ISSN: 2146-4138 www.econjournals.com

# Is There Life After 'Death' for the Greek Economy?

#### **Constantinos Alexiou**

Cranfield University, School of Management, UK. Email: <a href="mailto:alexiou1967@gmail.com">alexiou1967@gmail.com</a>

### Joseph Nellis

Cranfield University, School of Management, UK. Email: j.g.nellis@cranfield.ac.uk

ABSTRACT: The on-going and seemingly endless financial crisis within the European union in conjunction with the austerity measures implemented by a number of member states, have caused a great deal of speculation to emerge regarding the appropriate policy responses needed to put the already derailed economies back on track. In this context, price competitiveness is looked upon as the key factor that has to be positively affected if the conditions for sustainable economic recovery are to be established. We examine the role of a number of key variables such as wage cost, inflation, profit margins and the euro in relation to competitiveness as well as focus on fluctuations in the Greek unit labour costs over time, in comparison with 35 industrialized countries both inside and outside the Eurozone. We address the question: is there a meaningful economic future for the Greek Economy? We find that in relative terms Greek labour costs cannot be held solely responsible for the country's critical economic situation. We also stress that to lay all the blame at the foot of the Greek workers is wrong and is not supported by empirical evidence. Responsibility must also rest with the corporate sector given that businesses have enjoyed high profit margins overtime. There must be a rebalancing in the distribution of income if the Greek economy is to be pulled out of its crisis.

Keywords: Financial crisis; unit labour cost; competitiveness; Greece

JEL Classifications: E42; F13; F33

#### 1. Introduction

The economic crisis that was ignited in 2009 has ushered in an era of economic stagnation and social misery across much of the EU region that could last for a generation or more. As a result, governments in the recession-stricken Eurozone are struggling to find a viable way out of what is perceived to be the worst economic turmoil since the establishment of the EU. The economies of the so-called PIIGS (Portugal, Ireland, Italy, Greece, and Spain) have seen their national incomes shrink at an alarming rate for more than four years.

As far as macroeconomic policy is concerned, contemporary EU analysts who are strongly influenced by a neoliberal agenda have been swift to propose expedients that hopefully will put the worst afflicted economies back on a recovery track. In particular, given the limitations imposed by Eurozone membership (inability to devalue, fiscal rigidity, loss of monetary independence), the only adjustment mechanism available must come through the labour markets. In other words, labour costs are too high, given the labour productivity levels in those countries. A number of economists have concluded that closing the 'competitiveness gap', in particular vis-à-vis stronger trading partners such as Germany, requires 'internal devaluation'- i.e. downward adjustments in relative wages in the worst recession-stricken countries (Black, 2010).

In this context, this paper focuses specifically on the origin of the Greek crisis, perhaps the most seriously afflicted of the EU countries. The primary purpose is to investigate the effects of unit labour costs in relation to price competitiveness by exploring key variables responsible for determining the price at which Greek products compete in international markets. We argue here that the prevailing notion that price competitiveness in Greece has deteriorated mainly due to a misalignment between wage increases and labour productivity should not be exaggerated. In particular, it is proposed that the combination of additional factors such as high profit margins and

appreciation of the euro have also contributed to the deterioration of competitiveness. Based on analysis of the fluctuations of several key economic indicators over a number of years prior to the outbreak of the economic crisis, we argue that the current neoliberal recipe for economic growth centred on the need for policies to boost labour market productivity and competitiveness, could be perceived as a 'leap of faith' and, hence, could be inherently flawed.

The rest of the paper is organized as follows. In the next section we set out some of the key theoretical considerations concerning international competitiveness including the importance unit labour costs and labour productivity. In section 3, we attempt to make sense of the Greek crisis by examining the role of a number of key variables such as wage cost, inflation, profit margins and the euro in relation to competitiveness. In section 4 we provide some concluding remarks and stress the need for a more comprehensive assessment of Greek competitiveness – rather than one based solely on labour market factors – if appropriate policies for recover are to put in place.

#### 2. Theoretical Considerations

International competitiveness is a concept in economic theory that has attracted considerable attention for many years. In the simplest of terms, international trade theory posits that goods produced using relatively cheaper inputs command lower prices and therefore can be more competitive than the same goods produced elsewhere. In other words, a country with relative input abundance will have a comparative advantage over its trading competitors. However, this simplistic approach has obscured the very elements that render international competitiveness a key variable that policy makers as well as other stakeholders in society have to take into account. One such simplification is the perception that markets are perfectly competitive and through the market mechanism, a market-clearing price will be determined. As a result all effort has been expended in trying to establish this market-clearing price.

