

SPOUDAI Journal of Economics and Business Exovocit http://spoudai.unipi.gr



A Wage Policy for External Balance and Employment in EMU Environment: A Theoretical Approach

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Abstract

Wage developments and related policies that determine labor markets functioning and wage formation processes, are key factors with central importance in EMU. Flexibility in labor markets functioning and wage-setting aiming to nominal and real wage flexibility, has been the most important policy instrument remaining at national level for responsive national economies and adjustment to shocks. By this paper we analyze the preconditions and importance of a flexible functioning labor market framework, arising from the extended literature and related implemented policies. On the other side of the issue, we discuss the determinants of the conventional wagesetting, as also the main features of the related Scandinavian model and the proposition associated with the new 'pact for euro'. Aiming to formulate a flexible wage setting framework in EMU, complementary to flexible functioning of labor market, we have to abolish the conventional wage-setting and relay on features contained in the Scandinavian model and the new Europact. We conclude that a flexible wage-setting mechanism should consist of three levels of wage bargaining, servicing different functions and purposes, the nationwide, sectoral and company level. In order to estimate the room or space that is the norm for wage increases in bargaining on the above three levels, we have to rely mainly on productivity developments in competition exposed tradable sectors of the economy. By this policy instrument we aim at assuring competitiveness and external balance, the crucial preconditions for job creation in EMU.

JEL Classifications: J31, J41, J51, F15.

Keywords: EMU, Flexible labor market, Wage flexibility, Wage formation, Wage-setting mechanism, productivity, Room for wage increase.

1. Introduction

The widening and deepening of economic integration within EMU's framework assigns a central role to labor markets' structure as an economic stabilizer using nominal wages.

It's a common request to make the labor market more flexible, as the most important policy instrument for responsive national economies facilitating the burden of adjustment to economic shocks.

A swifter response of relative wages, will ease the adjustment to various asymmetric shocks, such as industry idiosyncratic and country-specific. This can diminish the potential costs of joining EMU, stemming from a lack of sufficient labor market and wage flexibility.

In an integrated area, the wage developments in one country cannot deviate for long from the evolution in the rest of the area. The closer economic integration, also necessitates a convergence of labor markets and institutions' functioning as a natural counter-part.

Once a country is open to international competition, there is no way that an inefficient system or rules and regulations can survive for a long time. Wage rigidities arising from inflexible labor markets, institutional environment, lie behind labor costs, contributing to persistent differentials in price competitiveness, unemployment rates and widening current account imbalances.

Much of the deterioration in competitiveness and the relative competitive positions among EMU countries, is determined by this factor and can be rebalanced by necessary labor market reforms. In EMU environment, the increase in real wages has to reflect partially or totally productivity improvements. In this field, emphasis should also be put on structural reforms in order to accelerate productivity gains, so that wages do not have to bear the whole burden of adjustment. If a labor market in EMU is going to fulfill its crucial role, the needed reforms have to be realized both in its regulatory and institutional environment, as also in its wage determination system.

By this paper, we aim to present the determinants of flexible labor markets and their importance in EMU, and corresponding wage setting mechanisms.

In section 2, we present the role of flexible labor market in EMU as the most important policy instrument at a national level, for the economy's adjustment and a crucial precondition for avoiding costs stemming from participation in the EMU.

Section 3, reviews the main characteristics and the related indicators constructed by international institutions, mirroring the degree of labor market's flexibility used for evaluation of country specific performance over time and international comparisons.

The main determinants conventionally used for wage setting are described in section 4. Their relevance diminishes in wage bargaining process on EMU, to the degree that in some cases they can be abolished.

Section 5, illustrates the Scandinavian model used for wage formation in the Nordic countries. We show that, elements of the above model can be used as a basis for a wage setting framework in EMU, useful in assuring competitiveness and external balance.

The framework for wage setting according to the new pact for euro is pre-

sented in section 6, underlining the strong correlation of productivity gains with wage increases. Section 7, is devoted to formulating a proposition for a flexible wage setting mechanism, appropriate for wage bargaining in EMU's environment.

