
| 25-44      | 78.4  | 81.9  | 80.8 | 89.7    | 89.6   | 76.1     | 85.4 | 83.8  |
| 45-64      | 87.3  | 88.0  | 87.8 | 89.3    | 91.6   | 82.0     | 88.0 | 87.9  |
| 65 +       | 77.4  | 74.7  | 75.1 | 84.2    | 86.6   | 61.5     | 78.6 | 77.7  |
| 7 +        | 78.3  | 75.7  | 76.4 | 86.9    | 81.1   | 67.4     | 77.5 | 77.2  |

Most of the adults who are classified as economically active are employed. The employed adults in the active population total 8.3 million (4.1 million males and 4.2 million females). Table 4.3 shows the employment status of adults in the last 7 days, separately for males and females in urban and rural areas. The results show that nearly nine out of ten adults are economically active. About 4 percent of women are classified as homemakers, because they were not economically active but had spent some time on housekeeping activities, and about 2 percent of male adults are also classified as homemakers. Only 1 percent of all adults are classified as students in the seven-day period because they did not work and have not left school. About 3 percent of adults were reported as sick or disabled and less than 1 percent of adults stated that they were too old to work. In all, about 4 percent of adults are classified as economically inactive for other reasons.

There appears to be differences in the employment status of adults in urban and rural areas. In urban areas about 80 percent of male adults and 77 percent of female adults are employed, whereas in rural areas about 84 percent of males and 82 percent of females are employed. Unemployment is a significant phenomenon in urban areas, but it is relatively small in rural areas.

Table 4.3 Employment status of population aged 15+, by sex and locality (percent)

|                   | Urban |        |       |       | Rural  |       |       | Ghana  | _     |
|-------------------|-------|--------|-------|-------|--------|-------|-------|--------|-------|
| Employment Status | Male  | Female | All   | Male  | Female | All   | Male  | Female | All   |
|                   |       |        |       |       |        |       |       |        |       |
| Employed          | 79.6  | 77.4   | 78.3  | 86.0  | 82.3   | 84.0  | 84.0  | 80.7   | 82.1  |
| Unemployed        | 13.2  | 10.9   | 11.9  | 4.4   | 4.2    | 4.3   | 7.2   | 6.4    | 6.7   |
| Student           | 1.0   | 0.8    | 0.9   | 1.6   | 0.8    | 1.2   | 1.4   | 0.8    | 1.1   |
| Home-maker        | 1.6   | 4.2    | 3.0   | 2.0   | 4.4    | 3.3   | 1.9   | 4.3    | 3.2   |
| Too old           | 0.5   | 0.4    | 0.5   | 0.2   | 0.5    | 0.3   | 0.3   | 0.5    | 0.4   |
| Sick/Disabled     | 1.6   | 3.0    | 2.4   | 2.5   | 3.3    | 3.0   | 2.2   | 3.2    | 2.8   |
| Other             | 2.6   | 3.2    | 3.0   | 3.3   | 4.6    | 4.0   | 3.1   | 4.1    | 3.7   |
|                   |       |        |       |       |        |       |       |        |       |
| All               | 100.0 | 100.0  | 100.0 | 100.0 | 100.0  | 100.0 | 100.0 | 100.0  | 100.0 |
| Sample size       | 1601  | 2033   | 3634  | 3420  | 4150   | 7570  | 5021  | 6183   | 11204 |
| Sample size       | 1601  | 2033   | 3634  | 3420  | 4150   | 7570  | 5021  | 6183   | 11204 |

### 4.3 Employment and working conditions

This section presents information on employment and working conditions of the employed in the working age population (15-64), which is estimated at about 6.9 million adults in the country.

People were asked whether they had done any work during the past 7 days for which they received pay, profit, family gain, or did anything for barter or home use. As shown in Table 4.4, some 14 percent of adults reported that they had done work in wage employment. A further 69 percent were involved in self-employment (39% in agriculture and 30% in non-agricultural activities). Less than a fifth (17.2%) of adults in the working age (15-64) engaged themselves in unpaid family enterprises; majority of this group (15.3%) were involved in agriculture.

There were significant contrasts between the results from urban and rural areas, and also between males and females. More than three quarters of urban workers (about 80%) were involved in non-agricultural work, but just a little over a quarter of the rural people were involved in non-agricultural activities. The distribution of males and females among the type of work indicates that more males were involved in wage employment than females but the percentage of females in unpaid family work far exceeds the percentage of males in that activity.

Table 4.4 Type of work engaged in by the population aged 15-64 years during the last 7 days, by locality and sex (percent)

|  |       | Urban  |       |       | Rural  |       |       | Ghana  |       |
|--|-------|--------|-------|-------|--------|-------|-------|--------|-------|
| Type of work                           | Male  | Female | All   | Male  | Female | All   | Male  | Female | All   |
| Wage employment                        | 42.4  | 12.5   | 25.9  | 14.3  | 3.3    | 8.3   | 23.0  | 6.2    | 13.8  |
| Self-employment (non-agriculture)      | 32.8  | 64.4   | 50.3  | 12.7  | 28.0   | 21.0  | 18.9  | 39.6   | 30.2  |
| Unpaid family worker (non-agriculture) | 2.0   | 5.0    | 3.7   | 0.8   | 1.4    | 1.1   | 1.1   | 2.6    | 1.9   |
| Self-employment (agriculture)          | 19.1  | 11.7   | 15.0  | 59.6  | 40.6   | 49.3  | 47.0  | 31.4   | 38.5  |
| Unpaid family worker (agriculture)     | 3.4   | 6.1    | 4.9   | 12.4  | 26.7   | 20.1  | 9.6   | 20.1   | 15.3  |
| Other                                  | 0.3   | 0.2    | 0.3   | 0.3   | -      | 0.1   | 0.3   | 0.1    | 0.2   |
| All                                    | 100.0 | 100.0  | 100.0 | 100.0 | 100.0  | 100.0 | 100.0 | 100.0  | 100.0 |
| Sample size                            | 1189  | 1467   | 2656  | 2658  | 3134   | 5792  | 3847  | 4601   | 8448  |

Respondents were asked who was their employer in their main job over the last 7 days (Table 4.5). Over half of them (52%) reported that they were self-employed in agricultural activities, a further one-third (34.3%) were either engaged by the private informal sector or other self-employment activities outside the agricultural sector. The government sector employs only 6.2 percent and about 7.5 percent is employed by the formal private sector. Almost all working women are self-employed in their main job; only about 1 in 16 women were working for an employer. A large number of men are also self-employed, but about 1 in 4 worked for an employer. Over 90 percent of workers in rural areas worked as self-employed (both in agriculture and non-agriculture), and also in the informal private sector. In urban areas on the other hand, relatively more people were employed in the formal sector. The government and the formal private sectors employed about 12 percent and 15 percent respectively.

Table 4.5 Type of employer for population aged 15-64 years in the last 7 days, by locality and sex (percent)

|  |       | Urban  |       |       | Rural  |       |       | Ghana  |       |
|--|-------|--------|-------|-------|--------|-------|-------|--------|-------|
| Main employer  | Male  | Female | All   | Male  | Female | All   | Male  | Female | All   |
| Self-employment (agriculture)                                | 22.0  | 16.2   | 18.8  | 71.1  | 64.0   | 67.2  | 55.9  | 48.7   | 52.0  |
| State-owned company  | 17.5  | 6.5    | 11.4  | 6.3   | 1.8    | 3.9   | 9.8   | 3.3    | 6.2   |
| Private formal   | 25.0  | 6.0    | 14.5  | 7.6   | 1.4    | 4.2   | 13.0  | 2.9    | 7.5   |
| Private informal & self-<br>employment (non-<br>agriculture) | 35.5  | 71.4   | 55.3  | 15.0  | 32.8   | 24.7  | 21.4  | 45.1   | 34.3  |
| All  | 100.0 | 100.0  | 100.0 | 100.0 | 100.0  | 100.0 | 100.0 | 100.0  | 100.0 |
| Sample size  | 1195  | 1472   | 2667  | 2668  | 3152   | 5820  | 3863  | 4624   | 8487  |

Information was also sought on the type of occupation of all jobs which people did. The occupational classification of the main job of the currently active population is shown in Table 4.6. The Table shows that large proportions of people, both men and women, are principally engaged in agricultural occupations; in all, there are about 3.7 million employed people in the working age population whose main occupation is in agriculture. Also significant is the high proportion of women (a little over a quarter) engaged in sales or commerce, and a relatively larger proportion of men in occupations in production. About 70 percent of workers in rural areas are involved in agricultural occupations, whereas about a third of workers in urban areas are involved in commerce. A quarter of the urban employees is also involved in production.

Table 4.6 Main occupation of the population aged 15-64 years in the last 7 days, by locality and sex (percent)

|                        |       | Urban  |       |       | Rural  |       |       | Ghana  |       |
|------------------------|-------|--------|-------|-------|--------|-------|-------|--------|-------|
| Main occupation        | Male  | Female | All   | Male  | Female | All   | Male  | Female | All   |
| Professional/Technical | 9.4   | 4.7    | 6.8   | 4.1   | 1.8    | 2.8   | 5.7   | 2.7    | 4.1   |
| Adm./Managerial        | 1.3   | 0.2    | 0.7   | 0.0   | 0.0    | 0.0   | 0.4   | 0.1    | 0.2   |
| Clerical               | 8.2   | 2.6    | 5.1   | 1.7   | 0.5    | 1.0   | 3.7   | 1.2    | 2.3   |
| Sales/Commercial       | 15.0  | 48.2   | 33.4  | 4.6   | 17.6   | 11.6  | 7.8   | 27.3   | 18.5  |
| Service                | 11.3  | 7.3    | 9.1   | 2.9   | 2.5    | 2.7   | 5.5   | 4.0    | 4.7   |
| Agricultural           | 24.8  | 15.9   | 19.9  | 74.3  | 66.5   | 70.1  | 59.0  | 50.3   | 54.3  |
| Production             | 30.0  | 21.1   | 25.1  | 12.5  | 11.2   | 11.8  | 17.9  | 14.4   | 16.0  |
| All                    | 100.0 | 100.0  | 100.0 | 100.0 | 100.0  | 100.0 | 100.0 | 100.0  | 100.0 |
| Sample size            | 1190  | 1479   | 2669  | 2664  | 3154   | 5818  | 3854  | 4633   | 8487  |

Analysis of the working age population by industry also reveals the role of agriculture in the Ghanaian economy especially in rural areas. For the country, as a whole, there are three major sectors, which absorb about 95 percent of the country's work force; the agricultural sector employs a little over half; trading absorbs nearly one-fifth, manufacturing employs one-eighth, the rest (one-tenth) in this group is employed by community or social services set-up. The other five sectors (mining, utilities, construction, transport/communication, and financial services) employ no more than 6 percent of the work force (see Table 4.7).

In urban areas the major employment groups are trading (33% of the labour force), agriculture (21%), manufacturing (18%), and community or social services sector, which also employs about 18 percent of the labour force. These four groups also dominate the rural sector but agriculture alone employs more than two-thirds as observed in Table 4.7.

Table 4.7 Distribution of population aged 15-64 years in the last 7 days, by type of work and sex (percent)

| -                     |      | Urban  |      |      | Rural  |      | (    | Ghana  |      |
|-----------------------|------|--------|------|------|--------|------|------|--------|------|
| Main industry         | Male | Female | All  | Male | Female | All  | Male | Female | All  |
| Agriculture           | 25.7 | 17.1   | 21.0 | 75.1 | 66.9   | 70.7 | 59.8 | 51.1   | 55.0 |
| Mining/Quarrying      | 2.3  | 0.0    | 1.0  | 1.0  | 0.1    | 0.5  | 1.4  | 0.1    | 0.7  |
| Manufacturing         | 13.6 | 20.9   | 17.6 | 6.8  | 10.7   | 8.9  | 8.9  | 13.9   | 11.7 |
| Utilities             | 0.8  | 0.3    | 0.5  | 0.1  | 0.0    | 0.1  | 0.4  | 0.1    | 0.2  |
| Construction          | 4.9  | 0.1    | 2.2  | 1.9  | 0.2    | 1.0  | 2.8  | 0.2    | 1.4  |
| Trading               | 13.5 | 48.6   | 32.8 | 4.6  | 17.5   | 11.6 | 7.4  | 27.4   | 18.3 |
| Transportation/comm.  | 11.2 | 0.2    | 5.1  | 1.7  | 0.1    | 0.8  | 4.6  | 0.1    | 2.2  |
| Financial services    | 4.2  | 0.4    | 2.1  | 0.5  | 0.0    | 0.2  | 1.7  | 0.1    | 0.8  |
| Community/Social ser. | 23.8 | 12.5   | 17.5 | 8.2  | 4.5    | 6.2  | 13.0 | 7.1    | 9.8  |
| All                   | 100  | 100    | 100  | 100  | 100    | 100  | 100  | 100    | 100  |
| Sample size           | 1195 | 1072   | 2667 | 2668 | 3152   | 5820 | 3863 | 4624   | 8487 |

The analysis of educational attainment of workers in the various industrial sectors reveals that about one-tenth of workers have had a secondary school education or a set higher, about a third have middle school leaving certificate (MSLC) or basic school certificate of education. A further fifth of the workers went to school but did not complete the first cycle, while a third of them indicated that they have never been to school.

The educational status of the employed population also varies widely according to the type of main occupation, reflecting largely the differences between urban and rural areas in the level of educational attainment. Over three quarters of those in administration or managerial occupations and about two-thirds of those in professional or technical occupations have gone beyond the MSLC/BECE level, while one-sixth of those in services have also gone beyond this level; in the other occupational groups less than one-eighth have done so.

Table 4.8 Educational levels of the active population, by sex and main occupation

|                        |            | Educational | Attainment |           |       |        |
|------------------------|------------|-------------|------------|-----------|-------|--------|
|                        | Never been | Less than   | MSLC/BECE  | Secondary | Total | Sample |
| Main Occupation        | to school  | MSLC/BECE   |            | or Higher |       | size   |
| Males                  |            |             |            |           |       |        |
| Professional/Technical | 1.8        | 3.2         | 25.9       | 69.1      | 100.0 | 220    |
| Admin. or Managerial   | 0.0        | 6.3         | 12.5       | 81.3      | 100.0 | 16     |
| Clerical               | 0.7        | 3.5         | 41.1       | 54.6      | 100.0 | 141    |
| Sales or Commercial    | 7.7        | 15.7        | 46.0       | 30.7      | 100.0 | 300    |
| Service                | 13.8       | 15.4        | 50.8       | 20.0      | 100.0 | 195    |
| Agricultural           | 29.9       | 24.2        | 39.0       | 6.9       | 100.0 | 2268   |
| Production             | 13.2       | 18.8        | 50.8       | 17.2      | 100.0 | 687    |
| All                    | 21.5       | 20.1        | 41.5       | 16.9      | 100.0 | 3827   |
| <u>Females</u>         |            |             |            |           |       |        |
| Professional/Technical | 0.8        | 1.6         | 36.0       | 61.6      | 100.0 | 125    |
| Admin. or Managerial   | 0.0        | 0.0         | 33.3       | 66.7      | 100.0 | 3      |
| Clerical               | 18.5       | 0.0         | 48.1       | 33.3      | 100.0 | 54     |
| Sales or Commercial    | 31.4       | 26.9        | 36.5       | 5.2       | 100.0 | 1254   |
| Service                | 13.6       | 19.1        | 54.9       | 12.3      | 100.0 | 162    |
| Agricultural           | 55.9       | 25.5        | 17.8       | 0.8       | 100.0 | 2314   |
| Production             | 37.6       | 26.9        | 30.1       | 5.3       | 100.0 | 657    |
| All                    | 43.1       | 24.9        | 26.9       | 5.2       | 100.0 | 4569   |
| Both Sexes             |            |             |            |           |       |        |
| Professional/Technical | 1.4        | 2.6         | 29.6       | 66.4      | 100.0 | 345    |
| Admin. or Managerial   | 0.0        | 5.3         | 15.8       | 78.9      | 100.0 | 19     |
| Clerical               | 5.6        | 2.6         | 43.1       | 48.7      | 100.0 | 195    |
| Sales or Commercial    | 26.8       | 24.7        | 38.4       | 10.1      | 100.0 | 1554   |
| Service                | 13.7       | 17.1        | 52.7       | 16.5      | 100.0 | 357    |
| Agricultural           | 43.0       | 24.8        | 28.3       | 3.8       | 100.0 | 4582   |
| Production             | 25.1       | 22.8        | 40.7       | 11.4      | 100.0 | 1344   |
| All                    | 33.3       | 22.7        | 33.5       | 10.5      | 100.0 | 8396   |

There is a substantial variation in the number of hours worked in the main job (Table 4.9). About 45 percent of those who had a job in the last 7 days worked at least 40 hours per week on their main job, with 8.5 percent spending more than 70 hours a week. More than three-quarters of workers in administration, managerial, clerical and service occupations spent at least 40 hours a week working. A little over half of those in professional/technical, production and sales/commerce occupations also do the same, whereas only a third of those in agriculture spend that much time working (Table 4.9).

Table 4.9 Distribution of hours worked per week by main occupation of active population aged 15 and over (percent)

|                        | Hours worked per week |       |       |       |       |       |       |      |       |             |
|------------------------|-----------------------|-------|-------|-------|-------|-------|-------|------|-------|-------------|
| Main Occasion          | 0-9                   | 10-19 | 20-29 | 30-39 | 40-49 | 50-59 | 60-69 | 70 + | All   | Sample size |
| Professional/Technical | 5.5                   | 2.6   | 11.2  | 28.2  | 39.1  | 5.2   | 4.3   | 4.0  | 100.0 | 348         |
| Admin. or Managerial   | 0.0                   | 5.0   | 0.0   | 5.0   | 70.0  | 5.0   | 5.0   | 10.0 | 100.0 | 20          |
| Clerical               | 6.6                   | 1.5   | 2.0   | 9.1   | 56.1  | 8.6   | 4.5   | 11.6 | 100.0 | 198         |
| Sales or Commercial    | 9.2                   | 9.4   | 11.3  | 12.7  | 17.1  | 9.2   | 12.7  | 18.3 | 100.0 | 1571        |
| Service                | 5.0                   | 3.1   | 5.6   | 9.7   | 20.0  | 11.1  | 11.4  | 34.2 | 100.0 | 360         |
| Agricultural           | 8.1                   | 11.9  | 21.9  | 24.9  | 23.0  | 5.3   | 2.4   | 2.4  | 100.0 | 4620        |
| Production             | 12.4                  | 8.0   | 10.6  | 13.4  | 25.7  | 9.7   | 8.8   | 11.6 | 100.0 | 1355        |
| All                    | 8.7                   | 9.8   | 16.5  | 19.8  | 23.6  | 7.1   | 5.8   | 8.5  | 100.0 | 8472        |

Hours of work also vary substantially, depending on the sector of the economy in which the person is employed (Table 4.10). More than three-quarters of people in three sectors; transport/communication, mining/quarrying and the financial services work at least 40 hours a week. In contrast, two-thirds of employees in the agricultural sector and about half in manufacturing work less than 40 hours a week on average.

Table 4.10 Distribution of hours worked per week, by industry of active population aged 15 years and over (percent)

|                       | _    |       | Hou   | rs worke | d per we | eek   |       |      |       |                |
|-----------------------|------|-------|-------|----------|----------|-------|-------|------|-------|----------------|
| Main industry         | 0-9  | 10-19 | 20-29 | 30-39    | 40-49    | 50-59 | 60-69 | 70 + | All   | Sample<br>size |
| Agriculture           | 8.0  | 12.0  | 21.8  | 24.8     | 23.0     | 5.4   | 2.5   | 2.6  | 100.0 | 4686           |
| Mining/Quarrying      | 8.9  | 1.8   | 3.6   | 1.8      | 58.9     | 8.9   | 8.9   | 7.1  | 100.0 | 56             |
| Manufacturing         | 13.6 | 9.7   | 11.4  | 14.7     | 24.0     | 8.0   | 8.7   | 9.8  | 100.0 | 990            |
| Utilities             | 5.6  | 5.6   | 5.6   | 11.1     | 38.9     | 11.1  | 0.0   | 22.2 | 100.0 | 18             |
| Construction          | 11.1 | 6.8   | 12.0  | 12.0     | 35.0     | 12.0  | 5.1   | 6.0  | 100.0 | 117            |
| Trading               | 9.4  | 8.7   | 11.3  | 12.9     | 17.2     | 9.5   | 12.4  | 18.6 | 100.0 | 1555           |
| Transportation/comm.  | 3.3  | 1.1   | 2.2   | 4.3      | 29.9     | 12.5  | 10.9  | 35.9 | 100.0 | 184            |
| Financial services    | 7.2  | 1.4   | 1.4   | 7.2      | 47.8     | 14.5  | 5.8   | 14.5 | 100.0 | 69             |
| Community/Social ser. | 6.0  | 3.1   | 83    | 18.1     | 33.2     | 8.2   | 8.2   | 14.9 | 100.0 | 797            |
| All                   | 8.7  | 9.8   | 16.5  | 19.8     | 23.6     | 7.1   | 5.8   | 8.5  | 100.0 | 8472           |

Respondents were asked whether they received payment for the work they did. Among those who did receive payment, the average hourly wage was  $$^{\circ}918$$  ( $$^{\circ}1,084$$  for men and  $$^{\circ}756$$  for women). In terms of classification by industry (Tables 4.11), the average basic wage ranged from  $$^{\circ}381$$  an hour for women working in the agricultural sector up to about  $$^{\circ}2,554$$  for men engaged in trading. The figure for women in agriculture corresponds to a wage of  $$^{\circ}3,048$$  for an 8-hour working day as compared to an 8-hour daily wage of  $$^{\circ}20,432$$  for men in trading. The national minimum daily wage at the time of the survey was  $$^{\circ}2,900$$ .

Table 4.11 Average basic hourly earnings in main job, by sex and industry, and by sex and main occupation of active population aged 15+ (cedis)

|                       | Male | Female | All  |                        | Male | Female | All  |
|-----------------------|------|--------|------|------------------------|------|--------|------|
| Main Industry         |      |        |      | Main Occupation        |      |        |      |
| Agriculture           | 598  | 381    | 512  | Professional/Technical | 1390 | 1249   | 1339 |
| Mining/Quarrying      | 1505 | 832    | 1484 | Admin. or Managerial   | 2599 | 3452   | 2694 |
| Manufacturing         | 1787 | 801    | 1156 | Clerical               | 3485 | 1223   | 2859 |
| Utilities             | 1199 | 600    | 1105 | Sales or Commercial    | 2802 | 1093   | 1427 |
| Construction          | 1062 | 512    | 1019 | Service                | 936  | 644    | 805  |
| Trading               | 2554 | 1123   | 1411 | Agricultural           | 616  | 383    | 519  |
| Transportation/comm.  | 1196 | 920    | 1187 | Production             | 1009 | 761    | 889  |
| Financial services    | 1478 | 1257   | 1454 |                        |      |        |      |
| Community/Social ser. | 1126 | 896    | 1035 |                        |      |        |      |
| All                   | 1070 | 785    | 928  | All                    | 1084 | 756    | 918  |

Detailed information was also collected on working conditions in respect of employees working in public or private organisations. It is observed that contrary to normal practice, 52 percent of all employees did not enter into any formal contract of employment with their employers before starting work. Moreover, 58 percent of workers are in organisations where trade unions do not exist. These figures are much higher for workers in commerce, agriculture and industrial production. The proportion of workers who have their taxes deducted at source to facilitate collection of income taxes constitute about 58 percent of all the workers. Income tax collection would be relatively easier in occupations like professional or technical, administration or managerial and clerical because over 80 percent of employees in those occupations have such taxes deducted at source from their salaries or wages.

Some workers enjoy certain benefits as part of their job; for instance, six out of ten employees are entitled to paid holidays, and a similar proportion get paid sick leave. Five out of ten enjoy free or subsidised medical care. In contrast, the situation is not very encouraging in respect of the provision of accommodation and transport; only 11 percent of workers either have free accommodation or pay subsidised rent, while only 9 percent are entitled to free or subsidised transport to and from work. About a quarter also receive bonuses, commission and tips from their work. The three occupational groups, professional or technical, administration or managerial and clerical are the only groups of workers, which have many people who benefit from retirement pension and social security benefits. More than 60 percent of workers in the other groups do not have such benefits.

# 4.4 Unemployment and underemployment

The unemployment rate is defined as the proportion of the economically active population who are not working but are available for work. For the country as a whole, the adult unemployment rate is 8.2 percent. It is lower for males (7.5%) than for females (8.7%). In most rural areas, as suggested by the data in Table 4.12, unemployment rates are very low, and there is very little difference among the ecological zones. In contrast, the rates in urban areas are much higher. For instance, for the age group 15-24 years, the survey recorded unemployment rates close to 30 percent in Accra and rates in excess of 20 percent for both males and females in other urban areas.

Table 4.12 also shows that the unemployment situation is a youthful phenomenon. The unemployment rate in the younger age group (15-24) is more than twice that of the 25-44 age group and more than three times that of the older age group, 45-64.

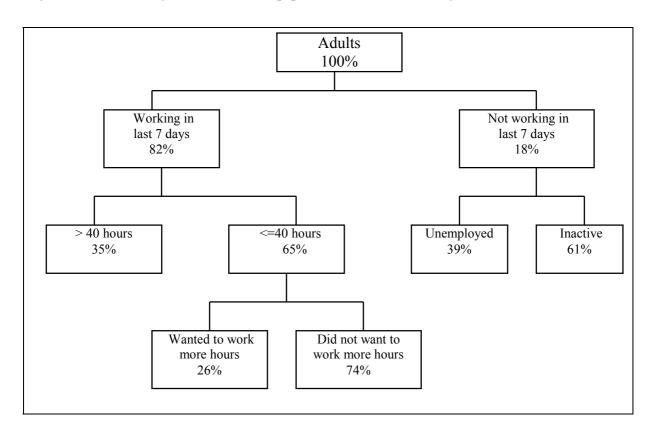
Table 4.12 Unemployment rates, by sex, age and locality of population aged 15-64 years

|                |       | Urban |      | Rural | Ghana |
|----------------|-------|-------|------|-------|-------|
|                | Accra | Other | All  |       |       |
| Males          |       |       |      |       |       |
| 15-24          | 29.4  | 23.6  | 25.3 | 8.1   | 12.7  |
| 25-44          | 16.5  | 13.3  | 14.4 | 3.2   | 7.3   |
| 45-64          | 8.9   | 6.3   | 7.0  | 3.8   | 4.8   |
| All            | 16.4  | 12.7  | 13.9 | 4.3   | 7.5   |
| <u>Females</u> |       |       |      |       |       |
| 15-24          | 31.7  | 23.3  | 25.9 | 14.8  | 18.7  |
| 25-44          | 14.8  | 10.4  | 11.7 | 5.2   | 7.5   |
| 45-64          | 8.7   | 5.9   | 6.6  | 3.5   | 4.5   |
| All            | 16.8  | 11.5  | 13.0 | 6.4   | 8.7   |
| Both sexes     |       |       |      |       |       |
| 15-24          | 30.8  | 23.5  | 25.6 | 11.5  | 15.9  |
| 25-44          | 15.7  | 11.7  | 12.9 | 4.3   | 7.4   |
| 45-64          | 8.8   | 6.1   | 6.8  | 3.6   | 4.7   |
| All            | 16.6  | 12.0  | 13.4 | 5.5   | 8.2   |

Unemployment is only one aspect of the underutilisation of human resources. We also need to take account of underemployment, that is, the extent to which people may be employed but not as fully as may be desirable. Some indication of the probable levels of underemployment can be gained by looking at the responses of those currently working, to a question about whether they wanted to work more hours during the last seven days. This question was only asked of people who said they worked 40 hours or less in their main job in the last week, it being assumed that people who worked over 40 hours could not reasonably be described as being under-employed in terms of hours worked. Figure 4.1 shows the breakdown of the adult population into the different categories of activity.

Out of every 100 adults, 82 reported that they had done some work in the last seven days, leaving 18 who had not worked. For those who were not working, 39 percent of them were currently unemployed and 61 percent were inactive. For those who were working, 35 percent of them worked more than 40 hours in their main job, while the remaining 65 work 40 hours or less. Among those who work less than 40 hours a week, 26 percent reported that they would like to do more work. In terms of those in the economically active adult population, these figures imply an unemployment rate of 7.9 percent, with an additional 15.7 percent reporting that they were under-employed in terms of hours worked.

Figure 4.1: Activity status of the adult population in the last seven days



Unemployment is an urban phenomenon; 13.2 percent of currently active urban adults were unemployed, whereas only about 4.8 percent of adults in rural areas reported that they were currently unemployed. Underemployment, on the other hand, seems to affect people in both urban and rural areas, but it appears to be more pronounced in rural areas where about 15 percent of the adult population is under-employed (Table 4.13). The results of the survey suggest that males and females have almost identical rates of unemployment and under-employment. The only apparent exception is found in rural areas.

Table 4.13 Activity status of the adult population in the last seven days, by sex and locality

|                                |      | Urban  |      |      | Rural  |      |      | Ghana  |       |
|--------------------------------|------|--------|------|------|--------|------|------|--------|-------|
| Activity in the last 7 days    | Male | Female | All  | Male | Female | All  | Male | Female | All   |
| ¥¥/                            | 79.6 | 77.4   | 78.4 | 86.0 | 82.3   | 83.9 | 84.0 | 80.6   | 82.1  |
| Working                        |      |        |      |      |        |      |      |        | ~     |
| More than 40 hours in main job | 44.4 | 39.2   | 41.5 | 30.9 | 16.0   | 22.7 | 35.2 | 23.6   | 28.8  |
| 40 hours or less in main job   |      |        |      |      |        |      |      |        |       |
| want to more hours             | 10.9 | 11.6   | 11.3 | 15.7 | 14.8   | 15.2 | 14.2 | 13.7   | 13.9  |
| do not want more work          | 24.3 | 26.6   | 25.6 | 39.4 | 51.5   | 46.0 | 34.6 | 43.3   | 39.4  |
|                                |      |        |      |      |        |      |      |        |       |
| Not working                    | 20.4 | 22.6   | 21.6 | 14.0 | 17.8   | 16.1 | 16.1 | 19.4   | 17.8  |
| Unemployed                     | 13.2 | 10.9   | 11.9 | 4.4  | 4.2    | 4.3  | 7.2  | 6.4    | 6.7   |
| Inactive                       | 7.2  | 11.7   | 9.7  | 9.6  | 13.6   | 11.8 | 8.9  | 13.0   | 11.1  |
|                                |      |        |      |      |        |      |      |        |       |
| All                            | 100  | 100    | 100  | 100  | 100    | 100  | 100  | 100    | 100   |
|                                |      |        |      |      |        |      |      |        |       |
| Sample size                    | 1601 | 2033   | 3634 | 3420 | 4150   | 7570 | 5021 | 6183   | 11204 |

# 4.5 Housekeeping activities

Apart from time-use information on economic activities, the survey collected detailed time-use information on a variety of housekeeping activities. Daily expense of time on fetching water, child care, sweeping, garbage disposal and cooking have been reported on all persons aged 7 years and over (Table 4.14). For each of these activities, people were asked whether they had spent any time on the activity in the last seven days, and if so, how many hours were involved. At the analysis stage, these weekly figures were converted to give daily estimates.

Table 4.14 Average time spent on various housekeeping activities by population aged 7+, by sex and locality (percent)

|                       |         |                   | Average time spe | ent (minutes per da | ay)   |
|-----------------------|---------|-------------------|------------------|---------------------|-------|
|                       |         | Proportion doing  | <u> </u>         | •                   | -     |
| Activity              | Sex     | that activity (%) | Urban            | Rural               | Ghana |
| Collecting wood       | Males   | 16.0              | 51               | 28                  | 30    |
| con <b>co</b> me week | Females | 34.6              | 44               | 37                  | 37    |
|                       | All     | 25.6              | 47               | 34                  | 35    |
| Fetching water        | Males   | 37.7              | 31               | 34                  | 33    |
| C                     | Females | 60.2              | 33               | 44                  | 41    |
|                       | All     | 49.1              | 32               | 40                  | 38    |
| Child care            | Males   | 12.5              | 128              | 102                 | 108   |
|                       | Females | 41.3              | 200              | 205                 | 204   |
|                       | All     | 27.6              | 185              | 182                 | 183   |
| Sweeping              | Males   | 24.9              | 14               | 14                  | 14    |
| 1 &                   | Females | 71.0              | 19               | 21                  | 20    |
|                       | All     | 48.9              | 17               | 19                  | 19    |
| Garbage disposal      | Males   | 18.4              | 13               | 11                  | 11    |
| <b>C</b> 1            | Females | 47.6              | 12               | 11                  | 11    |
|                       | All     | 33.6              | 12               | 11                  | 11    |
| Cooking               | Males   | 12.3              | 46               | 59                  | 55    |
| Č                     | Females | 64.7              | 87               | 118                 | 107   |
|                       | All     | 39.7              | 81               | 109                 | 99    |

Although these activities are part of everyday life, they usually take more of an individual's time and often at higher opportunity cost than is realised. Table 4.14 also provides some basic information on each housekeeping activity, separately for each sex; the proportion of males and females engaged in each activity, the average length of time they spend each day on the activity.

A breakdown of household activities shows that, on average, each person spends 35 minutes a day collecting wood, 38 minutes a day fetching water, 19 minutes sweeping, 11 minutes disposing garbage and about 3 hours taking care of children.

An examination of the individual activities reveals that over a quarter of the population is engaged in wood collection (and 4 percent spend at least an hour a day fetching wood). Collecting wood is done by a third (34.6%) of females of all ages, whereas less than a fifth of males do this activity (among males, more of the younger ones, 7-14 years of age, collect wood than the older ones). With the exception of Accra, wood fetching is common in all parts of the country, but more time is spent on it in the savannah and other urban areas of the country than the rural areas in the coastal and forest ecological zones (Table 4.15).

In the case of water, 49 percent of the population obtain their water without any loss of time and about 38 percent spend an average of less than an hour a day fetching water; this still leaves 12 percent who have to spend an average of at least an hour every day fetching water. As one would expect, since some urban dwellers have access to pipe-borne water or other convenient sources of water, rural dwellers spend more time fetching water (48 minutes on average per day) than their urban counterparts (37 minutes).

The time spent on fetching water in the rural savannah is almost double the average for other rural areas and some urban communities.

Table 4.15 Average time spent per day on various housekeeping activities by population aged 7+, by sex and locality (minutes per day)

|                  |         |       | Ave   | rage time spent (mir | nutes) |          |  |
|------------------|---------|-------|-------|----------------------|--------|----------|--|
|                  |         | Urban |       |                      | Rural  |          |  |
| Activity         | Sex     | Accra | Other | Coastal              | Forest | Savannah |  |
| Fetching wood    | Males   | 9     | 51    | 21                   | 28     | 33       |  |
| 8                | Females | 5     | 45    | 30                   | 33     | 46       |  |
|                  | All     | 6     | 47    | 27                   | 32     | 43       |  |
| Fetching water   | Males   | 22    | 34    | 26                   | 24     | 44       |  |
| C                | Females | 27    | 35    | 32                   | 40     | 58       |  |
|                  | All     | 25    | 35    | 30                   | 38     | 54       |  |
| Child care       | Males   | 170   | 95    | 146                  | 101    | 84       |  |
|                  | Females | 251   | 182   | 215                  | 243    | 144      |  |
|                  | All     | 230   | 167   | 203                  | 209    | 129      |  |
| Sweeping         | Males   | 11    | 14    | 10                   | 16     | 16       |  |
|                  | Females | 15    | 20    | 14                   | 22     | 23       |  |
|                  | All     | 14    | 19    | 13                   | 21     | 22       |  |
| Garbage disposal | Males   | 15    | 12    | 7                    | 12     | 12       |  |
|                  | Females | 12    | 12    | 8                    | 12     | 10       |  |
|                  | All     | 13    | 12    | 8                    | 12     | 11       |  |
| Cooking          | Males   | 38    | 48    | 56                   | 55     | 78       |  |
|                  | Females | 73    | 92    | 99                   | 106    | 152      |  |
|                  | All     | 69    | 85    | 93                   | 97     | 145      |  |

As with fetching wood and fetching water, the burden of other household chores falls mainly on females. The differences in the proportion of males and females involved in the other activities are more varied than fetching of wood and water. These differences are more pronounced with sweeping and cooking, where two-thirds of women are involved but not more than a quarter of men are involved. Contrasting the urban responses and rural responses indicates that more time is spent on housekeeping in rural areas than urban areas in almost all

the activities except garbage disposal and wood fetching in Accra (see Appendix Tables A4.5, A4.7, A4.9, A4.11, A4.13, and A4.15 for details on comparison across regions). The contribution of children to housekeeping activities is depicted in Table 4.16, which shows the total amount of time devoted to each housekeeping activity by people of different ages.

Table 4.16 Average time spent per day on housekeeping activities, by age and sex (minutes)

|                  |         |      |       |       | Age group | )     |      |     |
|------------------|---------|------|-------|-------|-----------|-------|------|-----|
| Activity         | Sex     | 7-14 | 15-19 | 20-24 | 25-44     | 45-59 | 60 + | All |
| Fetching wood    | Males   | 29   | 33    | 33    | 27        | 35    | 27   | 30  |
| r ciching wood   | Females | 30   | 34    | 36    | 41        | 43    | 36   | 37  |
|                  | All     | 29   | 33    | 35    | 38        | 42    | 34   | 35  |
| Fetching water   | Males   | 38   | 38    | 26    | 22        | 23    | 15   | 33  |
| S                | Females | 41   | 42    | 41    | 41        | 42    | 28   | 41  |
|                  | All     | 39   | 39    | 36    | 37        | 38    | 25   | 38  |
| Child care       | Males   | 93   | 85    | 103   | 117       | 103   | 117  | 108 |
|                  | Females | 84   | 162   | 257   | 228       | 169   | 174  | 204 |
|                  | All     | 87   | 144   | 240   | 206       | 150   | 160  | 183 |
| Sweeping         | Males   | 16   | 16    | 12    | 12        | 13    | 10   | 14  |
| 1 0              | Females | 19   | 22    | 22    | 21        | 19    | 18   | 20  |
|                  | All     | 18   | 18    | 20    | 19        | 18    | 16   | 19  |
| Garbage disposal | Males   | 13   | 11    | 10    | 6         | 8     | 7    | 11  |
| C I              | Females | 12   | 11    | 10    | 11        | 9     | 9    | 11  |
|                  | All     | 12   | 11    | 11    | 11        | 9     | 9    | 11  |
| Cooking          | Males   | 53   | 44    | 46    | 58        | 64    | 61   | 55  |
| Č                | Females | 69   | 85    | 107   | 120       | 116   | 91   | 107 |
|                  | All     | 67   | 78    | 98    | 111       | 109   | 90   | 99  |

The contribution of young children is quite substantial but the average time spent on the activities by older age groups, especially for people aged between 20-59, is greater than that of the younger groups. The only exception is the time spent on water fetching and garbage disposal, which are traditionally reserved for the young. Another notable observation in Table 4.16 is the fact that boys and girls do spend almost equal time in most of the activities apart from cooking, where the difference is quite substantial.

#### 5 MIGRATION

#### 5.1 Introduction

The purpose of this section is to provide data on migration to create some awareness that would generate further discussions and research into the complex field of population relocation. The section is limited to persons aged 15 years and over. The questions elicited information about place of birth, place of previous residence, and reasons for migrating. Respondents who were born outside their current place of residence are classified as in-migrants. Persons born at their current place of residence but who had moved out and lived outside their localities for a year or more are referred to as return migrants, while those born at their current place of residence who have never stayed away for a year or more are classified as non-migrants. For purposes of this report, return and in-migrants are often combined and referred to as migrants.

# 5.2 Migration patterns

Out of the total adult population in Ghana, about 52 percent are migrants (Table 5.1). Across localities, the proportion of migrants in rural forest is slightly larger (60%) than in other urban and rural localities with the rates for males and females being almost identical.

Table 5.1 Extent of migration by present locality and sex (percent)

|        | Locality |             |               |              |                |       |  |  |  |
|--------|----------|-------------|---------------|--------------|----------------|-------|--|--|--|
| Sex    | Accra    | Other urban | Rural coastal | Rural forest | Rural Savannah | Ghana |  |  |  |
| Male   | 46.6     | 49.4        | 46.6          | 60.9         | 45.3           | 51.4  |  |  |  |
| Female | 42.9     | 51.8        | 48.3          | 60.6         | 46.8           | 52.2  |  |  |  |
| All    | 44.7     | 50.7        | 47.6          | 60.8         | 46.1           | 51.8  |  |  |  |

Overall, 36 percent are in-migrants and 16 percent are return migrants (Table 5.2). In regional terms, Table 5.2 reveals that about four in every ten of the population of Greater Accra, Volta and Western Regions, are in-migrants. In contrast, in the north of the country the level of in-migration is fairly low, particularly in the Upper East Region where just about 10% of the population are in-migrants. When one looks at the overall level of migration, the contrast between regions in the south and north of the country becomes very clear. In the Upper West Region, for instance, less than a third of the population are migrants, and about a third in Northern Region are migrants, whereas in each of the other regions at least half the population are migrants.

Table 5.2: Migration status by region (percent)

| Region        | In migrants | Return migrants | Non migrants | Total | Sample size |
|---------------|-------------|-----------------|--------------|-------|-------------|
|               |             |                 |              |       |             |
| Western       | 40.0        | 10.1            | 49.9         | 100.0 | 1591        |
| Central       | 35.1        | 22.1            | 42.8         | 100.0 | 1231        |
| Greater Accra | 42.5        | 6.2             | 51.3         | 100.0 | 1905        |
| Eastern       | 34.7        | 17.1            | 48.2         | 100.0 | 1699        |
| Volta         | 42.7        | 14.3            | 43.0         | 100.0 | 1829        |
| Ashanti       | 37.4        | 19.2            | 43.4         | 100.0 | 2457        |
| Brong Ahafo   | 35.1        | 17.7            | 47.2         | 100.0 | 1224        |
| Northern      | 24.1        | 11.6            | 64.3         | 100.0 | 1393        |
| Upper West    | 19.2        | 9.1             | 71.7         | 100.0 | 486         |
| Upper East    | 10.4        | 35.7            | 53.8         | 100.0 | 623         |
| All           | 35.7        | 15.7            | 48.6         | 100.0 | 14436       |

Tables 5.3 and 5.4 show the analysis of migration flows in the country. The results indicate that two-thirds (67%) of all migrants stay in rural areas, less than a tenth (7.8%) stay in Accra and the rest (about a quarter) stay in other urban areas. In terms of their previous place of residence, the majority (about 60%) of them had moved from an urban area, meaning that about 4 in every 10 individuals migrate from rural areas (Table 5.3).

Table 5.3: Migration flows by previous residence and current residence (percent)

|                                | Locality of current residence |             |       |       |  |  |
|--------------------------------|-------------------------------|-------------|-------|-------|--|--|
| Locality of previous residence | Accra                         | Other urban | Rural | Total |  |  |
| Accra                          | 0.2                           | 2.9         | 6.2   | 9.3   |  |  |
| Other urban                    | 5.7                           | 14.5        | 29.3  | 49.3  |  |  |
| Rural                          | 1.9                           | 8.0         | 31.5  | 41.4  |  |  |
| Total                          | 7.8                           | 25.2        | 67.0  | 100.0 |  |  |

Note: Total sample size=6,900

The overview of the flows does not suggest any large drift of population from rural to urban areas. Table 5.3 suggests that about a third of all migration flows (about 32%) involve rural-rural migration, and another third (35%) involve urban-rural migration. Almost a quarter (23%) involve inter-urban migration flows, leaving only a tenth of all migration moves (10%) as being from rural to urban areas.

Almost three quarters of migrants in Accra had moved from other urban areas, a quarter moved from rural areas and the rest (about 3%) represents return migrants. Consideration of the flows to other urban areas shows a similar trend but the flow of migrants to rural areas has a bigger share of rural to rural movement (Table 5.4).

Table 5.4: Current residence of migrants by previous residence

|                                | Locality of current residence |             |       |       |  |  |
|--------------------------------|-------------------------------|-------------|-------|-------|--|--|
| Locality of previous residence | Accra                         | Other urban | Rural | Total |  |  |
| Accra                          | 2.8                           | 11.4        | 9.3   | 9.3   |  |  |
| Other urban                    | 73.1                          | 56.8        | 43.8  | 49.3  |  |  |
| Rural                          | 24.1                          | 31.8        | 47.0  | 41.4  |  |  |
| Total                          | 100.0                         | 100.0       | 100.0 | 100.0 |  |  |
| Sample size                    | 601                           | 3518        | 2866  | 6985  |  |  |

# 5.3 Reasons for moving

Analysis of the reasons for people moving from one place to another suggests that it is domestic considerations, rather than employment needs, which have the greatest influence on migration flows. Table 5.5 shows that almost 60 percent of all migrants cited marriage (14%) and other family reasons such as disputes and famine (45%) as the basis for migrating. Over a quarter said they had moved for work-related reasons, involving their own (21%) or their spouse's (7%) employment.

Table 5.5 Distribution of migrants by current locality and reason for most recent migration (percent)

|                      | Locality |             |               |              |                |       |  |  |
|----------------------|----------|-------------|---------------|--------------|----------------|-------|--|--|
| Reason               | Accra    | Other urban | Rural coastal | Rural forest | Rural Savannah | Ghana |  |  |
| Own employment       | 30.4     | 23.9        | 16.9          | 22.3         | 12.5           | 21.1  |  |  |
| Spouse employment    | 7.4      | 6.9         | 5.2           | 6.1          | 7.8            | 6.5   |  |  |
| Marriage             | 8.3      | 12.7        | 10.8          | 15.3         | 20.1           | 14.2  |  |  |
| Other family reasons | 43.3     | 41.1        | 48.9          | 44.9         | 50.6           | 45.2  |  |  |
| School               | 5.2      | 4.6         | 1.7           | 1.3          | 1.6            | 2.6   |  |  |
| Drought or war       | 0.3      | 0.6         | 2.6           | 1.0          | 1.2            | 1.1   |  |  |
| Other                | 5.0      | 10.3        | 13.9          | 9.1          | 6.1            | 9.3   |  |  |
| All                  | 100.0    | 100.0       | 100.0         | 100.0        | 100.0          | 100.0 |  |  |
| Sample size          | 644      | 1895        | 966           | 2667         | 1306           | 7477  |  |  |

#### 6 HOUSING

# 6.1 Type of dwelling

The data collected on housing in the survey included information on the type of dwelling and the main materials used in the construction of the roof, walls and floor, as well as details of present occupancy status, housing expenditure and the type of facilities available to the household members. The head of household or any other person in charge provided the information.

The results of the survey show that about 16 in every 100 households live in single-family houses or apartments (Table 6.1). Nearly three-quarters (72%) of all households live in rooms in compound houses and in other types of rooms. Households who live in single-family houses and in huts or buildings on the same compound are more common in rural forest than other areas. While there is just a little over one-tenth of households in urban areas who live in single family houses, apartments or flats, about a quarter of households in rural forest live in single family houses.

Apartments are typical of urban areas and so living in apartments or flats is an urban phenomenon. Female-headed households are less likely than male-headed ones to be occupying single family houses or huts/buildings, but more likely to be occupying rooms in compound houses.

| Table 6.1 | Distribution of households by type of dwelling and l | locality ( | percent) |
|-----------|--|------------|----------|
|           |  |            | P        |

| •                         | Uı    | rban Areas |       |         | Rural  | Areas    |       |       |
|---------------------------|-------|------------|-------|---------|--------|----------|-------|-------|
| _                         | Accra | Other      | All   | Rural   | Rural  | Rural    | All   | Ghana |
| Type of dwelling          |       | urban      |       | coastal | forest | Savannah |       |       |
|                           |       |            |       |         |        |          |       |       |
| One family house          | 5.6   | 7.7        | 7.1   | 18.4    | 15.1   | 24.0     | 18.1  | 14.1  |
| Apartment/flat            | 5.5   | 4.2        | 4.6   | 1.8     | 1.0    | 0.1      | 0.9   | 2.3   |
| Room(s)                   |       |            |       |         |        |          |       |       |
| (compound house)          | 76.8  | 65.3       | 68.5  | 38.5    | 52.0   | 35.7     | 44.7  | 53.4  |
| Room(s) (others)          | 10.5  | 19.9       | 17.3  | 29.8    | 22.5   | 4.2      | 19.6  | 18.7  |
| Huts/Buildings            |       |            |       |         |        |          |       |       |
| (same compound)           | 1.5   | 2.2        | 2.0   | 10.9    | 9.3    | 33.1     | 15.7  | 10.7  |
| Huts/Buildings (different | -     | 0.3        | 0.2   | 0.7     | 0.3    | 2.8      | 1.0   | 0.7   |
| compound)                 |       |            |       |         |        |          |       |       |
| Other                     | 0.2   | 0.3        | 0.3   | -       | -      | 0.1      | 0.0   | 0.1   |
|                           |       |            |       |         |        |          |       |       |
| All                       | 100.0 | 100.0      | 100.0 | 100.0   | 100.0  | 100.0    | 100.0 | 100.0 |
| Sample size               | 620   | 1579       | 2199  | 899     | 1940   | 960      | 3799  | 5998  |

The present occupancy status of households is shown in Table 6.2. Nearly four in every ten households (38%) live in rent-free housing. A little over 40 percent also own the houses they live in. Owning a home is a common feature in rural areas, particularly in rural savannah where more than 60 percent own their houses. In urban areas home ownership is not common; only one quarter of urban dwellers (about 25% of Accra households and 24% of other urban households) own their houses. Renting a home is rare in rural areas, but it is a common occurrence in urban areas. Perching is very uncommon in Ghana; less than one percent of households are perching in other people's homes.

Table 6.2 Distribution of households by present occupancy status and locality (percent)

|                  | U     | rban Areas |       |         | Rural A | Areas    |       |       |
|------------------|-------|------------|-------|---------|---------|----------|-------|-------|
|                  | Accra | Other      | All   | Rural   | Rural   | Rural    | All   | Ghana |
| Occupancy Status |       | urban      |       | coastal | forest  | Savannah |       |       |
|                  |       |            |       |         |         |          |       |       |
| Owning           | 24.7  | 24.1       | 24.3  | 47.5    | 47.8    | 64.9     | 52.0  | 41.9  |
| Renting          | 34.5  | 36.7       | 36.1  | 12.7    | 13.4    | 2.7      | 10.5  | 19.9  |
| Rent free        | 39.5  | 38.6       | 38.8  | 39.6    | 38.5    | 32.4     | 37.2  | 37.8  |
| Perching         | 1.3   | 0.6        | 0.8   | 0.2     | 0.4     | -        | 0.2   | 0.5   |
| All              | 100.0 | 100.0      | 100.0 | 100.0   | 100.0   | 100.0    | 100.0 | 100.0 |
| Sample size      | 620   | 1579       | 2199  | 899     | 1940    | 960      | 3799  | 5998  |

The rental sector (constituting households which rent accommodation or live rent-free) is of particular interest. More than half (54%) of those renting households have their accommodation provided by a relative, while a third rent their accommodation from a private individual or agency (Table 6.3). Government provides accommodation to about 4 percent of households on rental basis while private employers provide about 2 percent. Households in rural areas are much more likely than those in urban areas to be living in dwellings provided by relatives. In urban areas the share of households renting relatives' houses as against those of private individuals or estate agencies is just about equal. In all the localities, it was observed that female-headed households are as equally likely as their male counterparts to get rented accommodation from all the various providers.

Table 6.3 Distribution of households in different localities, by housing provider (percent)

|                               |             |       |       | Househol | ds     |          |       |       |
|-------------------------------|-------------|-------|-------|----------|--------|----------|-------|-------|
|                               | Urban Areas |       |       |          | Rural  | Areas    |       |       |
| Housing provider              | Accra       | Other | All   | Rural    | Rural  | Rural    | All   | Ghana |
|                               |             | urban |       | Coastal  | Forest | Savannah |       |       |
| Relative                      | 48.8        | 44.9  | 46.0  | 63.6     | 60.6   | 59.9     | 61.3  | 54.0  |
| Private employer              | 4.8         | 1.2   | 2.2   | 0.9      | 2.9    | 0.9      | 2.0   | 2.1   |
| Government                    | 4.8         | 5.7   | 5.5   | 5.7      | 2.1    | 0.9      | 2.8   | 4.1   |
| Provider individual or agency | 41.6        | 44.3  | 43.5  | 22.1     | 29.0   | 9.2      | 23.6  | 33.1  |
| Other                         | -           | 3.9   | 2.8   | 7.7      | 5.4    | 29.1     | 10.4  | 6.8   |
| All                           | 100.0       | 100.0 | 100.0 | 100.0    | 100.0  | 100.0    | 100.0 | 100.0 |
| Sample size                   | 459         | 1189  | 470   | 1006     | 337    | 1647     | 1813  | 3460  |

# 6.2 Household size and housing density

Respondents were asked about the number of sleeping rooms their households occupy excluding bathrooms, toilets and kitchens. About 57 percent of all households used only one room (Table 6.4). The distribution of households by number of rooms is similar in Accra and in all other urban areas taken together. In rural areas, however, there is a marked contrast between localities. In both the coastal and forest areas, over 60 percent of rural households occupy just one room, whereas in the rural savannah only a third of all households occupy single rooms.

Table 6.4 Distribution of households in different localities, by number of rooms occupied (percent)

|                       |       | Urban |       | Rural   |        |          |       |       |
|-----------------------|-------|-------|-------|---------|--------|----------|-------|-------|
| No. of rooms occupied | Accra | Other | All   | Coastal | Forest | Savannah | All   | Ghana |
| 1                     | 66.5  | 62.0  | 63.3  | 60.8    | 60.5   | 31.0     | 53.1  | 56.8  |
| 2                     | 26.6  | 25.2  | 25.6  | 25.8    | 26.3   | 32.7     | 27.8  | 27.0  |
| 3                     | 3.1   | 7.5   | 6.2   | 8.0     | 7.9    | 22.1     | 11.5  | 9.6   |
| 4                     | 2.3   | 2.3   | 2.3   | 1.8     | 3.3    | 8.0      | 4.1   | 3.5   |
| 5+                    | 1.6   | 3.0   | 2.6   | 3.6     | 2.0    | 6.1      | 3.4   | 3.1   |
| Total                 | 100.0 | 100.0 | 100.0 | 100.0   | 100.0  | 100.0    | 100.0 | 100.0 |
| Sample size           | 620   | 1579  | 2199  | 899     | 1940   | 960      | 3799  | 5998  |

To a large extent the variations in rooms occupied are likely to be closely linked to household size. Table 6.5 shows the distribution of households in different localities according to the number of persons in the household. The proportion of single person households varies from 27 percent in Accra to only 10 percent in rural savannah. At the other extreme, only about 5 percent of households in Accra have as many as eight members, compared with 16 percent in rural savannah.

