

PN-AAY-837

Best available copy -- pages cut off at tops

RURAL SMALL ENTERPRISES IN ZAMBIA:

RESULTS OF THE R.D.S.B. SURVEY.

by

Dr J. Milimo  
Director  
Rural Development Studies  
Bureau  
University of Zambia

Yacob Fisseha  
Asst. Professor  
Department of Agricultural  
Economics  
Michigan State University

September 1985

University of Zambia

RURAL DEVELOPMENT STUDIES BUREAU

Report No. 25

The Rural Development Studies Bureau (RDSB) of the University of Zambia wishes to express its deepest gratitude to the United States Agency for International Development without whose inspiration and financial assistance this study would not have been carried out.

We would also like to thank the Department of Agriculture Economics of Michigan State University for the technical support they rendered from the very inception of the project right through to the end. Professors Carl Liedholm, Donald Mead and Dr. Yacob Fisseha should be singled out for special mention as these assisted us in sample and questionnaire design. Dr. Fisseha trained the enumerators and took part in the field survey as well as participating in data analysis and report writing.

Invaluable services were rendered to RDSB in the course of the study by the Central Statistics Office (CSO) of the Republic of Zambia. Besides providing us with the list of the Standard Enumeration Areas and their maps they also assisted with data processing through their computer facilities. Woodgate Holdings made available their micro computer facilities for keying data.

The Rural Development Studies Bureau feels especially indebted to Mr. Brian Baldwin, the Consultant, whom USAID/Zambia kindly hired to plan the survey and to make the necessary liaison between the various agencies and

W

United States Agency for International Development,  
Michigan State University, the Central Statistics Office,  
Woodgate Holdings and the Rural Development Studies Bureau.

We would also like to thank the various District  
Governors and their senior staff for the warm reception  
they gave to our field researchers. Very often these  
district officials arranged for the accommodation of the  
enumerators at the Farm Training and Community Development  
Centres.

Lastly, but not least are the sixteen enumerators and  
Mr. Steven Kapoyo their Field Supervisor. Without these  
the data discussed in this report would not have been  
collected.

# TABLE OF CONTENTS

	Page
I. BACKGROUND	
1.0 Introduction	1
II. SURVEY METHODOLOGY	5
2.0 Introduction	5
2.1 Questionnaire Design and Content	6
2.2 Industry Definition and Coverage	8
2.3 Sampling Approach	9
2.4 Enumeration Procedure	10
2.5 Data Processing	11
III. MAGNITUDE OF THE SMALL SCALE ENTERPRISE SECTOR	13
3.0 Introduction	13
3.1 Overall Magnitude of the SSE Sector	13
3.2 Industrial Grouping of Enterprises	16
3.3 Enterprise Types Within Enterprise Groups	17
3.4 Demographic Characteristics of SSE Activities	18
3.5 Comparison of Small Scale with Large Scale Industrial Enterprises	20
3.6 Secondary Small Scale Enterprises	25
IV. EMPLOYMENT IN SMALL SCALE ENTERPRISES	26
4.0 Introduction	26
4.1 Magnitude of Employment in the Small Scale Enterprise Sector	27
4.2 Categories of the Labour Force	29
4.3 Distribution of Enterprises by Sizes of the Labour Force	32
4.4 Small Scale Enterprise Employment on Full-Time Equivalent Basis	35
4.5 Small Scale and Large Scale Industries Employment Opportunities Compared	39

.C

V.	THE ROLE OF WOMEN IN THE ZAMBIAN SSE SECTOR	40
VI.	SOME BASIC CHARACTERISTICS OF ZAMBIAN SMALL SCALE ENTERPRISES	45
6.0.	Introduction	45
6.1	Enterprise Characteristics	45
6.2	Bird's Eye View of Vendors	50
VII.	SUMMARY AND RECOMMENDATIONS	54
7.0	Introduction	55
7.1	The Magnitude of the Small Scale Enterprise Sector in Zambia	55
7.2	Magnitude and Characteristics of Employment in Zambian Small Scale Enterprises	57
7.3	Recommendations	60
APPENDIX A.	Questionnaire	67
APPENDIX B.	Localities Surveyed	68
APPENDIX C.	Enterprise Types	69
EIBLIOGRAPHY		70

Table 1:	Overall Estimates of Small Scale Enterprises (SSE) and Employment	13A
Table 2:	Relative Sizes of Enterprise Groupings and their Employment	16A
Table 3:	Industrial Grouping of Enterprises by Strata	17
Table 4:	Industrial Groupings After Excluding Beer Brewing and Vending	21
Table 5:	Comparative Table of Large Scale Firms and Small Scale Manufacturing Enterprises (SSI)	23
Table 6:	Employment Among Enterprise Groupings by Strata	28
Table 7:	Characteristics of SSE Employment	30
Table 8:	Distribution of SSEs by Labour Force Size	33
Table 9:	Intensity of Participation of SSE Labour Force	36
Table 10:	Magnitude of the SSE Labour Force on Full-Time Equivalent Basis	38
Table 11:	Magnitude of Female Participation in Small Scale Enterprise Sector	41
Table 12:	Some Basic Characteristics of the Small Scale Enterprise Sector	12

2

## I. BACKGROUND

Introduction

Zambia, like many other developing countries, has begun to acknowledge the important contribution which small scale enterprises can play in the development of the nation. Historically the Zambian economy has been based almost solely on the copper mining industry. Soon after independence she started to diversify the economy by emphasizing on the agricultural and manufacturing sectors in addition to mining. The efforts of the young government in promoting industrialization was concentrated on parastatals like INDECO and not on the private and small scale informal sectors. It is only towards the end of the seventies that more serious attention was given to small scale enterprises. Thus Village Industries Services was established in 1978 with the aim of promoting "industries and crafts on the basis of small-scale, labour intensive units with the object of maximizing village employment and generating additional village income."

The Small Industries Development (SID) Act of 1981 saw a breakthrough in Zambia's official and legal policy towards small scale industries. This act's objective is "to foster and encourage the development of small industries; to establish the Small Industries Development Organization; to define the functions and power of the Organization; and to provide for matters connected with or incidental to the foregoing".<sup>1/</sup>

---

1/ The Small Industries Development Act, 1981 No.18 of 1981 Government of Zambia, Government Printers, Lusaka.

Following this act the Small Industries Development Organization was founded. In 1985 the Development Bank of Zambia together with the Friedrich-Ebert Foundation of West Germany set up the Small Scale Enterprise Promotion Limited (SEP) Company whose objective is to assist small scale enterprises. 1/

The ultimate objective for the establishment of these three organizations which deal with small scale enterprises is to increase incomes and improve standards of life of the people who are engaged in them, people who would otherwise be unemployed.

There is, however, a critical shortage of information regarding the Small Scale Enterprise Sector. For detailed planning, accurate monitoring and evaluation of Small Scale Enterprise projects, and indeed for a comprehensive understanding of the small enterprises sector, its potential and problems, accurate information on this sector must be available to all the organizations dealing with the sector. These organizations are mainly Government, especially the Ministry of Commerce and Industry, the National Commission for Development Planning, the Village Industries Services, Small Scale Enterprises Promotion and Small Industries Development Organization. In view of this the last mentioned organization requested the Rural Development Studies Bureau of the University of Zambia to make a survey of the Rural Small Scale Enterprise Sector. This survey which was more qualitative than quantitative sought to identify the types of small scale industries, their sizes, the goods they produce, inputs, their contribution to rural household incomes and the bottlenecks which constrain their effective operations.

-----

1/ Small Scale Enterprise Promotion Limited participates directly in the equity capital of the enterprises it promotes

The United States Agency for International Development (USAID/Zambia) came in at this stage to provide RDSB with the necessary support to undertake the nationwide survey of Rural Small Scale Enterprises which is the subject of this Report. The overall objective of the study is to provide basic essential statistics on the Rural Small Scale Industrial Sector. In particular the study aims at identifying the types, sizes and seasonality of the various small scale enterprises as well as their employment characteristics and ownership status. Depending on the results of the present survey and the interest shown by the relevant agencies a follow-up, more detailed survey may be undertaken on specific enterprises.

While the Rural Development Studies Bureau undertook the study by providing both professional and field staff technical support was sought and obtained through AID/Zambia from Michigan State University's Department of Agricultural Economics. The latter institution which has a cooperative agreement with the United States Agency for International Development has gained very useful experience in the study of non-farm income generating activities.<sup>1</sup> Michigan State University assisted with the questionnaire design and seconded a member of staff to the Rural Development Studies Bureau who assisted in the training of enumerators; the fieldwork; as well as in data analysis and report writing.

The Central Statistical Office assisted in the survey in providing a list of standard enumeration areas (SEAs), preparing maps for the selected areas and in processing the data through their computer facilities.

-----  
 1. Chuta, E. & Liedholm, C. "Rural Non-Farm Employment: A Review of the State of the Art". M.S.U. Rural Development Paper No.4. 1979. Michigan State University.

The survey concentrated on rural Zambia. For the purposes of the survey the provinces of Lusaka and Copperbelt were omitted as both provinces are highly industrial and urbanised. For the same reasons the large towns of Kabwe and Livingstone (in Central and Southern Province respectively) were excluded. Attention was given both to the towns and villages in rural areas as both have concentrations of small scale enterprises.

Studies on Small Scale Industries that have been conducted in Zambia include those done by the Institute for African Studies.<sup>1</sup> These have focussed their attention on urban Zambia, in particular Lusaka. These studies have concerned themselves with employment opportunities of the Small Scale Industrial Sector, or the informal sector as it is generally referred to in these studies.

Other studies are those sponsored by the West German Technical Assistance Agency (GTZ) in North-Western Province and the Dutch in Western Province. These studies are what are regarded as aspects of the Phase II of the Michigan State University series of small scale enterprises surveys, that is to say they go into more detail and study specific issues relating to the development of small scale industries. All the studies referred to deal with industries only and do not concern themselves with small scale service enterprises which are included in the present study.

---

1. For instance:

- Bardoville, R. "Women's Economic Participation in the Urban Informal Sector". Institute of African Studies, University of Zambia, 1981.
- Todd, D., and Shaw, C.P. "Education, Employment and the Informal Sector in Zambia". Related report in Journal of Modern African Studies. Vol.8. No.3. 1980.
- Todd, D. "Small Scale Manufacturing in Lusaka". Institute of African Studies, University of Zambia. 1980.

## II. SURVEY METHODOLOGY

### 2.0 Introduction

The overall survey methodology used in Zambia is basically the same as similar small scale enterprises (SSE) surveys in other countries done by Michigan State University (MSU) and host institutions.<sup>1/</sup> The SSE surveys were usually done in two stages called Phase I and Phase II. The Phase I surveys were tailored to provide the overall magnitude of enterprises and employment in the SSE sector. Detailed analysis of enterprise operations characteristics and constraints were examined in the Phase II surveys.<sup>2/</sup> The present survey in Zambia corresponds to the Phase I.

In this chapter a brief account of the questionnaire design and content, industrial coverage of the survey, sampling approaches and scope, enumeration procedures, and data entry and processing methods is provided.

- 
- 1a Liedholm, C. and Chuta, E. The Economics of Rural and Urban Small-Scale Industries in Sierra Leone. African Rural Economy Paper, No. 14. Michigan State University. 1976.
- 1b Mahmoud, Badr, et al Small Scale Enterprises in Egypt: Fayoum and Kalyubiya Governates, Phase I Survey Results. Working Paper No. 23. Michigan State University. 1982.
- 1c Haggblade, S., Defay, J. & Pitman, R. Small Manufacturing and Repair Enterprises in Haiti: Survey Results. Working Paper No.4. M.S.U. 1979.
2. Differences in methodology and contents between the two phases are more fully described in Fisseha, The Contribution of Small-Scale Forest-Based Processing Enterprises to Rural Non-Farm Employment and Income In Selected Developing Countries. (FAO, 1985).

6

2.1. Questionnaire Design and Content

Some modifications were introduced into the survey questionnaire to suit the Cambian situation and data requirement. Otherwise the basic MSU design was used for optimum ease and speed of field data collection and computer entry and verification.

All the field data on an enterprise or observation unit is entered by the enumerator in a single horizontal line of foolscap paper. One such page holds all the data for seven cases or observation units. A copy of the questionnaire is included in Appendix A.

