



REPUBLIC OF GHANA

***GHANA LIVING STANDARDS SURVEY  
ROUND THREE (GLSS 3) 1991/92***

**DATA USER'S GUIDE**

*GHANA STATISTICAL SERVICE  
P.O. BOX GP1098  
ACCRA*

## 1. PREFACE

This report presents the main results of the third round of the Ghana Living Standards Survey (GLSS3), which was carried out by the Ghana Statistical Service (GSS).

The report provides a snapshot picture of the living conditions of Ghanaian households at a key stage in the country's development process. Fieldwork for the survey covered a period of 12 months (September 1991 to September 1992), some nine years after the commencement of Ghana's Economic Recovery Programme, and immediately prior to the re-introduction of democratic government under the new Fourth Republic.

Included in this report is detailed information on a great variety of socio-economic topics: for instance, demographic characteristics of the population, education, health, employment, housing, as well as household agriculture and household business activity. Perhaps the most valuable part of the report is the detailed information it provides on the income and expenditure of households. It is hoped that the data presented here will provide a solid basis for informed discussion amongst planners and decision makers about current living conditions in Ghana. Researchers wishing to carry out any special analysis of the GLSS data, or requiring more background information about the GLSS, are invited to contact the GSS.

Conducting a complex survey like this one would not have been possible without the help of a large number of people and organisations. The GSS would particularly like to thank the many householders who took part in this survey, often at considerable inconvenience to themselves, and who put up with the frequent visits and questioning by our interviewers. Thanks are also due to the field staff themselves - interviewers, supervisors, drivers and data entry operators - who carried out their duties efficiently and with good spirit, despite the often difficult working conditions. Thanks also to the regional statistical officers, district administrators, officials and many chiefs and CDR representatives, who provided support to our survey teams. Within the GSS itself the main responsibility for carrying out the fieldwork, processing the data and preparing this report has fallen to the Sample Survey Section and the Data Processing and Field Services Division, with additional inputs provided by the Prices and National Accounts sections.

We would like to acknowledge with thanks the technical and financial support received from the Government of Ghana, the World Bank, and the British Overseas Development Administration (ODA). We also wish to thank Mr Peter Digby (ODA Statistical Adviser) and Mr Harold Coulombe (University of Warwick) who both played a major part in GLSS3.

Finally, we wish to take this opportunity to draw the attention of readers to two other publications which contain data from GLSS3. A report entitled *Rural Communities in Ghana*, which was published in October 1993, is based on information collected from a sample of community leaders around the country, and provides data on community facilities available to rural households. Another report, entitled *The pattern of poverty in Ghana, 1988-1992* and which discusses the changes in living standards in Ghana across all three rounds of the GLSS, will be published shortly by the GSS.

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Daasebre Dr Oti Boateng  
Government Statistician and  
GLSS Project Co-ordinator

## **2. OVERVIEW OF GLSS3**

### **Background and Objectives**

Following the pattern set in the first two rounds of the Ghana Living Standards Survey (GLSS), the questionnaire used for the third round again covered a wide spectrum of topics, such as education, health, housing, employment, income and expenditure, which affect the living standards of households. GLSS3 thus provides data on various aspects of Ghanaian household economic and social activities, which are of help for monitoring the impact of the Government's Economic Recovery Programme.

GLSS3 differed from the two previous rounds, however, in concentrating particularly on the income, consumption and expenditure of households at a much more disaggregated level than previously. As a result, GLSS3 should provide much more accurate estimates of income and expenditure, including the imputed value of home produced food, which is consumed by households. The data on household expenditure are also being used to derive the weights needed for rebasing the Consumer Price Index.. The GLSS data on income, consumption and expenditure, together with other individual, household and community level data collected in GLSS3 will also provide a valuable database for national and regional planning purposes.

In GLSS1 and GLSS2 only two visits, two weeks apart had been made to each selected household, and the expenditure data on food and non-food items were collected on the second visit, with a recall period of two weeks. Obviously this has a recall lapse problem. An attempt was also made to obtain annual estimates of household expenditure on food and non-food items, as well as annual estimates of consumption of home produced food items.

To reduce the recall error in GLSS3, much more detailed information was collected by means of frequent visits to each household. Households were visited eight times at two-day intervals in rural areas, and 11 times at three-day intervals in urban areas. By reducing the recall period from two weeks to two or three days, much improved estimates of household consumption and expenditure should be obtained.

### **Sample design**

A multi-stage sampling technique was used in selecting the GLSS3 sample. Technical details of the sample design are given in Appendix 1 of the main report. Initially, 4565 households were selected for GLSS3, spread around the country in 407 EAs; in general, 15 households were taken in an urban EA and 10 households in a rural EA. The actual achieved sample was 4552 households. The sample designed used for the GLSS3, and with the very high response rate achieved, the sample can be considered as being self-weighting, though in the case of expenditure data (as discussed below) weighting of the expenditure values should be done.

