

## **LINKS BETWEEN MACROECONOMIC KEY VARIABLES AND EMPLOYMENT LEVELS IN ROMANIA**

**Assist. Ph.D Student Bocean Claudiu  
Ph.D Student Mimi Petrișan  
University of Craiova  
Faculty of Economics and Business  
Administration  
Craiova, Romania**

**Abstract:** This paper investigates the presence of a causal relationship between employment levels and key macroeconomic variables in Romania during the period 1990–2005. It shows how macroeconomic policies may be useful in achieving high employment levels, as well as how it might generate adverse outcomes. Starting from a macroeconomic model of labour market I present the effects of the macroeconomic policy measures to the labour market. I think that a low unemployment rate and rapid productivity growth are the hallmarks of a successful economy and thus top priorities of economic policy.

**Keywords:** macroeconomic policies, employment, economic growth.

### **1. Introduction**

Macroeconomic policy making over the past two decades has been overwhelmingly guided by the objective of attaining and maintaining macroeconomic stability, defined largely by strict adherence to rather conservative levels of inflation, budget and current account deficits. The imposition of stabilization programs coincided with further policy compulsions toward greater trade liberalization, market deregulation and privatization, and a roll-back of the role of the state.

Bhaduri (2005) posits the need for an “alternative set of macroeconomic policies”, in which an appropriately designed and executed employment strategy would constitute the core consideration. He argues that such a policy regime would be guided by two broad principles: first, relatively higher emphasis needs to be given on internal/domestic market; and second, considerations of labour market flexibility and growth of labour productivity need to be weighed alongside considerations of the level of employment. Higher employment would allow maintaining a relatively higher domestic demand, and reducing the need for government interventions in extending subsidies, income transfers and unemployment benefits. Within the above considerations, the paper provides the basic ingredients of an employment-friendly macroeconomic policy framework.

Blanchard and Wolfers (2000) concentrate on the combined role played by institutions and macroeconomic conditions. They identify a set of macroeconomic variables that could have played a role in the explanation of European unemployment. These are the decline in total factor productivity growth, the real interest rate and the adverse shifts in labour demand.

In this paper I use macro data from the “Romanian Labour Force Survey” and “Employment in Europe 2005 - Recent Trends and Prospects” to analyze the effect of macroeconomic policies on the Romanian labour market.

The paper is set up as follows. Section 2 provides stylized facts about the labour market evolution in Romania. Section 3 reports the effects of the macroeconomic policy measures to the labour market. Section 4 gives final remarks.

## **2. The evolution of labour market in Romania**

Apart from difficulties and delays during the 16 years of transition, Romania has, to a large extent, undertaken reform in all spheres: economically, politically, and socially. While the first 10 years were characterized by the restructuring of the economy (accelerated in 1997-1999), which suffered several crisis periods, a re-launching process was started in 2000. Macro-economic equilibrium, budget deficit, and the level of inflation have all been improved, along with a better coordination of budgetary and monetary policies. Restructuring has been gradually broadened to affect sensitive sectors and the privatization process accelerated considerably and is now more advanced.

Since 2000, the Gross Domestic Product (GDP) has registered a steady growth: 2.1% in 2000, 5.7% in 2001, 5% in 2002, 4.9% in 2003, 8.3% in 2004, 4.4% in 2005 and for 2006 the value envisaged is 4.5%. After being at an excessively high level, average inflation has been on a constant downward trend: from 45.7% in 2000 to 8.2% in 2005 and for 2006 the value envisaged is 6.5%. Although real wage growth has lately become more aligned with productivity gains, the authorities are still struggling to control the wage bill of public enterprises. Wage developments and formation do not sufficiently reflect productivity differentials by skills, occupations and regions and therefore do not provide appropriate signals for skills acquisition or for regional and occupational mobility.

The existence of a dual labour market with a rural labour market concentrating more than 30 percent of the labour force and characterized by high participation, including in the younger and older age groups and very low unemployment (twice as low as in urban areas). Agriculture concentrates nearly half of private employment and 85% of all self-employed.

The restructuring of the economy has lead to a strong decline in industrial employment. Agriculture played a buffer role in absorbing the employment losses while due to the low growth and irregular development of the service sector, job growth has been negative and the reallocation of employment towards this sector has been marginal.

However, in last for years the development of the private sector has concentrated in industry and services. The new private sector has reached a size enabling a sustainable growth of employment and compensating for the job losses in the public sector. There is an average development of small enterprises, which are the main source of job growth - in particular in services - which points to certain confidence in the business environment. The implementation of Law 76/2002 on Unemployment Insurance and Employment Stimulation contributed to an improvement of employment and business environment.

The skill level and structure of the labour force is a concern in an immediate and medium-term perspective. While the average educational level remains relatively low it increases since the mid 1990s; the qualifications held by many workers will not

meet the requirements of the new jobs; the participation rate of young people in the education system is low at tertiary level, a certain group does not continue beyond compulsory education. All these features represent a major challenge given the important restructuring ahead and the need to support economic transformation by a stronger development of new sectors.

Employment policy here is seen as widely defined – encompassing human resources policies, wages policy, the system of taxes and benefits, and the public employment service and its active labour market programs (ALMPs).

