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Focus

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A Banking Union for Europe: Part of an Encompassing Long-term Governance Structure, No Short-term Fix
Christoph M. Schmidt and Benjamin Weigert 3

Towards a European Banking Union
Ignazio Angeloni 10

Banking Union: Inevitable, But Profoundly Challenging?
Iain Begg 15

Banking Union in the Making
Stefano Micossi 21

European Banking Union: Necessary, But Not Enough to Fix the Euro Crisis
Fritz Breuss 26

Monetary Policy and Banking Supervision: Coordination Instead of Separation
Thorsten Beck und Daniel Gros 33

Some of the Pros and Cons of Central Banking Supervision by the ECB
Friedrich L. Sell 40

After the 'Whatever-it-takes' Bail-out of Eurozone Bank Bondholders: The Eurozone's Wasted Opportunity for a Banking Union That Protects Sovereign Finance
Hans-Joachim Dübel 46

Specials

Target Losses in Case of a Euro Breakup
Hans-Werner Sinn 51

Trapped in the EMU?
Thomas Mayer 59

Public Sector Austerity: Path to Crisis or Path to Recovery?
Maks Tajnikar and Petra Došenovič Bonča 64

The Role of the State in the Financial System
Andreas Dombret 70

Spotlight

Energy and Climate News
Marc Gronwald and Jana Lippelt 72

Trends

Statistics Update 75

European Banking Union

A Banking Union for Europe: Part of an Encompassing Long-term Governance Structure, No Short-term Fix

Christoph M. Schmidt* and Benjamin Weigert**

Principles for an encompassing solution concept

For the last three years, the German Council of Economic Experts (GCEE) has analysed the crisis in the euro area, and proposed possible solutions. In its annual report for the year 2010 (see GCEE 2010), it suggested a concept of 'three pillars for stability' as a viable framework for the long-term governance of the euro area. A year later it proposed the idea of a 'European Redemption Pact' as a fiscal bridge into the future (see GCEE 2011), and it worked out this concept in more detail in a special report published in the summer of 2012 (see GCEE 2012a). Resting on these foundations, in its most recent annual report (see GCEE 2012b) the GCEE completed the detailed elaboration of its comprehensive solution concept with an extensive discussion of a European banking union in its possible role as a vital element of a sustainable governance structure for the euro area, but also outlined a workable transition path towards this long-term structure.

In all these contributions, three principles have guided the considerations of the GCEE:

- *Systemic problems require integrated solutions.* The crisis of the euro area is an amalgamation of three problem areas, which are entangled with one another in a vicious circle – a sovereign debt crisis, a banking crisis and a macroeconomic crisis. Together, they have led to a serious crisis of confidence in the integrity of the euro area. Consequently, a solution concept must be comprehensive, integrating all relevant aspects of this crisis in an internally consistent package. Trying to alleviate such a systemic crisis with isolated measures, which merely address one of the problem areas at a time is not only insufficient, it might even lead to an exacerbation of the situation.
- *Liability and control must be closely aligned with one another.* Unlike the original framework of the euro area, its future governance must adhere to one ironclad principle, the proper alignment of liability and control. Any form of joint liability requires joint control and, if this is not feasible, sovereign liability is the only option. Considerations regarding the choice between joint and sovereign liability pertain to both the fiscal realm and the governance of financial markets; and the ideal choice of liability-control-alignment might well be different in these two areas.
- *A comprehensive solution concept needs to include a viable transition path.* All considerations regarding this long-term structure pertain to a distant future, perhaps to some decades hence; but the principal problem is currently implementation. Firstly, crisis measures might provide relief in the short run at the expense of long-term stability, and might even make desirable aspects of the long-term structure unattainable; secondly, some measures which would provide stability in the long run might not be implemented, since they would tend to exacerbate the crisis in the short run; and thirdly, implementation of any sensible measure might be precluded by an impasse between different visions for a stable long-term structure.

This contribution sketches the GCEE's encompassing solution concept for the crisis of the euro area, which was derived on the basis of these three principles.

The multi-faceted nature of the crisis

The European Economic and Monetary Union (EMU) is suffering from a multi-faceted crisis. Most

* RWI Essen, Ruhr University Bochum (RUB) and German Council of Economic Experts.
** German Council of Economic Experts.

prominently discussed is the sovereign debt crisis, which is holding many members of the euro area firmly in its grip. Starting from elevated levels of public debt (relative to GDP), some countries in the euro area periphery have seen their debt ratios rise during the crisis to values questioning their ability to serve this debt in full. The most visible symptom of doubts in the solvency of peripheral member states are the interest rate spreads on government bonds and CDS premia, which both indicate that investors charge a risk premium *vis-à-vis* the euro area's safe haven, German debt. Clearly, the two avenues out of this problem are, in principle, the consolidation of public households and the stimulation of economic growth.

Somewhat less in the spotlight of the current policy debate, but nevertheless highly relevant, is the fragile banking sector in several member countries. In fact, it is still unclear to what extent individual banks are holding bad assets on their balance sheets, and whether their equity is sufficient to withstand serious shocks to their asset base. Not only have we seen a tendency towards a renationalization of credit relations, banks in the periphery of the euro area have increasingly needed to refinance themselves through their national central banks and, thus, in effect through the euro system. Clearly, the two avenues out of this problem are, in principle, raising additional equity capital from private sources, recapitalization and, in some instances, even the resolution of individual banks by the public authorities.

Both the sovereign debt crisis and the banking crisis would not be as serious if countries suffering from these problems were on a solid growth path. Yet, it is precisely these euro area members whose enterprises have been lacking competitiveness on the international markets for a protracted period. Even worse, some member states have slid into recession as a consequence of the austerity measures implemented to address their excessive sovereign debt, leading to the seemingly paradoxical phenomenon of fiscal consolidation being coupled with rising debt ratios. Clearly, the two avenues out of this problem are, in principle, to design the return to solid public finances as a 'qualitative consolidation', favoring public investment over public consumption, and to conduct structural reforms by enhancing the flexibility of factor and product markets and by privatization of key industries.

These three problem areas have combined into a serious crisis of confidence in the integrity of the euro area, giving this combination the character of a systemic crisis questioning the whole institutional arrangement. Firstly, while devising individual solutions might seem straightforward theoretically, they will be difficult to implement politically, and they will take considerable time to show measurable effects. This is most obvious for the structural reforms designed to enhance economic growth. Secondly, these problem areas are deeply entangled, and as the recession in some countries demonstrates, measures taken to alleviate the situation in one area might exacerbate the situation in another area. And thirdly, European policy makers appear deeply divided about the future governance structure of the euro area.

In consequence, the European Central Bank (ECB) has been the single European institution able (for now) to stabilize financial markets (LTRO) and to guarantee the euro area's integrity (OMT). However, this achievement comes at a serious cost: the division between the fiscal and the monetary realm has been blurred; and one might even be inclined to conclude that the ECB has currently given some European governments more than a little taste of the forbidden fruit of state financing.

Proponents of these ECB actions might forcefully argue that, at the time being, buying more time is all that is needed in order to let improvements in the three problem areas sink in, and that the ECB will easily be able to exit from the fiscal realm after sufficient time has been won. Indeed, major steps have been taken towards a more stringent governance framework for the euro area in recent months and some structural reforms are clearly bearing their first fruits. However, there is a serious risk that the strategy of buying some time will eventually transmute into a persistent approach, as withdrawing the drug of cheap credit is itself proving to be highly difficult in the political process. This should definitely be avoided.

Fiscal discipline requires national responsibility

Perhaps the most serious obstacle to breaking the crisis' vicious circle is the current impasse between European policy makers regarding the long-term governance structure of the euro area. Notably, these considerations pertain to the distant future, perhaps some periods hence. Nevertheless, in this context one arguably needs to know where the tour is going before embarking on the journey. The overarching criterion for choosing between candidate governance structures is their sustainability. Governance structures that

promise to be stable in the long-term need to align two core aspects, liability for the consequences of fiscal policy and control over the planning and the execution of public budgets.

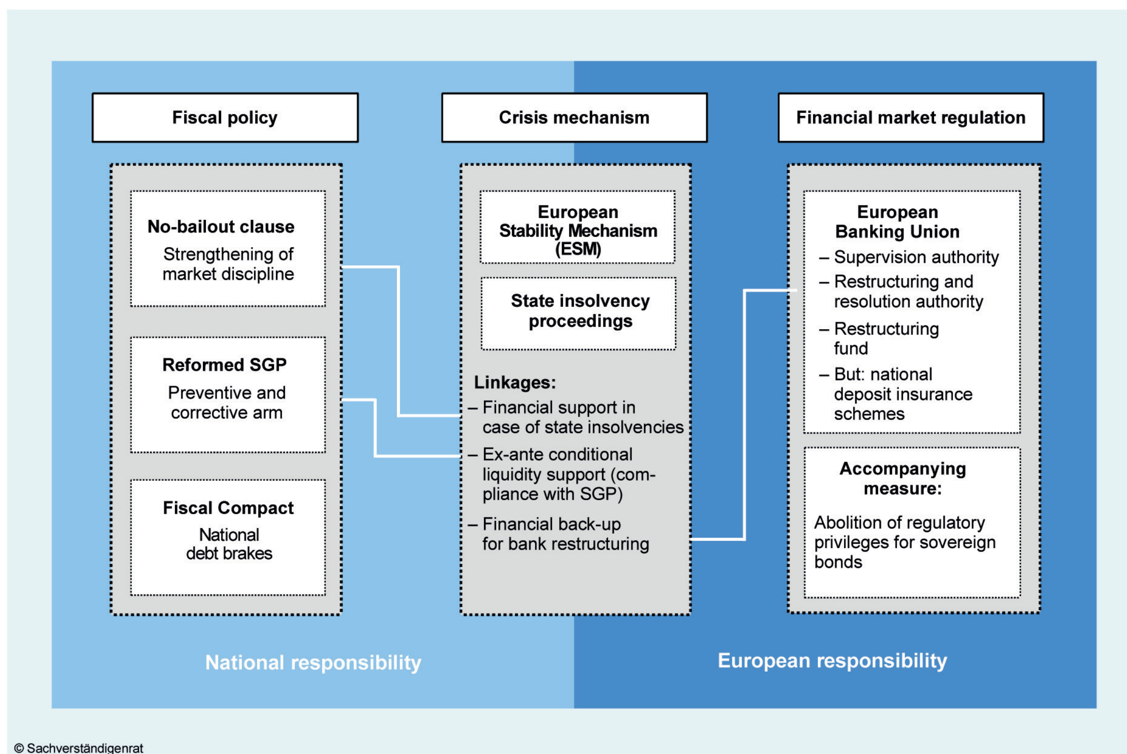
The current situation does certainly fail to satisfy this sustainability criterion. While public budgets are, despite all attempts at their coordination at the European level, ultimately a national affair, the consequences of fiscal policy have been mutualized, most importantly *via* the ECB interventions. This cannot be a recipe for ascertaining fiscal discipline in the future. A more serious candidate structure is that of a fiscal union, which tries to balance joint liability by joint control of public budgets, executed by a European finance minister, for example. The GCEE clearly rejects this candidate structure as illusionary, however, since the desired joint control would require national authorities to transfer sovereignty to the European level regarding two similarly important aspects, namely both with respect to the planning and to the execution of public budgets. All available evidence from historical and contemporaneous experience suggests that this simply will not happen in reality.

The GCEE instead advocates a return to the spirit of the original Maastricht treaty, which envisaged the alignment of liability and control for fiscal policy at the national level, albeit with sufficient modifications to make this adamant exclusion of a bail-out of one member state by other members truly credible (see Figure 1). It certainly would not be enough to simply invoke adherence to the no bail-out-principle to achieve this credibility. The current sovereign debt crisis provides more than convincing evidence that such promises need to be enforced by appropriate institutional arrangements instead. Specifically, the original Maastricht treaty did neither offer any possibility of an exit from the EMU, nor did it stipulate any viable provisions for sovereign insolvency. As these two release valves were excluded altogether, as the Stability and Growth Pact (SGP) did not ascertain fiscal discipline throughout the euro area and push came to shove in the still ongoing financial and economic crisis, the only sensible possibility was to tweak the no bail-out-promise.

Thus, the GCEE is perfectly aware that the alignment of liability for and control of fiscal policy at the national level needs to be ensured by corresponding institutional arrangements. In its assessment, the tightening of the rules in revised SGP, such as a closer monitoring of debt levels and the quasi-automatic nature of possible sanctions for non-compliance, will be insufficient. Neither will deeper coordination of

Figure 1

THE CGEE'S LONG-TERM FRAMEWORK FOR THE EURO AREA



Source: German Council of Economic Experts.

European fiscal policy and the implementation of national debt brakes be enough, as much as they mark steps in the right direction. Instead, an insolvency regime for ailing sovereigns that is backed by a crisis mechanism like the already implemented ESM is an indispensable element of the long-term institutional framework for fiscal policy in the euro area.

To this end, the GCEE proposes that a country's access to the ESM should primarily depend on its debt. More specifically, a country with a debt ratio exceeding 60 percent (90 percent) should receive ESM assistance only if both its debt is restructured and a macroeconomic adjustment program is accepted. While such an insolvency regime would from the cornerstone of the long-term institutional framework, if it were introduced today, this may even exacerbate the crisis. Naturally, investors would fear that those countries with debt ratios of around 90 percent and beyond would be potential candidates for a debt restructuring. Therefore, debt ratios need to be reduced well below 60 percent before such an insolvency regime could be implemented.

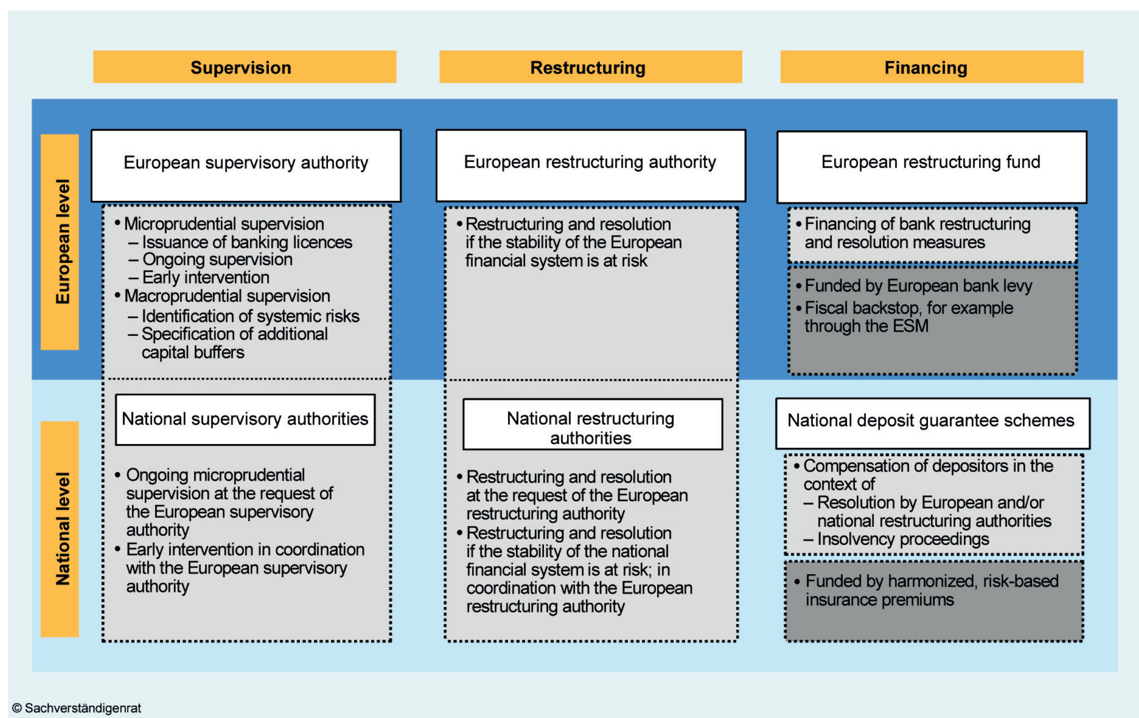
Requirements for a European banking union

While both the political discourse and the public discussion have focused on the European sovereign debt crisis, this is only part of the problem. Up to the outbreak of the crisis not only public, but also private borrowers had incentives to borrow excessively, created by deficits in the regulatory structure of financial markets. Capital requirements for banks were too low, and were even designed to exert pro-cyclical effects. National supervisors did not prevent the build-up of risks in banks' balance sheets; and highly disconcertingly, the risks of banks and states have become dangerously intertwined. Regulatory reforms in this area need to address these weaknesses. In particular, stricter capital requirements that go beyond the Basel III framework and are destined to become fully operational in 2019 should enhance the resilience of individual banks. The GCEE suggests that government bonds should be risk-weighted as well, and that banks should satisfy a leverage ratio of at least 5 percent.

While remarkable progress has already been made with respect to the individual resilience of banks and, thus, incentives for taking excessive risks have declined, the focus of the current reforms has been on the national level. Yet, many financial institutes operate at an international level. Correspondingly, monetary policy in the euro area is following a common approach. However, the authority to supervise and restructure banks has not yet been transferred to the European level. This has created undesirable incen-

Figure 2

STRUCTURE OF THE EUROPEAN BANKING UNION



Source: German Council of Economic Experts.

tives to take excessive risks, since banking distress in one country impairs the stability of financial systems in other countries. In principle, a well-designed banking union might be a framework for successfully addressing these negative spill-overs.

A properly designed European banking union would consist of three elements: banking supervision at the European level, a European authority for bank restructuring and resolution, and a bank resolution fund to finance restructuring and resolution (see Figure 2). Contrary to what the current political debate might suggest, a European deposit insurance fund is not necessarily an element of such a banking union. Thus, a banking union is a long-term project. Just as the insolvency regime for sovereigns cannot be an answer to the current overhang of public debt, a banking union cannot provide a solution to the acute problems in Europe's banking sectors (see Buch and Weigert 2012; GCEE 2012a). However, concrete proposals concerning the formation of a European banking union are currently disregarding this insight (see President of the European Council 2012). More specifically, both a European restructuring authority and fiscal burden sharing rules have not yet been specified, but only proposals for joint supervision. Such a half-hearted setup cannot constitute a solid long-term framework for financial markets.

As far as European supervision is concerned, all banks in the euro area should be in its perimeter, while the option to participate should be kept open for other European banks. This principle of comprehensiveness reduces the risk of regulatory arbitrage and binds all banks to the same supervisory standards. Yet it does not preclude the delegation of supervisory tasks to the national authorities where this turns out to be sensible in practice.

Moreover, the institutional arrangement of European supervision should ascertain the separation between monetary policy on the one hand, and both banking supervision and the competence for restructuring and resolution on the other. Otherwise, there will always be some risk that virtually insolvent banks might be refinanced instead of being restructured or resolved; since drastic curative steps always tend to throw a critical light on previous supervision. Unfortunately, current European plans do not adhere to this principle of separation, as supervision is envisaged to be organized within the ECB, and restructuring is not discussed at all.

The second necessary element of a banking union, the European resolution authority, should be funded through a bank levy as well as through the ESM. However, financial resources accruing to the resolution fund over the next years will not suffice to cope with large distressed banks. Therefore, a fiscal backstop is provided by the ESM that already entails the option of providing funds for bank recapitalization. In the design of the banking union, however, it will be necessary to determine *ex ante,* how any future fiscal burden arising from bank restructuring and resolution should be shared. Otherwise the availability of centralized fiscal resources at the European level will provide serious incentives to shift risks to the ECB again, and harm the necessary independence of the restructuring authority. Consequently, a functioning banking union could only be established with a corresponding amendment to the European Treaty.

Similar considerations pertain to the currently intensely discussed introduction of European-wide deposit insurance. Again, a necessary pre-condition for European deposit insurance would be the prior establishment of an effective and powerful European resolution authority. By contrast, introducing a European deposit insurance now would seriously undermine incentives to prevent excessive borrowing. Instead, individual countries should introduce and harmonize national deposit insurance systems based on risk-adjusted insurance premia.

A fiscal bridge to the future: the European Redemption Pact

Fiscal policies are still a national affair, and yet their consequences have been mutualized by the stabilization efforts of the ECB. Restoring national responsibility by implementing an insolvency regime for sovereign debt is now impossible, as this would intensify the crisis. Finally, the ESM, as an element of the long-term framework, is not designed to tackle the current crisis. Thus, the ECB is on the verge of becoming a permanent crisis mechanism. While this might seem a preferable option from the perspective of myopic European policymakers, it would harm long-term stability, and cement the deplorable confusion between fiscal and monetary policy.

With its concept of a European Redemption Pact (ERP), the GCEE proposed a crisis resolution mechanism that forms a viable fiscal bridge leading into the long-run institutional framework, securing a breath-

ing space that governments could use fruitfully to restore the international competitiveness of their economies. Relying on the forces of strict conditionality and market discipline, it would help to restore the separation of fiscal and monetary policy, and it would make the true scale of risks involved transparent, unlike *de facto* debt mutualisation by the ECB. The ERP consists of two vital elements: (i) a tightened Fiscal Compact together with its prescribed fiscal consolidation paths, and (ii) a European Redemption Fund (ERF) for sovereign debt in excess of 60 percent of GDP, providing limited and temporary joint and several liability. Participation in the ERP is open to all member countries, while participation in the fund is restricted to countries that are not already under an adjustment program of the EFSF/ESM.

As a prerequisite for joining the ERP, countries need to ratify the Fiscal Compact and to introduce national debt brakes. Additionally, an independent European institution should monitor and certify each country's compliance with national debt brakes. Countries that qualified would be allowed to roll over that part of their sovereign debt that exceeds the debt-to-GDP threshold of 60 percent at a pre-specified date. The process of rolling over sovereign debt is stretched out over a multi-year time horizon until the predefined volume of debt is reached. During this roll-in phase, the ERF will buy a country's long-term bonds (with maturity over two years) on the primary market while any short-term debt is still issued on the financial market. The interest rates for any debt transferred to the ERF are expected to be significantly lower than the rated demanded by the markets from countries like Italy or Spain, but are most likely to be higher than Germany's current rates. Countries participating in the ERP would have to pay an annual amount to the ERF that would be calibrated to precisely redeem its transferred debt within 25 years. After this period, the ERF would dissolve itself.

As an expression of its spirit of conditionality, the proposal comprises a series of safety valves and a sanctioning mechanism to ensure a successful transition to sound public finances: participating countries need to comply with consolidation plans that are agreed upon at the time of joining the ERP. Sanctions in case of non-compliance range from interest rate mark-ups for debt already transferred to the fund to complete suspension of the roll-in phase. To limit moral hazard and to limit the amount of the joint and several liability borne by participating countries, each country has to pledge collateral – currency or gold reserves or covered bonds – amounting to 20 percent of its liabilities against the ERF. The collateral would automatically accrue to the fund if a country were not to meet its payment obligations.

Additionally, countries would have to politically earmark certain (new) taxes that are used to meet the payment obligations. Remarkably, the ERF does not completely substitute the markets' disciplining effects: during the roll-in phase, governments would still refinance their short-term debt on the financial market. After the roll-in phase had ended, a country would be fully exposed to the financial markets, as it would have to refinance the remaining debt of up to 60 percent of GDP.

A transition path into the banking union

As in the fiscal realm, the major obstacle to the introduction of a banking union is the legacy that insufficient arrangements of the past have created. Currently, many banks hold substantial amounts of bad assets on their balance sheets. Most importantly, shifting to a greatly reduced variant of a European banking union now, comprising only of a European-wide supervision, but without clear rules for burden-sharing in the case of restructuring or resolution, would not resolve the current problem of the fragile banking system.

While dealing with these non-performing assets is arguably the responsibility of national governments, as the decisions leading to their accumulation were made under the existing national-control regime, the incentives to use national fiscal resources to restructure and, if necessary, resolve banks, would be quite limited. Specifically, if it were possible to mutualize the burden, applying for funding through the ESM would be comparatively unattractive for national governments under the current arrangement, since the associated debt would be the responsibility of the respective government, and it would probably entail serious elements of conditionality.

This has led some European governments to push for direct access to the ESM under the heading of a 'banking union', using quite feeble and certainly insufficient steps towards its implementation as a pretext. And yet, while this is understandable politically, European governments could overcome the impasse between the proponents of such an ill-designed mutualisation and its opponents, most prominently the

German government, by agreeing on the ERP. After all, The ERP would be designed to provide the fiscal bridge into the future, and one of the conditions associated with participation could well be the responsibility to use the breathing space offered to clean up national banking systems.

The implementation of a banking union designed to ascertain long-term stability will also take some time. Instead of ill-conceived attempts to misuse elements of the banking union for crisis management, European policymakers should take this time and use it wisely. To this end, the GCEE has developed a three-phase plan for the transition to a European banking union. Most importantly, in each phase of this transition, close alignment of liability and control is warranted. The first year of implementation should be utilized to alter the relevant European treaties in order to construct the institutional and legal framework: a European supervision authority, a European restructuring authority and a restructuring fund. Concomitantly, the new capital adequacy regulation, a common legal framework for the restructuring and resolution of banks, and for deposit insurance, should be completed.

In the second phase, banks successively qualify for a European banking license. Qualification involves a complete re-assessment of banks' assets through external experts, and the requirement that the bank meets the full regulatory stipulations of Basel III, as well as a Leverage Ratio of at least 5 percent of total on- and off-balance sheet activities. Until banks have obtained a European banking license, liability and control would remain at the national level. Deposit insurance would remain at the national level throughout the entire process. Banks that have not qualified for a European banking license should enter a mandatory restructuring process. If the respective country lacks the necessary fiscal resources, ESM funding could be used on conditions comparable to those applied to Spain (see Council of the European Union 2012), to ensure that existing shareholders bear losses. However, liability for any ESM loan would remain with the respective sovereign.

In the banking union, supervision and restructuring and resolution of all banks would rest with the European authorities. The restructuring authority will have recourse to the restructuring fund, the ESM and pre-specified fiscal burden sharing rules: both, control and liability would be at the European level. Given that the legal framework would be established within a year's time, the banking union could potentially resume in 2019, at which point banks will also have to meet the new Basel III regulatory requirements.

Concluding remarks

The recovery of the euro area from its current systemic crisis will only be achieved if the proposed solution satisfies three principles. Firstly, it needs to provide a package deal tailored to the multi-faceted nature of the crisis, not a smorgasbord of isolated measures. Specifically, it needs to address the fiscal realm and financial markets alike. Secondly, in addition to getting the details right, in each problem field the solution needs to align liability and control at the same level of action to be sustainable. Specifically, while national responsibility and national control does seem to constitute a promising approach for fiscal policy, aligning responsibility and control in a European-wide banking union appears to be the best recipe for constructing a stable long-term framework for financial markets.

Thirdly, problems of private and public debt overhang accumulated in the past will not dissolve upon the implementation of a sustainable governance framework. Instead, the European Redemption Pact could be a powerful vehicle for breaking the spell exerted by the combination of high interest rates and low growth rates, freeing up the fiscal means to overcome – if properly monitored and enforced – the legacies of the past.

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Towards a European Banking Union

Ignazio Angeloni*

I vividly remember when, in my capacity as director for international affairs at the Italian Treasury, I participated in the informal Ecofin meeting in the Portuguese city of Porto in September 2007. The first signs of the global financial crisis ahead had just begun to appear, but the prevailing mood was still one of confidence, if not complacency. A small and somewhat arcane segment of the US financial system, the *subprime*, was creating trouble across the Atlantic. Europe was not overly exposed to the US real estate sector, let alone to that small component of it, and hence was deemed likely to prove immune. Then, during that meeting, the UK delegation suddenly left the room and we were informed that a run was in progress on a British bank called Northern Rock. Travelling at the speed of light on news and market wires, the crisis had crossed the ocean. Shortly afterwards, it would cross the channel as well, becoming the euro crisis. We did not expect then, or at least I did not, that those developments would turn out to have a fundamental impact on the euro and the European institutions. Among the few to grasp the full implications of those events was the Italian Finance Minister of the time, the late Tommaso Padoa-Schioppa. He believed that the crisis would, in time, give rise to the opportunity and the need to create a new financial architecture for Europe. He argued that Europe should react by creating a unified regulatory and supervisory framework spanning the entire continent; a banking union to complete and support its still unfinished and fragile monetary union. He proposed that vision repeatedly, in Porto and on several other occasions during his few remaining months as minister, receiving virtually no support from his European peers.