### **Questionnaires**

Three types of questionnaires were used for GLSS3: a household questionnaire, a community questionnaire and a price questionnaire. Appendix 2 of the main report contains a detailed description of the contents of each questionnaire.

The household questionnaire was in two parts. Part A collected information on household composition, education, health and fertility, employment and time use, migration, and housing characteristics, and it was also used to identify the respondents for Part B. Part B covered agricultural activities, including the consumption of home produce, household expenditure, non-farm enterprises, other income and expenditure, and credit, assets, and savings.

Details of infrastructure and other facilities available to rural communities were recorded in the community questionnaire. This questionnaire was usually administered at a meeting with the community chief, along with his elders and other knowledgeable people in the community.

The price questionnaire was used to collect information on prices in the local market. This information is needed for comparing prices in different parts of the country, which would allow the construction of regional price indexes and the adjustment of household expenditures to a common base so as to take account of regional variations in purchasing power.

### **Fieldwork**

GLSS3 fieldwork commenced on 30<sup>th</sup> September 1991 in both rural and urban clusters, and finished in September 1992. In all, 11 teams each made up of 7 personnel were involved in the data collection and data entry exercise. Seven of these were rural teams, three were urban, and the eleventh team was a relieving team.

### **Data processing**

The data collected in this survey were entered directly onto microcomputers, which had been installed in the eight regional capitals. Kumasi and Accra had two PCs each, while Tamale, Sunyani, Koforidua, Ho, Cape Coast and Sekondi/Takoradi had one each. Special interactive software programs had been prepared for data entry and consistency checks, using the software package Rode-PC.

### **3. DESCRIPTION OF THE QUESTIONNAIRES**

The main questionnaire used in the survey was the household questionnaire. In addition to this, there were community and Price questionnaires.

#### **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 was the main module of the survey and has been expanded into detail.

##### **Section 5: Migration**

The purpose of this section is to gather data on the geographic mobility of household members. The section is brief as such focuses on the most recent migration and elicits information on previous place of residence, type of work and reasons for moving.

##### **Section 6: Identification of Respondents for Round 2**

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 expenditures of households 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 where as transfers from the household constitute expenditures. In the analysis however, net remittance is used.

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

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

### **Community Questionnaire**

The main aim of the community questionnaire was to identify the economic infrastructure, education and health facilities existing in the villages, as well as any related problems that affects their welfare. The questionnaire was administered in the rural EAs only.

## **Price Questionnaire**

As part of the survey a price questionnaire was designed to collect prices of most essential commodities in the local markets.

### 3. DESCRIPTION OF DATA FILES AND VARIABLES

#### List of data files

The files of all the sections are currently available either in SAS [.SSD] format or in SPSS- Windows[.SAV] format. Below are the currently available files:

#### Household Questionnaire - Part A

S0A:	Survey information.
S0B:	Survey information continued
S1:	Household Roster
S2:	Education:
S3A:	Health: Health condition in the past two weeks
S3B:	Health: Preventive health, Vaccination, in the past 12 months
S3C:	Health: Postnatal care
S3D:	Health: Fertility, Prenatal care, and Contraceptive use
S4A:	Employment: Screening questions and list of occupations in past 12 months
S4B:	Employment: Characteristics of the main occupation
S4B1:	Employment: Characteristics of the main occupation continued
S4B2:	Employment: Characteristics of the main occupation continued
S4B3:	Employment: Characteristics of the main occupation continued
S4C:	Employment: Secondary occupation during the past 12 months
S4C1:	Employment: Secondary occupation during the past 12 months continued
S4C2:	Employment: Secondary occupation during the past 12 months continued
S4C3:	Employment: Secondary occupation during the past 12 months continued
S4D:	Employment: Third occupation during the past 12 months
S4E:	Employment: Fourth occupation during the past 12 months
S4F:	Employment: Fifth occupation during the past 12 months
S4G:	Employment: Employment search in the past 12 months
S4H:	Employment: Activity status and employment search in the last 7 days
S4J:	Employment: Employment history
S4k :	Employment: Housekeeping
S5:	Migration
S6:	Identification of respondents for Sections 8,9,and 10
S7:	Housing

#### Household Questionnaire – Part B

S8A1:	Agriculture: Land
S8A2:	Agriculture: Livestock and Fishing
S8A3:	Agriculture: Agricultural equipment
S8B:	Agriculture: Plot details
S8C1:	Agriculture: Harvest and disposal of staple grains, field and cash crops
S8C2:	Agriculture: Harvest and disposal of roots, fruits, vegetables etc.
S8D:	Agriculture: Seasonality of sales and purchases (key staples only)
S8E:	Agriculture: Other agricultural income (in cash and kind)
S8F:	Agriculture: Agricultural costs and expenses
S8G:	Agriculture: Processing of agricultural produce
S8H:	Agriculture: Consumption of home produce