Table 6.5 Distribution of households by household size, and locality (percent)

|                |       | Urban |       |         | Rura   | ıl       |       |       |
|----------------|-------|-------|-------|---------|--------|----------|-------|-------|
| Household size | Accra | Other | All   | Coastal | Forest | Savannah | All   | Ghana |
| 1              | 26.5  | 19.9  | 21.7  | 17.4    | 13.7   | 9.5      | 13.5  | 16.5  |
| 2              | 11.1  | 11.9  | 11.7  | 13.1    | 10.8   | 7.9      | 10.6  | 11.0  |
| 3              | 19.7  | 13.0  | 14.9  | 16.0    | 13.1   | 13.4     | 13.9  | 14.3  |
| 4              | 14.5  | 14.6  | 14.6  | 14.9    | 15.9   | 15.8     | 15.7  | 15.3  |
| 5              | 11.5  | 13.2  | 12.7  | 12.9    | 14.2   | 16.1     | 14.4  | 13.8  |
| 6              | 7.6   | 11.5  | 10.4  | 9.6     | 12.1   | 12.9     | 11.7  | 11.2  |
| 7              | 4.7   | 7.0   | 6.4   | 7.0     | 8.7    | 8.5      | 8.3   | 7.6   |
| 8              | 2.3   | 4.4   | 3.8   | 4.0     | 5.6    | 5.0      | 5.1   | 4.6   |
| 9              | 0.8   | 2.0   | 1.6   | 2.3     | 2.4    | 4.3      | 2.9   | 2.4   |
| 10+            | 1.5   | 2.5   | 2.2   | 2.8     | 3.4    | 6.5      | 4.0   | 3.4   |
| Total          | 100.0 | 100.0 | 100.0 | 100.0   | 100.0  | 100.0    | 100.0 | 100.0 |
| Sample size    | 620   | 1579  | 2199  | 899     | 1940   | 960      | 3799  | 5998  |

Various indicators of housing density are presented in Table 6.6. These include average household size, rooms per household, and persons per room, all disaggregated by localities. Also

shown in Table 6.6 are the proportion of households that had to share their dwelling with another household and the average number of persons per 10 square metres of floor space.

In the country as a whole, average household size is 4.31 and the average number of rooms per household is 1.74, which results in an average room density of 2.48 persons per room. The highest average room density (2.74 persons per room) is found in the rural forest areas. This is due to the existence of relatively larger household sizes than elsewhere (second after rural savannah), and the relatively fewer rooms in rural localities. The lowest room density (2.18 persons per room) is in the rural savannah, where households in the ecological zone have the highest average number of rooms for household members.

Table 6.6 Indicators of household density, for different localities

| Locality       | Mean<br>household<br>size | Mean no. of rooms per household | Mean no. of persons per room | Mean area (sq.m.) occupied by household | Mean no. of persons per 10 sq.m. | Proportion of<br>households<br>sharing<br>dwelling |
|----------------|---------------------------|---------------------------------|------------------------------|---|----------------------------------|--|
| Locality       | (a)                       | (b)                             | (c)                          | (d)                                     | (e)                              | (f)  |
| Urban          | (a)                       | (0)                             | (c)                          | (u)                                     | (C)                              | (1)  |
| Accra          | 3.69                      | 1.57                            | 2.36                         | 22.80                                   | 1.60                             | 93.4   |
| Other urban    | 4.00                      | 1.60                            | 2.50                         | 24.00                                   | 1.80                             | 89.7   |
| Rural          |                           |                                 |                              |   |                                  |  |
| Rural Coastal  | 4.19                      | 1.69                            | 2.48                         | 21.80                                   | 1.90                             | 81.70  |
| Rural Forest   | 4.21                      | 1.53                            | 2.74                         | 19.30                                   | 2.20                             | 69.90  |
| Rural Savannah | 5.55                      | 2.55                            | 2.18                         | 29.30                                   | 1.90                             | 66.80  |
| Total          | 4.31                      | 1.74                            | 2.48                         | 22.90                                   | 1.90                             | 79.40  |

The last but one column of Table 6.6 shows the average number of persons per 10 square metres of housing space. This indicator, to some extent, measures the degree of overcrowding in households. The measure was derived from details of room area occupied by households, which were collected by the survey teams. It should be noted, however, that some problems were experienced in collecting this data. For instance, in some cases the respondents did not allow full access to rooms and in other cases, it was not possible to move or pack items in rooms before measurements were taken. For about 72 percent of households the measurements were taken inside the rooms; in the remaining 28 percent of cases the measurements were taken outside. The values shown in Table 6.6 are based only on the cases where the measurements were taken inside the dwelling place. The measurements taken on the outside of dwellings resulted in a similar distribution of densities for every 10 square metres.

The average area occupied by a household is almost 23 square metres. It is apparent from Table 6.6 that the mean area does not vary much between localities. The only significant deviation is in rural savannah, where the mean area is 29 square metres. The resulting densities range from an average of 1.6 persons per 10 square metres in Accra to an average of 2.2 persons per 10 square metres in rural forest areas. Sharing of dwellings by different households is common in all the localities, with the greatest level of sharing occurring in the urban areas.

### 6.3 Housing conditions

# 6.3.1 Construction materials for dwelling

Information from Table 6.7 shows the main construction materials used for walls, floors and roofs of dwellings. For walls, the main construction materials are mud (53%) and cement (45%). Eight out of every 10 households in Accra, and 6 out of every 10 households in other urban areas, live in dwellings made of cement; in contrast, about two-thirds of rural households live in dwellings where mud is the main material used in construction.

In the case of materials used by households for the construction of floors, cement is most common in all the localities; it is used by more than 80 percent of the households in the country. Less than 15 percent of households live in dwellings with mud floors. In almost all urban homes the floor is made of cement (96.2%), but in rural areas about 22 percent of households have their floors made with earth or mud.

Table 6.7 Distribution of households by locality and main construction material of walls, floor and roof (percent)

|                       |       | Urban |       |         | Rui    | ral      |       |       |
|-----------------------|-------|-------|-------|---------|--------|----------|-------|-------|
| Material              | Accra | Other | All   | Coastal | Forest | Savannah | All   | Ghana |
| Outside wall material |       |       |       |         |        |          |       |       |
| Mud                   | 9.8   | 33.2  | 26.6  | 54.5    | 65.8   | 83.1     | 67.5  | 52.5  |
| Wood                  | 3.7   | 0.9   | 1.7   | 0.6     | 0.6    | 0.3      | 0.5   | 1.0   |
| Corrugated iron       | 1.8   | 0.2   | 0.6   | 0.1     | 0.1    | -        | 0.1   | 0.3   |
| Stone                 | 0.3   | 2.0   | 1.5   | 0.2     | 1.3    | 0.5      | 0.8   | 1.1   |
| Cement                | 84.4  | 63.3  | 69.2  | 43.4    | 32.2   | 15.6     | 30.6  | 44.8  |
| Other                 | -     | 0.4   | 0.3   | 1.2     | 0.1    | 0.4      | 0.4   | 0.4   |
| Total                 | 100.0 | 100.0 | 100.0 | 100.0   | 100.0  | 100.0    | 100.0 | 100.0 |
| Main floor material   |       |       |       |         |        |          |       |       |
| Earth / Mud           | _     | 2.7   | 1.9   | 12.2    | 18.9   | 35.3     | 21.5  | 14.3  |
| Wood                  | 0.5   | 1.1   | 0.9   | -       | 0.3    | 0.2      | 0.2   | 0.5   |
| Stone                 | 0.3   | 1.1   | 0.9   | 0.1     | 0.2    | 0.3      | 0.2   | 0.5   |
| Fibre glass           | -     | -     | -     | -       | 0.2    | 0.3      | 0.2   | 0.1   |
| Cement                | 99.2  | 95.1  | 96.2  | 87.5    | 80.5   | 63.9     | 78.0  | 84.7  |
| Other                 | -     | 0.1   | 0.1   | 0.1     | -      | -        | 0.0   | 0.1   |
| Total                 | 100.0 | 100.0 | 100.0 | 100.0   | 100.0  | 100.0    | 100.0 | 100.0 |
| Main roofing material |       |       |       |         |        |          |       |       |
| Thatch (grass, straw) | _     | 3.9   | 2.8   | 13.3    | 18.8   | 51.4     | 25.7  | 17.3  |
| Wood                  | 0.6   | 0.9   | 0.9   | 0.8     | 1.1    | 2.4      | 1.3   | 1.2   |
| Iron / Zinc           | 48.4  | 75.8  | 68.0  | 60.1    | 75.4   | 36.7     | 62.0  | 64.2  |
| Cement / concrete     | 4.2   | 5.6   | 5.2   | 1.1     | 1.1    | 0.9      | 1.1   | 2.6   |
| Asbestos              | 46.8  | 13.5  | 22.9  | 20.5    | 2.6    | 0.2      | 6.2   | 12.3  |
| Other                 | -     | 0.2   | 0.1   | 4.2     | 1.1    | 8.4      | 3.7   | 2.4   |
| Total                 | 100.0 | 100.0 | 100.0 | 100.0   | 100.0  | 100.0    | 100.0 | 100.0 |
| Sample size           | 620   | 1579  | 2199  | 899     | 1940   | 960      | 3799  | 5998  |

In the case of main roofing material, more than half (64%) of all households live in houses roofed with iron or zinc sheets, followed by 17 percent in thatched roof houses and about 12

percent in dwellings roofed with asbestos. Iron and zinc roofing is widely used in all localities, but asbestos roofing is mainly used in urban and rural coastal areas, particularly in Accra, where it accounts for 17 percent of the dwellings for all households. Thatched roofing is also the commonest roof type in rural savannah where more than half (51%) of the households dwell in houses roofed with grass or straw.

# 6.3.2 Source of drinking water

The sources of drinking water have been grouped into three major categories; pipe-borne water (indoor plumbing, inside standpipe, water vendor, tanker, neighbour, and private or public standpipe); well (with or without a pump); and natural (river, rain, lakes and springs). Table 6.8 shows that 42 percent of households have access to pipe-borne water and 34 percent use water from the well, while the remaining 24 percent depend on natural sources for drinking water.

Table 6.8 Distribution of households by locality and source of drinking water (percent)

|                           |       | Urban       |       | Rural | Ghana |  |
|---------------------------|-------|-------------|-------|-------|-------|--|
| Source of drinking water  | Accra | Other urban | All   |       |       |  |
| Pipe-borne                | 100   | 72.8        | 80.3  | 18.8  | 41.6  |  |
| Indoor plumbing           | 9.8   | 5.0         | 6.4   | 1.1   | 3.1   |  |
| Inside standpipe          | 38.7  | 21.0        | 26.0  | 1.8   | 10.7  |  |
| Water vendor              | 15.6  | 4.4         | 7.5   | 1.2   | 3.5   |  |
| Tanker                    | 0.3   | 0.1         | 0.1   | 0.8   | 0.6   |  |
| Neighbour                 | 22.3  | 8.0         | 12.1  | 1.1   | 5.1   |  |
| Private outside standpipe | 13.1  | 14.9        | 14.4  | 2.6   | 7.0   |  |
| Public tap                | 0.2   | 19.3        | 13.9  | 10.2  | 11.6  |  |
| Well                      | _     | 15.1        | 10.8  | 47.2  | 33.9  |  |
| With pump                 | -     | 2.8         | 2.0   | 31.6  | 20.8  |  |
| Without pump              | -     | 12.3        | 8.8   | 15.6  | 13.1  |  |
| Natural sources           | _     | 12.2        | 8.8   | 33.9  | 24.6  |  |
| River/spring              | -     | 11.8        | 8.5   | 33.6  | 24.4  |  |
| Rain                      | -     | 0.4         | 0.3   | 0.2   | 0.2   |  |
| Other                     | -     | -           | -     | 0.1   | 0.0   |  |
| All                       | 100.0 | 100.0       | 100.0 | 100.0 | 100.0 |  |
| Sample size               | 620   | 1579        | 2199  | 3799  | 5998  |  |

About one tenth (9.8%) of households in Accra benefit from indoor plumbing, and a further two-fifths (38.7%) have an inside standpipe; the remainder rely mainly on water from neighbours and private standpipes, but a few use public standpipes and those who supply water through tankers. In Accra every household covered in the survey had access to pipe-borne water; in contrast, about a third (27%) of households in other urban areas, and 8 out of every 10 in rural areas, do not have access to pipe-borne water (Figure 6.1). In urban areas other than Accra about 73 percent of households have pipe-borne water, but in many cases this comes from a source outside the house; a sizeable number of households in other urban areas (15%) depend on wells, usually without pumps, for their water supply, and a further 12 percent use natural sources.

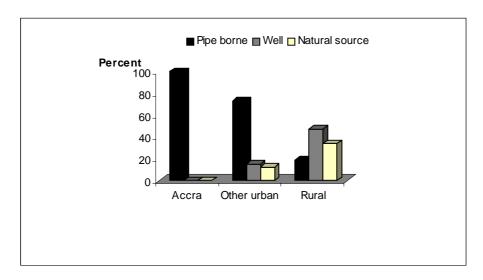


Figure 6.1: Source of drinking water, by locality

In rural areas very few households have indoor plumbing or standpipes, but some get their water from a public standpipe or other reliable outside supply. A great majority of rural households, however, have to get their water from wells (47%) or from natural sources (34%). Unlike the well water in urban areas, much of the water from wells in rural areas are fitted with pumps and account for almost a third of water sources for households.

# 6.3.3 Provision of basic utilities

Table 6.9 indicates the availability of basic utilities. In the case of lighting, the main source for households is kerosene (60%), while 39 percent have access to electricity or occasionally a generator (0.5%). About 90 percent of the households in Accra, and 72 percent of households in other urban areas, use electricity for lighting. Many rural households (82%) use kerosene for lighting.

Almost two-thirds of the households in Ghana use wood as their main source of fuel for cooking, and 30 percent of all households use charcoal; only 4 percent use liquefied petroleum (LP) gas. In urban areas and particularly in Accra, charcoal is widely used; more than two-thirds of Accra households (71%) and about half of households in other urban areas (57%) use charcoal for fuel. In Accra, gas ranks second as a source of fuel, whereas in other urban areas wood is the preferred second choice. In rural areas many households (about 84%) use wood, but some households use charcoal or other sources.

It is also apparent from Table 6.9 that dumping is the predominant mode of rubbish disposal in the country as a whole; 67 percent of households in Accra, 90 percent of those in other urban areas, and 95 percent of rural households dump their rubbish. It is only in Accra that significant numbers of households use other means of disposal; 22 percent have their rubbish collected, and 11 percent burn it.

Table 6.9 Distribution of households by locality and use of basic utilities (percent)

|                            |       | Urban |       |         | Rur    | al       |       |       |
|----------------------------|-------|-------|-------|---------|--------|----------|-------|-------|
| Utility                    | Accra | Other | All   | Coastal | Forest | Savannah | All   | Ghana |
| Source of lighting         |       |       |       |         |        |          |       |       |
| Electricity (mains)        | 90.6  | 72.2  | 77.4  | 26.7    | 19.0   | 4.3      | 17.1  | 39.2  |
| Generator                  | 0.8   | 0.3   | 0.4   | 0.2     | 0.5    | 0.8      | 0.5   | 0.5   |
| Kerosene/Gas/lamp          | 8.4   | 27.4  | 22.0  | 72.9    | 80.5   | 93.8     | 82.0  | 60.0  |
| Candle                     | 0.2   | 0.2   | 0.2   | 0.2     | -      | 0.5      | 0.2   | 0.2   |
| Other                      | -     | -     | -     | -       | 0.1    | 0.6      | 0.2   | 0.1   |
| Total                      | 100.0 | 100.0 | 100.0 | 100.0   | 100.0  | 100.0    | 100.0 | 100.0 |
| Source of fuel             |       |       |       |         |        |          |       |       |
| Wood                       | 1.1   | 34.2  | 24.9  | 72.2    | 87.6   | 89.2     | 84.4  | 62.5  |
| Charcoal                   | 70.5  | 57.2  | 60.9  | 24.8    | 11.3   | 5.2      | 13.0  | 30.6  |
| Gas                        | 22.7  | 5.2   | 10.1  | 1.1     | 0.6    | 0.2      | 0.6   | 4.1   |
| Electricity                | 0.6   | 0.4   | 0.5   | 1.0     | 0.1    | 0.1      | 0.3   | 0.4   |
| Kerosene                   | 4.5   | 1.3   | 2.2   | 0.8     | 0.3    | 0.2      | 0.4   | 1.1   |
| Other fuel                 | 0.5   | 1.6   | 1.3   | 0.1     | 0.1    | 5.1      | 1.4   | 1.4   |
| Total                      | 100.0 | 100.0 | 100.0 | 100.0   | 100.0  | 100.0    | 100.0 | 100.0 |
| Method of rubbish disposal |       |       |       |         |        |          |       |       |
| Collected                  | 22.3  | 5.3   | 10.1  | -       | 1.2    | -        | 0.6   | 4.1   |
| Dumped                     | 66.9  | 89.6  | 83.2  | 95.4    | 96.3   | 93.6     | 95.4  | 90.9  |
| Burned                     | 10.8  | 4.7   | 6.5   | 4.1     | 2.0    | 3.9      | 3.0   | 4.3   |
| Buried                     | -     | 0.4   | 0.3   | 0.4     | 0.5    | 2.5      | 1.0   | 0.7   |
| Total                      | 100.0 | 100.0 | 100.0 | 100.0   | 100.0  | 100.0    | 100.0 | 100.0 |
| Sample size                | 620   | 1579  | 2199  | 899     | 1940   | 960      | 3799  | 5998  |

#### **6.3.4** Toilet facilities

Results as captured in Table 6.10 show that the availability of modern toilet facilities seems to be a major problem in Ghana. The information collected on types of toilet used by households shows that a fifth of households in Ghana do not have any toilet facilities. Only 6 percent of households have access to flush toilets, and 28 percent use Kumasi Ventilated Improved Pit latrines (KVIPs). The most common form of toilet, used by 38 percent of all households, is the ordinary pit latrine, while 7 percent use a pan or bucket for toilet.

Table 6.10 Distribution of households by locality and type of toilet used by the households (percent)

|                | 1     | Urban |       |         | Rural  |          |       |       |
|----------------|-------|-------|-------|---------|--------|----------|-------|-------|
| Type of toilet | Accra | Other | All   | Coastal | Forest | Savannah | All   | Ghana |
|                |       |       |       |         |        |          |       |       |
| Flush toilet   | 25.0  | 10.1  | 14.3  | 3.6     | 1.1    | 0.4      | 1.5   | 6.2   |
| KVIP           | 34.5  | 50.0  | 45.7  | 24.5    | 19.8   | 8.4      | 18.1  | 28.2  |
| Pit latrine    | 18.2  | 17.2  | 17.5  | 44.2    | 67.0   | 21.9     | 50.2  | 38.2  |
| Pan/bucket     | 17.3  | 11.7  | 13.3  | 2.3     | 5.2    | 0.3      | 3.3   | 7.0   |
| None           | 5.0   | 11.0  | 9.3   | 25.5    | 6.9    | 69.0     | 27.0  | 20.5  |
| Total          | 100.0 | 100.0 | 100.0 | 100.0   | 100.0  | 100.0    | 100.0 | 100.0 |
| Sample size    | 620   | 1579  | 2199  | 899     | 1940   | 960      | 3799  | 5998  |

In terms of locality, rural households are worse off, with 27 percent of households not having access to any kind of toilet facility and having to ease themselves in the bush or the beach (popularly known as "free range"). The situation in rural savannah is quite alarming; nearly 70 percent of households in this ecological zone do not have access to any toilet facility. Even in urban areas, the provision of toilet facilities is far from encouraging: about a tenth of urban households do not have access to a toilet. In terms of the country as a whole, these figures imply that close to a million households do not have any toilet facilities; 23,500 of these households are in Accra, 131,000 in other urban areas, and 783,000 in rural areas.

#### 7 HOUSEHOLD AGRICULTURE

## 7.1 Agricultural activities and assets

This section of the report presents data on agricultural activities. The section has information on households' ownership and operation of farms as well as livestock keeping. Data on yields of various agricultural products, sales, processing and purchases as well as inputs of production is presented in the succeeding tables. Data on consumption of own agriculture produce by households are also presented.

It is estimated that about 2,740,000 households in Ghana own or operate a farm or keep livestock. Table 7.1 shows the distribution of these households around the country. Although farming and keeping of livestock is predominantly a rural activity, a significant number of urban households reported that they own or operate a farm or keep livestock; around a third (32%) in urban areas have some involvement in agricultural activities. In the rural areas, agricultural activity is most common in the rural savannah, where only 7 percent of households did not report any agricultural activity. In the rural forest zone the corresponding figure was 14 percent, while in the rural coastal area as many as 25 percent of households are not engaged in agriculture.

Table 7.1 Distribution of households owning or operating a farm or keeping livestock, and national estimates, by locality (percent)

|                          |            | ning or operating eping livestock | Women's share of responsibility for agricultural |
|--------------------------|------------|-----------------------------------|--|
| Locality/ecological zone | Sample (%) | National (number)                 | activities (%)                                   |
| Urban area               | 32         | 480,000                           | 38   |
| Rural area               | 85         | 2,250,000                         | 44   |
| Rural coastal            | 75         | 460,000                           | 53   |
| Rural forest             | 86         | 1,180,000                         | 46   |
| Rural Savannah           | 93         | 620,000                           | 36   |
| Ghana                    | 66         | 2,740,000                         | 43   |

For each household engaged in agriculture, questions were asked to determine which members were responsible for the farm or livestock. In 22 percent of agricultural households, responsibility was shared between two or more people; most often this involved a male head of household and his wife. Looking at the characteristics of all those named as having responsibility for agricultural activities in the household, one third are women. As shown in Table 7.1, the role of women in agriculture appears to vary around the country. While women make up more than half (53%) of those with responsibility for agriculture in the rural coastal zone and slightly less than half (46%) in the forest zone, the corresponding figure for the rural savannah zone is only about a third (36%).

Looking specifically at the national estimates for livestock, obtained by projecting the sample figures, it is noted that about one and a half million households in Ghana own livestock (Table 7.2). More than four-fifths of a million (812,000) households raise goats, half a million households raise sheep, and more than a million (1,164,000) households raise chicken. Much smaller numbers of households raise other poultry, pigs, draught animals (such as donkeys, horses and bullocks), and rabbits. In all, Ghanaian households keep about 2 billion goats in the country, 869 million sheep, 1.6 million cattle, 1.2 million pigs, 302 million chickens, and 3.5 million other poultry. The combined value of all these livestock is about  $$\phi 3,574$$  billion; sales of

livestock in the previous 12 months amounted to about \$\psi 257.5\$ billion, and purchases amounted to about \$\psi 37.8\$ billion.

Table 7.2 Estimated number of households raising different livestock, the number of livestock, and the estimated value of livestock, sales and purchases

| •                  | Number of          | Number        | Total value     | Sales in        | Purchases       |
|--------------------|--------------------|---------------|-----------------|-----------------|-----------------|
|                    | households raising | of            | of              | the last        | in the last     |
| Types of livestock | _                  | livestock     | livestock       | 12 months       | 12 months       |
|                    |                    |               | (million cedis) | (million cedis) | (million cedis) |
| Draught animals    | 75,000             | 183,000       | 62,200          | 2,700           | 4,200           |
| Cattle (inc. cows) | 176,000            | 1,599,000     | 470,000         | 19,700          | 11,500          |
| Sheep              | 502,000            | 868,618,000   | 171,400         | 18,400          | 3,300           |
| Goat               | 812,000            | 2,016,386,000 | 172,800         | 21,500          | 3,200           |
| Pigs               | 168,000            | 1,179,000     | 78,700          | 9,400           | 1,900           |
| Rabbit             | 8,000              | 40,000        | 600             | 70              | 30              |
| Chicken            | 1,164,000          | 302,472,000   | 2,410,100       | 66,900          | 12,300          |
| Other poultry      | 291,000            | 3,408,000     | 20,000          | 5,000           | 300             |
| Other livestock    | 18,000             | 63,000        | -               | 70              | 4               |
| Fish               | 51,000             | 13,889,000    | 186,600         | 113,300         | 1,000           |
| Crab               | 11,000             | 48,000        | 300             | 300             | -               |
| Other              | 7,000              | 140,000       | 1,100           | 20              | 20              |
| Total              | 1,541,000          | 3,208,025,000 | 3,574,000       | 257,500         | 37,800          |

Livestock owned by households are concentrated predominantly in the rural forest and followed by rural savannah (Table 7.3). For instance, the rural savannah has 96 percent of all draught animals, 71 percent of cattle, and 61 percent of all pigs, while the rural forest has over 99 percent of all goats and sheep. Households living in urban areas own about 36 percent of all fish and 11 percent of all chicken. In the case of draught animals, some ¢200 million was received from renting out such animals.

Table 7.3 Estimated distributions of livestock by locality

| _                  |             | Local         | ity           |                |               |
|--------------------|-------------|---------------|---------------|----------------|---------------|
| Type of livestock  | Urban areas | Rural coastal | Rural forest  | Rural Savannah | Ghana         |
|                    |             |               |               |                |               |
| Draught animals    | 8,000       | -             | -             | 175,000        | 183,000       |
| Cattle (inc. cows) | 330,000     | 81,000        | 54,000        | 1,135,000      | 1,599,000     |
| Sheep              | 382,000     | 360,000       | 866,623,000   | 1,253,000      | 868,618,000   |
| Goat               | 679,000     | 563,000       | 2,013,204,000 | 1,940,000      | 2,016,386,000 |
| Pigs               | 134,000     | 185,000       | 142,000       | 718,000        | 1,179,000     |
| Rabbit             | 6,000       | 21,000        | 10,000        | 2,000          | 40,000        |
| Chicken            | 32,857,000  | 3,448,000     | 244,130,000   | 22,037,000     | 302,472,000   |
| Other poultry      | 256,000     | 137,000       | 354,000       | 2,660,000      | 3,408,000     |
| Other livestock    | 8,000       | 3,000         | 27,000        | 25,000         | 63,000        |
| Fish               | 4,933,000   | 8,942,000     | 14,000        | 0              | 13,889,000    |
| Crab               | 28,000      | 19,000        | -             | -              | 48,000        |
| Other              | 7,000       | 96,000        | 36,000        | 1,000          | 140,000       |
| Total              | 39,629,000  | 13,856,000    | 3,124,594,000 | 29,946,000     | 3,208,025,000 |

Results of the survey also report on agricultural equipment owned by households. Expenses on the recently purchased or hired equipment are reported in sub-section 7.5 of this chapter.

#### 7.2 Harvesting and disposal of crops

## 7.2.1 Staples grains and cash crops

Out of the estimated 2.7 million households engaged in harvesting staple grains and cash crops, 2.4 million of them harvest maize. Other major crops, in terms of number of households involved, are groundnut (604,100), beans/peas (463,800), cocoa (584,400), sorghum/millet/guinea corn (467,800), and rice (361,400). Table 7.4 provides estimates of the number of households in each ecological zone that harvested different crops in the previous 12 months, and shows the great variations around the country in crops grown. Maize is the only staple or cash crop which is grown extensively in all three zones.

Table 7.4 Estimated number of households in each ecological zone harvesting various staple grains, field and cash crops in the previous 12 months

|                            | Ec      | cological zone |          |           |
|----------------------------|---------|----------------|----------|-----------|
| Crop                       | Coastal | Forest         | Savannah | Ghana     |
| Cocoa                      | 48,800  | 515,300        | 20,300   | 584,400   |
| Coffee                     | 700     | 6,100          | -        | 6,800     |
| Rubber                     | -       | -              | 700      | 700       |
| Coconut                    | 73,200  | 40,000         | 1,400    | 114,600   |
| Wood                       | 126,800 | 75,300         | 19,700   | 221,700   |
| Kenef                      | -       | 700            | 1,400    | 2,000     |
| Cotton                     | -       | -              | 19,700   | 19,700    |
| Groundnut/peanut           | 48,800  | 75,900         | 479,000  | 604,100   |
| Tobacco                    | 2,000   | 700            | 3,400    | 6,100     |
| Sugar cane                 | 17,600  | 23,700         | -        | 41,400    |
| Maize                      | 478,000 | 1,402,100      | 526,800  | 2,406,900 |
| Rice                       | 6,100   | 71,200         | 284,100  | 361,400   |
| Sorghum/millet/guinea corn | -       | 4,700          | 463,100  | 467,800   |
| Beans/peas                 | 46,000  | 109,200        | 308,500  | 463,800   |
| Other crops                | 7,500   | 53,600         | 8,800    | 69,800    |

The majority of households that grow rice, groundnut and beans/peas, and virtually all the households that grow sorghum/millet/guinea corn, are located in the savanna. The major export crop, cocoa is grown almost exclusively in the forest zone (Table 7.4).

The estimates for some of the smaller crops may be subject to errors, because of the data collection periods. It is however clear that the cultivation of cotton and tobacco takes place mostly in the savannah zone, sugar cane and coconut mostly in the coastal and forest zones, while coffee is grown mainly in the forest zone.

Table 7.5 presents information on harvesting, sales and value of various farm produce in the 12 months preceding the interview. Households, which harvested crops, were asked whether they sold any of the crops unprocessed in the previous 12 months. Only 2 percent of the households processed the cocoa they harvested.

Table 7.5 Estimated number of households harvesting various staple grains and field and cash crops, percentage selling their crops, and estimated annual value of harvest and sales

|                            | Estimated number of    | Percentage selling any  |                  |          |
|----------------------------|------------------------|-------------------------|------------------|----------|
|                            | households harvesting  | unprocessed crop in the | Estimated annual | value of |
| Crop                       | crop in last 12 months | last 12 months          | total harvest    | sales    |
|                            | -                      |                         | (billion cedi    | s)       |
| Cocoa                      | 584,400                | 98                      | 809.4            | 379.2    |
| Coffee                     | 6,800                  | 75                      | 1.2              | 0.7      |
| Rubber                     | 700                    | 0                       | 0.3              | -        |
| Coconut                    | 114,600                | 60                      | 17.7             | 10.4     |
| Wood                       | 221,700                | 10                      | 14.8             | 1.1      |
| Kenef                      | 2,000                  | 63                      | 1.0              | 0.7      |
| Cotton                     | 19,700                 | 97                      | 7.7              | 7.7      |
| Groundnut/peanut           | 604,100                | 63                      | 146.1            | 60.2     |
| Tobacco                    | 6,100                  | 92                      | 6.0              | 5.5      |
| Sugar cane                 | 41,400                 | 71                      | 5.1              | 3.9      |
| Maize                      | 2,406,900              | 53                      | 544.7            | 230.1    |
| Rice                       | 361,400                | 63                      | 126.0            | 53.3     |
| Sorghum/millet/guinea corn | 467,800                | 23                      | 98.4             | 11.9     |
| Beans/peas                 | 463,800                | 41                      | 43.1             | 18.5     |
| Other crops                | 69,800                 | 62                      | 13.9             | 10.4     |
| Any/all crops              | 2,491,700              | 54                      | 1,834.0          | 793.6    |

A high percentage (at least 90%) of growers of cotton, tobacco and coffee also do not process their products. But for growers of other main crops (maize, groundnut, and rice), between one half and two-thirds of the households reported selling part of their unprocessed produce the previous 12 months.

Due to home consumption of some of the farm produce there is a difference between the value of harvested produce and the value of sales. The estimated total annual value of the harvest of staple grains, field crops and cash crops produced by Ghanaian households was about \$\psi\$1,834 billion relative to mid-March 1999 prices, while the value of sales was about \$\psi\$794 billion. Cocoa and maize are the major cash crops in terms of both harvest and sales; cocoa harvested annually by households is valued a little over \$\psi\$809 billion, and sales amount to about \$\psi\$379 billion, while the annual maize harvest is valued about \$\psi\$545 billion and value of maize sales is \$\psi\$230 billion. These two crops thus account for about 74 percent of the total harvest of staple grains and cash crops, and for 77 percent of all sales. Two other crops are important in terms of the value of their sales; groundnut with annual sales of about \$\psi\$60 billion, and rice with sales of about \$\psi\$53 billion. Sorghum/millet/guinea corn produced is worth about \$\psi\$98 billion, but only 12 percent of the crop is sold (Table 7.5).

Beside cocoa, other important cash crops in the forest zone are maize and to a lesser extent rice, beans or peas and groundnuts (Table 7.6). There is some sale of cocoa in the coastal zone, as defined for this survey; other crops, which are sold in the coastal zone are maize, coconuts and rice. In the savannah zone, the major crops in terms of sales are maize and groundnut; other significant crops are rice, sorghum/millet/guinea corn and beans/peas. A small amount of income is also earned from sales of cotton and tobacco.

Overall, the forest zone, which contains a little over half of the rural household population of Ghana, accounts for more than two-thirds (69%) of the total sales of staple grains and cash crops.

Table 7.6 Estimated annual value of harvested crops and value of sales by households of unprocessed staple grains, field and cash crops, by ecological zone

|                            |         | Annual value of harvest |           |         |                 | Annual value of sales |           |       |
|----------------------------|---------|-------------------------|-----------|---------|-----------------|-----------------------|-----------|-------|
|                            | E       | Ecological zone         |           |         | Ecological zone |                       |           |       |
| Crop                       | Coastal | Forest                  | Savannah  | Ghana   | Coastal         | Forest                | Savannah  | Ghana |
|                            |         | (billio                 | on cedis) |         |                 | (billio               | on cedis) |       |
| Cocoa                      | 19.0    | 752,0                   | 38,3      | 809.4   | 15.1            | 358.9                 | 5.3       | 379.2 |
| Coffee                     | 0.1     | 1.1                     | -         | 1.2     | 0.0             | 0.7                   | -         | 0.7   |
| Rubber                     | -       | -                       | 0.3       | 0.3     | -               | -                     | -         | -     |
| Coconut                    | 15.6    | 2.0                     | 0.0       | 17.7    | 8.9             | 1.5                   | 0.0       | 10.4  |
| Wood                       | 8.4     | 5.7                     | 0.6       | 14.8    | 0.7             | 0.3                   | 0.0       | 1.1   |
| Kenef                      | -       | 0.1                     | 0.9       | 1.0     | -               | 0.1                   | 0.6       | 0.7   |
| Cotton                     | -       | -                       | 7,7       | 7.7     | -               | -                     | 7.7       | 7.7   |
| Groundnut/peanut           | 6.9     | 12.9                    | 126.3     | 146.1   | 5.0             | 6.8                   | 48.4      | 60.2  |
| Tobacco                    | 1.0     | 3.0                     | 2.0       | 6.0     | 0.6             | 3.0                   | 2.0       | 5.5   |
| Sugar cane                 | 1.7     | 3.5                     | -         | 5.1     | 0.6             | 3.3                   | -         | 3.9   |
| Maize                      | 69.6    | 328.9                   | 146.1     | 544.7   | 27.4            | 146.4                 | 56.3      | 230.1 |
| Rice                       | 23.8    | 26.7                    | 75.5      | 126.0   | 10.9            | 7.3                   | 35.1      | 53.3  |
| Sorghum/millet/guinea corn | -       | 0.5                     | 97,9      | 98.4    | -               | 0.2                   | 11.8      | 11.9  |
| Beans/peas                 | 3.7     | 11.0                    | 28.4      | 43.1    | 1.9             | 7.7                   | 8.8       | 18.5  |
| Other crops                | 0.3     | 9.3                     | 3.3       | 13.9    | 0.3             | 7.6                   | 2.5       | 10.4  |
| Total                      | 150.2   | 1,156.8                 | 527.4     | 1,834.0 | 71.5            | 543.8                 | 178.3     | 793.6 |

## 7.2.2 Roots, fruits, vegetables and other crops

Of the crops presented in Table 7.7, the ones involving a large number of households are cassava (1.5 million households) and pepper (1.3 million households). These two crops are harvested extensively in all three ecological zones, especially in rural forest where more than two-thirds of households are involved. Next are yam, plantain, cocoyam, okro and tomatoes in that order. The growing of plantain, cocoyam and many of the crops occurs more often with households in the forest zone than with those in the other two zones. Oil palm cultivation is also extensively done in the forest zone where about 468,000 households are involved in it. A sizeable number of households in the coastal zone (146,000) also cultivate oil palm as compared to about 21,000 involved in the savannah zone.

Table 7.7 Estimated number of households harvesting various fruits, root crops and vegetables in the previous 12 months, by ecological zone

|                      | Ec      | ological zone |          |           |
|----------------------|---------|---------------|----------|-----------|
| Crop                 | Coastal | Forest        | Savannah | Ghana     |
| Avocade pear         | 60,000  | 353,000       | 5,000    | 418,000   |
| Banana               | 57,000  | 272,000       | 16,000   | 345,000   |
| Colanut              | 12,000  | 38,000        | 1,000    | 52,000    |
| Mango                | 62,000  | 213,000       | 17,000   | 292,000   |
| Oil palm             | 146,000 | 468,000       | 21,000   | 636,000   |
| Oranges              | 85,000  | 273,000       | 7,000    | 365,000   |
| Pawpaw               | 92,000  | 377,000       | 24,000   | 494,000   |
| Pineapple            | 76,000  | 234,000       | 3,000    | 313,000   |
| Other fruit          | 14,000  | 22,000        | 4,000    | 41,000    |
| Cassava              | 289,000 | 985,000       | 243,000  | 1,517,000 |
| Cocoyam              | 90,000  | 704,000       | 72,000   | 866,000   |
| Plantain             | 124,000 | 757,000       | 61,000   | 942,000   |
| Potatoes             | 12,000  | 29,000        | 37,000   | 78,000    |
| Yam                  | 87,000  | 575,000       | 283,000  | 945,000   |
| Garden egg/egg plant | 102,000 | 248,000       | 57,000   | 407,000   |
| Leafy vegetable      | 113,000 | 366,000       | 217,000  | 696,000   |
| Okro                 | 92,000  | 356,000       | 365,000  | 814,000   |
| Onion                | 19,000  | 87,000        | 47,000   | 153,000   |
| Pepper               | 227,000 | 693,000       | 343,000  | 1,264,000 |
| Tomatoes             | 136,000 | 384,000       | 210,000  | 730,000   |
| Other vegetables     | 102,000 | 111,000       | 27,000   | 241,000   |

Table 7.8 presents data on households' production, market supply and values of sales for various root crops, fruits and vegetables. A high proportion (two-thirds or more) of households growing cassava, leafy vegetables, plantain and pepper had harvested some of their crop in the previous two weeks. Given that a household grows a certain crop, the likelihood of them having sold any of it in the previous two weeks is greatest in the case of cola nuts (33%), followed by plantain (21%), onion and oil palm (each estimated at 16%).

Table 7.8 Estimated number of households harvesting various fruits, root crops and vegetables, percentage harvesting or selling in the previous two weeks, and estimated annual value of harvest and sales

|                      | Estimated number of households | Percentage of these households: |                 | Estimated annual va | alue of: |
|----------------------|--------------------------------|---------------------------------|-----------------|---------------------|----------|
|                      | harvesting crops in            | harvesting in                   | selling produce | total               | sales    |
| Crop                 | last 12 months                 | last two weeks                  | in last two     | harvest             |          |
| 1                    |                                |                                 | weeks           |                     |          |
|                      |                                |                                 |                 | (billion cedis      | )        |
| Avocade pear         | 418,000                        | 24                              | 4               | 11.2                | 4.1      |
| Banana               | 345,000                        | 38                              | 14              | 20.4                | 10.0     |
| Cola nut             | 52,000                         | 36                              | 33              | 4.3                 | 3.6      |
| Mango                | 292,000                        | 28                              | 3               | 8.7                 | 0.9      |
| Oil palm             | 636,000                        | 66                              | 16              | 87.5                | 36.9     |
| Oranges              | 365,000                        | 29                              | 6               | 16.5                | 10.1     |
| Pawpaw               | 494,000                        | 42                              | 1               | 6.6                 | 0.5      |
| Pineapple            | 313,000                        | 33                              | 4               | 9.9                 | 3.5      |
| Other fruit          | 41,000                         | 47                              | 8               | 3.9                 | 0.2      |
| Cassava              | 1,517,000                      | 76                              | 15              | 562.8               | 120.6    |
| Cocoyam              | 866,000                        | 54                              | 7               | 159.4               | 39.0     |
| Plantain             | 942,000                        | 66                              | 21              | 401.6               | 173.0    |
| Potatoes             | 78,000                         | 39                              | 13              | 33.3                | 18.2     |
| Yam                  | 945,000                        | 33                              | 5               | 223.0               | 51.1     |
| Garden egg/egg plant | 407,000                        | 51                              | 9               | 60.4                | 11.8     |
| Leafy vegetable      | 696,000                        | 77                              | 4               | 15.1                | 3.7      |
| Okro                 | 814,000                        | 47                              | 8               | 34.3                | 11.6     |
| Onion                | 153,000                        | 41                              | 16              | 104.0               | 84.2     |
| Pepper               | 1,264,000                      | 66                              | 8               | 75.2                | 16.8     |
| Tomatoes             | 730,000                        | 42                              | 9               | 61.5                | 31.3     |
| Other vegetables     | 241,000                        | 78                              | 2               | 2.4                 | 0.1      |
| Total                |                                |                                 |                 | 1,901.9             | 631.2    |

Since the survey was spread fairly evenly throughout the year in each part of the country, it is possible to project the two-week figures for each household to arrive at a reasonable estimate of the total annual value of the harvest and of the sales. The estimated total value of the harvest for all the crops is at \$\psi1,902\$ billion, using March 1999 prices. The major crops in terms of value are cassava (valued at \$\psi563\$ billion), plantain (\$\psi402\$ billion), yams (\$\psi223\$ billion), and cocoyam (\$\psi159\$ billion); other valuable crops were oranges, pepper, onion and tomatoes.

The total annual value of the sales of crops is estimated to be about  $$\phi 631$$  billion relative to mid-March 1999 prices, with the major crops in terms of harvest featuring prominently in sales. In the coastal zone, out of a total income of  $$\phi 70$$  billion from the sale of roots, vegetables and other crops, two-thirds came from just four crops: cassava, oil palm, plantain, and pepper (Table 7.9). The agricultural income base is rather wider in the forest zone, but 83 percent of the income comes from five crops: plantain, cassava, cocoyam, oil palm and tomatoes with plantain and cassava alone accounting for 62% of total sales. In the rural savannah two crops, onions and yams, account for more than two-thirds of all income from the sale of roots, vegetables and other crops.

Table 7.9 Estimated annual value of the harvest and sales of root crops, fruits and vegetables, by ecological zone

| -                    | Annual  | value of ha  | rvest (billion o | edis)   | Annua   | l value of sa   | ales (billion c | edis) |
|----------------------|---------|--------------|------------------|---------|---------|-----------------|-----------------|-------|
|                      | Ec      | cological zo | ne               |         | Ес      | Ecological zone |                 |       |
| Crop                 | Coastal | Forest       | Savannah         | Ghana   | Coastal | Forest          | Savannah        | Ghana |
| Avocade pear         | 0.3     | 10.9         | 0.0              | 11.2    | -       | 4.1             | -               | 4.1   |
| Banana               | 2.5     | 17.2         | 0.7              | 20.4    | 0.5     | 9.1             | 0.4             | 10.0  |
| Colanut              | 0.7     | 3.5          | -                | 4.3     | 0.7     | 2.9             | -               | 3.6   |
| Mango                | 0.1     | 8.5          | 0.1              | 8.7     | -       | 0.9             | -               | 0.9   |
| Oil palm             | 23.2    | 64.4         | 0.9              | 87.5    | 11.5    | 25.1            | 0.3             | 36.9  |
| Oranges              | 5.2     | 11.2         | 0.1              | 16.5    | 2.8     | 7.2             | 0.0             | 10.1  |
| Pawpaw               | 0.8     | 5.2          | 0.6              | 6.6     | 0.2     | 0.4             | 0.0             | 0.5   |
| Pineapple            | 3.9     | 6.0          | 0.0              | 9.9     | 2.4     | 1.2             | -               | 3.5   |
| Other fruit          | 0.2     | 3.6          | -                | 3.9     | 0.1     | 0.2             | -               | 0.2   |
| Cassava              | 133.7   | 357.4        | 71.7             | 562.8   | 20.1    | 89.2            | 11.3            | 120.6 |
| Cocoyam              | 16.1    | 132.3        | 11.0             | 159.4   | 20.1    | 35.9            | 0.4             | 39.0  |
| Garden egg/egg plant | 4.2     | 53.1         | 3.1              | 401.6   | 2.7     | 33.9<br>7.9     | 1.5             | 173.0 |
|                      | 2.3     | 10.8         | 2.1              | 33.3    | 0.5     | 3.1             | 0.1             | 18.2  |
| Leafy vegetable      |         |              |                  |         |         |                 |                 |       |
| Okro                 | 4.7     | 15.2         | 14.4             | 223.0   | 2.8     | 7.0             | 1.8             | 51.1  |
| Onion                | 4.7     | 11.0         | 88.3             | 60.4    | 4.6     | 0.3             | 79.4            | 11.8  |
| Pepper               | 12.4    | 40.0         | 22.8             | 15.1    | 4.5     | 9.3             | 3.0             | 3.7   |
| Plantain             | 36.0    | 342.1        | 23.5             | 34.3    | 9.8     | 148.3           | 14.9            | 11.6  |
| Potatoes             | 1.0     | 2.7          | 29.5             | 104.0   | 0.5     | 1.6             | 16.1            | 84.2  |
| Tomatoes             | 6.5     | 44.4         | 10.6             | 75.2    | 2.5     | 21.6            | 7.2             | 16.8  |
| Yam                  | 30.8    | 96.3         | 96.0             | 61.5    | 1.3     | 8.5             | 41.3            | 31.3  |
| Other vegetables     | 0.8     | 1.2          | 0.3              | 2.4     | 0.0     | 0.1             | -               | 0.1   |
| Total                | 290.0   | 1,236.0      | 375.9            | 1,901.9 | 69.6    | 383.9           | 177.7           | 631.2 |

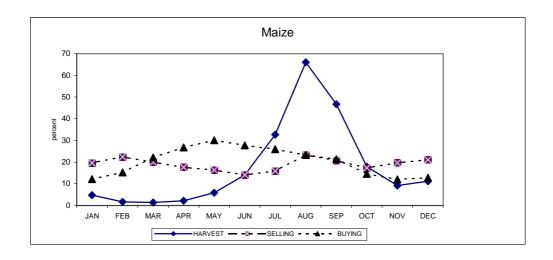
The presentation so far has been on unprocessed agricultural produce. Some farm produce are processed by the household or transformed into other goods, which can be used by the household or sold; alternatively the household may choose to consume the unprocessed food itself. The processing of agricultural food produce is discussed in section 7.6, while the home consumption of agricultural produce is dealt with in section 7.7.

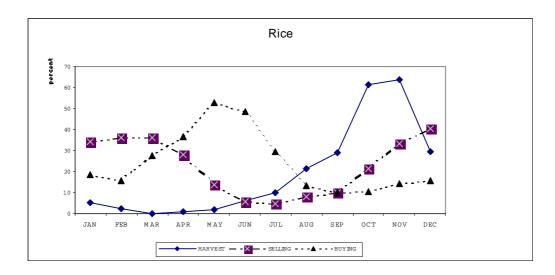
#### 7.3 Seasonal patterns

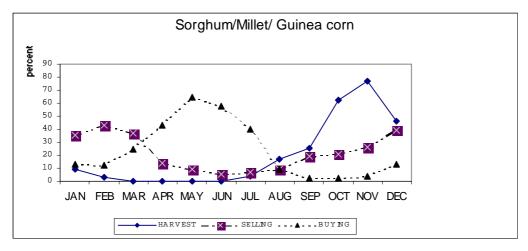
Where agricultural households grow any of the six crops (maize, rice, cassava, yam, plantain, and sorghum/millet/guinea corn) in the last 12 months, they were asked to give information about the seasonal characteristics of each crop grown; this was done by asking them to specify the main months of the year when each crop was harvested, sold, or bought for home consumption. Figures 7.1 and 7.2 show, for each crop, the percentage of households harvesting, selling, or buying the crop during each month of the year. Although for some crops there are slight variations between the ecological zones in the timing of each activity, the general pattern is fairly similar.

Cereal crops (maize, rice, and sorghum/millet/guinea corn) display marked seasonal variations in the pattern of harvesting. Most households do not harvest cereals in the first half of the year probably because of the dry season, which invariably determines the farming seasons in all the ecological zones in the country. For example, almost none of the households produce sorghum/millet/guinea corn during the period, April to June; less than 5 percent harvest maize between January and April and very few households harvest rice between March and June.

Figure 7.1: Seasonal patterns of harvesting, selling and buying various cereal crops amongst those households, which cultivate those crops.



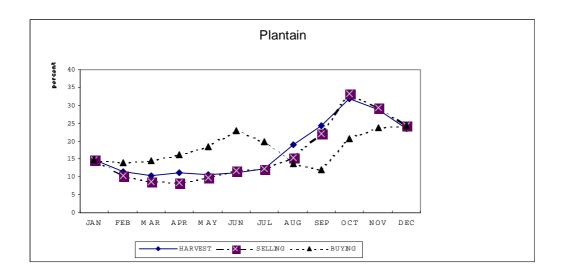


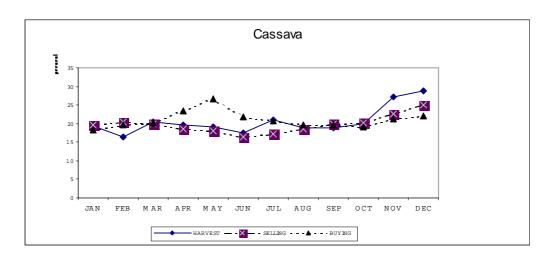


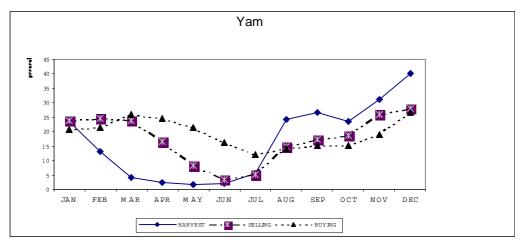
Majority of maize growing households harvest their crop during the third quarter, July-September, while most of the rice crop and sorghum/millet/guinea corn are harvested during the last trimester, September-December. Of the other crops, yams display quite a strong seasonal pattern in harvesting, with most of the yams being harvested around the end of the year. Plantain displays a much more even pattern of harvesting, but with a peak around the end of the year. Cassava is the crop with the most consistent pattern of harvesting, with harvesting being reported every month of the year by about a third of cassava growing households.

Sales of maize by households spread evenly across the months of the year, with deviations in June, October and January. In the case of rice and sorghum/millet/guinea corn, the selling of these crops follows within a month or two after the harvest. Sales of plantain and yam mirror exactly the harvesting pattern, with peak selling occurring in the month of peak harvesting. Apart from the months of May, June and July cassava is fairly evenly sold throughout the year; in the rest of the months of the year about a fifth of the households growing cassava report a sale.

Figure 7.2: Seasonal patterns of harvesting, selling and buying other crops amongst those households, which cultivate those crops.







The purchasing of a crop for home consumption by households that grow that crop has the same seasonal pattern for all the crops. Figures 7.1 and 7.2 depict a complete symmetry between harvesting and buying for all the crops, meaning that most farmers, as expected, buy these crops when harvest is at its minimum.

# 7.4 Other agricultural income

This section reports on the analysis of households that derive some income in cash or kind from sales of other types of agricultural produce other than grains, vegetables, roots and cash crops. Table 7.10 provides estimates, at the national level, of the number of households receiving income from each source and the annual amount received. Estimates of the number of households are given to the nearest 1,000, and estimates of sales to the nearest 100 million cedis, to indicate that they may be subject to fairly large margins of sampling error.

Table 7.10 Estimates of number of agricultural households selling various types of agricultural produce, and estimated value of sales

|                            | National estimates   |                 |
|----------------------------|----------------------|-----------------|
| Source of sales            | Number of households | Annual sales    |
|                            |                      | (billion cedis) |
| Hunting (including snails) | 164,000              | 13.1            |
| Honey                      | 41,000               | 1.7             |
| Palm wine/akpeteshie/pito  | 118,000              | 50.0            |
| Fruit berries              | 194,000              | 6.6             |
| Milk                       | 1,000                | 0.1             |
| Other dairy products       | 7,000                | 1.5             |
| Eggs                       | 121,000              | 4.0             |
| Hides, wool, skin          | 2,000                | 0.3             |
| Mushrooms                  | 68,000               | 0.7             |
| Total                      |                      | 71.5            |

Since information on these sales was only sought from those households that owned or operated a farm or kept livestock, any sales by non-agricultural households are excluded. The total annual value of sales of agricultural produce by agricultural households is about \$p\$/72 billion. Most of this agricultural income comes from the sale of palm wine/akpeteshie, pito, mmedaa, and similar drinks (\$p\$/50 billion). Sale of produce from hunting (including snail collection) brings a total of \$p\$/51 billion, sale of fruits/berries and others yields \$p\$/66 billion and the sale of eggs amounts to a further \$p\$/54.0 billion. Relatively small amounts are received from sales from other agricultural produce, such as honey, mushrooms, hides, wool and skins.

## 7.5 Agricultural inputs

Table 7.11 provides a summary of results on various costs involved in producing crops and costs in raising livestock. The figures are projected to the national level. More than half (about 1.8 million) of households, which cultivated crops in the last 12 months, hired labour on their farms, and over half (1.9 million) of them spent money on hand tools. Other farm inputs, which many agricultural households spend money on, are seeds, bags, containers, strings and fertilizers. In all, a total of about ¢358 billion was spent on crop inputs in the 12 months preceding the interview. Hired labour (¢166 billion) represented almost half (46%) of this total cost; other important items, in terms of cost were purchased seeds (¢30 billion), hand tools (¢24 billion being spent on locally made hand tools, and ¢2 billion cedis on imported hand tools), inorganic fertilizer (¢25 billion), organic fertilizer (¢16 billion) and transport of crops (¢15 billion). Renting of equipment also cost about ¢15 billion to agricultural households.

Most of the households who used fertilizers, insecticides, herbicides and others, obtained the items mainly from the private sector. The percentage supplied by the private sector ranged from 53 percent in the case of insecticides to 99 percent in the case of renting animals (Table 7.11).

Table 7.11 Availability and cost of purchasing farm inputs

|   | Estimated no. of households | Amount spent    | Percent ob<br>Item fr |                 | Percent reporting |
|---|-----------------------------|-----------------|-----------------------|-----------------|-------------------|
|   | purchasing                  | per year        | Private               | Ministry of     | that item is      |
|   | in last                     | (cash & kind)   | sector                | Agriculture     | sometimes         |
| Input                                     | 12 months                   | (cash & kind)   | (%)                   | Agriculture (%) | unavailable       |
| mput                                      | 12 1110111113               | (billion cedis) | (70)                  | (70)            | unavanaoic        |
| Crop inputs                               |                             | 358.2           |                       |                 |                   |
| Fertilizer (inorganic)                    | 372,000                     | 25.3            | 72.6                  | 21.0            | 14                |
| Organic fertilizer                        | 186,000                     | 16.4            | 80.2                  | 16.5            | 23                |
| Insecticides                              | 447,000                     | 26.7            | 53.1                  | 39.9            | 22                |
| Herbicides                                | 106,000                     | 6.8             | 63.9                  | 31.6            | 8                 |
| Storage of crops                          | 147,000                     | 3.0             | 05.7                  | 31.0            | O                 |
| Purchased seed                            | 92,000                      | 30.3            | 79.6                  | 9.6             | 16                |
| Irrigation                                | 6,000                       | 0.8             | 77.0                  | 7.0             | 10                |
| Bags, containers, strings                 | 724,000                     | 10.6            | 96.7                  | 1.1             | 14                |
| Petrol/diesel/oil                         | 207,000                     | 3.2             | 70.7                  | 1.1             | 12                |
| Spare parts                               | 28,000                      | 4.8             | 89.5                  | 5.3             | 26                |
| Hired labour                              | 1,854,000                   | 165.9           | 07.5                  | 5.5             | 18                |
| Transport of crops                        | 300,000                     | 15.2            |                       |                 | 10                |
| Renting animal                            | 100,000                     | 3.0             | 99.3                  | _               | 5                 |
| Renting equipment                         | 198,000                     | 15.4            | ,,,,                  |                 | 34                |
| Hand tools (local)                        | 1,931,000                   | 24.3            |                       |                 | 5                 |
| Hand tools (imported)                     | 160,000                     | 1.8             |                       |                 | J                 |
| Repairs/maintenance                       | 70,000                      | 0.8             |                       |                 |                   |
| Other crop cost                           | 139,000                     | 3.9             |                       |                 |                   |
| Livestock inputs                          |                             | <u>38.7</u>     |                       |                 |                   |
| Animal feed (inc. salt)                   | 151,000                     | 8.9             | 79.1                  | 14.5            | 12                |
| Veterinary services/medicine              | 381,000                     | 7.2             | 22.5                  | 76.5            | 22                |
| Paid labour for herding                   | 52,000                      | 7.3             |                       |                 | 20                |
| Maintenance of pens/stables               | 203,000                     | 4.8             |                       |                 | 4                 |
| Transport of animal feed                  | 24,000                      | 0.7             |                       |                 |                   |
| Commission on sale of animals             | 47,000                      | 0.5             |                       |                 |                   |
| Compensation for damage caused by animals | 203,000                     | 4.9             |                       |                 |                   |
| Other livestock costs                     | 20,000                      | 0.2             |                       |                 |                   |
| Hired labour                              | 10,000                      | 4.3             |                       |                 | 9                 |
| Fish inputs                               |                             | <u>81.0</u>     |                       |                 |                   |
| Fuel                                      | 8,000                       | 31.5            | 70.0                  |                 | 30                |
| Hired labour                              | 19,000                      | 27.3            |                       |                 | 24                |
| Spare parts                               | 8,000                       | 11.8            | 77.8                  |                 | 22                |
| Repair & maintenance                      | 48,000                      | 7.9             | 92.3                  |                 | 19                |
| Hiring equipment                          | 4,000                       | 1.3             | 100.0                 |                 | 100               |
| Other inputs                              | 11,000                      | 81.0            | 100.0                 |                 | 21                |

In respect of livestock inputs, about  $$\phi 39$$  billion was spent in the previous 12 months, with the major items in terms of cost being animal feed, paid labour and veterinary services (accounting for  $$\phi 9$$  billion,  $$\phi 7$$  billion and  $$\phi 7$$  billion respectively). Animal feed is normally obtained from the private sector, while the Ministry of Food and Agriculture normally provides veterinary services.