The three wage bargaining levels and the determinants estimating the room for wage increase, as a norm for wage negotiations, aim to assure job creation based on competitiveness and external balance.

Finally section 8 draws the main conclusions.

2. The role of labor markets in EMU

The policy framework established in EMU, assigns a central role to labor markets. Flexible labor markets are part of total policy mix in Eurozone. These markets functioning, their wage-setting mechanism and wage-bargaining behavior, could affect decisively the level of unemployment and the flexibility by which the wages adjust to shocks.

Because wages are the crucial factor in equilibrating demand and supply in the labor market, wage-setting mechanisms are decisive for equilibrium unemployment and an efficient allocation of labor recourses across economic activities. The wage formation system in EMU countries, suffered from significant shortcomings which could seriously impair the efficient working of EMU (European Economy 2004).

The idea of structural improvements in the functioning of labor markets, has also been embodied in the Lisbon strategy, in order to improve the performance and achieve the twin aspirations summed up in the phrase 'more and better jobs'.

In the EMU, overall nominal wage developments must be consistent with the goal of price stability (European Economy 2004). Excessive nominal wage increases triggers inflationary risks, reduce the price competitiveness and net export performance.

On the other hand, wage moderation reduces domestic production costs and domestic tradable and non-tradable goods prices, achieving competitiveness gains, lowering imports and raising exports. Wage moderation, combined with structural reforms that increase labor supply, employment, activity and domestic demand affect the government budget.

Such reforms, by raising tax revenue and reducing transfers to unemployed households, create room for active labor market policies with positive impacts on real wage employment and economic activity (European Economy 2011).

Because EMU is characterized by a continued emphasis on fiscal discipline, the only 'policy instrument' remaining at the national level is labor markets policies. In this framework it becomes of crucial importance to explore which labor

market structure provides this role of economic stabilizer using nominal wages (Hallett H. *et al.*, 2001). Because a nominal exchange rate devaluation no longer exists, any substantial error on wage-setting would ultimately translate into deteriorating labor market conditions and painful adjustment thereafter (European Economy 2004).

When inflationary wage pressures affect the broader euro-area, they provoke the reaction from the Central Bank by tightening of monetary conditions. But when it is confined to a smaller country, sooner or later it would depress competitiveness and employment in that country via its effects on relative unit labor costs.

Inflexibility of wages, may be more costly in EMU than before in terms of employment. A higher degree of competition which stems from higher price transparency, increases the responsiveness of employment to real wages. In case of adverse shocks, rigid wages would lead to higher unemployment if EMU membership leads to larger demand shocks, because country-specific disturbances can no longer be stabilized by a common monetary policy affecting various member economies differently (Calmfors L., 1998).

An overall wage discipline preserved in the euro area, which improves the overall labor market performance together with price stability as a key requirement adopting euro, created a high degree of sustainable convergence and stability on terms of both prices and wages (Arpaia A. *et al.*, 2007).

Because a nominal exchange rate instrument in EMU can no longer be used for real wage adjustment, structural rigidities coming from excessive wage and non wage labor costs, or also delayed adjustment of real wages, can be detrimental for the economy.

3. A Flexible Labor Market Structure

In a major economic policy regime shift that the creation of Eurozone represents, a flexible labor market is part of this total policy mix. Key behavioral relations have to change and increased wage discipline becomes a common claim making labor market more flexible. Flexible Labor Markets Structure, necessitates convergence and similarities in EMU's countries, despite different historical traditions and institutional peculiarities, and constitutes a ground precondition for efficient functioning of the EMU (Pissarides Ch., 1997; Calmfors L., 1998; De Grauwe P., 2000).

In a long-going debate, a number of labor market characteristics and factors have been accustomed mainly to the flexibility of money wages and the average level of real wages.

These factors, are considered as strongly affecting the rate of equilibrium

unemployment and cyclical sensitivity of the economy in job creation, that is the average unemployment over the business cycle.