For Schumpeter (1943) the true struggle of businesses operating in capitalist economies is not price competition but rather technological competition. In the same line of argument Dosi (1988) postulates that technology is cumulative and context dependent in that it could prevent an automatic realization of the benefits resulting from innovation. Realistic as the latter may sound, it does not however undermine the instrumental role that diffusion has on competitiveness and growth especially in the so-called latecomer countries (see Fagerberg and Godinho, 2004).

Broadly speaking, unit labour costs are defined as the ratio of workers' money wages or total compensation to labour productivity. Expressed in algebraic form:

$$ulc = w_n / (\frac{q}{L})$$

where  $w_n$  denotes total labour compensation, q is physical output, and L is employment (e.g. number of workers).

From the firm's point of view, unit labour cost is a significant variable as it reflects the relationship between the cost of labour and labour productivity. Negative economic growth due to increasing unit labour costs calls for measures to boost productivity and/or curb wages.

In choosing a proper measure of unit labour cost, factors relating to output and input issues should also be taken into account. More specifically, high wages may have totally different implications for high or low productivity sectors respectively. In sectors characterized by low productivity, high wages are bound up with costly production and uncertainty over long-run profitability. In contrast, high productivity sectors can be impervious to higher wages in so far as the latter are compensated by higher output levels per person and hence leaving long-run profitability intact. In effect, comparing a measure that takes account of output and inputs versus only the cost of the inputs can have significant misleading ramifications in further economic modelling. On the one hand, measures aimed at boosting productivity are likely to be subject to time lags in terms of their impact. The existing literature on the determinants of productivity suggests that even though factors external to the firm and factors attached to management control play a key role in conditioning productivity, there is not a clear empirical consensus as to which is the most significant (Syverson, 2010). However, there is a degree of consensus that boosting productivity requires reforms in the labour markets (Allard and Everaert, 2010).

On the other hand, decreasing nominal wages as a means of stimulating productivity entails a multitude of psychological and legal issues (Blanchard 2007). Why should workers in countries with

excessively high unemployment be willing to support firms' competitiveness by accepting lower nominal wages? The commonly-argued neoliberal recipe for economic growth, underpinned by the belief that labour market policies are needed to boost competitiveness, can readily be challenged on the basis of a lack of empirical evidence on the precise relationship between an increase in unit labour costs and economic growth. In contrast, Kaldor (1978) shows that even countries that have experienced dwindling competitiveness alongside rising unit labour costs have still enjoyed increases in their share of international trade and growth - the so-called *Kaldorian paradox*. It is therefore a flawed argument to suggest that there is a clear-cut significant mechanism through which nominal wages affects competitiveness and thereby economic growth. Furthermore, Kaldor (1970, 1971) argues that it is world demand and the international competitiveness of exports that affect the growth rate of exports and through this the growth rate of an economy. Earlier empirical analysis by Fagerberg (1996) supports the *Kaldorian paradox* and concludes that the widely held view that growth in unit labour costs determines international competitiveness is at best too simplified. Similar results are found by Meliciani (2001) based on more recent as well as longer time series data.

Additional factors, such as the methodology used to compute unit labour costs and the role of unit labour costs should also be considered before we arrive at a definitive explanation on the causes of competitiveness. More specifically, using equation (1) above to calculate unit labour costs may be inherently flawed in the sense that the measure of aggregate output is not a physical quantity but rather the economy's value-added (i.e. the economy's labour share of output times a price effect). At a firm level this might well be the case but at the national level an aggregate price deflator has to be used in the calculation of unit labour costs.

In addition, the ratio of the nominal profit rate to capital productivity (i.e. the unit capital cost) could also be worth exploring – in other words, a disproportionate rise (fall) in profits relative to the productivity of capital could cause competitiveness to fall (rise). It is in this sense that a discussion of the functional distribution of income between labour (wages) and capital (profits) - the *Kaldorian paradox* - can potentially offer additional insights into the current debate on competitiveness by focusing on the consequent effects on aggregate demand. These effects seem to have been 'conveniently' overlooked in the context of the global financial crisis, particularly in discussions concerning the policies and prospects in relation to the Greek economy.

To sum up, the excessive focus on rising unit labour costs, as the primary cause of the Greek crisis is not supported by earlier research. There are many contradictory studies concerning this matter – due attention must be given to the *Kaldorian paradox* in that examples are readily available of countries with rising labour costs *and* sustained economic growth. But the question remains as to how Greece has found itself in such a perilous economic state, which is expected to last for many years into the future. What has gone wrong in Greece and what are the lessons for other EU countries? We now turn to address these questions.