### 7.6 Home processing of agricultural produce

Detailed information on processing of crops or smoking of fish is presented in Table 7.12. Unlike the previous section, estimates in this section include both agricultural and non-agricultural households. In all, almost 2.5 million households in the country, representing about 61 percent of all households, are involved in crop processing or the smoking of fish. Almost 40% of urban households and 75% of rural households are engaged in processing. In rural forest and rural savannah the proportion engaged in processing of agricultural produce is higher than the proportion in rural coastal. In each of the three ecological zones it is women who have the prime responsibility for the processing of agricultural produce or fish; in all localities more than four-fifths of those involved in processing were found to be women.

Table 7.12 Distribution of households processing crops or fish for sale or use by the household, by locality

|                |            | Households processing crops or fish for sale or use by the household |                |  |  |  |  |
|----------------|------------|--|----------------|--|--|--|--|
| Locality       | Percentage | Estimated number   | for processing |  |  |  |  |
| Urban areas    | 38         | 557,000  | 89             |  |  |  |  |
| Rural areas    | 75         | 1,932,000  | 90             |  |  |  |  |
| Rural coastal  | 60         | 355,000  | 85             |  |  |  |  |
| Rural forest   | 72         | 970,000  | 90             |  |  |  |  |
| Rural savannah | 93         | 607,000  | 92             |  |  |  |  |
| Ghana          | 61         | 2,489,000  | 90             |  |  |  |  |

The main activities (shown in Table 7.13) are the processing of maize flour (undertaken by 50 percent of households and spread across all three main ecological zones), the processing of flour from other grains, and the processing of cassava flour (involving 44,000 households, living mainly in the rural savannah and rural forest zones). Other major food processing activities include the processing of shelled groundnuts, husking and polishing of rice and the preparation of gari.

Virtually every household that reported that they had engaged in a processing activity during the previous 12 months, had actually done some processing during the two weeks immediately preceding the interview. Total annual labour costs (in cash and in kind, including the time spent on these activities by the household members themselves) are estimated at &ppeq220 billion, while other costs are &ppeq409 billion. In many cases the households themselves had produced the agricultural item being processed originally, but in a few instances (especially for home-brewed drink and fish) the raw materials are purchased or obtained from other sources.

Total annual sales of home-processed agricultural items and smoked fish amount to about \$\psi 1,283\$ billion. Home brewed drink, processed fish, gari and other nuts are the items that were frequently processed during the two-week period. These were also the ones that were most likely to be sold in the previous two weeks of the interview. In contrast, very few of those who processed flour, rice or shelled groundnuts reported that they sold any in the previous two weeks (Table 7.13).

Table 7.13 Estimated number of households processing various agricultural items, value of labour and other inputs, percentage selling the items, and estimated annual value of sales

|                            | Estimated no.    | Estimated       | Estimated       | Percent    | Estimated       |
|----------------------------|------------------|-----------------|-----------------|------------|-----------------|
|                            | of households    | annual value    | annual          | selling    | annual          |
|                            | processing       | of labour       | value of        | the item   | value           |
|                            | item in the last | costs           | other           | in the     | of              |
| Item processed/transformed | 12 months        |                 | costs           | last 2 wks | sales           |
|                            |                  | (billion cedis) | (billion cedis) |            | (billion cedis) |
| Maize flour                | 2,014,000        | 67.1            | 95.8            | 5          | 256.1           |
| Flour from other grains    | 103,000          | 17.4            | 67.5            | 4          | 102.5           |
| Husked/polished rice       | 22,000           | 10.0            | 30.7            | 5          | 90.3            |
| Home brewed drink          | 9,000            | 8.5             | 10.4            | 45         | 56.4            |
| Cassava flour              | 44,000           | 12.8            | 20.8            | 6          | 31.2            |
| Shelled groundnut          | 20,000           | 9.3             | 4.9             | 3          | 24.5            |
| Processed fish             | 71,000           | 39.1            | 96.4            | 48         | 386.0           |
| Gari                       | 70,000           | 7.3             | 2.7             | 17         | 34.2            |
| Shea butter                | 3,000            | 14.6            | 5.2             | 20         | 38.5            |
| Other nuts                 | 59,000           | 10.6            | 16.3            | 26         | 61.4            |
| Other                      | 74,000           | 23.3            | 58.7            | 18         | 202.2           |
| Any/all items              |                  | 220.1           | 409.3           |            | 1,283.2         |

## 7.7 Home consumption of own produce

The survey collected detailed information on all home-produced food, which was consumed by the household itself. Starting from the second visit by the interviewer, the household was asked to indicate how much of each home-produced item they had consumed since the interviewer's previous visit. As expected, for many households, particularly in rural areas, a large proportion of the food consumed comes from their own produce.

The quantities consumed of each item of home-produced food were stated in units chosen by the respondent, who was then asked to state, for each item, how much they could now sell one unit for. These prices, which can be regarded as being farm-gate prices, were then used to value the household's consumption of home-produced food.

On average, relative to March 1999 prices, each household in Ghana consumed a quantity of home-produced food which was valued at about ¢424,000 annually (Table 7.14). This works out to about ¢98,000 annually on a per capita basis, or ¢1,700 billion if projected to the national level

Roots and tubers account for about sixty percent of the total value of home consumption. The other food subgroups, which feature prominently in home consumption, are cereals and cereal products (14%), vegetables (7%), and pulses and nuts (5%). Appendix Table A7.1 gives the detailed breakdown of home consumption of different food items, while Appendix Table A7.2 gives the percentage of households in different localities who reported that they had consumed each home-produced item in the previous 12 months.

Table 7.14 Value of average annual household and per capita consumption of home-produced food, and estimate of total national value, by food subgroup

|                              | Consun         | nption of food produc | ed by the household itsel | f            |
|------------------------------|----------------|-----------------------|---------------------------|--------------|
|                              | Average annual | Average annual        | Estimated value           | Percentage   |
|                              | household      | per capita            | of national               | distribution |
| GROUP                        | consumption    | consumption           | annual consumption        |              |
|                              | (cedis)        | (cedis)               | (billion cedis)           | %            |
| 1. Food & Beverages          | 424,105        | 98,387                | 1,717                     | 99.5         |
| Cereals and cereal products  | 61,194         | 14.196                | 249                       | 14.4         |
| Roots and tubers             | 253,508        | 58,810                | 1,032                     | 59.8         |
| Pulses and nuts              | 22,367         | 5,189                 | 91                        | 5.3          |
| Vegetables                   | 30,466         | 7,068                 | 124                       | 7.2          |
| Fruits                       | 4,466          | 1,036                 | 18                        | 1.1          |
| Oils and animal fats         | 3,839          | 891                   | 16                        | 0.9          |
| Meat                         | 14,862         | 3,448                 | 60                        | 3.5          |
| Poultry and poultry products | 12,135         | 2,815                 | 49                        | 2.9          |
| Fish                         | 19,310         | 4,480                 | 79                        | 4.6          |
| Milk and milk products       | 39             | 9                     | 0                         | 0.0          |
| Non-alcoholic beverages      | 3              | 1                     | 0                         | 0.0          |
| 2. Alcohol & Tobacco         | 1,575          | 368                   | 8                         | 0.5          |
| Alcoholic drinks             | 1,575          | 368                   | 8                         | 0.5          |
| All Home Consumption         | 434,915        | 101,527               | 1,725                     | 100.0        |
| Sample size                  | 5998           | 25,855                |                           |              |

As one would expect, much of home consumption takes place in rural areas; on average, the value of home produced food consumed annually by rural households was about 603,000 around March 1999, while the corresponding figure for urban households was only 116,000 (Table 7.15). Overall, urban households, which constitute about a third of the total population, account for only ten percent of the total home-produced food consumed by households.

Table 7.15 Value of average annual household and per capita consumption of home produced food, and national estimate, for urban and rural households, by food subgroup

|                              |                | Cor            | nsumption of food produce | ed by the househ | old itself     |                |                 |              |
|------------------------------|----------------|----------------|---------------------------|------------------|----------------|----------------|-----------------|--------------|
|                              |                | Urban a        | reas                      | -                |                | Rural          | areas           |              |
|                              | Average annual | Average annual | Estimate of               | Percentage       | Average annual | Average annual | Estimate of     | Percentage   |
|                              | household      | per capita     | total annual              | distribution     | household      | per capita     | total annual    | distribution |
| GROUP                        | consumption    | consumption    | consumption               |                  | consumption    | consumption    | consumption     |              |
|                              | (cedis)        | (cedis)        | (billion cedis)           | %                | (cedis)        | (cedis)        | (billion cedis) | %            |
| 1. Food & Beverages          | 114,267        | 29,222         | 170                       | 98.8             | 600,427        | 132,187        | 1,546           | 99.6         |
| Cereals and cereal products  | 12,196         | 3,119          | 18                        | 10.5             | 89,556         | 19,716         | 231             | 14.9         |
| Roots and tubers             | 75,116         | 19,209         | 112                       | 65.0             | 356,768        | 78,544         | 919             | 59.2         |
| Pulses and nuts              | 2,885          | 738            | 4                         | 2.5              | 33,644         | 7,407          | 87              | 5.6          |
| Vegetables                   | 8,338          | 2,132          | 12                        | 7.2              | 43,274         | 9,527          | 111             | 7.2          |
| Fruits                       | 885            | 226            | 1                         | 0.8              | 6,539          | 1,440          | 17              | 1.1          |
| Oils and animal fats         | 417            | 107            | 1                         | 0.4              | 5,820          | 1,281          | 15              | 1.0          |
| Meat                         | 1,001          | 256            | 1                         | 0.9              | 22,886         | 5,038          | 59              | 3.8          |
| Poultry and poultry products | 1,948          | 498            | 3                         | 1.7              | 18,031         | 3,970          | 46              | 3.0          |
| Fish                         | 11,481         | 2,936          | 17                        | 9.9              | 23,841         | 5,249          | 61              | 4.0          |
| Milk and milk products       | 0              | 0              | -                         | 0.0              | 61             | 12             | 0               | 0.0          |
| Non-alcoholic beverages      | 0              | 0              | -                         | 0.0              | 5              | 1              | 0               | 0.0          |
| 2. Alcohol & Tobacco         | 1,378          | 352            | 2                         | 1.2              | 2,227          | 490            | 6               | 0.4          |
| Alcoholic drinks             | 1,378          | 352            | 2                         | 1.2              | 2,227          | 490            | 6               | 0.4          |
| All Home Consumption         | 115,645        | 29,574         | 172                       | 100.0            | 602,654        | 132,677        | 1,552           | 100.0        |
| Sample size                  | 2199           | 8599           |                           |                  | 3799           | 17,256         |                 |              |

The differences in value of various food items consumed by the coastal areas on one hand and the forest and savannah areas on the other hand are shown in Table 7.16. Consumption of home-produced food is more prevalent in the savannah and forest areas than it is in the coastal areas. The average annual value of home-produced food consumed by households in the savannah zone is  $$\phi 696,000$$ ; the corresponding figure for the forest zone is  $$\phi 492,000$$ , and for the coastal zone it is  $$\phi 179,000$$ .

In the coastal areas, roots and tubers account for almost two-thirds of the value of all home-produced food consumed by households, fish account for about 10 percent, while cereals and cereal products account for no more than 9 percent. Roots and tubers also account for almost three-quarters, cereals 11 percent and vegetables 7 percent of total home consumption in the forest areas.

In the savannah zone roots and tubers accounts for about two-fifths of total consumption. Pulses and nuts, and vegetables, are also common items among home consumption for households in the savannah, than for households further in the forest and coastal areas.

Table 7.16 Value of average annual household and per capita consumption of home produced food, and national estimate, by ecological zone and food subgroup

|                              |         |                | Cons         | sumption of foc | od produced by | y the househol  | d itself       |        |         |               |              |       |
|------------------------------|---------|----------------|--------------|-----------------|----------------|-----------------|----------------|--------|---------|---------------|--------------|-------|
|                              | Averag  | ge annual hous | ehold consum | ption           | Averag         | ge annual per o | capita consump | tion   |         | Percentage of | distribution |       |
| GROUP                        | Coastal | Forest         | Savannah     | Ghana           | Coastal        | Forest          | Savannah       | Ghana  | Coastal | Forest        | Savannah     | Ghana |
|                              |         | (ced           | lis)         |                 |                | (ced            | lis)           |        | %       | %             | %            | %     |
| 1. Food & Beverages          | 178,606 | 490,829        | 688,416      | 422,189         | 45,933         | 119,211         | 125,623        | 97,943 | 99.8    | 99.8          | 99.1         | 99.6  |
| Cereals and cereal products  | 16,034  | 52,210         | 159,761      | 61,194          | 4,124          | 12,681          | 29,153         | 14,196 | 9.0     | 10.6          | 23.0         | 14.4  |
| Roots and tubers             | 114,428 | 356,911        | 259,970      | 253,508         | 29,429         | 86,686          | 47,440         | 58,810 | 64.0    | 72.6          | 37.4         | 59.8  |
| Pulses and nuts              | 10,753  | 16,232         | 56,386       | 22,367          | 2,765          | 3,942           | 10,289         | 5,189  | 6.0     | 3.3           | 8.1          | 5.3   |
| Vegetables                   | 10,393  | 32,037         | 61,665       | 30,466          | 2,673          | 7,781           | 11,253         | 7,068  | 5.8     | 6.5           | 8.9          | 7.2   |
| Fruits                       | 1,801   | 7,100          | 3,112        | 4,466           | 463            | 1,724           | 568            | 1,036  | 1.0     | 1.4           | 0.4          | 1.1   |
| Oils and animal fats         | 1,611   | 4,683          | 5,786        | 3,839           | 414            | 1,137           | 1,056          | 891    | 0.9     | 1.0           | 0.8          | 0.9   |
| Meat                         | 1,120   | 6,372          | 57,903       | 14,862          | 288            | 1,548           | 10,566         | 3,448  | 0.6     | 1.3           | 8.3          | 3.5   |
| Poultry and poultry products | 3,548   | 12,835         | 25,417       | 12,135          | 912            | 3,117           | 4,638          | 2,815  | 2.0     | 2.6           | 3.7          | 2.9   |
| Fish                         | 18,918  | 2,436          | 58,236       | 19,310          | 4,865          | 592             | 10,627         | 4,480  | 10.6    | 0.5           | 8.4          | 4.6   |
| Milk and milk products       | 0       | 13             | 164          | 39              | 0              | 3               | 30             | 9      | 0.0     | 0.0           | 0.0          | 0.0   |
| Non-alcoholic beverages      | -       | 0              | 16           | 3               | -              | 0               | 3              | 1      | -       | 0.0           | 0.0          | 0.0   |
| 2. Alcohol & Tobacco         | 215     | 839            | 7,301        | 1,916           | 55             | 204             | 1,332          | 444    | 0.1     | 0.2           | 1.0          | 0.5   |
| Alcoholic drinks             | 215     | 839            | 7,301        | 1,916           | 55             | 204             | 1,332          | 444    | 0.1     | 0.2           | 1.0          | 0.5   |
| All Home Consumption         | 178,820 | 491,668        | 695,717      | 424,105         | 45,989         | 119,416         | 126,956        | 98,387 | 100.0   | 100.0         | 100.0        | 100.0 |
| Sample size                  | 2078    | 2720           | 1200         | 5998            | 8080           | 11199           | 6576           | 25855  |         |               |              |       |

Table 7.17 shows, for each region, the percentage distribution of the value of home produced food across food subgroups. It highlights the differences in home consumption between the south and the north of the country; in particular, in the two upper northern regions (Upper West and Upper East Regions), which fall entirely within the savannah ecological zone, cereals and cereal products account for a larger share of home consumption than do roots and tubers.

Households in the Upper East Region also make greater use of pulses and nuts, and vegetables, taken from their own production. There is even balance between roots and tubers on one hand, and cereals and cereal products on the other hand in terms of their share of consumption of own-produce in the Northern Region. Each group accounts for about a quarter of total home consumption in the region. Other important sub-groups are meat (20%), vegetables (11%), and pulses and nuts (10%).

Table 7.17 Distribution of consumption of own produce across food subgroups, by region (percent)

|  |                           |                          | Greater               |                           |                           |                          | Brong                     |                           | Upper                   | Upper                   |                            |
|--|---------------------------|--------------------------|-----------------------|---------------------------|---------------------------|--------------------------|---------------------------|---------------------------|-------------------------|-------------------------|----------------------------|
|  | Western                   | Central                  | Accra                 | Volta                     | Eastern                   | Ashanti                  | Ahafo                     | Northern                  | West                    | East                    | Ghana                      |
|  | %                         | %                        | %                     | %                         | %                         | %                        | %                         | %                         | %                       | %                       | %                          |
| Cereals & cereal products  | 6.9                       | 8.7                      | 5.4                   | 17.2                      | 10.1                      | 10.2                     | 9.2                       | 27.9                      | 61.0                    | 51.3                    | 14.4                       |
| Roots & tubers   | 76.0                      | 63.8                     | 27.4                  | 43.5                      | 73.4                      | 76.1                     | 74.3                      | 22.8                      | 3.4                     | 1.3                     | 59.8                       |
| Pulses & nuts  | 2.9                       | 4.4                      | 1.4                   | 4.5                       | 5.9                       | 2.0                      | 3.2                       | 10.4                      | 9.3                     | 24.1                    | 5.3                        |
| Vegetables   | 5.4                       | 8.0                      | 1.1                   | 7.2                       | 4.1                       | 6.9                      | 9.7                       | 10.5                      | 5.8                     | 11.3                    | 7.2                        |
| Fruits   | 1.4                       | 1.5                      | 0.0                   | 0.4                       | 1.2                       | 1.2                      | 1.5                       | 0.0                       | 3.1                     | -                       | 1.1                        |
| Oils & animal fats   | 0.8                       | 1.6                      | -                     | 0.1                       | 1.2                       | 1.1                      | 0.1                       | 1.1                       | 6.6                     | 0.0                     | 0.9                        |
| Meat   | 1.5                       | 1.4                      | 0.0                   | 0.2                       | 1.6                       | 0.6                      | 0.6                       | 19.8                      | 0.2                     | 0.0                     | 3.5                        |
| Poultry & poultry products   | 3.2                       | 4.2                      | 4.2                   | 1.9                       | 2.0                       | 1.5                      | 1.4                       | 5.2                       | 1.3                     | 11.2                    | 2.9                        |
| Fish   | 1.6                       | 6.2                      | 60.5                  | 25.0                      | 0.4                       | 0.1                      | -                         | 1.0                       | -                       | -                       | 4.6                        |
| Milk & milk products   | -                         | 0.0                      | -                     | 0.0                       | 0.0                       | -                        | 0.0                       | 0.1                       | -                       | 0.0                     | 0.0                        |
| Non-alcoholic beverages  | -                         | -                        | -                     | 0.0                       | -                         | -                        | -                         | -                         | 0.0                     | -                       | 0.0                        |
| Alcoholic drinks   | 0.3                       | 0.2                      | -                     | 0.0                       | 0.1                       | 0.3                      | 0.0                       | 1.2                       | 9.2                     | 0.8                     | 0.5                        |
| Total  | 100.0                     | 100.0                    | 100.0                 | 100.0                     | 100.0                     | 100.0                    | 100.0                     | 100.0                     | 100.0                   | 100.0                   | 100.0                      |
| Average household consumption<br>Average per capita consumption<br>Total consumption | 695,044<br>147,946<br>301 | 282,486<br>85,565<br>134 | 24,588<br>6,888<br>14 | 489,326<br>104,008<br>212 | 534,490<br>136,409<br>297 | 302,420<br>73,744<br>217 | 670,697<br>160,896<br>246 | 953,020<br>129,614<br>233 | 383,616<br>55,064<br>31 | 220,972<br>49,147<br>39 | 424,105<br>98,387<br>1,725 |
| Sample size  | 639                       | 700                      | 859                   | 640                       | 820                       | 1060                     | 540                       | 360                       | 120                     | 260                     | 5,998                      |
| Households reporting consumption   | 419                       | 537                      | 58                    | 530                       | 639                       | 758                      | 455                       | 318                       | 115                     | 246                     | 4,075                      |

#### 8 NON-FARM ENTERPRISES

#### 8.1 Characteristics of non-farm enterprises

Apart from agricultural data, detailed information was also collected on all non-farm enterprises or businesses operated by households. Respondents were asked whether, during the previous 12 months, any household member had operated his or her own business or trade, or worked as a self-employed professional or craftsman or fisherman. If they did, details were collected of the type of activity undertaken, and the person in the household who was responsible for that activity. Up to three activities were listed in order of importance, in terms of how much money they brought into the household. Detailed information was then collected for these business activities, covering basic background information about how the business was operated, the expenditures incurred, the assets of each business, the revenues received, and estimates of net income and inventory of each business.

Approximately 1.9 million households in Ghana, representing 49 percent of all households, operate a non-farm enterprise of one sort or another (Table 8.1). Because some households have more than one business activity, the total number of businesses operated is somewhat higher (about 2.3 million). Restricting the collection of information to the first three enterprises operated by each household did not lead to the loss of any appreciable amount of information, since very few households undertake more than three activities.

It is significant to note that women play a major role in operating many of these businesses. Asked to identify the household member who knew most about each activity, respondents reported a female member of the household in two cases out of every three. Where a male member of the household is involved in a non-farm enterprise, it is nearly always the head of household; in half the cases where a female is responsible, the person is the wife of the head of household, while in most of the other cases the person is herself the head of household.

In terms of type of household activity, manufacturing and trading account for 80 percent of all non-farm businesses, with trading outnumbering manufacturing by 2 to 1. In total, there were about 550,000 household manufacturing enterprises, 1.3 million trading enterprises, and 460,000 other types of enterprise.

| Table 8.1 | Basic Chara | ecteristics of | t non-tarm | enterprises |
|-----------|-------------|----------------|------------|-------------|
|-----------|-------------|----------------|------------|-------------|

|                | Proportion of households | Estimated number of households |                |                 |              |              | Proportion operated by females |
|----------------|--------------------------|--------------------------------|----------------|-----------------|--------------|--------------|--------------------------------|
|                | operating a              | operating a                    | Estimated numb | er of businesse | s operated b | y industrial | ,                              |
|                | business                 | business                       | classification |                 | •            | •            |                                |
| Locality       |                          |                                | M'facturing    | Trading         | Others       | Total        | •                              |
| Accra          | 61.8                     | 250,000                        | 50,000         | 190,000         | 60,000       | 300,000      | 64.5                           |
| Other Urban    | 54.4                     | 590,000                        | 160,000        | 410,000         | 150,000      | 710,000      | 70.9                           |
| Rural Coastal  | 56.2                     | 330,000                        | 120,000        | 240,000         | 50,000       | 420,000      | 70.8                           |
| Rural Forest   | 46.2                     | 540,000                        | 130,000        | 330,000         | 170,000      | 630,000      | 63.7                           |
| Rural Savannah | 31.6                     | 200,000                        | 80,000         | 120,000         | 30,000       | 220,000      | 54.9                           |
| Ghana          | 49.0                     | 1,910,000                      | 550,000        | 1,290,000       | 460,000      | 2,300,000    | 66.3                           |

One eighth of the non-farm enterprises operated by the households stated that their businesses had been registered with a government agency. Information collected on the most difficult factors affecting the establishment of non-farm enterprises clearly showed that the major problem is lack of credit or capital to start with. About 60 percent of the respondents cited capital or credit as the most limiting factor for their enterprises. Only 3 percent identified technical know-how as their major drawback, while less than 1 percent attributed their difficulty to government regulation. Over a third (35%) of the enterprises were operating without any difficulty.

Most of the enterprises were set up with household savings, assistance from relatives or friends and proceeds from family farm. In all, less than half (46%) of the enterprises were set up with household savings, and about a third of them were established with loans from relatives. Proceeds from family farms accounted for about 2 percent. Other sources of funding include proceeds from non-farm enterprises (2.4%), remittances from abroad (0.9%), income from family property, and other sources of social support including NGOs, District Assemblies, solidarity associations and church assistance.

As to whether in the previous 12 months any of the households had tried to obtain financial assistance from any bank or other financial institution, it was observed that majority of enterprises (93%) did not. Five percent of the enterprises had tried to obtain assistance but had been unsuccessful; only 2 percent succeeded in obtaining credit from financial institutions.

Few enterprises rely on outside sources for their operations. Over 80 percent of enterprises did not depend on credit from any source during the previous 12 months. Of the remainder, 8 percent relied on family and friends and 6 percent utilized proceeds from their operations, while 1 percent used credit from a bank or financial institution. For those enterprises that utilised a credit facility, from whatever source, the loans during the 12-month period ranged from ¢1000 to almost ¢6 million. Almost half of the enterprises (45%) appeared not to have repaid any part of their loans (including in-kind payments) in the previous 12 months.

#### 8.2 Expenditure inputs, assets, revenues, and net income

Detailed information was also collected on the value of different inputs to non-farm enterprises. Table 8.2 shows the detailed breakdown of expenditure inputs, separately for enterprises engaged in manufacturing, trading or other activities; the latter group covers a wide variety of activities and it is therefore difficult to interpret the significance of the average values obtained. On average, households spend about ¢3.4 million annually on inputs for non-farm household enterprises. Trading enterprises spend 4.3 million cedis, while expenditures on manufacturing enterprises average ¢2.3 million.

More than 80 percent of expenditures on trading is spent on articles purchased for resale. Expenditures on raw materials constitute the largest component among the manufacturing items accounting for almost two-thirds of the total value of inputs. Also shown in Table 8.2 are estimates of the total value of all inputs to household non-farm enterprises. More than &ppercent epsilon billion worth of inputs are used for these businesses annually; about &ppercent epsilon billion worth of inputs are used for trading establishments, &ppercent epsilon billion for manufacturing enterprises, and the remaining &ppercent epsilon billion for other types of non-farm enterprises.

Table 8.2 Expenditure on inputs to non-farm enterprises

|                          | Average annu  | al expenditure on in | put per enterprise | (cedis)      | Estimat       | ed national annual | value of inp | uts          |
|--------------------------|---------------|----------------------|--------------------|--------------|---------------|--------------------|--------------|--------------|
|                          | Туре          | of business activity |                    | All non-farm | Type of       | business activity  |              | All non-farm |
|                          | Manufacturing | Trading              | Other              | enterprises  | Manufacturing | Trading            | Other        | enterprises  |
| Expenditures item        |               | (cedis)              |                    |              | (1            | billion cedis)     |              |              |
| Hired labour             | 266,700       | 47,600               | 344,500            | 159,100      | 146           | 61                 | 158          | 365          |
| Raw materials            | 1,314,900     | 204,800              | 460,600            | 519,900      | 718           | 264                | 212          | 1194         |
| Spare parts              | 91,100        | 64,600               | 273,800            | 112,800      | 50            | 83                 | 126          | 259          |
| Articles for resale      | 154,700       | 3,638,000            | 331,800            | 2,147,900    | 84            | 4694               | 153          | 4931         |
| Rental of land/buildings | 7,000         | 9,500                | 15,500             | 10,200       | 4             | 12                 | 7            | 23           |
| Rental of machinery      | 14,600        | 500                  | 17,100             | 7,200        | 8             | 1                  | 8            | 16           |
| Maintenance/repairs      | 17,100        | 2,800                | 67,500             | 19,200       | 9             | 4                  | 31           | 44           |
| Rental of vehicles       | 22,300        | 24,500               | 8,300              | 20,800       | 12            | 32                 | 4            | 48           |
| Oil and fuel             | 137,600       | 15,100               | 391,600            | 119,600      | 75            | 20                 | 180          | 275          |
| Other transport          | 41,300        | 150,300              | 46,100             | 103,500      | 23            | 194                | 21           | 238          |
| Electricity              | 20,600        | 6,400                | 33,300             | 15,200       | 11            | 8                  | 15           | 35           |
| Water                    | 13,900        | 6,700                | 28,000             | 12,600       | 8             | 9                  | 13           | 29           |
| Taxes                    | 27,800        | 31,800               | 34,900             | 31,500       | 15            | 41                 | 16           | 72           |
| Other expenses           | 131,400       | 53,600               | 78,900             | 77,100       | 72            | 69                 | 36           | 177          |
| Total expenditure        | 2,261,000     | 4,256,300            | 2,132,000          | 3,356,600    | 1,234         | 5,492              | 980          | 7,706        |
| Sample size              | 805           | 1903                 | 678                | 3386         |               |                    |              |              |

Table 8.3 shows the sources of revenue for non-farm enterprises, and how the income was allocated. On average non-farm enterprises received over ¢4 million annually; trading and other enterprises tended to receive more on average than manufacturing enterprises. Almost all the revenue was received in the form of cash. For the country as a whole, the total amount received was about ¢9,750 billion. Of the income distribution, the largest share (¢731,800 on average) went to the household itself; each enterprise saved on average ¢248,000 per annum on its operations, while smaller amounts went to other households or were used for other purposes.

Information was collected on the fixed assets owned by the non-farm businesses, such as buildings, land, equipment, tools or machinery, and vehicles of various kinds. An attempt was then made to estimate the element of depreciation involved. For this purpose the value of buildings and equipment/tools/machinery was assumed to depreciate by 11 percent per annum geometrically, while land was assumed not to lose value; vehicles were assumed to depreciate by 40 percent per annum, and other items by 32 percent.

Table 8.3 Sources of revenue, and allocation of income, from non-farm enterprises

|                              | Av            | verage revenue per ent    | terprise (cedis) |             | Estimated                 | national revenue ( | (billion cedis) | )               |
|------------------------------|---------------|---------------------------|------------------|-------------|---------------------------|--------------------|-----------------|-----------------|
|                              | Туре          | Type of business activity |                  |             | Type of business activity |                    |                 | All<br>non-farm |
|                              | Manufacturing | Trading                   | Other            | enterprises | Manufacturing             | Trading            | Other           | enterprises     |
| Sources of revenue           |               |                           |                  |             |                           |                    |                 |                 |
| Cash received                | 2,684,800     | 4,823,500                 | 2,867,900        | 3,923,900   | 1,553                     | 6,538              | 1,365           | 9,456           |
| Receipts as goods & services | 8,700         | 2,300                     | 11,700           | 5,700       | 5                         | 3                  | 6               | 14              |
| Home consumption of output   | 81,900        | 147,600                   | 48,200           | 112,200     | 47                        | 200                | 23              | 270             |
| Income from rentals          | 300           | 5,400                     | 3,500            | 3,800       | 0                         | 7                  | 2               | 9               |
| Total                        | 2,775,700     | 4,978,800                 | 2,931,300        | 4,045,600   | 1,605                     | 6,748              | 1,396           | 9,749           |
| Allocation of income         |               |                           |                  |             |                           |                    |                 |                 |
| Own household                | 638,600       | 698,000                   | 941,300          | 731,800     | 369                       | 946                | 448             | 1,764           |
| Other households             | 26,200        | 27,900                    | 65,000           | 31,800      | 15                        | 38                 | 31              | 84              |
| Savings                      | 171,400       | 243,800                   | 352,700          | 248,000     | 99                        | 331                | 168             | 598             |
| Other purposes               | 43,800        | 69,200                    | 100,100          | 69,200      | 25                        | 94                 | 48              | 167             |
| Total                        | 880,000       | 1,038,900                 | 1,459,100        | 1,080,800   | 508                       | 1409               | 695             | 2,613           |

Overall, each non-farm enterprise experienced an annual depreciation in its assets of about  $\&pperceit{2}30,000$  (Table 8.4). Manufacturing enterprises recorded on average annual depreciation of  $\&pperceit{6}160,000$  of their assets, while that of trading enterprises depreciated by about  $\&pperceit{6}150,000$ . The major depreciation of assets, averaging about  $\&pperceit{6}560,000$  per annum occurred with the 'other' businesses, principally due to the assumed depreciation in the value of cars used by enterprises in the transport sector. Overall, there is an estimated total depreciation of assets of about  $\&pperceit{6}540$  billion a year, with almost  $\&pperceit{6}260$  billion of this amount being accounted for by the relatively small number of 'other' non-farm enterprises.

Table 8.4 Estimates of depreciation for assets of non-farm enterprises

|                           | Average a     | nnual depreciation p | per enterprise (ce | dis)         | Estimated annual depreciation (billion cedis) |         |       |              |  |
|---------------------------|---------------|----------------------|--------------------|--------------|---|---------|-------|--------------|--|
|                           | Type o        | f business activity  |                    | All non-farm | Type of business activity                     |         |       | All non-farm |  |
|                           | Manufacturing | Trading              | Other              | enterprises  | Manufacturing                                 | Trading | Other | enterprises  |  |
| Asset                     |               |                      | _                  | ·            |   |         |       | _            |  |
| Buildings                 | 44,100        | 30,100               | 52,300             | 37,900       | 24  | 39      | 24    | 87           |  |
| Lands                     | 0             | 0                    | 0                  | 0            | 0   | 0       | 0     | 0            |  |
| Machines/Equipments/Tools | 30,400        | 2,400                | 43,000             | 17,200       | 17  | 3       | 20    | 40           |  |
| Bicycles                  | 1,700         | 1,400                | 5,700              | 2,300        | 1   | 2       | 3     | 5            |  |
| Carts                     | 0             | 0                    | 500                | 100          | 0   | 0       | 0     | 0            |  |
| Cars                      | 34,200        | 48,700               | 313,900            | 98,400       | 19  | 63      | 144   | 226          |  |
| Boats                     | 0             | 100                  | 0                  | 100          | 0   | 0       | 0     | 0            |  |
| Other vehicles            | 26,700        | 52,900               | 125,300            | 61,200       | 15  | 68      | 58    | 140          |  |
| Other                     | 25,400        | 13,900               | 17,300             | 17,300       | 14  | 18      | 8     | 40           |  |
| Total                     | 162,600       | 149,700              | 558,100            | 234,500      | 90  | 193     | 257   | 538          |  |

Table 8.5 provides a summary balance sheet for manufacturing, trading, and 'other' non-farm enterprises. The analysis of the figures suggests some discrepancy in reported incomes and/or expenditures; incomes appear to be underreported or the expenditures overreported. This means that, after allowing for expenditure on inputs and for depreciation, there should be very little left over from income for distribution, but the reported figure for disposed income suggests otherwise.

The average annual income reported by non-farm enterprises was  $$^{$}4,045,600$$ , while expenditures on inputs were  $$^{$}3,356,600$  and depreciation was estimated at  $$^{$}234,500$$ ; this leaves only  $$^{$}454,500$$  for distribution, yet on average businesses reported distribution of  $$^{$}4,080,800$ . The figures presented in this section should therefore be treated with caution, but they may nonetheless provide some useful indicators of general trends.

Table 8.5 Summary of incomes and expenditures for non-farm enterprises

|                        |                           | Estimated national amount (billion cedis) |           |              |                           |       |       |              |
|------------------------|---------------------------|---|-----------|--------------|---------------------------|-------|-------|--------------|
|                        | Type of business activity |   |           | All non-farm | Type of business activity |       |       | All non-farm |
|                        | Manufacturing             | Trading                                   | Other     | enterprises  | Manufacturing Trading     |       | Other | enterprises  |
| Income received        | 2.775.700                 | 4.978.800                                 | 2.931.300 | 4.045.600    | 1,605                     | 6,748 | 1,396 | 9,749        |
| Expenditure on inputs  | 2,261,000                 | 4,256,300                                 | 2,132,000 | 3,356,600    | 1,234                     | 5,492 | 980   | 7,706        |
| Depreciation of assets | 162,600                   | 149,700                                   | 558,100   | 234,500      | 90                        | 193   | 257   | 538          |
| Disposal of income     | 880,000                   | 1,038,900                                 | 1,459,100 | 1,080,800    | 508                       | 1409  | 695   | 2,613        |

# 9. TOTAL HOUSEHOLD INCOME AND EXPENDITURE AND THEIR COMPONENTS

# 9.1 Total household expenditure

The survey methodology enables the derivation of estimates of total income and total expenditure for each household covered in the survey, together with estimates of all key components of the totals, as set out in Appendix 2. As described at the beginning of this report, the 25,855 individuals covered in GLSS 4 were ranked into five quintiles on the basis of total expenditure (both actual and imputed) per capita.

The average annual household expenditure and per capita expenditure, for each quintile, is shown in Table 9.1. Average annual household expenditure, relative to March 1999 prices, was \$\psi 4,244,000\$ while average annual per capita expenditure was \$\psi 987,000\$ for the same period. At the exchange rate of about \$\psi 2,394\$ to the US dollar prevailing in March 1999, these figures correspond to about US\$1,773 and US\$412, respectively.

Looking at the differences across the quintiles, Table 9.1 shows that the average annual household expenditure in the fifth quintile ( $\phi$ 6,422,000) was more than thrice that in the first quintile ( $\phi$ 1,658,000). Households in the first quintile, however, had an average household size of almost 6 persons, while those in the top quintile had an average of almost 3 persons. As a result of this difference, the contrast in per capita expenditure between quintiles is very marked, with the average annual per capita expenditure for those in the fifth quintile ( $\phi$ 2,293,000) being more than eight times that of the average in the first quintile ( $\phi$ 281,000). The net result of these differences is that the 20 percent of the individuals in the lowest quintile have only 5.7% of total expenditure, while the top 20 percent have almost 46% of total expenditure.

Table 9.1 Mean annual household and per capita expenditure, by quintile group

|                | Mean annual household | Mean annual per<br>capita<br>expenditure*<br>(cedis) | Percentage shares |        |        | Mean<br>household | Sample size     |        |
|----------------|-----------------------|--|-------------------|--------|--------|-------------------|-----------------|--------|
| Quintile group | expenditure (cedis)   |  | Hhlds             | Person | s Exp. | Size              | Hhold s Persons |        |
|                | (•••••)               |  | %                 | %      | %      |                   |                 |        |
| Lowest         | 1,658,000             | 281,000  | 14.7              | 20.0   | 5.7    | 5.9               | 919             | 5,170  |
| Second         | 2,747,000             | 509,000  | 15.9              | 20.0   | 10.3   | 5.4               | 1004            | 5,152  |
| Third          | 3,538,000             | 737,000  | 18.1              | 20.1   | 15.0   | 4.8               | 1139            | 5,184  |
| Fourth         | 4,655,000             | 1,135,000  | 21.1              | 20.0   | 23.2   | 4.1               | 1261            | 5,177  |
| Highest        | 6,422,000             | 2,293,000  | 30.3              | 20.0   | 46.0   | 2.8               | 1675            | 5,171  |
| All            | 4,244,000             | 987,000  | 100.0             | 100.0  | 100.0  | 4.3               | 5,998           | 25,855 |

Note: Mean per capita expenditure is equal to total household expenditure divided by total number of persons in the household; it can be obtained by dividing mean household expenditure by mean household size.

The relative position of individual regions can be obtained by comparing the average per capita expenditure for each region with the averages for other regions, and by looking at the distribution of households between the different quintiles (Table 9.2). Average per capita expenditure is highest in Greater Accra Region (\$\phi1,883,000\$ at March 1999 prices), followed by Ashanti Region (\$\phi1,221,000\$) and then Western Region (\$\phi995,000\$). All the other regions have an average per capita expenditure below the national average of \$\phi987,000\$. Each of five regions (Central, Volta, Northern, Upper West and Upper East), has an average per capita expenditure of less than half of that of Greater Accra Region (\$\phi941,000).

Greater Accra Region is better off than other regions: More than 60 % of its households fall into the highest quintile, and very few households, less than 1 %, fall into the lowest quintile. The per capita expenditure levels in Western, Ashanti and Greater Accra Regions are higher than the average, with over 51 percent of the households falling in the top two quintiles.

Table 9.2 Distribution of households in each region, by quintile, and mean annual household and per capita expenditure (Percent).

|               |      | Quintile     |            |      |      |       |                     | Mean annual per capita | Sample size |        |
|---------------|------|--------------|------------|------|------|-------|---------------------|------------------------|-------------|--------|
| Region        | 1    | 2 3<br>(Perc | 4 entages) | 5    | All  |       | expenditure (cedis) | expenditure (cedis)    | Hholds P    | ersons |
| Western       | 6.2  | 16.0         | 23.5       | 24.4 | 29.9 | 100.0 | 4,677,000           | 995,000                | 639         | 3,002  |
| Central       | 15.4 | 22.6         | 19.8       | 22.4 | 19.7 | 100.0 | 2,977,000           | 902,000                | 700         | 2,311  |
| Greater Accra | 0.6  | 3.2          | 9.2        | 26.1 | 60.9 | 100.0 | 6,777,000           | 1,883,000              | 859         | 3,070  |
| Volta         | 18.2 | 19.0         | 22.8       | 21.9 | 18.1 | 100.0 | 4,000,000           | 851,000                | 640         | 3,011  |
| Eastern       | 9.8  | 20.7         | 23.8       | 25.0 | 20.7 | 100.0 | 3,736,000           | 958,000                | 820         | 3,213  |
| Ashanti       | 7.9  | 11.2         | 14.9       | 20.6 | 45.5 | 100.0 | 5,008,000           | 1,221,000              | 1,060       | 4,347  |
| Brong Ahafo   | 8.3  | 18.2         | 23.1       | 21.2 | 29.2 | 100.0 | 3,544,000           | 844,000                | 540         | 2,251  |
| Northern      | 40.7 | 22.0         | 14.9       | 12.5 | 10.0 | 100.0 | 2,837,000           | 386,000                | 360         | 2,647  |
| Upper West    | 47.0 | 25.4         | 15.3       | 8.0  | 4.2  | 100.0 | 2,462,000           | 352,000                | 120         | 836    |
| Upper East    | 65.4 | 18.0         | 8.9        | 5.1  | 2.6  | 100.0 | 1,793,000           | 399,000                | 260         | 1,169  |
| All           | 14.7 | 15.9         | 18.0       | 21.1 | 30.3 | 100.0 | 4,244,000           | 987,000                | 5,998       | 25,855 |

Central Region appears to have the least inequality in expenditure distribution, compared to other regions; almost two-thirds of households in Central Region fall in the three middle quintiles. Central, Eastern and Volta Regions fall slightly below the national average in terms of household per capita expenditure. The poorest regions are the Northern, Upper West and Upper East, where more than 40% of the households fall in the lowest quintile (Table 9.2).

Table 9.3 gives estimates of household and per capita expenditures for different localities and ecological zones. Mean household expenditure is almost 60 percent higher in urban areas than in rural areas, while per capita expenditure is just over 80 percent higher. In the rural areas, per capita expenditure is higher in the forest zone than in the coastal zone, which in turn is higher than in the savannah zone.

In comparing the levels of expenditure between regions, localities and zones, consideration has not been given to possible price differences among different localities of the country.

Table 9.3 Mean annual household and per capita expenditure, and estimated total expenditure, for different localities and zones

|                | Mean annual household | Mean annual per capita | Estimated total | Percentage share of total | Mean<br>household | Sample size |         |
|----------------|-----------------------|------------------------|-----------------|---------------------------|-------------------|-------------|---------|
|                | expenditure           | expenditure            | annual exp.     | expenditure               | size              | Households  | Persons |
| Locality       | (cedis)               | (cedis)                | (billion cedis) |                           |                   |             |         |
| Urban          | 5,595,000             | 1,435,000              | 8,339           | 48.3                      | 3.9               | 2,199       | 8,598   |
| Accra          | 6,941,000             | 1,928,000              | 2,965           | 17.2                      | 3.6               | 620         | 2,287   |
| Other urban    | 5,054,000             | 1,264,000              | 5,374           | 31.1                      | 4.0               | 1,579       | 6,311   |
| Rural          | 3,463,000             | 769,000                | 8,916           | 51.7                      | 4.5               | 3,799       | 17,256  |
| Rural Coastal  | 3,484,000             | 850,000                | 2,190           | 12.7                      | 4.1               | 899         | 3,764   |
| Rural Forest   | 3,909,000             | 869,000                | 4,855           | 28.1                      | 4.5               | 1,940       | 8,159   |
| Rural Savannah | 2,656,000             | 521,000                | 1,871           | 10.8                      | 5.1               | 960         | 5,333   |
| All            | 4,244,000             | 987,000                | 17,255          | 100.0                     | 4.3               | 5,998       | 25,855  |

# 9.2 Components of household expenditure

The breakdown of total expenditure into its components is shown in Table 9.4. Out of the mean annual household expenditure of ¢4 million, 55 percent represents expenditure on food (45 percent in cash and 10 percent for consumption of own-produced food); exactly 2 percent is accounted for by housing costs (actual and imputed). The remaining 42 percent of total expenditure represents other non-food expenditure (36 percent in cash and 6 percent for the imputed value of non-food items used by the household).

Translated into national terms, total annual household expenditure is estimated to be about &17,256 billion. Of this amount, annual cash expenditure on food accounted for over &7,800 billion, while the annual value of own-produced food consumed by households was almost &2,000 billion. Expenditure on housing (actual and imputed) was over &300 billion. Other expenditures (actual and imputed expenditures on other non-food items) accounted for the remainder.

Table 9.4 Components of household and per capita expenditure, and estimates of total annual household expenditure

| Expenditure component                | Mean annual<br>household<br>expenditure<br>(cedis) | Mean annual per capita expenditure (cedis) | Estimated total annual expenditure (billion cedis) | Percentage distribution |  |
|--------------------------------------|--|--|--|-------------------------|--|
| Food expenditure (actual)            | 1,927,000  | 448,000                                    | 7,835  | 45.4                    |  |
| Food expenditure (imputed)           | 437,000  | 102,000                                    | 1,778  | 10.3                    |  |
| Expenditure on housing               | 84,000   | 20,000                                     | 342  | 2.0                     |  |
| Other non-food expenditure (actual)  | 1,534,000  | 357,000                                    | 6,237  | 36.1                    |  |
| Other non-food expenditure (imputed) | 262,000  | 61,000                                     | 1,065  | 6.2                     |  |
| Total                                | 4,244,000  | 987,000                                    | 17,256   | 100.0                   |  |

Note: Expenditure on housing includes both actual and imputed elements.

Table 9.5 shows the distribution of expenditure among components, for each region and for the different localities and ecological zones. Among the notable features of Table 9.5 is the greater importance of food expenditure (actual and imputed) in the overall expenditure of Ghanaian households. The region with the highest percentage of total expenditure on food (actual and imputed) is Upper West (69%) and the lowest is Greater Accra (48%). Rural households spend over 60 percent of their expenditure on food (42.6% on actual and 17.7% on imputed) whereas the urban households spend just over 50 percent of their total expenditure on food (48.4% actual and 2.4% imputed).

Also notable is the higher cost of housing in Greater Accra Region, with housing cost in Accra itself representing over 3 percent of total expenditure. Followed closely are Upper East and Upper West Regions with 2.8 percent and 2.6 percent, respectively of total expenditure.

Table 9.5 Components of household expenditure by locality (percent)

|                |        | Component of expenditure |                   |          |         |       |                                   |  |
|----------------|--------|--------------------------|-------------------|----------|---------|-------|-----------------------------------|--|
| Locality       | Food   |                          | Housing           | Other no | n-food  | Total | & imputed) as percentage of total |  |
|                | Actual | Imputed                  | (Atual & imputed) | Actual   | Imputed |       |                                   |  |
| Region         |        |                          |                   |          |         |       |                                   |  |
| Western        | 40.5   | 14.7                     | 1.5               | 36.9     | 6.3     | 100.0 | 55.3                              |  |
| Central        | 48.7   | 11.2                     | 1.9               | 32.8     | 5.5     | 100.0 | 59.9                              |  |
| Greater Accra  | 47.4   | 0.6                      | 3.0               | 40.2     | 8.8     | 100.0 | 48.0                              |  |
| Eastern        | 45.2   | 13.1                     | 1.7               | 34.8     | 5.1     | 100.0 | 58.4                              |  |
| Volta          | 43.1   | 16.0                     | 1.5               | 35.1     | 4.3     | 100.0 | 59.1                              |  |
| Ashanti        | 46.3   | 6.6                      | 1.6               | 38.3     | 7.1     | 100.0 | 53.0                              |  |
| Brong Ahafo    | 44.8   | 17.6                     | 1.5               | 32.5     | 3.6     | 100.0 | 62.4                              |  |
| Northern       | 43.0   | 23.7                     | 2.1               | 27.8     | 3.4     | 100.0 | 66.7                              |  |
| Upper West     | 55.0   | 13.4                     | 2.6               | 26.3     | 2.6     | 100.0 | 68.5                              |  |
| Upper East     | 47.4   | 13.9                     | 2.8               | 31.4     | 4.5     | 100.0 | 61.4                              |  |
| Urban          | 48.4   | 2.4                      | 2.4               | 39.3     | 7.5     | 100.0 | 50.8                              |  |
| Accra          | 46.7   | 0.6                      | 3.2               | 40.7     | 8.9     | 100.0 | 47.3                              |  |
| Other urban    | 49.4   | 3.4                      | 2.0               | 38.5     | 6.7     | 100.0 | 52.8                              |  |
| Rural          | 42.6   | 17.7                     | 1.6               | 33.2     | 4.9     | 100.0 | 60.3                              |  |
| Rural coastal  | 48.8   | 10.1                     | 1.9               | 33.8     | 5.4     | 100.0 | 58.9                              |  |
| Rural forest   | 40.9   | 17.2                     | 1.4               | 35.0     | 5.5     | 100.0 | 58.1                              |  |
| Rural savannah | 39.7   | 27.8                     | 1.7               | 27.8     | 3.0     | 100.0 | 67.5                              |  |
| Ghana          | 45.4   | 10.3                     | 2.0               | 36.1     | 6.2     | 100.0 | 55.7                              |  |

Table 9.6 shows how household expenditure on the different components vary across quintiles. The share of the total budget (actual and imputed) represented by cash expenditure on food remains relatively constant across the quintiles, but consumption of home-produced food remains more important for households which are less well off; as a result, food accounts for only half of the total budget of households in the highest quintile, but over 60 percent of the budget of households in the bottom quintile. The proportion of the total budget

going to housing remains relatively constant across quintiles, but the proportion going to other non-food expenditures (both actual and imputed) is much greater for those households in the higher quintiles.

Table 9.6 Components of household expenditure by quintile (percent)

|          |        | Comp    | onent of expend    | liture          |         |                        | E 1 ( , 1                  |  |
|----------|--------|---------|--------------------|-----------------|---------|------------------------|----------------------------|--|
| Quintile | Foo    | Food    |                    | Other no        | on-food | Tota                   | Food (actual & imputed) as |  |
|          | Actual | Imputed | (actual & imputed) | Actual implifed |         | percentage of<br>total |                            |  |
| Lowest   | 45.1   | 17.6    | 3.0                | 31.6            | 2.7     | 100.0                  | 62.7                       |  |
| Second   | 45.1   | 16.6    | 2.0                | 33.2            | 3.1     | 100.0                  | 61.7                       |  |
| Third    | 44.6   | 14.9    | 1.8                | 34.4            | 4.3     | 100.0                  | 59.5                       |  |
| Fourth   | 45.7   | 11.1    | 1.9                | 35.9            | 5.2     | 100.0                  | 56.8                       |  |
| Highest  | 45.6   | 6.1     | 1.9                | 38.1            | 8.3     | 100.0                  | 51.7                       |  |
| All      | 45.4   | 10.3    | 2.0                | 36.1            | 6.2     | 100.0                  | 55.7                       |  |

# 9.3 Cash expenditure on major expenditure groups

The study involved the collection of very detailed information on household cash expenditures from every household included in the survey. Details of food expenditures were collected at five-day intervals over a period of 35 days in all the households surveyed. Items purchased frequently were covered in the same way, but for less frequently purchased items the reference period was 3 months or 12 months, depending on the household's frequency of purchase. All expenditure values were subsequently projected to give annual estimates.

Table 9.7 shows that Ghanaian households were spending on average almost  $$\phi 3,500,000$ a$  year (at March 1999 prices). This is equivalent to an annual per capita expenditure of about  $$\phi 804,000$ per person$ . On national terms, total cash expenditure amounted to  $$\phi 14,100$ billion$ . Just below half of this cash expenditure (46%) went to food and beverages. Alcohol and tobacco, and clothing and footwear, each accounted for about 10 percent of total cash expenditures. The next most important expenditure groups, in terms of amount spent, were recreation and education (7.6%), transport and communications (5.6%), housing and utility (6.4%) and household goods, operations and services (6.0%).

Table 9.7 Average annual household and per capita cash expenditure, and estimated total national expenditure, by expenditure group

|                                       | Average annual household cash expenditure | Average annual per capita expenditure | Estimated national annual cash | Frequency distribution (percent) |
|---------------------------------------|---|---------------------------------------|--------------------------------|----------------------------------|
| Expenditure Group                     | ( 1: )                                    | ( <b>1</b> ' )                        | expenditure                    |                                  |
|                                       | (cedis)                                   | (cedis)                               | (billion cedis)                |                                  |
| Food & beverage                       | 1,579,970                                 | 368,531                               | 6,425                          | 45.6                             |
| Alcohol & tobacco                     | 358,325                                   | 83,126                                | 1,457                          | 10.3                             |
| Clothing & footwear                   | 345,678                                   | 80,193                                | 1,406                          | 10.0                             |
| Housing & utility                     | 221,717                                   | 51,435                                | 902                            | 6.4                              |
| Household goods, operation & services | 206,890                                   | 51,435                                | 841                            | 6.0                              |
| Medical care & health expenses        | 159,409                                   | 36,981                                | 648                            | 4.6                              |
| Transport & communications            | 195,223                                   | 45,289                                | 794                            | 5.6                              |
| Recreation & education                | 264,306                                   | 61,315                                | 1,075                          | 7.6                              |
| Miscellaneous goods & services        | 134,321                                   | 31,160                                | 546                            | 3.9                              |
| Total                                 | 3,465,839                                 | 804,026                               | 14,094                         | 100.0                            |

Cash expenditure was much higher in urban areas than in rural areas; average household cash expenditure was &ppsi4.9 million per annum in urban areas, compared with &ppsi2.6 million per annum in rural areas (Table 9.8). Considering that rural households tend to be larger than urban households, the differences are even more marked on per capita basis; average cash expenditure was &ppsi2.3 million per person per year in urban areas, but only around &ppsi2.5000 in rural areas. In percentage terms, rural households spend proportionately more on the following expenditure groups: food and beverages; clothing and footwear; and alcohol and tobacco than their urban counterparts.