Nominal or money-wage flexibility by which wages adjust to shocks and also enhance the economy's ability to create jobs during business cycles, depends mainly on the following factors:

- Hiring and firing regulations. Difficulties in hiring and firing employees by businesses, creates rigidities and negatively affects their ability to create jobs and respond to shocks.
- Minimum wages is another factor affecting negative nominal wage flexibility.
- Centralized collective bargaining creates another type of nominal wage rigidities by setting fixed wage-contract periods. During the contract length period, nominal wages are not changed if unforeseen events occur (Calmfors L., 1998).
- Mandated costs of hiring based on the cost of all social security and payroll taxes and the cost of other mandated benefits.
- Mandated cost of worker dismissal based on the cost requirements for advance notice, severance payments and penalties due to the dismissing of a redundant worker. These policy areas are included in World Bank's and World Economic Forum's Global Competitiveness report, in order to construct indicators of labor market flexibility.

According to estimates for labor market flexibility indicators using panel data for 97 countries from 1985 to 2008, there exists a strong correlation between unemployment outcomes and the above indicators. The correlation between unemployment outcomes and labor market flexibility indicators is in most of the cases negative and statistically significant, with the strongest correlation in the case of hiring and firing regulation and centralized wage bargaining (Bernal-Verdugo L. *et al.*, 2012).

The degree of wage flexibility depending on the degree to which real wages react to fluctuations in equilibrium unemployment and inflation, is considered as a cornerstone for a flexible labor market. The evidence of substantial heterogeneity and asymmetric response of real wage flexibility in upswing and downturn found in empirical literature, explains decisively the EMU countries' different performances in structural unemployment (Arpaia A. et al., 2007; Heinz F. et al., 2011). Without denying the significance of labor-markets rigidities in Europe, there are good empirical reasons for rejecting this convenient belief that labor market by itself provides an adequate story of European unemployment (Solow R., 1999).

To the above mentioned factors affecting nominal wages and constituting the labor market rigidities, we have to add some other factors as the main determinants affecting mainly real wage flexibility according to empirical analysis (Elmeskov J. *et al.*, 1998).:

- The degree of tolerance in unemployment insurance system, related to the generosity of unemployment benefits (the length of the period, the level of benefits, the eligibility conditions).
- Active labor market policies for efficient functioning of labor market, avoiding forms of rigidities as skill mismatches not allowing vacancies and unemployment to coexist.
- Changes in the legal framework of wage bargaining aiming to higher decentralization of wage-setting.
- The tax wedge.
- The strictness of Employment Protection Legislation (EPL).

The implementation of necessary reforms to the above policy areas meets political constraints. The job protection legislation, protects wages and in some cases rents and privileges of insiders at the expense of outsiders seeking employment.

Employed insiders, as a strong majority may block reforms aiming to more flexible labor markets. To overcome resistance to labor market reforms, the role of the coming crisis as a potential catalyst, has been decisive in the implementation of such reforms (Elmeskov J. *et al.*, 1998). Divergences and heterogeneity in the degree of labor markets' flexibility among EMU countries, are due to the lack of structural reforms in some of them on this very important policy area in EMU's framework. Despite the tendency towards a convergence and in contrast to the deregulation on product markets where divergences narrow, there are great differences across countries in the strictness of their regulation.

According to the latest version of OECD's index measuring the stringency of Employment Protection Legislation (EPL) referring to conditions of 2008, despite a similar liberalized attitude since the 90s, broad divergence exists among European country groups: Southern Europe, Nordic countries, Continental Europe and Anglo-Saxon countries, where the southern European countries have the more restrictive regulation and Anglo-Saxon countries the more liberal, associated with higher and lower unemployment rates respectively (OECD, 2010).

These factors seems to explain also the differences in unemployment rates and job creation between Europe and US, where wage formation comes close to being a market process (Siebert H., 1997).

