

Measuring Non-standard and Informal Employment in the Republic of Macedonia

Blagica Novkovska¹
State Statistical Office of the Republic of Macedonia

Introduction

During the last 15 years the labour market situation in the Republic of Macedonia has deteriorated. The number of persons who are unemployed, discouraged, underemployed and with low pay has been increasing. The data from the Labour Force Survey (LFS) as the most quoted and most reliable labour market data on the Republic Macedonia show that the labour market is characterized by a relatively low labour force participation rate and by a very high unemployment rate. The current state of the labour market in Macedonia reflects the economic, social and political transformation of the country after independence in 1991, but also the long term problems in the economy of the country.

In the period of economic and political transition of the country, a lot of attention has been given to analysis and policy debates about unemployment. However labour mobility and the flexibility and security of employed person have not been treated adequately and a complete picture of the labour situation is still lacking.

For the purpose of this paper, the focus will be the first analysis of non-standard and informal employment in the Republic of Macedonia made on the basis of LFS data. It will also discuss plans for future improvements of the LFS as a necessary precondition for better understanding the dynamics of the labour market.

¹ This is a revised version of a paper prepared for the workshop on, Measurement Informal Employment in Developed Countries WIEGO, Kennedy School of Government, Harvard University, October 31-November 1, 2008

Labour market dynamics

In contrast to other transition economies, Macedonia has faced double-digit open unemployment since it was part of the former Yugoslavia. Registered unemployment in Macedonia was 12.8% in 1960, almost 20% in 1970, 22.4% in 1980s and around 24% at the time of independence in 1991. Registered unemployment has continued to rise during transition and accelerated since the mid-1990s, leaving Macedonia an apparent outlier in the region. According to the latest LFS data, the unemployment rate for 2007 was 34.9%.

The data indicate that the Macedonian unemployment problem is a long-term problem with negative effects such as the deterioration of human capital, discouragement and demotivation etc. With the transition, employment in the formal sector in Macedonia decreased sharply in the period after the 1990's. At the same time, the informal sector expanded rapidly. This was tolerated because it alleviated social tensions. Low employment growth necessarily means insufficient labour demand, in particular from the private sector. The decrease in economic activity in the period of transition illustrates the existing difficulties of access to employment in Macedonia. The transition hit low skilled workers and women hardest.

Employment-related indicators are among the most significant measures especially in the case of countries in transition, where economic restructuring, including privatization, transformation of the state sector and formation of the private sector, led to quantitative, but also qualitative changes in labour demand. There was a continuous decline in labour demand in the period of transition. Within the process of privatization, the structure of employment by status has been changed. The seriousness of the changes in employment by status is illustrated in Table 1.

Table 1 Employed population by status in employment, 1996-2007

Economic status	1996	2000	2004	2007
Total	100.0	100.0	100.0	100.0
Employee	78.9	74.3	75.4	72.3
Employer	2.9	4.3	5.9	5.5
Self-employed	11.2	10.5	10.2	12.1
Unpaid Family Employee	7.0	10.9	8.5	10.1

Source: Labour Force Survey

Table 1 shows that in the last decade the proportion of employees in total employment decreased, while the number of employers and self-employed increased. Moreover unpaid family workers grew significantly from 7.0 per cent in 1996 to 10.9 per cent in 2000 and 10.1 per cent in 2007.