Table 9.8 Mean annual household cash expenditure by locality and expenditure group

|                                | Mean annual | household cash | expenditure | Percent of total |       |         |  |
|--------------------------------|-------------|----------------|-------------|------------------|-------|---------|--|
|                                | Urban       | Rural          | Country     |                  |       |         |  |
| Expenditure Group              | ¢           | ¢              | ¢           | Urban            | Rural | Country |  |
| Expenditure Group              | ,<br>       |                | ,           | %                | %     | %       |  |
| Food & beverage                | 2,226,268   | 1,205,870      | 1,579,970   | 45.2             | 46.0  | 45.6    |  |
| Alcohol & tobacco              | 490,150     | 282,020        | 358,325     | 9.9              | 10.8  | 10.3    |  |
| Clothing & Footwear            | 439,147     | 291,575        | 345,678     | 8.9              | 11.1  | 10.0    |  |
| Housing & utility              | 406,633     | 114,680        | 221,717     | 8.2              | 4.4   | 6.4     |  |
| Household goods, operation     |             |                |             |                  |       |         |  |
| &services                      | 264,098     | 173,775        | 206,890     | 5.4              | 6.6   | 6.0     |  |
| Medical care & health expenses | 201,327     | 135,145        | 159,409     | 4.1              | 5.2   | 4.6     |  |
| Transport & communications     | 288,018     | 141,510        | 195,223     | 5.8              | 5.4   | 5.6     |  |
| Recreation & education         | 428,575     | 169,221        | 264,306     | 8.7              | 6.5   | 7.6     |  |
| Miscellaneous goods & services | 185,198     | 104,871        | 134,321     | 3.8              | 4.0   | 3.9     |  |
| Total                          | 4,929,415   | 2,618,668      | 3,465,839   | 100.0            | 100.0 | 100.0   |  |
| Sample size (Households)       | 2199        | 3799           | 5998        |                  |       |         |  |

Aggregating up the survey data to get national estimates (Table 9.9), urban areas account for only a third of the total population, but account for 52 percent of total annual cash expenditures ( $\phi$ 7,359 billion at March 1999 prices, as against  $\phi$ 6,744 billion spent by residents in rural areas). Rural areas' share of total cash expenditures per expenditure group is highest for medical care and health expenses (54%), and lowest for housing and utility (33%).

Table 9.9 Mean annual per capita cash expenditure, and estimated total annual cash expenditure, by locality and expenditure group.

|                                | Mean annual pe | r capita cash e | Estimated to expenditure | eash  | Rural share of total cash |         |             |
|--------------------------------|----------------|-----------------|--------------------------|-------|---------------------------|---------|-------------|
|                                | Urban          | Rural           | Country                  | Urban | Rural                     | Country | expenditure |
| Expenditure Group              | ¢              | ¢ ¢             |                          | (t    | %                         |         |             |
| Food & beverage                | 569,318        | 265,479         | 366,531                  | 3,319 | 3,106                     | 6,425   | 48.3        |
| Alcohol & tobacco              | 125,345        | 62,088          | 83,126                   | 731   | 726                       | 1,457   | 49.8        |
| Clothing & Footwear            | 112,302        | 64,192          | 80,193                   | 665   | 751                       | 1,406   | 53.4        |
| Housing & utility              | 103,987        | 25,247          | 51,435                   | 606   | 295                       | 902     | 32.7        |
| Household goods, operation &   |                |                 |                          |       |                           |         |             |
| services                       | 67,537         | 38,258          | 47,996                   | 394   | 448                       | 841     | 53.3        |
| Medical care & health expenses | 51,485         | 29,753          | 36,981                   | 300   | 348                       | 648     | 53.7        |
| Transport & communications     | 73,654         | 31,154          | 45,289                   | 429   | 364                       | 794     | 45.8        |
| Recreation & education         | 109,598        | 37,255          | 61,315                   | 639   | 436                       | 1,075   | 40.6        |
| Miscellaneous goods & services | 47,360         | 23,088          | 31,160                   | 276   | 270                       | 546     | 49.5        |
| Total                          | 1,260,586      | 576,514         | 804,026                  | 7,359 | 6,744                     | 14,094  | 47.9        |
| Sample size (Persons)          | 8,599          | 17,256          | 25,855                   |       |                           |         |             |

Variations in the pattern of expenditure among the different quintiles are shown in Table 9.10. Total cash expenditure per person in the highest quintile is about 25 times that in the lowest quintile. For four expenditure groups (food and beverages; alcohol and tobacco; clothing and footwear; and household goods, operation and services), individuals in the highest quintile spend about twenty times as much per capita as individuals in the lowest quintile; the corresponding ratios for other expenditure groups are 28 times as much for medical care and health expenses, and for recreation and education, 26 times as much for housing and utility, 42 times for miscellaneous goods and services, and as much as 53 times for transport and communications.

Table 9.10 Mean annual per capita cash expenditure, by quintile and expenditure group (cedis and percent)

|                                       |         | Quintile |         |         |           |           | Quintile |       |       |       |       | Constant |
|---------------------------------------|---------|----------|---------|---------|-----------|-----------|----------|-------|-------|-------|-------|----------|
|                                       | 1       | 2        | 3       | 4       | 5         | Country _ | 1        | 2     | 3     | 4     | 5     | Country  |
| Expenditure Group                     | ¢       | ¢        | ¢       | ¢       | ¢         | ¢         | %        | %     | %     | %     | %     | %        |
| Food & beverage                       | 102,800 | 190,591  | 272,948 | 428,560 | 837,293   | 366,531   | 47.4     | 47.9  | 46.8  | 46.0  | 44.3  | 45.6     |
| Alcohol & tobacco                     | 26,942  | 40,934   | 58,856  | 94,400  | 194,399   | 83,126    | 12.4     | 10.3  | 10.1  | 10.1  | 10.3  | 10.3     |
| Clothing & Footwear                   | 23,318  | 42,999   | 60,487  | 91,148  | 182,916   | 80,193    | 10.8     | 10.8  | 10.4  | 9.8   | 9.7   | 10.0     |
| Housing & utility                     | 10,747  | 21,713   | 34,237  | 65,379  | 125,020   | 51,435    | 5.0      | 5.5   | 5.9   | 7.0   | 6.6   | 6.4      |
| Household goods, operation & services | 16,406  | 25,530   | 37,422  | 52,291  | 108,271   | 47,996    | 7.6      | 6.4   | 6.4   | 5.6   | 5.7   | 6.0      |
| Medical care & health expenses        | 9,050   | 18,415   | 27,557  | 41,803  | 88,029    | 36,981    | 4.2      | 4.6   | 4.7   | 4.5   | 4.7   | 4.6      |
| Transport & communications            | 6,845   | 15,624   | 26,346  | 43,460  | 134,113   | 45,289    | 3.2      | 3.9   | 4.5   | 4.7   | 7.1   | 5.6      |
| Recreation & education                | 15,353  | 29,293   | 43,237  | 78,407  | 140,197   | 61,315    | 7.1      | 7.4   | 7.4   | 8.4   | 7.4   | 7.6      |
| Miscellaneous goods & services        | 5,224   | 12,964   | 21,947  | 36,867  | 78,751    | 31,160    | 2.4      | 3.3   | 3.8   | 4.0   | 4.2   | 3.9      |
| Total                                 | 216,685 | 398,063  | 583,037 | 932,315 | 1,888,989 | 804,026   | 100.0    | 100.0 | 100.0 | 100.0 | 100.0 | 100.0    |
| Sample size (Persons)                 | 5,170   | 5,152    | 5,184   | 5,177   | 5,171     | 25,855    |          |       |       |       |       |          |

# 9.4 Cash expenditure at the subgroup and item level

In the previous section, the description was on expenditure at the group level. In this section cash expenditure is discussed in greater detail. Table 9.11 shows a similar breakdown of expenditure to that given in Table 9.7, but with expenditure given at the subgroup level. In the food sub group, the major expenditure items are fish (which accounts for 11% of total cash expenditure), cereals and cereal products (8%), roots and tubers (7%), prepared meals (7%), and vegetables (5%). In other groups, important subgroups of expenditure items are education (6% of total cash expenditure), purchased fares (4%), clothing materials (4%) and fuel and power (3%).

Table 9.11 Average annual household cash expenditure, per capita expenditure and estimated total national expenditure, by subgroup of expenditure

| Coup (subgroup)   Codis   Co | capita annual cash expenditure (Billion cedis)  31,099 7,557 66,349 1,163 58,892 1,032 17,386 305 19,240 337 5,732 100 14,784 259 14,784 259 14,784 259 19,363 164 185,201 1,494 19,771 171 18,821 155 5,741 101 57,380 1,006  | distribution  %  53.5 8.8.3 2.7.2 5.2.2 7.2.4 0.7.7 0.1.8 1.2.1 1.0.6 1.2.1                       |
|--|--|---|
| Group (subgroup)         (Cedis)           1. Food & Beverage         1,858,306         4           Cereals and cereal products         286,005         8           Roots and Tubers         253,860         9           Pulses and nuts         74,946         0           Oils and animal fat         82,938         8           Fruits         24,710         9           Poultry and poultry products         63,730         63,730           Milk and milk products         40,358         6           Fish         367,266         36,026           Miscellaneous foods         42,120         42,120           Spices         38,026         38,026           Non-alcoholic beverages         24,748         24,748           Prepared meals         247,344         247,344           Soft drinks         33,920         33,920           Meat         108,699         108,699           Vegetables         169,636           2. Alcohol & Tobacco         79,990           Alcoholic drinks         68,356           Cigarettes and tobacco         11,634           3. Clothing & Footwear         345,678   | Cedis) (Billion cedis)  31,099 7,557  66,349 1,163 58,892 1,032 17,386 305 19,240 337 5,732 100 14,784 259 9,363 164 85,201 1,494 9,771 171 8,821 155 5,741 101  | % % % % % % % % % % % % % % % % % % %   |
| Group (subgroup)         1,858,306         4           Cereals and cereal products         286,005         4           Roots and Tubers         253,860         253,860           Pulses and nuts         74,946         0           Oils and animal fat         82,938         8           Fruits         24,710         24,710           Poultry and poultry products         63,730         63,730           Milk and milk products         40,358         66           Fish         367,266         36,026           Miscellaneous foods         42,120         24,748           Spices         38,026         38,026           Non-alcoholic beverages         24,748         247,344           Soft drinks         33,920           Meat         108,699           Vegetables         169,636           2. Alcohol & Tobacco         79,990           Alcoholic drinks         68,356           Cigarettes and tobacco         11,634           3. Clothing & Footwear         345,678   | 31,099       7,557         566,349       1,163         58,892       1,032         17,386       305         19,240       337         5,732       100         14,784       259         9,363       164         385,201       1,494         9,771       171         8,821       155         5,741       101 | 53.5<br>8.3<br>7.2<br>5.2<br>7.2<br>2.4<br>0.7<br>0.7<br>0.7<br>0.7<br>1.8<br>1.2<br>1.0.6<br>1.2 |
| 1. Food & Beverage       1,858,306       4         Cereals and cereal products       286,005         Roots and Tubers       253,860         Pulses and nuts       74,946         Oils and animal fat       82,938         Fruits       24,710         Poultry and poultry products       63,730         Milk and milk products       40,358         Fish       367,266         Miscellaneous foods       42,120         Spices       38,026         Non-alcoholic beverages       24,748         Prepared meals       247,344         Soft drinks       33,920         Meat       108,699         Vegetables       169,636         2. Alcohol & Tobacco       79,990         Alcoholic drinks       68,356         Cigarettes and tobacco       11,634         3. Clothing & Footwear       345,678  | 66,349       1,163         58,892       1,032         17,386       305         19,240       337         5,732       100         14,784       259         9,363       164         35,201       1,494         9,771       171         8,821       155         5,741       101                              | 8 8.3<br>7.2<br>7 2.4<br>0 0.7<br>0 1.8<br>1 1.2<br>1 10.6  |
| Cereals and cereal products       286,005         Roots and Tubers       253,860         Pulses and nuts       74,946         Oils and animal fat       82,938         Fruits       24,710         Poultry and poultry products       63,730         Milk and milk products       40,358         Fish       367,266         Miscellaneous foods       42,120         Spices       38,026         Non-alcoholic beverages       24,748         Prepared meals       247,344         Soft drinks       33,920         Meat       108,699         Vegetables       169,636         2. Alcohol & Tobacco       79,990         Alcoholic drinks       68,356         Cigarettes and tobacco       11,634         3. Clothing & Footwear       345,678   | 66,349       1,163         58,892       1,032         17,386       305         19,240       337         5,732       100         14,784       259         9,363       164         35,201       1,494         9,771       171         8,821       155         5,741       101                              | 8 8.3<br>7.2<br>7 2.4<br>0 0.7<br>0 1.8<br>1 1.2<br>1 10.6  |
| Roots and Tubers       253,860         Pulses and nuts       74,946         Oils and animal fat       82,938         Fruits       24,710         Poultry and poultry products       63,730         Milk and milk products       40,358         Fish       367,266         Miscellaneous foods       42,120         Spices       38,026         Non-alcoholic beverages       24,748         Prepared meals       247,344         Soft drinks       33,920         Meat       108,699         Vegetables       169,636         2. Alcohol & Tobacco       79,990         Alcoholic drinks       68,356         Cigarettes and tobacco       11,634         3. Clothing & Footwear       345,678   | 58,892       1,032         17,386       305         19,240       337         5,732       100         14,784       259         9,363       164         35,201       1,494         9,771       171         8,821       155         5,741       101   | 2 7.2<br>5 2.2<br>7 2.4<br>0 0.7<br>0 1.8<br>1 1.2<br>1 10.6<br>1 1.2                             |
| Pulses and nuts       74,946         Oils and animal fat       82,938         Fruits       24,710         Poultry and poultry products       63,730         Milk and milk products       40,358         Fish       367,266         Miscellaneous foods       42,120         Spices       38,026         Non-alcoholic beverages       24,748         Prepared meals       247,344         Soft drinks       33,920         Meat       108,699         Vegetables       169,636         2. Alcohol & Tobacco       79,990         Alcoholic drinks       68,356         Cigarettes and tobacco       11,634         3. Clothing & Footwear       345,678  | 17,386       305         19,240       337         5,732       100         14,784       259         9,363       164         85,201       1,494         9,771       171         8,821       155         5,741       101  | 2.2<br>7 2.4<br>0 0.7<br>0 1.8<br>1 1.2<br>1 10.6<br>1 1.2  |
| Oils and animal fat       82,938         Fruits       24,710         Poultry and poultry products       63,730         Milk and milk products       40,358         Fish       367,266         Miscellaneous foods       42,120         Spices       38,026         Non-alcoholic beverages       24,748         Prepared meals       247,344         Soft drinks       33,920         Meat       108,699         Vegetables       169,636         2. Alcohol & Tobacco       79,990         Alcoholic drinks       68,356         Cigarettes and tobacco       11,634         3. Clothing & Footwear       345,678   | 19,240       337         5,732       100         14,784       259         9,363       164         85,201       1,494         9,771       171         8,821       155         5,741       101   | 7 2.4<br>0 0.7<br>0 1.8<br>4 1.2<br>4 10.6<br>1.2   |
| Fruits       24,710         Poultry and poultry products       63,730         Milk and milk products       40,358         Fish       367,266         Miscellaneous foods       42,120         Spices       38,026         Non-alcoholic beverages       24,748         Prepared meals       247,344         Soft drinks       33,920         Meat       108,699         Vegetables       169,636         2. Alcohol & Tobacco       79,990         Alcoholic drinks       68,356         Cigarettes and tobacco       11,634         3. Clothing & Footwear       345,678  | 5,732     100       14,784     259       9,363     164       85,201     1,494       9,771     171       8,821     155       5,741     101  | 0.7<br>0 1.8<br>1 1.2<br>1 10.6<br>1 1.2  |
| Poultry and poultry products       63,730         Milk and milk products       40,358         Fish       367,266         Miscellaneous foods       42,120         Spices       38,026         Non-alcoholic beverages       24,748         Prepared meals       247,344         Soft drinks       33,920         Meat       108,699         Vegetables       169,636         2. Alcohol & Tobacco       79,990         Alcoholic drinks       68,356         Cigarettes and tobacco       11,634         3. Clothing & Footwear       345,678  | 14,784       259         9,363       164         85,201       1,494         9,771       171         8,821       155         5,741       101  | 1.8<br>1 1.2<br>1 10.6<br>1 1.2   |
| Milk and milk products       40,358         Fish       367,266         Miscellaneous foods       42,120         Spices       38,026         Non-alcoholic beverages       24,748         Prepared meals       247,344         Soft drinks       33,920         Meat       108,699         Vegetables       169,636         2. Alcohol & Tobacco       79,990         Alcoholic drinks       68,356         Cigarettes and tobacco       11,634         3. Clothing & Footwear       345,678  | 9,363     164       85,201     1,494       9,771     171       8,821     155       5,741     101   | 1.2<br>10.6<br>1.2  |
| Fish       367,266         Miscellaneous foods       42,120         Spices       38,026         Non-alcoholic beverages       24,748         Prepared meals       247,344         Soft drinks       33,920         Meat       108,699         Vegetables       169,636         2. Alcohol & Tobacco       79,990         Alcoholic drinks       68,356         Cigarettes and tobacco       11,634         3. Clothing & Footwear       345,678  | 85,201     1,494       9,771     171       8,821     155       5,741     101   | 10.6  |
| Miscellaneous foods       42,120         Spices       38,026         Non-alcoholic beverages       24,748         Prepared meals       247,344         Soft drinks       33,920         Meat       108,699         Vegetables       169,636         2. Alcohol & Tobacco       79,990         Alcoholic drinks       68,356         Cigarettes and tobacco       11,634         3. Clothing & Footwear       345,678   | 9,771     171       8,821     155       5,741     101  | 1.2   |
| Spices       38,026         Non-alcoholic beverages       24,748         Prepared meals       247,344         Soft drinks       33,920         Meat       108,699         Vegetables       169,636         2. Alcohol & Tobacco       79,990         Alcoholic drinks       68,356         Cigarettes and tobacco       11,634         3. Clothing & Footwear       345,678  | 8,821 155<br>5,741 101   |   |
| Non-alcoholic beverages       24,748         Prepared meals       247,344         Soft drinks       33,920         Meat       108,699         Vegetables       169,636         2. Alcohol & Tobacco       79,990         Alcoholic drinks       68,356         Cigarettes and tobacco       11,634         3. Clothing & Footwear       345,678  | 5,741 101  |   |
| Prepared meals       247,344         Soft drinks       33,920         Meat       108,699         Vegetables       169,636         2. Alcohol & Tobacco       79,990         Alcoholic drinks       68,356         Cigarettes and tobacco       11,634         3. Clothing & Footwear       345,678   |  |   |
| Soft drinks       33,920         Meat       108,699         Vegetables       169,636         2. Alcohol & Tobacco       79,990         Alcoholic drinks       68,356         Cigarettes and tobacco       11,634         3. Clothing & Footwear       345,678  | 57 380 1 006   |   |
| Meat       108,699         Vegetables       169,636         2. Alcohol & Tobacco       79,990         Alcoholic drinks       68,356         Cigarettes and tobacco       11,634         3. Clothing & Footwear       345,678   |  |   |
| Vegetables       169,636         2. Alcohol & Tobacco       79,990         Alcoholic drinks       68,356         Cigarettes and tobacco       11,634         3. Clothing & Footwear       345,678  | 7,869 138  |   |
| 2. Alcohol & Tobacco Alcoholic drinks 68,356 Cigarettes and tobacco 11,634 3. Clothing & Footwear 345,678  | 25,217 442   |   |
| Alcoholic drinks 68,356 Cigarettes and tobacco 11,634  3. Clothing & Footwear 345,678  | 39,353 690   | ) 4.9   |
| Cigarettes and tobacco 11,634  3. Clothing & Footwear 345,678  | 18,557 325   | 2.3   |
| Cigarettes and tobacco 11,634  3. Clothing & Footwear 345,678  | 15,858 278   |   |
|  | 2,699 47   |   |
|  | 80,194 1,406   | 5 10.0  |
| C101111112 11141C1141S 1.30.334  | 31,781 557   |   |
| Tailoring charges 25,767   | 5,978 105  |   |
|  | 25,417 446   |   |
|  | 17,018 298   |   |
| 4. Housing & Utility 126,174   | 29,272 513   | 3.8   |
| Rent paid 23,056   | 5,349 94   |   |
|  | 10,235   |   |
|  | 10,949 192   |   |
| Garbage 2,390  | 555 10   |   |
| Property charges 2,376 9,413   | 2,184  |   |
| 5. Household Goods, Operations   |  |   |
|  | 70,161 1,230   | 8.8   |
|  |  |   |
| Soft furnishes 29,325  |  |   |
| Furniture and floor coverings 724  | 22,165 389   |   |
| Electrical and other appliances 17,327   |  | 0.5   |

|   | Average annual household cash expenditure | Average annual per capita expenditure | Estimated total annual cash expenditure | Percentage distribution |
|---|---|---------------------------------------|---|-------------------------|
| Curana (anh anana)                        | (Cedis)                                   | (Cedis)                               | (Billion cedis)                         | %                       |
| Group (subgroup) Glassware, utensils, etc | 26,280                                    | 6,097                                 | 107                                     | 0.8                     |
| Non-durable household goods               | 131,338                                   | 30,468                                | 534                                     | 3.8                     |
| Household services                        | 1,896                                     | 30,408<br>440                         | 8                                       | 0.1                     |
| Household services                        | 1,090                                     | 440                                   | o                                       | 0.1                     |
| 6. Medical Care &                         |   |                                       |   |                         |
| Health Expenses                           | 159,409                                   | 36,991                                | 648                                     | 4.6                     |
| Medical products and appliances           | 59,170                                    | 13,737                                | 241                                     | 1.7                     |
| Hospital services                         | 73,350                                    | 17,016                                | 298                                     | 2.1                     |
| Other health services                     | 26,889                                    | 6,238                                 | 109                                     | 0.8                     |
| 7. Transport &                            |   |                                       |   |                         |
| Communication                             | 195,223                                   | 45,289                                | 793                                     | 5.6                     |
| Purchase of personal transport            | 4,050                                     | 940                                   | 16                                      | 0.1                     |
| Operation of personal transport           | 38,470                                    | 8,924                                 | 156                                     | 1.1                     |
| Purchased fares                           | 141,459                                   | 32,817                                | 575                                     | 4.1                     |
| Communication                             | 11,244                                    | 2,608                                 | 46                                      | 0.3                     |
| 8. Recreation & Education                 | 264,305                                   | 61,316                                | 1,075                                   | 7.6                     |
| Recreation equipment                      | 4,421                                     | 1,026                                 | 18                                      | 0.1                     |
| Entertainment                             | 2,413                                     | 560                                   | 10                                      | 0.1                     |
| Gambling                                  | 33,733                                    | 7,826                                 | 137                                     | 1.0                     |
| Newspaper ,books, and magazines           | 10,807                                    | 2,507                                 | 44                                      | 0.3                     |
| Education                                 | 212,931                                   | 49,397                                | 866                                     | 6.1                     |
| Miscellaneous Goods &                     |   |                                       |   |                         |
| Services                                  | 134,321                                   | 31,161                                | 547                                     | 3.8                     |
| Personal care services                    | 49,554                                    | 11,496                                | 202                                     | 1.4                     |
| Personal care goods                       | 37,005                                    | 8,585                                 | 150                                     | 1.1                     |
| Jewellery watches ,rings                  | 20,833                                    | 4,833                                 | 85                                      | 0.6                     |
| Writing and drawing equipment             | 1,431                                     | 332                                   | 6                                       | 0.0                     |
| Expenditure in restaurants & hotels       | 1,157                                     | 268                                   | 5                                       | 0.0                     |
| Financial and other services              | 24,341                                    | 5,647                                 | 99                                      | 0.7                     |
| Total Cash Expenditure                    | 3,465,839                                 | 804,040                               | 14,094                                  | 100.0                   |

# 9.5 Total food consumption expenditure

Cash expenditure and the consumption of home produced food have been treated separately up to this stage. Cash expenditure was examined in Sections 9.3 and 9.4, and home consumption in Section 7.7. In this section these two components are combined, to arrive at estimates of total food consumption, at the household level and on a per capita` basis.

While the estimates of the value of total food consumption for different parts of the country provide some useful insights, it needs to be stressed that some of the differences revealed may not reflect different nutritional intakes by households, as differences in prices between different parts of the country. All cash expenditures and values given for home consumption represent estimates of actual expenditures and values for those areas where the data were collected; no adjustments have been made for possible price differences between localities.

For the country as a whole, the average value of annual household food consumption was about \$\psi 2.4\$ million at March 1999 prices; on a per capita basis, this works out to about \$\psi 548,000\$ (Table 9.12). Cash expenditure on food accounts for 96 percent of total food consumption, with the remaining 4 percent representing the value of home-produced food.

At the national level, the total annual value of all food consumed is  $\not \in 9,590$  billion. The three most important food consumption subgroups, in terms of cash expenditure value, are roots and tubers (22%), fish (16%), and cereals and cereal products (15%). The other important food subgroups are vegetables (8%), and meat (5%). Prepared meals account for 11 percent by value of total food consumption.

Table 9.12 Average value of annual household and per capita food consumption (both cash expenditure and home-produced), and estimated total value, by food subgroup, and food budget shares

|                               | Mean annual | household food co | onsumption |             | per capita food cor | nsumption | Estimated value | Food   |
|-------------------------------|-------------|-------------------|------------|-------------|---------------------|-----------|-----------------|--------|
|                               | Cash        | Home              |            | Cash        | Home                | Total     | of all food     | budget |
|                               | Expenditure | Produced          | Total      | Expenditure | Produced            |           | consumption     | share  |
|                               | ¢           | ¢                 | ¢          | ¢           | ¢                   | ¢         | (billion cedis) |        |
| Group/                        |             |                   |            |             |                     |           |                 | %      |
| Subgroup                      |             |                   |            |             |                     |           |                 |        |
| 1. Food & Beverage            | 1,858,306   | 422,189           | 2,280,497  | 431,099     | 97,943              | 529,041   | 9,275           | 96.5   |
| Cereals and cereal products   | 286,005     | 61,194            | 347,199    | 66,349      | 14,196              | 80,545    | 1,412           | 14.7   |
| Roots and tubers              | 253,860     | 253,508           | 507,369    | 58,892      | 58,810              | 117,702   | 2,063           | 21.5   |
| Pulses and nuts               | 74,946      | 22,367            | 97,313     | 17,386      | 5,189               | 22,575    | 396             | 4.1    |
| Vegetables                    | 169,636     | 30,466            | 200,102    | 39,353      | 7,068               | 46,421    | 814             | 8.5    |
| Fruits                        | 24,710      | 4,466             | 29,176     | 5,732       | 1,036               | 6,768     | 119             | 1.2    |
| Oils and animal fat           | 82,938      | 3,839             | 86,777     | 19,240      | 891                 | 20,131    | 353             | 3.7    |
| Meat                          | 108,699     | 14,862            | 123,562    | 25,217      | 3,448               | 28,665    | 502             | 5.2    |
| Poultry and poultry products  | 63,730      | 12,135            | 75,864     | 14,784      | 2,815               | 17,599    | 309             | 3.2    |
| Fish                          | 367,266     | 19,310            | 386,576    | 85,201      | 4,480               | 89,680    | 1,572           | 16.4   |
| Milk and milk products        | 40,358      | 39                | 40,397     | 9,363       | 9                   | 9,372     | 164             | 1.7    |
| Spices                        | 38,026      |                   | 38,026     | 8,821       |                     | 8,821     | 155             | 1.6    |
| Miscellaneous foods           | 42,120      |                   | 42,120     | 9,771       |                     | 9,771     | 171             | 1.8    |
| Prepared meals                | 247,344     |                   | 247,344    | 57,380      |                     | 57,380    | 1,006           | 10.5   |
| Non-alcoholic beverages       | 24,748      | 3                 | 24,752     | 5,741       | 1                   | 5,742     | 101             | 1.0    |
| Soft drinks                   | 33,920      |                   | 33,920     | 7,869       |                     | 7,869     | 138             | 1.4    |
| 2. Alcohol & Tobacco          | 79,990      | 1,916             | 81,905     | 18,557      | 444                 | 19,001    | 315             | 3.5    |
| Alcoholic drinks              | 68,356      | 1916              | 70,271     | 15,858      | 444                 | 16,302    | 268             | 3.0    |
| Cigarettes                    | 11,634      |                   | 11,634     | 2,699       |                     | 2,699     | 47              | 0.5    |
| <b>Total Food Consumption</b> | 1,938,296   | 424,105           | 2,362,402  | 449,656     | 98,387              | 548,042   | 9,590           | 100.0  |

Table 9.13 shows the urban/rural differences in food consumption at the household level. Although households in urban areas spend more on food than rural households, this difference is more than counterbalanced by the higher level of home consumption in rural areas. Average annual household food consumption around March 1999 was about ¢2.8 million in urban areas and about ¢2.1 million in rural areas.

Table 9.13 Value of average annual household food consumption and estimated total food consumption (both cash expenditure and home-produced), by food subgroup and locality.

|                              | U                   | Jrban areas –Housel         | nold consumpt | ion                         | I                   | Rural areas -Household      | d consumption |                             |
|------------------------------|---------------------|-----------------------------|---------------|-----------------------------|---------------------|-----------------------------|---------------|-----------------------------|
|                              | Cash<br>Expenditure | Value of home produced food | Total         | Estimated total (all urban) | Cash<br>Expenditure | Value of home produced food | Total         | Estimated total (all rural) |
| <b>Group</b> / Subgroup      | ¢                   | ¢                           | ¢             | (billion cedis)             | ¢                   | ¢                           | ¢             | (billion cedis)             |
| 1. Food & Beverage           | 2,639,882           | 114,267                     | 2,754,149     | 4,110                       | 1,404,160           | 600,425                     | 2,004,585     | 5,164                       |
| Cereals and cereal products  | 404,220             | 12,196                      | 416,416       | 621                         | 217,577             | 89,556                      | 307,133       | 791                         |
| Roots and tubers             | 378,901             | 75,116                      | 454,017       | 677                         | 181,482             | 356,768                     | 538,250       | 1,386                       |
| Pulses and nuts              | 87,740              | 2,885                       | 90,625        | 135                         | 67,539              | 33,644                      | 101,183       | 261                         |
| Vegetables                   | 243,603             | 8,338                       | 251,941       | 376                         | 126,821             | 43,274                      | 170,095       | 438                         |
| Fruits                       | 47,944              | 885                         | 48,829        | 73                          | 11,261              | 6,539                       | 17,800        | 46                          |
| Oils and animal fat          | 116,504             | 417                         | 116,921       | 174                         | 63,508              | 5,820                       | 69,328        | 179                         |
| Meat                         | 173,013             | 1,001                       | 174,014       | 259                         | 71,472              | 22,886                      | 94,358        | 243                         |
| Poultry and poultry products | 115,083             | 1,948                       | 117,031       | 174                         | 34,004              | 18,031                      | 52,035        | 134                         |
| Fish                         | 397,510             | 11,481                      | 408,991       | 610                         | 349,760             | 23,841                      | 373,601       | 962                         |
| Milk and milk products       | 70,955              | 0                           | 70,955        | 106                         | 22,648              | 61                          | 22,709        | 58                          |
| Spices                       | 42,199              |                             | 42,199        | 63                          | 35,610              |                             | 35,610        | 93                          |
| Miscellaneous foods          | 55,812              |                             | 55,812        | 83                          | 34,194              |                             | 34,194        | 88                          |
| Prepared meals               | 401,075             |                             | 401,075       | 598                         | 158,358             |                             | 158,358       | 408                         |
| Non-alcoholic beverages      | 41,031              | 0                           | 41,031        | 61                          | 15,323              | 5                           | 15,328        | 39                          |
| Soft drinks                  | 64,292              |                             | 64,292        | 100                         | 14,603              |                             | 14,603        | 38                          |
| 2. Alcohol & Tobacco         | 73,534              | 1,378                       | 74,912        | 112                         | 83,727              | 2,227                       | 85,954        | 221                         |
| Alcoholic drinks             | 65,607              | 1,378                       | 66,985        | 100                         | 69,947              | 2,227                       | 72,174        | 186                         |
| Cigarettes                   | 7,927               |                             | 7,927         | 12                          | 13,780              |                             | 13,780        | 35                          |
| Total Food Consumption       | 2,713,416           | 115,645                     | 2,829,061     | 4,222                       | 1,487,887           | 602,652                     | 2,090,539     | 5,385                       |

After allowing for the difference in household size between urban and rural areas, it is found that per capita food consumption is  $$\phi 724,235$$  in the urban areas and  $$\phi 500,197$$  in the rural areas (Table 9.14).

Table 9.14 Value of average per capita food consumption (both cash expenditure and home-produced), and food budget shares, by food subgroup and locality.

|  | Urb                    | oan areas –Per capita       | a consumption          | on                   | Rural                    | areas -Per capit                     | ta consumpti          | on                |
|--|------------------------|-----------------------------|------------------------|----------------------|--------------------------|--------------------------------------|-----------------------|-------------------|
| Cuova l  | Cash<br>Expenditure    | Value of home produced food | Total                  | Food budget<br>share | Cash<br>Expenditure      | Value of<br>home<br>produced<br>food | Total                 | Food budget share |
| Group/   | ¢                      | ¢                           | ¢                      | %                    | ¢                        | ¢                                    | ¢                     | %                 |
| Subgroup                                       |                        |                             |                        |                      |                          |                                      |                       | 96.4              |
| 1. Food & Beverage Cereals and cereal products | <b>675,857</b> 103,370 | <b>29,221</b><br>3,119      | <b>705,078</b> 106,489 | <b>97.2</b> 14.7     | <b>309,133</b><br>47,901 | <b>172,141</b><br>19,716             | <b>481,274</b> 67,617 | 13.5              |
| Roots and tubers                               | 96,895                 | 19,209                      | 116,104                | 16.0                 | 39,954                   | 118,499                              | 158,453               | 31.7              |
| Pulses and nuts                                | 22,438                 | 738                         | 23,176                 | 3.2                  | 14,869                   | 7,407                                | 22,276                | 4.5               |
| Vegetables                                     | 62,296                 | 2,132                       | 64,428                 | 8.9                  | 27,920                   | 9,527                                | 37,447                | 7.5               |
| Fruits   | 12,261                 | 226                         | 12,487                 | 1.7                  | 2,479                    | 1,440                                | 3,919                 | 0.8               |
| Oils and animal fat                            | 29,793                 | 107                         | 29,900                 | 4.1                  | 13,982                   | 1,281                                | 15,263                | 3.1               |
| Meat   | 44,244                 | 256                         | 44,500                 | 6.1                  | 15,735                   | 5,038                                | 20,773                | 4.2               |
| Poultry and poultry products                   | 29,430                 | 498                         | 29,928                 | 4.1                  | 7,486                    | 3,970                                | 11,456                | 2.3               |
| Fish   | 101,654                | 2,936                       | 104,590                | 14.4                 | 77,002                   | 5,249                                | 82,251                | 16.4              |
| Milk and milk products                         | 18,145                 | 0                           | 18,145                 | 2.5                  | 4,986                    | 13                                   | 4,999                 | 1.0               |
| Spices   | 10,791                 |                             | 10,791                 | 1.5                  | 7,840                    |                                      | 7,840                 | 1.6               |
| Miscellaneous foods                            | 14,273                 |                             | 14,273                 | 2.0                  | 7,528                    |                                      | 7,528                 | 1.5               |
| Prepared meals                                 | 102,566                |                             | 102,566                | 14.2                 | 34,863                   |                                      | 34,863                | 7.0               |
| Non-alcoholic beverages                        | 10,493                 | 0                           | 10,493                 | 1.4                  | 3,373                    | 1                                    | 3,374                 | 0.7               |
| Soft drinks                                    | 17,208                 | •                           | 17,208                 | 2.4                  | 3,215                    |                                      | 3,215                 | 0.6               |
| 2. Alcohol &                                   |                        |                             |                        |                      |                          |                                      |                       |                   |
| Tobacco  | 18,805                 | 352                         | 19,157                 | 2.7                  | 18,433                   | 490                                  | 18,923                | 3.8               |
| Alcoholic drinks                               | 16,778                 | 352                         | 17,130                 | 2.4                  | 15,399                   | 490                                  | 15,889                | 3.2               |
| Cigarettes                                     | 2,027                  |                             | 2,027                  | 0.3                  | 3,034                    |                                      | 3,034                 | 0.6               |
| Total Food Consumption                         | 694,662                | 29,573                      | 724,235                | 100                  | 327,566                  | 172,631                              | 500,197               | 100               |

There are differences in the pattern of food consumption in different parts of the country, as shown in Table 9.15. Notable features are the relative importance of cereals and cereal products, and pulses and nuts, in the diet of households in the rural savannah, and their reduced consumption of roots and tubers compared with rural coastal and forest zones. The value of vegetables consumed is almost similar in all localities. Consumption of fruit is generally low in all areas, but especially low in the rural savannah. Meat and poultry and poultry products form a small part of the diet in the rural coastal zone.

Table 9.15 Food budget shares (including both cash expenditure and home-produced), by locality.

|  |         |             | Locality      |              |                |         |
|--|---------|-------------|---------------|--------------|----------------|---------|
|  | Accra   | Other urban | Rural coastal | Rural forest | Rural savannah | Country |
| Group/                                 | %       | %           | %             | %            | %              | %       |
| Subgroup                               |         |             |               |              |                |         |
| 1. Food & Beverage                     | 96.5    | 97.9        | 96.2          | 97.1         | 92.7           | 96.5    |
| Cereals and cereal products            | 13.8    | 15.2        | 14.4          | 12.4         | 20.0           | 14.7    |
| Roots and Tubers                       | 12.3    | 17.9        | 23.4          | 29.6         | 19.6           | 21.5    |
| Pulses and nuts                        | 3.0     | 3.3         | 4.6           | 3.5          | 8.2            | 4.1     |
| Vegetables                             | 8.5     | 9.1         | 8.6           | 7.9          | 8.1            | 8.5     |
| Fruits                                 | 2.4     | 1.4         | 1.2           | 0.8          | 0.6            | 1.2     |
| Oils and animal fat                    | 3.7     | 4.4         | 3.7           | 3.3          | 2.9            | 3.7     |
| Meat                                   | 5.6     | 6.4         | 2.2           | 4.5          | 6.8            | 5.2     |
| Poultry and poultry products           | 4.3     | 4.1         | 2.1           | 2.6          | 2.8            | 3.2     |
| Fish                                   | 14.2    | 14.6        | 20.9          | 19.1         | 12.2           | 16.4    |
| Milk and milk products                 | 3.2     | 2.1         | 1.4           | 1.2          | 0.5            | 1.7     |
| Spices                                 | 1.2     | 1.7         | 1.6           | 1.3          | 2.6            | 1.6     |
| Miscellaneous foods                    | 2.1     | 1.9         | 1.8           | 1.4          | 1.9            | 1.8     |
| Prepared meals                         | 17.2    | 12.6        | 8.5           | 7.9          | 5.9            | 10.5    |
| Non-alcoholic beverages                | 2.1     | 1.1         | 0.9           | 0.8          | 0.4            | 1.0     |
| Soft drinks                            | 2.9     | 2.1         | 0.9           | 0.8          | 0.2            | 1.4     |
| 2. Alcohol &                           |         |             |               |              |                |         |
| Tobacco                                | 3.6     | 2.2         | 3.8           | 2.8          | 7.3            | 3.5     |
| Alcoholic drinks                       | 3.3     | 1.9         | 3.4           | 2.3          | 6.0            | 3.0     |
| Cigarettes                             | 0.3     | 0.3         | 0.4           | 0.5          | 1.3            | 0.5     |
| Total                                  | 100.0   | 100.0       | 100.0         | 100.0        | 100.0          | 100.0   |
| Per Capita Food Consumption            |         |             |               |              |                |         |
| (¢)                                    | 901,436 | 661,105     | 504,231       | 509,708      | 353,522        | 548,044 |
| Total Food Consumption (Billion Cedis) | 1,397   | 2,824       | 1,288         | 2,819        | 1,278          | 9,607   |

Fish is a major component of diet in all localities; consumption is highest in rural areas of the coastal zone and lowest in the rural savannah zone. Spices are consumed fairly evenly throughout the country, with rural savannah consuming the largest amount. Milk and milk products, miscellaneous foods, prepared meals, and non-alcoholic beverages, and soft drinks are consumed mainly in urban areas, particularly in Accra. Finally, consumption of alcoholic drinks is higher in rural areas than urban areas, while reported expenditures on cigarettes and tobacco are lower in Accra than other localities.

## 9.6 Availability of consumer items

Besides the detailed expenditure data, the survey collected information on the availability of various key consumer items. Households were asked whether, in the last 12 months, they had tried to purchase any of the selected consumer items but found them unavailable or if they do sometimes find them unavailable. If they ever found them unavailable they were asked whether the shortages over the last 12 months were worse, the same, or better compared with the preceding year. In interpreting the results presented in Table 9.16, the frequency with which households purchased these different items should be borne in mind. Kerosene was the item that most households (21%) found unavailable at some time in the year.

Table 9.16 Percentage of all households reporting items unavailable in the last 12 months, by locality.

|                            |       |       | Locality |        |          |         |
|----------------------------|-------|-------|----------|--------|----------|---------|
| Item                       |       | Other | Rural    | Rural  | Rural    |         |
|                            | Accra | urban | coastal  | forest | savannah | Country |
| Maize/maize flour          | 0.3   | 0.4   | 0.9      | 1.5    | 2.1      | 1.1     |
| Sorghum/ Millet            | 0.0   | 0.0   | 0.2      | 0.2    | 2.8      | 0.6     |
| Rice                       | 0.0   | 0.2   | 0.5      | 1.7    | 4.0      | 1.3     |
| Cooking oil                | 0.0   | 0.2   | 0.4      | 1.8    | 2.3      | 1.1     |
| Sugar                      | 0.0   | 0.2   | 0.3      | 1.5    | 2.0      | 0.9     |
| Cloths/Shoes               | 0.0   | 0.8   | 0.1      | 2.1    | 5.1      | 1.7     |
| Gas                        | 3.3   | 0.8   | 0.3      | 0.1    | 0.0      | 0.6     |
| Kerosene                   | 5.4   | 20.8  | 19.8     | 25.2   | 22.8     | 20.7    |
| Charcoal/Firewood          | 0.0   | 0.7   | 0.9      | 1.2    | 3.4      | 1.3     |
| Health/personal care items | 0.2   | 0.2   | 0.2      | 2.8    | 3.5      | 1.6     |
| Petrol                     | 3.3   | 1.2   | 1.3      | 3.3    | 0.9      | 2.0     |

In terms of variations across localities, the problem of unavailability of items was often more serious in the rural savannah and rural forest areas than it was in urban areas or in the rural coastal areas. This was particularly so in the case of rice, cooking oil, sugar, clothes/shoes, kerosene, and health or personal care items.

## 9.7 Total household income

Household expenditure is the main monetary measure used in this report and forms the basis for the construction of the quintiles; however the survey did collect detailed information on all sources of household income. It is the general experience in household surveys that it is much more difficult to capture all elements of income, and it is therefore plausible that the income figures presented in this section may understate total household income.

At the prices prevailing in March 1999, average annual household income is estimated to be  $$\phi 2,267,000$, which is equivalent to a per capita income of $\phi 527,000$ (Table 9.17). Using the March 1999 exchange rate of $\phi 2,394$ to the US dollar, average annual household income and average per capita income amount to US$947 and US$220, respectively.$ 

There are substantial variations in income across the expenditure quintiles. People who fall in the lowest quintile have an average per capita income of only &ppeople166,000 whereas those in the highest quintile have an average per capita income of &ppeople1,080,000. This contrast is also seen when one looks at the percentage share of persons and income in the different quintiles; thus the 20 percent in the lowest quintile generate only slightly more than six percent of total income, while the highest quintile generates 40 percent of total income.

Table 9.17 Mean annual household and per capita income, by quintile.

|          | Mean annual Mea                |                                  | ual Percentage share |         |        | Mean              | Samp   | le size |
|----------|--------------------------------|----------------------------------|----------------------|---------|--------|-------------------|--------|---------|
| Quintile | household<br>income<br>(cedis) | per capita<br>income*<br>(cedis) | Households           | Persons | Income | household<br>size | Hholds | Persons |
| Lowest   | 979,000                        | 166,000                          | 14.7                 | 20.0    | 6.4    | 5.9               | 919    | 5,170   |
| Second   | 1,770,000                      | 328,000                          | 15.9                 | 19.9    | 12.4   | 5.4               | 1,004  | 5,152   |
| Third    | 2,009,000                      | 419,000                          | 18.0                 | 20.0    | 16.0   | 4.8               | 1,139  | 5,184   |
| Fourth   | 2,673,000                      | 652,000                          | 21.1                 | 20.0    | 24.9   | 4.1               | 1,261  | 5,177   |
| Highest  | 3,025,000                      | 1,080,000                        | 30.3                 | 20.0    | 43.7   | 2.8               | 1,675  | 5,171   |
| All      | 2,267,000                      | 527,000                          | 100.0                | 100.0   | 100.0  | 4.3               | 5998   | 25,855  |

<sup>\*</sup> Note: Mean per capita income is equal to total household income divided by total number of persons; it can be obtained by dividing mean household income by mean household size.

On regional basis, mean annual household income varies from a high of  $$\phi 3,356,000$ in Greater Accra Region to a low of <math>$\phi 1,442,000$ in the Upper West Region, while mean per capita income varies from a high of <math>$\phi 932,000$ in Greater Accra Region to a low of <math>$\phi 206,000$ in Upper West Region (Table 9.18).$ 

Table 9.18 Mean annual household and per capita income by region.

| Region      | Mean annual household | Mean annual per capita income | Sample     | size    |  |
|-------------|-----------------------|-------------------------------|------------|---------|--|
|             | income (cedis)        | (cedis)                       | Households | Persons |  |
| Western     | 2,671,000             | 568,000                       | 639        | 3,002   |  |
| Central     | 1,464,000             | 444,000                       | 700        | 2,311   |  |
| Gt. Accra   | 3,356,000             | 932,000                       | 859        | 3,070   |  |
| Eastern     | 2,055,000             | 415,000                       | 820        | 3,213   |  |
| Volta       | 1,950,000             | 527,000                       | 640        | 3,011   |  |
| Ashanti     | 2,550,000             | 622,000                       | 1,060      | 4,347   |  |
| Brong Ahafo | 2,302,000             | 548,000                       | 540        | 2,251   |  |
| Northern    | 1,552,000             | 210,000                       | 360        | 2,647   |  |
| Upper West  | 1,442,000             | 206,000                       | 120        | 836     |  |
| Upper East  | 1,446,000             | 321,000                       | 260        | 1,169   |  |
| All         | 2,267,000             | 527,000                       | 5,998      | 25,855  |  |

There is also a contrast in per capita annual income in the urban and rural localities of Ghana. Per capita annual income was  $\phi$ 692,000 in urban areas and  $\phi$ 469,000 in rural areas (Table 9.19). Within the rural areas, incomes were higher in the forest zone than in the coastal and savannah zones. Out of a total national household income of  $\phi$ 9,218 billion, 44 percent represent income generated in urban areas and 56 percent represent income generated in rural areas.

Table 9.19 Mean annual household and per capita income, and estimated total income, by locality

|                | Mean annual      | Mean annual       | Estimated total | Percentage            | Mean              | Sample     | size    |
|----------------|------------------|-------------------|-----------------|-----------------------|-------------------|------------|---------|
| Locality       | household income | per capita income | annual income   | share of total income | household<br>size | Households | Persons |
|                | (cedis)          | (cedis)           | (billion cedis) |                       |                   |            |         |
| Urban          | 2,700,000        | 692,000           | 3,758           | 43.7                  | 3.9               | 2199       | 8,599   |
| Accra          | 3,500,000        | 972,000           | 1,495           | 16.2                  | 3.6               | 620        | 2,287   |
| Other urban    | 2,379,000        | 595,000           | 2,520           | 27.4                  | 4.0               | 1579       | 6,311   |
| Rural          | 2,017,000        | 469,000           | 5,059           | 56.3                  | 4.5               | 3799       | 17,256  |
| Rural Coastal  | 1,615,000        | 394,000           | 1,015           | 11.0                  | 4.5               | 899        | 3,764   |
| Rural Forest   | 2,354,000        | 523,000           | 2,924           | 31.7                  | 5.1               | 1940       | 8,159   |
| Rural Savannah | 1,781,000        | 349,000           | 1,255           | 13.6                  | 5.1               | 960        | 5,333   |
| Ghana          | 2,267,000        | 527,000           | 9,218           | 100.0                 | 4.3               | 5998       | 25,855  |

## 9.8 Components of household income

In Ghana, the major source of household income is agriculture (37%), followed by non-farm self-employment (31%), wage employment (23%), net remittances (5%), rental income (2%) and other income (2%) (Table 9.20).

Table 9.20 Components of household and per capita income, and estimates of total annual household income.

| Income component                 | Mean annual<br>household<br>income | Mean annual per capita household income | Estimated total annual income | Percentage distribution |
|----------------------------------|------------------------------------|---|-------------------------------|-------------------------|
|                                  | (cedis)                            | (cedis)                                 | (billion cedis)               |                         |
| Wage income from employment      | 516,000                            | 120,000                                 | 2,099                         | 22.8                    |
| Household agricultural income    | 838,000                            | 195,000                                 | 3,406                         | 37.0                    |
| Non-farm self-employment income  | 709,000                            | 165,000                                 | 2,882                         | 31.3                    |
| Rental income (actual & imputed) | 46,000                             | 11,000                                  | 186                           | 2.0                     |
| Net remittance*                  | 108,000                            | 25,000                                  | 441                           | 4.8                     |
| Other income                     | 50,000                             | 12,000                                  | 204                           | 2.2                     |
| Total                            | 2,267,000                          | 527,000                                 | 9,218                         | 100.0                   |

<sup>\*</sup> Note: Net remittance = Income from remittances - expenditure on remittances.

The composition of household incomes varies across the country (Table 9.21). In urban areas, non-farm self-employment income (40%) is the major source of income, with wage income as the second most important source (32%). In rural areas, on the other hand, more than half of total household income is derived from agriculture (54%), with non-farm self-employment income comprising 24%. The relative importance of agriculture and non-farm self-employment varies considerably across ecological zones. For example, in rural areas in the coastal zone only 35 percent of total household income comes from agriculture, whereas in the rural savannah as much as 71 percent comes from agriculture.

Table 9.21 Distribution of household income by component, locality and quintile (percent).

|                       |                             |                                     | Components o                              | fincome       |                         |                 |                 |
|-----------------------|-----------------------------|-------------------------------------|---|---------------|-------------------------|-----------------|-----------------|
| Locality/<br>Quintile | Wage income from employment | Household<br>agricultural<br>income | Non-farm<br>self-<br>employment<br>income | Rental income | Income from remittances | Other<br>Income | Total<br>(100%) |
| Region                |                             |                                     |   |               |                         |                 |                 |
| Western               | 22.1                        | 51.6                                | 20.0                                      | 1.1           | 3.2                     | 2.0             | 100.0           |
| Central               | 13.7                        | 41.1                                | 34.3                                      | 1.8           | 7.6                     | 1.5             | 100.0           |
| Greater Accra         | 38.9                        | 7.8                                 | 38.9                                      | 1.8           | 10.1                    | 2.3             | 100.0           |
| Eastern               | 14.9                        | 50.7                                | 21.9                                      | 3.1           | 6.8                     | 2.6             | 100.0           |
| Volta                 | 18.0                        | 34.8                                | 34.3                                      | 1.7           | 9.6                     | 1.6             | 100.0           |
| Ashanti               | 22.8                        | 23.6                                | 33.6                                      | 1.9           | 14.8                    | 3.3             | 100.0           |
| Brong Ahafo           | 9.3                         | 55.1                                | 27.9                                      | 1.4           | 6.0                     | 0.3             | 100.0           |
| Northern              | 11.4                        | 58.6                                | 23.2                                      | 3.0           | 3.0                     | 0.8             | 100.0           |
| Upper West            | 16.5                        | 46.4                                | 26.4                                      | 4.0           | 1.8                     | 4.8             | 100.0           |
| Upper East            | 12.9                        | 63.6                                | 15.0                                      | 2.7           | 4.4                     | 1.3             | 100.0           |
| Urban                 | 32.3                        | 10.3                                | 39.7                                      | 1.8           | 13.0                    | 2.8             | 100.0           |
| Accra                 | 34.7                        | 7.9                                 | 42.4                                      | 2.1           | 10.8                    | 2.0             | 100.0           |
| Other urban           | 30.3                        | 12.3                                | 37.5                                      | 1.6           | 14.9                    | 3.5             | 100.0           |
| Rural                 | 13.7                        | 54.0                                | 23.8                                      | 2.2           | 4.9                     | 1.4             | 100.0           |
| Rural coastal         | 18.7                        | 35.1                                | 35.2                                      | 2.9           | 7.1                     | 1.0             | 100.0           |
| Rural forest          | 15.6                        | 54.6                                | 21.4                                      | 1.8           | 4.7                     | 1.8             | 100.0           |
| Rural savannah        | 6.4                         | 71.4                                | 16.0                                      | 2.0           | 3.0                     | 1.2             | 100.0           |
| Quintile              |                             |                                     |   |               |                         |                 |                 |
| Lowest                | 6.3                         | 59.7                                | 20.4                                      | 4.1           | 7.6                     | 1.9             | 100.0           |
| Second                | 13.4                        | 53.1                                | 25.3                                      | 2.3           | 4.6                     | 1.3             | 100.0           |
| Third                 | 14.5                        | 49.4                                | 26.9                                      | 2.2           | 5.4                     | 1.5             | 100.0           |
| Fourth                | 23.0                        | 36.9                                | 29.3                                      | 1.7           | 7.4                     | 1.7             | 100.0           |
| Highest               | 29.0                        | 20.3                                | 34.6                                      | 1.5           | 11.7                    | 2.9             | 100.0           |
| Total                 | 21.9                        | 35.5                                | 30.0                                      | 1.9           | 8.5                     | 2.1             | 100.0           |

Households in the lowest quintile derive most of their income (60%) from agriculture compared with the highest quintile that derive most of their income from non-farm self-employment (35%) and wage employment (29%). Net remittance represents around 8 and 12 per cent of total income for the lowest and highest quintiles, respectively. For the second quintile net remittance constitutes the lowest percentage of income with 4.6%.

# 9.9 Comparison of income and expenditure

Whereas the previous four sections dealt separately with income and expenditure, in this section direct comparison of income and expenditure levels is made. The presentation is carried out in terms of individuals and not households.

The deciles for per capita income and per capita expenditure, and the means of each decile are presented in Table 9.22. There is a larger spread in incomes than in expenditures. Whereas per capita expenditure ranges from a low of 63,000 to a high of 24.2 million, per capita income ranges from zero to 32.4 million.

Table 9.22 Decile for per capita income and per capita expenditure, and means of each decile.

|         | Expenditure            |           | Income                 |           |  |  |  |  |
|---------|------------------------|-----------|------------------------|-----------|--|--|--|--|
| Decile  | Decile boundaries      | Mean      | Decile boundaries      | Mean      |  |  |  |  |
| Lowest  | 63,000 - 322,000       | 236,000   | 0 - 49,000             | 18,000    |  |  |  |  |
| 2       | 322,000 - 459,000      | 389,000   | 49,000 - 111,000       | 81,000    |  |  |  |  |
| 3       | 459,000 - 587,000      | 520,000   | 111,000 - 185,000      | 146,000   |  |  |  |  |
| 4       | 587,000 - 713,000      | 650,000   | 185,000 - 268,000      | 225,000   |  |  |  |  |
| 5       | 713,000 - 873,000      | 793,000   | 268,000 - 363,000      | 314,000   |  |  |  |  |
| 6       | 873,000 - 1,095,000    | 984,000   | 363,000 - 491,000      | 426,000   |  |  |  |  |
| 7       | 1,095,000 - 1,358,000  | 1,223,000 | 491,000 - 662,000      | 572,000   |  |  |  |  |
| 8       | 1,358,000 - 1,759,000  | 1,537,000 | 662,000 - 942,000      | 786,000   |  |  |  |  |
| 9       | 1,759,000 - 2,513,000  | 2,083,000 | 942,000 - 1,500,000    | 1,182,000 |  |  |  |  |
| Highest | 2,513,000 - 24,221,000 | 3,891,000 | 1,500,000 - 32,409,000 | 2,702,000 |  |  |  |  |
| All     | 63,000 - 24,221,000    | 1,290,000 | 0 - 32,409,000         | 667,000   |  |  |  |  |

Note: Although exact boundaries were used in determining the decile, these have been rounded to the nearest thousand cedis for convenience of presentation.