The questionnaire format was also designed to serve as a neat and systematic single line listing of the enterprises enumerated during the survey. Each line (of enterprise entry) was given a unique sequential number. The whole list could then serve as a sampling frame (a list of target enterprises) from which smaller samples could be drawn for future study, for example, such as the Phase II study.

The Phase I survey has the specific and limited objective of providing basic information on the characteristics of the enterprise. Thus, there is a trade-off between the amount and type of data collected on the one hand and the time (turn around) and expense incurred to collect and process it on the other. The survey is not intended to provide in-depth analysis of issues and policies on SSE investment, employment, production, distribution and management. These types of studies are better reserved for subsequent studies after the assessment of the overall magnitude and relative sizes of the different industries or SSE sub-sectors. With this in mind, the contents of the questionnaire are described below.

The content of the Phase I questionnaire could be divided into four main sets of information on the enterprise: its type, size, location and employment characteristics. These four sets were supplemented with additional information on the importance of the enterprise in the household income and the structural and locational descriptions of the workshop (see Appendix A).

The first part of the questionnaire contains some general locational identification of the enterprise. Included here are the names of the province, district and locality or town. Additionally, the specific address is indicated by writing the name of the owner (proprietor), the house number and the name of the township (village) street or compound.

The type of enterprise and its importance in household income and in seasonal labor requirement is then indicated. If there is a secondary SSE (non-farm) activity done by the same proprietor, this is also noted.

The nature of the workshop and the total size of the labour force as indicators of enterprise size or importance are also specified.

The final set of data deals with the employment characteristics. Employment is broadly defined here to include anybody engaged in the business on a full time or part time basis. Data entry distinguishes the labour force by type (i.e., proprietor, family member, hired worker and apprentice), sex, age (i.e., adult versus child) and the nature of employment (i.e., part-time versus full-time).

## 2.1 Industry Definition and Coverage

The survey is geared towards collecting information on the small scale non-farm enterprises (SSE) of fixed location. Small scale is defined here to encompass enterprises with 'employment' of up to 50 people.<sup>1</sup> Employment is broadly used to account for all people engaged in the enterprise. Both manufacturing and service (commerce) enterprises are included and are identified in codes 31-39 and 95 (excluding domestic and personal services) of the International Standard Industrial Classification of All Economic Activities (ISIC).<sup>2</sup>

Manufacturing is used in a wider context to include the repairing of manufactured goods since repair shops also engage in the production of items. Because of their numerical preponderance in rural towns, 'street' or petty vendors of fixed location are distinctly accounted for in the study. The survey thus covers both what are usually called formal (factory type) and informal (ad hoc) sectors.

Excluded from the study are (a) business entities without fixed location of operation, for example, mobile or itinerant hawkers; (b) business branches of parastatals or national corporations; (c) public or local government enterprises; and (d) businesses in the private transportation sector.

---

1. Employment number is used for size limitation since it is relatively easy to identify and measure and proprietors have less inhibition about divulging this information during the initial, brief encounter.

2. See Report on Employment and Earnings: 1980. CSO, 1983

### 2.3 Sampling Approach

The survey covers seven out of the nine provinces in the country, and is targeted towards the rural and small urban township enterprises.<sup>1</sup> For this reason, both Lusaka and Copperbelt provinces were excluded because of their high urban concentration of commercial and industrial activities. From the provinces included, Kabwe and Livingstone towns were dropped, for similar reasons. Within the seven provinces, the survey then represents all rural and urban localities with population below 50,000. Together they account for about 60 per cent of the national population. Names of towns and CSO identification numbers of rural enumeration areas covered in the survey are given in Appendix B.

The actual sampling approach employed is stratified random sample of population localities. These localities consist of townships and clearly demarcated rural areas or hamlets called standard enumeration areas (SEA). These SEAs are sub-populations into which the whole country was divided by the Central Statistical Office (C.S.O.) during the 1980 population census. The CSO also uses them as standard area units in many socio-economic surveys. In the present survey 70 townships and over 5100 rural SEAs were represented in the sample drawn.

Studies in other countries have shown that the number, size and characteristics of SSEs seem to vary by population sizes of localities and their degree of urbanization. To take account of this possibility, the target localities were stratified (grouped) into three strata (population sub-groups). The towns were divided into two strata: those

<sup>1</sup>. Rural or urban designations here do not use the UN definition of below or above 20,000 population size. Conventionally, towns with registered township status providing some basic need services qualify as urbans, although they are situated in essentially rural areas. This survey excludes the "large urban areas" as defined by the C.S.O. in the preliminary report of the 1980 Census of Population and Housing. CSO, 1981

with population above 12,000 and those below. Stratum one consisted of 10 major towns and stratum two of 60 smaller ones.<sup>1</sup> All the SEAs were grouped into the third stratum.

A simple random sample of localities within a stratum was then used to draw 6 major towns from the first stratum, 24 smaller towns from the second and 37 SEAs from the third. It should be pointed out that the sampling frame (list of target areas) for the SEAs did not consist of all the 5100 plus rural SEAs found in the seven surveyed provinces. Rather, it consisted of a randomly drawn sample list of SEAs from that used by the CSO in the 1984/85 agricultural survey. The small number of SEAs in the sample is justified on the assumption (and experience<sup>2</sup>) that there is great homogeneity in economic characteristics and activities among the rural SEAs. Conversely small urban townships show a greater variety of activities.

#### 2.4 Enumeration Procedure

A team of 16 enumerators were intensively trained for a week using a manual prepared to go with the questionnaire. At the end of the training period, the enumerators were taken to urban and rural localities outside Lusaka for a field trial. Since maps of the localities to be surveyed were acquired from the CSO, their use in fieldwork was explained and demonstrated during the classroom sessions and field trial periods.

- 
1. A list of all the towns with their population sizes is reported in Preliminary Report : 1980 Census of Population and Housing, (CSO, 1981).
  2. Liedholm, Carl "Research on Employment in the Rural Nonfarm Sector in Africa." African Rural Employment Paper No. 5 East Lansing: Michigan State University, Department of Agricultural Economics. 1973.

Before the survey team left for field work, letters of introduction and identification cards were issued to them. The project was also introduced to provincial and district officials as well as the public through letters and the public media. Throughout the course of the survey, these officials were extremely helpful in facilitating accommodation and public acceptance.

The enumerators moved from one survey area to another canvassing every rural and urban street, neighbourhoods or compounds in search of SSE activities. For the most part responses were directly entered into the questionnaire as numbers (representing codes or otherwise). The type of the SSE activity and its specific address were, however, written out in words and later coded at camp from a list of prepared codes. At the end of the day, each questionnaire was completely coded, checked and arranged for dispatch to Lusaka for computer entry.

The survey work started in Southern Province and continued province by province until the last one to be enumerated was Western Province. The total field work with an average of 14 enumerators took exactly three months.

## 2.5 Data Processing

The format of the questionnaire is such that it is unnecessary to transfer the data onto coding sheets for computer entry. The data were therefore entered directly into the computer from the questionnaire. Initially, the data entry and analysis were planned to be done with a microcomputer. Unfortunately, the large data base made it necessary to use a large number of diskettes resulting in a

difficult and time consuming process. Therefore, the data was eventually punched into and analyzed using the main frame computer and SPSS computer program through the auspices of the CSO. The data were entered into floppy diskettes however so that, if so desired, a further analysis could be made by RDSB when it acquires its own micro-computer (of suitable capacity).

3.0 Introduction

An operational definition used in this study for small scale enterprises (SSE) is those with total employment of up to 50 people. By employment is meant anybody engaged in SSE activity including the proprietor or owner/operator, family members, hired workers and apprentices or trainees. In actuality, more than 99% of the enterprises were found to employ less than 6 people. The definition used here thus corresponds closely with what are loosely called traditional or informal enterprises by some people.

This chapter will describe the absolute and relative magnitude of the SSE sector in smaller towns and rural areas of Zambia. As Chapter IV will deal specifically with the employment picture in the SSE sector, the focus of discussion here is the enterprise themselves.

3.1. Overall Magnitude of the SSE Sector

Table 1 shows the outcome of the field enumeration and the resulting overall estimations for all the localities represented in the survey.<sup>1/</sup>

About 51,000 households accounting for 8 percent of the overall population were enumerated or checked during the field survey in the three population strata. Because of the sampling proportion chosen, a large majority of the enumerated households are from the small towns and rural townships.

---

<sup>1/</sup> For the sake of brevity and ease of expression, 'the localities represented in the survey' will be referred to as 'overall' although it should be remembered that this 'overall' estimate is not synonymous with the national estimate.

TABLE 1: OVERALL ESTIMATES OF RURAL SMALL SCALE ENTERPRISES (SSE) AND EMPLOYMENT BY POPULATION SIZE STRATA

POPULATION STRATA	HOUSEHOLDS IN THE SAMPLE			OVERALL ESTIMATES				PERCENT OF POPULATION SURVEYED	
	HOUSEHOLDS SAMPLED # 2/	HOUSEHOLDS WITH SSE #	SSE EMPLOY. ENUM. # 3/	ENTERPRISES #	EMPLOYMENT #	PERCENT #			
Small towns (12-50,000)	23,500	8,572	16	15,215	14,281	6.4	25,239	6.8	59
Rural townships (0-12,000)	22,100	6,857	31	11,705	17,143	7.6	29,262	7.8	47
Rural standard Enumeration Areas (SEA)	5,300	1,390	26	2,300	192,563	86.0	318,642	85.4	1
<b>TOTAL</b>	<b>50,900</b>	<b>16,819</b>	<b>33</b>	<b>29,220</b>	<b>223,986</b>	<b>100</b>	<b>373,263</b>	<b>100</b>	<b>8</b>

- 1/ See Section 2.3 for definition of the population strata
- 2/ These are number of households found (enumerated) in the random sample of localities
- 3/ These are numbers (#) of people found working in the enumerated SSEs
- 4/ These estimates are only for those localities represented in the sample. For the nation as a whole, the number of enterprises and employment is expected to increase respectively by 120,000 and 200,000

Among the surveyed households, about 17,000 or 33 per cent were found to have small scale enterprise (SSE) activities with a total employment of 29,000. As the table shows, the percentage of households with SSE activity declines from 36 for the small towns to 26 for the SEAs. Expectedly, as the level of urbanation rises, the concentration of SSE activity increases.

Table 1 also shows the overall estimates (extrapolations) for number of SSEs and employment derived from the surveyed households and localities. The extrapolation is based on the sampling proportion used to pick the enumerated localities. Thus, the overall estimate for the small towns was derived by multiplying the enumerated results by 1.667 which is the reciprocal of their sampling proportion (60 per cent).

Any small-scale non-farm private economic activity pursued for commercial business reasons as a source of full or partial income and employment is considered as an SSE activity. Examples include tailoring, carpentry, basket/mat making, auto repair, beer brewing, tin-smithing, trade and 'street' vending. Using such a comprehensive scope of business activity coverage, it is estimated from the survey that there are 223,990 enterprises employing 373,263 people in the areas represented in the survey. Close to 85 percent of both the number of enterprises and employment are found in the rural Standard Enumeration Areas (SEAs). 1/ A different approach of estimating the number of enterprises could be to -----

1/ Unlike for the towns, the estimates for the rural parts of Zambia depend on the magnitude of the rural standard enumeration areas (SEAs) covering the localities represented in the survey. Figures supplied by the Central Statistics Office show there are over 5,100 such localities.

use the proportion of rural households with SSE activity as shown in Table 1.<sup>1/</sup> Using this approach the resulting estimate shows about 9% fewer enterprises.

No comprehensive survey of SSE activities has been done in Zambia so far. And the number of enterprises and the size of the corresponding employment estimated from limited and localized studies seem to have been substantially under-estimated. For example, an ILO World Employment Programme paper using a similar definition puts the total number of employment in the informal sector at 200,000-300,000 people for all of Zambia.<sup>2/</sup> However, the present survey shows there are close to 375,000 people working in the sector in the areas covered in the survey alone. The survey does not enable one to directly extrapolate the total number of enterprises and employment for the whole country. However, taking into account the demographic sizes and characteristics of the areas left out from the survey and on the basis of the present survey's experience, it is expected that the large urban areas would add another 110,000 enterprises and the rural SEAs of Lusaka and Copperbelt still another 10,000. Thus, the total national figure could approach 350,000 enterprises engaging some 575,000 people. An industrial and sectoral breakdown of the overall picture is discussed below.

