



**TOGETHER**  
*for a sustainable future*

## OCCASION

This publication has been made available to the public on the occasion of the 50<sup>th</sup> anniversary of the United Nations Industrial Development Organisation.



**TOGETHER**  
*for a sustainable future*

## DISCLAIMER

This document has been produced without formal United Nations editing. The designations employed and the presentation of the material in this document do not imply the expression of any opinion whatsoever on the part of the Secretariat of the United Nations Industrial Development Organization (UNIDO) concerning the legal status of any country, territory, city or area or of its authorities, or concerning the delimitation of its frontiers or boundaries, or its economic system or degree of development. Designations such as “developed”, “industrialized” and “developing” are intended for statistical convenience and do not necessarily express a judgment about the stage reached by a particular country or area in the development process. Mention of firm names or commercial products does not constitute an endorsement by UNIDO.

## FAIR USE POLICY

Any part of this publication may be quoted and referenced for educational and research purposes without additional permission from UNIDO. However, those who make use of quoting and referencing this publication are requested to follow the Fair Use Policy of giving due credit to UNIDO.

## CONTACT

Please contact [publications@unido.org](mailto:publications@unido.org) for further information concerning UNIDO publications.

For more information about UNIDO, please visit us at [www.unido.org](http://www.unido.org)

RESTRICTED

19397

DP/ID/SER.A/1542  
24 January 1992  
ORIGINAL: ENGLISH

BUSINESS ADVISORY SERVICE FOR WOMEN PROJECT

DP/MLW/88/027

MALAWI

Technical report: Report on survey  
on Malawian businesswomen\*

Prepared for the Government of the Republic of Malawi  
by the United Nations Industrial Development Organization,  
acting as executing agency for the United Nations Development Programme

Based on the work of  
The Development of Malawian Traders Trust (DEMATT)  
UNIDO Contract No. 90/122, Purchase Order No. 15-0-2192H

Backstopping officer: V. Gregor  
Institutional Infrastructure Branch

United Nations Industrial Development Organization  
Vienna

---

\* This document has not been edited.

**TABLE OF CONTENTS**

---

	<b>Page No.</b>
<b>A. Objectives</b>	<b>1</b>
<b>B. Information from Other Surveys</b>	<b>2</b>
<b>C. The Benchmark Data Base</b>	<b>2</b>
<b>D. Survey Design and Execution</b>	<b>4</b>
<b>1. Questionnaire design</b>	<b>4</b>
<b>2. Pilot Survey</b>	<b>4</b>
<b>3. Survey Team</b>	<b>4</b>
<b>4. Training of Enumerators</b>	<b>5</b>
<b>5. Sample Selection</b>	<b>5</b>
<b>6. Survey Execution</b>	<b>8</b>
<b>7. Problems Encountered</b>	<b>9</b>
<b>E. Data processing and Analysis</b>	<b>10</b>
<b>1. Data Processing</b>	<b>10</b>
<b>2. Data Analysis</b>	<b>11</b>
<b>F. Cost of the Survey</b>	<b>13</b>
<b>RESULTS</b>	<b>14</b>

## THE DEMATT/BASW SURVEY ON MALAWIAN BUSINESSWOMEN

### A. Objectives

In designing a strategy to develop female entrepreneurs in Malawi, the lack of information on women already engaged in business and on the conditions under which they operate was perceived as a severe handicap. It was therefore decided to conduct a survey with the following objectives:

- To identify the characteristics of Malawian business-women.
- To provide a description of their businesses as regards employees, turnover, income, loans, development, etc.
- To find out and explain the differences between urban and rural businesses, between businesses of different size, between businesses from different sectors, and between businesses in different regions.
- To identify the factors which influence the performance of female owned businesses
- To recommend future areas of intervention with emphasis on the support which could be provided by the BUSINESS ADVISORY SERVICES FOR WOMEN in DEMATT.

The information was to go in a data base on women entrepreneurs in Malawi to be utilized for future analysis of various aspects and programmatic considerations in the course of the BASW project.

Areas of interest were evidently the following: the scale of operations of businesses run by women, the number of people they employ, the amount invested in their businesses, the sources of investment and the importance of loans from lending institutions and banks, the problems in starting a business, and the development of the business in the past. Areas of interest also include whether they produce at full capacity or below, whether they operate the business all year round or seasonal and how much time they spend in it. With focus on entrepreneurship development, we were also interested in personal characteristics and the social background of the women in business, the educational level achieved and previous employment and business experience. Targeting women, we wanted to find out the role of her husband in the business and whether income from the business is the main source of family income or not.