### 3. Making Sense of the Greek Crisis

The on-going financial crisis in conjunction with the austerity measures implemented by a number of EU countries, have caused a great deal of speculation to emerge regarding the appropriate policy responses needed to put the already derailed economies of Europe back on track. In view of the quest for economic recovery and sustained economic growth, price competitiveness is looked upon as a key-determining factor for those countries most severely affected.

Over the last two decades, policy makers in Greece have been trying to improve the country's competitive position *vis-à-vis* other competing nations, primarily by constraining growth in unit labour costs. These efforts however have been in vain. The competitive position of Greece has not been improved and furthermore the policy prescriptions put forward to deal with the punitive effects of the financial crisis have had detrimental effects, sinking the economy into even deeper recession. The views of Hoffer and Spiecker (2011), published by the International Labour Organisation, encapsulate the currently popular neoliberal philosophy concerning the importance of unit labour costs as a determinant of competitiveness:

"With the Euro, balanced trade requires that wages in all member states grow in line with national productivity plus the targeted inflation rate of the ECB. Otherwise counties with relatively higher growth in unit labour costs will systematically lose market share and build up trade deficits. The case for a coordinated wage policy to avoid imbalances, beggar thy neighbour policies and a waste of

potential growth is overwhelming: it is alarming that it has been ignored for so long. Those who let unit labour costs rise too fast are equally responsible for the explosion of imbalances after the abolition of the exchange rate mechanism as those who gained market shares through wage restraint"(p.2).

The rationale behind this view resides in the belief that the effect of restraining wage increases below the rate of productivity growth will increase employment levels – thus contributing to the resumption of economic growth and the achievement of higher employment levels.

In view of the above argument, on the surface countries such as Germany would seem to have been pursuing employment-generating wage policies - but a more pragmatic observation suggests that German wage increases have remained well below productivity growth over the last ten years. In conjunction with this, the relatively more dynamic growth pattern of the German economy has undoubtedly helped to increase Germany's relative competitiveness vis-à-vis countries in Southern Europe. In addition, public policy has been further consolidated through far-reaching institutional reforms, such as increased labour market flexibility, i.e. wage bargaining. For more on the link between flexible wage bargaining and a higher level of employment, see for instance Calmfors and Driffill (1988); Blanchard (2006).

In light of the German experience, the rescue plan that has been imposed on Greece by the so-called *Troika* (ECB, EC, and the IMF), hopefully, to save the country from bankruptcy and collapse (as well as the wider EU) could be viewed as merely a mediocre makeshift policy directive, aimed at improving the nation's competitiveness – but the danger is that it will also compromise the standards of living for the bulk of the working population for many years to come.

Controversially, this novel austerity package could simply be regarded as a set of hastily constructed rules on the basis of which wages in both the public and private sectors have to be cut considerably alongside fundamental reassessment of labour rights in Greece. But many observers, both inside and outside Greece, have passionately argued that the new bailout package is destined to fail, weakening further the already decimated Greek economy, locking it thus in a vicious downward cycle of debt and deficit – a 'lost decade' is absolutely inevitable.

The dogmatic implementation of policies tailored to reduce labour costs in order to improve the competitive position of the weakest economies has been fervently pursued by EU powers (centred in Germany). More specifically, economies such as the Bulgarian, Romanian and even those in the Baltic region have been incessantly used in the current debate as success stories of wage discipline. It is worth stressing however that the advocates of 'wage discipline' appear to ignore the adverse impact of the punitive policies that have been religiously adhered to for many years now in these countries – they have endured rising poverty rates, widening income disparity and economic stagnation as a consequence of such policies.

The prevailing neoliberal economic dogma perceives efficiency as the key element those contemporary economies should posses in order to compete effectively in world markets. It is in this sense that improving cost competitiveness will enable troubled economies to come out of economic stagnation and pursue growth. This view, however, fails to recognise the different ways that competitiveness can be judged (for example, on the basis of internal market competitiveness, external price and cost competitiveness as well as competitiveness based on growth).