---

1/ The present survey covered a little less than 1% of the number of SEAs or about 1% of their total population. While the sample size for the rural localities seems rather small, it is not obvious how the result would have been affected with a larger sample since no prior knowledge exists on the incidence of relevant SSE activities or of their characteristics.

2/ Hans C. Haan, "Some Characteristics of Informal Sector Businessmen in Lusaka and Kitwe, Zambia," ILO World Employment Programme, Lusaka, 1982.

### 3.2 Industrial Grouping of Enterprises

The SSE activities could be divided into three broad components or subsectors (see table 2): manufacturing SSEs (accounting for about 80 per cent of the enterprises), trade and service (6 per cent) and vending (14 per cent). Vendors are classified separately from services mainly for three reasons. One, their volume of business (stock of material) is typically very small consisting of a few tiny piles of different consumer items usually amounting to no more than K30-50; two, although they operate from a fixed location, their business site is either completely open or without private enclosures; and three, as a way of isolating their impact on the SSE activity for comparative purposes with SSE studies in other countries.

Table 2 shows a further division of three subsectors into industrial or enterprise groups. The list of individual enterprise types comprising each group is given in Appendix C. Briefly, examples of enterprise types in each group are as follows:-

- (1) Garments: tailoring, dressmaking and knitting;
- (2) Forest-based: pitsawing, carpentry, furniture making, charcoal/firewood production and basket/mat making;
- (3) Metals: Blacksmithing, tinsmithing and welding;
- (4) Repairs: Auto and bicycle repairs, electronic and electrical repairs and jewellery and watch repairs;
- (5) Foods: bakery, confectionery and butchery;
- (6) Beverages: Traditional beer brewing;
- (7) Leather: shoemaking/repair and other leather works;

TABLE 2: RELATIVE SIZES OF INDUSTRIAL GROUPINGS AND THEIR EMPLOYMENT  
(ESTIMATE FOR RURAL ZAMBIA)

Enterprise Grouping	Enterprises		Employment		
	#	%	#	%	Per Enterprise
Garment	10,501	1.7	17,128	4.6	1.63
Forest-Based	53,428	23.8	91,538	24.5	1.71
Metals	8,421	3.8	11,022	2.9	1.31
Repairs	2,231	1.0	3,197	0.9	1.43
Footis	97,238	43.4	158,453	42.4	1.63
Leather	1,221	0.5	1,446	0.4	1.18
Ceramics	4,960	2.2	7,093	1.9	1.20
Other Manufacturing	347	0.2	415	0.1	1.20
<b>Mfg Sub Total</b>	<b>178,347</b>	<b>79.6</b>	<b>290,292</b>	<b>77.7</b>	<b>1.63</b>
Catering	1,600	0.7	4,945	1.3	3.09
Trade	8,087	3.6	16,631	4.5	2.06
Other Services	3,563	1.6	12,278	3.3	3.45
<b>Service Sub Total</b>	<b>13,250</b>	<b>5.9</b>	<b>33,854</b>	<b>9.1</b>	<b>2.56</b>
Vending	32,393	14.5	49,854	13.2	1.52
<b>Grand Total</b>	<b>223,990</b>	<b>100</b>	<b>373,263</b>	<b>100</b>	<b>1.67</b>

- (8) Ceramics: pottery, brick/block making, stone carving;
- (9) Other Manufacturing: chemicals and photo studio;
- (10) Catering: restaurants, hotels and bars;
- (11) Trade: groceries, shops, various retail shops and wholesalers;
- (12) Other services: dry cleaning, hair dressing and construction; and
- (13) Vending: All sorts of products.

The largest groups within the manufacturing subsector are beverages and the forest-based enterprises each accounting for 50 and 30 per cent respectively. These two are distantly followed by garments and metals. Within the service group, trade accounts for about 75% of the enterprises.

The SSE sector as a whole is dominated by beverages, forest based enterprises and vendors in that order, the three of them accounting for about 80 percent of the enterprises.

### 3.3. Enterprise Types Within Enterprise Groups

Certain industries or enterprise groups are dominated by a few enterprise types. Thus in manufacturing, traditional beer brewing account for 99 per cent of beverages; basket/mat making, 60 per cent of forest-based; knitting about 75 per cent of garments; and tinsmith, about 44 per cent of metals. Within services, groceries and other food shops account for over 60 per cent of trade; and construction, for 94 per cent of the other services group. Finally, food vendors account for over 80 per cent of all vending activities.

18  
-18

### 3.4 Demographic Characteristics of SSE activities

There is a marked difference between the towns and the rural SEAs with respect to the incidence of SSE activities (Table 3). In towns and rural townships, the ranking of the magnitude of the enterprise groups is exactly identical. Thus, in both cases, vending is the dominant one, followed by beverages, trade and garments in that order; conversely, ceramics, followed by leather, catering and metals are the least prevalent; somewhat in the middle ranking are forest based and repairs.

In the rural SEAs however, the dominant ones are beverages, forest based, vending and garments in that order. The least prevalent are leather, catering, repairs and ceramics. A closer look reveals that the rural SEAs are comparatively (vis-a-vis the towns) more dominated by SSE activities such as beverages, forest-based products, metals and ceramics which could thrive on traditionally acquired skills; and they are less dominated by the service and vending activities which could be considered as non-traditional SSE activities in the Zambian context.<sup>1/</sup>

In many developing countries, the two most prevalent enterprise groups usually are garments and forest-based followed by foods or metals. This is the case, for example, in Sierra Leone, Egypt, Bangladesh and Honduras.<sup>2/</sup> If traditional beer brewing and vending enterprises are excluded

---

1/ For a similar conclusion, see Malcolm Christie, "The Informal Sector: Its Role in Economic Development", unpublished memo; Lusaka (1974).

2/ See Fisseha (1985) op. cit.

Table 3: Industrial Grouping of Enterprises by Strata  
(Survey Estimate for Rural Zambia)

19'

STRATA	Small Towns		Rural Townships		S.E.A.s		Overall SSE Total	
	#	%	#	%	#	%	#	%
<u>Enterprise Grouping</u>								
Garment	1,212	8.5	1,393	3.1	7,897	4.1	10,501	4.7
Forest Based	613	4.3	1,140	6.7	5,675	26.9	53,428	23.1
Metals	193	1.4	193	1.1	3,035	4.2	8,421	3.7
Repairs	263	1.8	305	1.8	1,662	0.9	2,231	1.0
Foods	942	6.6	1,290	7.5	3,125	2.7	7,357	3.2
Beverages	1,943	13.6	3,850	22.5	81,088	43.7	89,881	40.2
Leather	128	0.9	123	0.7	970	0.5	1,221	0.5
Ceramics	50	0.4	60	0.4	1,849	2.5	4,960	2.2
Other Manufacturing	27	0.2	43	0.2	277	0.1	347	0.2
Mfg. <sup>1/</sup> Sub total	5,371	37.7	8,397	49.0	161,578	85.4	178,347	79.6
Catering	167	1.2	185	1.1	1,247	0.6	1,600	0.7
Trade	1,385	9.5	1,438	8.4	1,265	2.7	8,087	3.6
Other Services	128	0.9	110	0.6	1,325	1.7	3,563	1.6
Service Subtotal	1,680	11.7	1,733	10.1	3,837	5.0	13,250	5.9
Vending	7,230	50.6	7,015	40.9	11,149	9.4	32,393	14.3
Grand Total	14,281	100	17,145	100	191,564	100	223,990	100

Source: Survey Data

<sup>1/</sup> Mfg. - Manufacturing

from consideration because of their unusual preponderance, then forest-based assume the highest rank in Zambia SSE followed by garments, metals and foods (see Table 4). The numerical dominance of the forest-based group is not due to the inclusion of charcoal/firewood production (which accounts for less than 5 percent of all forest based) but to wood furniture production (20 per cent) and basket/mat making (60 per cent).

The exclusion of beer brewing and vending from Table 4 does not affect the overall relative magnitude of the manufacturing group within the SSE sector as a whole. The main effect is at the town level where manufacturing now accounts for two-thirds of all the remaining small town SSE activities as compared to a little over one-third previously and for almost three-fourths in the rural townships compared to one-half previously.<sup>1/</sup> The share of the service group also rises since vending is not in the picture; however, the change is less striking compared with that for manufacturing.

### 3.5. Comparison of Small Scale with Large Industrial Enterprises

The Ministry of Commerce and Industry maintain a list of registered industrial firms. These are firms with at least one employee. Theoretically they could include some enterprises that fall within our definition of small scale activities. In practice though, very few small scale industrial (SSI) enterprises may be registered. Thus, there are two reasons why the list may consist almost entirely of large scale industrial (LSI) enterprises or that the number

---

1. Whether charcoal/firewood is included or not does not have much effect on the conclusions.

21

TABLE 4: RELATIVE MAGNITUDE OF INDUSTRIAL GROUPINGS AFTER EXCLUDING CHARCOAL/FIREWOOD PRODUCTION FROM FOREST BASED, BEER BREWING FROM FOODS, AND ALL VENDING ACTIVITIES

ENTERPRISE GROUPINGS	SMALL TOWNS		RURAL TOWNSHIPS		SEAS		TOTAL	
	#	%	#	%	#	%	#	%
Garments	1,212	24.4	1,393	22.9	8,897	9.0	10,502	10.6
Forest based	480	9.6	940	15.5	49,597	56.2	51,017	51.4
Metals	193	3.9	193	3.2	8,035	9.1	8,421	8.5
Repairs	263	5.3	305	5.0	1,662	1.9	2,230	2.2
Foods	942	18.9	1,290	21.2	5,126	5.8	7,358	7.4
Leather	128	2.6	123	2.0	970	1.1	1,221	1.2
Ceramics	50	1.0	60	1.0	4,849	5.5	4,960	5.0
Other Mfg 1/	27	0.5	43	0.7	277	0.3	347	0.4
<b>Mfg Sub Total</b>	<b>3,295</b>	<b>66.2</b>	<b>4,347</b>	<b>71.5</b>	<b>78,413</b>	<b>88.8</b>	<b>86,055</b>	<b>86.7</b>
Catering	167	3.4	185	3.0	1,247	1.4	1,600	1.6
Trade	1,385	27.8	1,438	23.7	5,265	6.0	8,087	8.1
Other Services	128	2.6	110	1.8	3,325	3.8	3,563	3.6
<b>Services Sub Total</b>	<b>1,680</b>	<b>33.8</b>	<b>1,733</b>	<b>28.5</b>	<b>9,837</b>	<b>11.2</b>	<b>13,250</b>	<b>13.3</b>
<b>GRAND TOTAL</b>	<b>4,975</b>	<b>100</b>	<b>6,080</b>	<b>100</b>	<b>88,250</b>	<b>100</b>	<b>99,305</b>	<b>100</b>

Source: Survey Data

of SSI enterprises included in the list could be insignificant relative to all SSI enterprises. One, because of their conspicuous presence, LSI enterprises would find it difficult to skip or escape registration, two, over 99 per cent of all SSI enterprises are found in the rural SEAs (unlikely to be registered) and another 9 per cent are one-person operations in the small towns and rural townships enterprises which by definition are not registered.

The possibility of underestimating the SSI group relative to their LSI counterparts must be substantial since the registered firms cover the whole country and they include national corporations, parastatals and publicly owned firms which is not the case for the SSI group. Table 5 gives an indication of the relative magnitudes of enterprises and employment between the small-scale industrial or manufacturing enterprises and the registered enterprises. The industrial classification shown on the table is the one used by the CSO.

Thus, with the inherent tendency of the figures to underestimate the SSI group relative to the LSI, Table 5 shows the following relationships. The SSI group account for over 99 per cent of all the manufacturing enterprises in the national economy and for over 80 per cent of the corresponding employment. In fact, the SSI group generally outstrip their LSI counterparts by an overwhelming margin except in the chemical and transport equipment industries. In 10 out of the total 13 industries, the LSI contribute less than half of the employment.

