The Political Economy of the Euro

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Abstract

The Eurozone's present state of crisis originated from decisions made at its creation. The decision to create a monetary union was motivated by political objectives and completely disregarded the economics of a monetary union. Political leaders did not understand the necessary economic conditions for a successful monetary union and did not recognize the inherent fragility of the monetary union they established. They showed the same disturbing lack of understanding of the economics of the sovereign debt crisis in 2010. They misdiagnosed the problem, and their response included disastrous decisions that intensified the crisis. This review explains these errors and concludes with recommendations for saving the euro.

INTRODUCTION

The Eurozone experiences an existential crisis. Its future is far from guaranteed. In this review, I discuss the political economy of the creation of the euro and the management of the crisis in the Eurozone. I highlight first how the interaction between political objectives and economic realities made the euro possible, second how it led to the establishment of an inappropriate governance, and finally how it contributed to deep failures in the management of the crisis. I conclude with a few reflections on what should be done to put the Eurozone on a sustainable path.

POLITICAL ECONOMY OF THE CREATION OF THE EURO; THE DOMINANCE OF POLITICAL OBJECTIVES

During the 1960s and 1970s, economists developed a theory that is now known as the theory of optimal currency areas (the OCA theory). This theory analyzes the conditions that countries should satisfy so as to ensure that membership in a monetary union will be welfare improving. The OCA theory is important because in the absence of these conditions countries that join a monetary union take a risk. As time goes by and residents realize that the membership in the union has not improved economic welfare, and in fact may have deteriorated it, dissatisfaction with the union is bound to increase, undermining the social and political acceptability of the union.

The Influence of the OCA Theory

What are the conditions that according to the OCA theory should be satisfied in order to ensure that the union improves economic welfare? The OCA theory has stressed three important conditions.[1] Let us list them first and then discuss their interrelations (tradeoffs).

The first condition is that countries should not be subjected to divergent economic trends that they find difficult to adjust to. For example, prolonged and substantial changes in competitive positions between member countries should be limited because these movements create difficult and painful adjustment problems. The intensity of these adjustment costs in turn depends on the second condition identified by the OCA theory. This is that countries that join a monetary union should have a sufficient amount of flexibility in their labor and goods markets, including labor mobility.

These two OCA conditions interact with each other. In order to see this, suppose a country has experienced a substantial loss in its competitiveness vis-à-vis other member countries. This could have arisen as a result of a strong boom that has led to wage and price increases exceeding those observed in the other member countries. Such a loss of competitiveness must somehow be corrected. A country that is not in a monetary union can do this by devaluing its currency. A member of a monetary union cannot devalue its currency because it is the common currency that has the same value everywhere in the union. The only way this country can restore its competitiveness is by pushing down wages and prices. Economists call this an internal devaluation. The success of such an internal devaluation now depends on the second condition identified by the OCA theory, i.e., the degree of flexibility of wages and prices. If that flexibility is sufficiently large, the internal devaluation can be performed easily. If the flexibility is very poor, the internal devaluation will still be necessary, but it will lead to large costs. Domestic firms that have lost competitiveness, and cannot easily restore it by lowering wages and prices, are forced to fire workers or to go out

[1]The loci classici are Mundell (1960), McKinnon (1963), and Kenen (1969). For surveys, see Ishiyama (1975) and De Grauwe (2012).

of business. Thus we obtain a tradeoff: the higher are asymmetric shocks, the more flexible the economy should be to make adjustment possible without creating too large costs in lost output and employment.

Before the start of the Eurozone, there was a general consensus among economists that the two conditions identified by the OCA theory were unlikely to be satisfied in the group of countries that were ready to start their monetary adventure. Some subset of countries could be said to satisfy these conditions, but the Eurozone as a whole probably could not. This general conclusion was buttressed by a large empirical literature (see Bayoumi & Eichengreen 1997, Bayoumi et al. 1995, Beine et al. 2003, Eichengreen 1990, De Grauwe & Vanhaverbeke 1993, Erkel-Rousse & Mélitz 1995, and De Grauwe 2012 for a survey). As I will show, the occurrence of asymmetric shocks and the lack of sufficient wage and price flexibility would play a major role in the development of the Euro-crisis at the end of the 2000–2010 decade.

The fact that two conditions of the OCA theory did not appear to be satisfied in the Eurozone did not necessarily imply that the Eurozone could not be an optimal currency area. There is a third condition that economists put forward, which could change the tradeoffs we just identified. This third condition is that the monetary union should be embedded in a budgetary union. The reason is that a budgetary union among the member countries of the monetary union creates an insurance mechanism that becomes important when a member country is hit by a negative shock. A central budget then has the effect of transferring income from the member countries that experience good times to the country hit by the negative shock. This reduces the cost of being in a monetary union for the latter country. As in all insurance systems, the other countries are willing to accept these transfers because they know that when hit by similar shocks they will be able to profit from the same insurance mechanism.

Thus, a budgetary union reduces the costs of a monetary union for countries that are subject to asymmetric shocks and experience significant rigidities in their labor and goods markets (Kenen 1969). In a way, it can be said that a common budget serves as a backstop that allows member countries of a monetary union to take the hit of asymmetric shocks with lesser costs (see European Commission 1977).

It is clear that the Eurozone countries were very far (and are still very far) from a budgetary union. The budget of the European Union represents only ∼1% of its gross domestic product (GDP). Prior to the start of the Eurozone there was (and today there still is) very little prospect of a significant centralization of the budgets of the member states of the Eurozone.

Thus, it is clear that the Eurozone did not satisfy the conditions identified in the OCA theory for a welfare-improving monetary unification. This was widely recognized by many economists prior to the start of the Eurozone. So why did these countries decide to start something that was against their own economic self-interest? This is the political economy problem that I now want to discuss.

The OCA theory that was taught at universities had almost no influence on the decision-making process that led to the creation of the Eurozone. The latter was dominated by political objectives pursued by the two major decision makers, France and Germany. Although the political objectives of these two players were widely different, they found a common ground that allowed them to move forward and to create the Eurozone.