Table 9.23 provides a more detailed analysis of the distribution of the sample by income and expenditure, highlighting the inequalities in the distribution of income and expenditure. Some individuals have high incomes but low expenditures, and vice versa. In the case of expenditure, the 10 percent of the population with the lowest expenditure account for less than 2 percent of total expenditure, while the 10 percent with the highest expenditure account for more than 31 percent of total expenditure. A look at income reveals even sharper inequalities.

Table 9.23 Comparison of per capita income and per capita expenditure

| _                         |      |      |      | Е    | xpenditu | re decile             |      |      |      |       | Share of       | Share o | of total |
|---------------------------|------|------|------|------|----------|-----------------------|------|------|------|-------|----------------|---------|----------|
|                           | 1    | 2    | 3    | 4    | 5        | 6                     | 7    | 8    | 9    | 10    | total sample - | inco    | me       |
| Income<br>decile          |      |      |      |      |          | share of total sample |      |      |      |       | sample -       | %       | Cum      |
| 1                         | 2.6  | 1.6  | 0.9  | 0.8  | 0.9      | 0.7                   | 0.6  | 0.8  | 0.6  | 0.7   | 10.0           | 0.3     | 0.3      |
| 2                         | 3.4  | 1.7  | 1.1  | 0.9  | 0.8      | 0.4                   | 0.4  | 0.3  | 0.3  | 0.3   | 10.0           | 1.2     | 1.5      |
| 3                         | 1.9  | 2.0  | 1.5  | 1.3  | 0.8      | 0.8                   | 0.7  | 0.2  | 0.3  | 0.4   | 10.0           | 2.3     | 3.8      |
| 4                         | 0.8  | 1.9  | 2.0  | 1.5  | 1.1      | 0.9                   | 0.6  | 0.8  | 0.4  | 0.3   | 10.0           | 3.4     | 7.2      |
| 5                         | 0.5  | 1.0  | 1.8  | 1.2  | 1.5      | 1.1                   | 1.1  | 0.9  | 0.6  | 0.2   | 10.0           | 4.8     | 12.0     |
| 6                         | 0.4  | 1.0  | 1.1  | 1.6  | 1.4      | 1.3                   | 1.3  | 1.0  | 0.6  | 0.3   | 10.0           | 6.5     | 18.5     |
| 7                         | 0.2  | 0.3  | 0.9  | 1.4  | 1.4      | 1.6                   | 1.4  | 1.3  | 0.9  | 0.6   | 10.0           | 8.8     | 27.3     |
| 8                         | 0.1  | 0.2  | 0.3  | 0.8  | 1.1      | 1.6                   | 1.7  | 1.9  | 1.7  | 0.9   | 10.0           | 12.1    | 39.4     |
| 9                         |      | 0.1  | 0.3  | 0.4  | 0.6      | 1.0                   | 1.5  | 1.6  | 2.4  | 1.7   | 10.0           | 18.1    | 57.5     |
| 10<br>Share of total      |      | 0.2  | 0.1  | 0.1  | 0.4      | 0.7                   | 0.8  | 1.2  | 2.1  | 4.8   | 10.0<br>100.0  | 42.5    | 100.0    |
| sample                    | 10.0 | 10.0 | 10.0 | 10.0 | 10.0     | 10.0                  | 10.0 | 10.0 | 10.0 | 10.0  | (25855)        |         |          |
| Share of total            | 10.0 | 10.0 | 10.0 | 10.0 | 10.0     | 10.0                  | 10.0 | 10.0 | 10.0 | 10.0  | (23033)        |         |          |
| expenditure               | 1.9  | 3.2  | 4.2  | 5.3  | 6.5      | 8.0                   | 10.0 | 12.6 | 17.0 | 31.3  |                | 100.0   |          |
| Cumulative share of total |      |      |      |      |          |                       |      |      |      |       |                |         |          |
| expenditure               | 1.9  | 5.1  | 9.3  | 14.6 | 21.1     | 29.1                  | 39.1 | 51.7 | 68.7 | 100.0 |                |         |          |

The differences between income and expenditure can be illustrated by means of a Lorenz curve, which plots a cumulative percentage of all persons, ranked from lowest to highest in terms of per capita income against their cumulative share of total income. A similar curve can be drawn using the expenditure data (Figure 9.1). If there were total equality of incomes, the curve would lie on the 45 degree line.

The extent to which the curve deviates from this line indicates the extent of inequality in income distribution. It can be seen from Figure 9.1 that the population is more unequal in terms of income than in terms of expenditure. These inequalities can be quantified by the Gini coefficient. If there was total equality of income and expenditure for everyone, then the Gini coefficient for each would be zero. For the GLSS 4, the Gini coefficient for income is 0.60 while that for expenditure is 0.43.

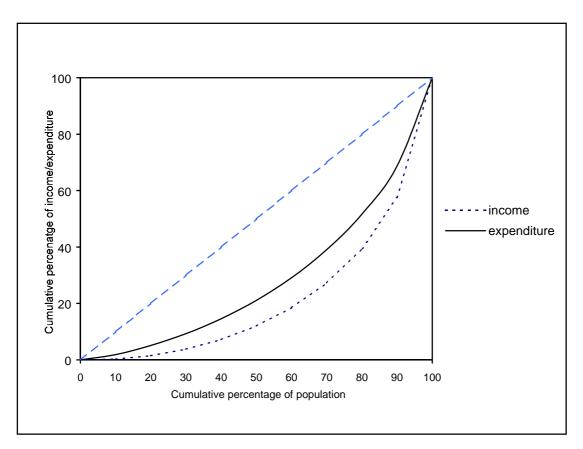


Figure 9.1 Inequalities in the distribution of income and expenditure

#### 9.10 Transfers

### 9.10.1 Remittances

A section of the GLSS 4 questionnaire sought information on income transfers to and from households. In a few cases the household reported having some members living temporarily away from the household, to whom they sent cash, food or goods. These were not counted as remittances, since they are effectively transfered within households. About 76 percent of all households reported having remitted money or goods in the previous 12 months to persons who were not their household members. The bulk of these remittances to non-household members went to relatives (93%), and in particular to parents or children (50%), brothers or sisters (18%), and other relatives (23%). Such income flows from the household benefited females (64%) more than males (36%). About 47 percent of all remittances sent were on a regular basis (7%, weekly; 19%, monthly; 11%, quarterly; and 10%, annually) and 51 percent on an irregular basis.

Almost all reported remittances from households (96%) were free, in that they would not be repaid by the recipients. A small proportion of recipients (2%) were living outside Ghana. The estimated total annual value of all remittances paid out was about ¢473 billion (Table 9.24).

Table 9.24 Mean annual household expenditure on, and receipts from remittances, and estimated total remittances, by locality.

|                | Annual exp                            | enditure on rem   | nittances              | Annual receipts from remittances            |                   |                   |  |  |
|----------------|---------------------------------------|-------------------|------------------------|---|-------------------|-------------------|--|--|
| Locality       | By households which actually remitted | By all households | Est. total expenditure | By households<br>which actually<br>received | By all households | Est. total income |  |  |
| Locumy         |                                       |                   | (billion               |   |                   | (billion          |  |  |
|                | (cedi:                                | s)                | cedis)                 | (cedis                                      | s)                | cedis)            |  |  |
|                | 325,000                               | 138,000           |                        |   |                   |                   |  |  |
| Urban          |                                       |                   | 205                    | 853,000                                     | 340,000           | 507               |  |  |
| Accra          | 400,000                               | 184,000           | 77                     | 1,284,000                                   | 453,000           | 191               |  |  |
| Other urban    | 292,000                               | 119,000           | 128                    | 710,000                                     | 295,000           | 316               |  |  |
|                | 240,000                               | 104,000           |                        |   |                   |                   |  |  |
| Rural          |                                       |                   | 268                    | 277,000                                     | 110,000           | 285               |  |  |
| Rural Coastal  | 240,000                               | 96,000            | 59                     | 291,000                                     | 125,000           | 76                |  |  |
| Rural Forest   | 260,000                               | 138,000           | 182                    | 319,000                                     | 133,000           | 175               |  |  |
| Rural Savannah | 157,000                               | 410,000           | 27                     | 156,000                                     | 52,000            | 34                |  |  |
| Ghana          | 271,000                               | 116,000           | 473                    | 488,000                                     | 195,000           | 792               |  |  |

In the same way as households incurred expenditure on transfers, they also received some income by this means. About 67 percent of all households reported having received money or goods in the last 12 months from individuals who were not members of their households. Regarding the frequency of remittances, 44 percent of all remittances received were made on a regular basis (6%, weekly; 16%, monthly; 10% quarterly; and 12% annually), while 53 percent were made on an irregular basis. Like remittances made out by households, in-flows were usually not to be repaid. The total estimated value of remittances received was ¢792 billion

Households that reported making remittances spent about \$271,000 annually on them, while those who received remittances received almost twice as much in the form of income transfers. Remittances from urban households were higher than those from rural households. Overall, households in Ghana spent an average of \$116,000 a year on remittances, and in turn received \$195,000 in remittances (Table 9.24). With the exception of the rural savannah, receipts appear to be higher than expenditures on remittances across all localities.

Table 9.25 provides national estimates of the value of total annual transfers in the form of remittances. While annual remittances to people overseas total only about ¢6 billion, the value of remittances received from abroad is about ¢339 billion, which represents 40 percent of all remittances received.

Table 9.25 Estimated total annual expenditure on remittances, by locality of destination, and total annual income from remittances, by locality of person remitting

|          |       | of househo | ure on remi<br>ld receiving<br>on cedis) | Estimated incomes from remittances Locality of household giving (billion cedis) |       |       |        |       |
|----------|-------|------------|--|---|-------|-------|--------|-------|
| Locality | Urban | Rural      | Abroad                                   | Total   | Urban | Rural | Abroad | Total |
| Urban    | 158   | 48         | 2  | 209   | 259   | 17    | 269    | 545   |
| Rural    | 150   | 118        | 4  | 272   | 155   | 72    | 70     | 297   |
| Total    | 308   | 167        | 6  | 480   | 414   | 89    | 339    | 842   |

# 9.10.2 Miscellaneous income and expenditure

Apart from remittances, the survey sought information about miscellaneous incomes and expenditures of households. In the case of miscellaneous income, households were asked how much income in cash or kind they received in the last 12 months from various sources: social security payments, state pensions, or from other government sources; and retirement benefits, dowries or inheritances, or from other non-government sources. Receipts from susu (the mutual saving scheme widely used in Ghana) were specifically excluded. Table 9.26 shows the average amount received from each source, by households in urban and rural areas.

Households reported receiving on average \$\psi 63,000\$ a year from miscellaneous sources. This represents an annual income of about \$\psi 256\$ billion nationally. On average, urban households received more from each source than rural households except from other government sources, where rural households received more than the urban households. Dowry or inheritance forms an important source of miscellaneous income for both the urban and rural households.

Table 9.26 Mean annual amounts of income received by urban and rural households from a variety of sources by locality.

|                        | Me     | Estimated total miscellaneous income |        |                 |
|------------------------|--------|--------------------------------------|--------|-----------------|
| Source of income       | Urban  | Rural                                | All    | <del>_</del>    |
|                        |        | (cedis)                              |        | (billion cedis) |
| Central government     |        |                                      |        |                 |
| Social security        | 1,400  | 1,800                                | 1,600  | 6.7             |
| State pension          | 27,100 | 10,000                               | 16,300 | 66.1            |
| Other                  | 600    | 4,000                                | 2,800  | 11.3            |
| Other sources          |        |                                      |        |                 |
| Retirement benefits    | 13,400 | 1,000                                | 5,600  | 22.6            |
| Dowry or inheritance   | 26,200 | 24,800                               | 25,300 | 103.1           |
| Other (excluding susu) | 15,900 | 8,900                                | 11,400 | 46.5            |
| Total                  | 84,600 | 50,500                               | 63,000 | 256.3           |

Information on various miscellaneous expenditures was also collected in the survey. These were expenditures on taxes, such as TV licences and property taxes; contributions to self-help projects; weddings, dowries, funerals or other ceremonies; gifts and presents (excluding all things mentioned under transfers); and other miscellaneous expenditures (excluding contributions to susu). On the average, households spend about ¢133,000 a year on the various items shown in Table 9.27. This is equivalent to a total expenditure across the country of about ¢540 billion.

Urban households on the average spend more on miscellaneous expenditures than rural households except for contributions to self-help projects where the rural people spend more than the urban people. The two major items of miscellaneous expenditure were expenditures on weddings, dowries, funerals and other ceremonies, which accounted for about 300 billion cedis annually (55% of total miscellaneous expenditure) and expenditure on gifts and presents which also accounted for ¢130 billion annually (24% of total miscellaneous expenditure)

Table 9.27 Mean annual amounts of expenditure paid by urban and rural households for a variety of purposes, and estimated total miscellaneous expenditure

|  | Mean    | household expe | nditure | Estimated total           |
|--|---------|----------------|---------|---------------------------|
| -  | Urban   | Urban Rural    |         | miscellaneous expenditure |
| Purpose of expenditure                     |         | (cedis)        |         | (billion cedis)           |
| Taxes (TV License, property tax etc.)      | 3,700   | 1,300          | 2,200   | 8.8                       |
| Contributions to self-help projects        | 9,500   | 10,200         | 9,900   | 40.4                      |
| Weddings, dowry, funeral, etc.             | 91,900  | 62,900         | 73,500  | 298.9                     |
| Gifts and presents (excluding remittances) | 36,700  | 28,900         | 31,800  | 129.3                     |
| Other miscellaneous expenditures           | 21,500  | 12,500         | 15,800  | 64.3                      |
| Total                                      | 163,300 | 115,800        | 133,200 | 541.7                     |

## 10. CREDIT, ASSETS AND SAVINGS

#### 10.1 Credit

The availability or provision of credit provides an important source of additional finance for households, either to relieve a household during a difficult period or enable it to expand activities. Households were therefore asked for details of any loans they had taken.

A little over a third of all households (35%) reported that they owed money or goods to other persons, institutions or businesses. The extent of indebtedness, as measured by the proportion of households taking out loans, is lowest in the rural savannah, where less than 20 percent of the households were indebted and highest in rural coastal, where 38 percent of households were indebted. As to the source of the loans, over half (58%) came from relatives, friends or neighbours and almost a quarter (22%) from traders. The only other significant sources were money lenders (5%) and formal financial institutions that is, private and state banks (6%).

As to the purpose for which the loans were used, 35 percent were for the purchase of consumer goods, 22 percent for business expansion, 10 percent for health reasons, 9 percent for ceremonies such as weddings or funerals and 7 percent for agriculture inputs. For 92 percent of the loans, the lenders did not require any guarantee. Cattle, land or some other asset was used to guarantee the remaining 8 percent of the loans.

In a few instances, involving about 3.5 percent of all households interviewed in the survey, a household member had tried to get a loan but had been refused. Of the reasons given for the refusal of loans, the most common (mentioned by 43%) was that the person had insufficient income. Other refusals occurred because of insufficient collateral security (20%), inappropriate purpose for the loan (17%), and previous debt problems (9%).

## 10.2 Assets and durable consumer goods

Information was gathered from households on ownership of various assets and consumer durables. Table 10.1 shows the proportion of households in different localities owning various assets and consumer durables, and the contrast in ownership between urban and rural areas.

In general, the rate of ownership of most items is much higher in urban areas than it is in rural areas. It is higher in Accra than in other urban areas, and higher in the rural coastal and rural forest than it is in the rural savannah. The only clear exceptions to this rule are the ownership of houses and bicycles, where the pattern of ownership is reversed. Bicycle ownership is particularly interesting. Of the three-quarters of a million households owning a bicycle, almost half are in the rural savannah, where 49 percent of households reported that the household has at least one bicycle. In the case of electrical items, much of the variation in ownership is undoubtedly due to the absence of electricity in many rural areas.

Also shown in Table 10.1 are estimates for the country as a whole of the number of households owning each asset or good, and the total number of each asset or good owned.

The national estimates obtained by aggregating the sample figures indicate, for instance, that households have over 2.5 million radios of any kind, almost 1 million television sets, and about 700,000 refrigerators.

Table 10.1 Proportion of households owning various assets and consumer durables by locality (percent)

|                  |       | Urban |      |             | R      | ural     |      | Na   | tional estimat | tes   |
|------------------|-------|-------|------|-------------|--------|----------|------|------|----------------|-------|
| Asset/           | Accra | Other | All  | Coastal     | Forest | Savannah | All  |      | Hholds         | Total |
| consumer durable |       | urban |      |             |        |          |      | %    | owning         | owned |
|                  |       |       |      | (Percentage |        |          |      |      | (millions)     |       |
| Furniture        | 74.4  | 74.7  | 74.6 | 60.2        | 66.8   | 35.1     | 57.2 | 63.5 | 2.58           | 3.50  |
| Sewing machine   | 34.7  | 34.0  | 34.2 | 25.4        | 34.0   | 17.6     | 27.8 | 30.1 | 1.22           | 1.41  |
| Stove            | 33.9  | 18.0  | 22.5 | 8.6         | 7.1    | 2.3      | 6.2  | 12.2 | 0.50           | 0.53  |
| Refrigerator     | 40.6  | 26.5  | 30.5 | 8.6         | 8.0    | 1.1      | 6.4  | 15.2 | 0.61           | 0.71  |
| Air con.         | 0.8   | 0.1   | 0.3  |             | 0.1    | •        | 0.0  | 0.3  | 0.01           | 0.01  |
| Fan              | 60.5  | 36.8  | 43.5 | 12.3        | 11.6   | 1.5      | 9.2  | 21.8 | 0.89           | 1.04  |
| Radio            | 9.8   | 13.9  | 12.8 | 12.5        | 15.7   | 13.0     | 14.2 | 13.7 | 0.56           | 0.59  |
| Radio cassette   | 58.4  | 48.0  | 51.0 | 29.8        | 37.8   | 30.1     | 34.0 | 40.2 | 1.64           | 1.78  |
| Record player    | 3.9   | 3.8   | 3.8  | 0.8         | 1.8    | 0.3      | 1.2  | 2.1  | 0.09           | 0.09  |
| 3-in-1 Radio     | 10.0  | 5.5   | 6.8  | 1.0         | 2.4    | 0.2      | 1.5  | 3.4  | 0.14           | 0.15  |
| Video            | 12.3  | 5.8   | 7.6  | 1.7         | 1.9    | 0.3      | 1.4  | 3.9  | 0.16           | 0.16  |
| Washing machine  | 0.3   | 0.3   | 0.3  | 0.1         | 0.1    | 0.1      | 0.1  | 0.1  | 0.01           | 0.01  |
| Television       | 48.2  | 36.1  | 39.5 | 13.2        | 14.0   | 2.5      | 10.9 | 21.4 | 0.87           | 0.94  |
| Camera           | 6.6   | 4.1   | 4.8  | 1.2         | 1.4    | 0.6      | 1.2  | 2.5  | 0.10           | 0.11  |
| Electric iron    | 62.1  | 37.2  | 44.2 | 12.7        | 12.0   | 1.8      | 9.6  | 22.3 | 0.91           | 0.98  |
| Bicycle          | 6.1   | 12.4  | 10.6 | 10.7        | 13.3   | 48.8     | 21.6 | 17.6 | 0.72           | 0.82  |
| Motor cycle      | 0.6   | 1.5   | 1.2  | 0.4         | 0.7    | 1.8      | 0.9  | 1.0  | 0.04           | 0.04  |
| Car              | 7.3   | 2.6   | 3.9  | 1.3         | 1.6    | 0.5      | 1.3  | 2.2  | 0.09           | 0.10  |
| House            | 13.4  | 16.5  | 15.6 | 37.9        | 36.0   | 42.0     | 38.0 | 29.8 | 1.21           | 1.31  |
| Land/plot        | 11.8  | 17.6  | 16.0 | 22.7        | 37.7   | 10.7     | 27.3 | 23.2 | 0.94           | 1.06  |
| Shares           | 4.0   | 3.5   | 3.7  | 1.7         | 1.8    | 0.2      | 1.4  | 2.2  | 0.09           | 0.11  |
| Boat             |       | 0.1   | 0.0  |             |        | 1.0      | 0.3  | 0.2  | 0.01           | 0.01  |
| Canoes           | 0.3   | 0.9   | 0.7  | 1.9         | 0.4    | 3.1      | 1.4  | 1.2  | 0.05           | 0.07  |
| Outboard motor   | 0.6   | 0.3   | 0.4  | 0.2         | 0.1    | 0.4      | 0.2  | 0.3  | 0.01           | 0.01  |
| Sample size      | 620   | 1579  | 2199 | 899         | 1940   | 960      | 3799 | 5998 | (13.43)        |       |

# 10.3 Savings

Limited information was collected on savings accounts held by members of the household. More than a quarter of all households (28%) reported that someone in the household owned a savings account. Figure 10.1 highlights the variation between different parts of the country in the proportion of households maintaining a savings account. About 35 percent of the households in Accra maintained a savings account, whereas in rural savannah only about 13 percent maintained an account.

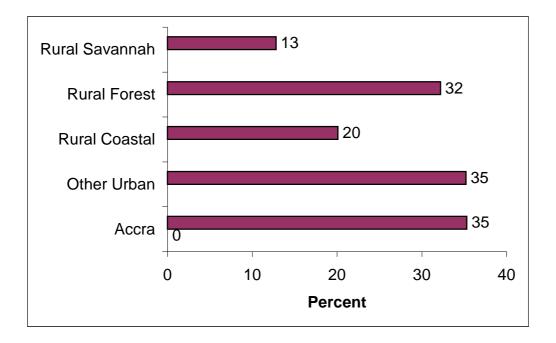


Figure 10.1 Proportion of households maintaining savings account by locality

## Appendix 1

#### SAMPLE DESIGN FOR ROUND 4 OF THE GLSS

A nationally representative sample of households was selected in order to achieve the survey objectives.

# **Sample Frame**

For the purposes of this survey the list of the 1984 population census Enumeration Areas (EAs) with population and household information was used as the sampling frame. The primary sampling units were the 1984 EAs with the secondary units being the households in the EAs. This frame, though quite old, was considered inadequate, it being the best available at the time. Indeed, this frame was used for the earlier rounds of the GLSS.

#### **Stratification**

In order to increase precision and reliability of the estimates, the technique of stratification was employed in the sample design, using geographical factors, ecological zones and location of residence as the main controls. Specifically, the EAs were first stratified according to the three ecological zones namely; Coastal, Forest and Savannah, and then within each zone further stratification was done based on the size of the locality into rural or urban.

## SAMPLE SELECTION

#### **EAs**

A two-stage sample was selected for the survey. At the first stage, 300 EAs were selected using systematic sampling with probability proportional to size method (PPS) where the size measure is the 1984 number of households in the EA. This was achieved by ordering the list of EAs with their sizes according to the strata. The size column was then cumulated, and with a random start and a fixed interval the sample EAs were selected.

It was observed that some of the selected EAs had grown in size over time and therefore needed segmentation. In this connection, such EAs were divided into approximately equal parts, each segment constituting about 200 households. Only one segment was then randomly selected for listing of the households.

## Households

At the second stage, a fixed number of 20 households was systematically selected from each selected EA to give a total of 6,000 households. Additional 5 households were selected as reserve to replace missing households. Equal number of households was selected from each EA in order to reflect the labour force focus of the survey.

**NOTE**: The above sample selection procedure deviated slightly from that used for the earlier rounds of the GLSS, as such the sample is not self-weighting. This is because,

- 1. given the long period between 1984 and the GLSS 4 fieldwork the number of households in the various EAs are likely to have grown at different rates.
- 2. the listing exercise was not properly done as some of the selected EAs were not listed completely. Moreover, it was noted that the segmentation done for larger EAs during the listing was a bit arbitrary.

#### **METHODOLOGY**

## **Survey Period**

The survey was spread over a 12-month period in order to ensure a continuous collection of household consumption expenditures and changes occurring thereof. The year was divided into 10 cycles of 36 days each. Interviews were conducted on the first 35 days of each cycle, while the 36<sup>th</sup> day was used by the field team for travelling to the next set of EAs.

#### **Data Collection**

Eleven teams were involved in the data collection. The purpose of the eleventh team was to afford each of the 10 regular teams the opportunity to take one month off as annual leave. The leave arrangements were such that there were always 10 teams at work. The constitution of a team is shown below:

- 1 Supervisor
- 4 Interviewers
- 1 Driver
- 1 Data Entry Operator

The Supervisor was the team leader and was responsible for overseeing, monitoring and, where necessary, correcting the work of the interviewers and the data entry operator. The interviewers conducted daily interviews with the household. To avoid any interruption in the survey schedule, three interviewers were always at work while the fourth took some rest.

Microcomputers (one per data collection team) were installed in the regional offices of the Ghana Statistical Service for the immediate entry of data from all questionnaires that were completed by each team. The data entry operator, who was stationed at the regional office, was responsible for entering the data collected from the field onto the microcomputer. On the other hand, the driver conveyed the team from the regional office to the places (EAs) where the survey was being carried out.

#### **Interviewer Workload**

A workload refers to the number of households selected for interviewing in each EA during a period of one cycle. Each enumerator covered one workload per cycle, and made a total of 7 visits at 5 days interval. In addition to the expenditure data, specific portions of the questionnaire were administered on each visit.

An interviewer was expected to complete 4 interviews (or households) a day, whether he/she was working in an urban or rural EA. Thus, a workload for a cycle of 5 days is 20 households.

In order not to complicate the data collection or miss any of the households the workload was divided into 5 batches of 4 households. The Batches were visited according to the following days of the 36 days cycle:

| Batch | Cycle Days                |
|-------|---------------------------|
| 1     | 1, 6, 11, 16, 21, 26, 31  |
| 2     | 2, 7, 12, 17, 22, 27, 32  |
| 3     | 3, 8, 13, 18, 23, 28, 33  |
| 4     | 4, 9, 14, 19, 24, 29, 34  |
| 5     | 5, 10, 15, 20, 25, 30, 35 |

<u>NOTE</u>: The 36th day of each cycle is used for travelling to the next set of EAs. These numbers are not actual calendar dates since the cyclic period of 36 days will lead to workloads in different EAs starting on different dates. The fourth interviewer will take over the work of interviewers (one at a time) so that each interviewer could have some rest during the cycle. This was arranged to suit the team's field itinerary.

To overcome the problem of memory lapse, a diary of daily consumption and expenditure was kept to support the interviews. During the first visit a literate person was identified in each household and trained to record all subsequent expenditures made by the household and to submit the diary to the interviewer on his or her next visit for entry into the appropriate sections. Where a household had no literate member the supervisor made daily visits to the household to record all expenditures in the diary meant for the household. Throughout the period of the survey, interviewers worked in separate EAs but were stationed in such a way that supervision would be manageable.

## **COMPUTATION OF WEIGHTS**

In order to get the true contribution of each selected EA in the sample, weights were computed based on the true sizes of the EAs since 1984, using the household listing from the 2000 Population and Housing Census conducted by the GSS. Even though the survey fieldwork was completed about a year ago before the census, in practice, the results will not differ significantly.

Let  $M_i$  = Number of 1984 population census household in the i<sup>th</sup> selected EA

M<sub>i</sub> = Number of 2000 Population households in the i<sup>th</sup> selected EA

 $\alpha$  = Number of EAs selected at the first stage

ie.  $\alpha = 300$ 

 $\beta$  = Number of households selected at the second stage

 $\beta = Nu$ ie.  $\beta = 20$ 

Then 
$$P_{1i} = \frac{\alpha M_i}{\sum M_i^*}$$
 and  $P_{2i} = \frac{\beta}{M_i^*}$ 

where  $P_{1i}\,$  and  $P_{2i}\,$  are the first and second stage probabilities of selection respectively

The overall probability of selection of households in a given EA is,

$$F_{i} = P_{1i}P_{2i} = \frac{\alpha \beta}{\sum M_{i}} * \frac{M_{i}}{M_{i}^{*}}$$

The weighting coefficient for the  $i^{th}$  EA  $W_i$ , is given by the reciprocal of the overall probability of selecting that EA.

Hence, 
$$W_i = \frac{1}{F_i} = \frac{\sum M_i}{\alpha \beta} * \frac{M_i^*}{M_i}$$

Given that  $\alpha = 300$  and  $\beta = 20$  and  $\Sigma M_i = 2,444,836$  (from 1984 census sample frame) then,

$$W_i = 407.5 * \frac{M_i^*}{M_i}$$

## **Survey Coverage**

Out of the selected 6000 households 5999 were successfully interviewed. One household was further dropped during the data cleaning exercise because it had very few records for many of the sections in the questionnaire. This gave 5998 household representing 99.7% coverage. Overall, 25,694 *eligible household members* (unweighted) were covered in the survey.

## **Grossing up estimates**

To obtain national estimates, the sample figures have to be grossed up by the appropriate factor. The 5998 households covered in the GLSS 4 contained 25,694 individuals and an average household size of 4.3. Using the 1984 population figure of 12.1 million (mid-March 1984) and the official growth rate of 2.6 the projected March 1999 population is about 18.3 million. This gives a grossing up multiplier of 712 (18.3 million divided by 25,964). The corresponding multiplier, when the weights are applied, is 708.

# Appendix 2

# **CONTENTS OF GLSS 4 QUESTIONNAIRE**

## **Household Questionnaire**

The household questionnaire was used to collect information on various topics, some of which pertain to eligible individual household members. The questionnaire is in two parts, A and B.

#### PART A

#### **Section 1: Household Roster**

The purpose of this section is to identify usual members of households, and to collect demographic data such as age, sex, marital status etc. regardless of his or her other socio-economic standing.

#### **Section 2: Education**

The objective of this section is to measure the level of education or formal schooling of all household members aged five (5) years or more. It is also intended to measure how much was spent on education of household members during the past 12 months, time spent on primary schooling, type of school (public or private) attended and the highest educational qualification achieved, including short training course. Information on adult literacy levels and apprenticeship of persons was also collected in this section.

#### **Section 3: Health**

This section gathers information on health status of all household members that will be used to measure the cost of medical care and the use made of the different kinds of health services and facilities available. Information on preventive services during the past 12 months, fertility and child mortality is collected.

## **Section 4: Employment**

This section is designed to gather information on employment, time use and the different sources of income for household members aged 7 years and over. This section is the special module of the fourth round of the survey and is therefore expanded to include several labour details.

### **Section 5: Migration**

The purpose of this section is to gather limited data on the spatial mobility of household members. The section is brief, focusing on the most recent migration to elicit information on previous place of residence, type of work and reasons for moving.

## **Section 6: Identification of Respondents for Next visits**

This section is mainly used to identify eligible members of household and make appointments with them for sections 8, 9, and 10 of the questionnaire.

## **Section 7: Housing**

The quality of house occupied by the household is paramount to the welfare of the members. In this regard, the section seeks information on the type of dwelling, occupancy status, number of rooms and room space, expenditures, utilities and amenities as well as the physical characteristics of the dwelling.

#### **PART B**

# **Section 8: Agriculture**

The purpose of this section is to collect data on the household's agricultural activities. It covers agricultural assets such as land, livestock and equipment. Furthermore, it provides data on agricultural production, technology, processing, marketing, income and consumption patterns.

## **Section 9: Household Expenditure**

This section collects data on households expenditures on food and non-food items over a period of 35 days.

# **Section 10: Non-Farm Enterprise**

This section is designed to obtain information on income for the household, specifically from non-farm enterprises. It also identifies which household members are responsible for each non-farm enterprise in terms of decision making and the allocation of income it generates. Non-farm enterprises that are currently operating and those that were operational some time in the past 12 months but currently not operating are considered.

#### **Section 11: Remittances**

Information on cash and/or in-kind remittances is collected in this section. Transfers to the household are considered as income whereas transfers from the household constitute expenditures. In the analysis however, net remittance is used.

# **Section 12: Credit, Assets and Savings**

This section of the questionnaire is designed to collect information on loans, assets and savings. The household members who contracted loans and those operating savings accounts are identified for interviewing.

#### **APPENDIX 3**

#### DESCRIPTION OF INCOME AND EXPENDITURE VARIABLES

# A. CONTENTS OF THE FILES INC\*: DISAGGREGATED HOUSEHOLD INCOME VARIABLES (expressed on an annual basis)

- INC1 SCHOL = Value of educational scholarship (at individual level)
- INC2 J1CASH = Employment income in cash, main job

J1SECASH = Self-employment income in money, main job

J1BONC = Bonus inc. in money pay, main job

J1BONK = Bonus not inc. in money, main job

J1K = Employment income in kind, main job

J1H = Employment income as subsd housing, main job

J1TR = Employment income as subsd transport, main job

J1OTH = Employment income in other forms, main job (all variables at individual level)

- <u>INC3</u> J2CASH = Employment income cash, 2<sup>nd</sup> job
  - J2SECASH = Self-employment income in cash, 2<sup>nd</sup> job

J2K = Employment income in food/animals, 2<sup>nd</sup> job

J2H = Employment income as housing/transport/other, 2<sup>nd</sup> job (all variables at individual level)

- <u>INC4</u> J3CASH = Employment income cash, 3<sup>rd</sup> job
  - J3SECASH = Self-employment income in cash, 3<sup>rd</sup> job
  - J3K = Employment income in kind, 3<sup>rd</sup> job (all variables at individual level)
- <u>INC5</u> J4CASH = Employment income cash, 4<sup>th</sup> job
  - J4SECASH = Self-employment income in cash, 4<sup>th</sup> job
  - J4K = Employment income in kind, 4<sup>th</sup> job (all variables at individual level)
- <u>INC6</u> INCWAT = Income from water sold (at household level)
- <u>INC7</u> INCLND1 = Income from renting out land
  - INCLND2 = Income from sharecropping (both at household level)
- INC8 INCLIV = Income from renting out livestock (at household level)
- <u>INC9</u> INCEQ = Income from renting out agricultural. Equipment (at level of each individual item)
- INC10 PSV1 = Revenue from sale of cash crops-main outlet
  - CROPSV2 = Revenue from sale of cash crops-other outlet (both at level of each individual crop)
- <u>INC11</u> ROOTSV = Revenue from sale of roots/fruit/vegetables (at level of each individual crop)
- <u>INC12</u> OTHAGINC = Revenue from other agricultural income (at household level)
- INC13 INCTRCRP = Revenue from transformed crops (at level of each individual product)
- INC14 INCNFC = Revenue in cash from non-farm enterprises
  - INCNFK = Revenue in goods/services from non-farm enterprises

INCNFDOM = Value of output of non-farm enterprises consumed domestically

INCNFRNT = Non-farm rent income

PRNFDOM = Profit of non-farm enterprises used within household

PRNFUND1 = Profit of non-farm enterprises paid to other households

PRNFUND2 = Profit of non-farm enterprises saved

PRNFUND3 = Profit of non-farm enterprises for other uses (at level of each enterprise)

<u>INC15</u> INCREM = Income from remittances (at level of each individual remittance)

INC16 INCMISC = Miscellaneous income (at level of each individual category)

# B. CONTENTS OF THE FILES EXP\*: DISAGGREGATED HOUSEHOLD EXPENDITURE VARIABLES (expressed on an annual basis)

- EXP1 EDUCEXP = Expenditure on education (at individual level)
- EXP2 WATB1 = Water bill 1
  - WATB2 = Water bill 2
  - ELECB = Electric bill
  - GARB = Garbage disposal bill (at household level)
- EXP3 LANDEXP = Expenditure on renting farm land (at level of individual farm)
- EXP4 CROPEXP = Expenditure on crop inputs (at level of each individual input)
- EXP5 LIVEXP = Expenditure on livestock inputs (at level of each individual input)
- EXP6 FDPREXP1 = Labour costs on food processing FDPREXP2 = Other costs on food processing (both at level of each individual product)
- EXP7 HP = Consumption of home production
- EXP8 YREXP = Less frequent non-food expenditure (at level of each item purchased)
- EXP9 DAYEXP = Frequent non-food expenditure
- EXP10 FOODEXP = Food expenditure (actual)
- EXP11 NFINP = Exp. on inputs of non-farm enterprises (at level of each expenditure item)
- EXP12 EQDEPN = Depreciation of farm equipment (at level of each individual item)
- <u>EXP13</u> ASSDEPN = Depreciation of non-farm capital assets (at level of asset type within each enterprise)
- <u>EXP14</u> REMITEXP = Expenditure on remittances (at level of each individual remittance)
- EXP15 MISCEXP = Miscellaneous expenditure (at household level)
- EXP16 USEVAL = Use value of durable goods (at level of each type of asset/good)
- EXP17 RENTPAID = Actual rental payment in cash and kind (at household level)
- EXP18 IMPRTOWN = Value of imputed rental services household owner (at household level)
- <u>EXP19</u> IMPRTPAR = Value of imputed rental services paid by parents (at household level)
- <u>EXP20</u> IMPRTEMP = Value of imputed rental services paid by employers (at household level)
- EXP21 IMPRTSQU = Value of imputed rental services squatter (at household level)

# C. CONTENTS OF THE FILES SUBAGG\*: SUBAGGREGATES OF HOUSEHOLD INCOMES AND EXPENDITURES

All variables are at the household level, except those in the files SUBAGG2, SUBAGG3, SUBAGG4 and SUBAGG5, which are at the individual level.

| SUBAGG1<br>SUBAGG2<br>SUBAGG3<br>SUBAGG4<br>SUBAGG5<br>SUBAGG6 | SCHOL1 = Value of scholarship, last 12 months  J1TOT = Total wage income main job – past 12 months  J2TOT = Total wage income 2 <sup>nd</sup> job – past 12 months  J3TOT = Total wage income 3 <sup>rd</sup> job – past 12 months  J4TOT = Total wage income 4 <sup>th</sup> job – past 12 months  FD = Total wage income paid in food  HO = Total wage income paid in housing  GD = Total wage income paid in other forms  |
|--|--|
| SUBAGG7  | SEFARM = Farm self employment income   |
| SUBAGG8  | SENONF = Non farm self employment income   |
| SUBAGG9  | WATINC = Income from water sold  |
| SUBAGG10   | LNDINC1 = Income from renting out land   |
|  | LNDINC2 = Income from sharecropping  |
| SUBAGG11   | LIVINC = Income from renting out livestock   |
| SUBAGG12   | EQINC = Income from renting out agricultural equipment   |
| SUBAGG13   | CRPINC1 = Revenue from sale of cash crops – main outlet  |
|  | CRPINC2 = Revenue from sale of cash crops – other outlet   |
| SUBAGG14   | ROOTINC = Revenue from sale of roots/fruit/vegetables  |
| SUBAGG15   | INCOTHAG = Revenue from other agricultural source  |
| SUBAGG16   | TRCRPINC = Revenue from the sale of transformed crop products  |
| SUBAGG17   | NFCINC = Revenue in cash from non farm enterprises   |
|  | NFKINC = Revenue in goods/services of non farm enterprises   |
|  | NFDOMINC = Value of non farm enterprise products consumed domestically   |
|  | PROFITNF = Profit of non farm enterprises for own purposes   |
|  | NFRNTINC = Non farm rent income  |
| SUBAGG18   | REMINC = Income from remittances   |
| SUBAGG19   | MISCINC = Miscellaneous income   |
| SUBAGG20   | EXPEDUC = Expenditure on educational items   |
| SUBAGG21   | HHUTILS = Expenditure on household utilities   |
| SUBAGG22   | EXPLAND = Expenditure on renting farm land   |
| SUBAGG23   | EXPCROP = Expenditure on crop input  |
| SUBAGG24   | EXPLIV = Expenditure on livestock inputs   |
| SUBAGG25   | EXPFDPR1 = Labour costs on food processing   |
| CLID A C C 26  | EXPFDPR2 = Other costs on food processing  |
| SUBAGG26   | HOMEPRO = Consumption of home-produced food  |
| SUBAGG27   | EXPYEAR = Less frequent non-food expenditure   |
| SUBAGG28   | EXPDAY = Frequent non-food exp.  |
| SUBAGG29<br>SUBAGG30   | EXPFOOD = Food expenditure (actual) INPNF = Expenditure on non-farm enterprises  |
| SUBAGG31   |  |
| SUBAGG32   | DEPNEQ = Depreciation of farming equipment DEPNASS = Depreciation of non farm capital assets   |
| SUBAGG33   | EXPREMIT = Expenditure on remittances  |
| SUBAGG34   | EXPMISC = Miscellaneous expenditure  |
| 500/10034  | 1221 Who who entitle who have a separation of the separation of th |

| SUBAGG35 | VALUSE = Use value of durable goods      |
|----------|--|
| SUBAGG36 | RENT1 = Imputed rent - household owner   |
| SUBAGG37 | RENT2 = Imputed rent - paid by parents   |
| SUBAGG38 | RENT3 = Actual rent in cash and kind     |
| SUBAGG39 | RENT4 = Imputed rent - paid by employers |
| SUBAGG40 | RENT5 = Imputed rent - squatters         |

## D. CONTENTS OF THE FILES AGG\*: AGGREGATES OF HOUSEHOLD INCOMES AND EXPENDITURES

All variables are at the household level

| AGG1         | TOTEMP = Income from employment                    |
|--------------|--|
| AGG2         | AGRI1 = HH agricultural income (1)                 |
|              | AGRI1C = HH agricultural income (1)- corrected     |
|              | AGRI2 = HH agricultural income (2)                 |
|              | AGRI2C = HH agricultural income (2)- corrected     |
|              | HHAGDEPN = Depreciation of farm equipment          |
| AGG3         | NFSEY1 = Gross non-farm self-employment income (1) |
|              | NFSEY2 = Gross non-farm self-employment income (2) |
|              | NFSEY3 = Gross non-farm self-employment income (3) |
|              | NFDEPN = Non-farm capital assets depreciation      |
| AGG4         | IMPRT = Actual and imputed rental income           |
| AGG5         | REMITINC = Income from remittances                 |
| AGG6         | OTHERINC = Other income                            |
| AGG7         | EXPFOOD = Food expenditure (actual)                |
|              | EXPFOODC = Food expenditure (actual)- corrected    |
| AGG8         | HOUSEXP = Expenditure on housing                   |
| AGG9         | OTHEXP = Other expenditure (actual)                |
|              | OTHEXPC = Other expenditure (actual)-corrected     |
| <u>AGG10</u> | IMPFOOD = Imputed food expenditure                 |
|              | IMPFOODC = Imputed food expenditure- corrected     |
| <u>AGG11</u> | IMPNFEXP = Other expenditure (imputed)             |
| AGG12        | EXPREMIT = Expenditure on remittances              |
|              |  |

## Appendix 4

## **SUPPLEMENTARY TABLES**

Table A1.1 Distribution of household heads by ethnicity and region (percent)

| Ethnicity     | Western | Central | G.Accra | Volta | Eastern | Ashanti | B/A  | Northern | U.West | U/East | Ghana |
|---------------|---------|---------|---------|-------|---------|---------|------|----------|--------|--------|-------|
|               |         |         |         |       |         |         |      |          |        |        |       |
| Asante        | 2.5     | 1.8     | 5.5     | 0.1   | 6.2     | 76.8    | 7.0  | 0.2      | -      | -      | 100   |
| Fanti         | 17.0    | 60.2    | 8.6     | 0.4   | 5.7     | 7.0     | 1.2  | -        | -      | -      | 100   |
| Other Akan    | 21.8    | 12.3    | 9.5     | 0.5   | 28.6    | 3.8     | 23.4 | 0.1      | -      | 0.1    | 100   |
| Ga-Adangbe    | 4.7     | 1.1     | 67.9    | 1.0   | 22.6    | 1.5     | 0.7  | 0.5      | -      | -      | 100   |
| Ewe           | 2.8     | 1.3     | 13.8    | 61.5  | 13.0    | 3.5     | 1.6  | 2.4      | -      | -      | 100   |
| Guan          | 5.2     | 10.4    | 6.7     | 43.0  | 24.9    | -       | 9.8  | -        | -      | -      | 100   |
| Hausa         | -       | 3.8     | 30.4    | 13.9  | 13.9    | 11.4    | 13.9 | 7.6      | -      | 5.1    | 100   |
| Dagomba       | 3.0     | 0.9     | 6.5     | 2.2   | 3.0     | 6.1     | 1.3  | 74.3     | 0.4    | 2.2    | 100   |
| Grussi/Frafra | 4.4     | -       | 7.1     | -     | 2.7     | 11.5    | 8.0  | 7.1      | -      | 59.3   | 100   |
| Dagarti       | 1.9     | _       | -       | -     | 1.9     | 3.1     | 6.3  | 11.9     | 74.4   | 0.6    | 100   |
| Other         | 16.6    | 1.7     | 4.3     | 9.2   | 3.5     | 9.8     | 11.0 | 18.4     | -      | 25.4   | 100   |
| All           | 10.7    | 11.7    | 14.3    | 10.7  | 13.7    | 17.7    | 9.0  | 6.0      | 2.0    | 4.3    | 100   |
| Sample size   | 638     | 700     | 860     | 640   | 820     | 1060    | 540  | 360      | 120    | 260    | 5998  |

Table A1.2 Household heads by religion and region

|                 | Western | Central | Gr. Accra | Volta | Eastern | Ashanti | Brong<br>Ahafo | Northern | Upper West | Upper East | Ghana |
|-----------------|---------|---------|-----------|-------|---------|---------|----------------|----------|------------|------------|-------|
| Catholic        | 14.3    | 12.6    | 5.6       | 16.2  | 8.1     | 15.0    | 11.5           | 4.4      | 9.0        | 3.2        | 100   |
| Anglican        | 24.0    | 15.2    | 38.4      | 1.6   | 8.8     | 11.2    | -              | -        | -          | 0.8        | 100   |
| Presbyterian    | 3.1     | 3.2     | 22.9      | 20.1  | 31.4    | 10.5    | 6.6            | 1.9      | -          | 0.3        | 100   |
| Methodist       | 17.4    | 22.7    | 18.1      | 0.9   | 8.5     | 23.9    | 8.4            | 0.2      | -          | -          | 100   |
| Pentecostal     | 12.8    | 7.3     | 21.7      | 7.1   | 16.4    | 23.4    | 9.8            | 1.5      | -          | -          | 100   |
| Spiritualist    | 17.4    | 32.1    | 9.8       | 5.6   | 16.4    | 15.7    | 2.1            | 1.0      | -          | -          | 100   |
| Other Christian | 11.6    | 13.8    | 13.6      | 4.8   | 15.8    | 26.9    | 10.5           | 1.5      | -          | 1.4        | 100   |
| Muslim          | 7.3     | 8.6     | 12.0      | 6.8   | 6.6     | 15.1    | 8.3            | 29.4     | 0.4        | 5.4        | 100   |
| Traditional     | 0.4     | 6.2     | 3.0       | 28.0  | 2.6     | 1.3     | 8.0            | 10.1     | 3.2        | 37.2       | 100   |
| No religion     | 7.7     | 7.9     | 14.8      | 9.9   | 18.1    | 20.8    | 12.8           | 4.4      | 3.5        | -          | 100   |
| Other           | -       | -       | 25.0      | 12.5  | 25.0    | 12.5    | =              | -        | -          | 25.0       | 100   |
| Total           | 10.7    | 11.7    | 14.3      | 10.7  | 13.7    | 17.7    | 9.0            | 6.0      | 2.0        | 4.3        | 100.0 |
| Sample size     | 639     | 700     | 859       | 640   | 820     | 1060    | 540            | 360      | 120        | 260        | 5998  |

Table A2.1 Average amount paid per person attending primary school in the last 12 months, by locality (cedis)

|                                       |         |         | Locality |        |          | A       | All        |
|---------------------------------------|---------|---------|----------|--------|----------|---------|------------|
| Item                                  | Accra   | Other   | Rural    | Rural  | Rural    | Amount  | Percentage |
|                                       |         | urban   | coastal  | forest | savannah |         |            |
|                                       | ¢       | ¢       | ¢        | ¢      | ¢        | ¢       | %          |
| School & registration fees            | 136,046 | 47,943  | 13,306   | 23,366 | 3,016    | 34,911  | 28.6       |
| Contributions to PTA                  | 4,515   | 1,966   | 708      | 1,784  | 1,298    | 1,819   | 1.5        |
| Uniforms & sports clothes             | 24,683  | 14,533  | 8,896    | 10,564 | 10,244   | 12,482  | 10.2       |
| Books & school supplies               | 30,368  | 11,484  | 4,829    | 6,101  | 3,632    | 9,027   | 7.4        |
| Transportation to/from school         | 18,162  | 7,310   | 3,199    | 2,759  | 82       | 4,973   | 4.1        |
| Food, board & lodging at school       | 121,747 | 58,674  | 40,732   | 42,308 | 14,584   | 49,184  | 40.3       |
| Other expenses (clubs, extra classes) | 27,614  | 11,269  | 4,784    | 3,701  | 1,178    | 7,564   | 6.2        |
| Other in-kind expenses                | 6,057   | 2,970   | 446      | 946    | 2,423    | 2,046   | 1.7        |
| Total                                 | 369,192 | 156,149 | 76,900   | 91,529 | 36,457   | 122,006 | 100.0      |

Note: The figures are based on those who attended or were attending school/college in the last 12 months.

Table A2.2 Average amount paid per person attending junior secondary school in the last 12 months, by locality (cedis)

|                                       |         |                | I                | All             |                   |         |            |
|---------------------------------------|---------|----------------|------------------|-----------------|-------------------|---------|------------|
| Item                                  | Accra   | Other<br>urban | Rural<br>coastal | Rural<br>forest | Rural<br>savannah | Amount  | Percentage |
|                                       | ¢       | ¢              | ¢                | ¢               | ¢                 | ¢       | %          |
| School & registration fees            | 294,664 | 240,175        | 83,682           | 246,561         | 44,409            | 215,404 | 50.9       |
| Contributions to PTA                  | 7,993   | 6,549          | 3,524            | 4,726           | 4,443             | 5,805   | 1.4        |
| Uniforms & sports clothes             | 24,919  | 23,147         | 12,037           | 17,238          | 19,321            | 20,362  | 4.8        |
| Books & school supplies               | 61,388  | 33,512         | 20,999           | 21,133          | 22,461            | 33,059  | 7.8        |
| Transportation to/from school         | 52,148  | 18,523         | 13,374           | 9,321           | 11,689            | 21,253  | 5.0        |
| Food, board & lodging at school       | 162,183 | 98,254         | 75,270           | 68,916          | 46,051            | 94,787  | 22.4       |
| Other expenses (clubs, extra classes) | 27,683  | 29,129         | 14,961           | 14,206          | 5,496             | 21,032  | 5.0        |
| Other in-kind expenses                | 15,321  | 15,993         | 3,585            | 2,432           | 17,136            | 11,220  | 2.7        |
| Total                                 | 646,299 | 465,282        | 227,432          | 384,533         | 171,006           | 422,922 | 100.0      |

Note: The figures are based on those who attended or were attending school/college in the last 12 months.

Table A2.3 Average amount paid per person attending senior secondary school in the last 12 months, by locality (cedis)

|                                       |         |                | Locality         |                 |                   | I       | All        |
|---------------------------------------|---------|----------------|------------------|-----------------|-------------------|---------|------------|
| Item                                  | Accra   | Other<br>urban | Rural<br>coastal | Rural<br>forest | Rural<br>savannah | Amount  | Percentage |
|                                       | ¢       | ¢              | ¢                | ¢               | ¢                 | ¢       | %          |
| School & registration fees            | 390,894 | 389,489        | 112,880          | 219,995         | 84,208            | 325,728 | 51.2       |
| Contributions to PTA                  | 4,852   | 4,925          | 1,600            | 11,753          | 6,141             | 5,750   | 0.9        |
| Uniforms & sports clothes             | 20,507  | 21,725         | 26,867           | 21,992          | 14,884            | 20,970  | 3.3        |
| Books & school supplies               | 138,156 | 44,336         | 75,938           | 48,609          | 27,510            | 66,691  | 10.5       |
| Transportation to/from school         | 99,143  | 16,061         | 38,727           | 15,451          | 35,399            | 38,642  | 6.1        |
| Food, board & lodging at school       | 207,737 | 101,421        | 315,338          | 136,390         | 55,954            | 135,045 | 21.2       |
| Other expenses (clubs, extra classes) | 13,084  | 28,019         | 33,009           | 54,661          | 22,924            | 27,473  | 4.3        |
| Other in-kind expenses                | 21,546  | 15,016         | 3,187            | 9,935           | 14,530            | 15,393  | 2.4        |
| Total                                 | 895,919 | 620,992        | 607,546          | 518,786         | 261,550           | 635,692 | 100.0      |

Note: The figures are based on those who attended or were attending school/college in the last 12 months.

Table A2.4 Average amount paid per person attending a school higher than a senior secondary school in the last 12 months, by locality (cedis)

|                                      |           | I           | All           |                 |                   |         |            |
|--------------------------------------|-----------|-------------|---------------|-----------------|-------------------|---------|------------|
| Item                                 | Accra     | Other urban | Rural coastal | Rural<br>forest | Rural<br>savannah | Amount  | Percentage |
|                                      | ¢         | ¢           | ¢             | ¢               | ¢                 | ¢       | %          |
| School & registration fees           | 604,317   | 594,705     | 175,615       | 84,340          | -                 | 504,539 | 52.3       |
| Contributions to PTA                 | 229       | 1,605       | -             | 4,719           | -                 | 1,115   | 0.1        |
| Uniforms & sports clothes            | 10,633    | 19,403      | -             | 32,838          | 150,000           | 21,591  | 2.2        |
| Books & school supplies              | 161,029   | 120,876     | 63,604        | 76,437          | 360,000           | 141,516 | 14.7       |
| Transportation to/from school        | 107,391   | 67,346      | 4,004         | 64,344          | 50,000            | 79,360  | 8.2        |
| Food, board & lodging at school      | 204,928   | 200,268     | 95,406        | 152,945         | -                 | 182,958 | 19.0       |
| Other expenses (clubs, extra classes | 3,756     | 2,149       | 22,339        | 113,250         | -                 | 13,110  | 1.4        |
| Other in-kind expenses               | 3,830     | 27,654      | -             | 95,880          | -                 | 20,362  | 2.1        |
| Total                                | 1,096,113 | 1,034,006   | 360,968       | 624,753         | 560,000           | 964,551 | 100.0      |

Note: All figures have been rounded to the nearest 1000 cedis

The figures are based on those who attended or were attending school/college in the last 12 months.