TABLE 5: COMPARATIVE TABLE OF INDUSTRIES AND EMPLOYMENT BETWEEN REGISTERED OR LARGE SCALE INDUSTRIES (LSI) AND THE SMALL SCALE INDUSTRIES (SSI)<sup>1/</sup>

INDUSTRIES (ENTERPRISE GROUPINGS) <sup>2/</sup>	NUMBER OF ENTERPRISES <sup>2/</sup>		NUMBER OF EMPLOYMENT	
	LSI	SSI	LSI	SSI
Garment and Textile	120	10,501	10,209	17,1
Wood and furniture	29	16,760	3,410	29,7
Other forest product	37	36,662	2,680	61,8
Metals	72	8,421	6,250	11,0
Food	111	7,358	16,559	17,8
Beverage	25	89,881	3,840	140,5
Leather	7	1,221	983	1,4
Non-Metallic (e.g. ceramics)	25	4,960	3,539	7,0
Chemicals	51	8	7,310	
Machinery	18	(824) <sup>3/</sup>	959	(1,3
Electrical products	23	(1023)	1,719	(1,i
Transportation Equipment	14	--	1,293	--
Jewellery, etc.	7	(377)	158	(7
<b>TOTALS</b>	<b>529</b>		<b>58,909</b>	<b>289,8</b>

Source: Survey Data

1/ Source for the registered or Large Scale Industries (LSI) was obtained from Census of Industrial Production, 1980, CSO (1983)

2/ The word industry indicates here that all non-manufacturing or service firms and enterprises are excluded from table

3/ SSI values in parentheses refer to enterprises that are basic in repair activities

In addition large scale service and trade area employed 31,000 people compared to about 22,000 in the SSE sector. However, if the large urban areas (with a population of almost two million) and the rural SEAs of the Copperbelt and Lusaka were included in the SSE estimates, they could proportionally add another 5,200 enterprises with corresponding employment of at least 10,500.<sup>1/</sup> In construction, 389 large scale enterprises employed about 24,000 people compared to 12,000 employed by 3360 enterprises in the SSE sector; again, a proportional expansion of the SSE sector estimates would result in 1800 additional enterprises and 6,200 employment.<sup>2/</sup>

Finally, although the information for the large scale group is from the 1980 CSO census, it is not expected that their magnitude has grown since. In fact, it is most likely that they have declined in line with the general economic trend since the mid-seventies.<sup>3/</sup>

---

1/ Since the average employment per firm in urban areas is higher by about 20 per cent compared with the more rural areas, the employment estimate of 10,500 is probably biased downward.

2/ Comparisons between large and small scale enterprises eventually boil down to the efficiency with which capital, as the major scarce resource in developing countries, is used; neither the time nor the data is available for Zambia to discuss this issue here. It should be pointed out however that many studies in other countries have shown that SSI enterprises are not necessarily inefficient users of capital relative to the large-scale, more capital-intensive enterprises; the SSI groups typically have less capital per worker relative to the larger ones and hence usually lower labor productivity but they generate more or equal output per unit of capital relative to the large enterprises. See Fisseha (1985) op.cit. for a review of the evidence.

3/ See Country Profile. CSO (1984)

### 3.6 Secondary Small Scale Enterprises

Some proprietors had an additional SSE activity as a secondary source of income. The secondary activity usually complements well the primary one. Thus, a person who repairs car batteries may have a retailing shop of new or used batteries just next door; a person who brews traditional beer may also produce or retail food items for sale for the beer customers as well.

The management and sometimes the labor is provided by the same proprietor. The effect on entrepreneurial efficiency when the two enterprises are unrelated will probably depend on the availability of slack time to be used on one or the other enterprise.

In the present survey 10 percent of the SSE proprietors had a secondary enterprise. The smaller the enterprise, the less likely it will have a secondary enterprise. Thus, 90 percent of those proprietors with a labour force of 5 or less had no secondary enterprise while 53 percent of those with a labour force of greater than 10 had. This may be due to the lack of additional capital (both initial and operating) to invest in a secondary enterprise. It is also true however that a large majority of the proprietors in the SEAs, and even the towns, have farming as a primary or secondary source of household income. In fact, even the primary enterprise is not the major source of income for two-thirds of the SEA enumerators.

Enterprises that were common as secondary enterprises include beer brewing (25 percent of all secondary enterprises), vending (22 percent), basket/mat making (12 percent), wood carving (7 percent) and knitting (6 percent). Others which were less common include sundry retail shops, blacksmith, electronic repair and charcoal production in that order.

26

## IV. EMPLOYMENT IN SMALL SCALE ENTERPRISES

### 4.0. Introduction

The most important contribution of the small scale enterprises (SSE) to the national economy most likely lies in employment. Being highly labour-intensive units, the amount of capital needed to train and employ workers is very little. Furthermore, since they tend to be accessible also to the poor, the landless or the unskilled, they serve an important function of providing income to the needy among society.

In the present study, any person engaged in an SSE activity whether on part-time or full-time basis is said to be employed in that activity. The total employment includes four types of workers: proprietors (owner/operators), family members, hired workers and apprentices or trainees.

This chapter will discuss the following major topics: the magnitude of employment the SSE sector provides, the distributions of the labour force by the type of worker, the distribution of the enterprises by the size of their labour force, the rate of participation of the labour force and a brief employment comparison between the small scale and the large scale industrial enterprises.

### 4.1. Magnitude of Employment in the Small Scale Enterprise Sector

As table 1 showed, a third of the households surveyed are involved in one or another of the small scale enterprises. The heaviest concentration of these enterprises for the areas represented in the survey is in the small towns, that is towns with a population of between 12,000 and 50,000.

27  
Thirty six percent of the households in these towns take part in SSE activities whereas thirty one percent of the households in rural townships and twenty six per cent in the rural enumeration areas (SEAs) are involved in such activities.

Small scale enterprises provide employment to some 29,000 people in the sample which was taken for the study. When extrapolated to include all the areas represented by the sample, the figure rises to over 373,000 (Table 6). The large urban centres of Lusaka and the Copperbelt together with their rural SEAs (which were not included in the survey) will proportionally give another 120,000 enterprises making the total number of people engaged by the SSE sector in the region of 575,000.

For the localities covered in the survey, Table 6 shows the distribution of the total employment by population size strata and by industries or enterprise groups of the SSE activities. More than 85 percent of the SSE employment is found in the rural enumeration areas. Furthermore, the manufacturing subsector accounts for over three-fourths of the employment compared to 13 percent for vending and 9 percent for the service enterprises.

Rural enumeration area enterprises labour force size is only 5 percent smaller than their town counterparts (i.e., both small towns and rural townships together). Therefore, enterprises that dominate in number also dominate in employment between the two locations. For example, beverages account for 44 percent of the enterprises in SEAs and 41 percent of the employment there; in the towns vending sector accounts for 45 per cent of the enterprises and 40 per cent

TABLE 6: NUMBER OF EMPLOYMENT AMONG ENTERPRISE GROUPINGS BY STRATA

POPULATION STRATA	SMALL TOWNS	RURAL TOWNSHIPS	RURAL SEA	SSE TOTAL
<u>Enterprise Groupings</u>				
Garment	1,923	2,182	13,023	17,128
Forest Based	1,378	1,910	88,250	91,538
Metals	342	290	10,390	11,022
Repairs	662	595	1,940	3,197
Foods	2,069	2,785	13,022	17,876
Beverages	2,980	5,845	131,752	140,577
Leather	150	188	1,108	1,446
Ceramics	215	90	6,788	7,093
Other Manufacturing	55	83	277	415
<b>Mfg Sub Total</b>	<b>9,774</b>	<b>13,968</b>	<b>266,550</b>	<b>290,292</b>
Catering	818	802	3,325	4,945
Trade	3,609	3,740	9,282	16,631
Other Services	318	322	11,638	12,278
<b>Services Sub Total</b>	<b>4,737</b>	<b>4,864</b>	<b>24,245</b>	<b>33,854</b>
Vending	10,840	10,430	27,847	49,117
<b>TOTAL</b>	<b>25,359</b>	<b>29,262</b>	<b>318,642</b>	<b>373,263</b>

Source: Survey Data

of the employment there. Thus the largest enterprise groups which provide the biggest employment opportunity in the country (vending in small towns and townships, beverages in rural areas) are consumption and not production oriented. The employment generated by these two types of enterprises constitutes half of the total employment generated by the small scale enterprise sector.

The second highest contributors of employment are forest-based activities (28 percent) in the SEAs and beverages (28) in the towns. Production activities using leather are the least developed ones both in the towns and the SEAs; furthermore, repairs in SEAs and ceramics in the towns are also less significant.

#### 4.2. Categories of the Labour Force

In order to identify the nature of employment, the labour force in the SSE activities is categorized into four types. These are the proprietor (or owner/operator), proprietor's family members, fully paid hired workers and apprentices or trainees whose payment, if any, may be incidental to their goal of learning the trade. Other aspects of the labour force such as sex classification are provided in Chapter V.

It is characteristic of small scale activities that the bulk of the work provided by people other than the proprietor comes from family members. In Zambian SSE activities, family members accounted for almost three-fourths of all non-proprietor labour force (Table 7).

However, since close to two-thirds of all SSE activities are one-person operations (just the owner/operator), about 60 percent of the total labour force is accounted for by

TABLE 7: CHARACTERISTICS OF THE SMALL SCALE ENTERPRISE (SSE) LABOUR FORCE BY INDUSTRY GROUPINGS

INDUSTRY GROUPINGS	SSE TOTAL	CATEGORY OF WORKERS (3) 1/				
		P	F	H	A	TOT
Garment	17,128	70.3	15.3	0.6	13.8	100
Forest Based	91,538	63.4	22.2	6.8	7.6	100
Metals	11,022	76.4	13.7	0.7	9.2	100
Repairs ,	3,197	70.7	6.2	10.0	13.1	100
Foods	17,876	44.9	36.4	5.9	12.8	100
Beverages	140,577	63.5	34.6	0.6	1.3	100
Leather	1,446	84.7	10.6	0.5	4.2	100
Other Manufacturing	415	83.8	5.3	9.7	1.2	100
<b>Mfg Sub Total</b>	<b>290,292</b>	<b>63.5</b>	<b>28.2</b>	<b>3.1</b>	<b>5.2</b>	<b>100</b>
Catering	4,945	29.8	23.2	46.8	0.2	100
Trade	16,631	49.2	30.2	19.8	0.8	100
Other Services	12,278	29.1	11.6	45.4	13.9	100
<b>Services Sub Total</b>	<b>33,854</b>	<b>69.1</b>	<b>27.2</b>	<b>2.2</b>	<b>1.5</b>	<b>100</b>
Vending	49,117	69.1	27.2	2.2	1.5	100
<b>GRAND TOTAL</b>	<b>373,263</b>	<b>62.0</b>	<b>27.5</b>	<b>5.7</b>	<b>4.8</b>	<b>100</b>

Source: Survey Data

1/ The letters P, F, H and A refer respectively to proprietors, family members, hired and apprentices (trainees).

proprietors. Hired workers provide only about 6 percent of the labour force. Since entry barriers are generally minimal and skill requirements simple, many people probably prefer to have their own SSE activity to working for somebody else. For this reason, it is likely that competition is intense in some crowded enterprise types. Apprentices also represent less than 5 percent of the overall SSE labour force.

There are some differences within the population strata and the enterprise groups. The proprietor and family members provide, for example, for about 90 percent of the total labour force in the rural SEAs; the corresponding figure for the small towns is about 80 percent. Also, there are three times more hired workers per enterprise in the small towns compared with the rural SEAs this is in spite of the fact that on average, the small town enterprise employment is only 7 percent bigger than found in the rural SEAs.

The difference in labour types between the strata is explained by the difference in enterprise type concentrations. Thus, repairs, which are relatively insignificant in the rural SEAs, hire about 10 percent of the labour force compared to 1 percent for beverages which are dominant in the SEAs. Close to half (over 45 percent) of the labour force in catering and other services are hired workers (Table 7). This is not surprising as such enterprise groups include enterprise types such as restaurants and construction. With close to 20 percent, trade has also a high proportion of its labour force as hired workers. Enterprise with very little hired workers include knitting, shoe repair, beer brewing and tinsmithing.