Monetary Union as a Political Objective

France's political objectives were quite clear. Ever since the start of the European Monetary System (EMS) in 1979, France had de facto transferred its monetary sovereignty to Germany. The EMS was a system of pegged exchange rates among EU countries. It was instituted to eliminate the

large volatility of the exchange rates within the European Union, a volatility that was felt to be detrimental to further trade integration in the union. Backed by its reputation of monetary stability, the German Bundesbank quickly emerged as the central player in the system that set the interest rate for Germany and for the EMS as a whole. Thus, countries like France had the choice either to follow the interest-rate decisions made by the Bundesbank or to unpeg their currencies from the Deutsche Mark. The fear that such an unpegging would lead to monetary instability made France and other countries reluctantly choose to become followers in the monetary game directed by the Bundesbank. Germany became the "hegemon" in the EMS, much as the United States had been the hegemon in the Bretton Woods system (Mélitz et al. 1988).

The position of inferiority that France was forced to occupy in the EMS provided the basis for the French proposal of a monetary union. Such a monetary union promised to break the hegemony of Germany. Whereas during the EMS era only Germans were sitting around the table in Frankfurt to decide about monetary conditions in the EMS and in France, in a monetary union Germans and French would be equally represented at that table, together with the other members of the union. A monetary union would give France equal weight with Germany in monetary policy decisions. Thus for France a monetary union had an almost exclusively political objective, i.e., to reduce the power of Germany and increase France's power in monetary affairs.

German objectives at that time were also political but of a very different nature than the French ones. These objectives were strongly influenced by Helmut Kohl, the chancellor at that time, who saw the creation of a monetary union as a step toward political unification, the ultimate objective of which was to permanently link the fates of Germany and France and thereby make future wars in Europe impossible. In contrast with the French calculus, the political calculus of the German chancellor was not the result of a broad consensus in Germany. The opposition of the German Bundesbank to the Eurozone project was notorious. In the end, however, the chancellor prevailed and pushed through the monetary union against the will of significant parts of the German population (see Marsh 1993, Bernholz 1999).[2]

The lack of political consensus in Germany on the desirability of a monetary union greatly influenced the Maastricht Treaty, which defined the entry conditions into the monetary union (Maastricht Treaty 1992). Much of the opposition in Germany against the monetary union was based on a lack of trust of Southern European countries. There was a German fear that these countries, which were perceived to lack discipline with regard to inflation and budgetary policies, would prevent the future monetary union from developing into a zone of monetary stability. In order to assuage this fear and to make the monetary union palatable to German public opinion, the Maastricht entry conditions were introduced. Candidate countries would have to show their determination to keep inflation low and to put their budgetary house in order prior to entry into the monetary union (see De Grauwe 2012).

Strangely, these entry conditions had nothing to do with the OCA conditions discussed above. Their only objective was a political one, i.e., to pacify the antagonism toward the creation of a monetary union that Helmut Kohl was determined to push through. It is no wonder that these entry conditions completely failed as a selection mechanism that should have kept those countries out of the union that were not part of the optimal currency area.

Although the political motives for creating a monetary union were different in France and Germany, they did not create an obstacle for coming to an agreement. As a result, the European Monetary Union (EMU) was almost exclusively based on the political objectives of the two main

[2]The fact that there was strong opposition within Germany does not mean that the euro lacked support. For an interesting analysis see Kaltenthaler & Anderson (2001) and Banducci et al. (2009).

protagonists. In this sense, it can be said that the Eurozone was a political project that disregarded the warnings of many economists against the creation of a monetary union. The politicians who started the monetary union did not take the warnings of these economists seriously and took a risk whose outcome would only be visible two decades later.

Monetarism Comes to the Rescue of Political Leaders

Keynes (1936) once wrote, "Practical men, who believe themselves to be quite exempt from any intellectual influence, are usually the slaves of some defunct economist" (p. 136). This also holds true for the policy makers who pushed Europe into the monetary-union adventure. Although the two most important policy makers at the time, French President Mitterand and German Chancellor Kohl, probably were not much influenced by economists, dead or alive, the same cannot be said of many other policy makers, in particular central bankers. The latter made up most of the membership in the Delors Committee (1989) that was set up in 1989 to prepare a blueprint of the future monetary union. These central bankers had become greatly influenced by monetarism, which during the 1980s had become the dominant paradigm in macroeconomic thinking. According to this paradigm, a central bank should not try to influence output and unemployment but should instead focus on keeping inflation low. Keeping inflation low was seen as the best possible contribution of the central bank toward maintaining macroeconomic stability in general and financial stability in particular. Any ambition of the central bank to "fine-tune" the economy, e.g., by trying to stimulate it in a recession, would create an inflationary bias and ultimately would end up destabilizing the economy (Barro & Gordon 1983). In this monetarist view of the world, the only responsibility of the central bank was to maintain price stability. This view had a great influence on the model of central banking that was created for the Eurozone. As we will see, it would also greatly affect the response of the European Central Bank (ECB) to the sovereign debt crisis that erupted in 2010.

There was another way monetarism affected the minds of policy makers. In contrast with the OCA theory, which led to much skepticism about the desirability of creating a monetary union in Europe, monetarism had a positive message about monetary union. For monetarist thinkers, the loss of national monetary policies was not much of a loss, because national monetary policies were ineffective in dealing with asymmetric shocks. What is more, for monetarists the systematic use of monetary policies to fine-tune the economy had produced great macroeconomic instability in a large number of EU countries (e.g., France, Italy, Spain, Portugal). The best way to eliminate this instability was to take away the national monetary policy instrument and put monetary policy into the hands of a responsible European central bank modeled after the German Bundesbank.

Thus, monetarism provided the intellectual framework both for the desirability of a monetary union in Europe and for its design. The OCA theory with its skepticism concerning the monetary union was thrown out the window. The European Commission (1990) issued an influential report, "One Money, One Europe," in which the future wonders of the monetary union were celebrated. It was very much influenced by the monetarist paradigm.

Monetarism was also crucially influential in the design of the institutions that would sustain the future monetary union, in particular the ECB. The latter was seen as a central bank whose primary concern would be price stability. The idea that a central bank should also be responsible for financial stability was disregarded. This was an extraordinary feat. Historically, central banks were created to solve an endemic problem of capitalism, i.e., its capacity to create booms and busts culminating in banking crises (Kindleberger 2005). All this was ignored by those who created the Eurozone, influenced as they were by an academic theory that maintained that financial instability could not occur in a world where the central bank keeps inflation low. Thus, an institution was

created that was singularly ill-prepared to face major financial crises. I return to this in the next section when I discuss other features of the design of the Eurozone.