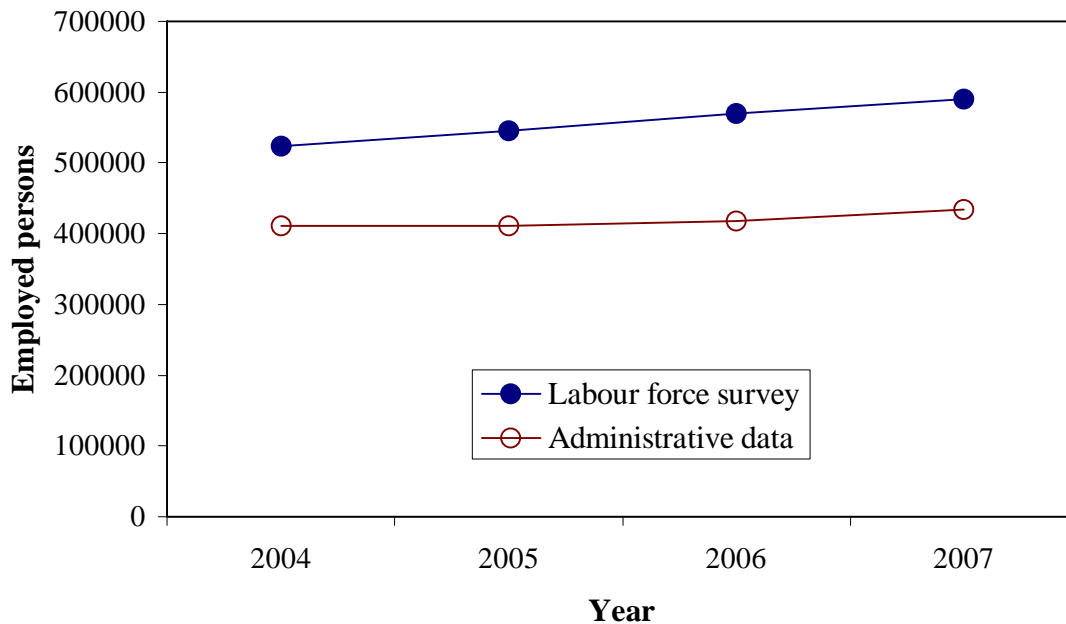
It is interesting to note that according to recent LFS data, the share of part-time work and full-time work show that less than 7 per cent of the employed worked part-time in 2007 which is much lower than the 25 per cent in the EU 25. However, the LFS figures indicate a clear trend of increasing part-time work, temporary and seasonal work. These indicative changes in the structure of labour force were the main reason to begin measurement of non-standard and informal employment.

Current measurement issues

The dimensions and the trends of informal forms of employment in the Republic of Macedonia have not been analyzed, although in 1997 experimental measurement of informal employment was made based on the LFS data. The significant differences between the employment (measured and followed through the administrative sources)

and the data on the total employment measured by LFS (fig.1) pointed out that informal employment exists widely.

Figure 1: Employment by years and sources of data



In 2008, the State Statistical Office (SSO) started activities to specify the LFS questions on informal sector and the nonstandard/informal employment. Experts² participated in these activities with the SSO and, contributed to identifying measures for nonstandard/informal employment, as well as for the informal sector. They also made recommendations for the general improvement of LFS.

Measurement issues: the informal sector, informal employment and non-standard employment

For the purpose of the first measurement of informal employment in the Republic of Macedonia two concepts were relevant: the informal sector and informal employment.

² Ralf Hussmanns, Head , Methodology and Analysis Unit, Bureau of Statistics, ILO
James Heintz, PERI/University of Massachusetts

The informal sector is comprised of all informal enterprises. Employment in the informal sector refers to all employment in enterprises which are classified as informal according to a common set of criteria. The resolution adopted by the 15th ICLS identified the set of criteria for defining informal enterprises (Husmanns and du Jeu,2002):

- Legal organization of the enterprise;
- Market production;
- Size and/or registration

Informal employment developed as a broader concept than employment in the informal sector comprises the total number of informal jobs whether carried out in informal sector enterprises or households, during a given reference period.

In the 2007 LFS, questions on firm size and whether employed persons are registered in the state employment insurance fund and employment agency: are the basis for measuring the informal sector and total informal employment. In the Republic of Macedonia, self-employed individuals may register with the pension insurance fund and the national employment agency but are not required to do so. Only self-employed individuals in registered enterprises are able to register with these institutions. Since the 2007 LFS does not include a question on the registration status of the enterprise – only the registration status of individual workers – this question is the primary source of information on whether self-employment can be considered to be formal or informal, based on the registration criterion.

The 2007 Labour Force Survey collects data on **firm size** (based on the number of employed) to identify employment in the “informal sector” (all informal enterprises).

Firm size based on the number of employed is identified from the question *How many persons, including you, are working in the same business entity, firm, farm (including the employer, the partner and the unpaid family workers)?* (this question refers to employees and unpaid family workers).And the question *How many persons, including yourself, usually work in your business entity, business or activity?* (this uestion refers to employers and self employed persons). In terms of defining and measuring the informal sector in Republic of Macedonia, the possibilities are limited. The LFS does not collect information on whether enterprises are incorporated or not. There is no question on the registration status of enterprises. Employed in firms with <5 paid workers could be used

to identify employment in the informal employment. (Informal sector was not taken up in this paper given the focus of the workshop on informal employment in developed countries).