Table A3.1 Reasons for medical consultation during the previous two weeks, by locality and sex (percent of people reporting)

|                 |       |        |       |             |       |               | Locality |              |       |                |       |        |       |
|-----------------|-------|--------|-------|-------------|-------|---------------|----------|--------------|-------|----------------|-------|--------|-------|
| Reasons for     | Ac    | Accra  |       | Other urban |       | Rural Coastal |          | Rural Forest |       | Rural Savannah |       | Ghana  |       |
| Visit           | Male  | Female | Male  | Female      | Male  | Female        | Male     | Female       | Male  | Female         | Male  | Female | All   |
| Check up        | 2.8   | 2.2    | 0.9   | 1.5         | 0.5   | _             | 0.4      | 1.1          | 1.3   | 1.9            | 0.9   | 1.3    | 1.1   |
| Illness         | 88.8  | 96.4   | 87.7  | 91.5        | 89.1  | 92.5          | 87.6     | 93.3         | 91.5  | 95.4           | 88.6  | 93.2   | 91.1  |
| Injury          | 8.4   | 1.4    | 11.1  | 6.2         | 10.4  | 7.5           | 11.3     | 4.6          | 7.2   | 2.8            | 10.2  | 4.9    | 7.3   |
| Vaccination     | -     | -      | -     | -           | -     | -             | 0.2      | 0.2          | -     | -              | 0.1   | 0.1    | 0.1   |
| Pre-natal care  | -     | _      | -     | 0.4         | -     | -             | -        | 0.8          | -     | -              | -     | 0.4    | 0.2   |
| Post-natal care | -     | -      | 0.3   | 0.4         | -     | -             | 0.4      | -            | -     | -              | 0.2   | 0.1    | 0.2   |
| All             | 100.0 | 100.0  | 100.0 | 100.0       | 100.0 | 100.0         | 100.0    | 100.0        | 100.0 | 100.0          | 100.0 | 100.0  | 100.0 |
| Sample size     | 108   | 127    | 344   | 487         | 226   | 253           | 438      | 489          | 279   | 232            | 1396  | 1588   | 2983  |

Table A3.2 Women aged 15-49 years, currently pregnant or pregnant during the previous 12 months, who have received pre-natal care, by age group and locality (percent)

|           |       |             | Locality      |              |                |       |
|-----------|-------|-------------|---------------|--------------|----------------|-------|
| Age group | Accra | Other urban | Rural Coastal | Rural Forest | Rural Savannah | Ghana |
|           |       |             |               |              |                |       |
| 15 - 19   | 49.7  | 89.1        | 96.0          | 81.2         | 72.8           | 83.0  |
| 20 - 24   | 67.9  | 82.2        | 85.1          | 77.4         | 88.6           | 81.0  |
| 25 - 29   | 78.5  | 85.7        | 84.5          | 80.0         | 78.0           | 81.5  |
| 30 - 34   | 86.2  | 83.3        | 80.1          | 83.4         | 78.8           | 82.1  |
| 35 - 39   | 100.0 | 95.8        | 76.0          | 68.4         | 75.8           | 78.6  |
| 40 - 44   | 78.8  | 79.9        | 81.6          | 80.5         | 85.7           | 81.6  |
| 45 - 49   | =     | 100.0       | 100.0         | 82.0         | 97.1           | 91.8  |
| All       | 80.9  | 86.1        | 83.7          | 78.5         | 80.0           | 81.4  |

Table A3.3 Women aged 15-49 years, currently pregnant or pregnant during the previous 12 months, who have never went for pre-natal consultation, by locality and reason for not going (percent)

|                              |       |             | Locality         |              |                   |         |
|------------------------------|-------|-------------|------------------|--------------|-------------------|---------|
| Reason for no pre-natal care | Accra | Other urban | Rural<br>Coastal | Rural Forest | Rural<br>Savannah | Country |
| Cannot afford                | 13.3  | 26.3        | 36.0             | 37.4         | 35.4              | 33.2    |
| No health care available     | 6.7   | -           | 4.0              | 3.3          | 2.1               | 2.8     |
| Centre too far               | -     | -           | -                | 3.3          | 14.6              | 4.6     |
| Not necessary                | 46.7  | 44.7        | 24.0             | 34.1         | 27.1              | 34.1    |
| Other                        | 33.3  | 28.9        | 36.0             | 22.0         | 20.8              | 25.3    |
| All                          | 100.0 | 100.0       | 100.0            | 100.0        | 100.0             | 100.0   |
| Sample size                  | 16    | 37          | 30               | 94           | 50                | 228     |

Table A3.4 Children aged 7 years or under who have never been vaccinated, by age, locality and sex of child (percent)

|         |      |        | Lo          | ocality |      |        |         |        |
|---------|------|--------|-------------|---------|------|--------|---------|--------|
|         | Acc  | era    | Other urban |         | Ru   | ral    | Country |        |
|         | Male | Female | Male        | Female  | Male | Female | Male    | Female |
| Age     |      |        |             |         |      |        |         |        |
| 0 year  | 20.9 | 0.0    | 14.4        | 9.7     | 22.4 | 21.7   | 20.7    | 18.4   |
| 1 year  | 0.0  | 0.0    | 1.8         | 0.0     | 6.0  | 6.9    | 4.8     | 5.0    |
| 2 years | 0.0  | 0.0    | 2.2         | 0.0     | 7.1  | 6.4    | 5.5     | 4.8    |
| 3 years | 0.0  | 0.0    | 0.0         | 2.4     | 5.5  | 6.6    | 4.2     | 5.2    |
| 4 years | 7.9  | 0.0    | 0.0         | 0.0     | 5.6  | 3.5    | 4.7     | 2.4    |
| 5 years | 0.0  | 0.0    | 1.6         | 3.8     | 5.9  | 5.9    | 4.7     | 5.0    |
| 6 years | 0.0  | 0.0    | 1.1         | 1.6     | 7.3  | 7.7    | 5.3     | 5.6    |
| 7 years | 0.0  | 0.0    | 3.4         | 1.7     | 5.8  | 6.6    | 4.9     | 5.0    |
| All     | 2.9  | 0.0    | 3.0         | 2.2     | 8.0  | 8.1    | 6.7     | 6.3    |

Table A4.1 Educational levels of the active population, by sex and type of work (percent)

|  |                            | Educationa          | l Attainment |                        |       |             |
|--|----------------------------|---------------------|--------------|------------------------|-------|-------------|
| Type of Work                           | Never<br>been to<br>school | Less than MSLC/BECE | MSLC/BECE    | Secondary<br>or Higher | Total | Sample size |
| Males                                  |                            |                     |              |                        |       |             |
| Wage employment                        | 8.4                        | 9.4                 | 41.4         | 40.8                   | 100.0 | 876         |
| Self-employment (non-agriculture)      | 13.5                       | 21.1                | 48.1         | 17.4                   | 100.0 | 726         |
| Unpaid family worker (non-agriculture) | 4.8                        | 26.2                | 42.9         | 26.2                   | 100.0 | 42          |
| Self-employment (agriculture)          | 29.7                       | 22.9                | 40.7         | 6.7                    | 100.0 | 1807        |
| Unpaid family worker (agriculture)     | 30.2                       | 29.1                | 32.4         | 8.2                    | 100.0 | 364         |
| Other                                  | 25.0                       | 16.7                | 33.3         | 25.0                   | 100.0 | 12          |
| All                                    | 21.5                       | 20.1                | 41.5         | 16.9                   | 100.0 | 3827        |
| Females                                |                            |                     |              |                        |       |             |
| Wage employment                        | 10.3                       | 9.6                 | 43.6         | 36.5                   | 100.0 | 282         |
| Self-employment (non-agriculture)      | 33.7                       | 25.7                | 35.3         | 5.3                    | 100.0 | 1813        |
| Unpaid family worker (non-agriculture) | 21.8                       | 30.3                | 35.3         | 12.6                   | 100.0 | 119         |
| Self-employment (agriculture)          | 53.2                       | 27.2                | 18.8         | 0.8                    | 100.0 | 1435        |
| Unpaid family worker (agriculture)     | 58.7                       | 23.7                | 16.5         | 1.2                    | 100.0 | 917         |
| Other                                  | 0.0                        | 0.0                 | 100.0        | 0.0                    | 100.0 | 3           |
| All                                    | 43.1                       | 24.9                | 26.9         | 5.2                    | 100.0 | 4569        |
| Both Sexes                             |                            |                     |              |                        |       |             |
| Wage employment                        | 8.9                        | 9.4                 | 42.0         | 39.7                   | 100.0 | 1158        |
| Self-employment (non-agriculture)      | 27.9                       | 24.4                | 39.0         | 8.7                    | 100.0 | 2539        |
| Unpaid family worker (non-agriculture) | 17.4                       | 29.2                | 37.3         | 16.1                   | 100.0 | 161         |
| Self-employment (agriculture)          | 40.1                       | 24.8                | 31.0         | 4.1                    | 100.0 | 3242        |
| Unpaid family worker (agriculture)     | 50.6                       | 25.2                | 21.0         | 3.2                    | 100.0 | 1281        |
| Other                                  | 20.0                       | 13.3                | 46.7         | 20.0                   | 100.0 | 15          |
| All                                    | 33.3                       | 22.7                | 33.5         | 10.5                   | 100.0 | 8396        |

Table A4.2 Educational levels of the active population, by sex and main employer (percent)

|  |                            | Educationa             | l Attainment |                        |       |             |
|--|----------------------------|------------------------|--------------|------------------------|-------|-------------|
| Main Employer  | Never<br>been to<br>school | Less than<br>MSLC/BECE | MSLC/BECE    | Secondary<br>or Higher | Total | Sample size |
| Males  | 3011001                    |                        |              |                        |       |             |
| Self-employment (agriculture)                        | 29.8                       | 24.1                   | 39.2         | 6.9                    | 100.0 | 2154        |
| State-owned company                                  | 5.1                        | 3.2                    | 38.2         | 53.5                   | 100.0 | 374         |
| Private formal                                       | 10.1                       | 12.7                   | 45.3         | 32.0                   | 100.0 | 497         |
| Private informal & self-employment (non-agriculture) | 14.1                       | 21.7                   | 46.8         | 17.5                   | 100.0 | 802         |
| All  | 21.5                       | 20.1                   | 41.5         | 16.9                   | 100.0 | 3827        |
| Females  |                            |                        |              |                        |       |             |
| Self-employment (agriculture)                        | 55.3                       | 25.8                   | 18.0         | 0.9                    | 100.0 | 2237        |
| State-owned company                                  | 3.3                        | 2.6                    | 42.4         | 51.7                   | 100.0 | 151         |
| Private formal                                       | 15.4                       | 15.4                   | 47.7         | 21.5                   | 100.0 | 130         |
| Private informal & self-employment (non-agriculture) | 34.5                       | 26.0                   | 34.1         | 5.4                    | 100.0 | 2051        |
| All  | 43.1                       | 24.9                   | 26.9         | 5.2                    | 100.0 | 4569        |
| Both Sexes   |                            |                        |              |                        |       |             |
| Self-employment (agriculture)                        | 42.8                       | 25.0                   | 28.4         | 3.8                    | 100.0 | 4391        |
| State-owned company                                  | 4.6                        | 3.0                    | 39.4         | 53.0                   | 100.0 | 525         |
| Private formal                                       | 11.2                       | 13.2                   | 45.8         | 29.8                   | 100.0 | 627         |
| Private informal & self-employment (non-             | 28.7                       | 24.8                   | 37.7         | 8.8                    | 100.0 | 2853        |
| agriculture)   |                            |                        |              |                        |       |             |
| All  | 33.3                       | 22.7                   | 33.5         | 10.5                   | 100.0 | 8396        |

Table A4.3 Educational levels of the active population, by sex and main industry (percent)

|                       |         | Educationa | l Attainment |           |       |        |
|-----------------------|---------|------------|--------------|-----------|-------|--------|
| -                     | Never   | Less than  | MSLC/BECE    | Secondary | Total | Sample |
| Main Industry         | been to | MSLC/BECE  |              | or Higher |       | size   |
|                       | school  |            |              |           |       |        |
| <u>Males</u>          |         |            |              |           |       |        |
| Agriculture           | 29.7    | 24.1       | 39.1         | 7.0       | 100.0 | 2301   |
| Mining/Quarrying      | 7.7     | 21.2       | 53.8         | 17.3      | 100.0 | 52     |
| Manufacturing         | 15.1    | 20.6       | 48.0         | 16.3      | 100.0 | 344    |
| Utilities             | 0.0     | 7.1        | 50.0         | 42.9      | 100.0 | 14     |
| Construction          | 10.0    | 18.2       | 45.5         | 26.4      | 100.0 | 110    |
| Trading               | 9.9     | 15.2       | 45.4         | 29.4      | 100.0 | 282    |
| Transportation/comm.  | 5.1     | 16.3       | 55.6         | 23.0      | 100.0 | 178    |
| Financial services    | 1.6     | 4.8        | 36.5         | 57.1      | 100.0 | 63     |
| Community/Social ser. | 7.2     | 7.2        | 38.7         | 46.8      | 100.0 | 483    |
| All                   | 21.5    | 20.1       | 41.5         | 16.9      | 100.0 | 3827   |
| <u>Females</u>        |         |            |              |           |       |        |
| Agriculture           | 55.7    | 25.6       | 17.8         | 0.9       | 100.0 | 2343   |
| Mining/Quarrying      | 0.0     | 66.7       | 33.3         | 0.0       | 100.0 | 3      |
| Manufacturing         | 37.6    | 26.3       | 30.0         | 6.1       | 100.0 | 643    |
| Utilities             | 0.0     | 0.0        | 75.0         | 25.0      | 100.0 | 4      |
| Construction          | 14.3    | 57.1       | 28.6         | 0.0       | 100.0 | 7      |
| Trading               | 31.7    | 26.3       | 36.8         | 5.2       | 100.0 | 1257   |
| Transportation/comm.  | 0.0     | 0.0        | 50.0         | 50.0      | 100.0 | 4      |
| Financial services    | 0.0     | 0.0        | 16.7         | 83.3      | 100.0 | 6      |
| Community/Social ser. | 6.6     | 10.3       | 49.3         | 33.8      | 100.0 | 302    |
| All                   | 43.1    | 24.9       | 26.9         | 5.2       | 100.0 | 4569   |
| Both Sexes            |         |            |              |           |       |        |
| Agriculture           | 42.9    | 24.8       | 28.3         | 4.0       | 100.0 | 4644   |
| Mining/Quarrying      | 7.3     | 23.6       | 52.7         | 16.4      | 100.0 | 55     |
| Manufacturing         | 29.8    | 24.3       | 36.3         | 9.6       | 100.0 | 987    |
| Utilities             | 0.0     | 5.6        | 55.6         | 38.9      | 100.0 | 18     |
| Construction          | 10.3    | 20.5       | 44.4         | 24.8      | 100.0 | 117    |
| Trading               | 27.7    | 24.3       | 38.3         | 9.6       | 100.0 | 1539   |
| Transportation/comm.  | 4.9     | 15.9       | 55.5         | 23.6      | 100.0 | 182    |
| Financial services    | 1.4     | 4.3        | 34.8         | 59.4      | 100.0 | 69     |
| Community/Social ser. | 7.0     | 8.4        | 42.8         | 41.8      | 100.0 | 785    |
| All                   | 33.3    | 22.7       | 33.5         | 10.5      | 100.0 | 8396   |

Table A4.4 Distribution of population aged 7 + years by hours spent per day on fetching wood, by sex and age group (percent)

|            |              |      |      | Hours pe | r day spent o | n fetching w | ood |     |     |       |             |
|------------|--------------|------|------|----------|---------------|--------------|-----|-----|-----|-------|-------------|
| Sex        | Age<br>group | 0    | < 1  | 1-       | 2-            | 3-           | 4-  | 5-  | 6-  | All   | Sample size |
| Males      | 7-14         | 79.9 | 18.2 | 1.6      | 0.1           | 0.0          | 0.0 | 0.1 | 0.0 | 100.0 | 3097        |
|            | 15-19        | 74.8 | 23.2 | 1.1      | 0.4           | 0.1          | 0.1 | 0.1 | 0.1 | 100.0 | 1385        |
|            | 20-24        | 85.6 | 12.4 | 1.6      | 0.1           | 0.0          | 0.1 | 0.2 | 0.0 | 100.0 | 894         |
|            | 25-44        | 86.6 | 12.2 | 0.9      | 0.2           | 0.0          | 0.0 | 0.0 | 0.0 | 100.0 | 2381        |
|            | 45-59        | 88.5 | 10.2 | 0.8      | 0.3           | 0.2          | 0.1 | 0.1 | 0.0 | 100.0 | 1178        |
|            | 60 +         | 90.5 | 8.9  | 0.5      | 0.1           | 0.0          | 0.0 | 0.0 | 0.0 | 100.0 | 812         |
|            | All          | 83.3 | 15.2 | 1.2      | 0.2           | 0.1          | 0.1 | 0.1 | 0.0 | 100.0 | 9747        |
| Females    | 7-14         | 75.3 | 22.2 | 1.9      | 0.4           | 0.2          | 0.1 | 0.0 | 0.0 | 100.0 | 3063        |
|            | 15-19        | 65.8 | 29.8 | 3.6      | 0.2           | 0.2          | 0.2 | 0.2 | 0.0 | 100.0 | 1262        |
|            | 20-24        | 64.3 | 29.5 | 4.5      | 1.4           | 0.2          | 0.0 | 0.0 | 0.0 | 100.0 | 907         |
|            | 25-44        | 55.5 | 35.6 | 6.8      | 1.3           | 0.4          | 0.2 | 0.1 | 0.1 | 100.0 | 3271        |
|            | 45-59        | 51.1 | 39.0 | 7.1      | 1.6           | 0.5          | 0.4 | 0.2 | 0.0 | 100.0 | 1288        |
|            | 60 +         | 68.1 | 26.5 | 4.4      | 0.5           | 0.3          | 0.1 | 0.0 | 0.2 | 100.0 | 1051        |
|            | All          | 63.7 | 30.2 | 4.7      | 0.9           | 0.2          | 0.2 | 0.1 | 0.0 | 100.0 | 10842       |
| Both sexes |              |      |      |          |               |              |     |     |     |       |             |
|            | 7-14         | 77.6 | 20.2 | 1.8      | 0.2           | 0.0          | 0.0 | 0.0 | 0.0 | 100.0 | 6160        |
|            | 15-19        | 70.5 | 26.4 | 2.3      | 0.3           | 0.2          | 0.2 | 0.2 | 0.0 | 100.0 | 2647        |
|            | 20-24        | 74.8 | 21.0 | 3.1      | 0.8           | 0.1          | 0.1 | 0.1 | 0.0 | 100.0 | 1801        |
|            | 25-44        | 68.6 | 25.7 | 4.4      | 0.8           | 0.1          | 0.1 | 0.1 | 0.1 | 100.0 | 5652        |
|            | 45-59        | 68.9 | 25.2 | 4.1      | 1.0           | 0.2          | 0.2 | 0.2 | 0.0 | 100.0 | 2466        |
|            | 60 +         | 77.9 | 18.8 | 2.7      | 0.3           | 0.1          | 0.1 | 0.0 | 0.1 | 100.0 | 1863        |
|            | All          | 73.0 | 23.1 | 3.0      | 0.6           | 0.1          | 0.1 | 0.1 | 0.1 | 100.0 | 20589       |

Table A4.5 Average minutes per day spent on fetching wood, by age, sex and region

|         |              |         |         |                  |         | I     | Region  |                |          |               |               |     |
|---------|--------------|---------|---------|------------------|---------|-------|---------|----------------|----------|---------------|---------------|-----|
| Sex     | Age<br>group | Western | Central | Greater<br>Accra | Eastern | Volta | Ashanti | Brong<br>Ahafo | Northern | Upper<br>West | Upper<br>East | All |
| Males   | 7-14         | 22      | 20      | 24               | 24      | 21    | 42      | 29             | 61       | 31            | 39            | 29  |
|         | 15-19        | 54      | 18      | 19               | 33      | 23    | 31      | 30             | 60       | 26            | 50            | 33  |
|         | 20-24        | 25      | 23      | 43               | 32      | 17    | 28      | 27             | 87       | 23            | 11            | 34  |
|         | 25-44        | 29      | 26      | 23               | 24      | 17    | 39      | 20             | 45       | 24            | 17            | 27  |
|         | 45-59        | 21      | 24      | 14               | 28      | 25    | 54      | 19             | 94       | 25            | 17            | 34  |
|         | 60 +         | 56      | 19      | 36               | 35      | 18    | 29      | 11             | 36       | 17            | 26            | 27  |
|         | All          | 31      | 21      | 25               | 28      | 21    | 38      | 26             | 62       | 25            | 33            | 30  |
| Females | 7-14         | 25      | 25      | 17               | 31      | 20    | 29      | 33             | 40       | 51            | 39            | 29  |
|         | 15-19        | 25      | 19      | 31               | 37      | 25    | 32      | 27             | 79       | 41            | 38            | 34  |
|         | 20-24        | 25      | 24      | 26               | 31      | 23    | 51      | 32             | 55       | 49            | 41            | 36  |
|         | 25-44        | 33      | 33      | 29               | 49      | 27    | 52      | 32             | 52       | 45            | 43            | 40  |
|         | 45-59        | 30      | 28      | 34               | 49      | 35    | 54      | 35             | 59       | 44            | 41            | 42  |
|         | 60 +         | 28      | 24      | 36               | 30      | 21    | 60      | 43             | 48       | 44            | 43            | 36  |
|         | All          | 29      | 28      | 28               | 41      | 25    | 46      | 33             | 55       | 46            | 41            | 37  |
| Both    |              |         |         |                  |         |       |         |                |          |               |               |     |
| sexes   | 7-14         | 24      | 22      | 22               | 27      | 21    | 35      | 31             | 49       | 48            | 39            | 29  |
|         | 15-19        | 36      | 19      | 26               | 35      | 24    | 32      | 29             | 70       | 39            | 39            | 33  |
|         | 20-24        | 25      | 24      | 36               | 31      | 21    | 46      | 31             | 65       | 42            | 37            | 35  |
|         | 25-44        | 32      | 32      | 27               | 43      | 25    | 50      | 30             | 51       | 44            | 42            | 38  |
|         | 45-59        | 28      | 27      | 25               | 45      | 33    | 54      | 33             | 67       | 41            | 41            | 40  |
|         | 60 +         | 33      | 23      | 36               | 31      | 20    | 56      | 41             | 43       | 38            | 38            | 34  |
|         | All          | 29      | 26      | 26               | 37      | 24    | 44      | 31             | 57       | 43            | 40            | 35  |

Table A4.6 Distribution of population aged 7 + years by hours spent per day on fetching water, by sex and age group (percent)

|         |              |      |      | Hours pe | r day spent o | n fetching w | ater |     |     |       |                |
|---------|--------------|------|------|----------|---------------|--------------|------|-----|-----|-------|----------------|
| Sex     | Age<br>group | 0    | < 1  | 1-       | 2-            | 3-           | 4-   | 5-  | 6-  | All   | Sample<br>size |
| Males   | 7-14         | 42.6 | 44.6 | 7.8      | 4.0           | 0.6          | 0.2  | 0.3 | 0.1 | 100.0 | 3097           |
|         | 15-19        | 40.9 | 47.4 | 7.0      | 3.7           | 0.4          | 0.4  | 0.3 | 0.1 | 100.0 | 1385           |
|         | 20-24        | 61.2 | 34.3 | 3.1      | 0.8           | 0.2          | 0.2  | 0.0 | 0.1 | 100.0 | 894            |
|         | 25-44        | 78.5 | 19.3 | 1.7      | 0.4           | 0.0          | 0.0  | 0.0 | 0.0 | 100.0 | 2381           |
|         | 45-59        | 90.2 | 8.9  | 0.6      | 0.1           | 0.2          | 0.0  | 0.0 | 0.0 | 100.0 | 1178           |
|         | 60 +         | 91.9 | 7.6  | 0.4      | 0.0           | 0.0          | 0.1  | 0.0 | 0.0 | 100.0 | 812            |
|         | All          | 62.7 | 30.5 | 4.3      | 2.9           | 0.3          | 0.1  | 0.1 | 0.1 | 100.0 | 9747           |
| Females | 7-14         | 34.3 | 49.4 | 10.2     | 4.5           | 0.8          | 0.3  | 0.4 | 0.2 | 100.0 | 3063           |
|         | 15-19        | 25.4 | 55.9 | 10.6     | 5.8           | 1.4          | 0.5  | 0.2 | 0.2 | 100.0 | 1262           |
|         | 20-24        | 26.0 | 55.6 | 11.7     | 4.7           | 1.1          | 0.4  | 0.3 | 0.1 | 100.0 | 907            |
|         | 25-44        | 36.8 | 46.7 | 11.6     | 3.9           | 0.9          | 0.1  | 0.1 | 0.1 | 100.0 | 3271           |
|         | 45-59        | 57.0 | 32.6 | 7.5      | 1.7           | 0.5          | 0.4  | 0.2 | 0.1 | 100.0 | 1288           |
|         | 60 +         | 78.9 | 17.6 | 2.9      | 0.6           | 0.1          | 0.0  | 0.0 | 0.0 | 100.0 | 1051           |
|         | All          | 40.3 | 44.8 | 9.7      | 3.8           | 0.8          | 0.2  | 0.2 | 0.1 | 100.0 | 10842          |
| Both    |              |      |      |          |               |              |      |     |     |       |                |
| sexes   | 7-14         | 38.4 | 47.0 | 9.0      | 4.3           | 0.7          | 0.2  | 0.3 | 0.1 | 100.0 | 6160           |
|         | 15-19        | 33.5 | 51.4 | 8.7      | 4.7           | 0.9          | 0.4  | 0.2 | 0.2 | 100.0 | 2647           |
|         | 20-24        | 43.5 | 45.0 | 7.4      | 2.8           | 0.7          | 0.3  | 0.2 | 0.1 | 100.0 | 1801           |
|         | 25-44        | 54.4 | 35.1 | 7.4      | 2.4           | 0.5          | 0.1  | 0.1 | 0.1 | 100.0 | 5652           |
|         | 45-59        | 72.9 | 21.3 | 4.2      | 0.9           | 0.4          | 0.1  | 0.1 | 0.0 | 100.0 | 2466           |
|         | 60 +         | 84.5 | 13.3 | 1.8      | 0.3           | 0.1          | 0.0  | 0.0 | 0.0 | 100.0 | 1863           |
|         | All          | 50.9 | 38.0 | 7.2      | 2.9           | 0.6          | 0.2  | 0.2 | 0.1 | 100.0 | 20589          |

Table A4.7 Average minutes per day spent on fetching water, by age, sex and region

|         |       |         |         |         |         | Regio | n       |       |          |       |       |     |
|---------|-------|---------|---------|---------|---------|-------|---------|-------|----------|-------|-------|-----|
| Sex     | Age   | Western | Central | Greater | Eastern | Volta | Ashanti | Brong | Northern | Upper | Upper | All |
|         | group |         |         | Accra   |         |       |         | Ahafo |          | West  | East  |     |
| Males   | 7-14  | 44      | 32      | 26      | 32      | 30    | 49      | 39    | 61       | 39    | 37    | 38  |
|         | 15-19 | 49      | 26      | 30      | 32      | 30    | 43      | 28    | 69       | 21    | 30    | 36  |
|         | 20-24 | 19      | 27      | 15      | 38      | 21    | 23      | 19    | 81       | 17    | 50    | 26  |
|         | 25-44 | 24      | 22      | 16      | 21      | 29    | 21      | 19    | 43       | 35    | 29    | 23  |
|         | 45-59 | 30      | 22      | 11      | 20      | 20    | 22      | 26    | 180      | 34    | 23    | 24  |
|         | 60 +  | 20      | 38      | 8       | 15      | 14    | 41      | 29    | 9        | 0.0   | 23    | 18  |
|         | All   | 38      | 29      | 22      | 31      | 28    | 40      | 31    | 62       | 31    | 34    | 33  |
| Females | 7-14  | 39      | 35      | 38      | 42      | 33    | 54      | 35    | 60       | 28    | 39    | 41  |
|         | 15-19 | 36      | 32      | 32      | 53      | 33    | 40      | 31    | 96       | 43    | 53    | 42  |
|         | 20-24 | 35      | 23      | 17      | 39      | 40    | 42      | 40    | 101      | 39    | 36    | 40  |
|         | 25-44 | 31      | 34      | 21      | 49      | 28    | 43      | 33    | 72       | 44    | 49    | 41  |
|         | 45-59 | 23      | 31      | 13      | 36      | 25    | 37      | 35    | 91       | 41    | 54    | 39  |
|         | 60 +  | 28      | 25      | 13      | 27      | 25    | 33      | 23    | 54       | 51    | 42    | 28  |
|         | All   | 35      | 33      | 26      | 45      | 31    | 46      | 34    | 77       | 39    | 47    | 40  |
| Both    |       |         |         |         |         |       |         |       |          |       |       |     |
| sexes   | 7-14  | 41      | 34      | 32      | 37      | 31    | 51      | 37    | 60       | 30    | 38    | 40  |
|         | 15-19 | 41      | 29      | 31      | 43      | 31    | 41      | 30    | 85       | 36    | 44    | 39  |
|         | 20-24 | 30      | 24      | 16      | 39      | 33    | 36      | 35    | 97       | 34    | 42    | 35  |
|         | 25-44 | 30      | 32      | 19      | 46      | 29    | 39      | 30    | 69       | 44    | 46    | 37  |
|         | 45-59 | 25      | 30      | 13      | 35      | 24    | 34      | 34    | 93       | 41    | 49    | 36  |
|         | 60 +  | 26      | 27      | 11      | 24      | 22    | 34      | 24    | 49       | 51    | 37    | 26  |
|         | All   | 36      | 31      | 24      | 40      | 30    | 44      | 33    | 74       | 38    | 43    | 38  |

Table A4.8 Distribution of population aged 7 + years by hours spent per day on child care, by sex and age group (percent)

|               |              |      |      | Но   | urs per day s | spent on ch | ild care |     |      |       |             |
|---------------|--------------|------|------|------|---------------|-------------|----------|-----|------|-------|-------------|
| Sex           | Age<br>group | 0    | < 1  | 1-   | 2-            | 3-          | 4-       | 5-  | 6-   | All   | Sample size |
| Males         | 7-14         | 94.4 | 3.6  | 1.3  | 0.2           | 0.1         | 0.1      | 0.1 | 0.3  | 100.0 | 3097        |
| iviaics       | 15-19        | 95.4 | 2.8  | 0.9  | 0.4           | 0.1         | 0.0      | 0.1 | 0.3  | 100.0 | 1385        |
|               | 20-24        | 93.6 | 3.4  | 1.5  | 0.8           | 0.1         | 0.1      | 0.0 | 0.6  | 100.0 | 894         |
|               | 25-44        | 76.9 | 9.8  | 6.2  | 2.8           | 1.4         | 1.2      | 0.6 | 1.0  | 100.0 | 2381        |
|               | 45-59        | 82.3 | 6.6  | 5.6  | 2.5           | 0.9         | 0.6      | 0.5 | 1.0  | 100.0 | 1178        |
|               | 60 +         | 89.7 | 3.1  | 3.7  | 1.6           | 0.5         | 0.5      | 0.1 | 0.9  | 100.0 | 812         |
|               | All          | 88.3 | 5.3  | 3.2  | 1.3           | 0.5         | 0.5      | 0.3 | 0.9  | 100.0 | 9747        |
| Females       | 7-14         | 87.9 | 6.8  | 2.8  | 1.2           | 0.4         | 0.4      | 0.3 | 0.3  | 100.0 | 3063        |
|               | 15-19        | 78.0 | 7.8  | 4.3  | 2.9           | 1.2         | 1.1      | 1.6 | 3.2  | 100.0 | 1262        |
|               | 20-24        | 50.4 | 11.0 | 8.4  | 6.5           | 4.7         | 2.8      | 3.5 | 12.7 | 100.0 | 907         |
|               | 25-44        | 27.9 | 16.9 | 14.3 | 10.2          | 6.0         | 4.9      | 4.3 | 15.4 | 100.0 | 3271        |
|               | 45-59        | 55.0 | 14.9 | 11.2 | 5.7           | 2.8         | 2.3      | 1.7 | 6.4  | 100.0 | 1288        |
|               | 60 +         | 71.4 | 7.6  | 7.9  | 4.2           | 2.1         | 2.0      | 0.9 | 4.0  | 100.0 | 1051        |
|               | All          | 60.0 | 11.4 | 8.4  | 5.4           | 3.0         | 2.4      | 2.1 | 7.3  | 100.0 | 10842       |
| Both<br>sexes | 7-14         | 91.2 | 5.2  | 2.0  | 0.7           | 0.2         | 0.2      | 0.2 | 0.3  | 100.0 | 6160        |
|               | 15-19        | 87.1 | 5.2  | 2.5  | 1.6           | 0.6         | 0.5      | 0.8 | 1.7  | 100.0 | 2647        |
|               | 20-24        | 71.8 | 7.2  | 4.9  | 3.7           | 2.4         | 1.4      | 1.8 | 6.7  | 100.0 | 1801        |
|               | 25-44        | 48.6 | 13.9 | 10.9 | 7.1           | 4.1         | 3.3      | 2.8 | 9.4  | 100.0 | 5652        |
|               | 45-59        | 68.0 | 10.9 | 8.5  | 4.2           | 1.9         | 1.5      | 1.1 | 3.9  | 100.0 | 2466        |
|               | 60 +         | 79.3 | 5.6  | 6.1  | 3.1           | 1.4         | 1.3      | 0.5 | 2.6  | 100.0 | 1863        |
|               | All          | 73.4 | 8.5  | 5.9  | 3.5           | 1.8         | 1.5      | 1.3 | 4.2  | 100.0 | 20589       |

Table A4.9 Average minutes per day spent on child care, by age, sex and region

|               |       |         |         |         |         | Reg   | ion     |       |          |       |       |     |
|---------------|-------|---------|---------|---------|---------|-------|---------|-------|----------|-------|-------|-----|
| Sex           | Age   | Western | Central | Greater | Eastern | Volta | Ashanti | Brong | Northern | Upper | Upper | All |
|               | group |         |         | Accra   |         |       |         | Ahafo |          | West  | East  |     |
| Males         | 7-14  | 45      | 52      | 109     | 78      | 154   | 74      | 33    | 75       | 289   | 51    | 76  |
|               | 15-19 | 83      | -       | 176     | 43      | 16    | 26      | 103   | 105      | 59    | 48    | 80  |
|               | 20-24 | 72      | 208     | 118     | 73      | 260   | 117     | -     | 72       | 34    | 50    | 99  |
|               | 25-44 | 147     | 60      | 157     | 89      | 148   | 108     | 73    | 79       | 77    | 58    | 113 |
|               | 45-59 | 155     | 58      | 125     | 64      | 80    | 247     | 38    | 91       | 53    | 77    | 114 |
|               | 60 +  | 121     | 87      | 56      | 55      | 243   | 332     | 17    | 62       | 122   | 83    | 135 |
|               | All   | 133     | 65      | 144     | 74      | 141   | 152     | 60    | 82       | 129   | 61    | 107 |
| Females       | 7-14  | 97      | 37      | 122     | 73      | 159   | 85      | 93    | 73       | 73    | 60    | 83  |
|               | 15-19 | 199     | 88      | 225     | 150     | 214   | 246     | 93    | 156      | 50    | 107   | 174 |
|               | 20-24 | 395     | 168     | 250     | 174     | 289   | 324     | 195   | 185      | 81    | 73    | 254 |
|               | 25-44 | 358     | 146     | 248     | 203     | 222   | 310     | 129   | 158      | 71    | 139   | 222 |
|               | 45-59 | 175     | 98      | 192     | 164     | 214   | 311     | 79    | 120      | 54    | 91    | 170 |
|               | 60 +  | 259     | 108     | 145     | 116     | 225   | 290     | 108   | 123      | 108   | 110   | 171 |
|               | All   | 297     | 126     | 227     | 170     | 226   | 286     | 122   | 146      | 72    | 110   | 200 |
| Both<br>sexes | 7-14  | 85      | 40      | 117     | 75      | 159   | 82      | 80    | 74       | 129   | 56    | 81  |
| 56.165        | 15-19 | 182     | 88      | 213     | 123     | 194   | 230     | 94    | 137      | 52    | 80    | 156 |
|               | 20-24 | 362     | 170     | 223     | 157     | 287   | 309     | 195   | 172      | 74    | 66    | 237 |
|               | 25-44 | 294     | 132     | 227     | 184     | 211   | 279     | 120   | 146      | 72    | 120   | 201 |
|               | 45-59 | 165     | 91      | 172     | 145     | 190   | 298     | 70    | 108      | 54    | 87    | 155 |
|               | 60 +  | 233     | 106     | 136     | 96      | 228   | 300     | 100   | 111      | 112   | 96    | 163 |
|               | All   | 250     | 117     | 207     | 149     | 214   | 265     | 112   | 131      | 82    | 93    | 181 |

Table A4.10 Distribution of population aged 7 + years by hours spent per day on sweeping, by sex and age group (percent)

|            |              |      |      | Hours | per day sper | t on sweepii | ng  |     |     |       |                |
|------------|--------------|------|------|-------|--------------|--------------|-----|-----|-----|-------|----------------|
| Sex        | Age<br>group | 0    | < 1  | 1-    | 2-           | 3-           | 4-  | 5-  | 6-  | All   | Sample<br>Size |
| Males      | 7-14         | 72.9 | 26.4 | 0.6   | 0.1          | 0.0          | 0.0 | 0.0 | 0.0 | 100.0 | 3097           |
|            | 15-19        | 67.8 | 31.1 | 0.6   | 0.1          | 0.1          | 0.0 | 0.1 | 0.1 | 100.0 | 1385           |
|            | 20-24        | 73.9 | 25.6 | 0.4   | 0.0          | 0.0          | 0.0 | 0.0 | 0.0 | 100.0 | 894            |
|            | 25-44        | 77.7 | 22.0 | 0.3   | 0.0          | 0.0          | 0.0 | 0.0 | 0.0 | 100.0 | 2381           |
|            | 45-59        | 86.6 | 13.1 | 0.3   | 0.1          | 0.0          | 0.0 | 0.0 | 0.0 | 100.0 | 1178           |
|            | 60 +         | 85.8 | 14.0 | 0.1   | 0.0          | 0.0          | 0.0 | 0.0 | 0.0 | 100.0 | 812            |
|            | All          | 76.2 | 23.3 | 0.4   | 0.1          | 0.0          | 0.0 | 0.0 | 0.0 | 100.0 | 9747           |
| Females    | 7-14         | 42.1 | 55.4 | 2.1   | 0.2          | 0.1          | 0.0 | 0.0 | 0.0 | 100.0 | 3063           |
|            | 15-19        | 19.9 | 76.1 | 3.4   | 0.4          | 0.1          | 0.1 | 0.0 | 0.0 | 100.0 | 1262           |
|            | 20-24        | 17.4 | 77.6 | 4.3   | 0.4          | 0.1          | 0.0 | 0.0 | 0.1 | 100.0 | 907            |
|            | 25-44        | 17.4 | 77.7 | 4.6   | 0.3          | 0.0          | 0.0 | 0.0 | 0.0 | 100.0 | 3271           |
|            | 45-59        | 30.6 | 66.0 | .3.1  | 0.2          | 0.1          | 0.0 | 0.0 | 0.0 | 100.0 | 1288           |
|            | 60 +         | 50.1 | 48.5 | 1.1   | 0.2          | 0.0          | 0.0 | 0.0 | 0.0 | 100.0 | 1051           |
|            | All          | 29.4 | 67.0 | 3.2   | 0.3          | 0.1          | 0.0 | 0.0 | 0.0 | 100.0 | 10842          |
| Both sexes | 7-14         | 57.6 | 40.8 | 1.3   | 0.2          | 0.0          | 0.0 | 0.0 | 0.0 | 100.0 | 6160           |
|            | 15-19        | 45.0 | 52.6 | 2.0   | 0.3          | 0.1          | 0.1 | 0.0 | 0.0 | 100.0 | 2647           |
|            | 20-24        | 45.5 | 51.8 | 2.4   | 0.2          | 0.1          | 0.0 | 0.0 | 0.0 | 100.0 | 1801           |
|            | 25-44        | 42.8 | 54.2 | 2.8   | 0.2          | 0.0          | 0.0 | 0.0 | 0.0 | 100.0 | 5652           |
|            | 45-59        | 57.3 | 407  | 1.7   | 0.2          | 0.0          | 0.0 | 0.0 | 0.0 | 100.0 | 2466           |
|            | 60 +         | 65.7 | 33.5 | 0.7   | 0.1          | 0.0          | 0.0 | 0.0 | 0.0 | 100.0 | 1863           |
|            | All          | 51.6 | 46.3 | 1.9   | 0.2          | 0.0          | 0.0 | 0.0 | 0.0 | 100.0 | 20589          |

Table A4.11 Average minutes per day spent on sweeping, by age, sex and region

|        |       |         |         |         |         |       | gion    |       |          |       |       | <u>_</u> |
|--------|-------|---------|---------|---------|---------|-------|---------|-------|----------|-------|-------|----------|
| Sex    | Age   | Western | Central | Greater | Eastern | Volta | Ashanti | Brong | Northern | Upper | Upper | All      |
|        | group |         |         | Accra   |         |       |         | Ahafo |          | West  | East  |          |
| Male   | 7-14  | 15      | 11      | 11      | 15      | 16    | 17      | 24    | 19       | 19    | 18    | 15       |
|        | 15-19 | 20      | 12      | 14      | 15      | 23    | 13      | 25    | 12       | 12    | 13    | 17       |
|        | 20-24 | 14      | 10      | 9       | 8       | 9     | 13      | 11    | 30       | 13    | 12    | 12       |
|        | 25-44 | 12      | 9       | 7       | 10      | 14    | 13      | 21    | 13       | 16    | 11    | 12       |
|        | 45-59 | 13      | 16      | 9       | 10      | 12    | 13      | 25    | 12       | 21    | 10    | 13       |
|        | 60 +  | 13      | 7       | 6       | 10      | 12    | 17      | 13    | 4        | 9     | 23    | 11       |
|        | All   | 15      | 11      | 10      | 13      | 16    | 14      | 22    | 17       | 16    | 15    | 14       |
| Female | 7-14  | 16      | 13      | 14      | 18      | 18    | 21      | 28    | 21       | 27    | 21    | 19       |
|        | 15-19 | 18      | 15      | 15      | 21      | 24    | 23      | 23    | 22       | 18    | 21    | 20       |
|        | 20-24 | 19      | 19      | 12      | 22      | 26    | 21      | 27    | 24       | 19    | 19    | 21       |
|        | 25-44 | 19      | 19      | 13      | 23      | 21    | 25      | 27    | 22       | 24    | 21    | 21       |
|        | 45-59 | 20      | 17      | 12      | 20      | 20    | 20      | 25    | 22       | 18    | 18    | 19       |
|        | 60 +  | 19      | 15      | 8       | 20      | 18    | 19      | 21    | 18       | 22    | 16    | 17       |
|        | All   | 18      | 17      | 13      | 21      | 21    | 22      | 26    | 22       | 23    | 20    | 20       |
| Both   |       |         |         |         |         |       |         |       |          |       |       |          |
| sexes  | 7-14  | 16      | 13      | 13      | 17      | 17    | 20      | 27    | 20       | 26    | 20    | 18       |
|        | 15-19 | 19      | 14      | 14      | 19      | 24    | 21      | 24    | 21       | 17    | 18    | 19       |
|        | 20-24 | 18      | 16      | 11      | 18      | 22    | 20      | 24    | 26       | 18    | 16    | 19       |
|        | 25-44 | 18      | 18      | 12      | 20      | 20    | 23      | 26    | 21       | 23    | 20    | 20       |
|        | 45-59 | 19      | 17      | 12      | 19      | 19    | 19      | 25    | 20       | 18    | 17    | 18       |
|        | 60 +  | 18      | 14      | 7       | 18      | 17    | 18      | 20    | 17       | 21    | 18    | 16       |
|        | All   | 18      | 15      | 12      | 19      | 20    | 21      | 25    | 21       | 22    | 19    | 19       |

Table A4.12 Distribution of population aged 7 + years by hours spent per day on garbage disposal, by sex and age group (percent)

|            | _     |      | Hou  | ırs per day sp | ent on garba | ge disposal |     |       |        |
|------------|-------|------|------|----------------|--------------|-------------|-----|-------|--------|
| Sex        | Age   | 0    | < 1  | 1-             | 2-           | 3-          | 4-  | All   | Sample |
|            | group |      |      |                |              |             |     |       | size   |
| Males      | 7-14  | 63.8 | 35.7 | 0.5            | 0.0          | 0.0         | 0.0 | 100.0 | 3097   |
|            | 15-19 | 81.7 | 18.1 | 0.1            | 0.1          | 0.1         | 0.0 | 100.0 | 1385   |
|            | 20-24 | 89.3 | 10.6 | 0.0            | 0.0          | 0.1         | 0.0 | 100.0 | 894    |
|            | 25-44 | 92.2 | 7.8  | 0.0            | 0.0          | 0.0         | 0.0 | 100.0 | 2381   |
|            | 45-59 | 95.3 | 4.6  | 0.1            | 0.0          | 0.0         | 0.0 | 100.0 | 1178   |
|            | 60 +  | 94.8 | 5.2  | 0.0            | 0.0          | 0.0         | 0.0 | 100.0 | 812    |
|            | All   | 82.0 | 17.8 | 0.2            | 0.0          | 0.0         | 0.0 | 100.0 | 9747   |
| Females    | 7-14  | 40.4 | 58.6 | 0.9            | 0.0          | 0.0         | 0.0 | 100.0 | 3063   |
|            | 15-19 | 46.5 | 53.2 | 0.2            | 0.0          | 0.1         | 0.0 | 100.0 | 1262   |
|            | 20-24 | 47.2 | 52.4 | 0.3            | 0.0          | 0.1         | 0.0 | 100.0 | 90     |
|            | 25-44 | 55.8 | 43.7 | 0.2            | 0.0          | 0.0         | 0.1 | 100.0 | 327    |
|            | 45-59 | 66.7 | 33.2 | 0.1            | 0.1          | 0.1         | 0.0 | 100.0 | 128    |
|            | 60 +  | 76.1 | 23.6 | 0.2            | 0.0          | 0.1         | 0.0 | 100.0 | 105    |
|            | All   | 52.9 | 46.6 | 0.4            | 0.0          | 0.1         | 0.0 | 100.0 | 10842  |
| Both sexes | 7-14  | 52.2 | 47.1 | 0.7            | 0.0          | 0.0         | 0.0 | 100.0 | 6160   |
|            | 15-19 | 64.9 | 34.8 | 0.1            | 0.0          | 0.1         | 0.0 | 100.0 | 264    |
|            | 20-24 | 68.1 | 31.6 | 0.2            | 0.0          | 0.1         | 0.0 | 100.0 | 180    |
|            | 25-44 | 71.1 | 28.6 | 0.1            | 0.1          | 0.0         | 0.1 | 100.0 | 565    |
|            | 45-59 | 80.4 | 19.5 | 0.1            | 0.0          | 0.0         | 0.0 | 100.0 | 246    |
|            | 60 +  | 84.3 | 15.6 | 0.1            | 0.0          | 0.1         | 0.0 | 100.0 | 186    |
|            | All   | 66.7 | 32.9 | 0.3            | 0.0          | 0.0         | 0.0 | 100.0 | 2058   |

Table A4.13 Average minutes per day spent on garbage disposal, by age, sex and region

|         |              |         |         |                  |         | Reg   | gion    |                |          |               |               |     |
|---------|--------------|---------|---------|------------------|---------|-------|---------|----------------|----------|---------------|---------------|-----|
| Sex     | Age<br>group | Western | Central | Greater<br>Accra | Eastern | Volta | Ashanti | Brong<br>Ahafo | Northern | Upper<br>West | Upper<br>East | All |
| Males   | 7-14         | 15      | 10      | 10               | 7       | 8     | 20      | 22             | 19       | 11            | 5             | 12  |
|         | 15-19        | 9       | 8       | 19               | 6       | 8     | 11      | 19             | 15       | 10            | 4             | 11  |
|         | 20-24        | 11      | 6       | 23               | 4       | 3     | 9       | 10             | 14       | 9             | 5             | 10  |
|         | 25-44        | 12      | 8       | 4                | 4       | 6     | 8       | 9              | 6        | 7             | 5             | 6   |
|         | 45-59        | 22      | 9       | 3                | 3       | 4     | 15      | 17             | 5        | 10            | 6             | 8   |
|         | 60 +         | 10      | 8       | 11               | 5       | 9     | 19      | 9              | 4        | 9             | 6             | 9   |
|         | All          | 14      | 9       | 11               | 6       | 8     | 16      | 20             | 15       | 9             | 6             | 11  |
| Females | 7-14         | 14      | 10      | 12               | 9       | 9     | 16      | 20             | 12       | 10            | 6             | 12  |
|         | 15-19        | 12      | 10      | 9                | 11      | 8     | 13      | 19             | 12       | 8             | 6             | 11  |
|         | 20-24        | 11      | 10      | 14               | 7       | 8     | 11      | 14             | 13       | 7             | 6             | 10  |
|         | 25-44        | 12      | 14      | 11               | 9       | 11    | 13      | 15             | 9        | 12            | 5             | 11  |
|         | 45-59        | 10      | 13      | 5                | 7       | 9     | 11      | 14             | 9        | 10            | 5             | 9   |
|         | 60 +         | 14      | 10      | 6                | 6       | 7     | 14      | 16             | 6        | 9             | 5             | 9   |
|         | All          | 13      | 11      | 11               | 9       | 9     | 14      | 17             | 10       | 10            | 5             | 11  |
| Both    |              |         |         |                  |         |       |         |                |          |               |               |     |
| sexes   | 7-14         | 14      | 10      | 11               | 8       | 8     | 17      | 20             | 15       | 10            | 5             | 12  |
|         | 15-19        | 11      | 10      | 12               | 9       | 8     | 13      | 19             | 13       | 9             | 6             | 11  |
|         | 20-24        | 11      | 10      | 16               | 7       | 7     | 11      | 13             | 13       | 7             | 6             | 10  |
|         | 25-44        | 12      | 13      | 10               | 8       | 10    | 13      | 15             | 9        | 11            | 5             | 10  |
|         | 45-59        | 12      | 13      | 5                | 6       | 8     | 11      | 14             | 9        | 10            | 5             | 9   |
|         | 60 +         | 13      | 10      | 8                | 6       | 7     | 14      | 15             | 6        | 9             | 5             | 9   |
|         | All          | 13      | 11      | 11               | 8       | 9     | 14      | 18             | 11       | 10            | 5             | 11  |

Table A4.14 Distribution of population aged 7 + years by hours spent per day on cooking, by sex and age group (percent)

|            |           |      |      | Hou  | rs per day s | pent cooking | 3   |     |     |       |                |
|------------|-----------|------|------|------|--------------|--------------|-----|-----|-----|-------|----------------|
| Sex        | Age group | 0    | < 1  | 1-   | 2-           | 3-           | 4-  | 5-  | 6-  | All   | Sample<br>size |
| Males      | 7-14      | 96.3 | 2.2  | 1.0  | 0.4          | 0.2          | 0.0 | 0.0 | 0.0 | 100.0 | 3097           |
|            | 15-19     | 88.2 | 8.0  | 2.2  | 1.5          | 0.1          | 0.0 | 0.0 | 0.0 | 100.0 | 1385           |
|            | 20-24     | 84.7 | 9.7  | 4.0  | 1.5          | 0.0          | 0.1 | 0.0 | 0.0 | 100.0 | 894            |
|            | 25-44     | 80.6 | 11.8 | 4.5  | 2.1          | 0.8          | 0.1 | 0.0 | 0.0 | 100.0 | 2381           |
|            | 45-59     | 86.1 | 7.5  | 3.4  | 1.7          | 1.1          | 0.3 | 0.0 | 0.0 | 100.0 | 1178           |
|            | 60 +      | 85.8 | 7.0  | 4.6  | 1.7          | 0.7          | 0.1 | 0.0 | 0.0 | 100.0 | 812            |
|            | All       | 88.1 | 7.1  | 2.9  | 1.3          | 0.5          | 0.1 | 0.0 | 0.0 | 100.0 | 9747           |
| Females    | 7-14      | 79.1 | 10.6 | 5.8  | 2.6          | 1.3          | 0.3 | 0.1 | 0.1 | 100.0 | 3063           |
|            | 15-19     | 31.8 | 27.2 | 19.0 | 13.5         | 5.4          | 2.0 | 0.5 | 0.6 | 100.0 | 1262           |
|            | 20-24     | 20.1 | 25.6 | 18.3 | 22.1         | 9.5          | 3.1 | 0.4 | 1.0 | 100.0 | 907            |
|            | 25-44     | 7.6  | 17.5 | 24.5 | 28.2         | 15.3         | 5.0 | 0.9 | 1.0 | 100.0 | 3271           |
|            | 45-59     | 14.4 | 17.6 | 25.2 | 25.0         | 11.2         | 5.1 | 0.5 | 1.0 | 100.0 | 1288           |
|            | 60 +      | 36.5 | 19.6 | 21.0 | 14.6         | 6.4          | 1.7 | 0.0 | 0.2 | 100.0 | 1051           |
|            | All       | 35.3 | 17.6 | 17.8 | 17.1         | 8.3          | 2.9 | 0.5 | 0.6 | 100.0 | 10842          |
| Both sexes | 7-14      | 87.7 | 6.4  | 3.4  | 1.5          | 0.7          | 0.1 | 0.1 | 0.0 | 100.0 | 6160           |
|            | 15-19     | 61.3 | 17.2 | 10.2 | 7.3          | 2.6          | 0.2 | 0.2 | 0.3 | 100.0 | 2647           |
|            | 20-24     | 52.1 | 17.7 | 11.2 | 11.8         | 4.8          | 1.6 | 0.2 | 0.5 | 100.0 | 1801           |
|            | 25-44     | 38.4 | 15.1 | 16.1 | 17.2         | 9.2          | 2.9 | 0.5 | 0.6 | 100.0 | 5652           |
|            | 45-59     | 48.6 | 12.8 | 14.8 | 13.9         | 6.4          | 2.8 | 0.5 | 0.5 | 100.0 | 2466           |
|            | 60 +      | 58.0 | 14.1 | 13.8 | 9.0          | 3.9          | 1.0 | 0.0 | 0.1 | 100.0 | 1863           |
|            | All       | 60.3 | 12.6 | 10.7 | 9.6          | 4.6          | 1.5 | 0.2 | 0.3 | 100.0 | 20589          |

Table A4.15 Average minutes per day spent on cooking water, by age, sex and region

|         |       |         |         |         |         | Regi  | on      |       |          |       |       |     |
|---------|-------|---------|---------|---------|---------|-------|---------|-------|----------|-------|-------|-----|
| Sex     | Age   | Western | Central | Greater | Eastern | Volta | Ashanti | Brong | Northern | Upper | Upper | All |
|         | group |         |         | Accra   |         |       |         | Ahafo |          | West  | East  |     |
| Males   | 7-14  | 46      | 57      | 45      | 51      | 41    | 67      | 51    | 73       | -     | 90    | 56  |
|         | 15-19 | 47      | 33      | 57      | 31      | 59    | 55      | 41    | 69       | 24    | 137   | 48  |
|         | 20-24 | 40      | 36      | 35      | 57      | 51    | 50      | 34    | 64       | -     | 109   | 47  |
|         | 25-44 | 58      | 46      | 34      | 49      | 61    | 61      | 49    | 78       | 177   | 143   | 56  |
|         | 45-59 | 63      | 48      | 47      | 62      | 65    | 96      | 50    | 54       | 43    | 175   | 66  |
|         | 60 +  | 101     | 34      | 35      | 76      | 68    | 68      | 50    | 51       | 120   | 193   | 62  |
|         | All   | 56      | 43      | 40      | 50      | 60    | 64      | 47    | 72       | 85    | 140   | 56  |
| Females | 7-14  | 57      | 54      | 44      | 72      | 67    | 78      | 62    | 98       | 47    | 124   | 69  |
|         | 15-19 | 75      | 68      | 57      | 103     | 84    | 87      | 70    | 154      | 69    | 158   | 85  |
|         | 20-24 | 100     | 78      | 61      | 118     | 113   | 100     | 89    | 160      | 156   | 155   | 102 |
|         | 25-44 | 125     | 107     | 87      | 130     | 108   | 106     | 99    | 162      | 116   | 194   | 117 |
|         | 45-59 | 112     | 105     | 78      | 121     | 113   | 108     | 83    | 162      | 112   | 193   | 114 |
|         | 60 +  | 98      | 92      | 65      | 103     | 88    | 87      | 77    | 133      | 109   | 165   | 91  |
|         | All   | 104     | 94      | 75      | 116     | 100   | 98      | 85    | 156      | 107   | 180   | 104 |
| Both    |       |         |         |         |         |       |         |       |          |       |       |     |
| sexes   | 7-14  | 55      | 54      | 44      | 69      | 63    | 76      | 60    | 90       | 47    | 119   | 67  |
|         | 15-19 | 69      | 64      | 57      | 88      | 80    | 82      | 64    | 149      | 59    | 156   | 79  |
|         | 20-24 | 87      | 71      | 58      | 107     | 102   | 92      | 80    | 146      | 156   | 150   | 93  |
|         | 25-44 | 113     | 100     | 80      | 121     | 101   | 100     | 89    | 156      | 119   | 192   | 109 |
|         | 45-59 | 100     | 99      | 73      | 115     | 107   | 106     | 78    | 157      | 110   | 192   | 107 |
|         | 60 +  | 99      | 85      | 59      | 100     | 85    | 85      | 73    | 127      | 110   | 169   | 86  |
|         | All   | 95      | 88      | 70      | 107     | 94    | 93      | 79    | 148      | 106   | 177   | 97  |