The Fragility of the Eurozone Construction

The question that arises here is why economists who were skeptical about the desirability of a monetary union did not protest more loudly. The answer is that the OCA theory that was used to express this skepticism was very incomplete. It underestimated the fragility of a monetary union that was not embedded in a budgetary union. Put differently, the OCA theory did not sufficiently analyze the fragility that arises if a currency is created without a country, i.e., without the full powers of a government to back up the value of the currency. The introduction of a currency without a country has sometimes been hailed as revolutionary. It turns out, however, to bring in a profound structural weakness that creates a great fragility of the Eurozone and lies at the heart of the sovereign debt crisis that would unfold at the end of the 2010s (De Grauwe 2011). Let us analyze why this is so.

When entering the monetary union, member countries lose their capacity to issue debt in a currency over which they have full control. As a result, they cannot give a guarantee to the bondholders that the cash will always be available at maturity to pay them out. A loss of confidence of investors can then, in a self-fulfilling way, drive the country into default (see Kopf 2011). The reason why this happens can be described as follows. Suppose that investors fear a default by, let's say, the Spanish government. They sell Spanish government bonds, thereby raising the interest rate. The investors who have acquired euros are likely to decide to invest these euros in a safe asset, say in German government bonds. As a result, the euros leave the Spanish banking system. Thus the total amount of liquidity (money supply) in Spain shrinks. The Spanish government experiences a liquidity crisis, i.e., it cannot obtain funds to roll over its debt at reasonable interest rates. In addition, the Spanish government cannot force the Bank of Spain to buy government debt. The ECB can provide all the liquidity in the world, but the Spanish government does not control that institution.

This is not the case in a country capable of issuing debt in its own currency. Such a country gives an implicit guarantee that the cash will always be available to pay investors out when the bonds mature. The reason is that if, for example, the UK government were to run out of cash, it would force the Bank of England to provide the necessary liquidity to pay out the bondholders. Thus the UK government is assured of the liquidity needed to fund its debt. This means that investors cannot precipitate a liquidity crisis in the United Kingdom that could, ultimately, push the UK government into default. There is a superior force of last resort, namely the Bank of England.

This difference between members of a monetary union and "stand-alone" countries was completely overlooked even by the skeptics of the desirability of a monetary union in Europe. As a result, the fragility of the EMU and its sensitivity to market sentiments that could push countries into default were not taken into account, and countries entered the Eurozone completely unaware of the risks and unprepared to deal with them. In a way, it can be said that by entering a monetary union, the member countries were degraded to the status of emerging countries that have to issue their debt in a foreign currency. It is well known that these countries are very vulnerable to "sudden stops" in the funding of their debt leading to great macroeconomic instability, including banking crises (Calvo 1988, Eichengreen et al. 2005).

POLITICAL ECONOMY IN TRANQUIL TIMES: THE INFLUENCE OF A PARADIGM OF CLASSICAL ECONOMICS

The Eurozone members entered the union guided by political leaders who had no clue about the fragility of the system they had created. They would be spared a grace period of about ten

years. During that time, policy makers developed an intellectual framework that convinced them that the world they were living in was the best of all possible worlds. This intellectual framework, which has been called the Brussels-Frankfurt consensus (De Grauwe 2006), contended that the Eurozone's institutions were up to the job of running a monetary union and that a further political union was not necessary (Issing 2008). This consensus can be summarized as follows.

First, the way to deal with asymmetric shocks that can occur in a monetary union is to increase the flexibility of labor markets. Thus a monetary union could be made sustainable by introducing structural reforms, and member countries were urged to introduce these reforms. There was no need for a budgetary union that could provide an insurance mechanism to countries hit by an asymmetric shock. Countries with flexible labor markets could deal with these shocks on their own.

Second, the Stability and Growth Pact that was introduced at the start of the Eurozone, and that put limits on the permissible levels of government budget deficits, enabled countries to use national fiscal policies as an instrument to deal with asymmetric shocks that have a cyclical (temporary) component. By following the Stability and Growth Pact's prescription of a balanced budget over the medium run, countries had enough flexibility to allow their budget deficit to increase up to 3% during an economic downturn. As a result, the Eurozone countries had the instrument to deal with business cycle movements (Issing 2008).

Third, there was no need to have a system-wide budgetary policy to stabilize the business cycle. The monetary policy of the ECB was seen to be perfectly equipped to provide for macroeconomic stability in the Eurozone. By focusing on price stability, the central bank did all that can be done to stabilize output movements at the Eurozone level. If the output shocks were due to demand movements, inflation targeting would stabilize not only the rate of inflation but also the output movements. If these output shocks were due to supply movements, they could not be dealt with by monetary policies and/or budgetary policies.

Fourth, there was no need for the central bank to be concerned with financial stability. A stable price level would allow private investors to make the right decisions, helped by efficient financial markets. The latter were seen as having enough self-regulatory features to guarantee financial stability.

The conclusion drawn from this analysis was that the European institutions and their governance were appropriate to sustain the monetary union in the long run.[3] There was no need to increase the degree of political unification, including a budgetary union, to make the monetary union sustainable. The Eurozone would survive in the long run without the need to create a European federal state (Issing 2008).

The Brussels-Frankfurt consensus was based on two academic theories. One is the monetarist theory, discussed above, in which the central bank cannot do much to stabilize the economy. If it tries too hard to fine-tune the economy, it will end up with more inflation, so the best thing a central bank can do is to stabilize the price level. This will have the incidental effect of producing the best possible outcome in terms of stability of the economic cycle. Monetarism had a corollary in the view that markets in general and financial markets in particular are efficient. Thus, bubbles and crashes would not be tolerated in efficient financial markets because rational agents would not allow prices to deviate from their underlying fundamentals. The implication of this view is that financial markets could be left to themselves. All they needed was a stability-oriented monetary policy that would allow these agents to create the best of all possible worlds. The two major textbooks of that period (Woodford 2003, Walsh 2003) provided the underpinnings of this theory. It is amazing

[3] Padoa-Schioppa (2004), as an insider, develops a powerful criticism of this view, which is implicit in the Brussels-Frankfurt consensus.

that not a single mention of the central bank as a guardian of financial stability is to be found in these two books, which were and continue to be used by thousands of economics students each year trying to grasp the intricacies of monetary theory and policy.