S9A11:	Household Expenditure: ID's of persons responsible for purchases
S9A12:	Household Expenditure: Non-food expenses-less frequently purchased items
S9A2:	Household Expenditure: Non-food expenses-frequently purchased items
S9B:	Household Expenditure: Food expenses
S9C:	Household Expenditure: Availability of selected consumer items
S10A:	Non-Farm Enterprises: Basic characteristics of non-farm enterprises
S10B:	Non-Farm Enterprises: Expenditures on enterprises
S10C:	Non-Farm Enterprises: Assets of enterprises
S10D:	Non-Farm Enterprises: Revenue of enterprise
S10E:	Non-Farm Enterprises: Net income and inventory of enterprise
S11A1:	Income Transfers: Identification of households who gave out cash or goods as remittance (donors)
S11A2:	Income Transfers: Transfer payments made by households
S11B1:	Income Transfers: Identification of who received cash or goods as remittances (recipients)
S11B2:	Income Transfers: Transfer payments received by households
S11C:	Miscellaneous income
S11D:	Miscellaneous out-goings (expenditures)
S12A1:	Identification of households with credits
S12A2:	Credits
S12B:	Assets and durable consumer goods
S12C:	Savings (including Susu)

**Household Income And Expenditure Files ( Refer to 'The Estimation of Components of Household Incomes and Expenditures' report for details)**

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

<u>INC1</u>	SCHOL = Value of educational scholarship (at individual level)
<u>INC2</u>	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)  
INC5 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)  
INC6 INCWAT = Income from water sold (at household level)  
INC7 INCLND1 = Income from renting out land  
 INCLND2 = Income from sharecropping (both at household level)  
INC8 INCLIV = Income from renting out livestock (at household level)  
INC9 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)  
INC11 ROOTSV = Revenue from sale of roots/fruit/vegetables (at level of each individual crop)  
INC12 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)  
INC15 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)

- EXP13 ASSDEPN = Depreciation of non-farm capital assets (at level of asset type within each enterprise)
- EXP14 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)
- EXP19 IMPRTPAR = Value of imputed rental services - paid by parents (at household level)
- EXP20 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 SCHOL1 = Value of scholarship, last 12 months
- SUBAGG2 J1TOT = Total wage income main job – past 12 months
- SUBAGG3 J2TOT = Total wage income 2<sup>nd</sup> job – past 12 months
- SUBAGG4 J3TOT = Total wage income 3<sup>rd</sup> job – past 12 months
- SUBAGG5 J4TOT = Total wage income 4<sup>th</sup> job – past 12 months
- SUBAGG6 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

<u>SUBAGG20</u>	EXPEDUC = Expenditure on educational items
<u>SUBAGG21</u>	HHUTILS = Expenditure on household utilities
<u>SUBAGG22</u>	EXPLAND = Expenditure on renting farm land
<u>SUBAGG23</u>	EXPCROP = Expenditure on crop input
<u>SUBAGG24</u>	EXPLIV = Expenditure on livestock inputs
<u>SUBAGG25</u>	EXPF DPR1 = Labour costs on food processing
	EXPF DPR2 = Other costs on food processing
<u>SUBAGG26</u>	HOMEPRO = Consumption of home-produced food
<u>SUBAGG27</u>	EXPYEAR = Less frequent non-food expenditure
<u>SUBAGG28</u>	EXPDAY = Frequent non-food exp.
<u>SUBAGG29</u>	EXPFOOD = Food expenditure (actual)
<u>SUBAGG30</u>	INPNF = Expenditure on non-farm enterprises
<u>SUBAGG31</u>	DEPNEQ = Depreciation of farming equipment
<u>SUBAGG32</u>	DEPNASS = Depreciation of non farm capital assets
<u>SUBAGG33</u>	EXPREMIT = Expenditure on remittances
<u>SUBAGG34</u>	EXPMISC = Miscellaneous expenditure
<u>SUBAGG35</u>	VALUSE = Use value of durable goods
<u>SUBAGG36</u>	RENT1 = Imputed rent - household owner
<u>SUBAGG37</u>	RENT2 = Imputed rent - paid by parents
<u>SUBAGG38</u>	RENT3 = Actual rent in cash and kind
<u>SUBAGG39</u>	RENT4 = Imputed rent - paid by employers
<u>SUBAGG40</u>	RENT5 = Imputed rent - squatters

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

*All variables are at the household level*

<u>AGG1</u>	TOTEMP = Income from employment
<u>AGG2</u>	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
<u>AGG3</u>	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
<u>AGG4</u>	IMPRT = Actual and imputed rental income
<u>AGG5</u>	REMITINC = Income from remittances
<u>AGG6</u>	OTHERINC = Other income
<u>AGG7</u>	EXPFOOD = Food expenditure (actual)
	EXPFOODC = Food expenditure (actual)- corrected
<u>AGG8</u>	HOUSEXP = Expenditure on housing
<u>AGG9</u>	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

**Derived files**

HHSIZE : Average household size  
G3\_POV : Selected variables  
G4\_POV : Selected variables including the weights

**Community Questionnaire**

**Price Questionnaire**