## B. Information from Other Surveys

Two other surveys had been conducted on small-scale enterprises in the 1980s: one by Chancellor College in 1984 (see Ettema, 1984) and another by the READI project in 1986 (see READI, 1989). Both surveys conducted about 1,800 interviews each and were therefore much bigger than the DEMATT/BASW survey.

The objective of the 1984 survey was to find out the types and the scale of small-scale manufacturing activity in Malawi, which excluded Trade and Services other than Repair Services. The size of the business was limited to assets worth less than K 25,000. Five districts were selected and it was attempted to cover them as completely as possible. Women constituted 12% of the sample but the data were not analyzed for sex specific differences.

The READI survey covered the whole country, but did not attempt to apply the random principle. It excluded crop and livestock production and had a strong bias towards Trade, which constituted 42 % of the sample (see READI, 1989, p. 7). Female entrepreneurs accounted for a mere 7% of the sample. A greater proportion of businesswomen in the sample had achieved higher levels of education than men, but the report finds no significant differences between male and female entrepreneurs in most areas investigated, such as employment, turnover, initial investment, commitment towards the business in terms of time allocated to it, the training received and the age-distribution of entrepreneurs.

Contrary to the results of the READI survey, data obtained from lending institutions (see ANNEX 1) clearly suggest that women-owned businesses are significantly smaller in terms of investment and employment created than male-owned businesses.

Regarding the issue of women entrepreneurs in Malawi, neither survey provided sufficient information for programmatic purposes of the BASW project.

## C. The Benchmark Data Base

As the first step towards implementing a survey, it was decided to collect basic information on business women, e.g. their name, address, and type of business. The aim was to compile a list as complete as possible which could then serve as the sampling frame.

This Data collection was started in February 1990. Sources tapped for that information were DEMATT's Business Promotion Consultants in the field, SEDOM, INDEFUND, ABA, MUSCCO and the City Council. An attempt to start from the Registrar General where all businesses are supposed to register was dropped after it was estimated that the work involved would need five people for a full week to go through all the files which are sorted by business name only.

In addition, as the Registrar General's Office is not necessarily informed when a business closes down, we would have possibly included a large number of inactive businesses.

The effort resulted in a data base with more than 1100 names.

The data were classified by region, comprising

- Central Region
- Northern Region
- Southern Region

and by type of business, comprising:

1. Agro-Industry (or -Business), with poultry being the most prominent
2. Food and Beverages, which includes among others cakes and samooza producers who sell next to the road and on markets, beer brewers, freezets makers and a lady who produces wine.
3. Service Businesses like restaurants, resthouses, saloons and maizemills
4. Textiles which includes tailoring and knitting businesses as well as handicrafts such as mat making.
5. Trade which is mostly small groceries, but also wholesale and any other kind of trade.
6. Other includes all businesses which fit in neither one of the above. Here we find many women in stone quarrying and brick making.

The sectoral and regional classification resulted in the following distribution:

Table 3 : Distribution of the Benchmark Data Base by Region and Sector

SECTOR	REGION			TOTAL
	CENTER	NORTH	SOUTH	
Agro-Business	2.84	1.60	3.28	7.80
Food & Beverages	5.23	1.86	6.21	13.30
Service	4.17	3.23	9.31	16.84
Textile	8.78	3.63	21.63	34.04
Trade	4.17	2.66	9.57	16.40
Other	5.23	1.24	5.14	11.61
ALL	30.41	14.27	55.14	100.00

Table 3 shows a concentration of female entrepreneurs in the Southern Region, which is the country's commercial and industrial center.

More than one third of all business-women are in Textiles, which is dominated by tailoring but also includes knitting and handicrafts. Roughly another third is in Trade and Services. Most businesses in Trade are groceries, retailers and bottle stores. Restaurants and maize mills account for the bulk of Service businesses. Most of the 13 % of the women in the sector "Food & Beverages" are in bakeries and confectionery products, while most Agro-Businesses are poultry-farms. The highest number of women of the 131 (12%) in the "Other" sector is found in quarrying (37), followed by structural clay products (23). Outside textiles and food processing, which are both usually at a very small scale, we find that there are only few women engaged in genuine manufacturing activities, such as production of soap (6), mbaulas (stoves) (3), bricks (10), cement roofing tiles (1) and furniture (3).