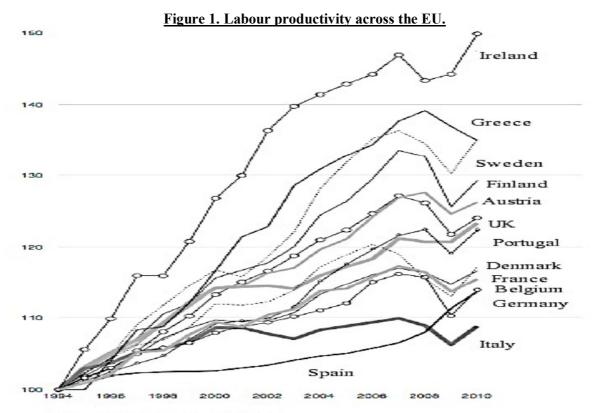
We now turn to explore the issue of competitiveness across the EU and in particular countries such as Greece, not based narrowly on unit labour costs, but more broadly to embrace factors such as labour productivity and wage costs, inflation, euro membership, profit margins etc.

## Labour Productivity and Wage Costs

At the outset, it is worth highlighting the fact that between 1996 and 2004 the Greek economy enjoyed sustained economic growth. The prime factor responsible for this underlying boost in economic activity was the hosting of the Olympic Games which, in conjunction with the increased public spending and the increased inflow of financial resources form the EU, depressed the real cost of borrowing in the capital markets. The main characteristics of the emerging economic environment were considerable increases in real wages, private consumption, investment activity, capacity utilization and profitability. As a result, labour productivity during that period increased by 30 per cent, registering not only as one of the highest levels amongst the developed countries of the EU but standing amongst the highest levels internationally. Figure 1 maps out labour productivity for a number of EU countries, including Greece, from 1994-2010. It will be seen that productivity improved

significantly across EU countries up until the onset of the financial crises in 2007/08. Greece and Ireland enjoyed the highest growth in productivity over this period compared to the rest of the EU.

The performance of Greece in relation to labour productivity needs to be considered in relation to wages. Arguably, long-term realignment between wages and labour productivity is contingent upon the bargaining power of workers *vis-à-vis* businesses (Layard, Nickell and Jackman 1991, Rowthorn 1977, Carlin and Soskice 2006). Similarly, Ball and Moffitt (2001) as well as Stiglitz (1997) suggest that there might be a significant time lag involved in the process of realignment between workers' demands for higher wages and changes in labour productivity. It is therefore possible to observe long spells during which wage demands and productivity are not fully synchronized, causing distorting effects in unit labour costs.

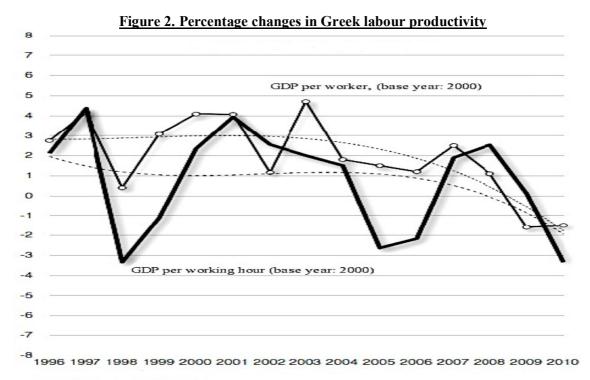


Source: AMECO Database, European Commission

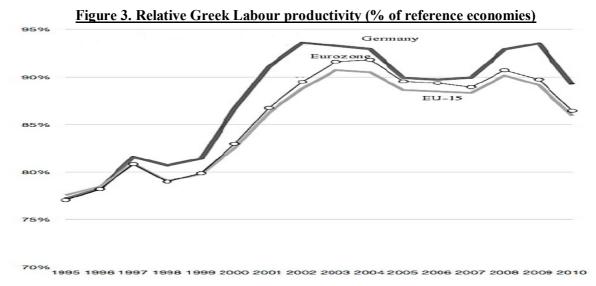
As illustrated in Figure 2, 2004 was a turning point for the Greek economy. The figure maps out GDP per worker as well as GDP per working hour from 1996. It will be seen that labour productivity started to slow down in that year, only to get worse thereafter. We argue that this decline, in the main, was due to the contractionary policies imposed by the country in an attempt to deal with the burgeoning debt crisis.

It may be worth noting that, according to the Greek Labour Institute (GLI, 2011), Greek investment in productive capital declined causing productivity to fall by approximately 6% compared to the previous period (1997 to 2000).

Prior to 2008 the Greek economy continued to report positive GDP growth, largely as a result of growth in the financial sector's balance sheets which, in conjunction with dwindling long term borrowing rates, stimulated both private consumption and household demand for housing. As inflation picked up, the real cost of borrowing fell sharply, stimulating further the demand for loans in general and especially for mortgages.