In some countries the apprenticeship system is an important source of labour for the proprietor and training for the apprentice. Thus, the proportion of proprietors who went through the apprenticeship system is 78 percent in Jamaica, 52 in Honduras, 28 in Egypt, 25 in Bangladesh and 90 per cent in Sierra Leone.<sup>1/</sup> Consistent with the situation in many West African SSE activities, apprentices in Sierra Leone accounted for 42 percent of the total labour force. By accounting for less than 5 percent of the total SSE labour force, the apprenticeship system in Zambia can be described as weak except in garments and repairs. The data is not available to assess its constraints and potential contributions in the development of the Zambian SSE sector.

Finally, it should be pointed out that 0.8 percent of the enterprises are owned by absentee entrepreneurs. They are usually run by hired workers or family members.

#### 4.3. Distribution of Enterprises by Size of the Labour Force

From the size of their labour force, Zambian SSE activities are very small outfits (Table 7). The average size is 1.67 workers per enterprise as a whole and 2.56 for services, 1.63 for manufacturing and 1.52 for vending. Two thirds of all the enterprises are one person-operations and another 19.3 percent are two-people operations. The percentage of enterprises that employ 10 people or more is very small for each of the subsectors and when translated into raw numbers it works out at 892 enterprises in manufacturing (or about 1400 nationally), 241 in services (or 370 nationally) and 97 for vending (or 140 nationally). The total number of enterprises employing above 20 in these areas was only 52 (or about 80 nationally).

---

<sup>1/</sup> See Fisseha (1985) op. cit

TABLE 8: DISTRIBUTION (%) OF THE SMALL SCALE ENTERPRISES (SSE) BY THE SIZE OF THEIR LABOUR FORCE

ENTERPRISE GROUPS	PERCENTAGE OF SSE IN EACH LABOUR FORCE SIZE			
	1	2-5	6-9	10 & Up
Garment	72.6	25.6	0.5	1.3
Forest Based	69.4	27.8	1.9	0.9
Metals	78.6	21.3	0.0	0.1
Repairs	82.0	16.0	1.2	0.8
Foods	41.0	54.2	3.3	1.5
Beverages	66.1	33.0	0.7	0.2
Leather	86.3	13.4	0.0	0.3
Ceramics	73.9	25.9	0.0	0.2
Other Manufacturing	90.6	8.2	0.7	0.5
<b>All Manufacturing</b>	<b>67.6</b>	<b>30.8</b>	<b>1.1</b>	<b>0.5</b>
Catering	10.9	84.3	3.7	1.1
Trade	49.2	48.6	1.4	0.8
Other Services	37.9	42.3	15.8	4.0
<b>All Services</b>	<b>41.5</b>	<b>51.2</b>	<b>5.5</b>	<b>1.8</b>
Vending	67.1	32.2	0.4	0.3
<b>GRAND TOTAL</b>	<b>66.0</b>	<b>32.2</b>	<b>1.2</b>	<b>0.6</b>

Source: Survey Data

While the majority of the enterprise groups employ one person per enterprise (usually the proprietor), services tend to employ two people or more each (See Table 8). Thus close to 90 percent of the catering enterprises and half of those involved in trade employ two people. Relatively bigger enterprises are found in repairs, forest-based, catering, trade and other services.

The highest number of workers in each enterprise group is as follows: Trade (47 people), other services (37), catering (35), ceramics (32), garments (28), forest-based (23), leather (17), repairs (15), metals (12) and other manufacturing (10). All of these enterprises were found in the towns (small towns and rural townships combined). The highest number found in the rural enumeration areas (SEAs) was 19 for the forest-based enterprise group which already has a higher number of 23 in the towns. The highest number for services was in construction.

There is not much difference between the small towns, rural townships and the rural SEAs with respect to their size distributions. For example, the proportions of enterprises that employ only one person are 61.6, 63.6 and 66.5 respectively for the rural towns, rural townships and the rural SEAs. Their corresponding percentages for the employment of up to 10 people is respectively 99.3, 99.4 and 99.4.

Finally, while the average size of the small scale manufacturing enterprises is only 1.63 that for the large scale enterprises is close to 110 people (See Table 5).

4.3. Small Scale Enterprise Employment on Full-Time  
Equivalent Basis

The level of labour force participation in the SSE activities depends not only on the number of months worked per year but also on the number of hours per day or the number of days per week during the working season. To the extent that children do not work as much as adults, the total employment picture could also change due to a substantial number of working children.

In the present survey, anybody who worked less than half of the working time was considered as a part-time worker. Children were defined as those below the age of 14.

Generally, the rate of work participation or effective employment among the SSE activities was very high (Table 9). Thus, on average each enterprise was operated for about 11 months. There were only 8 and 4 percent respectively part-time and children workers for the SSE subsector as a whole. There is very little difference between the proportion of part-time workers among the three subsectors. However, one is likely to find children 16 times more in vending than in services or 10 times more in manufacturing.

The average number of months worked in each of the three population strata are 11.4, 11.2 and 10.6 respectively for the small towns, rural townships and the rural SPAs. With 6 months worked per year, logging had the shortest season of production among the enterprise types. Among the major enterprise types only beer brewing, wood carving, and construction were operated for about 10 months; all the others were operated at least for 11 months.

TABLE 9: INTENSITY OF PARTICIPATION OF THE LABOUR FORCE IN SSE ACTIVITIES

ENTERPRISE GROUPINGS	MONTHS WORKED PER YEAR	PERCENTAGE OF TOTAL LABOUR		
		PART-TIME	CHILDREN	SSE TOTAL
Garment	11.2	5.5	1:2	1.63
Forest Based	11.2	7.6	1.8	1.71
Metals	11.4	6.9	2.3	1.31
Repairs	11.4	2.1	0.0	1.42
Foods	11.1	19.8	3.7	2.43
Beverages	10.2	7.0	5.8	1.56
Leather	11.3	1.7	9.3	1.18
Ceramics	11.3	2.1	0.0	1.43
Other Manufacturing	11.8	0.8	0.0	1.20
Mfg. 1/ Sub Total	10.7	7.4	3.7	1.63
Catering	11.5	4.5	0.0	3.09
Trade	11.1	5.3	1.0	2.06
Other Services	10.1	17.4	0.0	3.45
Services Sub Total	10.9	9.8	0.4	2.56
Vending	10.8	7.2	6.6	1.52
GRAND TOTAL	10.7	7.8	4.2	1.67

Source: Survey Data

1/ Mfg. Manufacturing

The average size of part-time workers per enterprise was 40 percent higher in the towns than in the rural SEAs. For children, the town figure was higher by a full two-thirds. The proportion of part-time workers as a proportion of all workers is 9.8 and 7.3 respectively for the towns and the SEAs; the corresponding figures for children are 5.7 and 3.6 respectively. Because of vending activities, there are relatively more children involved in the towns than in the rural SEAs.

Table 10 presents the magnitude of employment after adjusting for part-time and children workers. It converts the total unadjusted employment figure of Table 6 into a full-time equivalent number. In order to make the conversion an adjustment factor derived from the annual number of months of work and the number of part-time and children workers was used. Each full time equivalent worker is equated to 4 part-time or 2 children workers. Adjustment for seasonality employs the fraction of a year that the SSE activity was operated.

As a result of the adjustment, the overall employment figure now declines to 306,000 full-time equivalent workers a reduction of 18 percent. The highest percentage reduction is shown by rural townships (22.4 percent) followed by the rural SEAs (18.5 percent). Among the enterprises groups, the highest reduction occurs in the other services group (26.6 percent) followed by beverages (21.4), foods (22.6), and vending (17.7). The enterprise groups least affected by such adjustment are the other manufacturing group (0.2 percent) and repairs (5.7).

TABLE 10: MAGNITUDE OF THE SSE LABOUR FORCE ON FULL TIME EQUIVALENT BASIS

ENTERPRISE GROUPS	FULL TIME EQUIVALENT EMPLOYMENT (#)			
	SMALL TOWNS	RURAL TOWNSHIPS	RURAL SEAS	TOTAL
Garment	1,654	1,847	11,984	15,485
Forest based	1,136	1,664	76,717	79,517
Metals	314	266	9,109	9,689
Repairs	615	562	1,836	3,013
Foods	1,646	172	10,021	13,839
Beverages	2,522	4,810	100,326	107,658
Leather	141	170	970	1,281
Ceramics	191	76	6,396	1,281
Other Manufacturing	54	73	277	404
Mfg. <sup>1/</sup> Sub Total	8,273	9,640	217,636	237,549
Catering	791	761	2,994	4,496
Trade	3,279	3,380	7,966	14,625
Other Services	279	281	8,451	9,011
Services Sub Total	4,349	4,422	19,361	28,132
Vending	9,221	8,633	25,582	40,436
GRAND TOTAL	21,843	22,695	259,579	306,117

Source: Survey Data

<sup>1/</sup> Mfg. - Manufacturing

31

#### 4.5 Employment in Small Scale and Large Scale Industries Compared

Small scale rural industries provide almost five times more employment than comparable large scale ones, for while the latter employs only 59,000 the former has a labour force of as many as almost 290,000. Table 5 compares the number of large and small scale enterprises and the employment opportunities they provide. The size of the labour force in the small scale industrial (SSI) sector could be higher if large urban centers are included. This goes to underline the great potential for employment and income generation which SSEs have.

Whereas beverages account for only 6.5% of the employment among large scale industries they provide 48% of the total employment opportunities offered by the small scale enterprise sector. On the other hand large scale industries involved in food provide 28% of the employment in this sector as against 6% in the small scale sector. In fact food based industries provide the largest labour force in the large scale sector whereas it is fourth in the small scale sector, that is, after beverages, wood and furniture.

Forest-based industries employ more than 31% of the total labour force engaged in SSE; they provide only 10% in the large scale industries (Table 5). Forest based industries are concentrated in the rural areas and not the small towns and townships. In particular the heaviest concentrations are in the North-Western, Western and Eastern provinces.

Large scale manufacturing enterprises (LSIs) employ proportionately more people in electrical and chemical industries than small scale ones. Thus whereas chemical enterprises take 12 percent of the employment offered by LSIs, they provide only 0.01 percent employment in the SSE sector.

V. THE ROLE OF WOMEN IN THE ZAMBIAN SSE SECTOR

The role of women in enterprise ownership and employment participation in the Small Scale Enterprises (SSE) sector is of special interest. They enhance their economic independence through the creation of wealth and employment in SSE activities. They acquire business management skills through on-the-job training experience. Above all, they earn income for the support of their families and dependents.

Historically, certain economic activities in the formal sector are not readily accessible to women as they are to their male counterparts. This could be due to lack of skill, time, finance or just cultural habits excluding them from participation in such activities.

By contrast, skill and capital requirement in the informal sector may be minimal and the schedule of labour requirement may easily accommodate other family chores especially if the business can be operated from the home. All this is relative, of course, because the smallest capital requirement, for example, may be an effective barrier to entry even in the SSE sector. Also, there are certain activities even in the SSE that are not yet open to women either as proprietors or workers. By and large though, the SSE sector is increasingly providing more employment and ownership in business than the formal or large scale sector.

The role of Zambian women in SSE ownership and employment is shown in Table 11. Overall they account for 65 per cent of the ownership in SSE activities and 55 per cent of the employment. They are particularly dominant in beverages, ceramics, garments and vending in that order. Their

TABLE 11: THE MAGNITUDE OF FEMALE PARTICIPATION IN THE SMALL SCALE ENTERPRISE (SSE) SECTOR

ENTERPRISE GROUPINGS	FEMALES WITHIN EACH SSE GROUPING			
	IN OWNERSHIP		IN EMPLOYMENT	
	#	%	#	%
Garment	8,194	78.0	11,367	66.3
Forest based	7,554	14.1	13,567	14.8
Metals	303	3.6	325	3.0
Repairs	28	1.2	58	1.8
Foods	5,144	69.9	10,040	56.2
Beverages	89,091	99.1	125,447	89.2
Leather	2	0.1	3	0.2
Ceramics	4,737	95.5	5,877	82.9
Other Manufacturing	4	1.2	18	4.3
Mfg. <sup>1/</sup> Sub Total	115,057	62.6	166,697	57.4
Catering	250	15.7	1,223	24.7
Trade	2,495	30.8	4,323	26.0
Other Services	174	4.9	880	7.2
Services Sub Total	2,919	22.0	6,426	19.0
Vending	23,126	71.4	31,665	64.5
GRAND TOTAL	141,102	65.0	204,788	54.9

Source: Survey Data

<sup>1/</sup> Mfg. - Manufacturing

representation is very low in leather, repairs and metals. Even in basket/mat making which accounts for 60 per cent of the forest-based enterprises, they account only for 15 per cent of the ownership. Their involvement in catering as owners is also low but this is probably not due to lack of acumen for trading on their part as can be seen from their wide involvement in trading and vending. These differences may be due to some enterprise groups requiring more skills not yet found among females or due to some enterprises being traditional areas of male dominance.