#### D. Survey Design and Execution

##### 1. Questionnaire design

Two questionnaires were developed: one for supervisors and one for enumerators. The questionnaires are enclosed in Annex 3. They were set up by BASW in collaboration with Computer Laboratories of Chancellor College, Zomba, and translated into Chichewa and Tumbuka.

Whenever appropriate, formulations of the READI questionnaire were used.

##### 2. Pilot Survey

Test interviews with the pilot questionnaire were conducted on 24 th and 25th July 1990 with 8 business women in Zomba in English, Chichewa and Tumbuka. Out of each of the six sectors at least one woman was interviewed. After these tests and a few changes the questionnaire was finalized and printed.

##### 3. Survey Team

The survey team consisted of six female enumerators and two female supervisors.

Three of the enumerators were students at Chancellor College, Zomba, and three students at Polytechnic, Blantyre. Five of them were 3rd year students, one was a first year student. They were selected from a number of applicants. Selection criteria used were their academic performance, skills in local languages and communication capabilities.

One of the supervisors was a seconded DEMATT BPC (Business Promotion Consultant) on study leave. The other supervisor was a graduate from Chancellor College with survey experience.

#### **4. Training of Enumerators**

A one-week in-house training for enumerators and supervisors was held in Chancellor College from 30th July to 3rd August. The main contents of the training were

- to explain purpose and objectives of the survey to enumerators and supervisors
- to familiarize the team with the questionnaire in all three languages.
- to teach interviewing techniques
- to explain organizational matters, such as reporting procedures, map reading, channels for payments.

Mock interviews with actual businesswomen were held in class. Enumerators and supervisors had to fill out questionnaires which were marked by the instructor.

#### **5. Sample selection**

As interviews with all women in the benchmark data base would have been too costly it was decided to conduct a sample survey of a size of 225.

It was decided to take a stratified random sample from the benchmark data base which was considered to be a fair representation of the total population of businesswomen in Malawi. Stratified random sampling was applied. For that purpose, the benchmark data base was stratified by region and by sector, as has been described in Chapter 3. It was decided to select a nearly equal number of business women from each region as well as from each sector because this has some attractive statistical properties when making comparisons between sub-groups. ( see Emerson, 1990). The selection was done as follows: Each business in the benchmark data base was allocated to one of the three regions, to one of the six sectors and to one of the following eleven centres



Centre	Region
Mulanje covering Phalombe etc.	South
Blantyre	South
Nchalo/Bangula	South
Mangochi	South
Ntcheu/Balaka	Centre
Dedza	Centre
Lilongwe	Centre
Kasungu/Dowa	Centre
Mzimba	North
Mzuzu	North
Karonga	North

Each business was allocated to the centre from which it could be reached most easily. All records in the benchmark data base were given random numbers and then sorted by centre and sector in ascending order. Businesses were selected from these lists starting with the lowest random number. The selection was subject to the following constraints:

- the team could only stay a limited number of days in each centre, as the survey was to cover all regions within the given time-frame.
- 12 to 13 businesses from each sector had to come into the sample for each region.

A second sample list was established by selecting businesses (starting again with the lowest random number) from those which had not come into the first sample list. In case a woman from the first list could not be interviewed, she was replaced by a woman from the second list starting with the lowest number.

Due to problems explained in detail below, it was sometimes (25% of the cases) not possible to conduct the interview with the selected woman either from the first, or from the second sample list. In that case, a woman from outside the sample list who was engaged in the same type of business was interviewed. These women were usually referred to the survey team by the DEMATT BPC (Business Promotion Consultant) in the field or by businesswomen previously interviewed.

It follows from the sampling method that the survey did not intend to cover all districts. Nevertheless, women from 19 out of the 24 Malawian districts were among the interviewees with the following distribution:



### List of Districts Covered

CENTRAL REGION	SOUTHERN REGION	NORTHERN REGION
Dedza (15)	Blantyre (32)	Karonga (17)
Dowa (3)	Chikwawa (6)	Mzimba (3)
Kasungu (15)	Chiradzulu (2)	Nkhata Bay (3)
Lilongwe (35)	Machinga (2)	Rumphi (17)
Mchinji (1)	Mangochi (10)	
Salima (7)	Mulanje (12)	
	Mwanza (7)	
	Nsanje (1)	

### 6. Survey Execution

The actual field work was conducted from 6 August to 11 September 1990. On 12 September a full-day debriefing was held in Chancellor College.