Five years on, discussions are now well underway regarding the establishment of a banking union, and, as a first step, of a supervisory authority for the euro area. The prospect of creating such a union materialised in 2012. In June, the European Commission proposed to take steps in this direction, covering the supervision of cross-border banks and EU deposit guarantee and resolution schemes, and on 29 June 2012 the Euro Summit formally asked the Commission to prepare a proposal for creating a Single Supervisory Mechanism (SSM) involving the ECB and without changing the Treaties. From that moment on, preparations accelerated. On 12 September, the Commission published a draft Council regulation entrusting the ECB with a specific, but comprehensive list of tasks related to the supervision of euro area banks. After appropriate consultations, this text will be submitted for approval to the European Council.

Strengthening bank supervisory and regulatory integration in Europe is the unavoidable consequence of recognising a fundamental inconsistency in European monetary and financial architecture: the singleness of money and financial markets on the one hand, and the fragmentation, along national lines, of banking supervision and banking safety nets on the other. The founding fathers of the euro were well aware of the 'inconsistent trinity' of fixed exchange rates, national monetary policies and open capital markets: a monetary union and the ECB were the answers. However, they were less aware of – or could not act on – another inner contradiction, different in its manifestation, but similar in logic. In the current structure of the monetary union, fragility in national banking systems is immediately transmitted to the domestic fiscal sector, igniting an adverse fiscal/financial loop that weakens both. Either can be the source; countries with very different starting conditions can end up facing similar problems shortly after, all the more so if financial and fiscal weaknesses are compounded by other economic imbalances. The first casualty is financial integration. The integration of the European monetary, banking and securities markets has been

* European Central Bank. This article is based on two recent speeches, one given on 20 September 2012 in London at the annual meeting of AIMA (Alternative Investment Management Association), the other on 9 November 2012 in Lisbon, at the conference on 'Stability and Confidence in European Financial Markets; The Role of Regulation and Supervision', organized by the Banco de Portugal and the European Commission. I am grateful to B. Attinger, G. Caviglia, A. Gardella and A. Pizzolla for their helpful assistance. The ideas expressed here are the author's alone.

severely damaged in the last five years, as documented by reports published by the ECB and the Commission. Countries that lose market confidence and market access are progressively isolated from the area's financial sector, with devastating implications for both the conduct of monetary policy and the single European market. Once this happens, dangers for financial and monetary stability for the area as a whole are just around the corner.

This article, written at a point where negotiations on the creation of a European banking supervisor are well advanced, but have not yet been concluded, will begin by reviewing the reasons for launching this ambitious project. It then mentions the main elements and guiding principles of the prospective SSM, followed by some remarks on an area at the boundary between banking supervision and other policy areas: macro-prudential policy. The article concludes with an issue of great importance, namely the need to establish a European bank resolution authority as a complement to the SSM.

Why a banking union?

In an integrated currency area, financial stability is a matter of collective responsibility. In the euro area specifically, the mismatch between centralised monetary policy decisions and national banking responsibilities has been a destabilising factor throughout the recent period. It still undermines our ability to tackle the crisis in a more effective way.

Growing pressures in funding and lending markets have led to a fragmentation of the euro area banking system along national lines. Links between banks and their own sovereigns have grown tighter. The correlation between the funding cost of euro area banks and those of the respective sovereigns have increased, particularly in the peripheral economies. Countries that lose market confidence become progressively dependent on domestic sources of funding (where and insofar they are available), more prone to capital outflows, and less responsive to monetary policy. The divergence in bank funding conditions at national level in turn gives rise to cross-country differences in lending conditions. The retrenchment of credit supply within national borders, coupled with funding pressures, impairs the transmission of monetary policy, which in the euro area functions primarily *via* banks. Lending conditions for households and firms become tighter than they should be, given the prevailing monetary policy stance, and less predictable. The need to remedy this situation explains large part of the extraordinary monetary policy decisions made by the ECB in the last 18 months, including especially the Securities Market Program and the Outright Market Transactions.

The adverse loop between banks and sovereigns also undermines national efforts towards re-establishing fiscal sustainability. Countries undergoing fiscal adjustment tend to be penalized by financial markets, on account of the additional burden of supporting the domestic banking system. As a result, their banks face increasing refinancing pressures and the fragmentation of the euro area banking system increases further. In these conditions, the effort to re-establish both banking stability and fiscal sustainability can become self-defeating.

The cornerstones of a European bank supervisor

First and foremost, the SSM must be designed so as to avoid a repetition of the mistakes of the past. Historical experience shows that, while crises differ from one another in important respects, they tend to have some common originating elements. These elements include accelerated credit expansion, increasing leverage in the financial and the non-financial sectors, asset price bubbles; and ultimately the loss of contact by financial market participants with economic reality and fundamental values. For several years prior to this financial crisis, accelerated credit growth was widely observed in the banking sector, leading to imbalances and asset bubbles. With hindsight, supervisors were often lenient, constrained either by their mandates, or by other national pressures, or often by both. In Europe, a slow and insufficient reaction was also induced probably in the hope, which turned out to be a fallacy, that the euro and its well-functioning governance would prove sufficient shelter.

Besides taking these systemic repercussions into account, an effective European supervisor should also be designed to ensure even-handed supervisory control across the euro area. Supervisors should be free from local pressures and interests. They should be able to independently assess the situation of individual banks, and connect it to the systemic context. A single supervisory authority in the euro area means going a long way – but not quite *all the way*, as this paper argues – towards solving these problems. In theory, building such an authority around the ECB is not the only solution, but it is the only practical one in the present cir-

cumstances; the ECB has the legal means and, in conjunction with the national authorities, which in most cases coincide with the national central banks, the resources and technical capability to carry out this complex task successfully. This does not imply that the task facing us is easy, or that results will be immediate. For the ECB, and for the more seasoned authorities that carry out supervision in the member states, the new supervision mechanism will represent a sea-change, a 'new frontier', comparable in many ways with the creation of a new currency and a new central bank before the beginning of this century.

Some observers have noted that the presence in the same house of monetary policy and supervisory decisions can lead to overburdening, role confusion or distorted incentives. The international comparison, where banking supervision in most cases involves central banks, does not support this claim in an unambiguous way, provided that appropriate safeguards are in place. Nor have supervisory models built on a strict distinction of the respective authorities proven exempted from incidents. Nonetheless, the risk of 'contamination' between monetary policy (and its overriding goal, price stability) and prudential supervision (aiming at the safety and soundness of credit institutions and the stability of the financial system) is real and should be taken seriously. To guard against this risk, certain principles must be respected.

Firstly, a clear separation needs to be maintained between supervisory decision-making and monetary policy. The draft regulation that is presently under negotiation in the European Council foresees the establishment of a separate Supervisory Board within the ECB to carry out most of the regular supervisory tasks and to take most decisions, under the ultimate authority of the ECB Governing Council. The separation is to be enshrined in the legal text, but in addition, the ECB Governing Council needs to define – and make public – internal procedures to adequately separate day-to-day supervisory activities from monetary policy, and to draw a clear distinction between internal work lines. The internal working modalities should be transparent and known to the public. In my view, their design should not pose any great problems: the experience of other central banks with supervisory responsibility provides a basis for the implementation of this separation principle. The ECB has also, in this respect, the great advantage that the goal of monetary policy is specified in an objectively measurable manner: a rate of HICP inflation close to, but below, 2 percent in the medium term. A price stability objective so clearly defined cannot easily be overlooked or dismissed.

The second principle is that the SSM should possess a complete set of supervisory instruments. For the new system to operate effectively and efficiently, the perimeters of supervision must be sound and clearly established. This means the functional perimeter (which tasks should fall under the responsibility of the supervisor?), the jurisdictional perimeter (which countries should be covered?), and the institutional perimeter (which banks?).

The draft regulation is clear in all three respects. In the first area *(functional)*, it entrusts the ECB with a broad range of specific tasks, instruments and powers, ranging from authorisation to undertake banking activities, or major acquisitions and participations, to the full range of Pillar 2 activities, including capital adequacy, risk and other internal controls, at the group level and for individual entities, including stress testing. The regulation also allows the ECB to obtain all necessary information, in addition to the usual statistical supervisory reporting, through off-site and, if necessary, on-site inspections. Macro-prudential tools are covered and investigatory, early intervention and sanctioning powers are also mentioned in some detail.

In relation to the second area *(jurisdictional)*, although the SSM is intended primarily to cover the euro area, it is foreseen that non-euro area member countries may also participate in the system. This option is important because it helps to preserve the single market and to promote financial integration in the EU as a whole. In this context, I do not share the oft-expressed view that enhancing supervisory convergence among 17 EU countries out of 27, including some of the largest countries, risks undermining the cohesion of banking markets in the Union as a whole. On the contrary, I also expect this move to exert a beneficial influence beyond the boundaries of the euro area.

Thirdly, setting the institutional perimeter correctly involves answering a question that has been the subject of lively debate, namely: should all banks be covered (there are over 6,000 in the euro area), or merely the 'important' ones? And what defines 'importance'? The supervisory system will encompass all euro area banks, to prevent segmentations in the banking sector. The more significant banking groups and standalone banks, whose influence spills over national boundaries into the euro area as a whole – indeed, in

some cases, to the global economy – or that have a systemic influence on their respective national economies, will require closer scrutiny and the involvement of the centre, meaning the Supervisory Board and the ECB's staff in Frankfurt; although these groups and individual institutions will still work in close cooperation with the national authorities in many of their daily activities. As one moves down the dimensional scale, to banks of national or local relevance, the role and responsibilities of national supervisors should correspondingly increase, and become predominant. The ECB will organise itself with the national authorities so that the best expertise can be used wherever it is available. Importantly, the Supervisory Board should be able to obtain information on all banks and to decide, whenever it sees the need, to bring under its direct scrutiny banks that entail specific problems of high relevance.

The third principle is that the supervisory authority should be independent, but also transparent and strongly accountable. In virtually all countries, legal provisions protect the independence of monetary policymakers, to prevent conflicts between long-run gains from price stability and short-term benefits from monetary accommodation. Bank supervision is different, but a similar trade-off arises; and surely, external pressure is no less important. The ECB is protected by strong statutory provisions on independence. In addition, the ECB should also enjoy operational independence as a supervisor, as prescribed by the Core Principles set out by the Basel Committee on Bank Supervision. The counterweight of independence, democratic accountability, must be equally strong, at both the European and national levels. The ECB will cooperate fully in this area with the relevant authorities – primarily the European Parliament and Council.

Micro joins macro: a macro-prudential supervisory approach

Understanding the relation between supervising individual banks and preserving systemic financial stability is essential for designing an effective SSM. Before the crisis, banking supervision was, in all countries, fundamentally 'micro-based', i.e. it was focused on ensuring the safety and soundness of individual institutions taking the rest of the financial system as given. In recent years the emphasis has shifted towards a macro-prudential approach, focused on detecting and preventing systemic risks. Credit institutions may be 'systemic', for a variety of reasons; for the interconnection and cross-exposure with other banks; because of market inter-linkages; through the intermission of the domestic fiscal sector; or in other ways. When systemic institutions are present, the traditional micro-based approach, assuming that the rest of the system remains stable and exogenous, fails because it overestimates the efficiency gains and underestimates the negative externalities stemming from certain types of financial innovation. A micro-based supervisory approach is more likely to err on the side of leniency. It is now broadly accepted that some of the structural changes that occurred in the last two decades have facilitated the build-up of systemic risks. Deregulation and financial innovation in most developed countries have led to a profound overhaul of banks' business models, creating incentives to take on more risk.

European legislation contains a variety of instruments to conduct macro-prudential policy including countercyclical capital buffers, surcharges differentiated across banks according to their contribution to systemic risk, liquidity and leverage requirements, stable funding provisions, to name a few. Others, like loan-to-income or loan-to-value ratios, remain confined within national legislation. The draft Council Regulation on the SSM places the instruments included in European law in the SSM's realm of competence. While this approach is beneficial, it must also be recognised that national authorities also have a legitimate interest in some of these instruments for domestic regulatory purposes. Ways will need to be found to reconcile those interests with the integrity and the effectiveness of the SSM.

Completing the union: a European bank resolution authority

Another key component of a banking union worth mentioning is a single bank resolution authority. Its objective is to ensure, in an area-wide consistent way, the orderly resolution of insolvent banks, with minimum or no recourse to the taxpayer. In the absence of such an authority, bail-outs would often remain the easiest option in the face of legal, institutional and political difficulties, especially if cross-border entities were to be involved.

The European Commission's directive on recovery and resolution takes a step in the right direction, by establishing a common resolution toolbox. This, however, does not go far enough, because the outcome can

very much depend on the application of those tools in individual countries. A European Resolution Authority (ERA), free of the constraints of national mandates, is needed to exercise this function in an even-handed manner across the euro area. The authority should have tools to address banking crises pre-emptively, safeguarding financial stability and minimising taxpayer exposure to losses. Once created, the ERA will use homogeneous tools, principles and procedures and implement them consistently across all banks and countries in its jurisdiction.

The ERA and SSM are natural complements. The SSM removes what has to date been the guiding principle of the EU's cross-border supervisory framework, the home country control. In the current setting, national resolution authorities – responsible to fund resolution and to cover insured depositors – have an incentive to postpone bank resolution, requesting emergency financing for as long as possible in the hope that this may turn things around, rather than taking swift action. As a supervisor, the ECB, on the other hand, may be exposed to criticism for being excessively severe and putting national funds at risk when it pushes for resolution actions at the national level. Once banks are regulated and supervised at an area wide level, a common resolution authority inevitably becomes a necessity.

Further down the line, the SSM and ERA could eventually be accompanied by a joint deposit guarantee scheme. This scheme could also be put under the control of the ERA, which would then, like the FDIC in the United States, be able to exploit the synergies between the related activities of bank resolution and depositor protection.

Conclusions

Establishing a banking union is a critical step towards completing the construction of a stable Economic and Monetary Union. Establishing an effective European bank supervisor is the essential starting point, because such a supervisor can provide a rigorous and even-handed assessment of bank soundness and financial stability, which is the premise for all policy decisions.

However, the supervisory arm is not sufficient. In the end, there must be certainty within the system that each bank, however large and important, can exit the market, if necessary, at the lowest possible costs in terms of systemic stability and use of collective resources. Only a European resolution authority, with jurisdiction over the same geographical area as the single supervisor, can perform this function effectively.

Banking Union: Inevitable, But Profoundly Challenging?

Iain Begg*

In some eyes, banking union is the latest in a long line of 'magic bullets' capable of ending the rolling crisis that has engulfed the euro area. It is, though, better seen as a further piece of the jigsaw of reinvention of the governance of the euro area aimed at the flaws in the euro exposed by the crisis. Among these flaws, the diagnosis that the toxic interactions between sovereign and bank debt would imperil the single currency is at the heart of calls for banking union in Europe.

The new 'impossible trinity' articulated by Pisani-Ferry (2012) points to the following facets of monetary union that cannot all simultaneously hold:

- The prohibition on direct monetary financing of the debts of Member States which appears to preclude the ECB from direct purchases of sovereign debt.
- The fact that there is no collective responsibility for public debt, such that Member States in difficulty are susceptible to market pressures much more rapidly than if there were a common borrowing capability. Some form of Eurobonds, jointly and severally guaranteed by all Member States (at least of the euro area) is the eventual answer.
- The interdependence between sovereigns and banks in each Member State which results in banks becoming fragile if they hold their country's public debt, while the fragility of the banks undermines the borrowing status of the sovereign that has to stand behind them. Sovereign bonds tend to be thought of as safe assets, but the problems in Ireland and Spain have shown that market sentiment can turn quickly, leading to a vicious circle, especially in smaller countries.

* London School of Economics and Political Science.

Among the directions for reform mapped out by the 'four presidents' (see European Council 2012), it has become clear that banking, fiscal and political union are firmly on the agenda with the aim of establishing what they call a 'genuine economic and monetary union'. At the same time, all of these putative 'unions' are beset by ambiguity. Nevertheless, in the same way as monetary union offered a way out of the original Mundell impossible trinity, an underlying rationale for banking union is to provide part of the solution to the Pisani-Ferry one.

While the rationale for banking union is broadly accepted, it is far from clear what it will encompass, nor how the many institutional, sequencing and distributive difficulties it engenders will be resolved. This paper looks in particular at the political economy dimensions of banking union, including burden-sharing and institutional issues, and proposes possible solutions.

What banking union entails

Conceptually, banking union is about the case for integration of four distinct, though overlapping functions:

- prudential supervision,
- resolution of failing banks,
- protection of depositors, and
- broader regulatory oversight of the financial sector.

At present, these functions are undertaken mainly at national level, though within the framework of single market rules that are based on the mutual recognition principle. The Turner Review (see FSA 2009) into the causes of the 2007/8 financial crisis argued that this approach of home country control of banking was no longer suited to the post crisis financial setting, so that the EU faces a stark choice between closer integration and re-creating barriers. Given that the implicit answer to Turner's dilemma is to further integration, banking union necessarily involves a recasting of not only 'who does what?' in overseeing financial Europe, but also of 'who is liable for what?'.

Distributive challenges are therefore fundamental to the form of banking union. Each of the four elements of a putative union has implications for different interests and will require differing degrees of institutional change.

As a result, political economy is bound to pervade the debates. Likely conflicts will pit Member States against each other; taxpayers against bank shareholders and bondholders; and borrowers against savers at the level of the household, the economic sector and the Member State. In addition, there will be institutional complications about the roles of the various agencies of governance, accentuated by the disjunction between EU membership, euro area membership and the willingness of some euro 'outs' nevertheless to take part in banking union. The elephant in the room is the dominant position of the City of London as Europe's financial centre. In all this, the key issue is how the costs of assuring a functioning European banking system are both shared and contained.

Several underlying aims of banking union can be identified, some of which are primarily about exit from crisis, while others are about the long term functioning of monetary union. Among the former, restoring the functionality of the inter-bank system at EU level is critical, since the freezing-up of wholesale financial markets has imperilled recovery. Stemming the outflow of money from the banking systems of Member States in difficulty is also vital. An imperative is reducing the exposure of sovereigns and, through them, of taxpayers to bank failures. Given that many financial intermediaries have become so large relative to their national economies, a pooling of capacity at EU level is needed to cope with financial risk.

The euro area faces the further challenge of countering incentives for Member States to seek to resolve national problems by shifting the burden to partner countries through various forms of buck-passing. It is also about complementing the lender of last resort function which the ECB has, somewhat reluctantly, agreed it must fulfil – and continues to cloak in ambiguity. However, a delicate balance will have to be struck between cross-border provision of insurance mechanisms and aggravation of moral hazard risks.

Political time to banking union

Throughout the euro crisis, there has been a disconnection between the time it has taken to enact change and market expectations of action. Decision-makers have often appeared to procrastinate, despite the paradox that the extent of governance reforms has been – by EU standards – almost frenetic (see Begg 2013). Markets bemoan the dilatory approach of political leaders, but overlook the fact that these same leaders have, first, to persuade their different constituencies of the necessity of reform, then to follow due constitutional process in enacting it. Both steps take time and mean that the immediacy that markets look for can almost never be satisfied, except in the rare instances of crisis weekends where the authorities simply have no choice but to cobble together an emergency package (examples are the near meltdown of the banking system in October 2008 and the initial culmination of the Greek crisis in May 2010). Moreover the first step can take considerably longer where the reform under consideration has significant distributive consequences.

Through this lens, the timing of adoption of elements of banking union can be seen as a process rather than a menu of choices, and more time will be needed to agree some of the politically more sensitive elements. Thus, common supervision is likely to be easier to sell to sceptical citizens and other stakeholders because it is viewed (largely, if not entirely accurately) as a technical matter. The test of its legitimacy would be whether a sound banking system can be assured more effectively than if supervision is fragmented among Member States.

A slow route to banking union (recalling the debates prior to monetary union about the pace of convergence) is advocated by the German Council of Economic Experts (2012) who suggest three phases (again echoing the Maastricht formula), the third of which could take up to a decade:

- a legal and institutional preparation phase,
- a period during which banks qualify, and
- full banking union.

The German Experts have also championed the idea of dealing with legacy problems first, then revisiting how common policies can be introduced for the indefinite future. Their proposed European Redemption Pact (ERP) would deal with what might be called the excessive debt of sovereigns as a one-off exercise, subject to the Member States accepting a range of conditions designed to prevent moral hazard. Similar proposals have been put forward (e.g. Beck *et al.* 2012) for a temporary bank resolution agency that would manage the process of recapitalising failing banks.

Delay is, though likely to be costly. Today, difficult questions surround timing, not least because there is an urgency to the crisis-exit side of banking union. Rapid progress would have an immediate crisis resolution benefit, in addition to the longer term gains from an improved approach to containing systemic risk. The crisis resolution effect will be enhanced if, as is expected, the ESM is allowed to inject money directly into fragile banks, rather than (as in Ireland) support being channelled through the Member State's public finances.

Institutional framework

Banking union is beset by institutional difficulties, none of them wholly intractable, but all politically awkward. The most glaring is the disjunction between an ECB seen as an agency of the euro area, and therefore lacking legitimacy for the euro 'outs' (some of which wish to be part of banking union, while others demur), and a single credit market that encompasses all Member States of the EU. There will also be institutional problems to solve concerning the existing supervisory and regulatory structures, notably the role of the European Banking Authority (EBA) and the European Systemic Risk Board (ESRB), again both EU27 entities.

What is sometimes forgotten is that the ECB is an institution of the EU as a whole and a possible solution is that, in the General Council, it has a structure that includes all EU Member States. As explained on the ECB website,[1] this Council is a transitional body that will be dissolved once all EU members have adopted the euro. Since there is no realistic prospect of that contingency occurring soon, a possible solution to the current 17/27 incompatibility is to confer responsibility for oversight of banking union on the General Council. The treaty states (Art 141.1, TFEU) that "the General Council of the European Central Bank referred to in Article 44 of the Statute of the ESCB and of the ECB shall be constituted as a third decision-making body of the European Central Bank".

Although the specific tasks assigned to the General Council are limited, they are also defined somewhat vaguely. Thus, the fourth indent of Art. 141.2, TFEU, refers to the ECB holding consultations on issues falling within the competence of national central banks affecting financial stability. The responsibilities of the General Council listed in Art. 46 of the Statute of the ESCB and of the ECB (a Protocol to the Treaty) include an advisory function on prudential supervision. Moreover the enabling clause which states that the ECB may have additional tasks conferred on it in relation to financial supervision (Art 127.6, TFEU), makes no reference to Member States not participating in the euro.

There are also calls for some form of common bank resolution authority (see Carmassi *et al.* 2012; Schoenmaker and Gros 2012). The case for an EU level resolution capability is, primarily, that national systems faced with an asymmetric shock are at too great a risk of being unable to cope, with the corollary that there is a contagion risk across borders. Here lessons can be learned from how the United States and Britain went about rescuing fragile banks, but also how the Nordic countries dealt with their banking crises in the early 1990s. A crucial question is whether what is now needed is, in effect, a European TARP, encompassing a means of separating good bank and bad bank assets.

Obstacles and concerns

Numerous objections to banking union have been articulated, some self-serving, some more principled. Underlying many of these concerns is how to move to a new framework from a present in which the crisis is still unresolved and its aftermath will continue to cast a dark shadow. One of the main challenges is how to restore precarious banks to health. Recapitalisation has been occurring, albeit slowly in too many countries, but there is also a latent problem of non-performing assets.

Although there are arguments for retaining a supervisory capability close to the supervised at national level, there is also a strong 'economies of scope' argument for centralised supervision of banks with significant cross-border business – in effect rooted in the Olsonian notion of equivalence. There are also open questions about whether, first, a supranational supervisor can put (desirable) distance between itself and the banks, or, second, whether diversity in approaches to supervision is an obstacle or leads to an excessive degree of conformity that accentuates risk (see Wagner 2012).

Also difficult, and the core of the disputes between France and Germany about the adoption of banking union, is whether to limit European level involvement

[1] See http://www.ecb.int/ecb/orga/decisions/genc/html/index.en.html.

to the largest banks and/or those with extensive cross-border activity. Although systemic risk is normally associated with the expression 'too big to fail', leading to the German preference for a banking union that focuses on the largest European banks, financial crises are often triggered by smaller or medium-sized entities. Examples are Lehman Brothers, Anglo-Irish Bank or Bankia.

Many commentators argue that partial banking union would be a serious mistake (e.g. Wyplosz 2012; Schoenemaker 2012) because it would result in information gaps and ambiguities about responsibilities which, in a worst case, could aggravate systemic problems. Moreover, Pisani-Ferry and Wolff (2012) argue, however, that mutualisation of liabilities is of second-order importance. While these analyses may be logically correct, the element of timing is critical and the key challenge is sequencing. Even if manifestly sub-optimal, a banking union that starts with supervision can then move on to the more contested elements, provided that there is a clear destination.

The argument that banking supervision and monetary policy should be separated has some force and has, if anything, become the preferred approach in the EU in the last two decades (see Begg 2009). The reasoning is straightforward: if the same institution (in practice, the ECB) is responsible for both tasks, it may have incentives to be lax in supervision to prevent financial instability. Conferring supervisory responsibility on the ECB risks compromising the independence of monetary policy and needs a clear separation which for which it is debateable whether 'Chinese walls' would suffice. Those who argue for the ECB (e.g. Eijffinger and Niskens 2012) recognise that there can be incentive compatibility problems, but maintain that the benefits outweigh the risks. Particularly in more difficult times, rapid access to relevant information and speed of action are of the essence.

Burden-sharing has been at the heart of much of the debate on reform of EU economic governance and is an issue that will unavoidably be prominent in banking union for the simple reason that bank resolution and deposit insurance require 'back-stopping' by the taxpayer. Consequently, a common approach will often impose some potential burden on taxpayers in other Member States when problems arise in just one. In an integrated market, the difficulties of home country control become evident. Citing the difficulties encountered in the resolution of Dexia and Fortis, both with significant activity in more than one country, Goodhart (2012) argues forcibly for establishing a firm *ex-ante* rule for how the costs of resolution will be distributed, although he concedes that even then there will be disputes over how to attribute blame.

He also points out that there are differing ramifications of calling on different stakeholders to contribute funds to a resolution process. Thus, in Ireland, allegedly under pressure from the ECB – worried about possible contagion effects that would imperil the stability of the EU banking system – the tax-payer was prevailed upon to shoulder the burden, while senior bondholders were protected. The reverse was true in Iceland, triggering a case still before the European Court of Justice. In the end, it is undeniable that whether it is the bondholder or the general tax-payer who comes to the rescue, the public is always hit – what is at issue is how the costs are distributed among the population.

In today's context, it is German (and other Northern European) taxpayers who balk at taking on commitments for the consequences of bank failures that might occur in Spain, Cyprus or Italy. Over time, these potential costs might even out and there are credible arguments about the scope for lowering the long-term costs by pooling, but the political time needed to make the case inhibits a quick decision. As in any insurance mechanism, ways of limiting adverse selection and moral hazard will have to be found.

Paying for banking union

Because emergency liquidity provision, bank resolution and deposit insurance require injections of funding, inevitable questions are who pays and carries which risks? Liquidity, in principle, is a monetary policy issue and the obvious actor to provide that liquidity is the ESCB, with the ECB taking the lead in assuring liquidity as an explicit lender of last resort.

Dealing with insolvency implies a formula for distributing the costs, for which there are three main options. The first is to impose a levy on banks that builds up to a contingency fund, something that will take time to become sufficiently well-endowed and will be especially difficult in a period when European banks are already struggling to bolster their capital base. Second, there could be a specific fund – the European Stability Mechanism is a model – hypothecated to bank resolution.