Major enterprise types from which they are almost totally absent (less than 5 per cent) in ownership are logging, pitsawing, carpentry, wood carving, tinsmith, electronic repair, bicycle repair, brick making, shoe making, and construction. Major enterprise types of which they account for over 90 per cent of the ownership are knitting, beer brewing, and pottery. They also account for over three-fourths of the ownership in confectionery (sweets) and food vending.

Women tend to dominate in employment those enterprise groups that they dominate in ownership. However, the proportion of female employment is always less than that for ownership except in catering which may mean that enterprise groups are generally more open to female ownership than female employment.

At the enterprise type level, the following are prominent in female employment: beer brewing (90 per cent of all workers), pottery (90), knitting (80), food vending (70), confectionery or sweets production (67), bakery (46) and food

retail (34). Among the least female employers are car repair (4 per cent) and basket/mat making (17). In fact, female employment in beer brewing is so dominant that if it is excluded from Table 11, the proportion of female employment and ownership in the SSE sector falls respectively to 34 and 39 per cent (from 55 and 65 per cent respectively as given in the Table 5); and in the manufacturing subsector, their proportions fall to 28 and 29 per cent respectively.

The proportion of all SSE enterprises owned by women in the small towns and rural townships is identical: 75 per cent. By contrast, the proportion in the rural standard enumeration areas (SEAs) is only 60 per cent. This is primarily due to vending activities (with a high female ownership share of 71.4 per cent nationally) accounting for 40-50 per cent of all SSE activities in the towns.

Enterprises owned by females tend to be small. They account for 64 per cent of all enterprises with a labor force of up to 5 but only 44 per cent of those with 10 workers or more. They tend to have less part-time but more child workers compared with their male counterparts. And thus they have more of their family members involved in the enterprise - average size for family workers per enterprise was 0.5 for females compared with 0.4 for males. Although males tends to work a little longer in the year than females, the difference is less than 10 percent. Interestingly enough, not only is the SSE activity not the major source of income for two-thirds of the females (compared to one-half for males) but over 90 percent of them (87 for males) do not have another SSE activity as a secondary source of income. This effectively limits them to agricultural and employment incomes where their spouses may be working. In those cases where they do not have spouses, their income may necessarily be small indeed.

The 1980 population census showed that the proportion of female workers in the formal sector was only 7.6 per cent.<sup>1/</sup> Assuming this proportion still holds, it means that the SSE sector employs six times more full-time equivalent female workers (168,000 to 28,000) than the formal sector. In fact, since the formal sector figure makes no adjustment for part-time labor and since the present survey did not include enterprises in the major towns and rural Lusaka and the Copperbelt, the magnitude of the female employment should be much higher than indicated here - proportionally about 242,000 or eight and one half times that of the formal sector.

Compared with other countries where similar studies have been carried out, the proportion of Zambian small scale manufacturing (SSI) enterprises owned by females is on par with Honduras but higher than Bangladesh (3 per cent), Egypt (43) and Jamaica (49). And the proportion of female employment is much higher in Zambia with the closest to it being Honduras with 45 per cent. If beer brewing is excluded however, the proportions are again consistent with the other countries.<sup>2/</sup>

---

1/ CSO, Selected Socio-Economic Indicators. Lusaka, 1984.

2/ See Fisseha (1985) op.cit.

## VI SOME BASIC CHARACTERISTICS OF ZAMBIAN SMALL SCALE ENTERPRISES

### 6.0 Introduction

The success of providing technical or financial services to small scale enterprises may depend on the ability of these enterprises to meet certain rudimentary business requirements. This chapter will discuss a few of the basic characteristics shown in Table 12.

### 6.1 Enterprise Characteristics

The typical enterprise is small with an average total number of people engaged in the business of 1.67. The small size labour force among small scale enterprises is not unique to Zambia. Thus the average SSE employment size is 2.2 in Jamaica, 1.6 in both Honduras and Egypt and 1.9 in Sierra Leone. Out of the total Zambian SSE activities two thirds of them are one-person operations. It should be noted however that there are probably about 25,000 small scale industrial (SSI) or manufacturing enterprises nationally with employment of three or more and about 3,000 with five people or more. For technical intervention purposes these are adequate numbers of units of acceptable sizes if size is considered essential.

Hired workers account for only 11 percent of the labour force in the towns (i.e., both small towns and rural townships) and 5 percent in the rural enumeration areas. In absolute numbers this translates respectively into 6,000 and 16,000 workers for the target survey

TABLE 12: SOME BASIC CHARACTERISTICS OF THE SMALL SCALE ENTERPRISE (SSE) SECTOR

POPULATION STRATA	SMALL TOWNS	RURAL TOWN-SHIPS	RURAL SEAS	ALL STRATA
<u>Characteristics</u>				
a. <u>From regular Questionnaire</u>				
1. Average number of workers per enterprise	1.78	1.71	1.65	1.67
2. Hired workers as a percentage of total workers	12.9	9.4	4.8	5.4
3. Proportion of SSE activities providing major income (%)	59.6	54.5	31.9	35.4
4. Number of months worked in a year	11.4	11.2	10.6	10.7
5. Enterprises operating from the home (%)	21.6	25.6	52.2	48.2
6. Enterprises with permanent workshop (%)	33.7	34.0	20.8	22.6
7. Enterprises with powered machines (%)	1.7	1.2	0.5	0.6
b. <u>From Supplementary Inquiry (of 333 cases):</u>				
8. Age of enterprise (years)	7.4	8.6	10.3	8.6
9. Age of proprietor (years)	36.0	36.3	39.2	36.8
10. Proprietor started SSE activity from scratch (%)	85.7	88.5	78.3	85.7
11. Enterprises naming raw material as a problem (%)	58.6	56.3	37.3	53.2

Source: Survey Data

areas. For the nation as a whole the corresponding numbers could be 25,000 and 35,000 respectively or 60,000 together.<sup>1/</sup>

Whether an enterprise is the major source of household income or not may be a crucial factor that determines the level of attention the proprietor gives to it. Generally, SSE activities become more important in household income as one moves from the rural areas to the urban localities. Thus, they are the major source of income in 60 and 55 percent of the cases respectively in the small towns and rural townships but only 32 percent in the rural SEAs. Agricultural activities must be the major source of income for the latter. Nationally, a third of the enterprises are the major sources of family income.

It was indicated in Chapter 4 that the rate of the labour force participation in SSE activities depends not only on the number of hours per day or the number of days per week but on the number of months per year as well. Table 12 shows that the average number of months worked per year for all the SSE activities is about 11 months. There is not much difference between the towns and the rural SEAs. Thus, SSE activities are almost a year long affair for their operators.

An enterprise that is operated from a separate workshop structure or premises may be expected to be comparatively more developed than one operated right from

---

<sup>1/</sup> The estimation of these numbers assumes that the average employment sizes in the large urban areas and the rural localities of Lusaka and the Copperbelt (areas not covered in the survey) are the same respectively as that for the smaller towns and the rural SEAs.

the home. This could be a sign of commitment and larger volume of operation. Half of the SEA enterprises are operated from the home while this figure falls to a fifth in the small towns and a fourth in the rural townships. Similarly, workshop structure could also serve an indication of business permanency and development. The percentage of enterprises with permanent (e.g., cement, brick, metal or baked mud) workshop structure rises going from the rural SEAs to the towns.

The proportion of enterprises with powered machines is less than one per cent at the national level but close to two percent in the small towns. Thus, the vast majority of the enterprises use manual labour for their operations.

The town-rural difference of basic characteristics translate into large-small enterprise differences. Thus, the enterprise is a major source of income for 35 percent of the owners with a labour force upto 5 compared to 65 percent for those with employment greater than 10; about a fifth of the former have the enterprise located away from the home compared to more than one-half for the latter; about a fifth of the former have permanent workshops compared to a third for the latter; and less than 1 percent of the former use powered machines compared to 6 percent for the latter.

Table 12 also presents information obtained from field observations or informal inquiry of 333 SSE activities throughout the country. The data are not part of the main questionnaire. Rather, the enterprises were interviewed randomly (not in the statistical sense) for a few minutes whenever time was available to do so in

between the regular activities. Thus the information from this informal inquiry should be taken as an indication of general tendencies rather than accurate representation.

On average, SSE activities are about 9 years old (i.e. under present owner) with the age increasing from 7 years in the small towns to 10 years in the rural SEAs. One can thus say that there seems to be a certain degree of permanence among the enterprises and that proprietors do not operate them temporarily as a stepping stone for more desirable occupations. On the other hand, the average age of the proprietor is about 37 years with rural proprietors tending to be older. These figures indicate that generally proprietors start their SSE activities when they are in their late twenties. And the large majority of them start the SSE activities from scratch (i.e., they do not inherit or buy it or start it in partnership).

The final entry in Table 12 shows the proportion of proprietors who described problems related to raw materials as the most serious one. The problem seems to be more serious in the towns than in the rural enumeration areas. While it is wise not to be too specific with this kind of inquiry, the large majority of the respondents said that outright shortage of (directly or indirectly) imported raw materials was the nature of the problem. It may seem ironical that SSE enterprises which are supposed to be dependent on locally available raw materials should be handicapped due to shortage of imported raw materials. It should be remembered however that many SSE products may require small amounts of imported materials or materials made from imported ingredients. Thus, furniture requires, for example, nails, glue, varnish, sand-paper, screws and paints which may be imported or made from imported items.

And when there is a foreign exchange constraint as exists in Zambia today, SSE production is affected by shortage of these imported materials even though the quantity required may be a tiny fraction of the overall raw material requirements of the enterprise. The national SSE sector requirement of imported items is also generally a tiny fraction of the demand by the large scale enterprises.

Problems related to transportation was the second most frequently mentioned after raw materials. Very close to it is constraints related to tools, spare parts and machinery. The problems varied from total shortage to availability of poor quality.

With only 7 percent mentioning it, problems related to finance was fifth among eight major potential problems. Finally, about 15 percent of the proprietors said they have no problem.

## 6.2 Bird's Eye View of Vendors

Vendors are an important part of the small scale enterprise sector. With 32,000 activities and 49,000 workers, they account for 14 percent of the total SSE enterprises and 13 percent of the corresponding employment. The average size of employment per enterprise is a mere 7 percent smaller than found in the SSE manufacturing subsector. They account for about 40-50 percent of the town enterprises but only for 10 percent in rural enumeration areas. Their corresponding employment contribution is respectively 39 and 9 percent. More than a third of them employ two or more people and close to 1

.51

percent (224 enterprises) employ more than 5 people. Vendors are identical almost in all characteristics to their manufacturing and service SSE counterparts.

The environment within which they function may be different. By way of providing examples of their activities, the cases of five vendors are presented below along with estimates of their financial returns. All of them were interviewed in a centralized market place where the large majority of vendors are found throughout the country.

- (a) Vegetable Vendor (Mporokoso): She buys about a dozen heads of lettuce at K0.20 each and sells them at K0.40 each.<sup>1/</sup> She has no other explicit expense.

Revenue: 12 x K0.40	K 4.80
Costs: 12 x K0.20	<u>K 2.40</u>
Net Revenue per day:	K 2.40
Net revenue per 5-day week: 5 x K2.40 =	<u>K12.00</u>

- (b) Boiled egg vendor (Mbala): This is a partnership of 3 people who buy eggs from Lusaka (1,000 Kms away) and sell them as boiled eggs in the market. Two of them make a trip to Lusaka once every two weeks and buy 75 crates of 30 eggs each. Each crate costs K6.90 and each boiled egg is sold at K0.40.