An ever-expanding literature on the effects of stringent EPL, suggests that it contributes to less turnover and job relocation, stronger negative effects on unemployment, when the economy is subject to disturbances and macroeconomic shocks, while the effects on aggregate employment and unemployment over the business cycle are more uncertain (Skedinger P., 2011).

Today's globalized economic environment with rapid technological innovation, places increasing demands on the ability to adapt both business and employees, while at the same time, there is a legitimate need for a safety net for those workers adversely affected by the changing conditions.

4. On the conventional determinants of nominal wage

In the free market economies and mainly in developed countries, the settlement of nominal wages both in public and private sector are the outcomes of a bargaining process between employers and employees. In addition, government wage policies and also policies in related matters such as alterations in the tax rates and social security makes the process more complicated, to be described in terms of linear equations (Peeters M. *et al.*, 2011).

Despite such difficulties, to link straightforwardly the formation of nominal wages to observable determinants, a vast literature with a number of studies based on the wage bargaining model, aims to capture the factors playing a role in the wage negotiation process. Models with testable equations, consider routinely nominal wages as dependant variables relating mainly to the following factors as independent variables. These factors weighted in various model estimations can describe their influence in the wage formation process.

Labor productivity is the most crucial relevant factor, both for nominal and real wage increase. Productivity growth based on real value added growth, divided by employment, reveals differences in the productivity-wage relationship across regimes and gives the upper limit for nominal wage increase in a zero growth of unit labor cost. In a constant unit labor cost the average rate of increase in nominal wages must be equal to the average increase in productivity for the whole economy. Because in every economy, a tradable and non-tradable sector exists in different proportions and also only part of the tradable sector is exposed to international competition, the average rate of productivity is not the most appropriate tool to determine the nominal wage increase in every sector. To sustain competitiveness for every sector of the country, in EMU's economic environment with widespread asymmetries, the average productivity coefficient has to be modified.

Inflation captures the degree of necessary adjustment of wages due to this. Employees seeking price compensation that implies indexation of nominal wages on consumer price inflation (CPI) aims to preserve the purchasing power. As an alternative to CPI, in the process of wage bargaining, in some countries expectant inflation is taken into account by the measure of inflationary expectations. On the other side, employers are guided by producer prices that reflect better changes in productions costs (Heinz F. *et al.*, 2011). By this conventional attitude for full indexation based on CPI or assumptions on expected inflation, regardless of whether or not they are anticipated, real wages do not respond to actual pri-

ces. It is a main source for wage price rigidities relating wages on CPI that are determined by a number of factors not always relative to the adjustment needs. In the EMU when there are asymmetric shocks, the only adjustment route open is via nominal price and wage adjustment (Pissarides Ch., 1997).

Unemployment, is considered as an important determinant in the nominal wage formation. Both the cyclical unemployment rate that measures labor markets' conditions and the structural unemployment, affects employees' bargaining power. Reservation wage reflecting demand and supply for labor over business cycle, varies in time and in different countries' conditions, influenced by factors such as the high unemployment benefits, highly valued informal sector (Peeters M. et al., 2011).

Inside the EMU, unemployment as a factor affecting the adjustment mechanism works with delay. The two adjustment paths, unemployment depressing effects on wages and a rapid labor mobility, do not correspond to the speed of necessary adjustment.

The exchange rate mirroring the external influence on the economy, affects the cost of living usually due to the rising import prices and thus wage negotiations, because CPI inflation cannot fully capture the effects on wages. This is the case for countries outside the EMU. But in EMU with low inflation and single currency, the real exchange rate that is mostly the unit labor cost is the only component that differs among these countries which trade mainly with each other. A trade-weighted real exchange rate should be less important for the above purposes. Serious problems arise in the case of a specific country that is hit by asymmetric or idiosyncratic shocks not common to most of EMU's countries. Outside the EMU the exchange rate bares the brunt of adjustment and adjustment is fast. Inside the EMU prices and money wages must be less sticky than they are outside, to adjust and get the economy to the same final equilibrium, a process that occurs more slowly both in demand and supply shocks (Pissarides Ch., 1997).