The 2007 Labour Force Survey collects data on the registration of employed individuals in certain state agencies across four employment status categories (employee, employer, self-employed /own account/, unpaid family worker). The relevant question for identification of registration status is: *Are you registered in some of the following institutions in your work: Pension insurance fund of the Republic of Macedonia, Employment Agency of the Republic of Macedonia, Do not know, Not registered, Other (specify).* More answers are possible.

From questions related to the registration of employed persons, formal and informal employment arrangements were distinguished:

- */informal employment* – all employed who are NOT registered with any institution/agency. All unpaid family workers are considered to be informal according to the recommendations of the 17th ICLS.
- *formal employment* – is registered in either the pension insurance fund or employment agency;

The 2007 Macedonian Labour Force Survey collects information on certain types of so-called “non-standard” employment: workers hired by temporary employment agencies, workers in temporary employment (not necessarily employed by temporary help agencies), and part-time workers.

Non-standard employment in the Republic of Macedonia refers to employees in formal and informal employment (agricultural and non-agricultural) including both temporary employees who are engaged through a Temporary Employment Agency or those who are not. Part time employees are considered in relation to permanency of work as: temporary and permanent employees.

Estimates of informal employment and non-standard employment

The profile of the labour force in the Republic of Macedonia is shown in Table 2.

According to data from the 2007 LFS the labour force participation rate is 55.7%, the unemployment rate is 34.9% and employment rate is 36.2%.

The working-age defined in LFS is in line with ILO standard, the lower limit is fifteen years and the upper limit is 80 years. Formally, in Macedonia, the working age begins with 15 years, the retirement age is 64 years for men and 62 years for women.

As can be seen from Table 2, the labor force participation rate in Macedonia is very low. This is not only below the EU 15 and EU 25 average of around 70 %, it is also below participation rates of the new Member States (NMS) and in the countries of South-East Europe (SEE) (in average more than 60%).

There were significant differences in the labour force participation rate of men (67.3 percent) and women (44.1 percent). The unemployment rate, as measured by the LFS, was high – approximately 35 percent overall. Women's unemployment rate was slightly higher than that of men. Given the lower labour force participation rate and the somewhat higher unemployment rate, women constituted only 39.2 percent of total employment.

Women's employment rate (28.4%) is significantly lower than employment rate of man (44.1%).

About one out of every five employed people worked in agriculture (18.2 percent). Wage employment relationships dominated non-agricultural employment, 70.2 per cent of all workers were employees in non-agricultural jobs. Self-employment was relatively small outside of agricultural, amounting to just 11.6 percent of all employment.

Table 2 Profile of the Labour Force, Republic of Macedonia, 2007

	Male	Female	Total
Total Population	1023626	1018778	2042404
0-14 years	194870	183637	378507
15-79	814601	814034	1628635
80+	14155	21107	35262
Working Age Population	814601	814034	1628635
Not in labour force	266460	455036	721496
Labour force	548141	358998	907138
Labour Force Participation	67.3%	44.1%	55.7%
Unemployed	189306	127599	316905
Unemployment Rate	34.5%	35.5%	34.9%
Employed, Total	358835	231399	590234
Agriculture	67444	39989	107433
Non-agric.	291391	191409	482801
Employee	238579	175695	414274
Self-employed	52812	15715	68526
Own-account	27217	6489	33705
Employer	21063	7179	28242
Non paid family worker	4532	2047	6579
Employment Rate	44.1%	28.4%	36.2%
Employed, Per cent of Total	60.8%	39.2%	100.0%
Agriculture	11.4%	6.8%	18.2%
Non-agric.	49.4%	32.4%	81.8%
Employee	40.4%	29.8%	70.2%
Self-employed	8.9%	2.7%	11.6%
Own-account	4.6%	1.1%	5.7%
Employer	3.6%	1.2%	4.8%
Non paid family worker	0.8%	0.3%	1.1%

Source: Labour Force Survey, 2007

The estimates of formal and informal employment for the Republic of Macedonia show that the total formal employment is 72.3% of total employment and 27.7% is participation of informal employment. Informal workers were defined to be those who were not registered with the national employment agency or the national pension scheme.

LFS data show that a large proportion of individuals in informal employment (58 per cent) are in agricultural employment.

Table 3 Employment by formality and sex, Republic of Macedonia, 2007

	Male	Female	Total
Total Employment	100.0	100.0	100.0
Formal Employment	70.1	75.9	72.3
Informal Employment	29.9	24.1	27.7

Source: Labour Force Survey, 2007

Analysis of informal employment by sex show informal employment accounted for 29.9 percent of all men's employment and 24.1 percent of women's employment. LFS data show that women are much more likely to work as unpaid family workers, particularly in agricultural activities.