Table A4.16 Percentage Employees that Recieve Sudsidies from Employers by Industry, Occupation and Main Employer.

|   | Bonuses,<br>Commission<br>& Tips | Food, Crops<br>and Animals | Free Accomodation | Free<br>Transport | Free Medical<br>Care |
|---|----------------------------------|----------------------------|-------------------|-------------------|----------------------|
| Industry  | 30.2                             | 8.6                        | 10.1              | 18.7              | 49.9                 |
| Agriculture   | 19.3                             | 13.5                       | 18.8              | 5.7               | 40.5                 |
| Mining/Quarrying                                      | 59.6                             | 5.6                        | 25.5              | 82.6              | 95.8                 |
| Manufacturing   | 30.3                             | 19.7                       | 9.4               | 21.4              | 46.8                 |
| Utilities   | 16.9                             | 0.0                        | 0.0               | 7.5               | 55.8                 |
| Construction  | 4.2                              | 2.9                        | 0.5               | 4.8               | 20.1                 |
| Trading   | 20.4                             | 24.2                       | 4.6               | 2.5               | 27.0                 |
| Transport/Communication                               | 42.2                             | 4.8                        | 11.4              | 24.1              | 44.5                 |
| Financial Services                                    | 61.9                             | 0.0                        | 6.0               | 13.7              | 65.0                 |
| Community / Social Services                           | 17.3                             | 6.6                        | 14.4              | 6.3               | 53.4                 |
| Occupation  | 23.4                             | 9.2                        | 10.5              | 8.9               | 46.3                 |
| Service   | 12.5                             | 12.7                       | 9.2               | 5.7               | 38.0                 |
| Professional / Technical                              | 21.1                             | 4.0                        | 10.8              | 8.3               | 53.1                 |
| Administrative / Managerial                           | 37.1                             | 0.0                        | 3.0               | 0.0               | 56.3                 |
| Clerical  | 34.9                             | 1.3                        | 14.3              | 18.9              | 75.5                 |
| Sales / Commerce                                      | 24.4                             | 13.6                       | 4.0               | 2.8               | 25.9                 |
| Agricultural  | 15.7                             | 15.9                       | 24.1              | 6.4               | 38.8                 |
| Production  | 29.2                             | 13.7                       | 9.0               | 23.5              | 44.6                 |
| Main Employer   | 17.8                             | 8.3                        | 8.2               | 9.3               | 42.3                 |
| Self-employed (Agriculture)                           | 5.1                              | 6.9                        | 2.3               | 7.7               | 47.2                 |
| Government  | 23.5                             | 1.2                        | 13.5              | 9.8               | 70.8                 |
| Private (Formal Sector)                               | 30.6                             | 16.1                       | 13.1              | 18.9              | 38.0                 |
| Private (Informal) & Self-employed (Non-agricultural) | 12.0                             | 9.0                        | 4.0               | 0.6               | 13.2                 |

Table A4.17 Percentage Employees that Receive Benefits from Their Employers by Industry, Occupation and Main Employer.

|                                    | Paid Holiday | Paid Sick<br>Leave | Retirement<br>Pension | Social<br>Security<br>Benefits |
|------------------------------------|--------------|--------------------|-----------------------|--------------------------------|
| Industry                           | 53.0         | 57.1               | 31.7                  | 44.2                           |
| Agriculture                        | 38.0         | 45.8               | 19.5                  | 36.4                           |
| Mining/Quarrying                   | 85.8         | 96.4               | 44.3                  | 58.9                           |
| Manufacturing                      | 48.3         | 42.2               | 18.1                  | 35.7                           |
| Utilities                          | 55.8         | 55.8               | 64.5                  | 55.8                           |
| Construction                       | 17.6         | 21.3               | 5.5                   | 12.1                           |
| Trading                            | 30.3         | 36.8               | 7.7                   | 19.4                           |
| Transport/Communication            | 55.1         | 62.6               | 21.6                  | 39.5                           |
| Financial Services                 | 63.7         | 70.6               | 53.4                  | 71.1                           |
| Community / Social Services        | 82.8         | 82.1               | 50.6                  | 69.1                           |
| Occupation                         | 56.8         | 57.2               | 31.8                  | 45.6                           |
| Service                            | 47.8         | 46.0               | 31.7                  | 36.9                           |
| Professional / Technical           | 92.8         | 90.7               | 52.4                  | 81.1                           |
| Administrative / Managerial        | 75.3         | 63.1               | 33.4                  | 53.3                           |
| Clerical                           | 85.0         | 88.1               | 59.6                  | 75.8                           |
| Sales / Commerce                   | 27.3         | 33.8               | 7.9                   | 16.4                           |
| Agricultural                       | 31.7         | 42.1               | 17.6                  | 30.4                           |
| Production                         | 46.5         | 48.3               | 20.0                  | 33.8                           |
| Main Employer                      | 56.9         | 61.6               | 28.2                  | 48.2                           |
| Self-employed (Agriculture)        | 64.6         | 83.6               | 28.7                  | 67.6                           |
| Government                         | 94.3         | 93.9               | 64.6                  | 85.5                           |
| Private (Formal Sector)            | 42.7         | 47.1               | 15.8                  | 29.7                           |
| Private (Informal) & Self-employed |              |                    |                       |                                |
| (Non-agricultural)                 | 25.9         | 21.6               | 3.7                   | 9.9                            |

Table A4.18 Percentage Employees that had Taxes Deducted from Pay, Had a Written Contract and are Registered with a Trade Union.

|   | Taxes<br>Deducted<br>from Pay | With Written<br>Contract | With Trade<br>Union |
|---|-------------------------------|--------------------------|---------------------|
| Industry  | 55.3                          | 44.4                     | 43.6                |
| Agriculture   | 40.3                          | 33.5                     | 35.2                |
| Mining/Quarrying                                      | 91.7                          | 84.4                     | 89.8                |
| Manufacturing   | 43.4                          | 29.7                     | 23.5                |
| Utilities   | 67.6                          | 34.2                     | 55.8                |
| Construction  | 25.0                          | 22.8                     | 9.1                 |
| Trading   | 28.1                          | 23.1                     | 16.7                |
| Transport/Communication                               | 46.8                          | 37.0                     | 46.9                |
| Financial Services                                    | 77.1                          | 63.9                     | 55.7                |
| Community / Social Services                           | 77.9                          | 71.4                     | 59.4                |
| Occupation  | 57.1                          | 47.3                     | 39.9                |
| Service   | 39.5                          | 36.0                     | 33.9                |
| Professional / Technical                              | 85.8                          | 80.7                     | 73.1                |
| Administrative / Managerial                           | 92.8                          | 63.8                     | 33.4                |
| Clerical  | 85.4                          | 76.6                     | 65.5                |
| Sales / Commerce                                      | 31.1                          | 16.6                     | 13.9                |
| Agricultural  | 35.9                          | 30.0                     | 31.7                |
| Production  | 46.3                          | 38.4                     | 33.8                |
| Main Employer   | 60.7                          | 49.3                     | 46.3                |
| Self-employed (Agriculture)                           | 73.6                          | 63.4                     | 71.6                |
| Government  | 95.2                          | 83.4                     | 77.7                |
| Private (Formal Sector)                               | 35.2                          | 32.4                     | 26.6                |
| Private (Informal) & Self-employed (Non-agricultural) | 38.8                          | 17.8                     | 9.2                 |

Table A6.1 Distribution of households by type of dwelling, locality and sex of head of household (percent)

|                                     |       |        | Lo    | cality  |       |        |       | -      |
|-------------------------------------|-------|--------|-------|---------|-------|--------|-------|--------|
|                                     | A     | ccra   | Othe  | r urban | Rı    | ıral   | Gh    | ana    |
|                                     | Male  | Female | Male  | Female  | Male  | Female | Male  | Female |
| Type of dwelling                    |       |        |       |         |       |        |       |        |
| One family house                    | 3.9   | 9.2    | 8.3   | 6.6     | 19.5  | 15.0   | 15.2  | 11.8   |
| Apartment/Flat                      | 5.8   | 4.9    | 4.6   | 3.7     | 1.0   | 0.8    | 2.4   | 2.1    |
| Room(s) (compound house)            | 77.3  | 75.7   | 63.0  | 68.9    | 41.1  | 52.4   | 50.2  | 59.8   |
| Room(s) (others)                    | 11.4  | 8.7    | 20.1  | 19.7    | 18.9  | 21.1   | 18.4  | 19.4   |
| Huts/Buildings (same compound)      | 1.4   | 1.5    | 3.3   | 0.5     | 18.0  | 10.6   | 12.8  | 6.5    |
| Huts/Buildings (different compound) | -     | -      | 0.2   | 0.5     | 1.4   | 0.2    | 1.0   | 0.2    |
| Other                               | 0.2   | -      | 0.4   | 0.2     | 0.0   | -      | 0.2   | 0.0    |
| All                                 | 100.0 | 100.0  | 100.0 | 100.0   | 100.0 | 100.0  | 100.0 | 100.0  |
| Sample size                         | 414   | 206    | 960   | 620     | 2608  | 1191   | 3982  | 2017   |

Table A6.2 Distribution of households, which rent their dwelling, by locality, sex of head of household, and person from whom they rent

|                                |       |        | Lo    | cality |       |        |         |        |
|--------------------------------|-------|--------|-------|--------|-------|--------|---------|--------|
|                                | Ac    | ecra   | Other | urban  | Rural |        | Country |        |
|                                | Male  | Female | Male  | Female | Male  | Female | Male    | Female |
| From whom they rented dwelling |       |        |       |        |       |        |         |        |
| Relative                       | 12.1  | 8.8    | 3.0   | 3.2    | 7.6   | 8.3    | 6.3     | 5.6    |
| Private employer               | 5.1   | 14.0   | 1.3   | 1.6    | 2.3   | 1.0    | 2.3     | 3.6    |
| Government                     | -     | -      | 10.7  | 7.6    | 10.9  | 5.2    | 8.8     | 5.6    |
| Private individual or agency   | 82.8  | 77.2   | 84.8  | 87.6   | 78.3  | 85.4   | 82.1    | 85.2   |
| Other                          | -     | -      | 0.3   | -      | 1.0   | -      | 0.5     | -      |
| All                            | 100.0 | 100.0  | 100.0 | 100.0  | 100.0 | 100.0  | 100.0   | 100.0  |
| Sample size                    | 157   | 57     | 394   | 185    | 304   | 96     | 855     | 338    |

Table A7.1 Average value of reported household and per capita home consumption of food and beverages, by item and locality

| 1. <b>Foo</b> |         |  | househo   | ld home cons | umption     | capita l | nome consur | nnfion   |
|---------------|---------|--|-----------|--------------|-------------|----------|-------------|----------|
|               |         |  | T T 1     |              | C1          |          |             | _        |
|               | ռ և հո  | Beverages                                      | Urban     | Rural        | Ghana       | Urban    | Rural       | Ghana    |
| 001           | Ju et 1 | Severages                                      |           |              |             |          |             |          |
| ΛΛ 1          | 01      | Cereals And Cereal Products                    |           |              |             |          |             |          |
|               |         | Rice (Paddy, Grain)                            | 331       | 3958         | 5162        | 85       | 1752        | 1197     |
| 002           |         | Maize - Cob (Fresh)                            | 55        | 5260         | 3535        | 142      | 1158        | 820      |
| 003           |         | Maize - Flour/Dough                            | 10658     | 53987        | 38102       | 2726     | 11886       | 8839     |
| 004           |         | Sorghum  | -         | 1266         | 802         | -        | 279         | 180      |
| 005           |         | Millet Grain                                   | 227       | 1700         | 1160        | 58       | 374         | 269      |
| 006           |         | Millet Flour                                   | 153       | 9891         | 6321        | 39       | 2178        | 1460     |
| 007           |         | Guinea Corn                                    | 246       | 9486         | 6099        | 63       | 2088        | 141:     |
| 800           |         | Other Grains                                   | -         | 7            | 4           | -        | 1           |          |
| 009           |         | Other Flour                                    | 25        | 0            | 9           | 6        | 0           | 2        |
|               | 02      | Roots And Tubers                               |           |              |             |          |             |          |
| 010           |         | Cassava - Roots                                | 28989     | 160644       | 112376      | 7413     | 35367       | 26070    |
| 011           |         | Cassava - Gari                                 | 37        | 2259         | 1445        | 10       | 497         | 33:      |
| 012           |         | Cassava -(Other Forms)                         | 3757      | 21585        | 15049       | 961      | 4752        | 349      |
| 013           |         | Yams   | 14719     | 57661        | 41917       | 3764     | 12694       | 972      |
| 014           |         | Cocoyams                                       | 11031     | 36688        | 27281       | 2821     | 8077        | 632      |
| 015           |         | Plantain                                       | 13552     | 76230        | 53251       | 3466     | 16782       | 1235     |
| 016           |         | Sweet Potato                                   | 49        | 490          | 328         | 13       | 108         | 70       |
| 017           |         | Other Roots & Tubers                           | 2982      | 1212         | 1861        | 763      | 267         | 432      |
|               | 03      | Pulses And Nuts                                |           |              |             |          |             |          |
| 020           | 03      | Bambara Beans                                  | 83        | 1986         | 1288        | 21       | 437         | 299      |
| 020           |         | Cowpeas  | 157       | 2503         | 1643        | 40       | 551         | 38       |
| 023           |         | Groundnuts (Roasted Raw)                       | 1147      | 12559        | 8375        | 293      | 2765        | 194      |
| 023           |         | Other Pulses Or Legumes                        | 115       | 1016         | 686         | 293      | 224         | 154      |
| 024           |         | Palm Nuts                                      | 1311      | 14849        | 9885        | 335      | 3269        | 229      |
| 025           |         | Coconuts                                       | 39        | 668          | 437         | 10       | 147         | 10       |
| 028           |         | Other Nuts & Seeds                             | 33        | 64           | 52          | 8        | 14          | 12       |
|               | 04      | Vegetables                                     |           |              |             |          |             |          |
| 040           | 04      | Tomatoes                                       | 748       | 4692         | 3246        | 191      | 1033        | 753      |
| 040           |         | Onions   | 2003      | 735          | 1200        | 512      | 162         | 278      |
| 041           |         | Carrots  | 2003      | 12           | 8           | 0        | 3           | 27       |
| 042           |         | Okro   | 1143      | 10484        | 7059        | 292      | 2308        | 163      |
| 043           |         | Garden Eggs, Cucumbers                         | 268       | 2919         | 1947        | 69       | 643         | 452      |
| 045           |         | Pepper   | 3079      | 18196        | 12654       | 787      | 4006        | 293:     |
| 045           |         |  | 25        | 37           | 33          | 787      | 4000<br>8   |          |
| 040           |         | Cabbage Or Lettuce<br>Spinach/Leafy Vegetables | 837       | 5087         | 3529        | 214      | 1120        | 819      |
| 047           |         | Other Vegetables                               | 233       | 1112         | 790         | 60       | 245         | 18.      |
| 0.10          |         | -  | 233       | 1112         | 770         | 00       | 213         | 10.      |
| 030           | 05      | Fruit<br>Bananas                               | 188       | 1522         | 1033        | 48       | 335         | 240      |
| 030           |         | Water Melon                                    | 4         | 8            | 6           | 1        | 2           | 241      |
| 031           |         | Oranges, Tangerines                            | 35        | 969          | 627         | 9        | 213         | 14:      |
| 032           |         | Mangoes  | 140       | 688          | 487         | 36       | 151         | 11:      |
| 034           |         | Pawpaw   | 211       | 1012         | 718         | 54       | 223         | 16       |
| 035           |         | Avocado Pears                                  | 157       | 793          | 560         | 40       | 175         | 130      |
| 036           |         | Pineapples                                     | 103       | 1063         | 711         | 26       | 234         | 16:      |
| 030           |         | Other Fruits                                   | 46        | 483          | 323         | 12       | 106         | 7:       |
|               | 07      | Oila And Animal Esta                           |           |              |             |          |             |          |
| 021           | 06      | Oils And Animal Fats                           | 277       | 2044         | 0.570       | 0.0      | 0.46        | 50       |
| 021<br>027    |         | Palm Oil<br>Coconuts Oil                       | 377<br>10 | 3844<br>202  | 2573<br>132 | 96<br>2  | 846<br>44   | 59°      |
| '             |         |  |           |              |             | _        |             | <i>3</i> |
| 062           | 07      | Meat<br>Game Birds                             | 1         | 445          | 282         | 0        | 98          | 6:       |
| 063           |         | Beef   | 3         | 6            | 5           | 1        | 1           | 0.       |

|       |       |                              |        | ige value of a |        |       | e value of an |       |
|-------|-------|------------------------------|--------|----------------|--------|-------|---------------|-------|
|       |       |                              |        | ld home cons   |        |       | home consu    | -     |
| 0.64  |       |                              | Urban  | Rural          | Ghana  | Urban | Rural         | Ghana |
| 064   |       | Mutton                       | 513    | 101            | 252    | 131   | 22            | 59    |
| 065   |       | Pork                         | 204    | 17072          | 10887  | 52    | 3758          | 2526  |
| 066   |       | Goat                         | 100    | 1581           | 1038   | 26    | 348           | 241   |
| 067   |       | Other Domestic Meats         | 37     | 3              | 16     | 9     | 1             | 4     |
| 068   |       | Wild Game                    | 144    | 4123           | 2664   | 37    | 908           | 618   |
|       | 08    | Poultry And Poultry Products |        |                |        |       |               |       |
| 060   |       | Chicken                      | 1237   | 11993          | 8050   | 316   | 2640          | 1867  |
| 061   |       | Other Domestic Poultry       | 164    | 1629           | 1092   | 42    | 359           | 253   |
| 070   |       | Eggs                         | 547    | 3964           | 2711   | 140   | 873           | 629   |
|       | 09    | Fish                         |        |                |        |       |               |       |
| 069   |       | Fish And Shell Fish          | 11481  | 23841          | 19310  | 2936  | 5249          | 4480  |
|       | 10    | Milk And Milk Products       |        |                |        |       |               |       |
| 071   |       | Milk                         | 0      | 61             | 39     | 0     | 13            | 9     |
|       | 14    | Non-Alcoholic Beverages      |        |                |        |       |               |       |
| 091   |       | Non-Alcoholic Beverages      | 0      | 5              | 3      | 0     | 1             | 1     |
| 2. Al | cohol | & Tobacco                    |        |                |        |       |               |       |
|       | 21    | Alcoholic Drinks             |        |                |        |       |               |       |
| 090   |       | Alcoholic Beverages          | 1378   | 2227           | 1916   | 352   | 490           | 444   |
| Total | Volum | e Of Home Consumption        | 115645 | 602654         | 424105 | 29574 | 132677        | 98387 |

Table A7.2 Households reporting consumption of home-produced items during the previous 12 months (percent)

|            |             |   | Accra | Other<br>Urban | Rural<br>Coastal | Rural<br>Forest | Rural<br>Savannah | Ghana        |
|------------|-------------|---|-------|----------------|------------------|-----------------|-------------------|--------------|
| 1          | 1. <b>F</b> | ood & Beverages                           |       |                |                  |                 |                   |              |
|            | 01          | Cereals And Cereal Products               |       |                |                  |                 |                   |              |
| 001        |             | Rice (Paddy, Grain)                       |       | 2.8            | 1.0              | 6.0             | 37.5              | 8.8          |
| 002        |             | Maize - Cob (Fresh)                       |       | 31.9           | 57.3             | 80.6            | 61.7              | 52.9         |
| 003        |             | Maize - Flour/Dough                       |       | 37.3           | 56.8             | 81.1            | 65.6              | 55.1         |
| 004        |             | Sorghum                                   |       | -              | -                | 0.2             | 2.4               | 0.4          |
| 005        |             | Millet Grain                              |       | 0.8            | -                | 0.1             | 27.8              | 4.7          |
| 006        |             | Millet Flour                              |       | 2.1            | 0.1              | -               | 36.9              | 6.5          |
| 007        |             | Guinea Corn                               |       | 2.1            | 0.3              | 0.1             | 51.1              | 8.8          |
| 800        |             | Other Grains                              |       | -              | 0.1              | 0.1             | 0.2               | 0.1          |
| 009        |             | Other Flour                               |       | 0.1            | 0.1              | 0.1             | -                 | 0.1          |
|            | 02          | Roots And Tubers                          |       |                |                  |                 |                   |              |
| 010        |             | Cassava – Roots                           |       | 28.1           | 56.4             | 85.3            | 37.2              | 49.4         |
| 011        |             | Cassava – Gari                            |       | 1.7            | 12.0             | 11.2            | 12.9              | 7.9          |
| 012        |             | Cassava -(Other Forms)                    |       | 10.4           | 18.4             | 24.3            | 31.3              | 18.4         |
| 013        |             | Yams                                      |       | 16.2           | 13.8             | 54.8            | 48.5              | 31.8         |
| 014        |             | Cocoyams                                  |       | 17.0           | 13.9             | 61.5            | 14.5              | 28.8         |
| 015        |             | Plantain                                  |       | 17.5           | 23.7             | 64.8            | 11.4              | 30.9         |
| 016        |             | Sweet Potato                              |       | 1.1            | 2.4              | 2.9             | 8.5               | 3.0          |
| 017        |             | Other Roots & Tubers                      |       | 2.2            | 3.1              | 7.9             | 0.8               | 3.7          |
|            | 03          | Pulses And Nuts                           |       |                |                  |                 |                   |              |
| 020        |             | Bambara Beans                             | 0.2   | 1.0            | 2.2              | 2.1             | 27.1              | 5.6          |
| 022        |             | Cowpeas                                   |       | 3.4            | 6.0              | 6.7             | 14.0              | 6.2          |
| 023        |             | Groundnuts (Roasted Raw)                  |       | 5.8            | 9.0              | 6.1             | 64.4              | 15.2         |
| 024        |             | Other Pulses Or Legumes                   |       | 2.9            | 1.9              | 4.7             | 17.4              | 5.4          |
| 025        |             | Palm Nuts                                 |       | 14.1           | 28.4             | 48.2            | 9.2               | 25.0         |
| 026        |             | Coconuts                                  |       | 2.3            | 15.5             | 6.7             | 0.7               | 5.2          |
| 028        |             | Other Nuts & Seeds                        |       | 0.8            | 1.4              | 2.3             | 0.5               | 1.3          |
| 0.40       | 04          | Vegetables                                |       | 10.0           | 240              | 40.0            | 42.0              | 20.5         |
| 040        |             | Tomatoes                                  |       | 12.9           | 34.9             | 40.8            | 42.0              | 28.5         |
| 041        |             | Onions                                    |       | 4.2            | 4.4              | 11.8            | 10.6              | 7.3          |
| 042        |             | Carrots                                   |       | 0.1            | 0.3              | 0.4             | 0.2               | 0.2          |
| 043        |             | Okra                                      |       | 15.0           | 26.5             | 39.6            | 73.6              | 32.5         |
| 044        |             | Garden Eggs, Cucumbers                    |       | 7.6            | 23.0             | 25.5            | 13.9              | 15.9         |
| 045        |             | Pepper                                    |       | 23.7           | 47.2             | 70.1            | 63.9              | 46.2         |
| 046        |             | Cabbage Or Lettuce                        |       | 0.3            | 0.2              | 0.5             | 0.3               | 0.3          |
| 047<br>048 |             | Spinach/Leafy Vegetables Other Vegetables |       | 17.7<br>8.2    | 22.8<br>18.6     | 45.5<br>13.6    | 43.6<br>9.0       | 29.8<br>10.8 |
|            | 05          | Fruit                                     |       |                |                  |                 |                   |              |
| 030        | 03          | Bananas                                   | 0.2   | 6.0            | 9.6              | 26.6            | 6.3               | 12.6         |
| 030        |             | Water Melon                               | 0.2   | 0.0            | 0.3              | 0.7             | 0.3               | 0.4          |
| 031        |             | Oranges, Tangerines                       |       | 5.7            | 12.9             | 27.6            | 6.0               | 13.3         |
| 032        |             | Mangoes                                   |       | 3.7<br>8.9     | 13.9             | 26.3            | 18.5              | 15.5         |
| 033        |             | Pawpaw                                    |       | 12.2           | 22.4             | 43.3            | 16.0              | 23.1         |
| 034        |             | Avocado Pears                             |       | 9.4            | 10.8             | 38.0            | 5.4               | 17.3         |
| 035        |             | Pineapples                                |       | 9.4<br>5.4     | 10.8             | 22.8            | 3.4               | 17.3         |
| 030        |             | Other Fruits                              |       | 0.8            | 3.0              | 1.5             | 1.0               | 12.1         |
| 337        |             |   |       | 0.0            | 5.0              | 1.5             | 1.0               | 1.5          |
| 021        | 06          | Oils And Animal Fats<br>Palm Oil          |       | 5.9            | 14.1             | 24.2            | 2.7               | 11.9         |
| 021        |             | Coconuts Oil                              |       | 0.4            | 5.3              | 0.9             | 2.1               | 11.9         |
| 027        |             | Coconius On                               |       | 0.4            | ٥.১              | 0.9             |                   | 1.4          |

|       |       |                              |       | Other | Rural   | Rural  | Rural    |       |
|-------|-------|------------------------------|-------|-------|---------|--------|----------|-------|
|       |       |                              | Accra | Urban | Coastal | Forest | Savannah | Ghana |
|       | 07    | Meat                         |       |       |         |        |          |       |
| 062   | 0,    | Game Birds                   |       | 0.1   | 0.3     | 1.6    | 1.0      | 0.8   |
| 063   |       | Beef                         | 0.2   | 0.1   | _       | 0.2    | 2.0      | 0.4   |
| 064   |       | Mutton                       |       | 1.6   | 3.0     | 5.6    | 8.4      | 4.0   |
| 065   |       | Pork                         |       | 0.6   | 1.1     | 0.6    | 8.3      | 1.9   |
| 066   |       | Goat                         |       | 4.1   | 9.9     | 12.0   | 20.1     | 9.7   |
| 067   |       | Other Domestic Meats         |       | 0.1   | 0.2     | 0.8    | 0.4      | 0.4   |
| 068   |       | Wild Game                    |       | 1.2   | 6.2     | 13.0   | 6.0      | 6.4   |
|       | 08    | Poultry And Poultry Products |       |       |         |        |          |       |
| 060   |       | Chicken                      | 0.2   | 11.1  | 25.1    | 43.6   | 53.9     | 29.4  |
| 061   |       | Other Domestic Poultry       |       | 1.5   | 1.8     | 4.3    | 25.4     | 6.1   |
| 070   |       | Eggs                         |       | 7.9   | 20.5    | 34.6   | 24.6     | 20.3  |
|       | 09    | Fish                         |       |       |         |        |          |       |
| 069   |       | Fish And Shell Fish          | 1.6   | 2.4   | 7.7     | 1.3    | 2.9      | 2.8   |
|       | 10    | Milk And Milk Products       |       |       |         |        |          |       |
| 071   |       | Milk                         |       | 0.1   | -       | 0.2    | 1.6      | 0.4   |
|       | 14    | Non-Alcoholic Beverages      |       |       |         |        |          |       |
| 091   |       | Non-Alcoholic Beverages      |       | 0.1   | -       | 0.1    | 0.3      | 0.1   |
| 2. Al | cohol | & Tobacco                    |       |       |         |        |          |       |
|       | 21    | Alcoholic Drinks             |       |       |         |        |          |       |
| 090   |       | Alcoholic Beverages          |       | 1.1   | 2.1     | 2.2    | 11.5     | 3.1   |

Table A7.3 Average annual household cost of consumption of home-produced food and beverages, by subgroup and region (cedis)

|                                 | Western | Central | Greater<br>Accra | Volta   | Eastern | Ashanti | Brong<br>Ahafo | Northern | Upper<br>West | Upper<br>East | Ghana   |
|---------------------------------|---------|---------|------------------|---------|---------|---------|----------------|----------|---------------|---------------|---------|
| Cereals & cereal products       | 48,140  | 24,587  | 1,328            | 84,306  | 54,228  | 30,990  | 61,639         | 266,188  | 234,125       | 113,261       | 61,194  |
| Roots & tubers                  | ,       | 180,141 | 6,734            | 212,691 | 392,465 | 230,084 | 498,005        | 216,878  | 13,175        | 2,872         | 253,508 |
| Pulses & nuts                   | 20,426  | 12,442  | 337              | 22,182  | 31,547  | 6,167   | 21,746         | 98,922   | 35,779        | 53,295        | 22,367  |
| Vegetables                      | 37,637  | 22,543  | 281              | 34,988  | 21,669  | 20,856  | 65,047         | 100,296  | 22,273        | 24,961        | 30,466  |
| Fruit                           | 9,679   | 4,356   | 7                | 1,720   | 6,661   | 3,773   | 10,308         | 27       | 11,738        | -             | 4,466   |
| Oils & animals fats             | 5,487   | 4,609   | -                | 677     | 6,290   | 3,320   | 751            | 10,446   | 25,169        | 0             | 3,839   |
| Meat                            | 10,584  | 3,878   | 4                | 1,181   | 8,407   | 1,682   | 4,028          | 188,730  | 897           | 23            | 14,862  |
| Poultry & poultry products      | 21,899  | 11,976  | 1,025            | 9,315   | 10,884  | 4,480   | 9,059          | 49,838   | 5,083         | 24,799        | 12,135  |
| Fish                            | 11,192  | 17,497  | 14,872           | 122,259 | 2,015   | 167     | -              | 9,879    | -             | -             | 19,310  |
| Milk & milk products            | -       | 0       | -                | 3       | 42      | -       | 34             | 492      | -             | 0             | 39      |
| Non-alcoholic beverages         | -       | -       | -                | 1       | -       | -       | -              | -        | 162           | =             | 3       |
| Alcoholic drinks                | 1,841   | 458     | -                | 2       | 283     | 901     | 81             | 11,323   | 35,215        | 1,761         | 1,916   |
| Total                           |         |         |                  |         |         |         |                |          |               |               |         |
| Sample size                     | 638     | 700     | 860              | 640     | 820     | 1060    | 540            | 360      | 120           | 260           | 5998    |
| Household reporting consumption | 419     | 537     | 58               | 530     | 639     | 758     | 455            | 318      | 115           | 246           | 4,075   |

Table A7.4 Average annual per capita cost of consumption of home-produced food and beverage, by subgroup and region (cedis)

|                             | Western | Central | Greater<br>Accra | Volta   | Eastern | Ashanti | Brong<br>Ahafo | Northern | Upper<br>West | Upper<br>East | Ghana  |
|-----------------------------|---------|---------|------------------|---------|---------|---------|----------------|----------|---------------|---------------|--------|
| Consolo 0 consolo no de etc | 10.247  | 7 447   | 272              | 17.020  | 12.040  | 7.557   | 14707          | 36 202   | 22 (07        | 25 101        | 14.107 |
| Cereals & cereal products   | 10,247  | 7,447   | 372              | 17,920  | 13,840  | 7,557   | 14,787         | 36,202   | 33,607        | 25,191        | 14,196 |
| Roots & tubers              | 112,423 | 54,564  | 1,886            | 45,208  | 100,162 | 56,105  | 119,468        | 29,496   | 1,891         | 639           | 58,810 |
| Pulses & nuts               | 4,348   | 3,769   | 95               | 4,715   | 8,051   | 1,504   | 5,217          | 13,454   | 5,136         | 11,854        | 5,189  |
| Vegetables                  | 8,011   | 6,828   | 79               | 7,437   | 5,530   | 5,086   | 15,604         | 13,641   | 3,197         | 5,552         | 7,068  |
| Fruit                       | 2,060   | 1,320   | *                | 366     | 1,700   | 920     | 2,473          | *        | 1,685         | -             | 1,036  |
| Oils & animals fats         | 1,168   | 1,396   | -                | 144     | 1,605   | 809     | 180            | 1,421    | 3,613         | *             | 891    |
| Meat                        | 2,253   | 1,175   | *                | 251     | 2,145   | 410     | 966            | 25,668   | 129           | *             | 3,448  |
| Poultry & poultry products  | 4,661   | 3,628   | 287              | 1,980   | 2,778   | 1,092   | 2,173          | 6,778    | 730           | 5,516         | 2,815  |
| Fish                        | 2,382   | 5,300   | 4,166            | 25,987  | 514     | 41      | -              | 1,344    | -             | -             | 4,480  |
| Milk & milk products        | -       | *       | -                | *       | 11      | -       | *              | 67       | -             | *             | *      |
| Non-alcoholic beverages     | -       | -       | -                | *       | -       | -       | -              | -        | 23            | -             | *      |
| Alcoholic drinks            | 392     | 139     | -                | *       | 72      | 220     | 19             | 1,540    | 5,055         | 392           | 444    |
| Total                       | 147,946 | 85,565  | 6,888            | 104,008 | 136,409 | 73,744  | 160,896        | 129,614  | 55,064        | 49,147        | 98,387 |
| Sample size                 | 639     | 700     | 860              | 640     | 820     | 1,060   | 540            | 360      | 120           | 260           | 5,998  |

Note: \* indicates value less than 10 cedis in annual per capita cost

Table A7.5 Estimated total annual national cost of consumption of home-produced food and beverage, by subgroup and region (billion cedis)

|                            | Western | Central | Greater<br>Accra | Volta | Eastern | Ashanti | Brong<br>Ahafo | Northern | Upper<br>West | Upper<br>East | Ghana |
|----------------------------|---------|---------|------------------|-------|---------|---------|----------------|----------|---------------|---------------|-------|
| Cereals & cereal products  | 21      | 12      | 1                | 37    | 30      | 22      | 23             | 65       | 19            | 20            | 249   |
| •                          |         |         |                  |       |         |         |                |          | 19            | 20            |       |
| Roots & tubers             | 229     | 85      | 4                | 92    | 218     | 165     | 182            | 53       | 1             | 1             | 1,031 |
| Pulses & nuts              | 9       | 6       | 0                | 10    | 18      | 4       | 8              | 24       | 3             | 9             | 91    |
| Vegetables                 | 16      | 11      | 0                | 15    | 12      | 15      | 24             | 24       | 2             | 4             | 124   |
| Fruit                      | 4       | 2       | 0                | 1     | 4       | 3       | 4              | 0        | 1             | -             | 18    |
| Oils & animals fats        | 2       | 2       | -                | 0     | 3       | 2       | 0              | 3        | 2             | -             | 16    |
| Meat                       | 5       | 2       | 0                | 1     | 5       | 1       | 1              | 46       | 0             | 0             | 60    |
| Poultry & poultry products | 9       | 6       | 1                | 4     | 6       | 3       | 3              | 12       | 0             | 4             | 49    |
| Fish                       | 5       | 8       | 9                | 53    | 1       | 0       | -              | 2        | -             | -             | 79    |
| Milk & milk products       | -       | -       | -                | 0     | 0       | -       | 0              | 0        | -             | -             | 0     |
| Non-alcoholic beverages    | -       | -       | -                | 0     | -       | -       | -              | -        | 0             | -             | 0     |
| Alcoholic drinks           | 1       | 0       | -                | 0     | 0       | 1       | 0              | 3        | 3             | 0             | 8     |
| Total                      | 301     | 134     | 14               | 212   | 297     | 217     | 246            | 233      | 31            | 39            | 1,725 |

Table A9.1 Mean annual household cash expenditure by region and expenditure group (cedis)

| Expenditure group              | Western   | Central   | Greater<br>Accra | Volta     | Eastern   | Ashanti   | Brong<br>Ahafo | Nothern   | Upper West | Upper East | Ghana     |
|--------------------------------|-----------|-----------|------------------|-----------|-----------|-----------|----------------|-----------|------------|------------|-----------|
| Food & beverage                | 1,666,097 | 1,058,276 | 2,578,602        | 1,406,846 | 1,203,561 | 1,954,358 | 1,350,094      | 1,354,282 | 1,044,075  | 587,817    | 1,579,970 |
| Alcohol & tobacco              | 314,507   | 199,206   | 554,225          | 318,379   | 256,581   | 423,487   | 371,591        | 425,476   | 535,210    | 196,445    | 358,325   |
| Clothing & Footwear            | 431,854   | 196,657   | 445,425          | 307,461   | 274,886   | 487,789   | 331,549        | 291,151   | 189,939    | 118,529    | 345,679   |
| Housing & utility              | 187,115   | 130,440   | 516,582          | 168,249   | 129,738   | 283,197   | 129,197        | 129,744   | 150,607    | 159,322    | 221,717   |
| Household goods, operation &   |           |           |                  |           |           |           |                |           |            |            |           |
| services                       | 240,318   | 120,633   | 319,511          | 207,240   | 167,541   | 224,395   | 193,866        | 200,644   | 138,211    | 102,919    | 206,890   |
| Medical care & health expenses | 216,432   | 98,560    | 235,327          | 158,535   | 135,284   | 190,669   | 129,498        | 104,305   | 66,214     | 63,591     | 159,409   |
| Transport & communications     | 269,404   | 74,333    | 398,551          | 151,212   | 159,504   | 244,916   | 127,760        | 93,113    | 52,337     | 30,910     | 195,223   |
| Recreation & education         | 234,548   | 135,858   | 591,845          | 187,136   | 200,587   | 337,853   | 193,849        | 157,854   | 91,035     | 63,617     | 264,306   |
| Miscellaneous goods & services | 201,751   | 73,521    | 180,962          | 133,082   | 106,516   | 176,893   | 123,165        | 81,055    | 54,375     | 28,491     | 134,321   |
| _ Total                        | 3,762,025 | 2,087,486 | 5,821,031        | 3,038,141 | 2,634,198 | 4,323,555 | 2,951,117      | 2,858,487 | 2,330,758  | 1,257,967  | 3,465,839 |

Table A9.2 Distribution of mean annual household cash expenditure by expenditure group, by region (percent)

| Expenditure group              | Western | Central | Greater<br>Accra | Volta | Eastern | Ashanti | Brong<br>Ahafo | Nothern | Upper West | Upper East | Ghana |
|--------------------------------|---------|---------|------------------|-------|---------|---------|----------------|---------|------------|------------|-------|
| Food & beverage                | 44.3    | 50.7    | 44.3             | 46.3  | 45.7    | 45.2    | 45.7           | 47.4    | 44.8       | 46.7       | 45.6  |
| Alcohol & tobacco              | 8.4     | 9.5     | 9.5              | 10.5  | 9.7     | 9.8     | 12.6           | 14.9    | 23.0       | 15.6       | 10.3  |
| Clothing & Footwear            | 11.5    | 9.4     | 7.7              | 10.1  | 10.4    | 11.3    | 11.2           | 10.2    | 8.1        | 9.4        | 10.0  |
| Housing & utility              | 5.0     | 6.2     | 8.9              | 5.5   | 4.9     | 6.6     | 4.4            | 5.3     | 6.8        | 5.2        | 6.4   |
| Household goods, operation &   |         |         |                  |       |         |         |                |         |            |            |       |
| services                       | 6.4     | 5.8     | 5.5              | 6.8   | 6.4     | 5.2     | 6.6            | 7.0     | 5.9        | 8.2        | 6.0   |
| Medical care & health expenses | 5.8     | 4.7     | 4.0              | 5.2   | 5.1     | 4.4     | 4.4            | 3.6     | 2.8        | 5.1        | 4.6   |
| Transport & communications     | 7.2     | 3.6     | 6.8              | 5.0   | 6.1     | 5.7     | 4.3            | 3.3     | 2.2        | 2.5        | 5.6   |
| Recreation & education         | 6.2     | 6.5     | 10.2             | 6.2   | 7.6     | 7.8     | 6.6            | 5.5     | 3.9        | 5.1        | 7.6   |
| Miscellaneous goods & services | 5.4     | 3.5     | 3.1              | 4.4   | 4.0     | 4.1     | 4.2            | 2.8     | 2.3        | 2.3        | 3.9   |
| Total                          | 100.0   | 100.0   | 100.0            | 100.0 | 100.0   | 100.0   | 100.0          | 100.0   | 100.0      | 100.0      | 100.0 |

Table A9.3 Mean annual per capita cash expenditure by region and expenditure group (cedis)

| Expenditure group              | Western | Central | Greater<br>Accra | Volta   | Eastern | Ashanti   | Brong<br>Ahafo | Nothern | Upper West | Upper East | Ghana   |
|--------------------------------|---------|---------|------------------|---------|---------|-----------|----------------|---------|------------|------------|---------|
| Food & beverage                | 354,642 | 320,551 | 722,345          | 299,031 | 307,165 | 476,563   | 323,879        | 184,186 | 149,867    | 130,738    | 366,531 |
| Alcohol & tobacco              | 66,945  | 60,339  | 155,255          | 67,673  | 65,483  | 103,266   | 89,142         | 57,866  | 76,824     | 43,692     | 83,126  |
| Clothing & Footwear            | 91,924  | 59,567  | 124,777          | 65,352  | 70,155  | 118,946   | 79,536         | 39,597  | 27,264     | 26,362     | 80,193  |
| Housing & utility              | 39,829  | 39,510  | 144,710          | 35,762  | 33,111  | 69,057    | 31,125         | 20,483  | 22,869     | 14,601     | 51,435  |
| Household goods, operation &   |         |         |                  |         |         |           |                |         |            |            |         |
| services                       | 51,154  | 36,540  | 89,505           | 44,050  | 42,759  | 54,718    | 46,507         | 27,288  | 19,839     | 22,890     | 47,996  |
| Medical care & health expenses | 46,069  | 29,854  | 65,922           | 33,697  | 34,526  | 46,494    | 31,066         | 14,186  | 9,504      | 14,143     | 36,981  |
| Transport & communications     | 57,345  | 22,516  | 111,646          | 32,141  | 40,708  | 59,722    | 30,649         | 12,664  | 7,518      | 6,875      | 45,289  |
| Recreation & education         | 49,925  | 41,151  | 165,794          | 39,776  | 51,192  | 82,384    | 46,503         | 21,469  | 13,067     | 14,149     | 61,315  |
| Miscellaneous goods & services | 42,944  | 22,270  | 50,693           | 28,287  | 27,184  | 43,135    | 29,547         | 11,024  | 7,805      | 6,337      | 31,160  |
| Total                          | 800,778 | 632,298 | 1,630,647        | 645,769 | 672,282 | 1,054,283 | 707,954        | 388,763 | 334,559    | 279,787    | 804,026 |

Table A9.4 Estimated total annual national cash expenditure, by region and expenditure group (billion cedis)

| Expenditure group              | Western | Central | Greater<br>Accra | Volta | Eastern | Ashanti | Brong<br>Ahafo | Nothern | Upper West | Upper East | Ghana  |
|--------------------------------|---------|---------|------------------|-------|---------|---------|----------------|---------|------------|------------|--------|
| Food & beverage                | 722     | 502     | 1,504            | 610   | 669     | 1,405   | 494            | 331     | 85         | 104        | 6,425  |
| Alcohol & tobacco              | 136     | 95      | 323              | 138   | 143     | 304     | 136            | 104     | 44         | 35         | 1,457  |
| Clothing & Footwear            | 187     | 93      | 260              | 133   | 153     | 351     | 121            | 71      | 15         | 21         | 1,406  |
| Housing & utility              | 81      | 62      | 301              | 73    | 72      | 204     | 48             | 37      | 13         | 12         | 902    |
| Household goods, operation &   |         |         |                  |       |         |         |                |         |            |            |        |
| services                       | 104     | 57      | 186              | 90    | 93      | 161     | 71             | 49      | 11         | 18         | 841    |
| Medical care & health expenses | 94      | 47      | 137              | 69    | 75      | 137     | 47             | 25      | 5          | 11         | 648    |
| Transport & communications     | 117     | 35      | 232              | 66    | 89      | 176     | 47             | 23      | 4          | 5          | 794    |
| Recreation & education         | 102     | 64      | 345              | 81    | 112     | 243     | 71             | 39      | 7          | 11         | 1,075  |
| Miscellaneous goods & services | 87      | 35      | 106              | 58    | 59      | 127     | 45             | 20      | 4          | 5          | 546    |
| Total                          | 1,630   | 991     | 3,394            | 1,318 | 1,465   | 3,107   | 1,080          | 698     | 190        | 222        | 14,094 |

Table A9.5 Mean annual household cash expenditure by locality and expenditure group

|                                       |           | Locality       |           | Country   |       | Locality       |       | Country |
|---------------------------------------|-----------|----------------|-----------|-----------|-------|----------------|-------|---------|
| Expenditure Group                     | Accra     | Other<br>Urban | Rural     | -         | Accra | Other<br>Urban | Rural |         |
|                                       | ¢         | ¢              | ¢         | ¢         | %     | %              | %     | %       |
| Food & beverage                       | 2,715,041 | 2,034,350      | 1,205,870 | 1,579,970 | 43.7  | 46.0           | 46.0  | 45.6    |
| Alcohol & tobacco                     | 588,143   | 451,673        | 282,020   | 358,325   | 9.5   | 10.2           | 10.8  | 10.3    |
| Clothing & Footwear                   | 496,458   | 416,644        | 291,575   | 345,678   | 8.0   | 9.4            | 11.1  | 10.0    |
| Housing & utility                     | 539,544   | 354,445        | 114,680   | 221,717   | 8.7   | 8.0            | 4.4   | 6.4     |
| Household goods, operation & services | 364,872   | 224,529        | 173,775   | 206,890   | 5.9   | 5.1            | 6.6   | 6.0     |
| Medical care & health expenses        | 249,265   | 182,504        | 135,145   | 159,409   | 4.0   | 4.1            | 5.2   | 4.6     |
| Transport & communications            | 427,994   | 233,056        | 141,510   | 195,223   | 6.9   | 5.3            | 5.4   | 5.6     |
| Recreation & education                | 647,856   | 342,474        | 169,221   | 264,306   | 10.4  | 7.7            | 6.5   | 7.6     |
| Miscellaneous goods & services        | 189,490   | 183,513        | 104,871   | 134,321   | 3.0   | 4.1            | 4.0   | 3.9     |
| Total                                 | 6,218,663 | 4,423,188      | 2,618,667 | 3,465,839 | 100.1 | 99.9           | 100.0 | 100.0   |

Table A9.6 Mean annual per capita cash expenditure, by locality and expenditure group

|                                       |           | Locality    |         | Country |
|---------------------------------------|-----------|-------------|---------|---------|
| Expenditure Group                     | Accra     | Other Urban | Rural   |         |
|                                       | ¢         | ¢           | ¢       | ¢       |
| Food & beverage                       | 736,041   | 508,990     | 265,479 | 366,531 |
| Alcohol & tobacco                     | 159,444   | 113,008     | 62,088  | 83,126  |
| Clothing & Footwear                   | 134,588   | 104,244     | 64,192  | 80,193  |
| Housing & utility                     | 146,269   | 88,681      | 25,247  | 51,435  |
| Household goods, operation & services | 98,916    | 56,177      | 38,258  | 47,996  |
| Medical care & health expenses        | 67,575    | 45,662      | 29,753  | 36,981  |
| Transport & communications            | 116,028   | 58,310      | 31,154  | 45,289  |
| Recreation & education                | 175,632   | 85,686      | 37,255  | 61,315  |
| Miscellaneous goods & services        | 51,370    | 45,915      | 23,088  | 31,160  |
| Total                                 | 1,685,863 | 1,106,673   | 576,514 | 804,026 |

Table A9.7 Estimated total annual national cash expenditure, by locality and expenditure group (billion cedis)

|                                       | Locality |             |       |        |  |  |  |  |
|---------------------------------------|----------|-------------|-------|--------|--|--|--|--|
| Expenditure Group                     | Accra    | Other Urban | Rural | •      |  |  |  |  |
| Experienture Group                    | ¢        | ¢           | ¢     | ¢      |  |  |  |  |
| Food & beverage                       | 1,141    | 2,178       | 3,106 | 6,425  |  |  |  |  |
| Alcohol & tobacco                     | 247      | 484         | 726   | 1,457  |  |  |  |  |
| Clothing & Footwear                   | 209      | 446         | 751   | 1,406  |  |  |  |  |
| Housing & utility                     | 227      | 379         | 295   | 902    |  |  |  |  |
| Household goods, operation & services | 153      | 240         | 448   | 841    |  |  |  |  |
| Medical care & health expenses        | 105      | 195         | 348   | 648    |  |  |  |  |
| Transport & communications            | 180      | 250         | 364   | 794    |  |  |  |  |
| Recreation & education                | 272      | 367         | 436   | 1,075  |  |  |  |  |
| Miscellaneous goods & services        | 80       | 196         | 270   | 546    |  |  |  |  |
| Total                                 | 2,614    | 4,735       | 6,744 | 14,094 |  |  |  |  |

Table A9.8 Mean annual household cash expenditure by locality and expenditure group

|                                       |           |                | Locality         |                 |                   | Country   |       |             | Locality         |                 |                   | Country |
|---------------------------------------|-----------|----------------|------------------|-----------------|-------------------|-----------|-------|-------------|------------------|-----------------|-------------------|---------|
| Expenditure Group                     | Accra     | Other<br>Urban | Rural<br>Coastal | Rural<br>Forest | Rural<br>Savannah |           | Accra | Other Urban | Rural<br>Coastal | Rural<br>Forest | Rural<br>Savannah |         |
|                                       | ¢         | ¢              | ¢                | ¢               | ¢                 | ¢         | %     | %           | %                | %               | %                 | %       |
| Food & beverage                       | 2,715,041 | 2,034,350      | 1,475,728        | 1,241,945       | 880,256           | 1,579,970 | 43.7  | 46.0        | 49.7             | 44.4            | 45.5              | 45.6    |
| Alcohol & tobacco                     | 588,143   | 451,673        | 287,460          | 277,792         | 285,469           | 358,325   | 9.5   | 10.2        | 9.7              | 9.9             | 14.7              | 10.3    |
| Clothing & Footwear                   | 496,458   | 416,644        | 273,699          | 335,283         | 219,990           | 345,678   | 8.0   | 9.4         | 9.2              | 12.0            | 11.4              | 10.0    |
| Housing & utility                     | 539,544   | 354,445        | 146,679          | 112,929         | 88,255            | 221,717   | 8.7   | 8.0         | 4.9              | 4.0             | 4.6               | 6.4     |
| Household goods, operation & Services | 364,872   | 224,529        | 176,464          | 181,311         | 156,030           | 206,890   | 5.9   | 5.1         | 5.9              | 6.5             | 8.1               | 6.0     |
| Medical care & health expenses        | 249,265   | 182,504        | 157,661          | 147,805         | 88,477            | 159,409   | 4.0   | 4.1         | 5.3              | 5.3             | 4.6               | 4.6     |
| Transport & communications            | 427,994   | 233,056        | 165,176          | 169,653         | 62,478            | 195,223   | 6.9   | 5.3         | 5.6              | 6.1             | 3.2               | 5.6     |
| Recreation & education                | 647,856   | 342,474        | 176,465          | 197,871         | 104,541           | 264,306   | 10.4  | 7.7         | 5.9              | 7.1             | 5.4               | 7.6     |
| Miscellaneous goods & services        | 189,490   | 183,513        | 107,398          | 130,261         | 51,196            | 134,321   | 3.0   | 4.1         | 3.6              | 4.7             | 2.6               | 3.9     |
| Total                                 | 6,218,663 | 4,423,188      | 2,966,730        | 2,794,850       | 1,936,692         | 3,465,839 | 100.0 | 100.0       | 100.0            | 100.0           | 100.0             | 100.0   |

Table A9.9 Mean annual per capita cash expenditure, by locality and expenditure group

|                                       | Locality  |             |               |              |                |         |  |  |
|---------------------------------------|-----------|-------------|---------------|--------------|----------------|---------|--|--|
| <del>-</del>                          | Accra     | Other Urban | Rural Coastal | Rural Forest | Rural Savannah |         |  |  |
| Expenditure Group                     |           |             |               |              |                |         |  |  |
|                                       | ¢         | ¢           | ¢             | ¢            | ¢              | ¢       |  |  |
| Food & beverage                       | 736,041   | 508,990     | 352,465       | 295,303      | 158,456        | 366,531 |  |  |
| Alcohol & tobacco                     | 159,444   | 113,008     | 68,658        | 66,052       | 51,388         | 83,126  |  |  |
| Clothing & Footwear                   | 134,588   | 104,244     | 65,371        | 79,722       | 39,601         | 80,193  |  |  |
| Housing & utility                     | 146,269   | 88,681      | 35,033        | 26,852       | 15,887         | 51,435  |  |  |
| Household goods, operation & services | 98,916    | 56,177      | 42,147        | 43,111       | 28,087         | 47,996  |  |  |
| Medical care & health expenses        | 67,575    | 45,662      | 37,656        | 35,144       | 15,927         | 36,981  |  |  |
| Transport & communications            | 116,028   | 58,310      | 39,451        | 40,339       | 11,247         | 45,289  |  |  |
| Recreation & education                | 175,632   | 85,686      | 42,147        | 47,049       | 18,818         | 61,315  |  |  |
| Miscellaneous goods & services        | 51,370    | 45,915      | 25,651        | 30,973       | 9,216          | 31,160  |  |  |
| Total                                 | 1,685,863 | 1,106,673   | 708,579       | 664,545      | 348,627        | 804,026 |  |  |

Table A9.10 Estimated total annual national cash expenditure, by locality and expenditure group (billion cedis)

|                                       | Locality |             |               |              |                |        |
|---------------------------------------|----------|-------------|---------------|--------------|----------------|--------|
| <del></del>                           | Accra    | Other Urban | Rural Coastal | Rural Forest | Rural Savannah |        |
| Expenditure Group                     |          |             |               |              |                |        |
|                                       | ¢        | ¢           | ¢             | ¢            | ¢              | ¢      |
| Food & beverage                       | 1,141    | 2,178       | 899           | 1,634        | 573            | 6,425  |
| Alcohol & tobacco                     | 247      | 484         | 175           | 365          | 186            | 1,457  |
| Clothing & Footwear                   | 209      | 446         | 167           | 441          | 143            | 1,406  |
| Housing & utility                     | 227      | 379         | 89            | 149          | 57             | 902    |
| Household goods, operation & services | 153      | 240         | 108           | 238          | 102            | 841    |
| Medical care & health expenses        | 105      | 195         | 96            | 194          | 58             | 648    |
| Transport & communications            | 180      | 250         | 101           | 223          | 41             | 794    |
| Recreation & education                | 272      | 367         | 108           | 260          | 68             | 1,075  |
| Miscellaneous goods & services        | 80       | 196         | 65            | 171          | 33             | 546    |
| Total                                 | 2,614    | 4,735       | 1,808         | 3,675        | 1,261          | 14,094 |