The survey teams departed for interviews from the operation centres listed above.

The two supervisors were equipped with the lists for first and second choice. They had to identify the women, visit her business place, complete the supervisor questionnaire and make an appointment for the enumerator interview. They had to design the route for the survey vehicle in charge, allocate enumerators to interviewees, and make sure they were dropped in the right place. In addition they were required to check the enumerator questionnaire after the interview for completeness and reasonableness the answers.

At the beginning of the field work, an interview took about 1 hour, but towards the end, the average time was only 40 minutes. Often the enumerator had to wait for quite some time before the business actually allowed the woman to spare the time for the interview, in other cases, the interview had to be interrupted and continued later.

## 7. Problems Encountered

1. Difficulty in identifying women because of change in location, name, or marital status and/or closing of the business.

In one case a woman from the list was identified, although she had a divorce, changed her name, moved to a different place and started a different business.

2. Failure to make an appointment for the time the survey team spent in the area. The most common reason for that was the temporary absence of the woman for business, family visits, funerals, and stays in the hospital. In some cases Saturdays were ruled out for religious reasons. Considering the high costs of travel it was not possible to go back at a later time.

3. Nonsuccess in including a selected women in the tour. In some few cases the selected business was too isolated and too distant from the others in that centre. It had to be dropped for cost and time reasons. Places affected were Chitipa and Nsanje.

4. Failure to conduct an interview because the woman didn't keep the appointment.

5. Business discussed was not the same as the one on the list and was classified in a different sector. This changed the sectoral composition.

6. Business had closed down. The most important example was the case of stone quarrying women in the Northern Region who had been supplying the construction for the Lilongwe/Mzuzu road and had all just closed down as the road was finished.

7. Unwillingness to answer. A few women refused to grant the interview. One said that she did not see how they could justify the time lost to their customers.

8. Customers or relatives present at the time of the interview disturbed or influenced the way the woman answered questions.

9. Workload for supervisors was too high. They had to identify the women from the list and conduct a short initial interview, while at the same time supervising the enumerators and checking their questionnaires. To save time, whenever possible, the enumerator interview followed the supervisor interview immediately.

In addition, response errors of the following types must be expected:

- a) The interviewer makes a wrong mark/note
- b) The interviewee is influenced by the enumerator's opinion
- c) The answer is affected by what is socially accepted/prestigious. Example: Are you up-to-date with your loan repayment
- d) Wrong answers in true belief. It seems that there was a tendency to underestimate sales in a normal month.
- e) The interviewee doesn't know the correct information. Example: If you had to replace all your tools, machinery, equipment, building, how much would it all cost?
- f) The interviewee gives a wrong information on purpose. Example: Reporting sales figures too low to avoid jealousy among other people present or putting them too high to impress them.
- g) A question is interpreted in an incorrect way. Example: "How long does it take you to sell the finished goods in stock?". A few women were referring to the time of the selling transaction as such and not to the time they would have the goods in stock.

## E. Data Processing and Analysis

### 1. Data Processing

#### Data Base

In line with DEMATT's Client Data Base System the software chosen for the Survey Data Base was R:BASE. Project staff received 6 days training.

R:BASE provides convenient data handling and data query facilities. However, it has the disadvantage of producing results in numbers only and of being unable to produce percentages in cross tabulations. Therefore, for the compilation of percentage tables, R:BASE results were transferred into Lotus. Graphics were produced with HARVARD GRAPHICS.

## Coding

The answers to open ended questions given in the questionnaires for the first region were analyzed and transferred in a coding system. Coding System and questionnaires were handed to Computer Laboratories of Chancellor College for coding, data entry and compilation of a previously agreed set of tables.

## Data Entry

The data were entered in a R:BASE file with 287 fields, the structure following the questionnaire. In addition, some new fields were computed.

## 2. Data Analysis

### Classification

Apart from the classification by region and type of business which has been described above, the sample was classified by urban/rural area and by size of business.