Although the economic growth was preserved for five consecutive years, it did not ensure a satisfying level of employment and new jobs creation. In fact, employment rates have been on a constant downward trend among people aged 15-64 years, from 65.4% in 1997 to 57.7% in 2005 (table no. 1). The decrease in this period affected the male population to a greater extent, rural and urban populations being affected in approximately equal proportions. In 2005 in Romania the level of the employment rate stands below the EU-15 average of 64.7% or the EU-25 average of 63.3% and above the new member states average of 56%.

**Table no. 1 Employment rate, labour force participation rate and unemployment rate**

	2000	2001	2002	2003	2004	2005
Employment rate	63	62.4	57.6	57.6	57.9	57.7
Labour force participation rate	70.9	68.6	64.1	62.3	62.1	61.3
Unemployment rate	11.2	9	10.2	7.6	6.8	5.8
Real wage rate	21.3	5.4	0.0	4.8	6.1	3.8
Real GDP rate	2.1	5.7	5	4.9	8.3	4.4
Price deflator GDP	44.2	37.4	23.4	19.2	15.8	11.8

*Source: European Commission for Employment and Social Affairs "Employment in Europe 2005 - Recent Trends and Prospects" and [www.anofm.ro](http://www.anofm.ro)*

According to the National Accounts data, employment in agriculture, forestry and fisheries still represents the bulk of total employment, with 31.2% in 2005, albeit falling from its all-transition period peak of 41.4% in 2000. The population employed in the tertiary sector (services, trade, banks, insurance, tourism, telecommunications, etc.) has been increasing and now accounts for 36.7% of total employment.

Industrial employment has witnessed its sharpest fall since 2000. In 2005, employment in industry and construction represented 32.1% of the total.

Large areas of subsistence economy still remain and to a certain extent prevail throughout the country. High shares of both subsistence agricultural employment and dwindling industrial employment point to the fact that further efforts are necessary to improve the investment climate, to put in place growth enhancing framework conditions, as well as upgrading of skills to match the needs of the labour demand and revision of the Labour Code. Thus generating more attractive jobs and driving the working age population out of subsistence employment and inactivity (estimates are of

1 million people employed by the informal economy, plus 4 million in subsistence farming).

The high rates of idleness in the economically active age category, the great number of people working in subsistence farming (estimated at 4 million people) and migration of labour (estimated at 2 million people) are occurrences that could account for the decrease in the number of people earning wages, without any corresponding growth in unemployment rates. A factor partly mitigating the effect of lay-offs from state-owned businesses was the development of private sector employment.

In accordance to the National Accounts data, unemployment rate decreased to 5.8% in 2005, compared with 6.8% the previous year. As a result, while the official unemployment rate will continue to remain low for a while, attention has to be paid to increasing the labour force participation rate for the working age population.

Unemployment has affected first and foremost workers, due to the industrial decline, where a large number of people were made redundant following the restructuring process, accounting for 73.8% in 2005 of the total number of registered unemployed persons.

Long-term unemployment (one year and over) saw an increase from 3.2% in 2001 to 4.2% in 2005. While overall unemployment is falling, long-term unemployment is constantly rising, thus forming a hard core mass of long-term unemployed towards which the ALMPs have to be focused during the coming years.

The labour force participation rate decreased from 64.8% in 1996 to 57.7% in 2005. The constant decrease in the relative size of the economically active population reflected structural pressure of the economy suffering radical transformations. Strategy errors sometimes have been added and played the role of easing this enormous pressure, as in the case of the early retirement wave. Despite some indications that early retirement may slow down (in 2005 the phenomenon was at 51.4% from its 2001 level) at least in certain sectors, the prospects are not clear, and a close monitoring is needed, in order to better assess the impact of early retirement on the activity rate and the sustainability of the pensions system placed under control only in the last years.

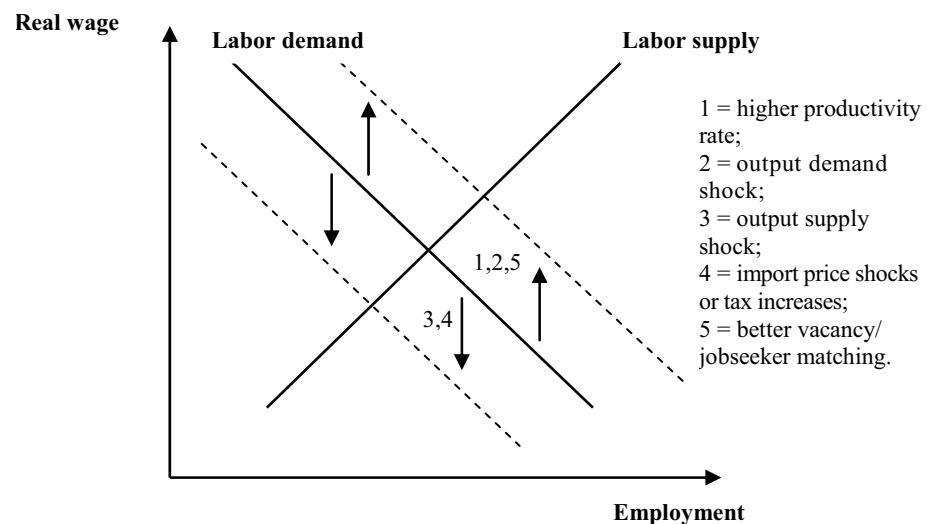
The ageing of population and increasing inactivity rate generate an increase in the economic old age dependency rate. While in 1990 there were 3.4 employees for 1 pensioner, in 2005 the ratio was 0.7 employees for 1 pensioner.