Revenue: 75 crates x 30 eggs x K0.40 =	K900.00
Costs: Purchase of eggs: 75 x K6.90 =	K517.50
Transportation to Lusaka: 2 x K51.90	K103.80
Charcoal to boil eggs	K 4.00
Other expenses	<u>K 20.00</u>
Total expenses	K645.30

---

<sup>1/</sup> As of mid September 1985 K1 = US\$0.44

Net Revenue:  $K900 - K645.30 = K254.70$

Net Revenue/partner:  $K254.70/3 = K84.90$

Net Revenue per person per week:  $K84.90/2 = \underline{K42.45}$

- (c) Chikanda Plant (root) Vendor (Mansa): She spends two days to collect the produce from farmers and 4 days to sell it. She has no other explicit costs. She buys 5 tins of the plant at K6.00 each and sells them at about K15 each.

Revenue: 5 x K15.00	K75.00
Cost: 5 x K6.00	<u>K30.00</u>
Net Revenue per week	<u>K45.00</u>

- (d) Chikanda Cake Vendor (Mansa): She buys the chikanda root usually from a vendor and prepares chikanda "meal" cake which looks like uncooked sausages or 'polony'. She sells four cakes a week and each cake takes a day and a half to prepare and sell.

Revenue per day: (one cake) = K12.00	
Costs: Chikanda roots	K3.00
Groundnuts	K2.00
Spices	K0.50
Council 'tax'	K0.30
other expenses.	<u>K0.50</u>
Total expense	K6.30

Net revenue per day  $K12.00 - K6.30 = K5.70$

Net revenue per week  $K5.70 \times 4 = \underline{K22.80}$

- (e) Dry Fish Vendor (Mansa): Two people are involved in the work. The fish is bought fresh from Lake Mweru and sold dry. They operate from a market not

recognized by the town council and hence pay no council tax. Each week one of them goes with K300.00 to buy fresh fish at K1.30 for five (a total of 1154 fish). After they are dried, they are sold at K2.00 for four.

Revenue: 1154/4 x 2	K577.00
Costs: for 1154 (K300/K1.30x5) fish	K300.00
Transportation costs	K 43.00
Food and Lodging on trip	K 15.00
Other expenses	<u>K 15.00</u>
	K373.00

Net revenue for 2 weeks  $K577 - K373 = K204$

Net revenue per week per person  $K204/2/2 = \underline{K51.00}$

With the exception of probably the vegetable vendor, the incomes of the other vendors are relatively respectable.

## VII SUMMARY AND RECOMMENDATIONS

### 7.0 Introduction

Lack of information on the small scale enterprises (SSE) sector has been a critical problem in Zambia as the country attempts to address the possibility of raising incomes and employment in the sector. The objective of the present SSE survey was geared to redress this paucity of information so that effective and enlightened policy options and programs can be instituted for the sector.

The specific objective of the survey included information on the magnitude, composition, characteristics and geographical dispersion of SSE activities and the employment. The survey covered all private non-farm enterprises with a total labour force of up to 50 people (including one-person operations) but does not include those without a fixed location of operations or those branches of parastatals and national corporations.

The survey covered all provinces except Lusaka and the Copperbelt, two major urban areas, Kabwe and Livingstone were also excluded from the survey as the focus was on rural and small urban localities. A random sample of localities consisting of 6 small towns (population between 12,000 and 50,000), 24 rural townships (population below 12,000) and 37 rural standard enumeration areas (SEAs) covered in the survey. During the survey 51,000 households were contacted and 33 percent of them were found to have SSE activities resulting in the enumeration of close to 17,000 enterprises employing

29,000 people. These were then 'blown up' or extrapolated to estimate the total numbers in the areas represented by the sample.

### 7.1 The Magnitude of the Small Scale Enterprise Sector in Zambia

The results of the survey indicate that there are close to 224,000 manufacturing, service and vending enterprises in those areas represented by the survey. About 86 percent of these enterprises are found in the rural SEAs. And close to 80 percent are in manufacturing where manufacturing is broadly interpreted to include the repair of manufactured goods. The remaining are divided between services, 6 percent, and "petty" vending.

If proportional estimates of those urban and rural localities not represented by the sample are made, it is calculated that there are roughly about 350,000 SSE activities throughout the country.

At the industrial or enterprise group level, traditional beer brewing enterprises dominate accounting for about 40 percent of the SSE sector. They are followed by forest-based enterprises (with 24 percent) and vending activities (14 percent). Metals are a distant fourth accounting for about 4 percent.

Compared with the large scale (actually registered) 540 manufacturing (LSI) enterprises, the small scale manufacturing (SSI) sector with 178,000 enterprises dominates the scene. In every industrial subsector or enterprise group, the SSI far outstrips the LSI in the number of enterprises except in chemicals and transport equipment.

The large majority of the SSE enterprises are very small. Two-thirds of them are one-person operations and 98 percent employ less than 6 people. On average the size of the number of people working in a SSE activity is only 1.67. Services have comparatively larger labour force (2.56) than manufacturing (1.63) which in turn exceeds that for vending (1.52). The labour force is also slightly bigger in the towns (1.74) than in the rural enumeration areas (1.65).

With an average of 11 months of operation per year, the people working in these enterprises are engaged practically the whole year round. About a third of the enterprises are the main source of household income for their owners. This percentage falls from a high of 60 in the smaller towns to 32 in the rural enumeration areas. In the latter localities, agriculture is presumably the main source of income.

Close to half of the enterprises are operated from the home (not separate premises) and only a fifth have a permanent workshop structure. However, the proportion of enterprises that operate from the home rises from one fifth in the small towns to one half in the rural SEAs; by contrast, the permanent workshop figure falls from a third in the small towns to a fifth in the rural SEAs.

Being labour intensive by definition, SSE activities have very little machinery. The average number of powered machines per enterprise is only 0.6. However, the small towns have close to 2 (1.7) compared to 0.5 for the rural SEAs.

The typical SSE activity is about 9 years old with rural tending to be older (10 years) compared to those from the small towns (7 years).

## 7.2 Magnitude and Characteristics of Employment in Zambian Small Scale Enterprises

The greatest contribution of Zambian Small Scale Enterprises is in the employment sector. The estimated 224,000 enterprises found in the localities represented by the survey provide a corresponding employment of 373,000 people. If adjustment is made for part-time and children workers, the employment figure declines to 306,000 people - a very significant number by any standards. In fact, if the estimates are extrapolated for the whole nation, the SSE employment rate may be close to 575,000 people or about 472,000 full-time equivalent.

Close to 8 percent of the total employment is found in the rural enumeration areas (SEAs), that is, outside the small towns and rural townships. The employment in the rural areas is dominated however by beverages (traditional beer brewing) to the extent that they provide more than 40 percent of the employment there. Nationally, beverages provides for 38 percent of the total employment. In national employment magnitudes, beverages are followed by forest-based activities (24 percent) and 'petty' or informal sector vending (13). Thus, these three activities provide more than three-fourths of the total employment. Other activities of substantial employment are foods (5 percent), garments (5), trade (4) and metals (3). Like beverages in the rural SEAs, vending account for 40 percent of the employment in the towns. They are followed by beverages (16 percent), retailing or trade (13) and foods (9).

More than 60 percent of the labor force is accounted for by the proprietors (owner/operators) and another fifth by their family members. Hired workers and apprentices each account for 5 percent of the employment. The relative picture of the composition of the labour force does not change between manufacturing, services and vending. There are some industrial or enterprise groups, however, that show marked departure from this pattern. Thus, catering hires close to half of its labour force and so does the 'other services' group consisting of construction, dry cleaning and hair dressing. By contrast, hired employment for foods and beverages is small (less than 6 percent), while family members contribute more than a third in each. The share of apprentices is low except in garments, foods, repairs and 'other services' where they account for about 13 percent of the employment.

On average the SSE activities operate for 11 months in the year. There is not much difference between population strata nor between industrial groups. Part-time and child labour each contribute less than 10 percent of all the SSE labour force. Only in foods and 'other services' does part-time work appear to be significant accounting respectively for 20 and 17 percent of the respective labour force. To arrive at full time equivalent employment, labour contributions by part-time or children workers were proportionally adjusted.

At the national level, unadjusted total employment should be discounted by 18 percent on average to arrive at full-time equivalent employment. The discount factors are about the same (18 per cent) for the three subsectors:

manufacturing, services and vending employment. Similarly, the discount factor for the towns and rural SEAs is identical, 18.5. Among industrial or enterprise groups, the highest discount factors are in 'other' services, mainly construction (27 percent), and beverages and foods (each 23 percent).

The role of women in Zambian SSE activities is very prominent. Thus, they account for 65 percent of the SSE activity ownership and 55 percent of the total employment. They own majority enterprises in beverages (99 percent of them), ceramics (96), garment (78), vending (71) and foods (70). Their ownership share is very low in repairs (1 percent) and metals (4).

In employment, women account for the majority of the labour force in beverages (89 percent of the total), ceramics (83), garment (66), vending (64) and foods (56). Generally, they contribute less to employment than they do to ownership.

If beverages are excluded, then at the national level females account for close to 40 percent of the ownership and a third of the employment. If the manufacturing subsector alone is examined after excluding beverages, then women contribute about 30 percent both in ownership and in employment. This is in line with similar studies done in other countries. Thus, women constitute an integral part of the small scale enterprise sector of Zambia.

### 7.3 Recommendations

The objective of the present survey was to identify the magnitudes and basic characteristics of the small scale enterprises sector in Zambia. As such no structured exhaustive analysis of any one of the many policy, administrative, or economic environments that directly impinge on the sector were covered in the survey. However, sustained interaction with the proprietors and first hand experience of some of their problems during the survey lead to two basic sets of recommendations. The first set aims to capitalize on the present acquired information by progressively expanding and enriching it through limited but carefully designed pieces of investigation on some pertinent and urgent issues. Such issues should be chosen so that improved knowledge about them will facilitate the formulation of consistent and realistic long-term plans and the implementation of effective short-term programs. Some of the important areas for further investigation indicated below:

#### 1. Evaluation of Service Agencies

An inventory and assessment of agencies and institutions mandated to serve the SSE sector in Zambia would be a vital piece of information before embarking to aid the sector. Such study should include the scope of their mandate, their capability to deliver services and their constraints and needs. Where possible, areas of coordination, and pooling resources should be identified to minimize duplication of efforts. Examples of candidates for such study are the Small Industries Development Organization (SIDO), the Village Industries

Services, Small Scale Enterprise Promotion (SEP), the Small Scale Enterprises Association (SSEA) and independent small scale primary cooperative societies. They should be evaluated with the view of promoting and strengthening them where needed by providing them with facilities and expertise and where necessary changing their legal status.

## 2. Representative Organization for Small Scale Producers

If the SSEA is not philosophically geared towards that end, means must be investigated to facilitate the promotion of a private voluntary membership organization where the interest of the small scale enterprises could be safeguarded and their needs clearly articulated by themselves. On the other hand, all that is required may be to strengthen the SSEA.

## 3. Analysis of Current Problems

Lack of imported raw materials and crucial tools and spare parts have been mentioned as the major problems throughout the country. In as much as such problems could sometimes be proxies for other fundamental constraints, well focused further study is warranted. Such study should be accompanied by looking to what extent widely-spread national distribution channels, such as the National Import-Export Company (NIEC), could be used to stock and retail such scarce inputs.

## 4. The Apprenticeship System

The apprenticeship system which could be a cheap source of on-the-job training seems weak in Zambia. A

fuller understanding of the problems and mechanics of the system could be very useful to promote it more in selected industries.

5. Policy Bias

Governments and planners usually have a policy bias against the small scale enterprises in such areas as licensing and provision of other services. The possibility of SSE activities in Zambia being discriminated against or ignored is an area worth careful and close investigation. Some of the biases come to light after a careful analysis of the results and implications to the small scale enterprise sector of policies designed to promote and protect their large scale counterparts.

6. Small Scale Proprietors' Primary Cooperative Societies

An examination of small scale enterprises organized along primary cooperative societies could be useful. Are they viable? What are the advantages and disadvantages of such societies for their members or outsiders? They could, for example, disproportionately preempt essential and limited services to the detriment of non-members.

7. Sectoral Linkages

And finally the SSE sector must survive and thrive in the mutual interaction both with the agricultural and large scale enterprise sectors. Identifying the useful linkages (e.g., sub-contracting) and finding ways of removing obstacles to such linkages is never done too soon.