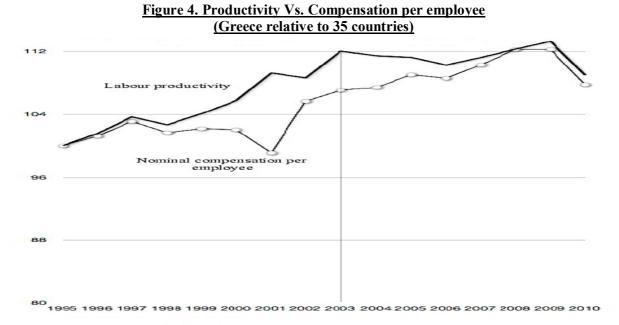
Source: AMECO Database, European Commission



Source: AMECO Database, European Commission

Figure 3 compares the performance of the Greek economy in terms of labour productivity to that of Germany, the Eurozone as well as the EU-15 as a whole. This comparison is made by computing the ratio of the Greek performance to each of these respectively. It will be seen that during the period 1995-2002, productivity grew in Greece at a much quicker pace than in the other regions. From 2002 to 2008, the productivity gap between Greece and the euro area, EU-15 and Germany narrowed. In other words, productivity growth in Greece moved in tandem with the reference regions/countries as shown. It should be stressed that while the level of Greek labour productivity has remained below that of the reference regions/countries throughout, changes in productivity have been more of less in parallel – Greece has not reported any significant variations in labour productivity relative to the EU as a whole.

In the build-up to the financial crises (from 2001) nominal wages in Greece grew at a much quicker pace in comparison with other EU countries, causing unit labour costs to increase substantially – see Figure 4 which traces out productivity and compensation per employee relative to 35 reference countries which account for a substantial proportion of international trade with Greece (EU member states plus selected OECD countries as reported by the AMECO Database).



Source: AMECO Database, EC

Greece reported an impressive resulting growth in productivity, which was as much as 12 percentage points above that reported by the group of reference countries over the period 1995-2003. However, as will be seen from the figure, employee compensation (nominal wage costs) increased faster than labour productivity after 2001 and up to the onset of the crises. Anecdotally, it could be argued that this acceleration in wage costs from 2001 onwards relative to labour productivity, was a contributory factor in explaining the particularly severe crisis which has impacted Greece recent years – but other factors must also be taken into account. Many commentators have highlighted the convergence of wages in Greece with those in Germany- however; this is mainly due to the wage-retention expedients imposed by the German administration rather than increases in Greek wages *per se*. We shall discuss this issue further once we have examined the potential contribution made by other factors.

#### **Relative Inflation Rates**

Another factor that must be considered relates to relative inflation rates across EU member states in the period preceding the financial crisis. The prices of domestically produced goods and services in Greece grew rather strongly in 1995 registering about 7.5%. Figure 5 maps out Greece's GDP deflator relative to that for Germany and Italy (two of the country's most important trading partners) as well as relative to the Eurozone and the EU-27 countries as a whole from 1995 onwards. It will be seen that cumulatively over the period 1995-2009, the change in prices of products in Greece as measured by the GDP deflator, rose by about 55% and 19% more than those in Germany and Italy respectively. Responsibility for this widening disparity of inflation rates does not lie solely with the Greek administration – a strong anti-inflationary stance within the context of the single market and the euro has given countries such as Germany a major competitive advantage over countries such as Greece. This begs the question concerning the allocation of responsibility and the sharing of the burden of adjustment stemming from membership of the euro.

Figure 5. GDP deflator, 1995=100

Relative to Germany

Relative to Eurozone

Relative to Eurozone

Relative to Eurozone

Relative to Eurozone

120

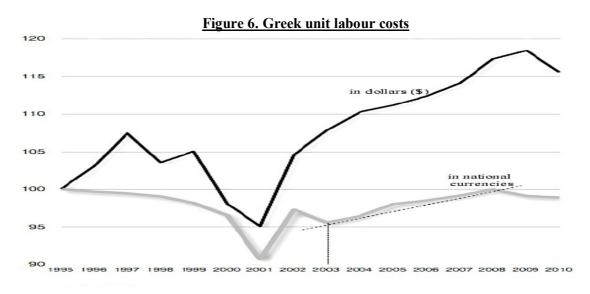
Relative to Italy

Source: AMECO Database

### Euro Membership

An additional factor that has to be also considered in making sense of the Greek crisis is the impact euro membership on competitiveness with respect to unit labour costs. In general, unit labour costs of different countries can be compared on the basis of one currency - for instance dollars. However, when establishing the extent to which wage demands affect labour cost competitiveness then unit labour costs should be compared in national currencies, ensuring thus that any wage increases are not the result of exchange rate fluctuations. It could be erroneous therefore automatically to assume that unit labour cost differentials are mainly due to excessive wage demands - we must also take into account movements in the currency (in this case the euro) against the currencies of other trading partners.