The third possibility is an open-ended commitment by tax-payers to step in where necessary. As the crisis has dragged on such a commitment has grown, with retail depositors in most countries effectively having all their money guaranteed, even though there are notional ceilings on how much is protected.[2] Although these guarantees, along with the cash for shoring up banks have elicited howls of outrage, governments have consistently been able to draw on these resources. However, with the exception of the Icelandic banks for which British and Dutch taxpayers had to bear the cost – and even then they were largely bailing out their own citizens – and the resolution of Fortis, which required an awkward tripartite approach involving all three Benelux countries, the bank rescues have been national.

There are viable solutions that, while certain to encounter stiff resistance, deserve to be explored. The revenue to establish a supranational fiscal capacity could come either from tapping into a new source of revenue – a financial transactions tax (FTT) is the obvious contender and would have the added attraction of having a direct link to banking – or from reassignment of an existing revenue stream. However, if Britain and others continue to object to an EU-wide FTT, the ability of other Member States to raise significant amounts through it will be limited. Among existing revenue streams, two options are the monetary income of the ECB and the ESCB, or a harmonised corporate income tax.

The monetary income of the ECB in recent years has been sizeable, reaching 2 billion euros in 2011, 40 percent of which comes from the ECB's 8 percent share of currency issue, implying a much larger figure for national central banks. Moreover, when the Bank increases its lending, as it does in periods of turmoil, the scope for generating revenue is typically enhanced: half the ECB profit in 2011 came from net interest from the Securities Market Programme, showing an ability to boost revenue at precisely the time it is needed. Conservatively, annual monetary income can be estimated at around 0.2 percent of EU GDP. Monetary income has the further political attraction of being largely invisible to citizens, even though finance ministers would resent losing their share of it.

Taxes on profits are both intrinsically difficult to apportion fairly among Member States in a closely integrated single market, and anti-cyclical because of the well-known sensitivity of profits (the tax base) to the economic cycle. CIT would therefore, be a strong candidate for financing a supranational fiscal capacity with a primary role in stabilisation, although strong resistance can be anticipated from Member States which have structured their tax systems around low CIT rates to attract inward investors. It could also, however, provide resources for banking union. Although the yield of CIT can fluctuate sharply, especially in times as difficult as the present, it is typically 2 percent or more of GDP.

Conclusions

Any trajectory towards banking union will have to combine immediate crisis resolution with the putting in place of a new long-term framework. For the former, rapid action is vital, whereas making the right choices, rather than undue haste, will be critical for the latter. It follows that the sequencing of steps towards banking union needs great care but that there has to be an unambiguous goal. A key conclusion of this paper is that Europe's leaders should focus on the end goal rather than trying to do it all at once.

The likely outcome will be a quasi-federal model in which significant tasks remain with national supervisory agencies (a possible model is put forward by Carmassi *et al.* 2012), drawing on the experience of EU competition policy after 2003 (see Begg 2009). However, it will not be easy to establish an effective institutional structure in which the advantages of a federal arrangement can be achieved without blurring responsibilities and accountability. In a context in which so many actors are likely to be involved (ECB, national central banks, ESRB, EBA, national supervisors and regulators, the Commission, finance ministries and, possibly, separate deposit insurance providers), clarity will be vital. Perhaps most critical will be where the buck stops. For this reason, assigning the responsibility for banking union to the General Council of the ECB could help to make progress.

Public money will be needed to deal with bank problems at the supranational level (EU27 or euro area), but as things stand, there is no direct revenue source that the supranational level can use for this purpose. The quandary is that if supranational supervision fails – and it will on occasion – it leads to costs for the public finances, but there is no EU taxpayer, only national ones. As Goodhart (2012, 111) sharply observes: "it is

[2] Thus, in Britain and Ireland, no depositor lost money.

always the public who bear the burden of taxation one way or another". While it is easy to devise simple and tolerably equitable keys for distributing any costs, such as basing shares on the relative nominal GDP of each Member State,[3] the political economy of paying for failing banks is likely to be highly contested. To put it bluntly, how will German taxpayers react to an obligation to pay for a failing French or Belgian bank, let alone a Greek one?

Consequently, banking union is going to struggle until there is a credible power to tax at European level, something that will entail a step-change towards federalism in European integration. An answer could come from assigning the proceeds of a financial transaction tax and the monetary income of the ECB and, possibly, the rest of the ESCB to a common pool, while examining the scope for an integrated corporate income tax.

None of this will be easy, but the *status quo* is manifestly untenable.

[3] As a parallel, the monetary income accruing to the ECB is distributed in this way.

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Banking Union in the Making

Stefano Micossi*

Since last June's European Council and Eurosummit, banking union has become a principal building block of the reinforced Economic and Monetary Union outlined in the Four Presidents' Road Map (European Council 2012). The immediate reason for this momentous decision was the urgent need to tackle the mutually reinforcing sovereign debt and banking crises in Spain, which held the potential to wreck the entire eurozone financial system: centralization of supervision was decided as the precondition for intervention by the European Stability Mechanism (ESM) in the recapitalization of ailing Spanish banks, which would thus take place without further augmenting Spain's sovereign debt.[1] Ireland, overburdened by its decision to make good all of its banking losses with taxpayers' money – not least owing to German insistence – was seen as next in line.

An additional ill-effect of the national supervision of cross-border banks, by both home and host country supervisors, has been informal action to impede the transfer within banking groups of pools of liquidity held by branches and subsidiaries of banks based in other member states of the Union. This behaviour, which is clearly inconsistent with the Single Market rules, reflects the segmentations of financial markets engendered by the opening of wide spreads in banks' borrowing costs and the progressive drying-up of the cross-border interbank market. At least to an extent, these spreads are a reflection of sovereign risk pricing rather than banks' specific risk profiles. By eliminating this anomalous component, the banking union would help restore open financial markets within the eurozone and the Union, together with well-functioning monetary policy transmission mechanisms.

* ASSONIME, Rome, College of Europe and CEPS.

[1] See the Euro Area Summit Statement of 29 June 2012.

More broadly, the crisis fully highlighted the role of reckless lending by 'core' eurozone banks in accommodating not only excessive government spending, but also housing bubbles, divergent wages and price inflation in the 'periphery' in the build-up of unsustainable public and private debts (Figure 1).

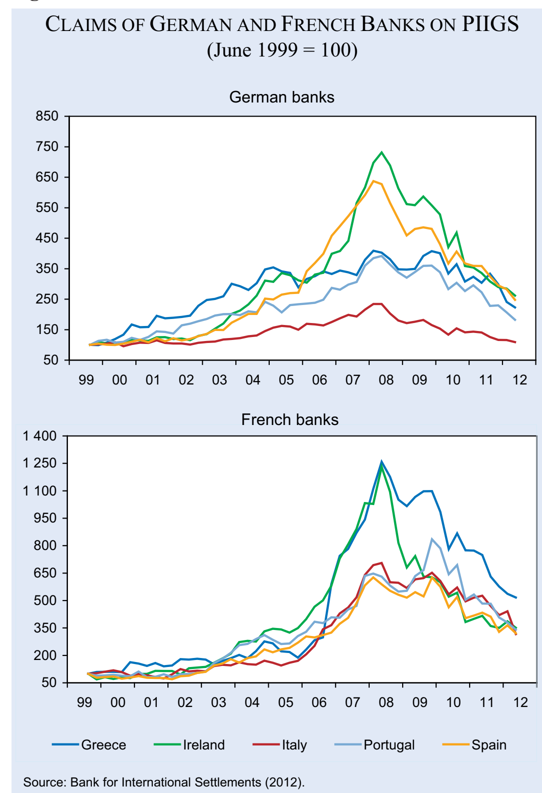
In a highly integrated financial system like the European Union, taming moral hazard and excessive risk-taking requires the simultaneous centralization of supranational banking supervision, deposit insurance and crisis management (including resolution). The three functions are intimately interconnected and only their joint management can eradicate the expectation of national bail-outs.

The Commission proposal published on 12 September 2012[2] covers bank supervision but not deposit insurance and resolution. On this subject, the Road Map speaks of '*single* European banking supervision and a *common* deposit insurance and resolution framework' (see p. 4), potentially paving the way towards a different legal regime for the two latter domains. However, in its Communication on the banking union, the Commission has announced its intention to seek 'a single resolution mechanism' in the banking union (see p. 9).

Since the June summits, enthusiasm for banking union has somewhat receded, following a barrage of objections that have called into question even the initial goal of severing the vicious link between sovereign and banking crises in Spain. And yet, at its forthcoming meeting in December, the European Council is committed to deciding on the legal framework for banking supervision by the ECB, as well as on appropriate modifications of the European Banking Authority (EBA) powers and voting rules so as to

[2] Proposal for a Council Regulation conferring specific tasks on the ECB concerning policies relating to the prudential supervision of credit institutions, COM(2012) 511 final of 12.9.2012; Proposal for a Regulation of the European Parliament and of the Council amending Regulation (EU) No 1093/2010 establishing a European Supervisory Authority (European Banking Authority) as regards its interaction with Council Regulation (EU) No …/… conferring specific tasks on the European Central Bank concerning policies relating to the prudential supervision of credit institutions, COM(2012) 512 final of 12.9.2012; and Communication from the Commission to the European Parliament and the Council, A Roadmap towards a Banking Union, COM(2012) 510 final of 12.9.2012.

Figure 1



CLAIMS OF GERMAN AND FRENCH BANKS ON PIIGS
(June 1999 = 100)

Source: Bank for International Settlements (2012).

ensure that Union countries not participating in the Single Supervisory Mechanism (SSM) will not see their rights in the Single Market weakened.

The legal basis for entrusting management of the SSM to the ECB is likely to rest[3] on Article 127 Paragraph 6 of the Treaty on the Functioning of the European Union (TFEU): accordingly, decisions will be taken 'with special legislative procedure' by the Council acting 'unanimously' and 'after consulting' the European Parliament and the ECB.

At the time of writing, the European Council is only few weeks away and it is naturally impossible to predict the outcome of its deliberations. However, the questions that can be raised at this stage and the solutions proposed here may offer a standard against which to evaluate the Council conclusions.

Who should participate in the SSM?

Under the Commission proposal, the centralization of supervisory powers at the ECB would legally bind eurozone members, while non-euro member states of the Union could join voluntarily by signing a 'close cooperation' arrangement entailing reduced membership rights (i.e. presence on the Supervisory Board as observers only and the possibility of unilateral termination of the cooperation arrangement by the ECB in case of any breach of the terms of the agreement).

This approach was justified by reference to the ECB Statute, which provides that the ECB rules and decisions have legal value only *vis-à-vis* the members of the eurozone (Article 42 Paragraph 1). Such an approach entails risks of segmentation of the Single Market for banking and financial services, to the extent that over time the ECB came to develop divergent supervisory standards not accepted by non-euro countries. Precisely for this reason, Britain and other non-euro Union members are pressing to strengthen the standard-setting powers of EBA in the domain of supervision (including the *rulebook* as well as the *handbook*, i.e. operational practices) and to require special majorities for EBA decisions so as to preserve the interest of countries not participating in the SSM.

In this regard, the remit of Article 127 Paragraph 6 is not restricted to the eurozone, but may apply to the entire Union.[4] There is little doubt, more generally, that under the Treaty the ECB is a Union institution, while the restriction of its monetary functions only to certain member states is a 'temporary' situation permitted under a derogation from Treaty obligations. It is also worth recalling that the Road Map had called for "an integrated financial framework […] cover[ing] all EU member states, whilst allowing for specific differentiations between euro and non-euro area member states" (see p. 4). As far as this point is concerned, it may be argued that, as a general principle, the Treaty should prevail over the ECB Statute, as the Council attributed new legal powers to the ECB based on Article 127; alternatively, one would have to revise the ECB Statute with the same (unanimous) Council decision setting up the SSM, and subsequent ratification by the member states.[5]

Should some countries decide not to participate and threaten to exercise their veto power to block the deci-

[3] Likely, but not certain: indeed, some may argue that Article 127 Paragraph 6 does not provide a sufficient legal basis for the centralization of the whole activity of supervision – since this paragraph speaks of "specific tasks […] concerning policies relating to prudential supervision of credit institutions […]". If this argument were to prevail, then the establishment of the SSM would require a Treaty change.

[4] This is made explicit by the transitional provisions of Article 139(2c), which do not mention Article 127 Paragraph 6 among those that do not apply to member states 'in derogation' (i.e. not using the euro). A similar provision is present in Protocol 15 regarding the application of Article 127(6) to Britain and Northern Ireland.

[5] In this manner, the European Council would proceed under the simplified procedure for Treaty revision under Article 48 Paragraph 6 TUE.

sion, then the others may well decide to go ahead by using Article 127 in conjunction with Article 20 of the Treaty on the European Union (TUE), providing for enhanced cooperation between some (at least nine) member states.

This issue is one of paramount importance for the future of the Union: the decision to move on with the narrow eurozone circle may have unpredictable consequences not only for the Single Market, but also in terms of the ability of the Union to survive as the overarching political body in the European construction; bearing in mind that many a decision already taken to preserve the euro already points in the direction of a narrow circle architecture of Economic and Monetary Union.

The institutional set-up

Three questions must be examined here: (a) the separation of monetary and micro-supervisory functions within the ECB, (b) the relationship between the ECB and EBA in the performance of supervisory tasks, and (c) the relationship to be established with existing national supervisory structures. As for the first issue, the ECB is currently responsible for carrying out the monetary policy functions, defined by Article 127(2) of TFEU, while the ECB President also chairs the European Systemic Risk Board[6], which is responsible for macro-prudential stability and for which the ECB also provides a secretariat.

Micro-supervision, the subject of the Commission's proposal, is an entirely different matter since concern for individual banks' safety and soundness may at times come into conflict with monetary policy goals (Goodhart and Schoenmaker 1995; Ioannidou 2012). The argument is fairly simple: by construction, monetary policy is counter-cyclical (must lean against the economic cycle) while supervision is pro-cyclical (banks' balance sheets look better during expansions leading to less stringent supervisory constraints). The real danger of mingling the two activities is not monetary policy laxity, since ECB procedures leave little leeway; it is rather the possibility for the monetary authority to become entangled in political controversies with the member states over the application of supervisory practices, which could detract from its perceived impartiality.

[6] Significantly, the ESRB also has a vice-chair from a non-eurozone country.

In this regard, the Commission proposal does not go far enough, in that the new function is set up as an internal function of the ECB, exercised with delegated powers from the Governing Council of the ECB and under its 'oversight and responsibility' (Article 19.3 of the Commission proposal). Under such a set-up, separation seems hardly guaranteed and there is a high risk of contamination between the two functions. The desirable alternative is for the ECB to entrust the new Supervisory Board with full organizational autonomy, using its organizational autonomy under its Statute to this end.

The structure of the Supervisory Board should mimic that of the ECB Governing Council, and therefore also comprise of an Executive Board. The Executive Board should be charged with running day-to-day supervision and deciding individual cases, in full independence from member states' supervisors. As envisaged by the Commission Communication – but perhaps not fully reflected in legislative texts as yet – the EBA would remain in charge of ensuring not only a single rule book, but also uniform supervisory practices (the *'hand book'*). An extra guaranty of full and effective coordination with the EBA would be provided by the presence of its chairman as a full voting member on the Executive Board of the SSM.

The ECB and national supervisors

A further aspect that must be modified in the Commission proposal concerns the relationship between the Union and national supervisory structures. Under the Commission proposal, the ECB would acquire 'exclusive competences' in carrying out the tasks listed in Article 4 Paragraph 1, and build up a new administrative structure for its fully centralized exercise. Quite differently, the Road Map had envisaged the creation of "a single supervision system with a European and a national level. The European level would have ultimate responsibility […] and would be given supervisory authority and pre-emptive intervention powers applicable to all banks. Its direct involvement would vary depending on the size and nature of banks".

An alternative institutional set-up to the Commission proposal, more in tune with the Road Map, is offered by the network model for the enforcement of EU antitrust law (Articles 101 and 102 TFEU) contained in Council Regulation 1/2003. Under that model, the centralized enforcer (the Commission) and national

authorities are both obliged to apply EU rules in individual cases; the allocation of cases is governed by guidelines set out at the EU level; information on individual proceedings flows systematically within the network of competition authorities; and the European authority may advocate any case in order to ensure the consistent operation of the system. The beauty of this system is that cases are almost automatically handled at the right level, thereby avoiding any unnecessary centralization of powers or duplication of structures, in full accordance with the principle of subsidiarity. Under this 'network' model for supervision, national supervisory structures would be fully incorporated into the new supranational system, thus allowing full exploitation of their expertise and knowledge of national banking structures; and the need for fresh human and financial resources to manage the new supervisory tasks would be minimized.

Supervisory approach

The financial crisis highlighted, among many regulatory failures, a widespread tendency by national regulators and supervisors to side with their troubled banks in hiding information from the public, delaying loss recognition and postponing corrective action, thus magnifying eventual losses (Calomiris and Herring 2011; Carmassi and Micossi 2012). Transferring supervisory powers to the Union level can go most of the way in removing supervisory forbearance from the system; however, the system would be strengthened further by the adoption of Prompt Corrective Action as under the US Federal Deposit Insurance Corporation Improvement Act (FDICIA) of 1991, which entails stronger constraints for supervisors to act in the general interest of depositors and investors. The key feature in this approach is that supervisors are obliged to intervene, or at least under a strong presumption to act, once certain publicly available capital thresholds are crossed.[7]

As for *crisis management powers*, they must be attributed to the EU level in order to establish a credible threat that bank shareholders and managers will be fully liable for the consequences of imprudent behaviour. An important matter to be decided here is where to place the borderline between supervisory corrective action and resolution proper. On this point, the Commission proposal (Article 4.1k) includes, amongst supervisory powers to be transferred to the ECB, early intervention 'including recovery plans and intra-group financial support arrangements', with the proviso that these powers will be exercised 'in cooperation with the relevant resolution authorities'. A better solution would be to bring all crisis-management measures that do not involve winding up the banks explicitly under the supervisory umbrella of the ECB: therefore including the power to order the suspension of dividends, recapitalization, management changes, asset disposal and bank restructuring, up to the creation of a 'bad' bank (Carmassi *et al.* 2010). With these powers in the hand of the ECB – as they are under the US FDIC system and in some EU member states – deterrence would be sufficiently strong and supervisory forbearance at a national level would be precluded.

Deposit insurance and bank resolution

As for deposit insurance, it must be understood that it is not an optional feature since there would otherwise be strong incentives for national supervisors to free ride on protection offered by others.[8] The paramount requirement, in designing the Union's deposit insurance, is that it should only protect depositors and never be used to cover bank losses or shield bank managers, shareholders and creditors. It must also provide equal incentives throughout the Single Market to bank shareholders and managers with *ex-ante* funding and risk-based fees. Finally, it must entail some risk and funds pooling at an EU level so as to be able to cushion large shocks affecting a large cross-border bank. The accumulation and pooling of funds would only start within the new system, and thus not affect accumulated insurance funds, in line with transitional arrangements proposed by Gros and Schoenmaker (2012). The management of insurance funds could be entrusted to the ESM, under instructions from the ECB supervisory function.

Under the supervisory approach that has been described, resolution would become a residual function that, under common rules preventing national authorities from making good on the losses incurred

[7] See Benston and Kaufman (1997). More precisely, some actions are mandatory and others are left to the discretion of supervisors; see Table 10 in Eisenbeis and Kaufman (2007). As for the capital indicators, the FDIC has referred to a combination of risk-weighted and unweighted capital ratios. However, overwhelming new evidence has shown that risk-weighted capital ratios are not reliable indicators of the weakening capital and risk positions of banks requiring enhanced supervisory action. Straight (unweighted) leverage ratios, on the other hand, seem to provide consistent forecasts of emerging trouble sufficiently in advance for supervisors to intervene in a timely fashion (Haldane 2012).

[8] The German Council of Economic Experts (Bofinger *et al.* 2012) warned against the creation of a Europe-wide deposit insurance without prior establishment of a European resolution authority. Véron (2012) and Schoenmaker (2012) share our view that a banking union without a resolution authority and a federal deposit insurance would be incomplete and not credible.

by shareholders and creditors, may well be left to the national jurisdiction of residence of the parent company. This approach would also offer the additional advantage of removing questions of the harmonization, let alone the centralization, of bankruptcy rules from the discussion.[9]

This, however, does not eliminate the need for a European banking resolution fund. Rather than covering losses emerging from liquidation, its task would be limited to providing capital, should it be needed, to the 'good bank' carved out by (European) supervisors to preserve deposits, sound commercial loans and other assets, and worthy systemic functions relating to the payment infrastructure (Carmassi *et al.* 2010). This approach was notably shared by a 2010 Commission Communication on resolution funds[10] and therefore should be readily acceptable to the Commission. In view of its limited scope, such a fund would not have to be very large; its resources could be raised by means of a small surcharge over the deposit insurance fee and be managed by the ESM together with the deposit insurance fund.[11]

Two things should be clearly established in this regard. Firstly, the ESM should not be tapped to cover losses stemming from individual bank insolvency, but only to provide time to ailing banks to restructure and return to good health. On this point, the ongoing discussion on 'legacy assets' appears misleading: the reference model for ESM intervention should be the US TARP recapitalization scheme of October 2008, with its cheap and plentiful equity injections that were later fully recovered by the US Treasury, and with hefty profits.[12]

Secondly, in case of a systemic crisis affecting large segments of the banking system, a much larger fiscal back-up may well be needed. However, instead of setting aside large resources *ex-ante*, the issue may be tackled by agreeing on a key for fiscal burden-sharing among Union member states (either all of them, independently of bank location, or those directly implicated in the banking crisis), as was envisaged by Goodhart and Schoenmaker (2009).

[9] It must be stressed that, were the resolution authority to be supranational, the creation of this new authority could not be covered by Article 127 and would have to rely on a different legal basis.

[10] Communication from the Commission to the European Parliament, the Council, the European Economic and Social Committee and the European Central Bank, Bank Resolution Funds, COM (2010) 254 final, 26.5.2010, Brussels.

[11] In order for the ESM to play the role we have envisaged on deposit insurance and resolution, its treaty should be amended so as to allow it to perform these functions for the banks of non-euro countries too.

[12] The US Treasury has recovered 267 billion US dollars from TARP's bank programs to date, 22 billion dollars more than the 245 billion US dollars invested (US Treasury 2012).

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European Banking Union: Necessary, But Not Enough to Fix the Euro Crisis

Fritz Breuss*

A short history of the European Banking Union

The Lehman Brothers collapse on 15 September 2008, which triggered the global financial and economic crisis (GFC) in 2009, marks a watershed in financial market liberalization and deregulation. Before the GFC in the United States and also in Europe (especially in the context of the Single Market programme), the prevailing philosophy was that greater financial market liberalization improves efficiency, and hence economic growth and welfare.

In 1999, President Bill Clinton abolished the separation of commercial and investment banking, introduced after the Great Depression in 1933 with the Glass-Steagall Act. Many commentators tied the GFC to the Glass-Steagall repeal because it allowed 'super banks' (i.e. banks which are 'too big to fail') to emerge and changed the culture of commercial banking so that the 'bigger risk' culture of investment banking 'came out on top' (Stiglitz 2009). Since the GFC the Obama administration and Congress are eager to find a substitute for the Glass-Steagall Act. The Dood-Frank Wall Street Reform and Consumer Protection Act of 2010 included the so-called Volcker-Rule (a 'Glass-Steagall lite' version, or proprietary trading ban preventing commercial banks and their affiliates from acquiring non-governmental securities with the intention of selling those securities for a profit in the 'near term') and, hence re-enacted a kind of separation of commercial from investment banking.

In Europe the struggle to reform the banking sector after the GFC of 2009 was aggravated by the fact that the eurozone – after the breakout of the Greek crisis in early 2010 – drifted into a veritable euro (public debt) crisis that split the eurozone into a North (core) group and into a South (periphery) group of member states. The euro crisis also separated the EU27 into the 'ins' and 'outs' of the eurozone. Whereas the 17 euro area countries are pressing ahead with considerable reforms concerning 'new economic governance' (Six Pack, Fiscal Pact, Euro-Plus Pact etc.) and are doing deals to reform the financial sector, non-euro area countries are either sidelined or making their own reform efforts. Britain belongs to the latter group. The UK's Independent Commission on Banking (ICB) has proposed to 'ring fence' retail and small business commercial banking from investment banking. This proposal resembles the Glass-Steagall separation of commercial and investment banking. Although there were concerns whether this proposal would violate the Single Market standards of the EU, an 'expert commission' was recently appointed to study the 'ring fence' issue for the whole EU Single Market.

After the GFC of 2009 the European Commission made a U-turn in its Single Market liberalisation philosophy and switched from deregulation to reregulation of the financial sector. Early suggestions to create a European Banking Union (EBU) by the European Commission met with little approval. Therefore, an intermediate step was taken with the founding of the European system of financial supervisors (ESFS), consisting of three *European Supervisory Authorities* – a European Banking Authority (EBA in London), a European Securities and Markets Authority (ESMA in Paris), and a European Insurance and Occupational Pensions Authority (EIOPA in Frankfurt). The three European supervisory authorities (ESAs) and a European Systemic Risk Board (ESRB, attached to the ECB) were established as of January 2011 to replace the former supervisory committees.

In May 2012, as part of a longer term vision for economic and fiscal integration, the European Commission (2012b) firstly called for a banking union to restore confidence in banks and the euro. On 12 September 2012, as a first step towards a genuine banking union, the Commission proposed a *Single*

* Vienna University of Economics and Business (WU) and WIFO Vienna.

Supervisory Mechanism (SSM) for banks led by the European Central Bank (ECB) in order to strengthen Economic and Monetary Union. The set of proposals should constitute a first step towards an integrated banking union, which includes additional components such as a single rulebook, common deposit protection and a single bank resolution mechanism (see European Commission 2012f).

The early proposal by the European Commission and the statement by the heads of states or governments of the euro area at their summit on 29 June 2012 (Euro Area 2012) of their intention to embark upon a banking union sparked a storm of protest. These protests initially came from 172 German economists (FAZ 2012) who fear that an EBU with common deposit protection would act like a transfer of private savings from the North to the South. Lastly, they argue that any EBU would only support Wall Street and the City of London. This protest was countered by another group of 7 prominent German economists (Handelsblatt 2012) who underline the need for an EBU in order to stabilize the banking sector in Europe (see also INET 2012; Ökonomenstimme 2012).

With the proposals by the European Commission as of 12 September 2012 and the decisions of the European Council as of 19 October 2012, the foundation has now been laid for a EBU.[1] The European Council agreed to implement the legislative framework of a Single Supervisory Mechanism (SSM) by 1 January 2013, which should be implemented operationally in the course of 2013. This would then allow the ESM direct bank recapitalization as part of a broader strategy of completing the architecture of the EMU. Anyway, the EU (the eurozone) has embarked – step by step as always with EU reforms – on an EBU and in the first round only on the SSM. The two other components of a genuine EBU (i.e. common deposit protection and a single bank resolution mechanism) will follow when politically accepted only later.

In addition to regional efforts (in the United States, the EU or Britain) to fix the financial sector and prevent future 'Lehman Brothers' cases on a global basis, in the wake of GFC of 2009 the G20 (see G20 2012) and the Basel Committee on Banking Supervision[2] quickly started to make suggestions on how to re-regulate and better protect the financial sector from the risk of repeating past failures. However, even after several G20 meetings since the GFC progress with financial regulatory reforms to definitively stabilize the international financial sectors has only been modest (see FSB 2012a).