The second set of recommendations constitute a series of concrete potential programs and projects implementable without necessarily waiting for the outcome of further commissioned studies. There already exists, although this is relative, adequate information on what needs to be done.

The SSE sector in Zambia is a huge one and resources are limited. Therefore, intervention projects must be tailored to manageable scope by limiting contact groups of an intended target population for a lasting impact and substantial spin off benefits. There is hardly any one intervention measure that will equally work with rural and urban or small and large members within a given industry let alone between industries. What industries to choose and at what level of intervention should be determined by the nature of the problem, the intended objectives, the available resources and their consistency with national policies.

Below are suggested some areas of intervention. Some of them require substantial resources and are of a longer term nature. They are not listed below in the order of their importance.

1. Awareness Workshop

Holding a workshop on the small scale enterprises sector so as to make planners, local government officials, donor agencies and other relevant bodies aware of the contributions and importance of the sector. If people in important positions are aware of the role the sector plays, then this is a big achievement in so far as ignorance may be the biggest bias against the sector.

## 2. Market Promotion

Where means and circumstances allow the ultimate goal should be to hold the awareness workshops at least at the provincial level involving local administrative, industry and commerce officers, bankers and even representatives of small scale producers and consumers. One of the by-products of the workshop should be to encourage local public and private institutions to do their purchasing from local producers, e.g., from local furniture producers. This could amount to a substantial volume of business since there are not that many furniture producers in any given locality. Such an approach could save resources by avoiding transportation costs that need to be met when such things are bought from Lusaka as they usually are. However, producers must improve their products and institutional buyers must use simplified purchasing requirements.

## 3. Skill Upgrading

There is no use in asking local consumers to buy from local producers if the design, utility and quality of the product is not up to acceptable standards. Right now, producers cannot improve the quality because they do not either have the training or the resources to buy better tools and materials. Hence to break the cycle, one approach should be to provide a series of brief expert training for selected producers at selected places (e.g., furniture producers in Solwezi or metal producers in Choma) on product design, quality control and material conservation. The workshop mentioned above could then be held at the closing of such a training program. The

approach will be frustrated, however, if the basic shortage problems of imported raw materials (minute as they may be), tools and spare parts are not rectified.

#### 4. Zambian Vendors

The question of what to do with vendors is an important one. They may be ignored, discouraged or even harassed by officials. One thing is clear however. These people are forced by difficult economic circumstances to earn a livelihood for themselves and their dependents through sheer will of survival. Their methods may not be acceptable to official standard rules and regulations of business norms. And in many cases there is poor and unhygienic produce handling. Rather than attempt to forestall the survival and entrepreneurial initiative of vendors, however, officials should work to improve the vending environment through a number of steps:

- (a) Food products displayed for sale are usually exposed directly to the sun and in many cases to dust and dirt. To minimize health hazards and maintain product quality, shaded stalls perhaps of simple prefab materials should be provided in convenient places accessible to consumers and sanitation workers. The least that should be done is to construct simple raised stalls or stands to minimize exposure to direct dust and dirt.
- (b) To provide funds to women organizations and other social workers to hold educational sessions on hygienic handling of food products by vendors and their responsibility to consumers. In as much as 75 percent of vending activities deal with foods, cooked

or otherwise, limited home economics type lessons of preparing simple and nutritive foods could also be tried.

Both of these approaches will cost money and may attract even more vendors. But many migrant and poor urban dwellers not only use vending as a source of income but also more successful ones as a springboard for a bigger and more thriving business even into the formal sector. Some of the money could be collected from the vendors in the form of council "tax" as some towns are doing collecting between K200 and K300 per day.

Finally, no mention has been made of the difficult and grandiose schemes such as the provision of credit, industrial estates or industrial extension services. They could work under the unlikely combination of clearly defined goals and procedures, efficient administration, committed and capable staff and a well-funded set-up. For many developing countries, such is the exception than the rule and such schemes end up being a constant drainage on the national budget with a handful of producers benefiting through hidden and unintentional perpetual subsidies. Where possible, the private sector should be encouraged and helped to be involved in such services otherwise after a careful study an attempt should first be made on a specific and limited scale in conjunction with already existing facilities.



68

APPENDIX B: Localities Surveyed

A. Small Towns

- |           |            |
|-----------|------------|
| 1. Choma  | 4. Mongu   |
| 2. Kasama | 5. Mansa   |
| 3. Monze  | 6. Solwezi |

B. Rural Townships

- |                    |               |
|--------------------|---------------|
| 1. Isoka           | 13. Kabompo   |
| 2. Chinsali        | 14. Mbala     |
| 3. Chizera         | 15. Batoka    |
| 4. Nega Nega       | 16. Sesheke   |
| 5. Limulunga       | 17. Katete    |
| 6. Kacholola       | 18. Mporokoso |
| 7. Mulobezi        | 19. Lundazi   |
| 8. Maamba          | 20. Kalabo    |
| 9. Luwingu         | 21. Samfya    |
| 10. Kansanshi Mine | 22. Zambezi   |
| 11. Chadiza        | 23. Kalomo    |
| 12. Kasempa        | 24. Mbabala   |

C. Rural Standard Enumeration Areas (SEAs) CSO Identification Numbers

- |                         |                         |
|-------------------------|-------------------------|
| 1. #002/04 (Serenje)    | 16. #030/01 (Chinsali)  |
| 2. #018/03 (Serenje)    | 17. #013/05 (Isoka)     |
| 3. #039/02 (Kabwe R.)   | 18. #030/04-5 (Kasama)  |
| 4. #035/03 (Samfya)     | 19. #023/05 (Mbala)     |
| 5. #009/1-4 (Chama)     | 20. #016/03 (Mporokoso) |
| 6. #083/2-3 (Petauke)   | 21. #043/05 (Choma)     |
| 7. #060/02 (Lundazi)    | 22. #010/3-4 (Kalomo)   |
| 8. #035/0-2 (Mongu)     | 23. #009/01-2 (Monze)   |
| 9. #018/1-2 (Samfya)    | 24. #010/03 (Monze)     |
| 10. #011/05 (Nchelenge) | 25. #015/01 (Namwala)   |
| 11. #016/05-6 (Mwense)  | 26. #005/02 (Kaoma)     |
| 12. #007/03 (Luwingu)   | 27. #025/01 (Kaoma)     |
| 13. #005/02 (Chinsali)  | 28. #012/01 (Kalabo)    |
| 14. #018/02 (Chinsali)  |                         |
| 15. #021/02 (Chinsali)  |                         |

69

APPENDIX C: ENTERPRISE GROUPINGS

- |   |  |   |
|---|--|---|
| <p>1. <u>Garments</u></p> <p>Tailoring<br/>Dressmaking<br/>Knitting<br/>Crotcheting<br/>Other Garment</p>   | <p>5. <u>Foods</u></p> <p>Bakery<br/>Meat processing<br/>Milk processing<br/>Condiments<br/>Grain mill<br/>Confectionery<br/>Other foods</p> | <p>11. <u>Trade</u></p> <p>Wholesale<br/>Grocery<br/>Hardware<br/>Forest-Produ<br/>Garments<br/>Other</p>     |
| <p>2. <u>Forest-Based</u></p> <p>Logging<br/>Motor sawmilling<br/>Pitsawing<br/>Carpentry<br/>Furniture<br/>Upholstery<br/>Carving<br/>Basket/mat making<br/>Charcoal<br/>Bamboo-cane<br/>Twine/rope<br/>Other forest-based</p> | <p>6. <u>Beverages</u></p> <p>Traditional beer brewing<br/>Tea</p>   | <p>12. <u>Other Service</u></p> <p>Dry cleaning<br/>Hair dressin<br/>Construction<br/>Plumbing<br/>Others</p> |
| <p>3. <u>Metals</u></p> <p>Coppersmith<br/>Tinsmith<br/>Blacksmith<br/>Welding<br/>Other metals</p>   | <p>7. <u>Leather</u></p> <p>Shoemaking<br/>Leather<br/>Other</p>   | <p>13. <u>Vending</u></p>   |
| <p>4. <u>Repairs</u></p> <p>Auto<br/>Tyre<br/>Bicycle<br/>Electronic<br/>JewelleryWatch<br/>Other repairs</p>   | <p>8. <u>Ceramics</u></p> <p>Pottery<br/>Bricks<br/>Blocks<br/>Stone Carving<br/>Other</p>   |   |
|   | <p>9. <u>Other Manufacturing</u></p> <p>Chemicals<br/>Photo studio<br/>Printing<br/>Other</p>  |   |
|   | <p>10. <u>Catering</u></p> <p>Restaurants<br/>Bars/Taverns<br/>Hotels</p>  |   |

BIBLIOGRAPHY

- Badr, Mahmoud, Nadia El Sheikh, James Seale, Stephen Davies, Abdel Azim Mostafa and Abdel Rahman Saidi. 1982. "Small Scale Enterprises in Egypt: Fayoum and Lalyabiya Governorates Phase I Survey Results." Michigan State University Rural Development Series Working Paper No. 23. East Lansing: Michigan State University, Department of Agricultural Economics.
- Bardoville, R. 1981. "Women's Economic Participation in the Urban Informal Sector:" Institute for African Studies, University of Zambia. Lusaka.
- Central Statistics Office. 1984. Country Profile: Zambia. Central Statistics Office, Lusaka
- Central Statistics Office. 1984. Selected Socio-Economic Indicators. Central Statistics Office, National Commission for Development Planning, Lusaka.
- Central Statistics Office. 1983. Census of Industrial Production, 1980. Central Statistics Office, Lusaka
- Central Statistics Office. 1983. Report on Employment and Earnings: 1980. Central Statistics Office, Lusaka
- Central Statistics Office. 1981 Preliminary Report: 1980 Census of Population and Housing. Central Statistics Office, Lusaka
- Chuta, E. and Carl Liedholm. 1979. "Rural Non-Farm Employment: A Review of the Status of the State of the Art." Michigan State University Rural Development Paper No. 4. East Lansing, Michigan State University, Department of Agriculture Economics.
- Christie, Malcolm. 1974. "The Informal Sector: Its Role in Economic Development." Unpublished memo, Lusaka
- Davies, Omar Yacob Fisseha and Claremont Kirton. 1979. "Small Scale, Non-Farm Enterprises in Jamaica: Initial Survey Results." Michigan State University Rural Development Series, Working Paper No. 8. East Lansing, Michigan State University, Department of Agricultural Economics.
- Fisseha, Yacob. 1985. The Contribution of Small-Scale Forest Based Processing Enterprises to Rural Non-Farm Employment and Income in Selected Developing Countries. Rome, FAO.

11

Fisseha, Yacob and Omar Davies. 1981. "The Small-Scale Manufacturing Enterprises in Jamaica: Socio-Economic Characteristics and Constraints.: Michigan State University Rural Development Series, Working Paper No. 16. East Lansing, Michigan State University, Department of Agricultural Economics.

Government of Zambia. 1981. "The Small Industries Development Act, 1981. No. 18". Lusaka

Haggblade, S., Jacques Dey and Bob Pitman. 1979. "Small Manufacturing and Repair Enterprises in Haiti: Survey Results." Michigan State University Rural Development Series Working Paper No. 4. East Lansing Michigan State University Department of Agricultural Economics.

Hans C. Haan. 1982. "Some Characteristics of Informal Sector Businessmen in Lusaka and Kitwe, Zambia." ILO World Employment Programme. Lusaka.

Liedholm, Carl and E. Chuta. 1976. "The Economics of Rural and Urban Small Scale Industries in Sierra Leone." African Rural Economy Paper, No. 14. Michigan State University.

Liedholm, Carl. 1973. "Research on Employment in the Rural Non-farm Sector in Africa." African Rural Employment Paper No. 5. Michigan State University.

Mead, Donald and Pradit Charsombut. 1980. "Rural Off-Farm Employment in Thailand: Phase I Survey Results." Rural Off-farm Employment Assessment Project, Centre for Applied Economics Research Kasetsart University, Bangkok, Thailand.

Trodd, David. 1980. "Small Scale Manufacturing in Lusaka." Institute of African Studies, University of Zambia. Lusaka

Todd, David. 1980. "Education, Employment and the Informal Sector in Zambia. Institute of African Studies, University of Zambia, Lusaka.