The labor market institutions, according to the degree of regulation about bargaining regimes, reflect the centralization or decentralization of collective bargaining process. On such regimes depends the scope created for multi-employer bargaining agreements, for sectoral and single company level framework agreements, introduced by variable payment systems (VPS) linked to measures of performance (Eurofund, 2008).

In the EMU, countries with centralized wage bargaining seem to suffer of substantial nominal rigidities like locking wages into long-term contracts and delayed adjustment periods in comparison to countries with decentralized bargaining systems.

5. The Scandinavian Model of wage formation

Attention has to be given with a brief presentation of the key points of the so called in international literature 'The Scandinavian Model of Inflation', used as a foundation for the nationwide wage and income formation in the past for Scandinavian countries. This model, was first put forward in Norway by a commission under the chairmanship of Odd Aukrust (Aukrust O., 1970). Later the same basic approach has been used in Sweden for the so called EFO model, a report that derives its name from the first letters in the authors' surnames (Edgren, Faxen, Odhner). They were research directors of the country's Salaried Employees (TCU), Employers Confederation (SAF) and Trade Unions Confederation (LO), composed a research group intended to present a report on wage policy (Edgren G. *et al.*, 1969).

The Norwegian model, is a cost push in that it explains prices entirely in terms of cost with no reference to demand, designed for use under Norwegian circumstances with the following facts: small and extremely open economy, with strongly centralized wage negotiations and heavily protected agriculture (Aukrust O., 1966). An important distinction in the model is between exposed industries which market their tradable products abroad, or in the domestic market under strong foreign competition. Exposed industries in small open economies are price takers and accept output prices as given on the world market, having no ability to influence them. These industries are pace-setting in the wage determination process. If their costs increase, they must sustain the whole effect in the form of reduced profits. The sheltered industries in the other hand, are those whose products are non-tradable or tradable marketed at home under conditions that leave them relatively free of foreign competition. These industries will tend to raise output prices when costs increase.

The Swedish EFO model, follows the Norwegian of a two-way classification of exposed and sheltered industries with further subdivisions, based on national accounting material according to the Interstandard Industrial Classification System (ISIC) so called two-digit level. Because no clear-cut line of division exists between exposed and sheltered industries, arbitrary decisions are unavoidable when distinguishing between the two groups in actual model building (Aukrust O., 1974).

Regarding wage formation, it relies on a principal hypothesis that the competitive sector acts as a wage leader and occupies a key position in wage and price developments. This is in spite of the fact that it amounts to a lesser proportion of the total economy. The price increase of the competitive sector on the world market along with the developments of productivity in this part of the economy, together create room for profit and wage increase and it determines the profita-

bility of this sector, that is its ability to earn surplus available for distribution as wages and profits.

How this room or space for increase is divided between business profits and wages, depends on wage negotiations and the extent of wage drift. Since the cost increase is larger that the room for it, results in a certain decrease in operating surplus (Edgren G. *et al.*, 1969). Such a case, threatens the economy's ability to compete and a correction by a change in the exchange rate becomes necessary.

The wage level that is established in the competitive sector, determines the wage level within the sheltered sector. This takes place partly through the market mechanism in which wages move in strong parallel in the different branches of the economy, and partly through the 'solidarity wage policy'. The prices in the sheltered sector are determined by wage level and changes in productivity of this sector.

Wage increase also in the public sector, follows the same principles as in the rest of the sheltered sector, consisting as a part of this sector. Financing needs for wage increase and expansion of the public sector covers by taxes on the private sector of the economy, reducing real wages and profits. By calculating the room which is available for wage and profit increase under the assumption that the international competitiveness of the economy is maintained in an unchanged level, a clear picture is created of the framework in which wage negotiations take place. The basic function of the parties concerned in negotiation is precisely this division of these fruits of production. But they must accept a social responsibility which goes beyond this primary function (Edgren G., 1969).

6. The wage-setting framework in Euro-pact

The widening and deepening economic integration process in EMU, affects not only the functioning of labor markets necessitating a more flexible regulatory framework. The wage-setting framework is also affected.