The Liikanen-Report (2012) makes new proposals to regulate the banking sector that are somewhat similar to 'Glass-Stegall lite', but that do not break with the long-standing universal banking model in Europe. In addition to a recovery and resolution plan as proposed in the Commission's Bank Recovery and Resolution Directive (BRR) consisting of bail-in instruments and minimum capital standards (like Basel III), the High-level Group recommended a separation of banking business as follows: proprietary trading and other significant trading activities should be assigned to a separate legal entity if the activities to be separated amount to a significant share of a bank's business. So trading activities should be carried out on a stand-alone basis. Switzerland has already implemented measures like those proposed by the Liikanen-Report in the case of its too-big-to-fail banks like UBS and Credit Swiss (see Krahnen 2012).

The EBU is only one building block of a sustainable EMU

The concept of a European Banking Union is developed by the European Commission (2012f) under the agenda of completing the Single Market. However, it is only one building block in the endeavour to improve the economic governance of EMU (see Figure 1).

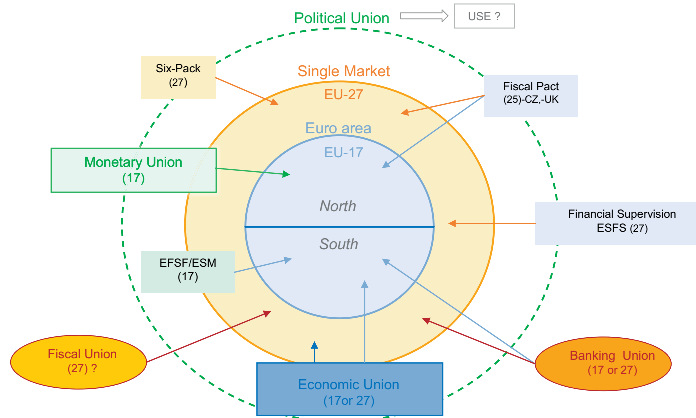
Since the breakout of the euro crisis in early 2010, starting with the Greek crisis, the European Union has taken important and far-reaching steps to overcome the crisis and improve the governance of the EMU. Most of these steps were implemented on an intergovernmental basis (e.g. the Fiscal Pact or 'Fiscal Treaty' – Treaty on Stability, Coordination and Governance in the EMU – only 25 out of 27 EU member states participate), some on a community basis (e.g. the Six Pack, reforming and strengthening the Stability and Growth Pact (SGP); and the 'Two Pack' – further strengthening budget coordination) and implementing a new Macro-economic Imbalances Procedures (MIP); covering all 27 EU countries) and they have created the danger of disintegration in parts of the EU27 and the euro area. Firstly,

[1] The insurance (single) market will be regulated by the new *Solvency II Directive* – a recast of several directives. It is likely to be applicable from 1 January 2014 (see http://ec.europa.eu/internal_market/insurance/solvency/future/index_en.htm).

[2] The Basel III, starting in 2013 and ending in 2019, requires banks to maintain higher levels of capital, increasing from 2 to 7 percent of risk weighted assets – see Byres (2012).

Figure 1

EUROPEAN BANKING UNION – ONE BUILDING OF A GENUINE EMU



ESFS = European System of Financial Supervisors
EFSF = Europena Financial Stabilisation Mechanism
ESM = European Stability Mechanism

Source: Authour's conception.

the euro crisis has split the euro area into a relatively prosperous North and an endangered South – due to lack of competitiveness and excessively high public debts. The euro crisis inflicted further damage in terms of political collateral. On the one hand, many governments were overthrown and in some countries substituted by an expert government (Greece, Italy). More dangerously for the coherence of the European Union, however, was the split into euro-ins and outs, as the latter have been reduced to the status of mere onlookers in terms of events in the euro area. Many new measures/instruments of the new economic governance of EMU developed since 2010 are only applicable to a subset of members of the EU27. All of the new measures are part of the tool kit to correct the construction failures of EMU. The EU or some of its members have created instruments to supervise the financial markets (ESFS covering all 27 countries) and bail-out instruments (EFSF/ESM) that are only applied to the 17 euro area member states.

All of these new governance ingredients have the target, namely to establish a genuine Economic and Monetary Union (EMU), which has to date existed practically only as a Monetary Union (with monetary policy centralized at the ECB). The banking union – although it remains open whether the union only applies to the 17 euro area countries or to all 27 EU member states – will help to complete the second pillar of EMU, namely economic union. According to the far-reaching proposals to create a 'genuine' EMU by van Rompuy (2012a; 2012b), an EMU must consist of an integrated financial framework ('EBU'; at least SSM) and an integrated budgetary framework ('Fiscal Union'; fiscal capacity, i.e. own budget for EMU).

The European Commission (2012d) is already referring to a fiscal union when summing up all hitherto new measures/instruments to improve the coordination/centralization of the budgetary policy of member states. This package consists of the European Semester (i.e. stronger economic governance and coordination), Six Pack laws plus (in the pipeline is the Two Pack), the Fiscal Treaty, the Commission's proposal for Stability Bonds (Eurobonds). The informal Euro-Plus Pact can also be added to this list. Further steps to complete European Integration would be a 'political union' (whatever this means politically in detail), and far in the future, the creation of a 'United States of Europe' (USE; see Figure 1) analogous to the United States of America (USA).

A road map towards EBU – between wishful-thinking and reality

Contrary to early ambitious plans, the EBU can only be realised on a step by step basis: the first step is the installation of SSM; which may subsequently be followed by other measures (such as deposit insurance and bank resolution). On the one hand, the slow pace of any change is due to technical problems ("how rapidly can the ECB recruit hundreds or thousands of supervisory experts?") and, on the other hand, to asymmetric political preferences: the euro periphery countries would be eager to have EBU implemented as quickly as possible in its final form, while the Northern countries are reluctant to be involved in another possible transfer procedure on top of existing fiscal transfer actions in the context of bail-out measures.[3] Of course, one may wish for and propose a

[3] According to European Commission estimates (2012c, 2), the costs for the EU member states of rescuing the banks during the GFC of 2008/09 were considerable. Between October 2008 and October 2011, the Commission approved 4.5 trillion euros (equivalent to 37 percent of EU GDP) in state aid measures to financial institutions, of which 1.6 trillion euros (equivalent to 13 percent of EU GDP) was used in 2008–2010. Guarantees and liquidity measures account for 1.2 trillion euros, or roughly 9.8 percent of EU GDP. The remainder went towards recapitalisation and impaired assets measures amounting to 409 billion euros (3.3 percent of EU GDP).

Figure 2

A ROAD MAP TOWARDS A EUROPEAN BANKING UNION – FROM SSM TO A GENUINE EBU

	Single Superivisory Mechanism (SSM)	Common Deposit Protection (CDP)	Single Bank Resolution Mechanism (SBRM)
Implementation	2013/14	2015 + ?	2015 + ?
European (euro area) level	**ECB** ultimate responsibility for euro area bank supervision cooperation with **EBA** coverage: euro area banks (6.000) Non-euro area banks ?	**CDP** Common (Single) Deposit Guarantee at EU (euro area) level is future project Political opposition in Nordic countries of euro area strong support in euro area periphery	**SBRM** European Authority (ECB ?) is future project **EBA** cooperation with MS in DR-06/2012
National level	**National supervisory authorities** in cooperation with ECB	**DR-7/2010** National Deposit Protection since end of 2010: € 100.000 in all EU MS (applies to all aggregated accounts of one account holder at the same bank)	**DR-06/2012** financed by Resolution Funds (RFs) and Deposit Guarantee Schemes (DGS) optimal target size for DGS and RFs at least 1% of covered deposits held by EU banks
Legal provisions	**CRD IV Package** bank capitalisation into effect '01/01/2013 **SSM** into effect '01/01/2013 (2014 ?)	**DR-7/2010** New deposit guarantee schemes (DGS) (European harmonisation) proposal by the Commission 10/07/2010	**DR-06/2012** for the recovery and resolution of credit institutions and investment firms proposal by the Commission 06/06/2012

Note: DR = Directive; RE = Regulation; CRD = Capital Requirements Directive (DR + 1 RE); SSM= Single Supervisory Mechanism (1 RE ECB; 1 RE EBA-ECB).

Source: Author's conception.

time plan for a full-fledged EBU like the German Council of Economic Experts (2012; also Bofinger *et al.* 2012) did, but the political reality is that EBU is complex and has various aspects and external effects, which are hard to grasp from the outset (see Beck 2012).

The state heads who attended the European Council meeting in October 2012 expressed their wishes to move towards an integrated financial framework open to all the member states that are willing to join it. The European Council (2012, 7) "invites the legislators to proceed with work on the legislative proposals on the Single Supervisory Mechanism (SSM) as a matter of priority, with the objective of agreeing on the legislative framework by 1 January 2013. Work on operational implementation will take place in the course of 2013. In this respect, fully respecting the integrity of the Single Market is crucial".

SSM

The aim of a better coordinated banking supervision at euro area level is "to break the link between sovereign debt and bank debt and the vicious circle which has led to over 4.5 trillion euros of taxpayers' money being used to rescue banks in the EU" (European Commission 2012e, 3). Pooled monetary responsibilities have spurred close economic and financial integration and increased the possibility of cross-border spill-over effects in the event of bank crises (for the analysis of the risks of cross-border banking in Europe for financial stability, see Allen *et al.* 2011).

The European Commission (2012e) in its road map towards a SSM estimates that from the first day, the ECB will be empowered to take over the supervision of any bank in the euro area if it so decides, particularly if the bank is receiving public support. For all other banks, ECB supervision will be phased in automatically: on 1 July 2013 for the most significant European systemically important banks, and on 1 January 2014 for all other banks. Therefore, by 1 January 2014 all banks in the euro area will come under European supervision.

The roadmap with a timetable of the realization of the EBU project – from the SSM to a genuine EBU – is compiled in Figure 2. The first realization will be the SSM as of 2013/14. The other components of a genuine banking union (common deposit protection and single bank resolution mechanism)[4] at the EU or

[4] The German Council of Economic Experts (2012; also Bofinger *et al.* 2012) warn against introducing a Europe-wide deposit insurance (CDP of Figure 2) before establishing a European bank resolution authority (SBRM in Figures 2). The latter should be funded by a bank levy.

euro area level are projects for the future. For the time being there are national schemes for deposits and new Commission proposals for the national recovery and resolution of banks.

On 12 September 2012 the Commission proposed a single supervisory mechanism (SSM) for banks led by the European Central Bank (ECB) in order to strengthen the Economic and Monetary Union.[5] The set of proposals constitutes a first step towards an integrated banking union, which includes further components such as a single rulebook, common deposit protection and a single bank resolution mechanism. The proposals concern:

- A Council *Regulation* (RE ECB) conferring specific tasks on the European Central Bank concerning policies relating to the prudential supervision of credit institutions (based on Article 127 (6) TFEU);
- A *Regulation* (RE EBA-ECB) of the European Parliament and of the Council amending Regulation (EU) No 1093/2010 establishing a European Supervisory Authority (European Banking Authority, EBA) as regards its interaction with Council Regulation (EU) No…/… conferring specific tasks on the European Central Bank concerning policies relating to the prudential supervision of credit institutions; and
- *A Roadmap towards a Banking Union* (Communication).

As the Commission (2012e, 4) stresses in its roadmap, "the creation of the banking union must not compromise the unity and integrity of the single market, which remains one of the greatest achievements of European integration. Indeed, the banking union rests on the completion of the programme of substantive regulatory reform underway for the single market (the single rulebook)". In view of the fear of a further splitting element in the project EBU and SSM among the euro area members and the non-euro members, the Commission (2012e, 7) also proposes a mechanism that will allow "member states which have not adopted the euro, but would like to participate in the single supervisory mechanism, to cooperate closely with the ECB".

So far we will embark into an incomplete EBU, but it is better than the present situation of a fragmented (and partly non-transparent) financial market within the Single Market. It is also another step towards completing the realisation of a Single (Financial) Market.

[5] See the relevant proposals for two regulations in European Commission (2012f).

Divergent interests within the euro area

As already discussed in the context of Figure 1, the GFC of 2009 and the subsequent euro crisis have endangered the European integration project by contributing to political splits at various levels. Accordingly, the interest of donors in the process of bail-out operations *via* the EFSF/ESM during the debt crisis also diverges in the euro area. The installation of SSM as a precondition for direct bank recapitalisation *via* the ESM has also aggravated the divergence of interests in the SSM. Spain in particular (and maybe Ireland), with its huge banking problems, is eager to profit from this arrangement as soon as possible.

This conditionality had been expressed by euro area heads of states or government at the Euro Area Summit of 29 June 2012 (see Euro Area 2012): "when an effective single supervisory mechanism is established, involving the ECB, for banks in the euro area the ESM could, following a regular decision, have the possibility to recapitalize banks directly. This would rely on appropriate conditionality, including compliance with state aid rules, which should be institution-specific, sector-specific or economy-wide and would be formalised in a Memorandum of Understanding. The Eurogroup will examine the situation of the Irish financial sector with the view of further improving the sustainability of the well-performing adjustment programme. Similar cases will be treated equally".

Open questions on the way towards a genuine EBU

The new project of SSM is only a first step towards a genuine EBU. It is therefore only natural that many questions remain unanswered. Here only some issues are raised either in connection with the realisation of SSM or in the context of future steps towards EBU.

Shadow banking

The European Commission (2012a) has already addressed this problem as well as the need to supervise this sector. On a global scale the Financial Stability Board (FSB) is dealing with the collection of data and is giving policy recommendations to the G20 group. The problems with this sector can probably be best dealt with globally. As they do not belong to the

ordinary banking sector, the 'shadow banks' are outside banking rules and supervision. Alternative ways to bring more transparency and applying rules to this sector are discussed below.

At an EU level the Directive on Alternative Investment Fund Managers (AIFMD)[6], which takes effect in April 2013, should help to bring more transparency to the AIFM. An AIFM is a manager of an alternative investment fund. The term alternative investment fund encompasses a wide range of investment funds that are not already regulated at European level by the UCITS (Undertakings for Collective Investment in Transferable Securities) Directive. They include 'hedge funds', private equity funds, real estate funds and a wide range of other types of institutional fund. The AIFMD is therefore much more than a 'hedge fund directive'.

According to the second Global Shadow Banking Monitoring Report 2012 (FSB 2012b)[7] the sector of shadow banking (defined as 'credit intermediation involving entities and activities outside the regular banking system' like e.g. hedge funds) grew rapidly before the crisis, rising from 26 trillion US dollars in 2002 to 62 trillion US dollars in 2007. The size of the total system declined slightly in 2008, but increased subsequently to reach 67 trillion US dollars in 2011 (equivalent to 111 percent of the aggregated GDP of all jurisdictions). Compared to last year's estimate, expanding the coverage of the monitoring exercise has increased the estimated global size of the shadow banking system by some 5 to 6 trillion US dollars. The United States has the largest shadow banking system, with assets of 23 trillion US dollars in 2011 (35 percent of world total), followed by the euro area (22 trillion euros; 33 percent) and Britain (9 trillion US dollars; 13 percent). However, the US share of the global shadow banking system has declined from 44 percent in 2005 to 35 percent in 2011. This decline has been mirrored mostly by an increase in the shares of Britain and the euro area.

SSM only for euro area members?

According to the Commission (2012f, memo FAQ, 2), the SSM should cover all (approximately 6,000) banks in the euro area. Some member states advocate only the supervision of the systemic banks, the banks 'too big to fail'. However, relatively smaller banks can also pose a threat to financial stability. Therefore the Commission stresses the necessity for the supervisory tasks conferred on the ECB to be exercised over all banks.

Although the centralisation of the SSM at the ECB is only thought to cover banks in the euro area, the European Commission (2012e, 7) already proposed that EU member states that have not adopted the euro can also participate in the SSM. The exact mechanism for that provision has yet to be worked out. Otherwise a new area of flexible integration may be created or the Single Market of EU27 may be split. In the proposed Regulation concerning the ECB within the SSM (see European Commission 2012f, 6) the Commission explicitly discusses the mechanism and conditions whereby non-euro area member states could participate. These mechanisms and conditions could be similarly to the case of the EBA participation.

Anyway, many euro area countries with strong banking involvements in the new EU member states in Eastern Europe (like Austria) are eager not only for their own banks to take part in the SSM, but also for their subsidiaries in Eastern Europe to do so. The same fears are expressed by the European Bank for Reconstruction and Development in London (EBRD 2012): if not all risks or spill-over risks are covered by the SSM, it is incomplete and open to new crises.

Legal questions surrounding SSM and EBU

One big concern is the possible conflict of competences in the ECB. The Commission (2012f, 7) is therefore eager to stress that monetary policy tasks will be strictly separated from supervisory tasks to eliminate potential conflicts of interest between the objectives of monetary policy and prudential supervision. Consequently, it is necessary to ensure that all preparatory and executing activities within the ECB will be carried out by bodies and administrative divisions separated from those responsible for monetary policy. In order to avoid such potential conflicts of interests the German Council of Economic Experts (2012; also Bodinger *et al.* 2012) recommends delegating banking supervision at the EU level to a European institution outside the ECB. This would also make it easier for non-euro area countries to participate fully in the EBU.

[6] For more details, see the Commission website on "The EU Single Market: Alternative Investments", http://ec.europa.eu/internal_market/investment/alternative_investments/index_en.htm#maincontentSec2.

[7] In the second report of 2012 the coverage was broadened to include 25 jurisdictions and the euro area as a whole, compared to 11 jurisdictions and the euro area in the 2011 exercise. This brings the coverage of the monitoring exercise to 86 percent of global GDP and 90 percent of global financial system assets.

Then there is the open question of the voting power of member states in the council of the new SSM at the ECB. Either the voting mechanism is the same as in the ECB council ('one country, one vote') or – as is urgently requested by the governor of the Bundesbank, Jens Weidmann (see Neue Zürcher Zeitung 2012) – a new weighting scheme (according to the capital shares of euro area countries at the ECB's capital) is applied, which gives the large countries (Germany) more weight because the SSM could also involve budgetary costs in the euro area member states (motto: 'no guarantee without control'). The question of how the non-euro area member states that will participate in SSM will be represented in the new SSM (ECB) council remains unanswered.

Can it happen again?

The EBU project is a logical step towards a better functioning EMU in the future. It will be a good instrument for preventing future crises *à la* Lehman Brothers. It is necessary, but not sufficient to resolve the present euro crisis. When the SSM does not cover all of the banks in the euro area or those in the EU27, there may be an opportunity for banks to 'outsource' risks to non-regulated markets (to shadow banks) or to banks 'too big to fail' or 'too big to save' in EU countries that are not covered by SSM. This evasion effect could trigger a new financial crisis.

A sustainable functioning and crisis-resistance EMU has to implement all of the reform steps suggested since 2010 – the bundle of new measures/instruments for better coordination and governance in the EMU (see Figure 1) that are already effective and the new measures considered by Van Rompuy (2012a; 2012b). The urgent problem of the unsustainable public debt dynamic in some of the periphery euro area countries must first be resolved before the present euro crisis can be fixed.

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Monetary Policy and Banking Supervision: Coordination Instead of Separation

Thorsten Beck* and Daniel Gros**

Introduction

Eurozone policy makers have embraced the concept of a banking union as the latest tool to address the euro crisis. While many details are unclear and under discussion, the principal decision to make the European Central Bank (ECB) the responsible authority for bank supervision in the eurozone has been taken. In September 2012, the Commission published a legislative proposal on the Single Supervisory Mechanism (SSM). In this proposal it is foreseen that the responsibility for supervision should come under a new 'Supervisory Board', to be created within the ECB. This new board would have six members from the ECB, a President and a Vice-president plus four other members. The other members of the SSB should represent national supervisors.

Unifying responsibility for monetary and financial stability in one institution raises concerns of conflicting objectives, incentives and independence. A large body of literature has discussed the benefits and risks from unifying both tasks under the central bank's authority. Most of this literature, however, refers to normal times rather than a crisis situation such as the eurozone is currently experiencing. In addition, currency unions pose additional challenges, with stronger conflicts between national and supra-national interests and the European Union still far from having strong independent and democratically legitimized institutions outside the ECB.

This paper argues that a strict separation between monetary policy and supervisory arms within the ECB is neither desirable nor feasible at this stage. We consider it more important to complement the single supervisory mechanism with a strong set-up for bank resolution. The tendency of all supervisors to practice forbearance as long as possible could be countered, at least partially, if some members of the supervisory board were independent experts, drawn neither from national supervisors, nor from the ECB.

The remainder of this paper is structured as follows. The next section describes the proposed structure for the new supervisory authority at the ECB. The third section discusses critical differences in the conduct of monetary policy and supervisory tasks, while the fourth section provides a critical overview over the literature on the benefits and disadvantages of unifying responsibility for monetary and financial stability at the central bank. The fifth section points to additional complications arising from Chinese walls within the ECB in the context of the eurozone (see Figure 1); and the final section offers some concluding remarks.

The proposed structure

The proposal by the Commission says that a '*representative* of each national central bank or other national competent authority' will sit on the Supervisory Board (SB) to be created within the ECB: the Chair of the supervisory board will be selected from the members of the Executive Board. The supervisory board will be led by a Chair and a Vice-Chair elected by the ECB Governing Council and composed, in addition to them, of four representatives of the ECB and of one representative of each national central bank or other national competent authority (see European Commission 2012a).

In about one-half of all euro area member states, the central bank is also the supervisor, that is, the 'national competent authority' as defined under EU rules.

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* Tilburg University and CEPR.
** Centre for European Policy Studies (CEPS).
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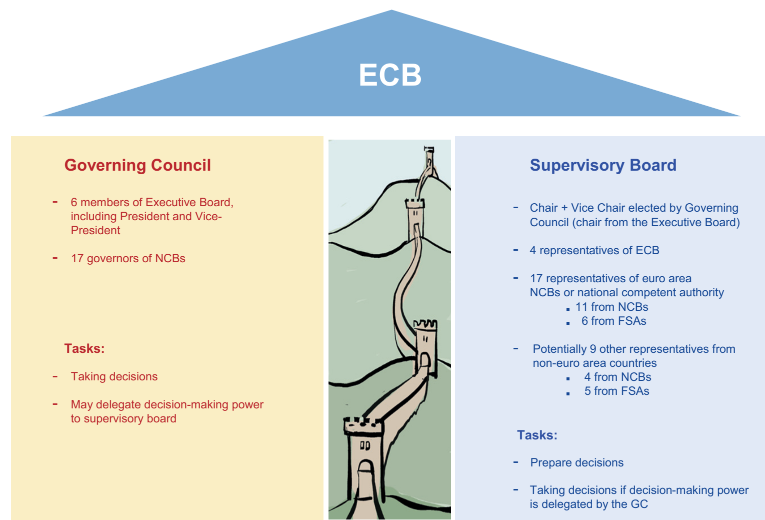
Table A1 in the annex shows the distribution of supervisory competence for banking supervision in greater detail. In some member countries, this is the responsibility of the central bank, together with a separate financial supervisory authority. The SB will thus be composed largely of representatives of the same institutions that also numerically dominate the Governing Council (GC), namely the NCBs. This domination of both boards by representatives of national central banks (NCBs) may be slightly decreased if the non-euro area group of countries were to participate fully. Five out of nine would delegate a member of their national financial supervisory authority (FSA).

Figure 1

CHINESE WALL BETWEEN MONETARY POLICY AND SUPERVISION ?



Source: Authors' visualisation based on European Commission (2012a and 2012b); Council of European Union (2012), 15663/12; EBA (2012); EIOPA (2012).

However, the individuals who sit on the two boards might still be different because only the governors of NCBs sit on the GC, while the existing legislative proposals suggest that somebody else might represent the NCBs on the SB. The key practical question that arises is whether many central banks will have two different representatives within the ECB: one for the GC (the governor) and another for the SB (e.g. the vice governor or whoever is responsible for supervision). The two individuals will work most of their time in the same institution (probably also in the same building) and one (the governor) is hierarchically superior to the other (the head of supervision). It is difficult to imagine that these two individuals will not be in constant contact, thus rendering any Chinese walls between the GC and the SB somewhat permeable.

The presence of representatives of other institutions on the SB raises a delicate problem of independence. In Germany, for example, the supervision of banks and insurance companies is the responsibility of the Bundesanstalt für Finanzdienstleistungsaufsicht (BAFIN). In reality, supervision is executed together with the Bundesbank, whose staff participates in most on-site inspections and which prepares many of the reports. As a result, the Bundesbank automatically has an intimate knowledge of the state of the financial system and *de facto* access to all necessary detailed information, which is often highly confidential.

One problem this raises is that BAFIN (like other supervisors) is not independent from the German Finance Ministry (in German BAFIN is '*weisungsgebunden*'). This means that some members of the Supervisory Board will not be independent. Would this be compatible with the overall independence of the ECB?

Another problem is that, in the countries where supervision does not reside in the central bank, the supervisors have other tasks, such as supervising insurance institutions or consumer protection.

Differences between monetary policy and supervision

Supervision and monetary policy are completely different functions in many respects, e.g. the nature of the decisions that are taken, the background information needed to take them, their implementation, the qualifications of the staff that is needed, etc.

Monetary policy, at least in normal times, required only relatively infrequent decisions about one variable, namely the interest rate that the ECB sets on its main refinancing operations. This decision was then implemented uniformly throughout the system by the national central banks, which all just changed essentially one element in their computer code. The NCBs thus had no discretion in how to implement monetary policy decisions. Moreover, central banks do not change their interest rate daily, but tend to do so on a

monthly basis. Monetary policy could thus be decided by a body that does not need to manage 'hands on', but that meets only every second week and essentially then has one big decision to take (whether to change rates).

The staff of the ECB naturally played a key role in preparing the material for taking monetary policy decisions (inflation and general economic outlook), but the staff of the ECB did not have to manage the actual implementation on a daily basis, which could be left to the NCBs. The latter had no leeway in this matter in any event.

With the crisis, the nature of monetary policy has, of course, changed somewhat. For example, collateral requirements had to be changed frequently and the use of new collateral has to be monitored. Even here, however, there is little need to take frequent decisions on specific cases, as the collateral rules are set in such a way (mainly ratings requirements) that the staff of the ECB only has to check the fulfilment of formal requirements.

Supervision is totally different from monetary policy in these practical aspects. Supervision is, by nature, an activity that requires hands-on management with thousands of pieces of detailed information to be collected. During normal times, when the financial system is stable, few decisions have to be taken as supervisors try not to interfere with the daily business of their banks.

During a crisis, however, major decisions regarding individual banks have to be taken almost daily. This requires more than broad rules and guidelines. Interpretation of the rules and the way they are applied then become crucial. It follows that the SB will have little influence if it meets with the same frequency as the Governing Council (once every second week).[1] Supervision can be said to be exercised by the ECB only if it is done directly by ECB personnel. Very little will change if the SB simply elaborates general guidelines for national supervisors.

Finally, it usually argued that supervision can have immediate fiscal implications. Bini Smaghi (2012a and 2012b) argues that this is also the case for monetary policy in general. This is true, and in terms of the size of the fiscal consequences of potential mistakes there might be little difference, as an increase in interest rates can cost a government much more than a bank rescue operation.

But the important difference between monetary policy and supervision is that the fiscal implications of monetary policy are much more diffuse, and arise throughout the euro area as a by-product of standard monetary policy operations; whereas the fiscal implications of supervision are much more direct and concentrated in perhaps only one member state (e.g. the decision to close down a bank or the failure to detect excessive lending). All this makes it politically much more difficult to accept the fiscal consequences of supervision at both the national and EU level. The best way to deal with this issue would be to create a European resolution fund and regime (as emphasised in Beck 2012).[2]

Monetary policy also differs fundamentally from supervision in terms of its legal nature: supervision can require acts that directly infringe the property rights of individuals and corporations. This implies that it must be possible to challenge supervisory decisions like the closure of a bank in the courts. Due process and clearly identifiable legal responsibilities are thus essential for supervision. By contrast, the typical monetary policy decisions like increasing interest rates or changing collateral requirements are not usually subject to any judicial review.

Review of the literature

The literature on supervisory structure contains arguments in favour of and against concentrating responsibility for bank regulation and supervision within the central bank. Most of the literature assumes implicitly that there are no Chinese walls within the central bank between the supervisory arm and the decision-making organ on monetary policy. In this section we list the main arguments in favour of and against this assumption and also relate them to the current situation in the eurozone.