The second theory that influenced the Brussels-Frankfurt consensus was the "real business cycle" theory. This says that the sources of economic cycles are shocks in technology (supply-side shocks) and changes in preferences (unemployment being mainly the result of workers taking more leisure). There is very little the central bank can do about these movements. The best is to keep the price level on a steady course. This will minimize the effects of these shocks. In addition, a macroeconomic policy based on the objective of price stability is the best thing the central bank can do to promote growth (Kydland & Prescott 1977).

The conclusion from these two theories was that the governance of the Eurozone was the right one: a central bank that cared about price stability and little else made the best possible contribution to maintaining macroeconomic and financial stability, and national governments kept budgetary discipline and did their utmost to introduce market flexibility. In such a world, the productivity-driven shocks could best be dealt with by governments, keeping budgets in balance. Furthermore, in such a world, one did not need to have an active budgetary policy at the Eurozone level.[4]

From the present-day perspective, it is surprising that "practical men" could have believed in such a fictional world for so long. This was a world of rational agents who do not make systematic mistakes; a world where waves of optimism and pessimism ("animal spirits") do not capture consumers and investors, where booms and busts are absent, and where financial markets are efficient (Akerlof & Shiller 2009). In such a world, a monetary union indeed can run on automatic pilot without the need of a strong captain.

The Brussels-Frankfurt consensus prevented policy makers from seeing, let alone taking steps to stop, the emerging crisis. The most spectacular example of this failure of foresight was the report issued by the European Commission in 2008 that celebrated the ten-year anniversary of the Eurozone. It concluded that "EMU is a resounding success. Ten years into its existence, it has ensured macroeconomic stability, spurred the economic integration of Europe—not least through its successive enlargements—, increased its resilience to adverse shocks, and become a regional and global pole of stability" (p. 5). The report went on to stress some future challenges: "Nevertheless, there is potential to reap further benefits from EMU. This . . . calls for improved co-ordination of economic policies, further progress with structural reforms, a stronger global role for the euro area and an unwavering commitment by Member States to achieving these goals" (European Commission 2008, p. 6). There is no mention of the need to move forward into a budgetary and political union to strengthen a fragile Eurozone. The Eurozone was a "resounding success" that was not in need of a fundamental overhaul of its governance.

POLITICAL ECONOMY OF THE CRISIS: ECONOMICS IS BACK WITH A VENGEANCE

The story told in the previous sections is one in which European political leaders did not understand the economics of a monetary union and went ahead driven by purely political objectives. Once the monetary union was in place, they fooled themselves into believing they had found the right governance for the Eurozone to make it sustainable in the long run.

[4]It will not come as a surprise to those who have studied economic history that these were also the views that prevailed prior to the Great Depression.

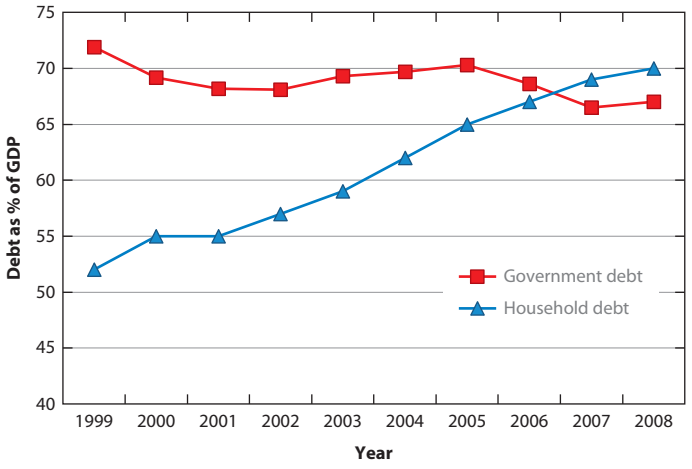

Figure 1

Household and government liabilities in Eurozone prior to crisis (as a percentage of gross domestic product). *Source*: European Commission, AMECO and CEPS.

The sovereign debt crisis was a brutal wakeup call for the political leaders. They were driven out of their fictional world and back into economic and financial reality. One could have hoped that, having learned from past mistakes, they would manage the crisis correctly. Nothing could be further from the truth. The so-called management of the crisis did not solve anything. In fact, as I will show, at some moments it did more harm than good.

The failure to manage the crisis correctly, like the failures that had led to it, were due to a misunderstanding of the underlying economics. The misunderstanding had two components. The first one arose from a fundamental misdiagnosis of the causes of the sovereign debt crisis. The second one came about because political leaders failed to grasp how fragile the Eurozone is and how it can unravel if not sustained quickly.

Misdiagnosis of the Sovereign Debt Crisis

The diagnosis that was made by political leaders, especially by those from Northern European countries, was that the sovereign debt crisis arose as a result of profligacy of governments in general and of governments in the Southern European countries in particular. I wish to argue that, with the exception of Greece, the reason why countries got into a sovereign debt crisis has little to do with public profligacy. The root cause of the debt problems in the Eurozone is to be found in the unsustainable debt accumulation of the private sectors in many Eurozone countries. As shown in **Figures 1** and **2**, household and bank debt were increasing fast prior to the debt crisis. Surprisingly, the only sector that did not experience an increase in its debt level (as a percentage of GDP) was the government sector.