The main causes of these evolutions were: the general economic decline with the reduction of total output, the failure of macro stabilization policies and the delay of privatization, the reduction of investment and the restructuration of nonrentable economic agents, the low mobility of labour force in territory, the constraints associated with the international environment.

The evolution of labour resources in Romania were influenced, in the last decade, also by demographic and social phenomena such as: the decrease in the fertility and a high level of mortality, the growing number of emigrants, the reduction of quality of medical services. These lead to increases of the population aging more than 60 and to high level of rural dependency, especially in the rural areas.

### **3. The impact of key macroeconomic variables on employment level**

In an open economy I consider that key macroeconomic variables may affect employment through at least five channels. To catalogue these effects consider a simple labour market model with a downward-sloped and an upward-sloped labour demand, while labour supply is constant (figure no. 1).



**Figure no. 1 The labour demand effects**

First, a rise in productivity trend entails a fall off in employment on short-term. But it is not possible to detect an effect of productivity growth on aggregate employment in long-term data. Old jobs lost in declining industries (because of productivity growth) are compensated with new jobs which are created in the expanding sectors of the economy. In their study Barnes, Johnson, Kulys and Hook show that productivity growth does not appear to be associated with a fall in employment at the aggregate level, and can contribute to employment growth. Productivity growth can mean doing more with fewer people in some industries, but growth in output and incomes made possible by productivity improvements creates jobs throughout the economy.

Second, an “output demand shock”, associated with a rise in money stock, will shift output demand curve outwards and thus raise both inflation and employment.

Third, by contrast, an “output supply shock”, associated with a rise in unemployment, will also raise inflation but will reduce employment.

Fourth, when external shocks like import price shocks or tax increases reduce the feasible growth of real consumption wages; this generates more wage pressure, which requires more unemployment to offset it.

Fifth, a more efficient matching between job vacancies and unemployed workers (labour market institutions effects) generates a rise in employment. The resulting smaller ratio between vacancies and unemployment reduces wage pressure, which, because vacancies are costly to employers, provides an outward shift in labour demand. (Estevão, 2003).

#### 4. Conclusion

Romania is characterized by the existence of a dual labour market with agriculture and migration playing a buffer role for the employment losses in the restructuring process of the industry. During 2000-2005, Romanian labour market had a contradictory evolution. Occupied population (labour market demand) and labour force (labour market supply) have been decreasing in recent years indicating that economic

growth did not yet have positive effects on employment. However the unemployment rate decreased to 5.8% in 2005 thanks to a positive equilibrium between labour market demand and supply. Temporary and permanent migration is another element to take into account. Labour productivity exceeded real wage trend generating a plus of labour demand. ALMPs exerted a positive effect to labour market demand concurring to unemployment fall.

This paper emphasizes the effects of key macroeconomic variables on employment levels and unemployment dynamics, unifying framework and seeks to understand which policies drive to a general welfare state. Domestic demand-led expansion is the cornerstone of the employment strategy. This means placing due emphasis on the domestic market, instead of being too preoccupied with competitiveness in the external market. A crucial component of this approach is not to separate the objectives of growth in productivity, and in employment. This separation typically happens, because productivity growth is considered only as an instrument for enhancing competitiveness, while it is forgotten that higher productivity together with higher employment makes more goods and services available for the domestic market.

Increasing the labour productivity can be achieved by the following measures: acting against the black labour market, initiation of some actions that will lead to a reduction of new jobs creation; trying to equalize the offer and the demand on the labour market by stimulating the in-training formation, taking into account the effects of the information society, stimulating the companies to apply the new technologies and new forms of management.

Neglecting the links between employment, productivity and output growth within the Romanian economy can lead to fail to deal effectively with unemployment, low productivity and income inequality, and so will preserve the poverty for a large part of population.

## REFERENCES

1. Barnes, P. Johnson, R. Kulys, A. Hook, S. Productivity and the Structure of Employment, Productivity Commission Staff Research Paper, AusInfo, Canberra, 1999
2. Bhaduri, A. Macroeconomic policies for higher employment, in the era of globalization, Employment Strategy Papers, 11, Employment Strategy Department, World Bank, 2005
3. Blanchard, O. Wolfers, J. The Role of Shocks and Institutions in the Rise of European Unemployment: the Aggregate Evidence, The Economic Journal, 462, 2000
4. Estevão, M. Do Active Labour Market Policies Increase Employment?, IMF Working Paper, 03/234, 2003
5. Landmann, O. Employment, productivity and output growth, Employment Strategy Papers, 17, Washington DC, The World Bank, 2004