### Rural/Urban Classification

According to official classification (information from Geographic Department, Chancellor College, Zomba) the following cities, towns and municipalities are urban areas:

- Blantyre
- Lilongwe
- Mzuzu
- Zomba
- Mangochi
- Balaka
- Dedza
- Kasungu
- Chitipa

Everything else is rural.

### Classification by Size of Business

In the past many organizations and institutions tried to come up with their own definition of what is small, medium and micro. In December 1989 a meeting at Club Makokola of parties concerned led a proposal which will be presented to the Ministry of Trade and Industry for approval after further discussions.

According to what is called the Hard Test in this proposal, a business in Malawi should be classified as small as opposed to micro if 60% or three of the following five conditions are met:

1. The business has five or more employees
2. The value of fixed investment is K 5000 or more
3. Monthly sales reach K 12,000 or more
4. The business has a financial system
5. The business has a legal status.

Similarly, a business will be considered medium scale, if three of the following conditions are met

- 1a. The business has ten or more employees
- 2a. The value of fixed investment exceed or equals K 150,000
- 3a. The turnover/sales exceed or equal K 27,000 per month
- 4a. like 4 above.
- 5a. like 5 above.

While a so-called Soft Test would look at non quantifiable measures, the report has adopted the Hard Test definition for classification of enterprises. However, as the questionnaire was defined before the MEDI classification came out, we had to be flexible in interpreting criteria 4 and 5. As indication of existence of a financial system we asked if the business kept accounts. The legal status was assumed to be given if the business was either registered or had obtained any kind of licence.

### Analysis

Various tables were produced, summarizing the data obtained from the respondents and reporting about sample characteristics such as the sample distribution, the maximum, minimum and average value, the proportion of a certain attribute in the sample, etc. Based upon these tables, the survey results were interpreted with emphasis on the conclusions drawn from the sample results about the population. The finding, for example, that 53% percent of the interviewed women in Agro-Business had achieved a JCE (Junior Certificate of Education) as opposed to 25% of women in Trade, gives rise to the hypothesis that women in Agro-Business are in general better educated than women in Trade. The statistical methods to test hypotheses can be found in various standard textbooks on statistics; see e.g. Cochran, 1963. If we cannot reject the hypothesis (as is the case in the above example) this means that not only sampling errors account for the observed difference. We then say that the difference is statistically significant or simply significant. Whether this is the case or not depends upon the sample result, i.e. the observed difference, and the significance level. We generally tested hypotheses at the 5% significance level.

It must be noted that the interpretation of test results was not always easy. The main reason is the unknown size of the population. While the benchmark data base is the most complete data base on businesswomen currently available, it is known that it does not cover all business women. Personal estimates of the rate of coverage range between 30% and 50%. As a consequence of the unknown size of the population, the finite population correction (f.p.c.) could not be calculated. Generally speaking, the f.p.c. can be ignored without much loss if the sample does not exceed about 10% of the population. For some tests, the f.p.c. can be assumed to be greater than 10%, however, and some hypotheses which could not be rejected when ignoring the f.p.c. would have to be rejected when the f.p.c. were, e.g. 20%. In the text, we use expressions such as "seems to indicate" to characterize such situations.

#### F. Cost of the Survey

The following costs were incurred with the survey. This excludes the printing of the final report, the cost of salaries and per diems of regular DEMATT/BASW staff including the drivers as well depreciation of project vehicles used for field-work.

TABLE 4: Cost of the Survey

Cost Item	Amount in K
Salaries and subsistence allowances	8,651.20
Fuel & Public Transport	4,780.06
Professional Fees incl. Data Proces.	2,500.00
Printing of Questionnaires and Stationary	1,000.00
Training Expenses	323.40
<b>TOTAL</b>	<b>17,254.66</b>

Given a total number of questionnaires of 225, the cost per questionnaire came up to K 76.70 or US-\$ 28.40 (at 2.7 K/1 US-\$).



## RESULTS

In what follows, the presentation of sample results will be confined to the most interesting ones on each subject. Various other tables can be found in the Appendix.

Where results are mentioned without reference to a table, the table can be found in the Appendix.

### A. Distribution of Female Owned Businesses in the Sample

#### 1. Distribution by Region, by Rural and Urban Area, and by Sector

Table 5 shows the distribution of interviews by region, rural/urban area and by sector.

As can be seen, Agro-Industry and Trade were mainly located in rural areas, whereas Food & Beverages and "Other" were predominantly in urban areas. A nearly identical number of Textile and Service businesses was found in urban and rural areas.