The private debt accumulation in the Eurozone allowed booms and bubbles to develop. When these became unsustainable and crashed, a large number of banks (which had made all the loans to households) and firms (which found themselves unable to repay their debt) got into trouble themselves. As a result, households, firms, and banks were forced to deleverage, i.e., to reduce their debt levels. This set in motion the well-known debt deflation dynamics analyzed by Fisher (1933) and later by Minsky (1986). As the private sector attempts to deleverage, assets are sold, pushing down their prices. As a result, other agents are pushed into solvency problems as the value of their

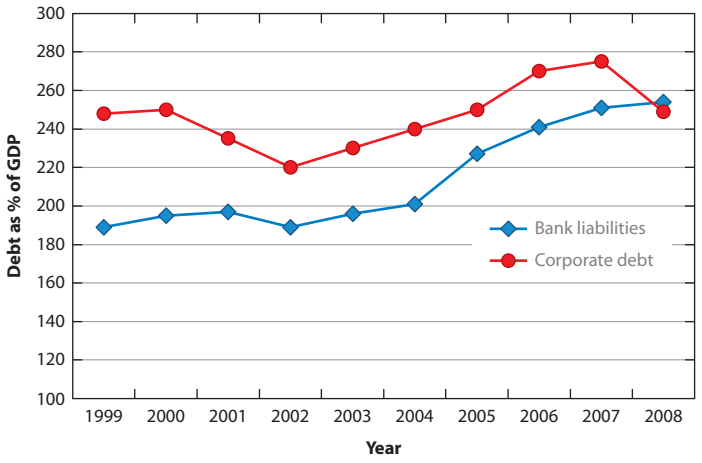

Figure 2

Bank and corporate liabilities in the Eurozone prior to crisis (as a percentage of gross domestic product). *Source*: European Commission, AMECO and CEPS.

assets declines. More and more private agents then are forced to deleverage. But as everybody is doing this at the same time, nobody succeeds in improving solvency. On the contrary, the solvency of private agents continues to deteriorate. The economy is pushed into a deflationary spiral. The only way out is for governments to increase their own debt levels. This is necessary to make it possible for the private sector to deleverage without bringing the economy into a deep depression.

The initial response of European governments was the correct one. They allowed their own debt levels to increase. This was achieved through two channels. The first one consisted in governments actually taking over private debt, mostly bank debt. The second one operated through the automatic stabilizers set in motion by the recession-induced decline in government revenues. As a result, the government debt/GDP ratios started increasing very fast after the eruption of the financial crisis. **Figure 3** shows the ratios of government debt to GDP before and after the crisis for the Eurozone countries. The most surprising feature of **Figure 3** is that except in Germany and Portugal, government debt ratios were all declining prior to 2008. Even more striking is that in two countries that have experienced severe government debt problems recently, Ireland and Spain, the government debt ratios were declining spectacularly prior to the crisis. These were also the countries where the private debt accumulation had been the strongest.

Thus, the fundamental cause of the sovereign debt crisis in the Eurozone countries, with the possible exception of Greece, was unsustainable *private* debt accumulation that forced governments to step in to help (in some cases to save) large segments of the private sector. It is interesting to note that, as documented by Schularick (2012), most of the financial crises of the last century in the industrialized world were caused by excessive private debt accumulation, not by excessive accumulation of government debt. Yet the diagnosis that was made by the Eurozone leaders, i.e., the German government, the ECB, and the European Commission, was that government profligacy was to blame. The effect of this misdiagnosis was that budgetary austerity was imposed as the cure. Governments were forced to deleverage, while the private sectors in many Eurozone countries, especially those that had experienced excessive private debt accumulation, were still frantically trying to deleverage. As a result, the Southern Eurozone countries, which were forced to swallow most of the wrong medicine, pushed their economies into deep economic depressions. These depressions worsened the fiscal situations of the governments of these countries, led to an increasing

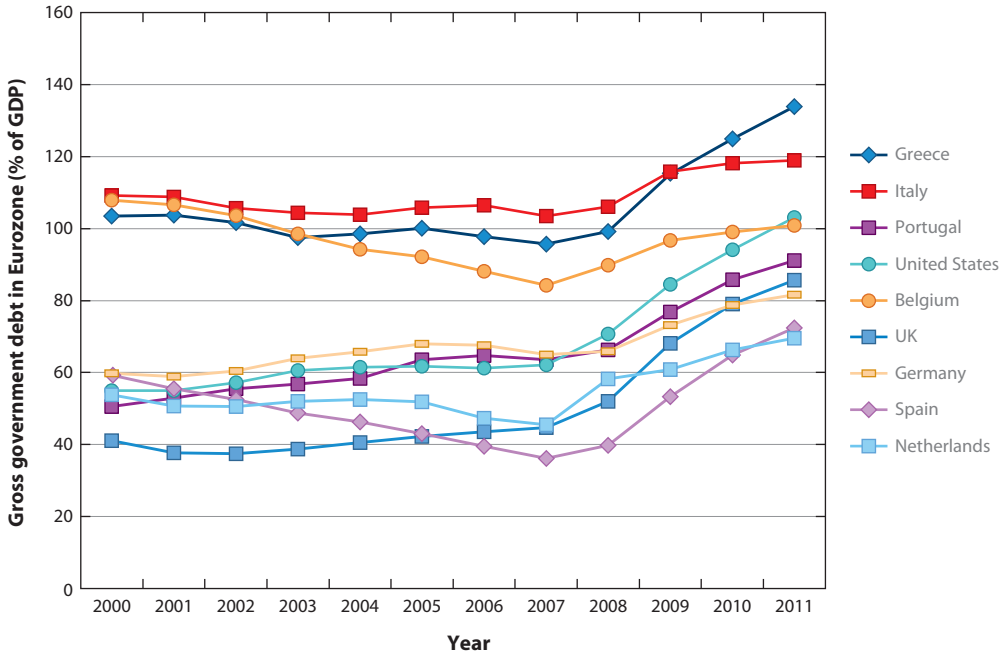

Figure 3

Government debt in the Eurozone countries and the United States (as a percentage of gross domestic product). *Source*: European Commission, AMECO.

social and political rejection of the austerity strategy, and weakened the social acceptability of the Eurozone itself.

The Fragility of the Eurozone in a Crisis

As explained above, the Eurozone was fragile from the start. When the debt crisis erupted in 2010, its fragility was exposed for all to see (although European political leaders, especially in the North of Europe and in Frankfurt, failed to see it). Let us analyze how this fragility became fully apparent during the crisis.