The regulation of the wage formation process and particularly the collective bargaining and pay outcomes, reflect in a much higher degree the markets' conditions. Because wages account for a significant proportion of production costs for most goods and services, they are crucial compounds influencing inflation persistence, current account imbalances and businesses' or economy's ability to adjust to negative shocks. EMU's countries are no longer able to adjust their nominal exchange rate. They can only compete with their real exchange rates where the main adjustment mechanism is the unit labor cost, meaning nominal wage growth minus productivity growth (Peeters M. *et al.*, 2011).

When EMU countries trade more and more with each other than with economies outside the Union and the real exchange rate differs only in the cost (price) component being the unit labor cost, the nominal wages growth becomes of crucial importance.

The nominal wage flexibility, becomes a key issue for Europe and the need for nominal wage coordination has been put higher in the EU agenda, as an important alternative for adjusting adequately to shocks.

According to the Council conclusions of the EU (March 2011) on 'The Pact for the Euro', nominal wage growth, should evolve in line with the growth rate of labor productivity and competitiveness adjustment needs.

Unit labor costs, will be monitored over a period of time, by comparing development in other euro-area countries and in the main comparable trading partners. Large and unsustained increases, may lead to the erosion of competitiveness, especially if combined with a widening current account deficit and declining market shares for exports. Respecting national traditions of social dialogue and industrial relations, measures to ensure costs developments in line with productivity has to be taken such as:

- Review the wage setting arrangements and where necessary, the degree of centralization in the bargaining process and the indexation mechanisms, while maintaining the autonomy of the social partners in the collective bargaining process.
- Ensure that wages settlements in the public sector, support the competitiveness effort in the private sector (bearing in mind the important signaling effect of public sector wages). Each country will be responsible for the specific policy actions it chooses to foster competitiveness. On the results of these efforts, depends the room for nominal wage increases which should be conducive for the national level of competitiveness. Price compensation implying an indexation of nominal wages on consumer price inflation, should thus not take place according to the euro pact, while nominal wage growth across countries will diverge because productivity growth among these countries may diverge (Peeters M. et al., 2011).

This strong connection of nominal wage growth to productivity growth that the euro pact establishes, almost abolishing the factors affecting real wages level creates a new reality for EMU countries labor markets framework.

Social partners behaviors, wage-setting mechanisms, government wage policies have to adapt to reality and undertake their responsibility share, protecting national productivity as 'the key determinant of the standard of living of the employee population, as well as the distribution of income between labor and capital' (Feldstein M., 2008).

7. A Flexible Wage-setting Framework

7.1 The Wide Economy Level

The combination of intensified competition in global economy and labor-saving technical progress requires flexibility in wages based both on labor market's functioning and wage formation process. In EMU's environment, a complex legislation and institutional conditions intended to make jobs more 'secure', becomes a very static sense neglecting the long-term impacts.

This framework associated with social partners behavior established in the past, move wage formation away from market conditions, preventing it from being a market process, seeking for market solutions.

Based on the contemporary wide spread experience among many countries, an institutional setting with new rules affecting the wage formation process is necessary. In this process, wage rates have to fulfill their clearing and adjustment function of the labor market.

Wage formation process has to be based on a mechanism by which the economy-wide labor market conditions can be internalized, increasing the sensitivity of real wages to shocks. As it has been pointed out by the above analysis, the flexibility of the labor market functioning based on all contemporary regulations described, constitutes a crucial precondition for EMU's economies. This flexible framework also has to be completed with an appropriate flexible wage setting.

By this, an EMU country can create an integrated labor market and wage policy, the most important policy instrument remaining at a national level in the EMU environment. It can be used for macroeconomic policy targets aiming to affect full employment, the rate of growth, the level of inflation, the fiscal and external stability. These targets in EMU environment are in common interest for both sides of social partners, necessitating their responsibility on such matters.

Such a framework mechanism that is to be used for wage setting has to include and be based on the following determinants.