In other words, to draw meaningful conclusions on the impact of wage demands on price competitiveness, one should consider using the national index of unit labour costs in national currencies, given the geographical and sectoral distribution of each country's external trade, so that the index is not affected by changes in national exchange rates. If cost differentials are largely attributable to adverse changes in exchange rates, then the burden of adjustment has to be shared by all stakeholders, rather than by workers alone on the basis of reduced labour costs.



Source: AMECO Database

Figure 6 illustrates the national index of unit labour costs for Greece over the period prior to euro membership and the financial crisis, reported in \$US and relative to the average relative to 35 reference countries (in national currencies, including the euro from its inception).

The following key points can be identified from this graph:

- Prior to the birth of the euro, Greek unit labour costs were falling sharply in US \$ terms and in comparison with the average for the 35 reference countries.
- From 2001 onwards, unit labour costs rose sharply in US \$ terms while Greece did not adopt the euro until 2003, its former currency (the drachma) was tightly linked to the euro which itself was increasing in value against other major currencies.
- During the period 2004-2008 Greek unit labour costs rose by 5 percentage points more than the group of 35 reference countries – but this relative increase can largely be explained by the appreciation of the euro as well as changes in the geographical composition of external trade of Greece.

It is therefore speculative to claim that the competitiveness of the Greek economy has deteriorated sine 2001 on the basis of excessive wage demands by employees alone - movements in the euro exchange rate vis a vis other currencies such as the US\$ must also be given due weight.

# Profit margins

In general, price determination is a function of the cost of labour and the return to capital (profit margin) for a given cost of land. Within neoclassical economics, the role of profits in affecting competitiveness is totally disregarded, in that unit labour costs are treated as the sole variable that affects competitiveness. We would argue, however, that profit margins do play an instrumental role in determining competitiveness, particularly in the context of the EU and the euro.

As far as profit margins are concerned, an inspection of Figure 7 suggests that apart from Ireland, Greece enjoyed the highest profits margins amongst the EU-15 economies during the entire period 1995-2009. It is worth noting that even during the crisis in 2010, despite the dwindling average profit margins in the EU region, companies in Greece along with those in Ireland, Germany and Spain managed to maintain profit margins at relatively high levels. In Greece, the relatively high levels of profit margins can be attributed to increases in labour productivity offsetting the increases in real labour costs.

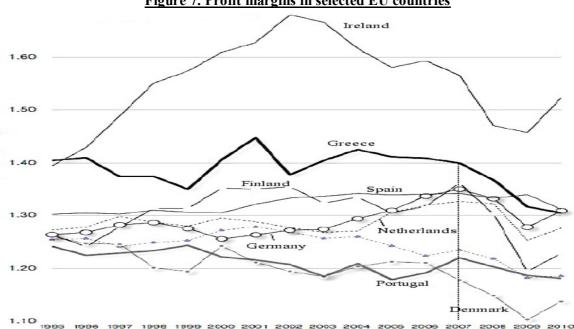


Figure 7. Profit margins in selected EU countries

Source: AMECO Database

According to Figure 8, movements in Greek real labour costs and labour productivity follow very similar patterns. Given increases in both consumer prices and labour productivity, nominal wages had to be adjusted whilst at the same time businesses raised their prices in order to maintain stable profit margins.

Figure 8. Greek real labour costs and productivity

Source: AMECO Database

Furthermore, in comparison to 35 competitor countries, profit margins in Greece have generally been lower (see Figure 9) reflecting the disproportionate increase between labour productivity and average gross earnings. It would be therefore difficult to argue that such a small decrease in profit margins had any significant impact on the price competitiveness of Greek products. Price competitiveness must be considered in terms of the joint contribution of profit margins and unit labour cost – in conjunction with the impact of changes in exchange rates (i.e. the euro). We discuss this below.