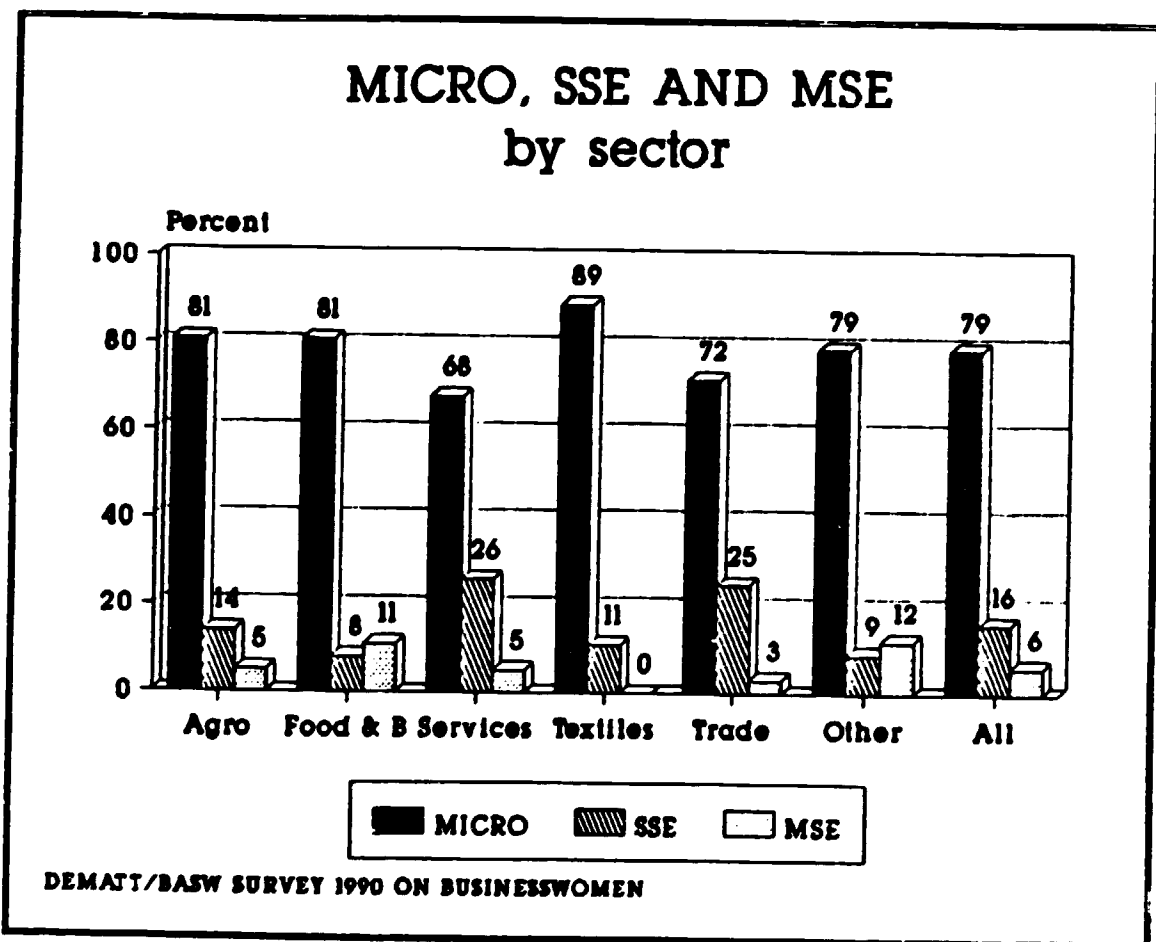
Table 5: Distribution by region, sector, rural/urban

	n	CENTRAL		NORTH		SOUTH		Total	
		URB	RUR	URB	RUR	URB	RUR	URB	RUR
AGRO	n	7	6	1	11	4	8	12	25
FOOD	n	13	3	1	10	8	2	22	15
SERV	n	9	5	7	5	4	8	20	18
TXTL	n	12	2	4	14	5	7	21	23
TRDE	n	6	4	4	7	2	13	12	24
OTHR	n	9	4	4	5	8	3	21	12
Total	n	56	24	21	52	31	41	108	117

It must be noted that in the population of all female owned businesses, the share of micro enterprises is likely to be higher than 79% ; and the share of small- and medium-scale enterprises consequently lower than the sample share. This has to be assumed because most microenterprises are not officially registered nor listed in other statistics, and only few have institutional contacts. As a consequence they are under-represented in the benchmark data base and thus underrepresented in the sample.