As I argued in the section "Political Economy of the Creation of the Euro; the Dominance of Political Objectives," the key to understanding the sovereign debt crisis in the Eurozone has to do with an essential feature of a monetary union (see De Grauwe 2011 for a more detailed analysis; see also Kopf 2011). Members of a monetary union issue debt in a currency over which they have no control, which means the governments of these countries cannot guarantee that the cash will be available to bondholders at maturity. It is literally possible that these governments will lack the liquidity to pay out bondholders.

The ensuing liquidity crisis can easily degenerate into a solvency crisis. There is a self-fulfilling element in this dynamics. When investors fear default, they act in such a way that default becomes more likely. A country can become insolvent because investors fear default.

The liquidity crises in a monetary union also make it possible for the emergence of multiple equilibria. Countries that are distrusted by the market are forced into a bad equilibrium characterized by high interest rates and the need to impose strong budgetary austerity programs that push these countries into an economic depression. Inevitably, once these countries are in a bad equilibrium, their banks experience a crisis because they are the main holders of the sovereign's

bonds. As the bond prices tumble, the banks experience a dramatic deterioration of their balance sheets. Many become insolvent. Conversely, countries that are trusted become the recipients of liquidity inflows that lower the interest rate and boost the economy. They are pushed into a good equilibrium. De Grauwe (2011) presents a formal model, inspired by the Obstfeld (1986) model of foreign currency crises, in which multiple equilibria are a possible outcome.[5]

It should also be mentioned that the fragility of member countries of a monetary union has a similar structure to the fragility of banks. Banks are fragile because of the unbalanced maturity structure of their assets and liabilities. The latter have shorter maturities than the former ("banks borrow short and lend long"). As a result, banks are vulnerable to runs. When depositors fear liquidity problems, they run to the bank to convert their deposits into cash, thereby precipitating the liquidity crisis that they are fearing (see the classic model of bank runs of Diamond & Dybvig 1983). This problem can be solved by the central bank promising to step in and to provide liquidity in times of crisis (to be the lender of last resort).

Governments in a monetary union that cannot rely on a lender of last resort face a similar fragility. Their liabilities (bonds) are liquid and can be converted into cash quickly. Their assets (physical assets, claims on taxpayers), however, are illiquid. In the absence of a central bank that is willing to provide liquidity, these governments can be pushed into a liquidity crisis because they cannot transform their assets into liquid funds quickly enough.

I do not wish to argue that the movements of distrust that hit some countries and not others came out of the blue sky. Underlying these movements of distrust was the development of strong asymmetric trends in the Eurozone. As mentioned above, the Eurozone was gripped by booms and bubbles during the 2000s. These booms occurred in very unequal fashion. A number of "peripheral" Eurozone countries (Ireland, Greece, Spain) experienced strong booms that were fueled by bank credit, while "core" countries (Benelux, Germany, France) experienced relatively low growth. This had the effect of creating an asymmetric development in wages and prices, with strong wage and price increases in the periphery and subdued ones in the core countries. Thus, the Eurozone was subjected to a major asymmetric shock, which led to divergent movements in the competitive positions of countries. The periphery lost competitiveness while the core, and especially Germany, improved its competitiveness. These divergent movements are shown in **Figure 4**.

Clearly, as the countries that have lost competiveness cannot devalue their currencies, they are forced to produce internal devaluations; that is, they have to reduce their price and wage levels relative to the others. But this inevitably leads to recessions and a deterioration of the government budgets. This difficult and painful adjustment provides the basis for the distrust in financial markets. The problem is that this distrust in turn tends to aggravate matters for the countries involved. As I described above, it pushes them into a bad equilibrium characterized by excessive austerity leading to deep recessions, which in turn aggravate government debts and deficits.

The failure to understand the fragility of the Eurozone and its capacity to push countries in a self-fulfilling way into bad equilibria led to a series of disastrous decisions that intensified the crisis and brought the Eurozone to the brink of collapse.

The European Central Bank's Failure to Act

Probably the worst decision was made by the ECB early on in the crisis, when it decided not to take on the responsibility of systematically providing liquidity in the government bond markets of the

[5]Many formal theoretical models create self-fulfilling liquidity crises. Many of these have been developed for explaining crises in the foreign exchange markets (see Obstfeld 1986). Other models have been applied to the government debt (Calvo 1988, Gros 2011, Corsetti & Dedola 2011).

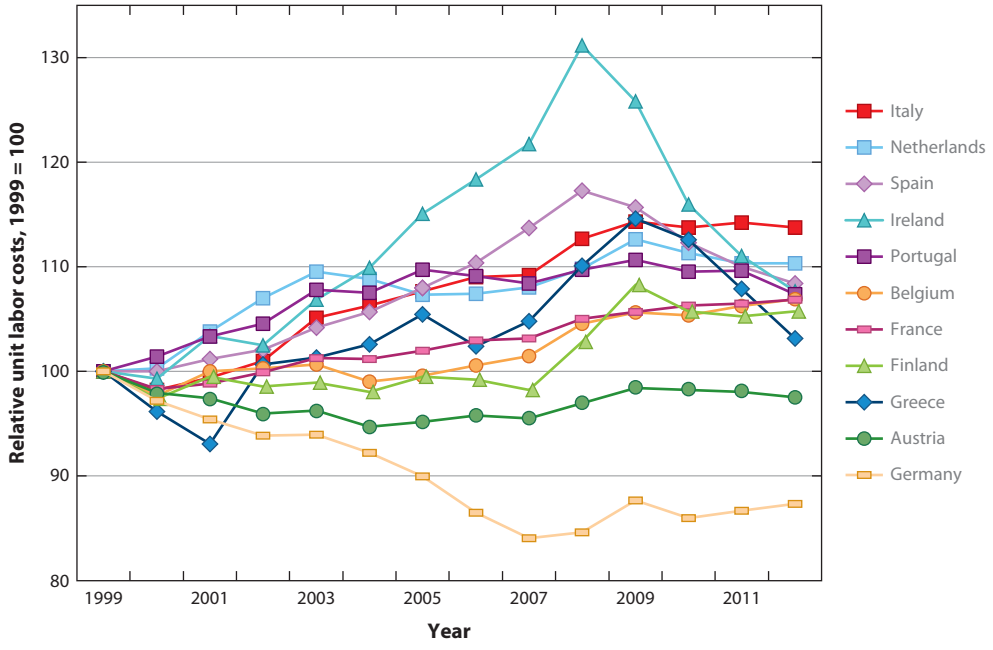

Figure 4

Relative unit labor costs. *Source*: European Commission, AMECO.