Benefits of involving the central bank in bank regulation and supervision

- *Access to better information.* The central bank needs accurate and timely information about

[1] One is tempted to say that 'supervision cannot just be supervised'.

[2] See also Schoenmaker and Gros (2012), who propose a European Deposit Insurance and Resolution Fund (run by a European Deposit Insurance and Resolution Authority (EDIRA)), which should become the authority that decides on resolution and makes payments to depositors directly when required.

banking sector performance in order to effectively exercise its monetary policy functions (see Goodhart 2000; Peek, Rosengren and Tootell 1999). It might also help to improve assessments of the risk-taking consequences of loose monetary policy (see Jimenez *et al.* 2012). In the context of the current crisis, this will give a better assessment of the current bottlenecks in the transmission channels of easing monetary policy. It will also help the ECB better execute its new task in macro-prudential regulation.

- *Crisis resolution.* If the central bank has supervisory powers, it may be able to act more effectively *via* the banking system in times of crisis (see Goodhart and Schoenmaker 1995). Critically, the ECB has *de facto* taken over the lender-of-last resort function, without being able to judge the credit-worthiness of banks. This does not only exacerbate the tragedy of shared problems from the crisis (see below), but also increases risks on the ECB's balance sheet, i.e. the risk that there will be no timely intervention into weak banks (see Wyplosz 2102).
- *Independence.* Central banks are known for their independence, which is important for successful supervision (see Abrams and Taylor 2000). The ECB has achieved a reputation as being a truly European institution, well above national interests and being independent from political influence. In the context of constructing a banking union, it is therefore easiest to build on this already acquired reputation. The strong reputation of ECB might also help to attract more skilled staff.

Disadvantages of involving the central bank in bank regulation and supervision

- *Conflicts of objectives.* Combining prudential supervision and monetary policy could result in an excessively loose monetary policy, since the central bank might want to avoid the adverse effects on bank earnings and credit quality (see Goodhart and Schoenmaker 1995; Ioannidou 2012). In the current crisis, one could argue that the ECB might not necessarily be a tougher supervisor than national authorities. It might actually be more lenient, as it is concerned about contagion across the eurozone and because it has more resources available since it is also the lender-of-last-resort (see Allen, Carletti and Gimber 2012). On the other hand, it is not clear whether monetary and financial stability policies conflict with each other with the rise of macro-prudential regulation as an additional policy tool.
- *Reputational risk.* If the credibility of the central bank as a prudential supervisor is undermined, this could also negatively affect its credibility in the area of monetary policy (see Goodhart 2000). This risk is especially great in the area of bank stability as only its absence can be properly observed, while monetary stability is a more transparent target.
- *Loss of independence or too much power.* The central bank could become more prone to political capture when its role increases, thereby undermining its independence (see Goodhart 2000). In the context of the envisaged SSM within the ECB, this danger is especially grave, as representatives of national supervisory authorities do not enjoy the same degree of political independence as NCBs. Furthermore, supervisory decisions involving the taxpayer-financed recapitalisation of banks might make the ECB vulnerable to more political pressure. At the other extreme, there is the fear that a central bank with banking supervisory power will become too powerful, with limited accountability to elected legislatures and governments. This concern might be especially pertinent in Europe, where the European Parliament still enjoys limited legitimacy.
- *Scope diseconomies.* An institution with several objectives might tend to mis-allocate resources and neglect one of its tasks (see Abrams and Taylor 2000). A related argument is that the boundaries of financial intermediation have moved far beyond banking and that a bank regulatory authority tasked with systemic financial stability has to expand significantly beyond banking. This is also reflected in the eurozone, where bank supervisory authorities often have additional responsibilities for other segments of the financial sector.

It seems that while in general, there are arguments both pro and contra establishing bank regulation and supervision at the ECB, the current situation in the eurozone – both in the crisis and thus needing relatively fast action but also given its current governance structure – provides a strong argument for establishing responsibility for bank supervision and regulation at the ECB. In other words, some of the conflicts mentioned above will always exist, even if bank regulation and monetary policy are located in different institutions, but the ECB might be in a better position to internalise these conflicts (see Ioannidou 2012). In this case, however, Chinese walls between supervision and monetary policy do not make sense.

There are strong arguments for including bank regulation and supervision in the ECB's brief, rather than locating the tasks with a different institution. The most convincing argument, however, refers to the tragedy of the common problems caused by the crisis in the eurozone, as each member tries to shift the burden to the ECB. Only an institution that is free of direct national interference can overcome this problem and internalise the externalities stemming from national banking fragility for the overall currency union.

While the current situation might not be an appropriate one to distribute responsibilities across several institutions, there is a strong case for not bundling responsibility for bank resolution together with supervisory responsibilities at the ECB (see Schoenmaker 2012). The Commission is planning to come forward with proposals next year for a separate institution (which would also require funding) to deal with bank resolution. Such a separate institution could also counter the moral-hazard risk mentioned above, i.e. the risk that the ECB is reluctant to intervene in a bank to which it has high exposure as lender of last resort.

Market segmentation

Gros (2012) has shown how national supervisors have a natural incentive to 'ring fence' the banks under their watch, i.e. national supervisors actively encourage 'their' banks to reduce their cross-border exposure. This segmentation of the euro area's financial markets is one key cause of the crisis because it means that the savings surpluses of countries like Germany or the Netherlands can no longer be recycled to those countries with a current account deficit and even the existing stocks of cross-border liabilities cannot be rolled over in the market. In some cases supervisors in savings surplus countries have even *de facto* prevented the local subsidiaries of cross-border banks from funding their headquarters located in countries under financial stress.

Would the set-up proposed so far deal with this problem? Probably not. As long as resolution (and deposit insurance) remains totally national, the incentives of the national supervisory agencies (mostly central banks, except in Germany, whose savings surplus is a lynchpin of the euro area economy) will continue to be to ring fence because any losses abroad might lead to costs for them (or rather their own governments). Delegating supervision to the supra-national level, but without a concomitant move of resolution powers, will thus not help to address the current crisis or change anything fundamentally in the set-up of the currency union. Some observers have even argued that this partial banking union might make things worse (see Wyplosz 2012).

The limited access to information is another problem whose solution would be hampered by Chinese walls. At present, the ECB can only observe that a number of banks have become dependent on its funding. Moreover, some have even needed Emergency Liquidity Assistance (ELA). Both developments are generally a sign of weakness, but the ECB has no way of knowing how weak or strong these institutions are in reality. Only the national central bank of the home country of these institutions has all the required information in its possession; but this information is not shared. National central banks have an obvious interest in championing the interests of their banks and therefore are not unbiased judges of the health of their banking system or of the quality of the collateral that their banks use for ELA. ECB staff has no access to any confidential supervisory information and cannot thus form its own independent view of the health of the euro area's banking system. The other members of the Governing Council (i.e. the governors of the NCBs) also do not have access to any information about the state of the health of banks in other countries; and they naturally mistrust the judgment of their colleagues. This, in turn, makes it very difficult for the Governing Council to form an unbiased opinion of the degree of financial market stress (and the measures needed to stem the crisis).

This is again totally different from monetary policy under normal circumstances when all the information required to assess the economic outlook in general, and inflation in particular, is publicly available. With Chinese walls between the two functions of the ECB (monetary policy under the GC and supervision under the SB), this problem would not be resolved. A key issue that has not yet even been broached is whether all members of the SB would have full access to all supervisory information, including that of a confidential nature. This must be provided for. Otherwise the board would not be able to be effective.

Conclusions

Our brief review of the literature suggests that during a financial crisis it makes little sense to try to separate

supervision and monetary policy when both functions are for all practical purposes exercised within the same institution. Moreover, the two boards responsible for these two functions will overlap to a large extent, at least in terms of the institutions that are represented on them. Some 'osmosis' is thus inevitable between the SB and GC.

Theory (and practice) suggests that the nature of the relationship between supervision and monetary policy might differ fundamentally between crisis and normal times. Since the basis for the SSM is being laid during a crisis, it might be useful to have an explicit review clause so that the arrangements can be re-evaluated when financial market conditions have returned to normal.

National supervisors will always have a tendency to defend 'their' national champions, and the judgment of representatives of the ECB will be influenced by the lending that might be already at risk. We would argue that this problem could be addressed by stipulating that four members of the Supervisory Board should be independent, i.e. outsiders who are not beholden to any institution and who would thus be free of any conflict of interest.[3]

The real problem for the euro area going forward is not the separation of supervision and monetary policy or the details of the composition of the Supervisory Board, but rather how to ensure that supervision is linked to resolution in a framework that encourages early loss recognition. This particularly applies to the current crisis. The earlier losses are recognised, the better.

In the longer run, it will, of course, be crucial to strengthen macro prudential supervision. To that end, ensuring a proper flow of information and division of labour between the Supervisory Board and the ESRB will be essential.

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Annex/Table A1
Who is responsible for banking supervision?

[3] The presence of independents on the SB will probably be seen as incompatible with the free flow of confidential information. Yet this should not be a concern as many companies have independent directors on their boards with access to highly confidential information.

Annex/Table A1

Who is responsible for banking supervision?

Country	Bank supervision authority	Member of EIOPA	Member of ESMA
Austria	FSA	Yes	No
Belgium	NCB	Yes	No
Cyprus	NCB	No	Yes
Estonia	FSA	Yes	Yes
Finland	FSA	Yes	Yes
France	NCB (FSA)[1]	Yes	Yes
Germany	FSA	Yes	Yes
Greece	NCB	Yes	No
Ireland	NCB	Yes	Yes
Italy	NCB	No	No
Luxembourg	FSA	Yes	Yes
Malta	FSA	Yes	Yes
Netherlands	NCB (FSA)[2]	Yes	Yes
Portugal	NCB	No	No
Slovakia	NCB	Yes	Yes
Slovenia	NCB	No	No
Spain	NCB	No	No
Bulgaria	NCB	No	No
Czech Republic	NCB	Yes	Yes
Denmark	FSA	Yes	Yes
Hungary	FSA	Yes	Yes
Lativa	FSA	Yes	Yes
Lithuania	NCB	Yes	Yes
Poland	FSA	Yes	Yes
Romania	NCB	No	No
Sweden	FSA	Yes	Yes
United Kingdom	FSA	Yes	Yes

[1] Autorité de Contrôle Prudentiel is closely linked to Banque de France. – [2] Prudential supervision conducted by De Nederlandsche Bank. The FSA is the integral cross-sector authority for conduct of business supervision.

Source: Authors' own compilation based on information from EBA, ESMA and EIOPA.

Some of the Pros and Cons of Central Banking Supervision by the ECB

Friedrich L. Sell*

Introduction

If the EU follows the proposals of Internal Market Commissioner Michel Barnier,[1] the ECB will very soon assume responsibility as the central banking supervisory authority for all, or at least several credit institutions[2] within the eurozone. This would effectively mean the implementation of the thoughts and/or recommendations of the Federal Reserve: "generally, financial regulation and supervision, rather than monetary policy, provide more-targeted tools for addressing credit-related problems. Enhancing financial stability through regulation and supervision leaves monetary policy free to focus on stability in growth and inflation, for which it is better suited" (Ben Bernanke in September 2010 before the Financial Crisis Inquiry Commission of the US Congress). With this statement Bernanke implicitly supported the assumption that central banks cannot overcome both a financial market crisis and take precautions to counter the dangers of inflation or deflation using interest rate policy alone (see Schäfer 2009; Sell 2007).

The restructuring of banking supervision within the eurozone is part of a far more sweeping overall plan for a banking union, which, in addition to supervision, also covers deposit protection, resolution funds for insolvent banks and capital requirements. This article examines some of the tasks involved in banking supervision and the supervision of compliance with capital requirements by a central bank such as the ECB. This kind of analysis makes sense even if Michel Barnier's plans will only be implemented in a heavily curtailed form, which looks increasingly probable since the EU Finance Ministers' Council in Nicosia on Cyprus in September 2012. Unlike the work of authors such as De Grauwe and Gros (2009), this paper deliberately focuses both on the instruments (interest rates, supervision) and on the targets (price stability, financial market stability) of central bank policy.

This paper excludes a whole range of topics, including the controversial question between the EU Commission and Germany (put forward by the Association of German Banks in particular) of whether all banks in the eurozone will be subject to banking supervision – which has to be approved by all 27 EU states – or if only around 25 of the 'system relevant' credit institutions, or only the members of this latter group that have remained 'healthy' to date will be supervised.

This paper will begin by looking at the question of how sensible it is for one and the same central bank to influence both interest rates *and* banking supervision. Secondly, it examines whether central banking supervision *via* the ECB could possibly throw up a new 'trilemma' for (in this case European) monetary policy. Thirdly, the paper discusses whether a central banking supervisory authority will tend to have procyclical effects (especially in terms of compliance with capital requirement regulations). Our approach to all of these questions will principally be of a macroeconomic nature.

Banking supervision and monetary policy in the hands of a single institution?

The two most popular arguments for and against bundling the so-called duties of a central bank are as follows: one of the pros is that the central bank is a partner of the commercial banks in the framework of repurchasing agreements ('repos'). As a supervisory authority, it is well-placed to assess not only the collateral submitted (securities), but also the creditworthiness and the conduct of the submitting institutions, which certainly constitutes a major advantage given

* University of the Federal Armed Forces Munich.

[1] Notice that this paper collected recent information up to early October 2012.

[2] This also makes it clear that the EU is not striving towards some form of 'bancassurance' following the example of BAFIN.

the information asymmetry between the players involved. Moreover, this pro argument already has a backdoor: the central bank could be put in an uncomfortable position if its monetary policy suggests the need for an increase in interest rates, but considerations given to major financial institutions in the framework of its supervisory duties make it seem wiser to delay any change in interest rates. This argument already has a certain value in its own right, but it will be re-addressed in the framework of the 'trilemma discussion'.

One of the contra arguments is the so-called 'independence dilemma'. If the ECB were to be made entirely responsible for supervising the financial market, then it would also have to be given a mandate to intervene directly in banking business, to fire executives and close-down banks. However, that is a sovereign task in the states concerned, which is currently performed not by the ECB itself, but exclusively by authorities like BAFIN in Germany (on behalf of the Federal Ministry of Finance), or by independent national supervisory institutions. Should the ECB also receive such rights to intervene, the latters' independence as monetary institutions would potentially be heavily threatened since their sovereign interventions would have fiscal implications in many cases. However, there is a back door here too: the ECB could delegate the implementation of recommendations to national agencies (like BAFIN) or to the EBA.

Very few authors go beyond this qualitative analysis to examine the bundling problem in the framework of a macroeconomic model. These authors include Gersbach and Hahn (2011): capital requirements have a dual effect when adopted. They reduce the probability of a banking crisis on the one hand, and curb the output expected with a rising degree of implementation on the other. If monetary policy were to be delegated to a conservative central banker, then that banker would attach comparatively little (or no) importance to output and/or stabilising employment. As soon as the central banker in question were also to be made responsible for EC regulations, s/he would tend to set them at ineffectively high levels; since a central banker would care little (if at all) about the related negative output effects. This outcome tends to support an institutional separation of monetary and supervisory policy. By other means (in the framework of an AS-AD model) De Grauwe and Gros (2009, 7) arrive at exactly the same conclusion: "strict inflation targeting cannot be maintained because it can conflict with financial stability".

Conversely, this could mean that delegating monetary policy to a Federal Reserve banker – it is well known that the US central bank should also consider growth and employment as its goals alongside price stability – would reduce the bias in the favour of output targets, and make it easier to harmonise monetary and supervisory policy. In that case an institutional link between monetary and supervisory policy should be advocated. Since the ECB has come far closer to the Federal Reserve's philosophy in the wake of the financial crisis, and a simple return to the two pillar strategy of the first 10 years of its existence now seems unlikely, if not almost impossible, this argument should also apply to a large extent to the 'ECB banker'.

Is there a new trilemma?

The so-called 'monetary policy trilemma', faced by all central banks in principle, has long since been well-known. According to this trilemma, it is not possible for a central bank to pursue the three goals of 'free capital movement', 'autonomous monetary policy' and an explicit 'exchange rate target' at the same time. It is far rather the case that only two of the three goals listed above can be achieved simultaneously. It is worth noting that the monetary trilemma outlined here presupposes that 'complementarity', or at least 'neutrality', exists between each of the two pairwise eligible goals/instruments. In response to the question of whether bundling supervisory competences in the European Central Bank represents an acceptable and economically effective solution, it is important to examine whether this would give rise to a 'new trilemma'. Drawing on Neumann (2009), Figure 1 defines a new 'target triangle' for central banks. Using the conceivable combinations/pairs (1), (2) and (3), it is possible to question the existence of such a new trilemma:

(1) The targeted acquisition of certain bonds/securities from the portfolio of credit institutions may positively influence the latter's liquidity/solvency and, at the same time, change the incipient price gains which – in times of asset price inflation – shift the prevailing imbalance in the portfolio of private players in favour of less risky investments. However, this policy may endanger the central bank's inflation target.

(2) Pricking a price bubble with higher base interest rates (see Neumann 2009) can slow down, or even interrupt a boom in the financial markets, and may, at the same time, be a necessary way of countering inflationary tendencies. However, it may

also potentially pose a threat to the liquidity/solvency of weakened, systemically relevant monetary institutes.

(3) A lasting policy of low interest rates may be appropriate in order to avert the threat of deflation and/or guarantee the liquidity/solvency of system-relevant monetary institutions, but it can precipitate the formation of a fresh bubble in the financial markets (see Kurm-Engels 2010).

These arguments sound convincing, but they do not tell the whole story: let us assume that the central bank supervisor induces market participants to behave prudently and thus limits 'excesses' in the market, this is also helpful in controlling inflation. This argument largely applies to the pair/situation described above in (2). Conversely, it supports bank supervision by the central bank if the latter pursues an interest rate setting policy that takes into account whether the interest rate chosen could promote a fresh 'bubble' in the financial/and or commodity markets, or at least have destabilising effects on the financial markets. This argument also supports pair/situation (2). It is often argued that central banks – quite in the sense of the principle of subsidiarity – are close enough to any potential problems/exaggerations arising in the financial markets. Thanks to refinancing operations with banks, they also function as direct partners of all players that may be potentially affected by (future) illiquidity/insolvency. This enables them to detect the corresponding risks early, and puts them in a position to exercise considerable influence over market events through their own activities. This argument primarily applies to pair/situation (1). Looking at pair/ situation (3), however, a central bank could be easily put into an uncomfortable position if the stance of monetary policy signals the need for an increase in interest rates, but considerations given to the liquidity/solvency of major financial institutions make it seem appropriate to maintain interest rates at a constant level. This time, the new trilemma becomes sort of inconsistent as a pair/situation contains rivalling, and not complementary instruments.

The possibly pro-cyclical effect of important rules of financial market supervision constitutes a key aspect of the potential conflicts between the goals of financial market and monetary stability. That is why this paper devotes a separate section to this topic.

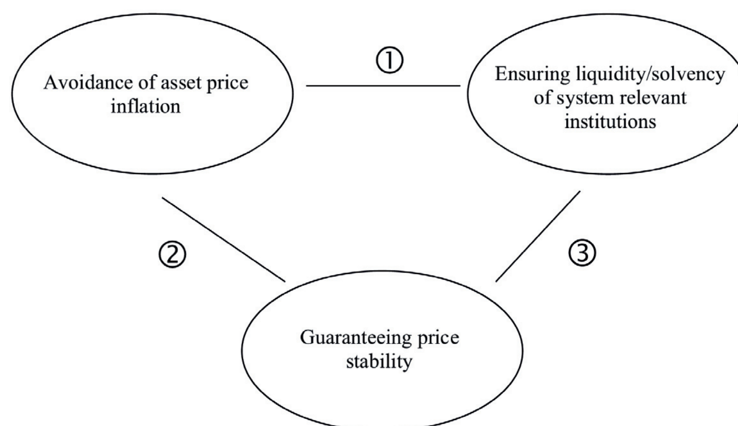
Does integrated banking supervision have a smoothing or a pro-cyclical effect?

With the Taylor rule (see Blanchard 2009), today's central banks have created an instrument for flexibly adjusting the base interest rate to shocks that could pull it down during an output slump and/or a deviation of the inflation rate from its target level. This type of process is anti-cyclical in its approach, but not discretionary, as Keynesian monetary policy used to be. For this reason a conflict-free, integrated bank supervisor can only implement monetary policy if the latter is at least neutral, but has no form of pro-cyclical effect. But can financial market supervision be prevented from having a pro-cyclical effect?

One possibility is naturally that the new regulation of the financial markets is itself able to supress rules with a pro-cyclical effect, or to introduce rules with an anti-cyclical effect (see Herr 2010). Some time ago, several experts suggested countering the inclination of banking institutions to accumulate particularly high debts during boom periods by limiting the maximum leverage ratio. "The Basel Committee on Banking Supervision reacted to these demands in Basel III with a leverage ratio, which prescribes a risk under-weighted upper debt ceiling" (see Nguyen and Ben Shlomo 2012, 477). Moreover, back in January 2009, the Ministry of the Economy's Scientific Advisory Body advised the German government to abandon the Basel II reg-

Figure 1

A NEW TRILEMMA FOR MONETARY POLICY?



Source: Sell and Hartung (2011).

ulations because it feared pro-cyclical value adjustments/increases in capital requirements during the recession in the real economy (see Hellwig 2009).

The second, considerably less favourable scenario for the central bank occurs if the pro-cyclical nature of financial market regulation can only be reduced overall, but cannot be completely eradicated. In such cases, the central bank will not only be concerned to ensure that the rules are obeyed, which themselves contain a pro-cyclical element, but will try to counteract pro-cyclicality in its own actions. The example given below should illustrate the connection.

It is widely recognized that the supervision of the obligation to respect so called core capital ratios[3] can trigger pro-cyclical effects (see Berka and Zimmermann 2012). This regulation forces commercial banks in a recession to reduce their loan volume, when receivables are to be written off anyway. Conversely, in boom periods, when demand for credit grows endogenously, commercial banks have a strong incentive to grant higher loans. In the end they have no reason to expand the expensive (in their view) core capital ratio any more than necessary. A central bank[4] in principle has several ways of counteracting this problem, including the three options outlined below:

- It can incorporate a further (third) term into the Taylor rule, which explicitly counteracts the pro-cyclical effect of core capital ratios on the interest base rate to be selected; any such or similar rule was not followed in the early years of the ECB, but this has changed considerably since 2008.
- It can provide guarantees for the increased risk assessment of the assets on bank balance sheets during the recession to prevent an increase in the core capital ratio denominator. As soon as a recovery started, the guarantees would cease to apply.
- It can directly buy the assets owned by commercial banks that have sharply increased in terms of risk, and thus make it easier for such banks to raise additional capital under favourable conditions. This would push up the core capital ratio counter, while the additional credit granting would also fall into line with the more expansive orientation of the Taylor rule in a recession. Should the transaction – like repurchase agreements (repos) – be accompanied by a repurchasing agreement, then provisions would also be made, in principle, for a boom.

Unlike the first option, alternatives two and three represent a trade-off between greater liability on the part of banks on the one hand, and the prevention of pro-cyclical effects on monetary policy on the other. For if guarantees are provided or assets directly purchased, then the intended stipulation of a higher (unlimited) liability is reduced on the other side. This raises the fundamental question of whether the regulation desired would be leveraged by the compensating measures taken by the central bank (at least to some extent).

In a well-received paper Admati *et al.* (2010) showed that the regulatory increase of capital requirements does not, as frequently argued, automatically increase the cost of granting loans, and does not fundamentally force banks to reduce loan granting and/or make credit more expensive. One of the reasons for this is that better capitalised banks also grant more solid loans. The loans are better because banks are less tempted to take bigger risks:[5] “highly leveraged banks are generally subject to distortions in their lending decisions. These distortions may lead them to make worse lending decisions than they would have made if they were better capitalized, involving either too much or too little lending relative to some social optimum. First, equity holders in a leveraged bank, and managers working on their behalf or compensated on the basis of ROE (return on equity), have incentives to make excessively risky investments, and this problem is exacerbated when the debt has government guarantees. Second, when banks are distressed, credit markets can freeze and certain loans will not be made due to a ‘debt overhang’ problem. Valuable loans that are not made as a result of debt overhang would be undertaken if the bank were better capitalized, since in that case the value created by the loans would be

[3] “The core capital ratio can be found by dividing the core capital by the sum of the risk positions” (Sinn 2009, 152). Since the risk weighting of several assets increases in the recession, the core capital ratio denominator can only be reduced *via* a decrease in part of these assets, in the hope that the denominator (paid in share capital, capital reserves, silent partnership contributions) does not melt down too much.

[4] This paper deliberately does not discuss regulations that could conceivably counteract the pro-cyclical nature of core capital ratios, for such regulations cannot be motivated by central banks, but only supervised by them.

[5] “The presence of debt creates incentives for management, acting on behalf of shareholders, to engage in strategies that yield high returns when successful and negative returns when unsuccessful, increasing the likelihood and the extent of distress and insolvency” (see Admati *et al.* 2010, 22). On the other hand, a bank’s accumulated earnings give it a broader capital basis and enable it to expand its credit granting without having to raise additional external outside capital. However, earnings can only accumulate if the bank is not too highly leveraged: “if a bank is highly leveraged, the bank’s shareholders – and the bank’s managers as well – have strong incentives to have earnings paid out, rather than retained, since if earnings are retained there is the possibility that they will be used to satisfy the claims of the debt holders in financial distress” (see Admati *et al.* 2010, 34).

captured by those who would fund it" (see Admati *et al.* 2010, 38).

If this is true, it must also hold that the Basel III rules announced in September 2010 tend to mean that the issue of pro-cyclical effects – especially compared to Basel II (see Berka and Zimmermann 2012) – has been slightly defused. The new regulations on capital requirements should primarily take effect as of 2013 (see BIZ 2010): banks will have to retain 4.5 percent common equity as of 1 January 2013. There will be a transitional phase (up until 1 January 2019) for the additional capital conservation buffer of 2.5 percent that banks should only be allowed to touch in times of crisis, as well as for the accumulation of additional 'common equity' (4.5 percent by 1 January 2015) and of 'tier 1 capital (6 percent by 1 January 2015). In total, banks will consequently need over eight percent of core capital, which is double the amount to date, and seven percent alone will be required as common equity.[6] However, to build up this capital buffer and common equity, the ten biggest German banks alone require over 100 billion euros in fresh capital, according to their own estimates – which will either come from current earnings, which will then no longer be available as dividends, or as capital increases (see ZEIT Online Wirtschaft 2010). The new, anti-cyclical element of banking regulation subsequently consists of the new capital buffer (see Resti and Sironi 2010), that banks can fall back on in times of crisis (to expand loan granting), but which they then have to replenish in good times (to reduce loan granting).

In its dealings with foreign commercial banks the Chinese central bank has linked a longstanding monetary policy instrument, namely the reserve requirement ratio, directly to compliance with core capital regulations. For the foreign subsidiaries of multinational banks, this means that they have already overcome very steep hurdles on their application for a licence (apparently proof of capital commitments up to 700 percent higher than for the same kind of licence in Switzerland is required) and they must also be able to comply with substantial core capital ratio requirements. Low core capital ratios are sanctioned by the Chinese authorities through the application of a higher reserve requirement rate. This kind of provision is also pro-cyclical in principle, since a higher reserve requirement ratio is widely acknowledged to reduce the credit multiplier of the commercial banking system in a situation whereby the credit volume is downwardly adjusted in any case (see above). Moreover, the Chinese construction is of an asymmetrical nature, for a lowering of the reserve requirement ratio – below the generally prevailing percentage – is not provided for in a boom.

[6] Most of the international banks have already accumulated additional capital reserves since the crisis and are thus at least above the six percent level.