- The room or space for wage increase and the whole economy has to be connected strongly and determined by changes in productivity of the competition-exposed sectors marketing abroad or in the domestic market. Export-oriented or import-competing businesses producing goods and services. Productivity gains reflect more and better goods and services at unchanged cost. This is the main determinant for business profitability, providing the room for wage or profit increase or both. The nationwide average level of productivity is the useful item for the wage-setting framework but can give false results used particularly in sectoral wage setting negotiations. Productivity changes differ between sectors and a sectoral wage setting has to rely on these differences.
- The price increases also in the competitive sector has to be accounted in de-

termining the room for wage increase. To sustain the profitability of this sector –defined as its ability to pay out wages and profits– depends also on world market prices inside and outside the EU's internal market. Many elements usually included in the conventional inflation analysis and wage indexation practices cannot be used for wage setting. Cost increases in the competitive sector, particularly when they reflect exogenous factors, cannot be offset by raising the price of the final product without eroding the sector's competitiveness. If for example cost increases due to the prices of imported inputs like oil prices cannot be surpassed to competitive sector's prices, the room for wage increase has to diminish in order to sustain competitiveness.

• Changes in foreign exchange rate determine also the room for wage increase affecting the economy's competitiveness. In this case the total trade volume of goods and services with other countries has to be weighted by the relative shares and their respective exchange rate changes. An appreciation of common currency to other currencies diminishes the room for wage increase and vice-versa, particularly for sectors traded with these markets. If the main part of exports and imports are marketed in the internal european market, the impact of exchange rate changes diminishes.

A proposition for a flexible wage-setting framework has to rely on the three determinants and can be written as follows.

$$Wr_e = g_c + p_c + e_r \tag{1}$$

where,

 $Wr_e = Wage rate increase$

g_c = Productivity gains in competitive sector

 p_c = Rate of competitive sector's prices change

 e_r = Percentage change in exchange rate

The room for wage increase estimated according to these determinants, constitutes the economy-wide norm and framework for wage settlements. It also allows keeping the nominal wage dynamics consistent with inflation targets. This is the base and precondition to sustain profitability, competitiveness and full resource utilization. This is the framework for wage increase both on sheltered sector producing tradable goods and services and also the public sector. Because the competitiveness of the sheltered sector is usually lower than in the competitive sector, deliberalization reforms in product market regulations are necessary to avoid significant price increases.

Wage increase in the public sector have to follow and be parallel to the rest of the economy, based on the solidarity in wage policy and the principle of equal wage for equal work. But also the need to sustain and strengthen the quality and efficiency of this sector, dependant on qualified personnel.

On the other hand, increased taxes to finance primary government spending, especially the government wage bill for increase in government wages and employment can put upward pressured on private sector's wages by decreasing labor supply or asking for higher pre-tax real wages. Higher labor taxes have negative impact on profits and investment (Alesina A. *et al.*, 2002).

7.2 Sectoral and Company Level

The above centralized nationwide wage setting servicing the purposes and function on this level has to be completed with a de-centralized sectoral and company wage-setting level. A fully de-centralized bargaining system, widespread today in many countries, is the result of a deliberate policy aiming to reduce trade union power, has achieved lower structural unemployment. It corresponds to the need for a more efficient adjustment mechanism and flexible labor market. In a decentralized system of collective bargaining, the relative wages can adjust more readily to industry sectoral and regional conditions, differences and tensions between different sectors reflecting the increased variability in EMU's economic environment. Such a decentralized system has to be organized in two levels on which wage settlements are agreed. The sectoral level in which the room for wage increase based on the sector's profitability conditions agreed between the unions of employers and employees, and the company level between employees and individual employer. Every level reflecting differential in sector's particular company conditions has to carry out and realize different functions in wage-setting process.