Figure 2: Employment by formal/informal status and sex

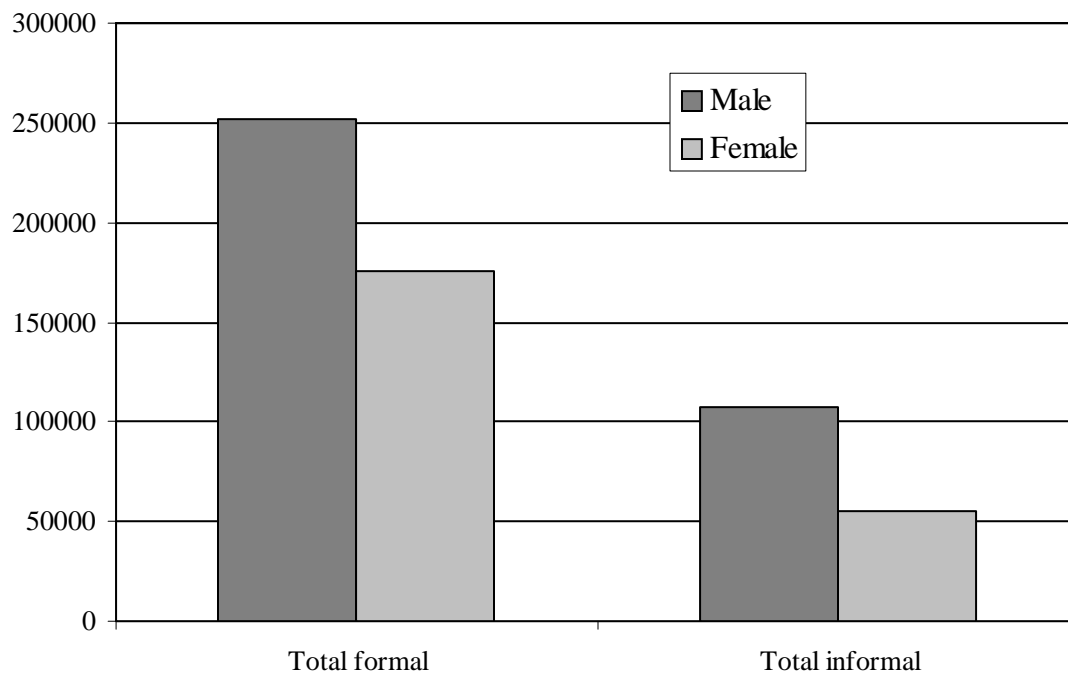


Table 4 presents estimates of non-standard and formal/ informal employment for the Republic of Macedonia. The table is restricted to wage employees only. Three categories of nonstandard employment are featured: temporary employees who are working through temporary employment agency, temporary employees (other than agency) and part-time employees.

According to these estimates the number of non-standard employees in Republic of Macedonia is 59804 and majority of these (60 percent) were informal.

Table 4: Nonstandard Employment by formal and informal status and by sex, Republic of Macedonia, 2007 (wage employees only)

	Male	Female	Total
Formal Employment			
Temporary employment agency	1097	987	2084
Temp employment (not agency)	9264	6782	16046
Part-time employment	2554	4303	6857
.... of which permanent	2363	3382	5745
Other (standard) formal employees	204443	152126	356569
Total formal employees	217167	163277	380444
Informal Employment			
Temporary employment agency	---	---	---
Temp employment (not agency)	24674	10931	35606
Part-time employment	1894	1700	3594
.... of which permanent	227	95	323
All other (standard) employees	6580	3711	10289
Total Informal Employees	31481	14737	46218
Total Employees	248648	178014	426662
Temporary as % of formal	4.8%	4.8%	4.8%
Temporary as % of informal	78.4%	74.2%	77.0%
Nonstandard as % of formal	5.9%	6.8%	6.3%
Nonstandard as % of informal	79.1%	74.8%	77.7%

Source: Labour Force Survey, 2007

The estimates presented in Table 4 of non-standard employment show a correlation between informal wage employment and non-standard employment. Temporary employment accounted for 77.0 per cent of all informal wage employment and non-standard employment accounted for 77.7 percent. In the Republic of Macedonia, temporary employment agencies are required to formally register their employees. Therefore, there is no informal temporary agency employment. All informal temporary employment occurs outside of the agencies.