Eurozone. Many arguments have been brought forward to justify this decision. These arguments are considered in De Grauwe (2011); most are rejected, but the moral-hazard argument is a serious one. It says that when the central bank acts as a lender of last resort in the government bond markets, it creates the risk that governments will have incentives to keep budget deficits and debts too high. Although the moral-hazard risk is a serious one, it does not imply that the central bank should not be a lender of last resort. Rather, it implies that other mechanisms of control should be enforced on excessive risk taking by those who profit from the implicit insurance given by the central bank.

The failure of the ECB to provide lender-of-last-resort support in the government bond markets ultimately led to a second banking crisis in the Eurozone at the end of 2011. This had been predicted by those who understood the nature of the fragility of the Eurozone. As countries were driven into a bad equilibrium, government bond prices collapsed, leading to solvency problems for large parts of the banking sectors in these countries. These problems in turn led to a run on the banks, forcing the ECB to provide massive lender-of-last-resort support to the banks in December 2011 and February 2012, when a total of $1 trillion was injected into the banking system. The extraordinary aspect of this decision is that the ECB set aside all concerns about the moral-hazard risk it created in the banks.

In designing this whole operation, the ECB gave strong incentives to banks to buy government bonds. Banks could obtain cheap money (1% interest rate) to invest in government bonds. Banks did this massively and thereby temporarily lessened the pressure in the government bond markets. The trouble with this approach is that it intensified the link between the sovereign and the domestic banks. As banks hold more government bonds on their balance sheets, with the next upsurge of panic in the government bond markets, they will be hit again and will need further support. Instead

of weakening the link between the sovereign and the banks that is so lethal once countries are pushed into a bad equilibrium, the ECB intensified this link, thereby laying the foundation for the next stage in the crisis.

The right approach for the ECB would have been to announce that it would not tolerate further declines in the government bond prices, thereby putting a floor under these prices, and shielding the banks from panics in the government bond markets. As a central bank with unlimited money-creation capacity, the ECB has the firepower to credibly commit itself to support such a floor.

The ECB learned from these mistakes and announced on September 6, 2012 that it was willing to act as a lender of last resort in the government bond markets. It is as yet unclear how successful this new policy stance will be, as the ECB has attached a number of conditions for this policy to be activated. The most important one is that additional austerity measures may be demanded as the price of lender-of-last-resort interventions. The immediate effect of the announcement was certainly positive and tended to reduce the interest rates troubled governments have to pay on their outstanding debt.

Wrong Decisions by the European Council

The European leaders making decisions in the framework of the European Council failed equally and for the same reason. In this section, I illustrate this by an analysis of decisions made during 2010 when the sovereign debt crisis erupted.

The crisis became particularly intense in May 2010 when Greece experienced a sudden stop in its capacity to finance its debt. In contrast with countries like Ireland and Spain, where the crisis was the result of excessive private debt accumulation that forced the governments of those countries to take over part of the private debt, the Greek crisis was a combination of excessive public and private debt accumulation. Worse, in the case of Greece, one could already see in 2010 that the government had become insolvent and that a solution could only come from a debt restructuring. The European political leaders failed to see this. They reacted to the Greek crisis by setting up the European Financial Stability Facility in May 2010, aimed at providing financial assistance to Greece after imposing tough austerity programs. It was immediately clear that this would not work. After a brief euphoria the spreads on Greek government bonds resumed their upward movement, and through contagion pushed up the spreads of the other peripheral Eurozone countries (see **Figure 5**). It was clear that nothing was solved; the can was only kicked further down the road. There would be many repeats of this syndrome.

It is always difficult to speculate about what could have happened if the European Council had acted quickly to fix the Greek situation in early 2010. It is conceivable that the contagion to other peripheral countries might not have happened, and consequently the Eurozone might have avoided much of what came later. The fact is that the European Council's hesitations were not accidental. They were a direct result of fundamental misperceptions about the nature of the crisis and the different views within the Council about that crisis. There was worse to come.

The worst possible decision of the European Council was made in October 2010. During a bilateral meeting at Deauville, German Chancellor Angela Merkel and French President Nicolas Sarkozy agreed that in the future, "collective action clauses (CACs)" would be imposed on government bonds issued by member countries of the Eurozone. The European Council took over this decision in October 2010. The CACs would make bondholders pay in the future when governments would turn to the European Financial Stability Facility to obtain financial assistance. The logic of this decision was to make bondholders more aware of the risks they undertook when buying government bonds. Unfortunately, the European leaders failed to understand that by