Conclusion

This paper discussed the question of whether and in which ways central banks like the ECB seem to be suitable to assume sole responsibility for bank supervision. This would imply simultaneous responsibility for price stability and financial market stability at the level of goals, and the use of interest rate and bank supervision at the level of instruments. In the sense of the question raised by the title, central banks mainly seem to gain more opportunities than exposure to risks by expanding the scope of their responsibilities. This would constitute a meaningful expansion of their 'classical business area'. One has to admit, however, that central banks are principally in danger of neglecting their macroeconomic responsibility in cases where interest rate policy would put system-relevant banks under pressure.

The independency dilemma could be resolved, or at least alleviated, if the ECB were not to take any sovereign actions itself, but were to issue strict recommendations for national authorities designated to implement them. That would enforce the subsidiarity principle. It would, on the other hand, be unsatisfactory to set up a financial market supervisor under the auspices of the ECB. Should the latter have the same rights as the ECB, then there would quickly be a squabble for competences, but if it were to report to the ECB, then national solutions would be preferable.

Does the additional responsibility of stabilizing the financial markets lead to a fresh (to a certain extent 'internal') trilemma for central banks? This paper's answer to that question would be: yes, but the potential new trilemma is a very special one, as it is not consistent in all directions.

Should monetary policy counteract the pro-cyclical effects of financial market rules more strongly in the future? The paper finds that this necessity cannot be ruled out, however the new capital requirement regulations related to the planned capital buffer discussed under the Basel III heading should tend to limit the degree of pro-cyclicality.

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After the 'Whatever-it-takes' Bail-out of Eurozone Bank Bondholders: The Eurozone's Wasted Opportunity for a Banking Union That Protects Sovereign Finance

Hans-Joachim Dübel*

Introduction

Despite conflicting public pronouncements by eurozone political leaders at times, their determination to protect bank bond investors in the current crisis has effectively been strong and pervasive. Severe sovereign bond market stress and the first steps towards sovereign debt mutualisation have resulted from pushing sovereigns directly out of the inter-bank market (Ireland, Cyprus) or to the brink of exclusion (Spain) in connection to bank bail-outs. In Greece, a second sovereign restructuring is currently under debate as public debt is further increased to protect bank bondholders. Debt acceleration through payments to banks is undoubtedly a key driver of the on-going eurozone sovereign debt crisis.

While political rhetoric demanding bank bondholder bail-in has picked up cyclically with the mounting fiscal tab for the bail-outs, the delay and timidity of the actual action taken speaks a different language. Schich and Kim (2012) provide an overview analysis for OECD countries suggesting that the practices of bank resolution adopted so far have tended to uniformly benefit bank debt investors. The exceptions to this policy – in particular Denmark and Britain – are found outside the eurozone. This finding can be further detailed by exploring the financial mechanisms of bail-in avoidance in three eurozone countries. Together with the legal and regulatory actions seen at the EU level to date, this allows us to make some inferences about the character of the banking union and its backup mechanisms that is implied by current policies.

* FINPOLCONSULT, Berlin.

Scale of bank bondholder bail-outs: anecdotal evidence from Ireland, Spain and Greece

Over a dozen large banks and savings banks in Ireland, Spain and Greece have received officially sponsored recapitalizations to date. Of interest is the contribution of private investors to fill the bank capital gaps determined by regulators. Of particular interest are those investors that are first in line to take losses, i.e. hybrid equity and subordinated bond investors[1], in short 'junior' bank bond investors.

In Spain and Ireland financial stress was caused by a largely synchronous real-estate lending boom that in both cases peaked in 2007. Yet, Irish house prices had already collapsed by 2009, forcing banks to recognize losses as early as 2010, while in Spain both price adjustment and loss recognition were dragged out into 2012.

As a result, Ireland had soon created a bad bank that purchased defaulted developer loans at very high discounts and enforced a severe stress-test for the assets remaining on bank balance sheets. Booking the losses upfront established a sizeable capital buffer, which stabilized the banks. With the help of swiftly passed legislation, the sovereign was able to recover 5.5 billion euros through haircutting the original junior bond investors. This means that roughly 10 percent of the approximate 50-billion-euro capital gap of Irish banks was covered through the bail-in of bondholders.[2] Ireland could have achieved a far higher ratio of

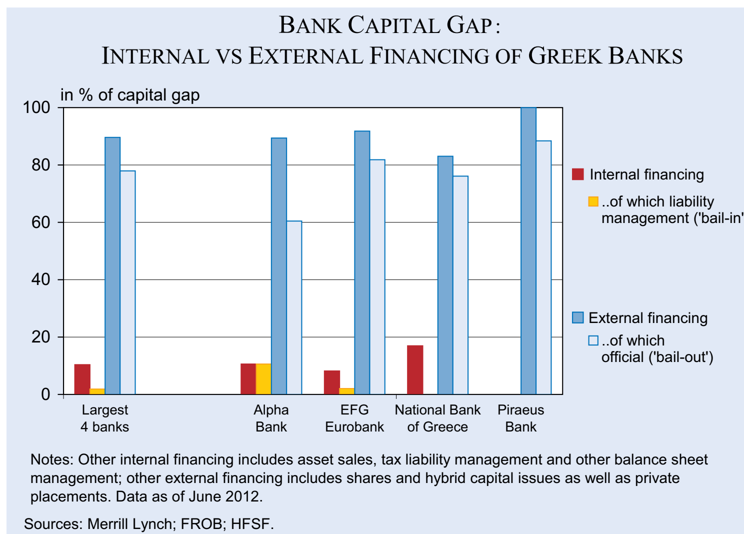
[1] Hybrid equity has historically been classified as the core capital of a bank while benefiting from interest tax deduction and legal formulation as debt contracts. The most popular versions used in Europe have been preference shares and silent participations (concealing the identity of investors). Subordinated bonds rank above hybrid equity but below senior unsecured bonds in bank insolvency, and for this reason they have historically been accepted as substitute capital.

[2] The capital gap can be defined as the distance between the current core capital position of the near-insolvent bank, usually in negative or insufficiently low territory after loss recognition, and the core capital demanded by regulators for the going concern. A zero current core capital position already assigns zero book value to shareholder equity, and probably also to hybrid equity (depending on its recognition). These positions should therefore be excluded from bail-in ratio calculations.

burden sharing if the eurozone had not resisted haircutting Irish senior unsecured bank bondholders.

Spain, on the other hand, had allowed banks to keep financing new house purchases at inflated prices and to sell off defaulted developer stock, with the help of rock bottom interest rates for several years. This resulted in only a partial restructuring of bank balance sheets in 2010 and 2011. The low loss recognition at that point permitted some of the original investors to fully recover their investments, and misled new investors into investing in seemingly sound balance sheets. Through the delay, many of the risk positions in banks that could have been used for a bail-in in Spain were *de-facto* transferred from professional to retail investors[3] or were lifted into the insolvency rank. Shares sold to retail investors implicitly protected bank bonds sold earlier.[4] Only 2012 finally saw both the collapse of inflated prices and a full bank restructuring, as well as the creation of a bad bank based on the Irish model.

Figure 1



Notes: Other internal financing includes asset sales, tax liability management and other balance sheet management; other external financing includes shares and hybrid capital issues as well as private placements. Data as of June 2012.

Sources: Merrill Lynch; FROB; HFSF.

As a result of the rotation of investors in bank equity and junior bank bonds, Spain, in contrast to Ireland, had to be forced by the Troika of ECB, EU Commission and IMF in 2012 to adopt modernized bank insolvency legislation. Resistance to full implementation remained strong: while the recovery ratios for junior bond investors agreed on look potentially low on paper[5], for the retail investors among them it has been suggested by government that full recovery would be possible if they can prove to have been misled by the issuing bank. This special treatment has also prompted lawsuits by retail investors that felt misled into buying bank shares.

While the final outcome regarding retail investors remains to be seen, what can be said is that external pressure on Spain has probably resulted in junior bank bondholders contributing moderately to recapitalization, possibly in the range or slightly exceeding the Irish ratios for the most affected banks in 'Group 0'.[6] A bitter taste, however, is left in the mouth by the fact that, as a result of Spain's insolvency delay tactics, most of the investors suffering haircuts are no longer those that were historically responsible for funding the credit boom. Evidently senior unsecured, as well as covered bond investors also came out completely protected.

In the case of Greek banks, loss recognition delay was not a factor in driving bail-out cost, but political resistance to bail-in was. Sovereign bond losses that initially drove bank capital gaps were determined by the external official financiers of the Greek state, rather than by domestic valuation tactics.[7] The Hellenic Financial Stability Fund has not published the full

[3] The investment bank UBS estimates that Spanish banks issued 32 billion euros in preference shares between 2007, the price peak, and 2010, the year of the largest Caja mergers. These shares were largely sold to retail investors.

[4] An example of the tactics adopted to engineer rank improvement for junior bonds as a result of delayed loss recognition is the creation of Bankia and its holding company Banco Financiera de Ahorros (BFA). Bankia absorbed both assets and liabilities, including the preference shares and silent participations, of the seven Cajas participating in its merger. However, implicitly protecting those junior bonds was the transfer of doubtful loans to the holding company BFA, which in addition initially held the ownership, i.e. first loss position, in Bankia. BFA itself issued 4.465 billion euros in convertible preference shares to the public Spanish bank stabilization fund FROB in December 2010, pulling the Spanish government into the risk. When BFA privatized Bankia stock to 400,000 retail investors, these investors *de-facto* removed part of the risk for the Spanish government. In summary, the Spanish government and retail investors have been operating as insurers protecting the junior liabilities merged into Bankia. Within these junior liabilities, substitution processes between professional and retail investors took place once again over time.

[5] By December 2012 the settlement of the EU with Spain on Bankia, the largest near-insolvent bank, determined haircuts for hybrid equity and subordinated bonds. Strike prices for their conversion have not been published as yet, and it also remains unclear at what price the far larger hybrid capital position provided by the mother BFA would be converted into Bankia stock. This leaves the door open for potentially large subsidies to historic capital owners. Currently, capital market advisory firms estimate recovery ratios in the range of 25 percent for preference shares and of 35–40 percent for perpetual and term subordinated debt. Ordinary shares would be heavily diluted, but not entirely wiped out.

[6] 'Group 0' comprises Bankia/BFA, Banco de Valencia, NovaCaixa Galicia, and Caixa Catalunya.

[7] International banks led the way as early as the summer of 2011 by writing off 22 percent of the GGB book values. Zettelmeyer, Trebesch and Gulati (2012) estimate the ultimate aggregate GGB haircut by March 2012 to lie between 55 and 65 percent.

bank recapitalization plans including details of bail-ins. A substitute could be the Merrill Lynch (2012) analysis presented in June 2012, according to which almost 80 percent of the capital gap of the four largest banks is funded through the eurozone bail-out. Only two banks at that point had proposed minimal bondholder bail-in measures, limited to junior bonds.[8] By December 2012, the total junior bond debt left between the four banks was still in the range of 2–3 billion euros.

A factor in the lacklustre use of bail-in in Greece may be the predominant issuance of bank bonds by the largest banks through Jersey trust vehicles. These arrangements usually contain detailed contractual language enforcing later recovery, unless the issuer goes insolvent. Yet, such circumstance have not deterred Ireland from cutting the same type of securities severely by means of a special law, fiercely attacked in the financial press at the time of its introduction and still contested in court. Greece also simultaneously practices a legally sound alternative to bail-in in the case of smaller banks, namely the Good Bank approach, which transfers junior bondholder claims, together with dubious assets, to the bad bank, tying their future to that of the assets.[9]

Even this cursory overview should enable us to reach the conclusion that in the three countries and the bank cases discussed above, bank bond investor contribution to financing a determined capital gap rarely has exceeded 10 percent of the bank capital gap. Those first in line to take losses, namely hybrid equity and subordinated bank bondholders, have been partly left off the hook through loss recognition delay and policy-induced discretionary actions. Senior bank bondholders, as well as covered bond holders, have remained completely protected in all cases. Of the three countries, only Ireland actively tried to haircut both senior and junior bank bond investors.

The potentially highly distortive horizontal and vertical equity impact of these policies should be noted and explored in further research. For instance, Greek senior unsecured bank bond investors have received drastically better treatment than Greek sovereign bond investors, even although the difference in underlying asset quality was rather marginal (partial and intermediated vs. full and direct investment in Greek government bonds). This has hit Greek pension funds hard, for instance, who, according to OECD data, had dramatically enhanced sovereign bond and symmetrically lowered bank bond exposure in 2009 and 2010. Going forward, the official creditors of Greece might be forced to take losses as a result of the generously calibrated bank bail-out of 2012 for the largest banks.[10] To the extent that bank bond investors receive high or full recovery in this way, sovereign bond investors are potentially hit harder. The policies chosen thus generate a *de-facto* subordination of sovereign bond investors to unsecured bank bond investors, whose extent depends on the scale of banking problems.

The legal basis for bail-in remains a torso

Beyond factual empirics, the lack of willingness to let bank investors bear losses could not be more clearly demonstrated by the delay in passing bank resolution and restructuring legislation at both the national and the EU level. Five years into the financial crisis, by the summer of 2012, only Ireland and Germany inside the eurozone had adopted legislation permitting regulators to force bank bondholder participation prior to insolvency. Countries with significant banking sector issues, including Greece, Cyprus, France and Austria, had not taken major legal reform action. Spain had to be forced to take action, as shown; however, the law introduced in Spain contains numerous clauses that may be abused for increasing investor bail-out.[11]

[8] According to Merrill Lynch, 100 million euros (EFG) and 333 million euros (Alpha), respectively, compared to a capital gap of 4.9 billion euros and 3.1 billion euros, respectively.

[9] The example of ATE bank is reported in the Greek press as a case where the good bank concept is followed. Under this approach, the healthy parts of the bank are sold, in this specific case with the likely participation of the three systemic groups of National (including post-merger EFG Eurobank), Alpha and Piraeus. The alternative is stand alone and later going public. The bad bank under this concept is the residual, i.e. contains dubious assets as well as equity, hybrid equity and subordinated bonds after the balance sheet is split 'horizontally'. This approach is most likely to ensure bank bondholder participation. Importantly, it provides a potential upside for junior bond investors if dubious assets perform better than expected, which improves the legal resilience of the procedure. To ensure burden sharing, senior unsecured bank bonds could be assigned to the residual bad bank pro-rata. Residual bad banks could be pooled across failed institutions in an economy. Furthermore, while the official argument used for recapitalizing the large banks with large amounts of eurozone funds is their greater economic viability (as opposed to smaller banks), future access to debt for the large network banks, and in particular their national champions character for Greece, seem to form an important subtext to the decision. Two of the four banks – Alpha Bank and EFG Eurobank – have strong market positions in South Eastern Europe that Greece does not want to give up to preserve regional status. One bank – the National Bank of Greece – dominates the important domestic Greek real-estate finance sector.

[10] Of the 43 billion euros in eurozone funding cleared in December 2012 and adding to Greece's sovereign debt, 23 billion euros were earmarked for protecting bank bondholders (18 billion euros for recapitalizing four large Greek banks, and 5 billion euros for a buffer for future recapitalizations held by the Hellenic Financial Stability Fund).

[11] For example, Chapter VII of Law 9/2012 of 14 November on the Restructuring and Resolution of Credit Institutions leaves the outcome for hybrid equity and subordinated bonds largely to the discretion of the Spanish bank resolution fund FROB. FROB *inter alia* can use 'market prices' for such paper as benchmarks for investor payouts. It is not difficult to see that the higher the bail-out, the higher the 'market price' of junior bonds will be.

Failure to act at the national level may have been related to the fact that investors in junior bank bonds are frequently national, or even local; and are often intimately tied to politics at that level. This is certainly a good description for European regional banks, including the Spanish Cajas, where even prior to selling those bonds to retail many local institutions and governments were invested in them. Conversely, a factor in Ireland's quick decision to haircut junior bonds may have been the exceptionally wide distribution of such debt to international investors. The motive to protect national investors first in line to take losses has probably been a central driver of calls for a delinking of the banking risk from sovereign risk through direct recapitalizations by the eurozone. The same delinking result clearly could have been achieved through consequent bail-in policies.

With support from many Member States running low for such reasons, it is unsurprising that the European Crisis Management Directive (CMD) designed to facilitate bank resolution and contain public rescue costs remains in limbo, while action in the sovereign bond market sphere has been rather fast. By June 2012 a CMD proposal assigning the bail-in option even of senior unsecured bank bond holders was published by the Commission. It stands in direct contradiction to the current rescue policies. First drafts circulating as late as January 2012, after years of delay, still featured named bail-in as merely one of many options, and avoided putting any pre-insolvency pressure on creditors. The Directive was initially supposed to be applicable only from 2018 onwards, and is currently scheduled for 2015, in both cases beyond the time frame necessary for current bank crisis management. By contrast, haircuts for sovereign bondholders through collective action clauses were legally enabled by EU legislation in early January 2013. Not just from a *de-facto* empirical, but also from a legal-technical perspective, sovereign bonds are now riskier than senior unsecured bank bonds in the eurozone.

The precedent could limit banking union to a eurozone subsidy vehicle for private bank creditors

The conclusion that can be drawn from the evidence available to date that the famous 'whatever-it-takes' approach, discussed publicly primarily in the context of the sovereign bond market with reference to the future action of the ECB, is now an empirical reality for most of the eurozone bank bond market. This material precedent raises serious issues for the future of the eurozone banking system.

To start with, there is the issue of credibility: will whatever new legislation that is passed on an EU or national level to enable bail-in really be any different next time? The underlying politics are unlikely to change: the information asymmetries of banking, especially in the eurozone's large regional banking sector, will keep risk capital tied to local or national investors, who will continue to lobby for using the eurozone balance sheet to bail them out in a crisis, as they have done in recent years. If stabilization of the battered eurozone sovereign finance market could be achieved in the near future, as global investor attention migrates towards the United States, for example, the relative 'success' of the precedent may have reduced the likelihood of even a modernized eurozone bail-in legislation framework ever being put to the test in practice.

What would a formalized guarantee structure for bank debt that is consistent with the empirical precedent look like in that case? Routinely realized high bail-out volumes will deter more prudently-run banks, or banks operating in safer lending environments, from joining mutual bank debt guarantee schemes, be they in the form of a deposit insurance scheme or of a bank resolution fund (which implicitly protects senior unsecured bank bonds, beyond insured deposits). However, the signs of deep resistance are already on the wall. The politically powerful German savings banks have refused to join a mutually funded eurozone deposit insurance scheme. If mutual schemes were finally to come into existence, they would be unlikely to make fully actuarially priced assessments of member banks consistent with the current bail-out precedent, i.e. to keep relying mainly on the fiscal resources of the eurozone.

This would leave the option of a 'banking ESM', i.e. a vast eurozone sovereign substitute insurer for chronically underfunded mutual bank debt protection schemes. We seem to have advanced a fair distance along this route, given that national sovereign guarantees backing up current ESM (or EFSF) funding for bank recapitalizations will be removed in conjunction with the ECB supervision of banks by 2014. With a domination of sovereign over mutual private bank debt protection, the eurozone would reach a stage of 'government-sponsorship' that has been characteristic of the state guarantees historically afforded to the German Landesbanken, the implicit guarantees pro-

vided to Fannie Mae and Freddie Mac in the United States, or for large private 'too-big-to-fail' banks globally. These institutions are widely held to have contributed to the global financial crisis, as their setup allowed them to socialize losses and privatize profits. This outcome would be the opposite of a meaningful banking union project based on the effective control of bank management associated with permitting private investments in banks to fail and keeping banks small.

The more sensible alternative would be to cut down systematically on the bail-out financing for bank capital gaps in crisis management through consequential and fast loss recognition and the systematic use of bail-in. Such a strategy could already be adopted at short notice, in Cyprus in early 2013, for instance, to break with the 'whatever it takes' approach. Only a credible risk mitigation strategy would turn an explicit and partial pan-European guarantee for deposits and unsecured bank bonds that could be attractive for the banks mutually financially feasible. Moreover, fiscal responsibility will only be preserved and a repetition of the current catastrophic outcome for the sovereign bond market will only be avoided if such private sector mutuality foundations are laid and the public sector is limited to truly catastrophic risk backup functions.

Summary

Despite rhetoric to the contrary, the eurozone's banking crisis management choices taken in recent years have confirmed the status of bank bond investors as highly privileged. For senior unsecured bank bond investors, a banking union in the sense of full insurance is not a distant project, but a reality today. Even subordinated bank bond and hybrid bank equity investors have been mildly treated in many cases of near insolvent banks. Anecdotal evidence from Spain, Ireland and Greece suggests different dynamics leading to similar results, with loss recognition speed and political willingness to bail-in playing the decisive roles.

While comprehensive bank bondholder protection was implemented, bank insolvency legislation in the eurozone that could have rationalized these policies was delayed and remain a torso. The corresponding bail-out costs and risks have almost exclusively been underwritten by sovereign bond investors. Through the events these costs and risks have become *de-facto* subordinated to senior unsecured bank bond investors. In contrast to with the situation of senior unsecured bank bonds, haircuts for sovereign bonds by way of collective action clauses are a legal feature from January 2013 onwards.

Asking European banks to step up to mutually funded protections for bank bondholders and to bear eventual bail-out costs on the scale seen to date will be almost impossible. Unless the course is changed quickly and radically, banking union will become expected to remain a private debt transfer exercise to eurozone sovereigns, and eurozone banks will be seen as largely government-sponsored.

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Target Losses in Case of a Euro Breakup

Hans-Werner Sinn*

When exchange rate adjustments are impossible, imbalances of cross-border payment flows must be accommodated officially. This baseline fact about monetary union has sparked extensive discussion on what the resulting asset positions mean (Sinn 2011a and 2011b; Tornell and Westermann 2012; Whelan 2012).

On one side, Sinn and Wollmershäuser (2012) argue that Finland, the Netherlands, Luxembourg, and Germany face the risk of losing the Target claims of their national central banks should the euro break up. On the other, De Grauwe and Ji (2012) deny the existence of any such risk. They base this denial on the grounds that:

- The risk stems only from the self-elected net foreign asset position of these countries;
- Fiat money has a value independent of the corresponding national central bank's assets; and
- Foreign speculators could be excluded from a currency conversion if necessary.

Given that the eurozone's gross Target claims or liabilities currently amount to around 1 trillion euros and constitute the largest single item on the balance sheets of most of the central banks of the eurozone members, this would be good news for the four countries mentioned. If De Grauwe and Ji are right, however, one wonders, why Moody's recently announced that it is considering downgrading the credit rating of Germany, the Netherlands, and Luxembourg in view of the riskiness, among other factors, of their huge Target claims.[1] Can it be that the analysts at Moody's have overlooked something?

This paper will show that they have not indeed overlooked anything, and that, in fact, all three of De Grauwe and Ji's central arguments are either erroneous or do not apply to the assessment of Target losses in the case of a eurozone breakup. To this end, let us consider the issue in greater detail. This paper begins by reviewing the nature of the Target imbalances according to Sinn and Wollmershäuser and then proceeds to deal with each of De Grauwe and Ji's counterarguments in turn. Some of the comments made here also apply to a new paper by Buiter and Rahbari (2012b) that came out after this reaction was written. In this paper I briefly refer to what I perceive as their error in the section on fiat money.

How the Target balances came about

Sinn and Wollmershäuser (2012) pointed out that by dramatically reducing the collateral requirements for the refinancing credits of eurozone central banks, the ECB undercut market rates in the Southern eurozone countries and Ireland. This enabled a huge asymmetric expansion of refinancing credit and money creation, compensating for stalling capital imports and outright capital flight. The monetary expansion in the Southern countries in turn enabled a net outflow of central bank money to other eurozone countries by way of international payment orders aimed at buying goods and assets and redeeming foreign debt. Sinn and Wollmershäuser (2012) demonstrated that this outflow represents a classical balance-of-payments imbalance, showed that its accumulated value is measured by the Target balances, and constructed the first comprehensive Target panel dataset out of the sometimes confusing and non-homogeneous balance sheet information provided by the eurozone member central banks and the IMF.[2] They argued that the ECB compensated for, and may even have caused, capital flight inasmuch as it replaced expensive foreign interbank credit with cheaper credit from local electronic printing presses, and helped to maintain and prolong structural current account deficits that otherwise would have been difficult to finance.

* Ifo Institute. This paper was shown to Paul De Grauwe before publication. I am grateful for his reaction.

[1] "Moody's Changes the Outlook to Negative on Germany, Netherlands, Luxembourg and Affirms Finland's Aaa Stable Rating", http://www.moodys.com/research/Moodys-changes-the-outlook-to-negative-on-Germany-Netherlands-Luxembourg--PR_251214?lang=de&cy=ger.

[2] Sinn and Wollmershäuser collected the first panel data set showing the Target balances of the eurozone countries.

In the surplus countries, commercial banks placed the funds they withdrew from the deficit countries with their own central banks, which implied a sterilisation of the inflowing liquidity. Thanks to this sterilisation the policy has (to date) not been inflationary, but for that very same reason it is tantamount to a pure fiscal credit transfer that resembles the official intergovernmental credit transfers.

Sinn and Wollmershäuser (2012) argued that this policy was defensible at the time of the Lehman crisis, but has since begun to undermine the allocative function of the capital market by offering credit at conditions that do not take idiosyncratic country risks into account and undercut market rates. They also maintain that Target debts impose risks on the rest of the eurozone countries in proportion to their share in the ECB's capital, should the deficit countries default and leave the eurozone. Should the eurozone break up, the surplus countries' Target claims themselves would be at risk.

Exogenous current-account balances?

De Grauwe and Ji (2012) concentrate on the risk arising in case of a eurozone breakup. They argue that this risk stems from the size of the Northern countries' portfolio of net foreign assets built up from previous current-account surpluses, rather than from the composition of this portfolio. As the current-account surpluses are "entirely (their) ... own decision", independent of the ECB's refinancing policy and the resulting Target balances, there is no reason to worry about this risk.

This view is erroneous, since the current-account deficits, which resulted from years of easy access to international capital markets that the euro brought to the countries of southern Europe, could hardly have come down as slowly as they did during the crisis if the ECB had not replaced private capital inflows with cheap refinancing credit.

To be specific, a more restrictive ECB refinancing policy, in the sense of continuing to demand first-rate collateral from Southern banks rather than continuously reducing the collateral requirements to junk levels[3], would have resulted in a lower flow of refinancing credit to the banks of the deficit countries, lower Target liabilities, higher local interest rates in these countries, less capital flight or even continued private capital imports, less investment and government consumption, and hence lower current-account imbalances among the countries of the eurozone. Thus, whatever the value judgment on the ECB's policy is, it cannot be true that a country's current-account surplus and its net foreign asset position merely reflect that country's own decisions, as De Grauwe and Ji (2012) maintain.

Moreover, saying that the current-account deficits were sustained by the extra refinancing credit behind the Target balances does not equate to claiming that current-account deficits and Target deficits were positively correlated, as some economists criticising Sinn and Wollmershäuser (2012) have insinuated. On the contrary, to the extent that the ECB helped slow down the adjustment of pre-crisis current-account deficits despite the reversal of private capital flows, the correlation should have been small if not zero, while the correlation between private capital imports and Target deficits should have been (and was) strongly negative, as Sinn and Wollmershäuser (2012) demonstrated with their country analyses. However, it does mean that the ECB's extra refinancing credit, which resulted in Target debt, helped provide the funds needed to finance the current-account deficits. It is important to note that, by the definition of a country's budget constraint, the sum of Target balances, (private and intergovernmental) international capital flows and current-account imbalances is zero.

Even if De Grauwe and Ji's (2012) claim – that only the net foreign asset positions, and hence the accumulated current-account imbalances, matter for the breakup risk – was valid, the Target balances would still indicate such a risk. For without the public capital flow from North to South that these balances measure, the overall capital flow in this direction would have been smaller.

Portfolio composition matters

However, this is not the main problem with De Grauwe and Ji's (2012) analysis. The view that the portfolio composition of a country's net foreign asset position is largely irrelevant for an assessment of the breakup risk is in itself erroneous. If this view were correct, the risk of a balance sheet could be measured by the difference between its assets and liabilities, while the riskiness of the assets themselves would not matter.