The LFS also has questions that allow the identification of home-based informal employment. The question on place of work was asked of all employed persons (employers, own-account workers, employees and unpaid family workers). Tables 5 and 6 show how place of employment adds to the understanding of informal employment for some of those categories.

In Macedonia, most informal employees and employers do not work at home. The proportion of non –agricultural informal employers who do not work at home is 95.2 per cent and for those in agriculture the proportion is even higher, 97.8 per cent. For employers, the proportion is somewhat lower but still high: 93.1 per cent for those in agricultural informal employment and 89 per cent for those in agriculture.

The LFS data identify that the percentage of women part of informal employment that work out of home in both categories (employees and employers) is higher than percentage of man.

Table 5 Work outside and inside the home by informal agriculture/ non-agriculture, and sex for employees, 2007

Employees, in percents			
	Male	Female	Total
Non-agricultural informal employment			
Informal employees who don't work at home	95.8	93.1	95.2
Informal employees who work at home	4.2	6.9	4.8
All informal and non-agricultural employees	100.0	100.0	100.0
Agricultural informal employment			
Informal employees who don't work at home	98.4	100.0	97.8
Informal employees who work at home	1.6	-	2.2
All informal agricultural employees	100.0	100.0	100.0

Source: Labour Force Survey, 2007

Table 6: Work outside and inside the home by informal agriculture/ non-agriculture, and sex for employers, 2007

Employees, in percents			
	Male	Female	Total
Non-agricultural informal employment			
Informal employees who don't work at home	92.8	100.0	93.1
Informal employees who work at home	7.2	-	6.9
All informal and non-agricultural employees	100.0	100.0	100.0
Agricultural informal employment			
Informal employees who don't work at home	88.3	94.7	88.9
Informal employees who work at home	11.7	5.3	11.1
All informal agricultural employees	100.0	100.0	100.0

Source: Labour Force Survey, 2007

Planned future work

The current labour force survey allows the development of estimates of informal employment and nonstandard employment. However as this analysis shows, it is not possible to measure all types of the emerging and important employment arrangements with the current questionnaire. Preparations are underway to redesign the 2009 LFS to better capture informal sector and non standard /informal employment. We plan to include several new questions or modify several existing questions. Some questions will be changed in order to obtain more details, for example question about type of ownership of the business entity where persons are employed will be cover all possible forms of ownership. The change is foreseen to contribute to the improvement of measuring nonstandard/informal employment.

We plan to include a new question to better define informal sector and for determining the units in the informal sector:

In the enterprise where you work registered in the Central Register?

- a) Registered*
- b) Not registered*
- c) Do not know*
- d) Other*

We plan to add a question about the kind of working contract. This question will be asked only of employees:

In your work, do you have:

- a) Formal written contract*
- b) Oral contract only*
- c) No contract*
- d) Other*

The existing question related to the working contract will be modified by formulating it as:

Is your contract with:

- a) Permanent duration*
- b) Temporary duration*

Because the location of work can be very important in determining character of formal and informal work, it is possible that the question on whether work is outside or inside the home will be modified to include additional locations:

What is your primary place of work?

- a) Enterprise ,factory, office, shop, or workshop (away from your own home)*
- b) Own home*
- c) Employer's home*
- d) Farm or agricultural land*
- e) Construction site*
- f) Open market or street*
- g) Other (please describe)*

Also the LFS 2009, needs to improve its general coverage of the employed. It needs to make improvements to include within its scope all persons who have some paid economic activity in the reference week. Special attention needs to be given to the following types of activities: market, street or home sellers, babysitters, cleaning house of others for money; giving private lessons (languages, music, computers); repairing of households and personal goods of other people for money; hair dresser, tailoring and other services providing at home for money to other people.

In the Republic of Macedonia currently there are amendments to the Law on Working Relations which mainly refer to the regulation of the registration of employees, part time work, volunteering, etc. All of these amendments, which are now in the proposal phase, will be taken into consideration in future questions aimed at identifying nonstandard/informal employment.

References

B. Novkovska, *The particular position of the unpaid family work*, 18th Statistical Days /Conference, Radenci, Slovenia, November 2008

LFS, *Statistical Office of Macedonia, various years*

R. Hussmanns and B. du Jeu (2002), „ILO compendium of official statistics on employment in the informal sector., STAT Working Paper 2002-no.1. ILO Bureau of Statistics