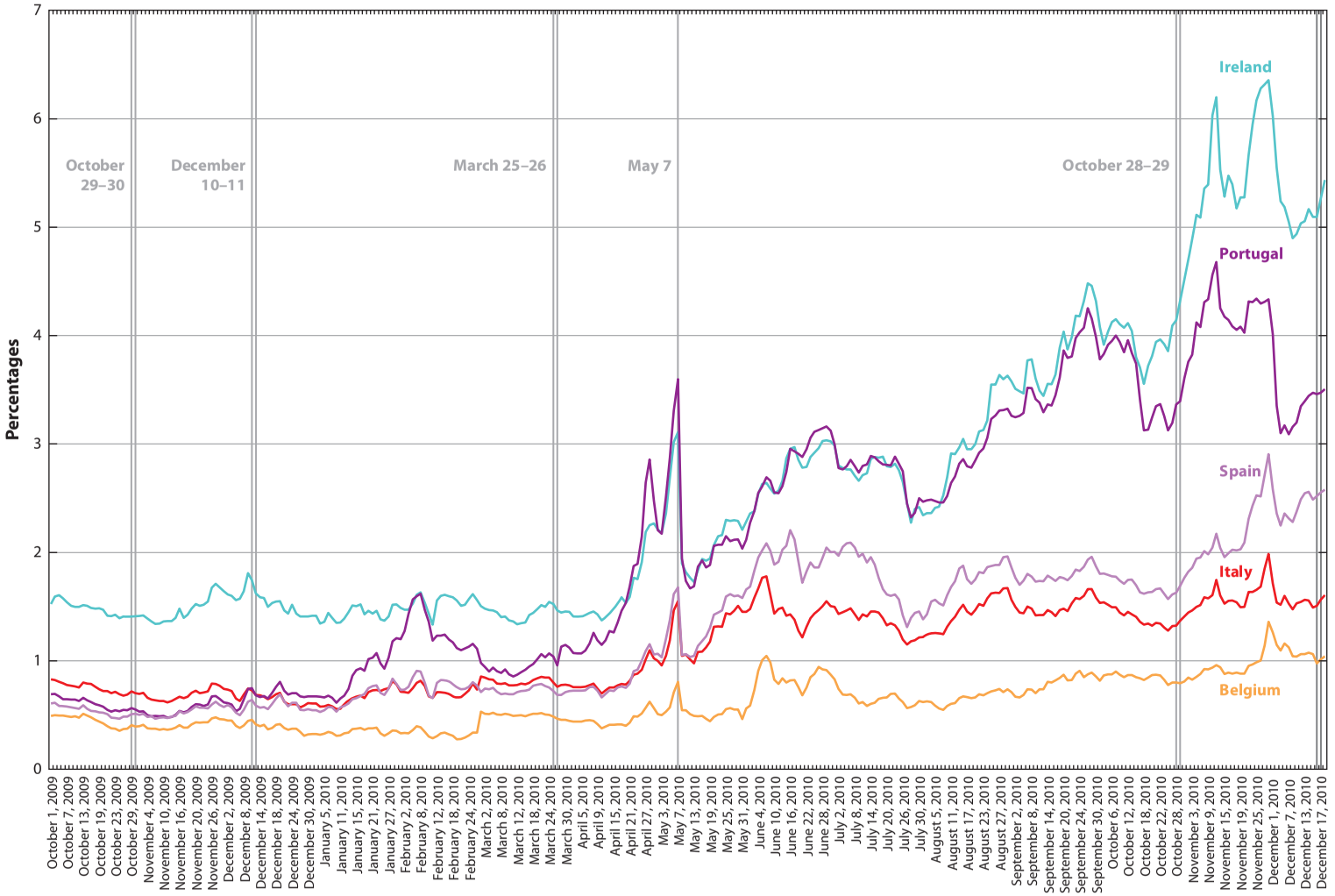

Figure 5

Government bond spreads (10-year) and European Council meetings. *Source*: Datastream.

imposing these CACs they were increasing the fragility of the system. From now on, when the slightest risk arose concerning a particular government's debt, bondholders would rush for the exit, increasing the likelihood of future crises. The immediate effect of this decision was that the spreads jumped up (**Figure 5**). Ever since that moment, the government bond markets in the Eurozone have remained in a state of crisis.

One feature of the approach taken by consecutive European Council meetings is the moralizing one. A strong popular perception exists in the Northern creditor countries (Germany, the Netherlands, Finland) that the Southern debtor countries have misbehaved. Punishment should be meted out to prevent future profligacy by these governments. This popular pressure led the governments of the creditor nations to insist on tough conditions and punitive interest rates in the financial assistance programs to the debtor nations. All this is understandable but did not help the resolution of the crisis. On the contrary, the punitive approach pushed the debtor nations into a deflationary trap that prevented them from generating a surplus to repay their debts.[6]

CONCLUSION

I have argued that the Eurozone's existential crisis has much to do with its origins. The initial decision to create a monetary union disregarded the economics of a monetary union, as it was motivated by political objectives. This mistake was made possible by a lack of understanding of the necessary economic conditions for a successful monetary union.

When the sovereign debt crisis erupted in 2010, political leaders showed an equally disturbing lack of understanding of its economics. They failed to make the correct diagnosis, and they continued to be ignorant about the fragility of the Eurozone. As a result, they failed to act, and worse, they made a number of disastrous decisions that intensified the crisis.

What should be done to save the euro can be summarized as follows. First, the ECB should step in to stop panic from undermining the stability of the Eurozone. It can do this by announcing that government bond rates of solvent but illiquid nations (Spain, Italy, Portugal, Ireland) will not be allowed to exceed a certain level (say, 300 basis points above the German government bond rate). The ECB is the only institution that can guarantee this and that can stop the spread of existential fear that undermines the Eurozone. It made the right decision on September 6, 2012 when it announced that from now on it would be the lender of last resort in the government bond markets, although it is not certain how successful this new policy will be, given the strong budgetary austerity imposed by the ECB as a prior condition for this support.

Second, the European Commission should take the lead in changing the nature of macroeconomic policies in the Eurozone. Countries experiencing deficits in the current accounts of their balance of payments have no other choice than to continue austerity, but the European Commission should allow these austerity programs to be spread over a longer period. While the European Commission travels to the deficit countries and preaches austerity, it should also go to the countries with a surplus on their current accounts and urge them to stop trying to balance their government budgets when the Eurozone risks moving into a recession. The European Commission's message should be that budget deficits in these countries are good for them and for the system.

Finally, a budgetary union is a key ingredient of a sustainable monetary union (von Hagen et al. 2002). Budgetary union, however, is a long-term prospect. There is little hope of achieving it

[6]The situation is reminiscent of the international conflicts arising from the attempts of the victorious countries to impose reparations on Germany after World War I. Germany never found the means to repay its debt and was pushed first into hyperinflation and later into economic depression.

quickly because it implies a fundamental transfer of sovereignty from the nation-states to European institutions. What can be done relatively quickly, however, is to issue common Eurobonds. This approach has the merit of signaling to the market that irreversible steps toward budgetary union are being taken today, thereby reducing the existential fears that destabilize the Eurozone (Delpla & von Weizsäcker 2010, De Grauwe & Moesen 2009). Clearly many problems will have to be overcome to launch Eurobonds (see Gros 2012), but this approach has the merit of starting a process that is unavoidable if one wishes to maintain the euro.

These are the three components of any program to save the euro. The details of such a program can differ, but the broad outlines cannot be varied much. Whether such a program can find the necessary consensus among the European political leaders remains to be seen.

DISCLOSURE STATEMENT

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