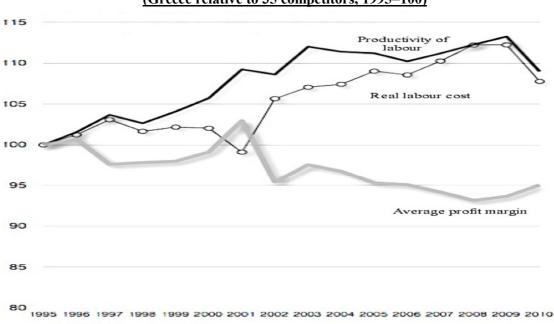


Figure 9. Labour productivity, labour costs and profit margins (Greece relative to 35 competitors, 1995=100)

Source: AMECO Database

### **Decomposing Greek Price Competitiveness**

International price competitiveness is a function of the interaction between three components - cost, profit margins, and exchange rates. Within this framework it is envisaged that price competitiveness in Greece improves when one or more of the following occurs:

- a) when profit margins in Greece decrease;
- b) when profit margins in competitor countries increase;
- c) when the rate at which unit labour costs in the competitor countries denominated in their national currencies increase by more than in Greece, or
- d) when the euro appreciates relative to the national currencies of the competitor countries.

Previously, we have explored the first three of these components. In order to investigate the impact of movements in the value of the euro on Greek competitiveness we map out movements of the country's real effective exchange rate over time *vis a vis* in comparison with the other *PIIGS* economies as well Germany - see Figure 10.

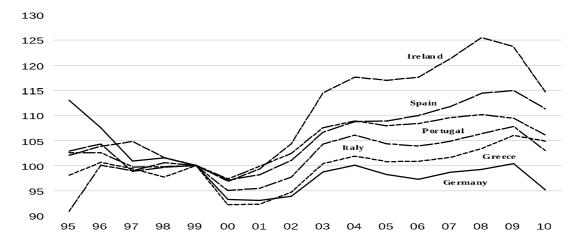


Figure 10. Real Effective Exchange Rates (REER)

Source: AMECO Database

Since the birth of the euro (with the denomination of government bonds in euros in 1999) Germany has enjoyed a REER lower than that of any of the PIIGS – all of whom have faced considerable financial and economic crises in recent years. This suggests that the maintenance of low inflation in Germany combined with its pattern and nature of trade has given it a significant competitive advantage relative to the struggling economies in the Eurozone. In other words, membership of the Eurozone had offered considerable benefits to Europe's strongest economy.

Furthermore, it could also be argued that the deterioration of the price competitiveness of Greek products was to a large extent due to the appreciation of the euro, which made the country's products (goods and services) more expensive, undermining thus Greece's competitiveness internationally. The resulting loss in competitiveness could have been offset by adjustments in both profit margins and/or unit labour costs, but it would seem that none of the key players – businesses and workers - were willing to compromise their income shares in GDP.

As we showed earlier, businesses maintained relatively high levels of profit margins whilst workers pursued an alignment of their purchasing power earnings to the average of most developed EU economies.

### 4. Concluding Remarks

The on-going economic and financial crisis has sparked off debate concerning not only the consequences for the future of the country but also a search of the underlying causes of the crises in order that appropriate policies for the restructure of the economy may put in place.

The purpose of this paper has been to investigate the interrelationships between productivity, unit labour cost, profit margins and real effective exchange rates as the source of the Greek crisis. We would stress that to lay all the blame at the foot of the Greek workers is wrong and is not supported by

empirical evidence.

While the workforce must share some of the burden of adjustment towards a more sustainable competitive position, is important to highlight the disproportionate rise in profits enjoyed by companies. At the same time, the competitiveness of Greece should also be viewed relative to the exceptional competitiveness of Germany. Membership of the euro has resulted in significant benefits for the German economy particularly as the country succeeded in maintaining exceptionally lower inflation as the euro appreciated in foreign exchange markets.

It may also be postulated that, given the highly competitive environment that emerged after the adoption of euro, Greek firms were willing to sacrifice only a small percentage of their profit margins in exchange for price competitive gains. Compared to the rest of the EU-15 countries, profit margins in Greece were amongst the highest even after the adoption of the single currency. Businesses, instead of bearing the burden of the adjustment required to compete internationally, sought to pass the burden on to workers i.e. wage reduction. Despite their intentions, it wasn't until the onset of the crisis that they actually managed to do so. It could also be argued that the contribution of unit labour cost to competitiveness has been less pronounced that previously argued.

This paper is intended to serve as a platform for future debate concerning the future of not only Greece but also the future of the other stricken economies in the Eurozone. Each country must assess for itself the extent to which responsibility for their future prospects and a return to a more internationally competitive position lies with the work force (through more flexible wages), the corporate sector (through lower profit margins), and the government (through tighter fiscal controls).