[3] The Bundesbank President, Jens Weidmann, criticized the low collateral quality for the refinancing credits and the resulting Target credit in a letter to Mario Draghi (see Ruhkamp 2012).

What the authors overlook is the difference in the risk that a eurozone breakup imposes on different kinds of foreign assets and on the different kinds of domestic owners of such assets. Consider a surplus country like the Netherlands. Dutch asset owners hold foreign ownership titles like bank debentures, government bonds, company shares, or titles to foreign real-estate property. If the euro breaks up, these titles continue to be legal titles protected by law. There is admittedly an exchange rate risk, but in principle the legality of the titles is not questioned. By contrast, the Dutch Target claims are claims on the ECB system held by a government institution, the Dutch central bank and hence the Netherlands, whose value hinges on the ECB's continued existence.

If the eurozone breaks up and the Target debtors go bankrupt, there is no clear legal basis for the Target claims, and the Netherlands would hold a claim against a system that no longer exists. Neither the ECB bylaws nor the Maastricht Treaty contain any rules for how this case would have to be handled. Should the euro break up, there would probably be a follow-up institution that would inherit the ECB's equity capital, which currently totals around 31 billion euros. The Netherlands would then have to compete for this equity with Germany, Finland and Luxembourg, who together with the Netherlands, hold Target claims currently amounting to about 1,000 billion euros. In all likelihood, the lion's share of the Target claims would be lost in such a scenario, while marketable ownership titles would remain legally valid. All four countries would then plead with their former partners in the eurozone to share in the losses, but the latter would probably point out that quite a number of official voices from the surplus countries had called the Target balances irrelevant, merely statistical items with no economic significance – and there would be enough economists defending this view, perhaps even alluding to the fiat money interpretation that will be discussed below.

Thus it is not irrelevant to Dutch risk that, by way of the ECB's generous refinancing policies that undercut market conditions, marketable claims have been converted into mere Target claims held by the Dutch central bank. Nothing could be more erroneous than such a view.

This is particularly true since a considerable part of the marketable assets constituting the Dutch net foreign asset position before the emergence of Target balances were claims against countries whose creditworthiness was impeccable. It is well known, for example, that Dutch and German banks actively lent their funds to French banks, which then distributed them to southern European banks. Although France has a negative net foreign asset position, the Bank for International Settlements' statistics show that its banks had invested much more in the crisis-affected countries than Germany. During the crisis, the French banks partially retreated from the Southern countries with whose printing presses they could not compete; and the Dutch and German banks then partially retreated from France, since the French banking system no longer needed their funds. The Dutch and German banks instead placed their funds with their respective central banks or, equivalently, drew less refinancing credit from them. The double retreat of capital (from the South to France, and from France to the Netherlands and Germany) kept the French Target balances largely unchanged, but it generated Dutch and German Target claims and Southern Target liabilities. In the end, market-grade private claims on the French banking system in the Netherlands and Germany were replaced by additional private claims on the Dutch central bank and the Bundesbank, or by reduced liabilities from refinancing credit, with these national central banks themselves acquiring corresponding claims on the ECB system. This was certainly not a portfolio reallocation that kept the risk of a euro breakup unchanged for these countries as a whole, let alone for these countries' taxpayers.

Target balances are not gold, and not even gold-backed securities

The risk imposed by the Target balances can also be highlighted by comparing the eurozone with the Bretton Woods system of fixed exchange rates that lasted until 1973. That system also featured significant balance-of-payments imbalances that involved substantial cross-country currency flows, which were basically the same as the flow of Target claims today. However, any imbalances arising had to be settled in dollars or gold.

The balance-of-payments surpluses that countries like France or Germany held with the United States meant that dollars or dollar-denominated Treasury bills were accumulated by the Banque de France and the Bundesbank. As is well known, the Bretton Woods system came to an end when Charles de Gaulle asked the United States in 1968 to convert the

dollars accumulated by the Banque de France into gold, because the United States did not have enough gold to convert the outstanding dollars of the whole world in this way (see Kohler 2011).

However, there were not only balance-of-payments imbalances with regard to the United States, but also among the European members of the Bretton Woods system. These imbalances had to be settled in dollars or gold, but given that the market price of gold was below the official dollar-gold parity, in practice settlements were made largely with gold (see also Neumann 1998).

The Bundesbank at the time accumulated 3,600 tonnes of gold, which, except for the 6 percent that was transferred to the ECB, is still in its possession and amounts to practically all the gold that the bank has. Gold nowadays has a value of about 19 times its price when the Bretton Woods system came to an end in 1973.

In the eurozone, the Bundesbank did not accumulate gold as a result of its balance-of-payments surplus, but instead has merely acquired Target claims; in other words claims that are backed by Target liabilities and the corresponding extra refinancing credits given to the commercial banks of the crisis countries, which currently earn an interest rate of 0.75 percent, which is far below the inflation rate. The central banks of Luxemburg, the Netherlands, and Finland are in a similar position.

For payments within the United States, the situation was similar to the Bretton Woods system or to true gold-standard systems until 1913. Balance-of-payments imbalances between commercial banks used to be settled with physical gold transfers, which, as we know from old Western movies, were not without risk. To facilitate settlement, the United States introduced the Federal Reserve System in 1914, consisting of 12 districts with their respective 'District Feds'. The advantage of that system was that the settlement was thereafter able to be made by simply transferring ownership of gold-backed securities in a federal clearing portfolio, without the gold having to be physically transported. Later, in the 1930s, the gold-backed securities were replaced with Federal Government bonds, but in principle the system still operates today. Since the transferred ownership shares bear an interest rate of 6 percent that is not socialised among the district Feds, there is quite a penalty for District Feds that create and lend out more than their fair share of the monetary base. This is the reason why a Target-like problem has never arisen in the United States to this day.[4]

In the United States, settlements are made every April according to a formula that typically eliminates some, but not all imbalances. During the crisis, the gross Interdistrict Settlement Account imbalances, the analogue of Europe's Target imbalances, increased to a maximum of 2.9 percent of US GDP, but the settlement, as well as local reductions in money supply to raise interest rates that attract capital from other districts and thus help to avoid a settlement, have meanwhile reduced the gross claims to 0.6 percent of US GDP, or 96 billion US dollars (10 October 2012). By contrast, based on the Target figures for September 2012, gross Target claims amounted to 11.4 percent of the eurozone GDP, or 1,020 billion euros (see Sinn 2012b). Had the eurozone been set up like the Bretton Woods system or the US Federal Reserve system, these Target claims would have to be converted into gold-backed securities or safe marketable securities bearing a 6 percent rate of interest transferred from the debtor central banks to the surplus central banks. Taking the most recent figures available at the time of writing, the Bundesbank would then have received claims on assets (including 6 percent interest) worth 695 billion euros (September), the Nederlandsche Bank assets worth 125 billion euros (August), the Banque Centrale du Luxembourg assets worth 128 billion euros (July), the Suomen Pankki assets worth 60 billion euros (July), the Banque de France 12 billion euros (July), and the Eesti Pank 0.1 billion euros (July).

Fiat money does not protect against Target losses

To further demonstrate the irrelevance of Target balances, De Grauwe and Ji (2012) point to the nature of fiat money. They rightly argue that fiat money has a value in and of itself for the private agents using it; and that this value would not disappear if the euro ceases to exist and is replaced by a national currency.

Indeed, as fiat money is voluntarily held by private agents, even although it does not generate interest, it must be delivering liquidity services that are equivalent to the interest foregone by not converting it into interest-bearing assets, and the present value of these liquidity services is identical to the accounting value

[4] See Sinn (2012a); and Sinn and Wollmershäuser (2012, Figure 9).

of the money itself. Thus, fiat money is real wealth, and the economic value of the liability side of a national central bank's balance sheet (for the private economy!) is independent of the value of the assets it holds, as the authors maintain. The central bank could destroy its assets without reducing the value of the monetary base, as the authors maintain.

While this is all true, it certainly does not mean that the central bank in question and the sovereign that owns it would not incur wealth losses if it destroyed its assets, as De Grauwe and Ji (2012) believe.[5] After all, it is the assets bought with self-printed money and the interest flow they generate that create the seignorage wealth of a central bank. In the eurozone, the most important assets member central banks acquire are titles derived from providing refinancing credit to commercial banks, i.e. from lending them the newly printed money, and the value of these titles is equal to the present value of the interest flow from the commercial banks to the central banks that is generated by this credit. Voiding the central banks' claims on the commercial banks would eliminate this interest flow and would therefore make the central banks poorer.

Even although central banks have to book their outstanding monetary base as a liability, this base is equity from a truly economic perspective if the seignorage generated by the assets acquired with the newly created money is taken into account.[6] It is even possible to reason that a central bank's right to increase its monetary base in the future and buy even more assets with newly printed money is unreported equity that increases the central bank's loss-bearing capacity, a view that follows from an early contribution by Wenger (1997) and was recently emphasised by Buiter and Rahbari (2012a and 2012b).[7] However, all of this does not imply that destroying the assets would be harmless, since parts of the thus-defined economic equity itself would also be wiped out. It is surprising that this simple, but crucial point seems to have been overlooked by so many authors.

The central bank's assets stand for a flow of interest returns from commercial banks to the central bank, whose present value is the same as the value of the assets. Since the central bank's seignorage profit is normally handed over to the sovereign, it is this sovereign and its domestic taxpayers who would suffer the loss if the Target claims, now the most important assets of four central banks in the eurozone, were destroyed.

In a normal situation without Target imbalances, as prevailed in the eurozone until 2007, the assets of a central bank consist predominantly of interest-bearing claims resulting from refinancing credit given to commercial banks within the country, or securities bought from them. The flow of seignorage profit thus comes largely from the domestic commercial banks and their credit customers, goes to the socialisation mechanism of the ECB, and is then distributed to the sovereigns, and hence taxpayers, of eurozone countries in proportion to their respective capital shares. In a symmetric equilibrium, every sovereign receives just as much seignorage profit as its central bank collects from the domestic commercial banks.

When the Target balances began to rise in the eurozone after the outbreak of the financial crisis in the summer of 2007, the electronic printing press was 'lent' by the Northern to the Southern central banks, and so the eurozone's claims from issuing refinancing credit and the corresponding interest revenue came increasingly from Southern rather than Northern commercial banks, the reallocation of claims being approximately measured by the Target balances (see Sinn and Wollmershäuser 2012). Due to the socialisation of seignorage in the ECB system, this is irrelevant for each central bank's distribution of seignorage to the respective sovereign as long as the euro exists. (There are severe disadvantages, however, for the capital-exporting countries insofar as the competition of the printing press keeps the market interest rates below the levels that otherwise would have prevailed.)

However, if the euro were to break up and if the Target claims were not to be honoured as legally valid titles, or the Target debtors were unable to repay while the Target-neutral countries objected to sharing in the losses, the seignorage stemming from the commercial banks of the Target debtor countries would no longer flow into a common pool and the Target surplus countries would lose their Target claims, with the present value of the lost seignorage being exactly equal to these claims (whatever the time path of the interest rate). This chain of events would be entirely independent of the fiat money aspect on which De Grauwe and Ji (2012) focus, and independent of the size of the

[5] To cite the authors: "in the fiat money system we live in, the Bundesbank could destroy all its assets without any effect on the value of the money base – as long as people continued to trust the Bundesbank to maintain price stability".
[6] For a discussion of this in the context of the euro introduction – see Sinn and Feist (1999).
[7] See also Homburg (2012).

ECB's or the Bundesbank's loss-bearing capacity emphasized by Buiter and Rahbari.

It also does not matter to whom the commercial banks lent the money they borrowed from their central banks, be they private clients or local governments, and whether or not the commercial banks were able to provide good collateral to their national central banks. The commercial banks, and not their clients, would be liable to pay the interest to their central banks, and if their central banks were not to honour their Target liabilities after a breakup of the eurozone, it would be the central banks of the Target-surplus countries that would suffer the loss. Given that the latter would lose their legal relationship with the commercial banks of the debtor countries, they would have to content themselves with the Target claims and incur a wealth loss equal to those claims, if the debtor countries' central banks did not honour the claims after a eurozone breakup. This would represent a real loss of interest returns from foreign commercial banks, regardless of the size of the loss-bearing capacity of the Target-surplus countries.

Would restricting money conversion to residents avoid Target losses in case of a breakup?

De Grauwe and Ji (2012) conclude their paper by arguing that the only risk for the 'virtuous German taxpayer' (and presumably for the equally virtuous Dutch and Finnish taxpayer) is a speculative flight into German deposits from countries whose currencies would the most likely devalue after a breakup. If the Bundesbank were to convert all domestic accounts into the new national currency, there would be too many deutschmarks to start with and hence one must reckon with inflation-induced wealth losses for the domestic economy. However, the Bundesbank could easily avoid this wealth loss by limiting conversion into the new national currency to residents.

This argument is true, but it applies only to last-minute capital flight. Since the speculative flight into German deposits generates new Target claims against the ECB system on the part of the Eurosystem that would not be recognised after a breakup of that system, the Bundesbank would indeed incur additional losses by carrying out the payment orders, filling German deposits on behalf of foreigners. There would be no difference between this case and the earlier capital flight already reflected in the Target balances.

However, the remedy the authors suggest, namely excluding non-residents from converting their German euro accounts into deutschmark accounts, only works for Target imbalances built up at the very last minute by transferring the money to German accounts. It would not help with the prior imbalances, because these did not result from the build-up of deposits in German banks.

For one thing, such deposits were at best transitory. Practically all of the money that foreigners transferred to Germany and that led to Target imbalances has quickly been converted into real assets, such as private and government bonds, or ownership titles to firms or real-estate. It would be impossible and illegal to disentangle the ownership claims generated in this way should the euro breakup.

More importantly, the capital flight reflected by the surge of Target imbalances in Ireland, Italy, and Spain was not predominantly the flight of capital owned by residents in these countries, but marked the retreat of banks in the surplus countries from the credit markets of the deficit countries, a flight from a stormy sea back to the home harbour. The banks of Luxembourg, the Netherlands, Finland, and Germany not only stopped lending to finance other countries' current-account deficits, but withdrew outstanding funds by refusing to renew credit contracts at maturity. The banks of the deficit countries also redeemed their debt in net terms because they found the credit from the domestic printing press cheaper than the interbank credit, given that the ECB did not demand a risk premium. The banks of the surplus countries invested the funds with their central banks instead, which received the Target claims. It would also be impossible to disentangle these operations if the euro were to break up. Thus, from the perspective of the deficit countries, the previous benefits from the Target imbalances in terms of a real resource flow would remain, but the corresponding debt would probably disappear.

Conclusion

Europe has suffered from a severe balance-of-payment crisis, as capital markets were no longer willing to finance current-account deficits and outright capital flight occurred, largely from Southern to Northern countries, prompting the ECB to step in with the printing press. By successively reducing the quality of the collateral that commercial banks had to pledge to

their respective national central banks, the ECB dramatically expanded the monetary base created in the Southern countries of the eurozone by way of providing refinancing credit. This additional money replaced the money flowing out by way of payment orders to other countries for the purpose of buying goods and assets and for the redemption of foreign debt. Economists call this outflow a balance-of-payments deficit. The accumulated deficit is reported in the central bank balance sheets as Target debt, since it means that the central banks carrying out the payment order had to credit the payments to the private firms and banks receiving the payments.

Under the Bretton Woods system the balance-of-payments deficits between the European countries were largely settled with gold transfers between the central banks (since the market price of gold was below the dollar-gold parity). In the US Federal Reserve System, they are settled by transferring ownership shares of safe marketable assets in a federal clearing portfolio, the transferred capital bearing a rate of interest of 6 percent. In the eurozone they are simply booked as Target imbalances in the balance sheets of the central banks, and annually augmented by the main refinancing rate (currently 0.75 percent).

With its policy of offering generous refinancing conditions that undercut the capital market, the ECB did not cause, but sustained and slowed down the adjustment of the current-account imbalances stemming from the time when the euro triggered excessive capital flows to some of the periphery countries (implying a close-to-zero correlation between current accounts and Target balances). Without this policy, whether right or wrong, the deficits would have been difficult to finance, local interest rates would have been higher, and the imbalances would have been smaller.

The banks of the Northern countries used the excess liquidity coming in through payment orders from the South to redeem their stocks of ECB refinancing credit and to lend money to their central banks. Thus, the ECB's policy has effectively converted Northern savings from private marketable assets issued by other countries into claims on, or reduced debt with, the respective national central banks, which themselves hold corresponding Target claims on the ECB system. In many cases the conversion meant that Dutch and German claims against French banks, which retreated from their role as credit intermediaries between Northern and Southern Europe, were converted into Target claims on the ECB system.

It is a matter of debate whether the ECB has protected the eurozone from an irrational capital market, or distorted the allocation of capital in the eurozone and deprived the savers of the Northern countries of their interest income by undercutting market conditions. However, it definitely has tolerated, if not created, huge Target imbalances that impose a particular risk on the Northern countries should the euro break up. Thus, Moody's assessment of the risk that the Target balances impose on the Netherlands, Luxembourg and Germany is justified.

The Target claims represent a euro breakup risk for the creditor countries for the following reasons:

- Unlike the marketable assets behind a country's net foreign asset position, the Target claims would lose their legal base, because they are claims against a system that would no longer exist and because there are no legal rules and specifications in the ECB system to handle such a case. The equity capital of the ECB itself would only cover a tiny fraction of its Target liabilities.
- Although a country's monetary base would retain its value after a breakup of the euro and a conversion to national currency, it would not be irrelevant if a country's Target claims were to be destroyed, since they represent the present value of a flow of seignorage stemming from other countries' commercial banks that compensates for prior outflows of goods, assets, and debt certificates to these countries. An interruption of the flow of seignorage from foreign commercial banks would imply real wealth losses for the surplus country's taxpayers and/or savers, the present value of which equals the Target balances. This is entirely independent of the size of their loss-bearing capacity, which is irrelevant for the question in hand.
- If destroying the Target claims were irrelevant, then destroying the Bundesbank's stock of gold reserves would also be irrelevant, since this stock was accumulated from Target-like imbalances under the Bretton-Woods system.
- Excluding non-residents from a conversion of deposits into the new national currency is useful to counter a last minute surge in Target claims before a breakup, but it is no solution for the previously existing Target claims, given that the latter reflect prior purchases of goods and assets abroad, as well as a repayment of foreign debt. These transactions have left no traces in today's deposits. From a practical and legal perspective, it

is impossible to identify the historical beneficiaries of the Target imbalances.

The risks described above, as well as the implications of a reallocation of savings among alternative uses within the eurozone that results from the ECB's policies, show that there is every reason to be concerned about the Target imbalances. The sort of asymmetric monetary expansion they represent has no counterpart in the US system. If the euro is to survive politically, a settlement mechanism must be introduced in the eurozone.

To be sure, the potential Target losses are a powerful reason why the Northern euro countries should fear a breakup of the euro, although they are certainly not the only reason for concern. However, Europe's continued existence cannot be based upon the fear of a breakup, but should instead be founded on the prospects of mutually beneficial cooperation. The eurozone must find its way back to a system of fair, voluntary exchange, and to budget constraints that reflect the true scarcity of resources. Copying the monetary rules of the US could be one way to achieve this goal.

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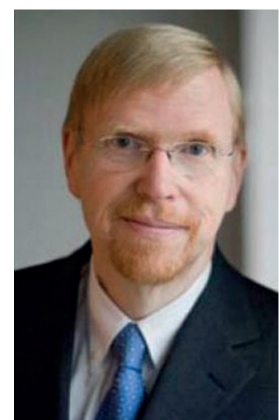
Trapped in the EMU?

Thomas Mayer*

As the euro crisis progresses without any resolution in sight, a rift is emerging between a small group of Northern European countries including Germany, the Netherlands and Finland, and a larger group of Latin European countries including France, Italy and Spain. The former group of countries emphasizes the importance of economic adjustment and austerity, and is only prepared to consider pooling debt among euro area countries once states have ceded large swathes of political sovereignty to the euro area level. The latter group insists that there is a limit to the amount of adjustment and austerity that their societies are willing to accept and is pushing for the mutualisation of debt as soon as possible; and before seriously considering relinquishing more sovereignty. In France, in particular, opinions are deeply divided over the debt pooling issue.

Many observers believe that the Latin European countries are in a better position to impose their will on Northern European countries than *vice versa*. For even if Northern countries use the principle of unanimity at the political level to block the direct pooling of debt through joint issuance, Latin countries can still use their majority in the ECB's Governing Council to achieve the indirect pooling of debt *via* the ECB's balance sheet. All that is required to achieve debt pooling via the back door of the ECB is a decision by the Governing Council to buy the bonds of governments and/or banks experiencing financial distress. The consequences of debt pooling *via* the ECB's balance sheet would naturally be less severe (and hence preferable) for creditor countries than the assumption of joint liability. Instead of facing direct budgetary consequences in the case of the default of an EMU country that has issued jointly guaranteed debt, creditor countries would share in the inflation tax levied on the entire euro area if the ECB were to monetize government debt.

* Deutsche Bank.



Large Latin countries can rely on ECB bond purchases when markets are closed to them, as defaults could trigger a systemic crisis and financial meltdown. The only way for Northern European countries to escape paying the inflation tax arising from the debt of insolvent countries accumulating on the ECB's balance sheet is to leave the eurozone. Although this option is currently being openly discussed in the press (see, for example, the cover story of *Der Spiegel* of 26 June 2012), the general conclusion has been that an exit from the EMU would be too costly to be considered an option. The German Council of Economic Experts points to German claims in euros amounting to 2.8 billion euros and the Bundesbank's additional Target2 credit totaling 728.6 billion euros (June 2012), implying that part or all of these sums could be lost if the euro were to collapse. The Council would also expect uncertainty created by any demise of the euro and the expected appreciation of a new D-Mark (Sachverständigenrat 2012) to plunge the economy into a deep recession. Dirk Meyer of Helmut-Schmidt University Hamburg attempts a more precise estimate of the costs of a German exit from the EMU and comes up with 295.3 to 390.1 billion euros (see Meyer 2012). The largest position in his calculation is an exchange rate loss of up to 237.3 billion euros on German net claims on euro area countries totaling 950 billion euros. Against this, he sets 74.8 to 149.8 billion euros in annual costs for Germany's continued EMU membership.

The apparently prohibitive costs of leaving the EMU has led prominent German economists to complain that Germany has been trapped by its partners who, thanks to the EMU, can extort contributions from the German taxpayer to fund their general budgets.[1] Interestingly, the Finish government has taken a more nuanced view. According to Finance Minister Jutta Urpilainen, Finland will not keep the euro 'at any price' and would prefer to exit the EMU than to be held liable for other countries' debt.[2]

This paper takes a preliminary look at the potential costs for Northern European countries, notably Germany, of leaving the EMU. Needless to say that

[1] See, for example, the interview with Hans-Werner Sinn in *Handelsblatt* of 2 July 2012.
[2] See *Frankfurter Allgemeine Zeitung* of 7 July 2012.

such a scenario is highly fictitious, at least at this stage. The paper's perhaps somewhat surprising conclusion is that there are two ways to leave the EMU that keep its economic and financial costs manageable. For now, governments and large parts of the electorates in Northern European countries remain committed to the EMU. However, overly aggressive brinkmanship on the part of their EMU partners to extract more help could change this. The leverage of Latin Europe over Northern countries in the EMU may be smaller than generally perceived.

What could trigger an exit from the EMU by economically stronger countries?

German Chancellor Merkel is adamantly opposed to the pooling of sovereign or bank debt without material progress towards political union. Her position is backed by a large majority of the German electorate, which rejects the introduction of Eurobonds. Other governments and the populations of the financially stronger EMU countries seem to feel similarly. However, should larger EMU countries and/or systematically important banks located there lose access to the credit market and thus be in danger of defaulting, the ECB would probably be forced to intervene and buy the debt of these entities to avoid financial disaster. With the ECB being perceived as senior creditor since its refusal to participate in Greek debt restructuring, ECB intervention would probably increase the aversion of market participants to the debt of the distressed entities. The ECB could end up as the latter's only source of funding and the bank's balance sheet could grow quickly. Although this would not immediately lead to inflation, a large-scale monetization of debt could raise inflation expectations and fears in the inflation-averse Northern countries; and inflation could eventually rise.

Three steps to a euro exit

Are Northern Europeans condemned to live in a monetary union, where inflation and exchange rate policy is driven by the preferences of Southern Europeans for higher inflation and a declining exchange rate? Not necessarily. It seems possible for Northern Europeans to leave a high inflation/weak exchange rate union without too much disruption. This would be possible if the euro continued to exist as the currency of a Southern – or Latin – monetary union. The following section outlines how an exit from the EMU could work using Germany as an example.

Step 1: as inflation, especially in the Northern EMU member states with balance-of-payments surpluses, and notably Germany, begins to rise in response to lax monetary policy and exchange rate depreciation, these states could introduce clauses in contracts indexing prices and wages to their national inflation rates. Savers could be protected by the issuance of inflation-indexed government bonds and savings vehicles. Since tax revenues would also rise with inflation, the government's exposure to inflation on the liability side would be hedged on the assets side of its balance sheet, as long as the issuance of inflation-indexed bonds did not exceed tax revenues as a share of GDP. Banks issuing inflation-linked savings products could hedge their inflation exposure by acquiring inflation-indexed government and corporate debt.

Step 2: if inflation exceeded a certain level, inflation-indexed contracts and financial instruments could be converted into a new currency, let us call it the hard euro (HE). The HE could exist alongside the euro as a virtual parallel currency. The printing of new notes and minting of new coins would not be necessary as euro notes and coins could continue to be used for cash payments. There would be no obligation on the part of the private sector to nominate all contracts in the HE, but both the euro and the HE would have the status of legal tender (allowing residents to make a choice and settle contracts in either of the two currencies).

Step 3: assets and liabilities still existing in euros could be converted into hard euros if so desired by German residents to protect their euro assets from depreciating in HE terms. All *domestic* assets and liabilities could, of course, be exchanged simultaneously from euros into HEs. However, the same would not be possible for balance sheet positions *versus* foreign residents. Consider the case of a domestic entity having only domestic liabilities of 100 euros, but domestic and foreign assets of 50 euros each. Assume that the HE would appreciate by 20 percent against the euro immediately after its introduction. The foreigners would naturally keep their liability denominated in euro. Following the appreciation, the foreign assets of our entity would therefore be worth only 40 HEs. Thus, the entity would suffer a loss from the appreciation of the HE against the euro of 10 HEs, which would show up as negative equity on its balance sheet. Of course, there would probably also be domestic entities with

the opposite balance sheet structure (only domestic assets of 100 euros, but foreign and domestic liabilities of 50 euros each). These entities would gain 10 HEs from the currency switch and appreciation of the HE, again assuming that foreign entities were to keep their claims in euros.

Table 1
Germany's nominal net foreign assets denominated in euros (Q1 2012)

	Nominal net foreign assets (billion euros)
MFIs	– 23.48
Enterprises	407.90
Government	– 1,086.75
Bundesbank	671.70
Total	– 30.63

Source: Deutsche Bundesbank.

For domestic residents, gains and losses from the currency switch could be compensated at zero net cost before administration costs through taxes and tax credits, similar to the compensation of owners of nominal assets by owners of real assets after the switch from Reichsmark to D-Mark at a rate of 10:1 in 1948. For Germany as a whole, just as in the above case of an entity with foreign assets denominated in euros, costs would arise if, after the netting of all individual positions, the country itself was left with net assets denominated in euros that would not be re-denominated into stronger HEs. Let us now consider the case of Germany.

In Germany's national balance sheet only nominal foreign assets and liabilities in euros would remain unaffected by the currency switch. Real foreign liability positions, such as foreign ownership of entire companies, shares in companies, or real estate, would have to be re-denominated into HEs as soon as these entities were to switch from accounting in euros to accounting in HEs. Real foreign assets held by German residents and denominated in euros would, of course, remain in euros.