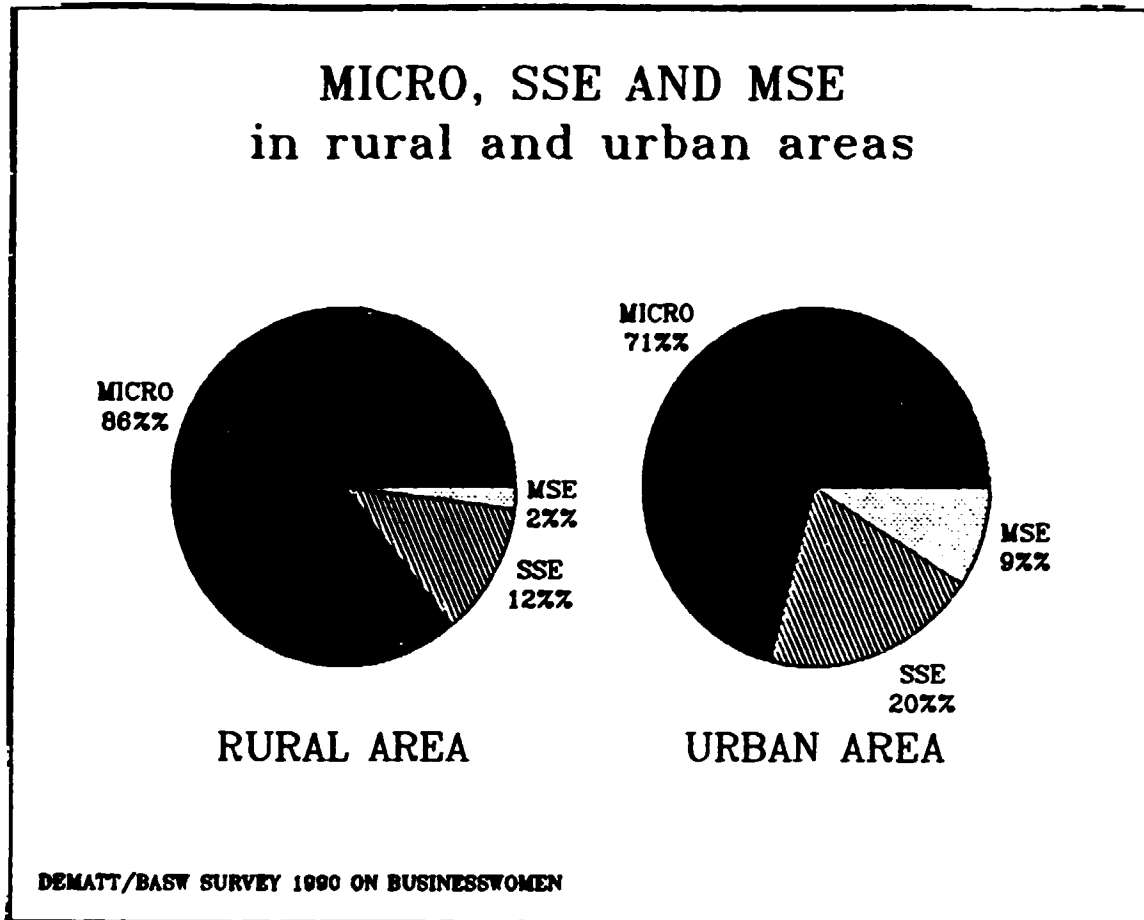
MICRO enterprises are distributed almost uniformly over all sectors with a slight preference in Textiles. Small-scale enterprises tend to go mainly into Trade and Services. 54% of the small-scale enterprises could be allocated to these two sectors. Medium-scale enterprises are mainly found in the sector Food & Beverages and in the "Other" sector (61% together).

Chart 1: MICRO, SSE, and MSE by sector



As one would expect, small- and medium scale businesses are more common in urban than in rural areas.

Chart 2 : MICRO, SSE, and MSE by rural and urban area



The North has fewer small- and medium scale enterprises than the other regions. 62% of the medium-scale enterprises in the sample were found in the Central Region.

Chart 3 : MICRO, SSE, and MSL by region