The impact of the euro on competitiveness alongside the role of the ECB and the use of interest rate to control inflation should not be underestimated. Membership of the euro has restricted Greece's ability to a large extent to shape its own destiny. Given the economic and political *impasse* across the Eurozone, a range of different policy options could be considered as a means of coming out of the crisis. The ongoing 'internal devaluation' expedients that have been proposed by the troika and effectively implemented by the recession stricken economies have caused both nominal and real wages to dwindle substantially in Greece. The hoped-for emerging stable economic environment will however be further compromised by the crippling effects of the continuing recession. The cost of pursuing such a policy option is likely to outweigh any benefits, as wage depression will have an adverse effect on aggregate demand – as well as social stability. In addition, trying to compete with the stronger economies of the Eurozone (particularly Germany) might prove to be rather ineffectual as Germany's basket of exports is totally different from that of Greece's as well as the rest of the PIIGS. Hence, looking upon reductions in unit labour costs as the only way to improve and effectively restore price competitiveness is a notion that has to be urgently reassessed.

To avoid a disorderly breakup of the Eurozone will require radical reforms of its architecture. More specifically, measures to allow a greater role for a much more active fiscal policy should be put in place. At the same time a comprehensive strategy aiming to enhance the living standards of the peripheral economies has to be boldly devised so that the Eurozone economies grow in stature and achieve real convergence. Prolonged pursuit of punitive austerity measures can only undermine the quality and economic viability of the euro. At the same time, it is imperative that the Eurozone economies are capable of competing in the globalized environment and, therefore, appropriate restructuring is inevitable. However, we do not suggest that this is going to be an easy process. What the Eurozone needs to succeed is a long-term policy agenda devoid of any quick-fix and short-lived expedients that are destined to fail.

### References

Allard, C., Everaert, L. (2010) Lifting Euro Area Growth: Priorities for Structural Reforms and Governance. Staff Position Note, SPN/10/. Washington, DC: International Monetary Fund.

Ball, L., Moffitt, R. (2001) Productivity Growth and the Phillips Curve, National Bureau of Economic Research, Working Paper Series No. 8421.

Black, S.W. (2010) Fixing the Flaws in the Eurozone. VoxEU.org. Accessed November 23, 2010. Available at <a href="http://www.voxeu.org/index.php?q=node/5838">http://www.voxeu.org/index.php?q=node/5838</a>

Blanchard, O. (2006) European Unemployment: The Evolution of Facts and Ideas, Economic Policy, 21, 5-59.

- Blanchard, O. (2007) Adjustment within the euro. The difficult case of Portugal. Portuguese Economic Journal, 6(1), 1-21.
- Calmfors, L., Driffill, J. (1988) Bargaining Structure, Corporatism and Macroeconomic. Performance, Economic Policy, 6, 14-47.
- Carlin, W., Soskice, D. (2006) Macroeconomics: Imperfections, Institutions and Policies, Oxford University Press.
- Dosi, G. (1988) Sources, Procedures and Microeconomic Effects of Innovation, Journal of Economic Literature, 26, 1120-71.
- Fagerberg, J. (1996) Technology and Competitiveness. Oxford Review of Economic Policy 12(3), 39–51.
- Fagerberg, J., Godinho, M. (2004), Innovation and Catching-up, in Fagerberg, J. D. Mowery and R. Nelson, Oxford Handbook of Innovation, Oxford University Press, Oxford.
- Greek Labour Institute (2011) Outlook for the Greek Economy, Report.
- Hoffer, F., Spiecker, F. (2011), Change or Lose Europe: ILO Global Job Crisis Observatory, Geneva: International Labour Office.
- Kaldor, N. (1978) The Effect of Devaluations on Trade in Manufactures, in Further Essays on Applied Economics, London: Duckworth.
- Kaldor, N. (1971) Conflicts in National Economic Objectives, Economic Journal, 81(321), 1–16.
- Kaldor, N. (1970) The Case for Regional Policies, Scottish Journal of Political Economy, 17(3), 337–348.
- Layard, R., Nickell, S., Jackman, R. (1991) Unemployment. Macroeconomic Performance and the Labour Market, Oxford University Press.
- Meliciani, V. (2001) Technology Trade and Growth in OECD Countries. Does Specialization Matters? London: Rutledge.
- Rowthorn, R. (1977) Conflict, Inflation and Money, Cambridge Journal of Economics, 1(3), 215-239. Schumpeter, J. (1943) Capitalism, Socialism and Democracy, New York: Harper.
- Stiglitz J. (1997) Reflections on the Natural Rate Hypothesis, Journal of Economic Perspectives, 11(1), 3-10.
- Syverson, C. (2010). What determines productivity?, NBER Working Paper No. 15712.