In sectoral level the room for wage increase has to be estimated according to the same determinants described above for the nationwide level.

$$Wr_s = g_s + p_s + e_r \tag{2}$$

where,

 $Wr_s = Wage rate increase in the particular sector$

 g_s = Increase in sector's productivity growth rate

 p_s = Rate of sector's prices increase

 $e_{\scriptscriptstyle T}$ = Percentage change in exchange rate

Productivity increase differs between sectors and also the same does sector's prices depending mainly upon the different impulses from abroad and different ties with the international market.

By estimating the particular sector's weighted average of everyone of the above determinants, we can estimate the room for wage increase in this sector. This is the norm and the upper limit for sector's profitability.

Agreed wage changes have to be such as to sustain or restore particular sector's competitiveness and operating surplus for an agreed period of time. If this sectoral wage agreement cannot assure the profitability for some companies in the sector, it is evidence that they face competitiveness and viability problems.

Wage settlements at **company level** indicate the scope based on differentials in skills, occupations, efficiencies and regions providing potential for high degree of adjustment and nominal wage flexibility. Company wage settlements can deviate from sectoral wage settlement due to the wage drift expressing particular company's conditions affecting the above VPS mentioned systems linked to measures of performance.

In addition, the capacity of wages to adjust rapidly, both at sectoral and company level, has to be associated with short-term duration wage settlements and if necessary, greater use of contingency clause in the wage contracts. As such they can be up to twelve months, while the multi-year contracts reveal inflexibility (HM Treasury, 2003).

The above presented three-level wage setting mechanism, aims to ensure the responsiveness of nominal and real wages that reflect new and changing demands in EMU environment, consistent with better cyclical performance of the labor market. Since every flexible system implies real wage reductions where it is necessary, downward nominal rigidities meet employee's resistance and employer's reluctance to impose them for fear of lowering employee's morale and productivity (HM Treasury, 2003).

A successful implementation has to go in parallel with the establishment of a system based on flex-security principles, appropriate fiscal equivalent measures associated with diminishing to the least the regulating product markets.

Policies and measures included in this system have to be designed to support the effective and flexible functioning of labor marketing and not undermine it by sustaining rigidities like real wage resistance or reducing incentives to participate in labor market.

8. Conclusions

The need for flexible labor markets as a crucial precondition for countries participating in the EMU has been recognized as a common claim both in the extended related economic literature and also the implemented policies by EMU countries.

It is considered as the most important policy instrument available at national level for responsive national economies and adjustment to economic shocks. A lack of sufficient labor market flexibility can be a source of potential costs for countries joining the EMU.

Labor market flexibility is related to the functioning of the market and its wage formation or wage setting process. The abolishment of rigidities based on an inefficient system of rules and regulations has been exhaustively researched by European and international experience.

Labor market strictness or flexibility has been expressed on EPL indicators measuring the degree of flexibility and reflecting country performance over time and allowing inter-country comparisons.

On the other hand the flexible wage setting necessitates also the abolishment of most of the conventional tools, determinants and social partners' behaviors on which wage formation has been based in the past.

According to the framework that the pact for euro establishes, productivity gains seem to be almost the only determinant for wage setting. In a stable price environment, consistent with the ECB inflation target and fixed exchange rate for Inter-European trade, this proposal puts the real base on which a flexible wage setting has to rely on. In line with this, the Scandinavian model used in the Nordic countries for wage settlements contains also some useful tools for a more operational and flexible wage-setting mechanism.

The most important tool is the distinction between the competitive and the sheltered sectors and also the leading role of competitive sector as the main determinant for this mechanism.

In this background and with the above experience we have to formulate a framework for a flexible wage setting mechanism, a necessary supplement to the flexible functioning of the labor market.

The three-dimensional level of wage bargaining servicing different functions and purposes, as has been analyzed, is necessary.

Relying on the same basis and similar determinants modified to reflect EMU reality, the estimation of the room for wage increase is the other side of this wage setting framework. These estimations can be used in every level of wage negotiations as a norm for wage increase, providing flexibility in wage setting. This can be a useful instrument, easily measurable and observable for wage policy. It also aims to assure the competitiveness in national, sectoral and company level as the most important precondition for external balance and job creation.

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