Table A9.11 Mean annual household cash expenditure by ecological zone and expenditure group (cedis and percent)

|                                       | Locality  |           |           | Country   | try Locality |        |          | Country |
|---------------------------------------|-----------|-----------|-----------|-----------|--------------|--------|----------|---------|
| Expenditure Group                     | Coastal   | Forest    | Savannah  |           | Coastal      | Forest | Savannah |         |
|                                       | ¢         | ¢         | ¢         | ¢         | %            | %      | %        | %       |
| Food & beverage                       | 1,946,452 | 1,522,883 | 1,074,744 | 1,579,970 | 46.1         | 44.8   | 46.6     | 45.6    |
| Alcohol & tobacco                     | 398,144   | 341,386   | 327,768   | 358,325   | 9.4          | 10.0   | 14.2     | 10.3    |
| Clothing & Footwear                   | 345,973   | 391,724   | 240,799   | 345,678   | 8.2          | 11.5   | 10.4     | 10.0    |
| Housing & utility                     | 326,923   | 182,506   | 128,412   | 221,717   | 7.8          | 5.4    | 5.6      | 6.4     |
| Household goods, operation & services | 237,957   | 199,432   | 169,997   | 206,890   | 5.6          | 5.9    | 7.4      | 6.0     |
| Medical care & health expenses        | 191,408   | 163,355   | 95,053    | 159,409   | 4.5          | 4.8    | 4.1      | 4.6     |
| Transport & communications            | 264,711   | 195,287   | 74,749    | 195,223   | 6.3          | 5.7    | 3.2      | 5.6     |
| Recreation & education                | 364,421   | 250,028   | 123,303   | 264,306   | 8.6          | 7.3    | 5.3      | 7.6     |
| Miscellaneous goods & services        | 141,813   | 155,382   | 73,606    | 134,321   | 3.4          | 4.6    | 3.2      | 3.9     |
| Total                                 | 4,217,802 | 3,401,983 | 2,308,431 | 3,465,839 | 100.0        | 100.0  | 100.0    | 100.0   |

Table A9.12 Mean annual per capita cash expenditure, by ecological zone and expenditure group (cedis)

|                                       |           | Country |          |         |
|---------------------------------------|-----------|---------|----------|---------|
|                                       | Coastal   | Forest  | Savannah |         |
| Expenditure Group                     |           |         |          |         |
|                                       | ¢         | ¢       | ¢        | ¢       |
| Food & beverage                       | 500,585   | 369,876 | 196,121  | 366,531 |
| Alcohol & tobacco                     | 102,394   | 82,915  | 59,812   | 83,126  |
| Clothing & Footwear                   | 88,977    | 95,141  | 43,941   | 80,193  |
| Housing & utility                     | 84,077    | 44,327  | 23,433   | 51,435  |
| Household goods, operation & services | 61,197    | 48,438  | 31,021   | 47,996  |
| Medical care & health expenses        | 49,226    | 39,675  | 17,346   | 36,981  |
| Transport & communications            | 68,078    | 47,431  | 13,640   | 45,289  |
| Recreation & education                | 93,721    | 60,727  | 22,501   | 61,315  |
| Miscellaneous goods & services        | 36,471    | 37,739  | 13,432   | 31,160  |
| Total                                 | 1,084,726 | 826,269 | 421,247  | 804,026 |

Table A9.13 Estimated total annual national cash expenditure, by ecological zone and expenditure group (billion cedis)

|                                       |         |        | Country  |        |
|---------------------------------------|---------|--------|----------|--------|
|                                       | Coastal | Forest | Savannah |        |
| Expenditure Group                     |         |        |          |        |
|                                       | ¢       | ¢      | ¢        | ¢      |
| Food & beverage                       | 2,742   | 2,808  | 874      | 6,425  |
| Alcohol & tobacco                     | 561     | 630    | 267      | 1,457  |
| Clothing & Footwear                   | 487     | 722    | 196      | 1,406  |
| Housing & utility                     | 461     | 337    | 104      | 902    |
| Household goods, operation & services | 335     | 368    | 138      | 841    |
| Medical care & health expenses        | 270     | 301    | 77       | 648    |
| Transport & communications            | 373     | 360    | 61       | 794    |
| Recreation & education                | 513     | 461    | 100      | 1,075  |
| Miscellaneous goods & services        | 200     | 287    | 60       | 546    |
| Total                                 | 5,942   | 6,274  | 1,877    | 14,094 |

Table A9.14 Average annual household and per capita cash expenditure on different items, in urban and rural areas (cedis)

|            |    | Expenditure Group                             | A             | Average Annu | al Household<br>Expenditure |              | Annual Per C<br>Expenditure | Capita      |
|------------|----|---|---------------|--------------|-----------------------------|--------------|-----------------------------|-------------|
|            |    |   | Urban<br>¢    | Rural<br>¢   | Ghana<br>¢                  | Urban<br>¢   | Rural<br>¢                  | Ghana<br>¢  |
|            | 1  | Food & Beverages                              |               |              | -                           |              |                             |             |
|            | 01 | Cereals and cereal products                   |               |              |                             |              |                             |             |
| 001        |    | Guinea corn/sorghum                           | 973           | 4448         | 3174                        | 249          | 979                         | 736         |
| 002        |    | Maize   | 40645         | 44135        | 42855                       | 10394        | 9716                        | 9942        |
| 003        |    | Millet  | 8639          | 5241         | 6487                        | 2209         | 1154                        | 1505        |
| 004        |    | Rice  | 169254        | 87691        | 117594                      | 43283        | 19306                       | 27280       |
| 005        |    | Maize flour etc.                              | 25690         | 10958        | 16359                       | 6570         | 2412                        | 3795        |
| 006        |    | Bread, buns                                   | 121237        | 53843        | 78551                       | 31004        | 11854                       | 18223       |
| 007        |    | Biscuits                                      | 29960         | 6022         | 14798                       | 7662         | 1326                        | 3433        |
| 008        |    | Flour & other cereal products                 | 7823          | 5240         | 6187                        | 2000         | 1154                        | 1435        |
|            | 02 | Roots and tubers                              |               |              |                             |              |                             |             |
| 009        | 02 | Cassava                                       | 104412        | 44282        | 66327                       | 26701        | 9749                        | 15387       |
| 010        |    | Cocoyam                                       | 14044         | 6875         | 9504                        | 3591         | 1514                        | 2205        |
| 011        |    | Plantain                                      | 88615         | 34735        | 54489                       | 22661        | 7647                        | 12641       |
| 012        |    | Yam   | 108794        | 42264        | 66656                       | 27822        | 9305                        | 15463       |
| 013        |    | Other starchy roots/tubers                    | 2661          | 2006         | 2246                        | 680          | 442                         | 521         |
| 013        |    | Kokonte                                       | 12285         | 10397        | 11089                       | 3142         | 2289                        | 2573        |
| 014        |    | Gari  | 28727         | 23475        | 25401                       | 7346         | 5168                        | 5893        |
|            |    |   |               |              |                             |              |                             |             |
| 016<br>017 |    | Cassava dough Other starchy products          | 14596<br>4766 | 16870<br>578 | 16036<br>2113               | 3733<br>1219 | 3714<br>127                 | 3720<br>490 |
|            |    | • •   |               |              |                             |              |                             |             |
| 010        | 03 | Pulses and nuts<br>Small beans                | 20584         | 12861        | 15693                       | 5264         | 2831                        | 3640        |
| 018        |    |   |               | 811          | 802                         | 5264<br>201  | 179                         |             |
| 019        |    | Bambara beans                                 | 787<br>1192   | 555          |                             |              |                             | 186         |
| 020        |    | Broad beans                                   |               |              | 789                         | 305          | 122                         | 183         |
| 021        |    | Groundnuts                                    | 26291         | 24298        | 25029                       | 6723         | 5349                        | 5806        |
| 022        |    | Other pulses                                  | 4239          | 1328         | 2395                        | 1084         | 292                         | 556         |
| 023        |    | Dawadawa                                      | 2738          | 4503         | 3856                        | 700          | 991                         | 894         |
| 024        |    | Kolanut                                       | 3437          | 7038         | 5718                        | 879          | 1549                        | 1326        |
| 025<br>026 |    | Palmnut Other oil seeds & nuts                | 28162<br>311  | 15887<br>259 | 20388<br>278                | 7202<br>79   | 3498<br>57                  | 4730<br>64  |
| 020        |    | Other on seeds & nuts                         | 311           | 23)          | 276                         | 1)           | 31                          | 04          |
| 0.42       | 04 | Vegetables                                    | 10050         | 2606         | 6110                        | 2002         | <b>501</b>                  | 1.400       |
| 043        |    | Cocoyam leaves (kontomire)                    | 12052         | 2686         | 6119                        | 3082         | 591                         | 1420        |
| 044        |    | Garden eggs                                   | 33030         | 19210        | 24277                       | 8447         | 4229                        | 5632        |
| 045        |    | Okro  | 22676         | 16590        | 18821                       | 5799         | 3652                        | 4366        |
| 046        |    | Onions & shallots                             | 39264         | 29561        | 33119                       | 10041        | 6508                        | 7683        |
| 047        |    | Pepper (green)                                | 10831         | 3945         | 6470                        | 2770         | 869                         | 1501        |
| 048        |    | Tomato  | 93105         | 44052        | 62036                       | 23809        | 9698                        | 14391       |
| 049        |    | Other vegetables (not canned)                 | 8969          | 1967         | 4534                        | 2294         | 433                         | 1052        |
| 050<br>051 |    | Tomato puree (canned) Other canned vegetables | 23232<br>446  | 8724<br>87   | 14043<br>219                | 5941<br>114  | 1921<br>19                  | 3258<br>51  |
| 031        |    | Other canned vegetables                       | 440           | 67           | 219                         | 114          | 19                          | 31          |
| 025        | 05 | Fruits  | 4071          | 007          | 22.51                       | 1200         | 210                         | 5.45        |
| 035        |    | Avocado pear                                  | 4961          | 996          | 2351                        | 1200         | 219                         | 545         |
| 036        |    | Banana  | 10990         | 2416         | 5560                        | 2810         | 532                         | 1290        |
| 037        |    | Mango   | 2577          | 532          | 1281                        | 659          | 117                         | 297         |
| 038        |    | Orange  | 17716         | 3670         | 8820                        | 4531         | 808                         | 2046        |
| 039        |    | Pineapple                                     | 5014          | 1730         | 2934                        | 1282         | 381                         | 681         |
| 040        |    | Other fruits (not canned)                     | 3518          | 1477         | 2225                        | 900          | 325                         | 516         |
| 041<br>042 |    | Canned fruit Canned fruit juices              | 269<br>3169   | 143<br>297   | 189<br>1350                 | 69<br>810    | 32<br>65                    | 44<br>313   |
| 042        |    | Camicu mun juices                             | 3109          | 291          | 1330                        | 810          | 03                          | 313         |
|            | 06 | Oils and animal fats                          |               | 121          | 206                         | 1.40         | 20                          |             |
| 027        |    | Animal fats                                   | 555           | 131          | 286                         | 142          | 29                          | 66          |
| 027        |    | Coconut oil                                   | 8194          | 7615         | 7827                        | 2095         | 1676                        | 1816        |
| 028        |    | Groundnut oil                                 | 5598          | 3674         | 4379                        | 1432         | 809                         | 1016        |
| 029        |    | Palm kernel oil                               | 2063          | 5506         | 4244                        | 527          | 1212                        | 984         |
| 030        |    | Red palm oil                                  | 51008         | 29191        | 37190                       | 13044        | 6427                        | 8628        |
| 031        |    | Shea butter                                   | 3914          | 5917         | 5183                        | 1001         | 1303                        | 1202        |
| 032        |    | Margarine                                     | 2688          | 966          | 1597                        | 687          | 213                         | 371         |
| 033        |    | Other vegetable oil & fats                    | 42484         | 10509        | 22232                       | 10864        | 2314                        | 5157        |

|            |     | Expenditure Group   |               | verage Annua | al Household<br>Expenditure |              | Annual Per (<br>xpenditure | Capita        |
|------------|-----|---|---------------|--------------|-----------------------------|--------------|----------------------------|---------------|
|            |     |   | Urban         | Rural        | Ghana                       | Urban        | Rural                      | Ghana         |
|            | 07  | Meat  | ¢             | ¢            | ¢                           | ¢            | ¢                          | ¢             |
| 052        | 0.  | Corned beef   | 3542          | 602          | 1680                        | 906          | 133                        | 390           |
| 053        |     | Fresh beef (cattle)   | 113429        | 34570        | 63482                       | 29007        | 7611                       | 14727         |
| 054        |     | Bushmeat  | 9429          | 13942        | 12287                       | 2411         | 3069                       | 2850          |
| 055        |     | Goat (fresh)  | 15202         | 5781         | 9235                        | 3888         | 1273                       | 2142          |
| 056        |     | Fresh mutton  | 9414          | 3592         | 5726                        | 2407         | 791                        | 1328          |
| 057        |     | Pork  | 10745         | 7604         | 8756                        | 2748         | 1674                       | 2031          |
| 058        |     | Snail   | 6082          | 2032         | 3517                        | 1555         | 447                        | 816           |
| 059        |     | Other meat (except poultry)                                 | 5169          | 3350         | 4017                        | 1322         | 737                        | 932           |
|            | 08  | Poultry and poultry products                                |               |              |                             |              |                            |               |
| 060        |     | Chicken   | 64283         | 17274        | 34509                       | 16439        | 3803                       | 8006          |
| 061        |     | Duck  | 1104          | 926          | 992                         | 282          | 204                        | 230           |
| 062        |     | Guinea fowl   | 726           | 1296         | 1087                        | 186          | 285                        | 252           |
| 063        |     | Other poultry   | 1501          | 172          | 659                         | 384          | 38                         | 153           |
| 064        |     | Chicken eggs  | 46604         | 13756        | 25799                       | 11918        | 3028                       | 5985          |
| 065        |     | Other eggs (not chicken)                                    | 865           | 580          | 684                         | 221          | 128                        | 159           |
|            | 09  | Fish  |               |              |                             |              |                            |               |
| 071        | 0,5 | Smoked fish   | 217437        | 209346       | 212312                      | 55605        | 46089                      | 49254         |
| 072        |     | Crustaceans (prawns, etc.)                                  | 6665          | 2292         | 3895                        | 1704         | 505                        | 904           |
| 073        |     | Fish (fresh & frozen)                                       | 59160         | 50807        | 53869                       | 15129        | 11185                      | 12497         |
| 074        |     | Fish (dried)  | 29235         | 40842        | 36586                       | 7476         | 8991                       | 8488          |
| 075        |     | Fish (fried)  | 56464         | 34141        | 42325                       | 14439        | 7516                       | 9819          |
| 076        |     | Canned fish   | 17388         | 4523         | 9239                        | 4447         | 996                        | 2143          |
| 077        |     | Other fish  | 11161         | 7810         | 9038                        | 2854         | 1719                       | 2097          |
|            | 10  | Milk and milk products                                      |               |              |                             |              |                            |               |
| 066        |     | Fresh milk  | 762           | 796          | 783                         | 195          | 175                        | 182           |
| 067        |     | Milk powder   | 6632          | 2459         | 3989                        | 1696         | 541                        | 925           |
| 068        |     | Baby milk   | 2721          | 363          | 1228                        | 696          | 80                         | 285           |
| 069        |     | Tinned milk (unsweetened)                                   | 51528         | 14626        | 28155                       | 13177        | 3220                       | 6532          |
|            |     | Tinned milk (sweetened)                                     | 5820          | 719          | 2589                        | 1488         | 158                        | 601           |
| 070        |     | Other products (e.g. butter,cheese)                         | 3491          | 3686         | 3614                        | 893          | 811                        | 838           |
|            | 11  | Spices  |               |              |                             |              |                            |               |
| 079        |     | Pepper (dry)  | 18179         | 13610        | 15285                       | 4649         | 2996                       | 3546          |
| 080        |     | Salt  | 9416          | 15325        | 13159                       | 2408         | 3374                       | 3053          |
| 081        |     | Other condiments & spices                                   | 14604         | 6675         | 9582                        | 3735         | 1469                       | 2223          |
|            | 10  | March Constant  |               |              |                             |              |                            |               |
| 079        | 12  | Miscellaneous foods<br>Sugar                                | 34637         | 29301        | 31258                       | 8858         | 6451                       | 7251          |
| 093        |     | Jam   | 214           | 78           | 128                         | 55           | 17                         | 30            |
| 093        |     | Honey   | 1425          | 509          | 845                         | 364          | 112                        | 196           |
|            |     |   |               |              |                             |              |                            |               |
| 095        |     | Confectionery (not frozen)                                  | 1727          | 556          | 986                         | 442          | 122                        | 229           |
| 096<br>097 |     | Ice cream, ice lollies, etc. Other miscellaneous food items | 12775<br>5034 | 2803<br>947  | 6459<br>2445                | 3267<br>1287 | 617<br>208                 | 1498<br>567   |
|            |     |   |               |              |                             |              |                            |               |
|            | 13  | Prepared meals  |               |              |                             |              |                            |               |
| 086        |     | Cooked rice & stew  | 106597        | 41899        | 65619                       | 27260        | 9224                       | 15223         |
| 087        |     | Fufu & soup   | 40537         | 14122        | 23806                       | 10367        | 3109                       | 5523          |
| 880        |     | Tuo & soup  | 13686         | 4530         | 7887                        | 3500         | 997                        | 1830          |
| 089        |     | Banku & stew  | 60396         | 25951        | 38579                       | 15445        | 5713                       | 8950          |
| 090        |     | Kenkey  | 72670         | 38374        | 50948                       | 18584        | 8448                       | 11819         |
| 091        |     | Koko  | 28319         | 16671        | 20942                       | 7242         | 3670                       | 4858          |
| 092        |     | Other prepared meals  | 78869         | 16810        | 39562                       | 20169        | 3701                       | 9178          |
|            |     |   |               |              |                             |              |                            |               |
| 002        | 14  | Non-alcoholic beverages                                     | 1000          | 201          |                             | 241          | 0.4                        |               |
| 082        |     | Coffee  | 1022          | 381          | 616                         | 261          | 84                         | 143           |
| 083        |     | Chocolate drinks (eg. milo)                                 | 29279         | 12604        | 18717                       | 7487         | 2775                       | 4342          |
| 084<br>085 |     | Tea Other non-alcoholic beverages                           | 8635<br>2096  | 1608<br>730  | 4185<br>1231                | 2208<br>536  | 354<br>161                 | 971<br>285    |
| 003        |     | other non-aconomic develages                                | 2090          | 730          | 1231                        | 330          | 101                        | 263           |
| 000        | 15  | Soft drinks   | (8000         | 14600        | 22020                       | 1.5000       | 2217                       | <b>5</b> 0.60 |
| 098        |     | Soft drinks & minerals                                      | 67292         | 14603        | 33920                       | 17208        | 3215                       | 7869          |
|            | 2   | Alcohol & Tobacco   |               |              |                             |              |                            |               |

|            |    | Expenditure Group   | A              | verage Annua  | al Household<br>Expenditure |              | Annual Per C<br>Expenditure | Capita       |
|------------|----|---|----------------|---------------|-----------------------------|--------------|-----------------------------|--------------|
|            |    |   | Urban          | Rural         | Ghana                       | Urban        | Rural                       | Ghana        |
|            | 21 | Alcoholic drinks  | ¢              | ¢             | ¢                           | ¢            | ¢                           | ¢            |
| 099        |    | Local & imported beer & Guinness                                  | 32012          | 8988          | 17429                       | 8186         | 1979                        | 4043         |
| 100        |    | Palm wine   | 1235           | 2748          | 2193                        | 316          | 605                         | 509          |
| 101        |    | Pito  | 6257           | 13459         | 10818                       | 1600         | 2963                        | 2510         |
| 102        |    | Akpeteshie & other local spirits                                  | 19595          | 37990         | 31246                       | 5011         | 8364                        | 7249         |
| 103        |    | Gin   | 4579           | 5793          | 5348                        | 1171         | 1275                        | 1241         |
| 104        |    | Other alcoholic beverages   | 1930           | 968           | 1321                        | 493          | 213                         | 306          |
|            | 22 | Cigarettes and tobacco  |                |               |                             |              |                             |              |
| 105        |    | Cigarettes  | 7194           | 10476         | 9273                        | 1840         | 2306                        | 2151         |
| 106<br>107 |    | Tobacco (processed) Other tobacco products                        | 344<br>389     | 1376<br>1927  | 998<br>1363                 | 88<br>100    | 303<br>424                  | 232<br>316   |
| 107        |    |   | 30)            | 1,72,7        | 1303                        | 100          | 727                         | 310          |
|            | 3  | Clothing & Footwear   |                |               |                             |              |                             |              |
|            | 31 | Clothing materials  |                |               |                             |              |                             |              |
| 201        |    | Cotton  | 92175          | 69127         | 77577                       | 23572        | 15219                       | 17997        |
| 202        |    | Silk  | 6998           | 5030          | 5715                        | 1764         | 1107                        | 1326         |
| 203        |    | Handloomed (inc. Kente)   | 8362           | 6952          | 7469                        | 2138         | 1531                        | 1733         |
| 204<br>205 |    | Adinkra<br>Polyester material                                     | 4642<br>15137  | 5266<br>11492 | 5038<br>12829               | 1187<br>3871 | 1159<br>2530                | 1169<br>2976 |
| 206        |    | All other clothing material                                       | 35470          | 24256         | 28367                       | 9071         | 5340                        | 6581         |
| 200        |    | -   | 35.70          | 2.200         | 20307                       | ,,,,         | 55.0                        | 0001         |
| 207        | 32 | Tailoring charges Tailoring charges                               | 34918          | 20470         | 25767                       | 8930         | 4506                        | 5978         |
| 214        |    | Repairs to clothing   | 5074           | 4969          | 5007                        | 1298         | 1094                        | 1162         |
|            | 33 | Ready made clothes  |                |               |                             |              |                             |              |
| 208        | -  | Suit  | 3725           | 1609          | 2385                        | 953          | 354                         | 553          |
| 209        |    | Smock or other handwoven garment                                  | 5724           | 5725          | 5725                        | 1464         | 1260                        | 1328         |
| 210        |    | Dress (ladies/girls)  | 37624          | 17864         | 25109                       | 9621         | 3933                        | 5825         |
| 211        |    | Trousers, slacks, shorts, blouse, shirt                           | 39323          | 28759         | 32632                       | 10056        | 6331                        | 7570         |
| 212        |    | Underwear   | 33146          | 21220         | 25592                       | 8476         | 4672                        | 5937         |
| 213        |    | Other readymade clothes   | 16738          | 11012         | 13111                       | 4280         | 2424                        | 3042         |
| 21.5       | 34 | Footwear  | 47/22          | 21050         | 20001                       | 12101        | 1626                        | 71.46        |
| 215        |    | Shoes (leather)   | 47632<br>13537 | 21059         | 30801                       | 12181        | 4636                        | 7146         |
| 216<br>217 |    | Sandals (leather)<br>Shoes (canvas)                               | 11117          | 7542<br>5834  | 9740<br>7771                | 3462<br>2843 | 1660<br>1284                | 2259<br>1803 |
| 217        |    | Sandals (rubber)  | 14722          | 3834<br>14074 | 14312                       | 2843<br>3765 | 3098                        | 3320         |
| 219        |    | Other footwear  | 6338           | 4987          | 5483                        | 1621         | 1098                        | 1272         |
| 220        |    | Repairs to footwear   | 6844           | 4328          | 5250                        | 1750         | 953                         | 1218         |
|            | 4  | Housing & Utilities   |                |               |                             |              |                             |              |
|            | 41 | B. G. H. day by the   |                |               |                             |              |                             |              |
| 303        | 41 | Rent and housing charges House rates (property rates)             | 1373           | 402           | 758                         | 351          | 89                          | 176          |
| 304        |    | Basic rates   | 1730           | 211           | 768                         | 442          | 46                          | 178          |
| 307        |    | Other housing charges   | 19422          | 1210          | 7887                        | 4967         | 266                         | 1830         |
|            | 42 | Fuel and power  |                |               |                             |              |                             |              |
| 310        | -  | Gas for cooking   | 8901           | 1178          | 4010                        | 2276         | 259                         | 930          |
| 311        |    | Kerosene & other liquid fuel                                      | 29684          | 44201         | 38879                       | 7591         | 9731                        | 9019         |
| 312        |    | Charcoal  | 83684          | 19835         | 43230                       | 21391        | 4367                        | 10029        |
| 313        |    | Firewood & other solid fuel                                       | 11793          | 8054          | 9425                        | 3016         | 1773                        | 2186         |
|            | 5  | Household Goods, Operations & Services                            |                |               |                             |              |                             |              |
|            | 51 | Soft furnishings  |                |               |                             |              |                             |              |
| 401        |    | Bedsheets, blanket, curtains, etc.                                | 20772          | 15741         | 17586                       | 5312         | 3466                        | 4080         |
| 402        |    | Mattress, pillow, sleeping mats                                   | 9717           | 10506         | 10216                       | 2485         | 2313                        | 2370         |
| 403        |    | Other soft furnishings  | 903            | 1250          | 1123                        | 231          | 275                         | 260          |
| 404        |    | Repairs to soft furnishings                                       | 786            | 177           | 400                         | 201          | 39                          | 93           |
|            | 52 | Furniture and floor coverings                                     |                |               |                             |              |                             |              |
| 408        |    | Carpet & other floor coverings<br>Repairs to furniture & fittings | 1194           | 452           | 724                         | 305          | 99                          | 168          |
| 410        |    |   |                | /157          | 17.7.4                      | 305          |                             | 168          |

|            |     | Expenditure Group   | Α             | verage Annua | al Household<br>Expenditure |             | Annual Per C<br>xpenditure | Capita      |
|------------|-----|---|---------------|--------------|-----------------------------|-------------|----------------------------|-------------|
|            |     |   | Urban<br>¢    | Rural<br>¢   | Ghana<br>¢                  | Urban<br>¢  | Rural<br>¢                 | Ghana<br>¢  |
|            | 53  | Glassware, utensils, etc.   | Ç             | y.           | ý.                          | <u>v</u>    | <u>,</u>                   | Ç           |
| 421        |     | Glassware, chinaware, plasticware                                       | 11315         | 8986         | 9840                        | 2893        | 1978                       | 2283        |
| 422        |     | Cutlery & other tableware   | 1513          | 2138         | 1909                        | 387         | 471                        | 443         |
| 423        |     | Pots, pans & other kitchen utensils                                     | 9168          | 13216        | 11732                       | 2345        | 2910                       | 2722        |
| 424        |     | Other household utensils & tools  | 2807          | 2795         | 2799                        | 718         | 615                        | 649         |
|            | 54  | Electrical and other appliances   |               |              |                             |             |                            |             |
| 416        |     | Electric kettle   | 205           | 3            | 77                          | 52          | 1                          | 18          |
| 418        |     | Coalpot/cooking appliance   | 2087          | 1758         | 1879                        | 534         | 387                        | 436         |
| 419<br>420 |     | Other appliances Repairs to appliances                                  | 1059<br>36046 | 538<br>2254  | 729<br>14643                | 271<br>9218 | 118<br>496                 | 169<br>3397 |
|            | 55  | Non-durable household goods   |               |              |                             |             |                            |             |
| 425        | 22  | Soap & washing powder   | 116440        | 85381        | 96768                       | 29777       | 18797                      | 22449       |
| 426        |     | Insecticides & household cleaners                                       | 12090         | 4797         | 7471                        | 3092        | 1056                       | 1733        |
| 427        |     | Matches   | 3954          | 4170         | 4091                        | 1011        | 918                        | 949         |
| 428        |     | Toilet paper  | 15314         | 3034         | 7536                        | 3916        | 668                        | 1748        |
| 429        |     | Light globes/bulbs  | 2735          | 2229         | 2414                        | 699         | 491                        | 560         |
| 430        |     | Candles   | 3400          | 690          | 1684                        | 870         | 152                        | 391         |
| 431        |     | Other non-durable goods   | 10608         | 11816        | 11373                       | 2713        | 2601                       | 2638        |
|            | 56  | Household services  |               |              |                             |             |                            |             |
| 432        |     | Domestic staff wages  | 1059          | 199          | 514                         | 271         | 44                         | 119         |
| 433        |     | Household services (lawnsboy,etc.)                                      | 926           | 1646         | 1382                        | 237         | 362                        | 321         |
|            | 6   | Medical Care & Health Expenses  |               |              |                             |             |                            |             |
|            | 61  | Medical products and appliances   |               |              |                             |             |                            |             |
| 501        |     | Pain-killers (e.g. aspirin)   | 11501         | 17189        | 15104                       | 2941        | 3784                       | 3504        |
| 502        |     | Antibiotics   | 4150          | 5465         | 4983                        | 1061        | 1203                       | 115         |
| 503        |     | Anti-malaria medicines  | 3695          | 6617         | 5545                        | 945         | 1457                       | 128         |
| 504<br>505 |     | Other medical & pharmaceutical prods Therapeutic appliances & equipment | 49439<br>268  | 23972<br>207 | 33309<br>229                | 12643<br>69 | 5277<br>46                 | 772°<br>5:  |
|            | 62  | Medical service   |               |              |                             |             |                            |             |
| 506        | 02  | Medical services  | 41391         | 28809        | 33422                       | 10585       | 6342                       | 7753        |
|            | 63  | Other medical services  |               |              |                             |             |                            |             |
| 507        |     | Doctors & outpatient consulting fee                                     | 24556         | 17464        | 20064                       | 6280        | 3845                       | 465         |
| 508        |     | Dentist   | 897           | 305          | 522                         | 299         | 67                         | 12          |
| 509        |     | Nurses, midwives, etc.  | 4308          | 2650         | 3258                        | 1102        | 583                        | 75          |
| 510        |     | Native doctors & spiritual healers                                      | 2415          | 2841         | 2685                        | 618         | 625                        | 62:         |
| 511        |     | Other practitioners   | 255           | 421          | 360                         | 65          | 93                         | 84          |
| 512        |     | Other medical services  | 58450         | 29207        | 39928                       | 14947       | 6430                       | 926         |
|            | 7   | Transport & Communications  |               |              |                             |             |                            |             |
|            | 71  | Operation of personal transport   |               |              |                             |             |                            |             |
| 604        | , 1 | Tyres   | 3549          | 4340         | 4050                        | 908         | 955                        | 940         |
| 605        |     | Spares & motor vehicle tools  | 5913          | 9337         | 8081                        | 1512        | 2056                       | 187         |
| 608        |     | Petrol  | 48292         | 17199        | 28599                       | 12350       | 3787                       | 663         |
| 609        |     | Oil, grease, etc.   | 1776          | 1798         | 1790                        | 454         | 396                        | 41:         |
|            | 72  | Purchased fares   |               |              |                             |             |                            |             |
| 610        |     | Intercity bus (STC,City Express etc)                                    | 40950         | 35757        | 37661                       | 10472       | 7872                       | 873         |
| 611        |     | City bus (omnibus, trotro), taxi etc                                    | 161310        | 69134        | 102928                      | 41251       | 15220                      | 2387        |
| 612        |     | Other(rail,air,boat) & storage charge                                   | 1599          | 449          | 871                         | 409         | 99                         | 202         |
| (12        | 73  | Communications  | 1556          | 011          | 1221                        | 440         | 201                        | 20          |
| 613<br>614 |     | Postal charges (inc. courier services) Telegrams, telephones, fax, etc. | 1756<br>22873 | 911<br>2585  | 1221<br>10023               | 449<br>5849 | 201<br>569                 | 283<br>2325 |
|            | 8   | Recreation & Education  |               |              |                             |             |                            |             |
|            | 81  | Recreation equipment  |               |              |                             |             |                            |             |
| 705        |     | Sports equipment  | 1024          | 73           | 422                         | 262         | 16                         | 98          |
| 706        |     | Musical equipment   | 359           | 702          | 576                         | 92          | 155                        | 134         |
|            |     | Other recreational goods (eg.cassettes)                                 | 4646          | 2715         | 3423                        | 1188        | 598                        | 794         |

|     |     | Expenditure Group                     |           | Average Annu | al Household<br>Expenditure | Average<br>E | Annual Per C<br>Expenditure | Capita  |
|-----|-----|---------------------------------------|-----------|--------------|-----------------------------|--------------|-----------------------------|---------|
|     |     | -                                     | Urban     | Rural        | Ghana                       | Urban        | Rural                       | Ghana   |
|     |     |                                       | ¢         | ¢            | ¢                           | ¢            | ¢                           | ¢       |
|     | 82  | Entertainment                         |           |              |                             |              |                             |         |
| 708 |     | Cinema, video house                   | 1175      | 592          | 805                         | 300          | 130                         | 187     |
| 709 |     | Video cassette hire                   | 1598      | 298          | 775                         | 409          | 66                          | 180     |
| 711 |     | Others (inc. concerts)                | 1375      | 518          | 833                         | 352          | 114                         | 193     |
|     | 83  | Gambling                              |           |              |                             |              |                             |         |
| 710 |     | Gambling, lotto, raffles, etc.        | 29642     | 36102        | 33733                       | 7580         | 7948                        | 7826    |
|     | 84  | Newspapers, books and magazines       |           |              |                             |              |                             |         |
| 712 |     | Newspapers                            | 15596     | 3364         | 7849                        | 3988         | 741                         | 1821    |
| 713 |     | Books, magazines, etc.                | 3444      | 2678         | 2959                        | 881          | 590                         | 686     |
|     | 9   | Miscellaneous Goods & Services        |           |              |                             |              |                             |         |
|     | 91  | Personal care services                |           |              |                             |              |                             |         |
| 801 |     | Barber, beauty shop, etc.             | 61025     | 21538        | 36014                       | 15606        | 4742                        | 8355    |
|     | 92  | Jewellery, watches, etc.              |           |              |                             |              |                             |         |
| 803 |     | Jewellery, watches, rings, etc.       | 27800     | 16800        | 20833                       | 7109         | 3699                        | 4833    |
|     | 93  | Personal care goods                   |           |              |                             |              |                             |         |
| 804 |     | Goods for personal care               | 43102     | 33476        | 37005                       | 11022        | 7370                        | 8585    |
| 802 |     | Other personal goods                  | 15149     | 12607        | 13539                       | 3874         | 2776                        | 3141    |
|     | 94  | Writing and drawing equipment         |           |              |                             |              |                             |         |
| 805 |     | Writing & drawing equipment/supplies  | 2250      | 958          | 1431                        | 575          | 211                         | 332     |
|     | 95  | Expenditure in restaurants and hotels |           |              |                             |              |                             |         |
| 806 |     | Expenditure in restaurants & hotels   | 833       | 1345         | 1157                        | 213          | 296                         | 268     |
|     | 96  | Financial and other services          |           |              |                             |              |                             |         |
| 807 | - 0 | Financial services (n.e.s.)           | 7951      | 9357         | 8842                        | 2033         | 2060                        | 2051    |
| 808 |     | Other services (n.e.s.)               | 27089     | 8791         | 15499                       | 6927         | 1935                        | 3596    |
|     |     | Total expenditure                     | 4,309,619 | 2,456,898    | 3,136,147                   | 1,102,088    | 540,899                     | 727,542 |

Table A9.15 Value of average household and per capita food and beverage consumption (both cash expenditure and home-produced), and estimated total annual value, by subgroup: Accra (cedis)

Accra

| Group/                        | Accra -     | - household food | d consumption | A           | Accra - per capita foo | od consumption | Estimated value of     | Food         |
|-------------------------------|-------------|------------------|---------------|-------------|------------------------|----------------|------------------------|--------------|
| Subgroup                      | Cash        | Home             |               | Cash        | Home                   |                | - all food consumption | budget share |
|                               | Expenditure | Produced         | Total         | Expenditure | Produced               | Total          | consumption            |              |
|                               | ¢           | ¢                | ¢             | ¢           | ¢                      | ¢              | (billion cedis)        | %            |
| 1. Food & Beverage            | 3,185,788   | 21,953           | 3,207,741     | 863,660     | 5,951                  | 869,611        | 1,348                  | 96.5         |
| Cereals and cereal products   | 457,536     | •                | 457,536       | 124,037     |                        | 124,037        | 192                    | 13.8         |
| Roots and tubers              | 409,054     |                  | 409,054       | 110,893     |                        | 110,893        | 172                    | 12.3         |
| Pulses and nuts               | 99,346      | 1                | 99,347        | 26,932      | 0                      | 26,932         | 42                     | 3.0          |
| Vegetables                    | 283,752     |                  | 283,752       | 76,925      |                        | 76,925         | 119                    | 8.5          |
| Fruits                        | 79,664      | 9                | 79,673        | 21,597      | 3                      | 21,600         | 33                     | 2.4          |
| Oils and animal fat           | 123,754     |                  | 123,754       | 33,549      |                        | 33,549         | 52                     | 3.7          |
| Meat                          | 186,995     | 4                | 186,999       | 50,694      | 1                      | 50,695         | 79                     | 5.6          |
| Poultry and poultry products  | 141,317     | 1,310            | 142,627       | 38,311      | 355                    | 38,666         | 60                     | 4.3          |
| Fish                          | 450,018     | 20,629           | 470,647       | 121,999     | 5,592                  | 127,591        | 198                    | 14.2         |
| Milk and milk products        | 107,214     |                  | 107,214       | 29,066      |                        | 29,066         | 45                     | 3.2          |
| Spices                        | 38,427      |                  | 38,427        | 10,417      |                        | 10,417         | 16                     | 1.2          |
| Miscellaneous foods           | 69,637      |                  | 69,637        | 18,879      |                        | 18,879         | 29                     | 2.1          |
| Prepared meals                | 573,314     |                  | 573,314       | 155,424     |                        | 155,424        | 241                    | 17.2         |
| Non-alcoholic beverages       | 68,417      |                  | 68,417        | 18,548      |                        | 18,548         | 29                     | 2.1          |
| Soft drinks                   | 97,343      |                  | 97,343        | 26,389      | -                      | 26,389         | 41                     | 2.9          |
| 2. Alcohol & Tobacco          | 117,397     | 0                | 117,397       | 31,825      | 0                      | 31,825         | 49                     | 3.6          |
| Alcoholic drinks              | 108,181     |                  | 108,181       | 29,327      |                        | 29,327         | 45                     | 3.3          |
| Cigarettes                    | 9,216       |                  | 9,216         | 2,498       |                        | 2,498          | 4                      | 0.3          |
| <b>Total Food Consumption</b> | 3,303,185   | 21,953           | 3,325,138     | 895,485     | 5,951                  | 901,436        | 1,397                  | 100.0        |

Table A9.16 Value of average household and per capita food and beverage consumption (both cash expenditure and home-produced), and estimated total annual value, by subgroup: Other urban areas (cedis)

# Other urban

| Group/                        | Other Urban - | household food cor | nsumption | Other Urban - pe | er capita food consu | mption  | Estimated value | Food   |
|-------------------------------|---------------|--------------------|-----------|------------------|----------------------|---------|-----------------|--------|
| Subgroup                      | Cash          | Home               |           | Cash             | Home                 | T       | of all food     | budget |
| • .                           | Expenditure   | Produced           | Total     | Expenditure      | Produced             | Total   | consumption     | share  |
|                               | ¢             | ¢                  | ¢         | ¢                | ¢                    | ¢       | (billion cedis) | %      |
| 1. Food & Beverage            | 2,429,711     | 151,326            | 2,581,037 | 608,879          | 37,657               | 646,536 | 2,762           | 97.9   |
| Cereals and cereal products   | 383,286       | 16,985             | 400,271   | 95,897           | 4,250                | 100,147 | 429             | 15.2   |
| Roots and tubers              | 367,061       | 104,610            | 471,671   | 91,838           | 26,173               | 118,011 | 505             | 17.9   |
| Pulses and nuts               | 83,184        | 4,017              | 87,201    | 20,812           | 1,005                | 21,817  | 93              | 3.3    |
| Vegetables                    | 227,838       | 11,612             | 239,450   | 57,005           | 2,905                | 59,910  | 256             | 9.1    |
| Fruits                        | 35,490        | 1,229              | 36,719    | 8,879            | 307                  | 9,186   | 39              | 1.4    |
| Oils and animal fat           | 113,657       | 1,392              | 115,049   | 28,437           | 145                  | 28,582  | 122             | 4.4    |
| Meat                          | 167,523       | 1,392              | 168,915   | 41,914           | 348                  | 42,262  | 181             | 6.4    |
| Poultry and poultry products  | 104,783       | 2,199              | 106,982   | 26,216           | 550                  | 26,766  | 115             | 4.1    |
| Fish                          | 376,893       | 7,890              | 384,783   | 94,268           | 1,974                | 96,242  | 412             | 14.6   |
| Milk and milk products        | 56,718        | 0                  | 56,718    | 14,191           | 0                    | 14,191  | 61              | 2.1    |
| Spices                        | 43,680        |                    | 43,680    | 10,929           |                      | 10,929  | 47              | 1.7    |
| Miscellaneous foods           | 50,384        |                    | 50,384    | 12,606           |                      | 12,606  | 54              | 1.9    |
| Prepared meals                | 333,444       |                    | 333,444   | 84,427           |                      | 84,427  | 357             | 12.6   |
| Non-alcoholic beverages       | 30,278        | 0                  | 30,278    | 7,576            |                      | 7,576   | 32              | 1.1    |
| Soft drinks                   | 55,492        |                    | 55,492    | 13,884           | -                    | 13,884  | 59              | 2.1    |
| 2. Alcohol & Tobacco          | 56,313        | 1,919              | 58,232    | 14,089           | 480                  | 14,569  | 62              | 2.2    |
| Alcoholic drinks              | 48,891        | 1,919              | 50,810    | 12,232           | 480                  | 12,712  | 54              | 1.9    |
| Cigarettes                    | 7,422         | •                  | 7,422     | 1,857            |                      | 1,857   | 8               | 0.3    |
| <b>Total Food Consumption</b> | 2,486,024     | 153,245            | 2,639,269 | 622,968          | 38,137               | 661,105 | 2,824           | 100.0  |

Table A9.17 Value of average household and per capita food and beverage consumption (both cash expenditure and home-produced), and estimated total annual value, by subgroup: Rural coastal (cedis)

## Rural coastal

|                               |               |                     |           |                   |                    |          | Estimated       |        |
|-------------------------------|---------------|---------------------|-----------|-------------------|--------------------|----------|-----------------|--------|
| Group/                        | Rural Coastal | - household food co | nsumption | Rural Coastal - p | er capita food con | sumption | value of all    | Food   |
| Subgroup                      | Cash          | Home                |           | Cash              | Home               |          | food            | budget |
|                               | Expenditure   | Produced            | Total     | Expenditure       | Produced           | Total    | consumption     | share  |
|                               | ¢             | ¢                   | ¢         | ¢                 | ¢                  | ¢        | (billion cedis) | %      |
| 1. Food & Beverage            | 1,683,840     | 347,587             | 2,031,427 | 402,170           | 83,018             | 485,188  | 1,239           | 96.2   |
| Cereals and cereal products   | 272,060       | 32,548              | 304,608   | 64,979            | 7,774              | 72,753   | 186             | 14.4   |
| Roots and tubers              | 253,389       | 241,462             | 494,851   | 60,520            | 57,672             | 118,192  | 302             | 23.4   |
| Pulses and nuts               | 72,347        | 24,008              | 96,355    | 17,279            | 5,734              | 23,013   | 59              | 4.6    |
| Vegetables                    | 163,478       | 17,278              | 180,756   | 39,045            | 4,127              | 43,172   | 110             | 8.6    |
| Fruits                        | 21,185        | 3,881               | 25,066    | 5,060             | 927                | 5,987    | 15              | 1.2    |
| Oils and animal fat           | 74,686        | 3,543               | 78,229    | 17,838            | 846                | 18,684   | 48              | 3.7    |
| Meat                          | 44,634        | 2,401               | 47,035    | 10,660            | 573                | 11,233   | 29              | 2.2    |
| Poultry and poultry products  | 36,670        | 6,822               | 43,492    | 8,758             | 1,629              | 10,387   | 27              | 2.1    |
| Fish                          | 425,840       | 15,644              | 441,484   | 101,708           | 3,736              | 105,444  | 269             | 20.9   |
| Milk and milk products        | 30,340        |                     | 30,340    | 7,247             |                    | 7,247    | 18              | 1.4    |
| Spices                        | 34,641        |                     | 34,641    | 8,274             |                    | 8,274    | 21              | 1.6    |
| Miscellaneous foods           | 38,237        |                     | 38,237    | 9,133             |                    | 9,133    | 23              | 1.8    |
| Prepared meals                | 179,231       |                     | 179,231   | 42,808            |                    | 42,808   | 109             | 8.5    |
| Non-alcoholic beverages       | 19,067        |                     | 19,067    | 4,554             |                    | 4,554    | 12              | 0.9    |
| Soft drinks                   | 18,035        |                     | 18,035    | 4,307             |                    | 4,307    | 11              | 0.9    |
| 2. Alcohol & Tobacco          | 79,348        | 380                 | 79,728    | 18,952            | 91                 | 19,043   | 49              | 3.8    |
| Alcoholic drinks              | 71,499        | 380                 | 71,879    | 17,077            | 91                 | 17,168   | 44              | 3.4    |
| Cigarettes                    | 7,849         | -                   | 7,849     | 1,875             | -                  | 1,875    | 5               | 0.4    |
| <b>Total Food Consumption</b> | 1,763,188     | 347,967             | 2,111,155 | 421,122           | 83,109             | 504,231  | 1,288           | 100.0  |

Table A9.18 Value of average household and per capita food and beverage consumption (both cash expenditure and home-produced), and estimated total annual value, by subgroup: Rural forest (cedis)

# Rural forest

|                               | Rural F     | orest - household foo | od consumption | Rural       | Forest - per capita for | od consumption | Estimated value of all | Food         |
|-------------------------------|-------------|-----------------------|----------------|-------------|-------------------------|----------------|------------------------|--------------|
|                               | Cash        | Home                  |                | Cash        | Home                    |                | food consumption       | budget share |
| Group/                        | Expenditure | Produced              | Total          | Expenditure | Produced                | Total          |                        |              |
| Subgroup                      | ¢           | ¢                     | ¢              | ¢           | ¢                       | ¢              | (billion cedis)        | %            |
| 1. Food & Beverage            | 1,460,429   | 622,784               | 2,083,213      | 347,252     | 148,081                 | 495,333        | 2,740                  | 97.1         |
| Cereals and cereal products   | 199,285     | 67,092                | 266,377        | 47,385      | 15,953                  | 63,338         | 350                    | 12.4         |
| Roots and tubers              | 183,350     | 450,510               | 633,860        | 43,596      | 107,120                 | 150,716        | 834                    | 29.6         |
| Pulses and nuts               | 52,908      | 21,227                | 74,135         | 12,580      | 5,047                   | 17,627         | 98                     | 3.5          |
| Vegetables                    | 129,745     | 40,445                | 170,190        | 30,850      | 9,617                   | 40,467         | 224                    | 7.9          |
| Fruits                        | 8,710       | 9,153                 | 17,863         | 2,071       | 2,176                   | 4,247          | 23                     | 0.8          |
| Oils and animal fat           | 65,335      | 6,192                 | 71,527         | 15,535      | 1,472                   | 17,007         | 94                     | 3.3          |
| Meat                          | 88,739      | 8,042                 | 96,781         | 21,100      | 1,912                   | 23,012         | 127                    | 4.5          |
| Poultry and poultry products  | 38,068      | 16,689                | 54,757         | 9,052       | 3,968                   | 13,020         | 72                     | 2.6          |
| Fish                          | 405,150     | 3,416                 | 408,566        | 96,334      | 812                     | 97,146         | 537                    | 19.1         |
| Milk and milk products        | 25,125      | 18                    | 25,143         | 5,974       | 4                       | 5,978          | 33                     | 1.2          |
| Spices                        | 28,158      |                       | 28,158         | 6,695       |                         | 6,695          | 37                     | 1.3          |
| Miscellaneous foods           | 30,954      |                       | 30,954         | 7,360       |                         | 7,360          | 41                     | 1.4          |
| Prepared meals                | 169,736     |                       | 169,736        | 40,359      |                         | 40,359         | 223                    | 7.9          |
| Non-alcoholic beverages       | 17,113      | 0                     | 17,113         | 4,069       | 0                       | 4,069          | 23                     | 0.8          |
| Soft drinks                   | 18,053      |                       | 18,053         | 4,292       |                         | 4,292          | 24                     | 0.8          |
| 2. Alcohol & Tobacco          | 59,308      | 1,148                 | 60,456         | 14,102      | 273                     | 14,375         | 79                     | 2.8          |
| Alcoholic drinks              | 48,599      | 1,148                 | 49,747         | 11,556      | 273                     | 11,829         | 65                     | 2.3          |
| Cigarettes                    | 10,709      |                       | 10,709         | 2,546       |                         | 2,546          | 14                     | 0.5          |
| <b>Total Food Consumption</b> | 1,519,737   | 623,932               | 2,143,669      | 361,354     | 148,354                 | 509,708        | 2,819                  | 99.9         |

Table A9.19 Value of average household and per capita food consumption (both cash expenditure and home-produced), and estimated total annual value, by subgroup: Rural savannah (cedis)

# Rural savannah

|                               | Rural Savannah      | - household food c | onsumption | Rural Savannah      | - per capita food cons | sumption | Estimated value         | Food            |
|-------------------------------|---------------------|--------------------|------------|---------------------|------------------------|----------|-------------------------|-----------------|
| Group/                        | Cash<br>Expenditure | Home<br>Produced   | Total      | Cash<br>Expenditure | Home<br>Produced       | Total    | of all food consumption | budget<br>share |
| Subgroup                      | ¢                   | ¢                  | ¢          | ¢                   | ¢                      | ¢        | (billion cedis)         | %               |
| 1. Food & Beverage            | 1,028,550           | 792,019            | 1,820,569  | 185,152             | 142,573                | 327,725  | 1,184                   | 92.7            |
| Cereals and cereal products   | 203,522             | 188,337            | 391,859    | 36,636              | 33,903                 | 70,539   | 255                     | 20.0            |
| Roots and tubers              | 110,369             | 275,309            | 385,678    | 19,868              | 49,559                 | 69,427   | 251                     | 19.6            |
| Pulses and nuts               | 92,605              | 67,761             | 160,366    | 16,670              | 12,198                 | 28,868   | 104                     | 8.2             |
| Vegetables                    | 86,586              | 73,337             | 159,923    | 15,587              | 13,202                 | 28,789   | 104                     | 8.1             |
| Fruits                        | 7,124               | 3,746              | 10,870     | 1,282               | 674                    | 1,956    | 7                       | 0.6             |
| Oils and animal fat           | 49,350              | 7,202              | 56,552     | 8,884               | 1,296                  | 10,180   | 37                      | 2.9             |
| Meat                          | 61,711              | 72,067             | 133,778    | 11,109              | 12,973                 | 24,082   | 87                      | 6.8             |
| Poultry and poultry products  | 23,296              | 31,239             | 54,535     | 4,194               | 5,623                  | 9,817    | 35                      | 2.8             |
| Fish                          | 166,580             | 72,795             | 239,375    | 29,986              | 13,104                 | 43,090   | 156                     | 12.2            |
| Milk and milk products        | 10,438              | 206                | 10,644     | 1,879               | 37                     | 1,916    | 7                       | 0.5             |
| Spices                        | 51,576              |                    | 51,576     | 9,284               |                        | 9,284    | 34                      | 2.6             |
| Miscellaneous foods           | 36,957              |                    | 36,957     | 6,653               |                        | 6,653    | 24                      | 1.9             |
| Prepared meals                | 115,819             |                    | 115,819    | 20,849              |                        | 20,849   | 75                      | 5.9             |
| Non-alcoholic beverages       | 8,199               | 20                 | 8,219      | 1,476               | 4                      | 1,480    | 5                       | 0.4             |
| Soft drinks                   | 4,418               |                    | 4,418      | 795                 |                        | 795      | 3                       | 0.2             |
| 2. Alcohol & Tobacco          | 137,171             | 6,137              | 143,308    | 24,692              | 1,105                  | 25,797   | 94                      | 7.3             |
| Alcoholic drinks              | 111,632             | 6,137              | 117,769    | 20,095              | 1,105                  | 21,200   | 77                      | 6.0             |
| Cigarettes                    | 25,539              |                    | 25,539     | 4,597               |                        | 4,597    | 17                      | 1.3             |
| <b>Total Food Consumption</b> | 1,165,721           | 798,156            | 1,963,877  | 209,844             | 143,678                | 353,522  | 1,278                   | 100.0           |

### Appendix 5

### LIST OF PROJECT PERSONNEL

### **DIRECTORATE**

Daasebre Dr. Oti Boateng, Former Government Statistician and National Project Director Dr. K. A. Twum-Baah, Acting Government Statistician and National Project Technical Director Mr. Stephen Adjei, Project Sampling Director

Mr. Baah Wadieh, Field Coordinator

Mr. K. B. Danso-Manu, Project Liaison Officer and Data Processing Manager Ms Abena Asamoabea Ani, Field Coordinator and Data Processing Officer Mrs. Jacqueline Anum, Field Coordinator and Data Processing Officer

Mr. Adams Kasanga, Project Field Manager and Data Analyst

Mr Eric A. Okrah Field Coordinator

Mr. Alex Ohene Okai, Field Coordinator

Mr. Emmanuel Osafo, Field Coordinator

Mr. Fobi-Boateng, Project Accountant

Mr. Samuel Bannerman & Mr. N. B. Mensah, Support Staff

### WORLD BANK ADVISERS

Dr. Sudharshan Canagarajah, Task Manager Mr. John Ngwafon, Data Processing Mr. Harold Coulombe, Data Analysis

#### FIELD SUPERVISORS

| E. I. Acquah   | George Mettle     | Asuana Qaurtey   | Harry Charway |
|----------------|-------------------|------------------|---------------|
| George Agbenyo | Faustina Frimpong | Opoku Acheampong | Mark Aryeetey |
| Paul Addo      | Theophilus Okine  | Thomas Azure     |               |

### SENIOR ENUMERATORS

| James Asamoah | Victoria Budu     | Christian Assem  | Enock Annan |
|---------------|-------------------|------------------|-------------|
| Samuel Adusu  | Abeka Ansah       | Alexander Bissue | Eric Antwi  |
| Boakye Yiadom | Solomon O. Bempah | Salifu Amadu     |             |

### **ENUMERATORS**

| Phllis Quansah      | Samuel Obeng       | Charles Mensah      | Albert Asibu       |
|---------------------|--------------------|---------------------|--------------------|
| Peter Takyi Peprah  | Patrick O. Danso   | Patricia Affum      | Mabruk Fuseini     |
| Walter Kombat       | Eugene Akoto-Bamfo | Samuel Asante Annoh | Ernest Kpentey     |
| Doreen Biney        | Yaw Adu-Twum       | Nana Amoah Wiredu   | Ben Blankson       |
| Kenneth Nartey      | Amoako Minta       | Moses Tei Ansah     | Felix Asiamah      |
| Laud Aikins Otabil  | Opoku Addo         | Emmanuel Baidoo     | Emmanuel Donkor    |
| Henry Loglo         | Thomas Lindsay     | Emmanuel Owusu Sefa | Awal Alabira       |
| Bekoe Mawulikan     | Christian Aikins   | Micheal Asiamah     | Emmanuel Q. Mensah |
| Emmanuel O. Boateng | Gifty Ofori        | Asare Osei-Akoto    | Kenneth Chinful    |

## DATA ENTRY OPERATORS

| Charity C. Ameyaw | Gertrude Pennin   | Angela Dodoo   | Victoria Sottie |
|-------------------|-------------------|----------------|-----------------|
| Vincentia P. Alih | Lucy Mills        | Emelia Acquaye | Victoria Okine  |
| Christiana Wiredu | Samuel A. Dosserh | Peace Sam      | Doris Dowuona   |

## **DRIVERS**

| E. A. Anthony      | Victor Mensah         | Emmanuel Owusu   | Gershon K. Nornyigbey |
|--------------------|-----------------------|------------------|-----------------------|
| Martin Osei-Kufour | Victor Okine          | G. K. Tawiah     | Prince Asiedu         |
| Emmanuel K. Anani  | George Adjei          | Victor H. Mawuko | E. K. Oduro           |
| John Wesley Okai   | Henry Oscar Yaw Allan | Samuel Dam       | Adamu Issaka          |