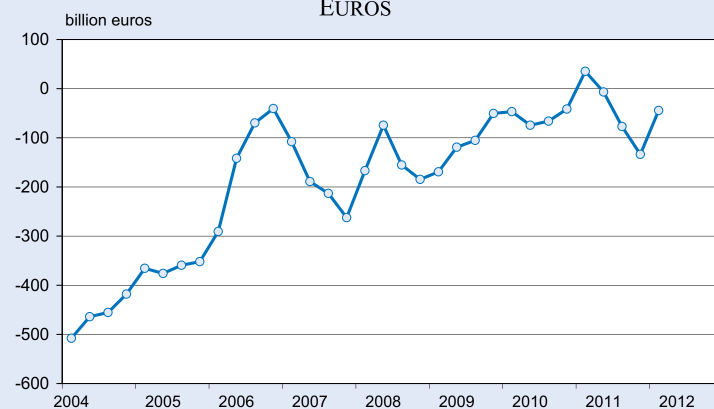
Table 1 shows Germany's nominal net foreign position denominated in euros for the country as a whole and classified by the key sectors. Perhaps surprisingly, Germany has been a net debtor in euros on balance since the introduction of the euro (Figure 1).[3] This is mainly due to sizeable foreign ownership of euro-denominated German government debt that has exceeded German private net ownership of euro-denominated nominal assets. More recently, the rise in the Bundesbank's claim on the ECB in the context of the Target 2 interbank payment system has added to Germany's public foreign assets denominated in euros. However, the effect of this increase on the net position of the public sector was partly offset by increased foreign buying of German government debt, leaving the country as a whole with a small net debtor position in euro-denominated nominal instruments (at least up until the end of Q1 2012).

What would happen to foreign investors?

Many foreign investors have crowded into the German government bond market in the expectation that their holdings will be re-denominated into a new Germany currency should Germany decide to leave the euro. This may perhaps be the case if the euro ceases to exist. However, if the euro continues to exist alongside the HE, the German government could offer German taxpayers income tax credits to compensate them for any losses due to an exchange of

Figure 1

GERMANY'S NOMINAL NET FOREIGN ASSETS DENOMINATED IN EUROS

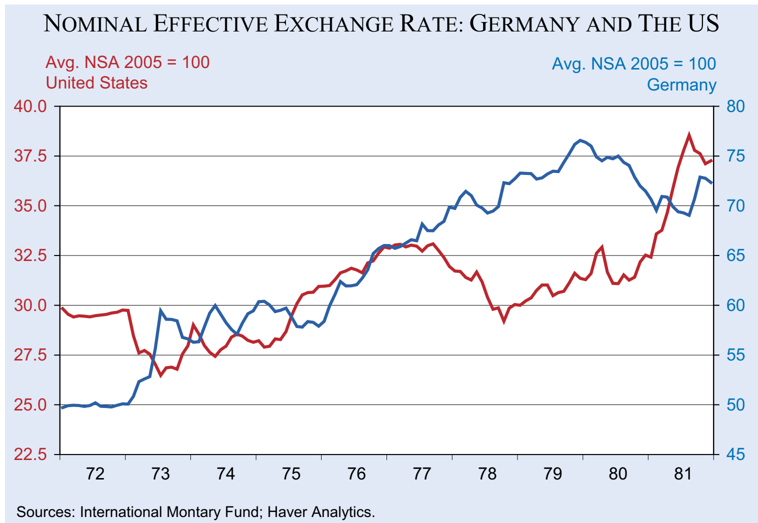


Source: Bundesbank.

[3] The data here differ from those used by Meyer (2012). Meyer does not give a source, but the term he uses (*Euroauslandsnettoforderungen*) suggests that he uses Germany's investment position *versus* euro area countries, and not Germany's position denominated in euros. This would lead to an underestimation of Germany's liabilities in euros, as there are significant euro liabilities towards non-EMU countries.

their holdings of German government bonds from euros into HEs, but elect to leave bonds held by foreigners denominated in euros without any compensation. Since the government would fulfill all contractual obligations stipulated in the covenants of euro-denominated German government bonds and the euro would remain legal tender, it would seem difficult for foreign owners to legally enforce currency conversion. As entities not paying taxes in Germany they would also not be eligible for any German tax credits. There would be no discrimination of foreign investors as the tax compensation would not be tied to nationality, but to taxpayer residence.

Figure 2



Sources: International Montary Fund; Haver Analytics.

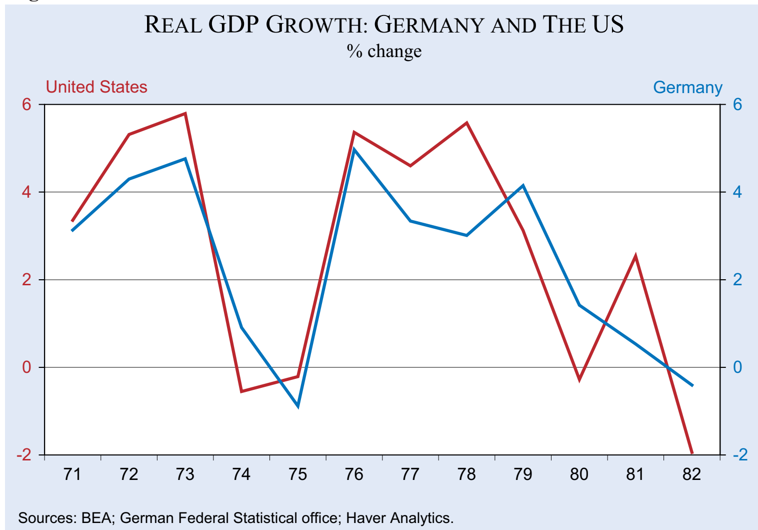
Consequences of a German EMU exit for the real economy

Many observers have argued that the German economy would seriously suffer as a result of the appreciation a new German currency, the hard euro, would experience against the euro. However, both model simulations and historical experience show that the economic consequences of currency appreciation would be manageable.

According to simulations with the OECD's Interlink model, a ten percent euro appreciation would lower German GDP by 1.1 percent from the baseline in the first year. Thereafter, GDP would gradually return to baseline over the following three years and reach 0.3 percent above the baseline in the fifth year (Dalsgaard, Andre and Richardson 2001). Of course, the HE would also appreciate against the currencies of most of Germany's EMU partners, to whom about 40 percent of German exports go. This alone would probably double the effect calculated by the OECD for euro appreciation. Moreover, the HE may rise more, say 20 percent, than the 10 percent assumed in the simulation. Doubling the elasticity and the currency appreciation would raise the GDP loss for Germany to 4.4 percent in the first year. However, as early as in the fifth year, German GDP would climb to 1.2 percent above the baseline. The conclusion from the model simulation is that the costs of appreciation would be severe in the short-term, but quickly fade and turn into a longer-term gain.

Model simulations can, of course, deviate substantially from reality. Therefore it would seem wise to cross-check the above conclusion with historical experience. Figure 2 shows the trade-weighted performance of the D-Mark and the US dollar after the collapse of the Bretton-Woods System of fixed exchange rates in the early 1970s. Between the mid-1970s and the end-1970s the D-Mark appreciated by about 25 percent in nominal trade-weighted terms. During this period the dollar depreciated at first, and then appreciated again to end the decade at a level similar to its mid-1970s level.

Figure 3



Sources: BEA; German Federal Statistical office; Haver Analytics.

Figure 4

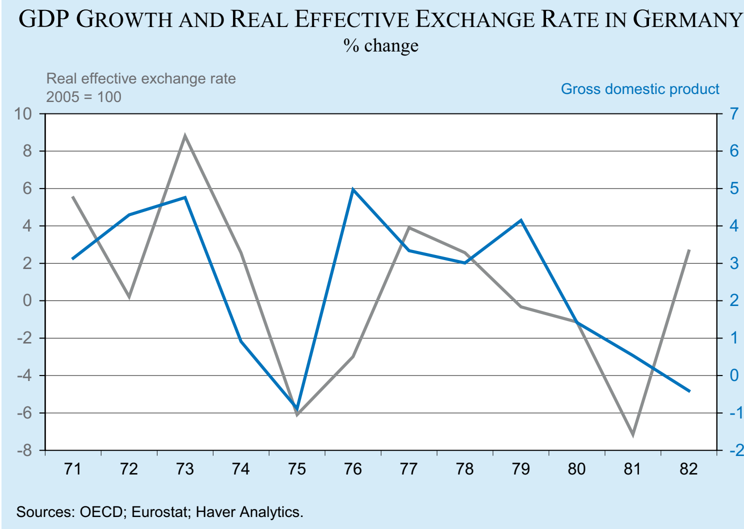


Figure 3 shows the growth performance of both economies during the 1970s. Following the recession of 1975, both economies rebounded strongly. Thereafter, Germany grew only a little less than the United States until the end of the 1970s, despite the sizeable appreciation of the exchange rate. Figure 4 shows German GDP growth together with changes in the real effective exchange rate again during the 1970s. Both variables are positively correlated, contradicting the hypothesis that exchange rate appreciation was a major drag on growth during this period.

Conclusion

The widely held view that Northern European countries are trapped in the EMU because of prohibitive costs of leaving is misguided. There are ways to exit a soft currency, inflation-prone EMU for a country with preferences for low inflation and a strong currency. Such a divorce would naturally be a long-term process and should only take place if all of the ways of preserving the existing EMU intact have been exhausted. However, in the end, an orderly divorce may be preferable to deepening political conflicts over the destination of the EMU. By creating ways for countries that prefer significantly stronger or weaker currencies to step out of the EMU, the political cohesion of Europe may be better served than keeping these countries in the straightjacket of a dysfunctional EMU.

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Public Sector Austerity: Path to Crisis or Path to Recovery?

Maks Tajnikar and
Petra Došenovič Bonča*

Austerity measures are shaping current EU economic policy and lie at the centre of the economic policy debate in many countries, including Slovenia. All such debates are based on the argument that we can deal with the current economic crisis by focusing on balancing public revenues and expenditure by implementing deficit-cutting policies and thereby preventing the growth of public debt. In Slovenia general government expenditure amounted to 50.9 percent of GDP in 2011, while in the same year general government revenues represented just 44.5 percent of GDP. The resulting general government deficit thus amounted to 6.4 percent of GDP in 2011.[1] Although it will probably take until the second half of 2012 for Slovenia's general government debt to exceed 50 percent of GDP, the entire economic policy package that was recently introduced only seeks to eliminate the deficit generated, while neglecting almost all other policy issues. The measures suggested by Slovenia's current government follow the EU's austerity guidelines by attempting to cut general government expenditure while preserving the general government revenues as a share of GDP. To justify these measures the government employs typical European political rhetoric by arguing that future economic growth and increases in employment will be impossible without cutting general government expenditure! Such rhetoric makes the general government sector's cuts an unavoidable necessity and regards what is referred to here as the public sector as a major burden on European business.

This paper discusses why the policy measures in response to the current crisis that are called for by governments in Brussels, Greece, Spain, Portugal, Italy and other countries including Slovenia are setting them on the wrong course.

*University of Ljubljana.
[1] See UMAR (2012), Development Report 2012, Ljubljana.

Public and private sector growth

Let us first turn our attention to the structure of GDP. It is amassed by many different products and services ranging from car window opening mechanisms to customs and border protection services. Services represent up to 75 percent of GDP in some countries and the share of material goods in the structure of GDP in such countries is declining. The services accounted for in GDP are offered either by public providers, organised by the state, or offered by private providers where the former make up what we usually refer to as the general government or the public sector. In Europe, the public sector 'produces' about two-thirds of all services.

The size of the share of GDP created by the public sector depends on economic efficiency. According to (micro)economic theory, the free market and private ownership cannot result in a Pareto-efficient society where no one can be made better off without making at least one individual worse off in cases of imperfect competition and market failures associated with externalities, public goods and information asymmetries. It is precisely these market imperfections that call for the regulatory role of the state and the state or public provision of some products and services, thereby justifying the existence of the public sector. If we keep this basic economic knowledge in mind, we have to regard everything that shapes the GDP of a specific country as its wealth, regardless of whether it is created by the public or the private sector. Furthermore, brushing up on economic fundamentals would remind policymakers that the role of the public sector is not one of acting as a burden on European business, but one of a Pareto-superior way of providing certain products and services.

The structure of GDP in both the sense of the combination of material products and services and products and services by type of provision, i.e. public vs.

private, is determined by the preferences of consumers and the resulting demand. Output in the form of refrigerators and output in the form of nursing services both add to GDP, but their produced amounts have to correspond to the structure of demand. If demand for health care services increases, one cannot regard nurses as an increased burden on the workers producing refrigerators. The only relevant issue to be resolved in such a case is how a society can change the structure of its GDP to adapt to changes in the structure of its population's demand. If Slovenians, for example, demand more health care services because their overall health status declines, then it makes a lot more sense to think about the increased burden of workers involved in the production of refrigerators on health care personnel than *vice versa,* particularly because the given allocation of production factors between different types of production prevents sufficient increases in the supply of health care.

Economic growth is realised through growth in GDP that materialises either through the increased output of nurses providing health care services; or when the output of car exhaust system manufacturers rises. The reverse also applies. GDP declines either when a construction company is forced into bankruptcy or when the Ministry of Health decides to shut a public hospital down. When thinking about the sources of growth it is very important to note that, in developed economies, the share of home appliances in total demand is declining, while the opposite holds true for demand for services like education and health care as today's societies transition towards knowledge societies. It is already becoming evident that for such societies, a lot of effort has to be put into achieving growth by increasing the value of, for example, steel, oil, car or home appliance production. If the obstacles to exploiting such sources of growth are too large either because of the increasing competitiveness of other countries, or due to rising burdens on the environment, developed economies do have an attractive alternative to exploit the growth possibilities offered by the services often linked to the public sector. There are plenty of signs that in the near future modern societies will be able to attain economic growth precisely through the growth of the public sector.

Therefore, those economies currently focussing on implementing austerity measures aimed at shrinking the public sector to cut their general government budget deficits will unfortunately also very likely restrain growth precisely in those economic sectors that are capable of generating GDP growth due to changes in consumers' preferences and their demands. If the growth in health care expenditure is reduced in circumstances where the needs and demand for health services continue to rise, economic growth will not be stimulated by, for example, the increased production of material goods that are becoming less relevant to society's welfare. In these circumstances, public sector austerity cannot translate into anything other than the decline of economic growth.

Public and private spending

Economic growth and employment can only be generated through the increased output of the public sector if the latter is dictated by demand, since consumers determine the structure of GDP through their preferences and incomes. Leon Walras stated that we cannot spend more than we earn; and that we can only earn as much as we spend, which reflects the fact that demand does indeed dictate the structure and value of GDP. This is most evident if we ignore international trade and savings for the sake of simplicity and imagine that we live in a Robinson Crusoe like economy where we purchase our GDP using incomes generated by selling our GDP to ourselves. Therefore, the production of all products and services or the production of a country's private and public sectors reflects a corresponding flow of aggregate (real) income to households, which the latter directly or indirectly spend on consumption and investment goods, and pay taxes on.

The resulting expenditure of the income generated by sale of the created GDP can be either private or collective. In the first case, consumers (households) make individual consumption and spending decisions using their disposable income. In the second case, consumers (households) make spending decisions collectively through governmental organisations or funds, and transfer part of their disposable income to the state. This generates general government revenues. These are the primary, but not the only source of the general government sector's spending or public spending given that the general government can also incur debt for this purpose.

Public spending emerged because, as societies developed, some the family's functions were shifted to the state. The Industrial Revolution brought about this change, most notably as workers were needed en masse for capitalism to prevail. Individuals could only become part of the workforce if they were relieved of

caring for the sick and the elderly, caring for and educating their children, and other traditional roles assumed by healthy and able-bodied family members. Public spending also evolved because, as previously mentioned, the production of some products and services proved more efficient under state or public provision; and such public provision required financial means to ensure production. If we use public spending to finance the output of the public sector, and if the public provision of this output indeed assures more efficient production compared to private sector production, then collective spending is more efficient than private spending. This is what justifies public spending and gives it a legitimate role in any contemporary society.

Unfortunately neither history nor theory proves very helpful in determining the line between private and collective or public spending. In some countries, public spending amounts to nearly 60 percent of GDP, while public spending as a share of GDP in other countries is below 40 percent. Yet it is important to note that differences in the share of public spending between countries are smaller today than in the period following the Second World War.

As the above discussion illustrates, public and private spending are rivals from the GDP perspective, since the value of GDP equals the combined value of public and private spending. However, public and private spending cannot be considered rivals from a customer perspective. Increasing public spending does decrease private spending for a particular consumer. However, public spending does not represent a burden on anyone, as public spending merely acts as a substitute for the loss of private spending. If the public sector indeed provides those services that are produced more efficiently through public provision, then the average individual is made even better off, as his/her final consumption is maximised in this way. Of course, individuals can receive dental care in either a public health centre or private dental clinic. They can pay for the services that they obtained either out of funds generated collectively through, for example, compulsory health insurance; or directly out of their disposable income, i.e. from their own pocket. However, these two types of spending are the only alternatives available to any individual requiring dental care.

The way that produce goods and services are produced and the way that they are funded depend on our choices, which are determined historically and by taking into consideration how our society is organised to maximise its social utility function. Increases in health care spending that, due to budget constraints, require reduced spending on goods such as, for example, cars are a consequence of our deteriorating health and ageing population, and are not caused by a growing and overly extensive public sector. And if a decision is made to pay for health care using collectively accumulated funds (and not through private spending); and to provide for the additional output of health care services through public providers (and not private providers), this decision be taken because collective spending enables the larger consumption of heath care services than private spending and because it maximises social welfare. This implies that, at least theoretically, the upper boundary for public spending is set at 100 percent of GDP and, contrary to concern expressed by politicians in Slovenia, the country's public spending, which totals 50.9 percent of GDP, has not reached its upper boundary.

Public sector output and public spending

The real problem of the Slovenian public sector thus stems from the fact that in 2011 general government expenditure was 50.9 percent of GDP, but general government revenue only amounted to 44.5 percent of GDP. General government revenue represents funds that were collectively accumulated for publically provided services. It is thus a source of funding for public spending. General government expenditure, on the other hand, generates the public sector's income, which is equivalent to the value of the public sector's output. In 2011 in Slovenia, the funds collectively accumulated for publically provided services represented 44.5 percent of GDP, while the public sector's output was 50.9 percent of GDP. To eliminate this gap in the funds accumulated for public spending that enabled the purchase of the public sector's output, the state needed to incur debt totalling 6.4 percent of GDP.

All issues raised by the austerity measures that have been introduced derive from two simple facts. The first is that we transferred an insufficient amount of income to the state so that the state could collectively spend it on the public sector's output. The second is that we also failed to privately spend this insufficient amount of money on services provided by the public sector. These two simple facts led to the need for the state to compensate for insufficient funds for the public sector's output by increasing its indebtedness. These facts demonstrate that the problems char-

acterising the public sector today were not created because Slovenia generated a huge public sector due to a lack of austerity. If a lack of austerity was the true problem, then implementing austerity measures can be considered as the only appropriate response. Yet the real problem lies in the imbalance between the public sector's output and the amount of funds that were collectively accumulated for publically provided services.

Besides the imbalance between the public sector's output and the amount of funds that were collectively accumulated for publically provided services, three other types of imbalances can emerge in any economy. The first such imbalance can be created between savings and investment. The second possible imbalance can emerge in the relationship between household incomes and expenditure. The third type is the imbalance between exports and imports or an imbalance in the current account of the balance of payments. Given that, at the end of the day, a society can always spend only as much as it has earned, an imbalance in one area has to be offset by an imbalance in another area.

This discussion illustrates that anyone who argues in favour of the fiscal rule as the one necessary thing we have to reach a consensus on in order to resolve the current economic crisis is disregarding basic macroeconomics. Even although the fiscal rule does prevent excessive imbalances between the public sector's output and the funds that were collectively accumulated for publically provided services, it does not set any boundaries for other types of imbalances. While the fiscal rule implies that the general government sector no longer incurs debt to assure sufficient funding for publically provided services, this does not rule out the possibility of other sectors creating imbalances, leading to an economic crisis or prolonging the country's crisis-exit process. The imbalance created when investments exceed the savings of the private sector can result in a negative imbalance between exports and imports; and the end result is the same as if the public sector's output were to persistently exceed the amount of funds collectively accumulated for publically provided services – namely increased foreign indebtedness. Whoever fails to understand this also fails to comprehend that in Slovenia the large increases in the private sector's indebtedness in the 2004–2008 period contributed far more to the onset of the crisis than the increased general government indebtedness in the 2009–2011 period.

A general government deficit can be resolved in two ways. One alternative is to reduce the public sector's output from the existing amount of 50.9 percent of GDP to 44.5 percent. The other alternative is to do the opposite, i.e. to increase the collectively accumulated funds from 44.5 to 50.9 percent of GDP. The first alternative implies society's decision to shrink the public sector by lowering the salaries of public employees, reducing the budgets of universities and social security funds, either by closing down or lowering the standards of public hospitals, schools and kindergartens and by eliminating other public programmes. All of these actions represent the measures that constitute today's public sector austerity programmes. The second alternative can be realised by, for example, increasing taxes such as VAT, implementing reasonable reforms of the pension system, introducing real-estate taxes and taxes on various financial transactions and transactions involving the sale of land, privatisation, or improving the efficiency of the tax system and its tax recovery capacity. By introducing some measures such as caps on social contributions, lowering legal entity income taxes and various subsidies that are advocated in Slovenia together with the proposed austerity measures, the general government deficit could further deteriorate or austerity programmes be made more stringent because they are aimed at reducing the 44.5 percent share of collectively accumulated funds for public spending in GDP.

Disregarding political aspects and social welfare concerns, a society can opt for either of the two approaches described above to reducing its general government deficit. Both alternatives can also be combined. However, the paths outlined differ considerably when it comes to economic growth, employment, the incomes of the population and society's living standards and welfare.

Economic growth and public spending

The austerity programme being implemented in Slovenia aims to reduce the public sector's output from 50.9 percent of GDP to 44.5 percent of GDP. Such programmes alter the supply side and the way that GDP is generated. Cuts in the public sector's output enable the reduction or elimination of public debt. However, by reducing public spending as a share of the amount funded by debt, the public sector's output can only amount to 44.5 percent of GDP. Given that there are no reasons for changes (increases) to

any other elements of private spending under such circumstances (to consumption and investment goods, and taxes) including export demand, and given that public and private spending including export demand together equal the value of GDP, this then implies that GDP has to decrease to the value of the reduced effective demand. Reductions in the size of the public sector thus also lower the GDP created and the austerity measures implemented contribute to negative GDP growth rates. The smaller quantities of services that comprise a country's GDP are sold to consumers and, as a consequence, the incomes generated are also lower. These lower incomes thus also lead to less funds being collectively accumulated for publically provided services if tax rates remain unaltered. This implies that, despite the austerity measures implemented, the imbalance between the public sector's output and the amount of funds collectively accumulated for publically provided services would continue to persist while the size of GDP would decline. This discussion illustrates that austerity programmes negatively impact economic growth, decrease employment and do not eliminate the general government budget deficit. The latter would persist even if production were transferred from the public sector to the private sector if the privately-owned providers continued to rely on public spending as their source of income.

It has already been mentioned that, instead of implementing austerity measures to cut the general government budget deficit, Slovenia could opt to increase the value of the funds that are collectively accumulated for publically provided services from the existing 44.5 percent of GDP to 50.9 percent of GDP, which is the value of the output produced by the public sector. Unlike implementing austerity programmes, this alternative alters the demand side by changing the structure of demand and replacing private spending with collective spending. In this case, there is only a reallocation between private and collective spending. Such a reallocation could reduce imports (without impacting exports) and, in this way, the elimination of the general government deficit also implies the elimination of the external imbalance if such an imbalance exists. It is, however, also possible that, along with the elimination of the general government deficit, an imbalance emerges either between investments and savings or in the consumption of goods and services by the household sector if the external imbalance persists. The relevant conclusion in either case is that under such circumstances no element of GDP is affected (domestic output in the form of consumption goods and services for domestic demand, domestic output in the form of investment goods for domestic demand, the public sector's output for domestic demand and domestic output intended for exports). This implies that GDP could remain unaltered.

This also implies that by attempting to increase the 44.5 percent of GDP aggregate spending on the produced products and services that comprise GDP is maintained. Economic growth and employment thus remain unaffected. The same holds true for incomes generated and any resulting spending. On the other hand, the share of funds collected from individuals for the purpose of collective spending increases, thereby reducing the general government deficit. This impact can be achieved by any measure aimed at increasing the 44.5 percent share of incomes reallocated to collective spending in GDP, including a VAT increase.

This paper has shown that replacing private spending with collective spending impacts the structure of demand. The same also applies to the transformation of collective spending to private spending. Given that such a transformation only impacts the structure of demand, it does not decrease the burden on the business sector. The burden on society created by collective spending is simply replaced by the burden created by the need to spend privately, while aggregate spending remains unchanged.

Furthermore, the reallocation between private and collective spending has no influence on the costs of producing GDP. If we accept the statement that increased collective spending poses a heavier burden on any business, then we must also agree with the statement that increased private spending does the same. Both statements reveal an unclear understanding of economics, particularly because costs are not determined by the way in which the incomes of consumers are spent, but by the quantities and prices of inputs used.

Economic growth can thus also be attained through public sector growth, and an expansion of the public sector should not be considered an inferior source of economic growth and employment. Yet this statement warrants caution. Its implications for growth are not the same for an economy with underutilised production capacities and an economy characterised by near-full capacity utilisation.

In the first case, any increase in demand, regardless of whether it is generated by private or collective spend-

ing, leads to economic growth because production can increase due to better utilisation of capacities. The latter reduces average fixed production costs and improves the economy's competitiveness, thereby further stimulating economic growth either through increased exports or the increased incomes of domestic household and business consumers. The increased consumption of households, larger investments, higher state expenditure and strengthened exports all drive economic growth, stimulate employment and improve a society's welfare because better capacity utilisation implies increased productivity and improved efficiency. Public or collective spending can contribute to economic growth quite significantly and consumers usually regard the public sector's output as valuable and necessary. Smaller marketing efforts are thus needed to convince consumers to demand such services compared to goods such as a new and improved model of some kitchen appliance or car.

The story differs somewhat if an economy is faced with full capacity utilisation. Under such circumstances, additional capacities are required and investments take on a central role as they create new capacities. Investments can be either private, i.e. made by households or the business sector, or collective, i.e. executed by the state. The only important thing is that these investments are actually realised, because otherwise increased demand results in inflation, not a larger GDP. Even if an economy does not have the possibility to grow by increasing its capacity utilisation rates, it can still grow through increased collective spending, but the latter has to comprise of investments.

The public sector and efficiency

Economic growth is not a sufficient precondition for improving a society's welfare. Stronger demand, higher GDP and increased employment do not automatically translate into improved welfare or strengthen a country's competitiveness. This highlights another important question, namely what is the relationship between a euro spent on production factors and the resulting output. This question is equally important if GDP is generated through the provision of nursing services or the supply of car window opening mechanisms. When a supplier sells its products or services it generates revenues that can subsequently be used to purchase inputs that are in turn used to produce additional goods that make up a country's GDP. This input-output relationship depends on productivity and efficiency. Productivity and efficiency help create the added value that makes an economy more or less competitive and a society richer or poorer. It is important to note that the added value of providing services is usually high. This is why it is no exaggeration to state that those economies that will lead in developing their public sector will also be the most prosperous.

If the austerity programmes aimed at reducing the public sector are viewed in this light, it becomes fairly obvious that they not only hinder future economic growth, but also lower a country's productivity, efficiency and international competitiveness. After taking this discussion into account, it becomes needless to say that the debated austerity measures and the negative attitudes to the public sector are setting European countries on the wrong course for exiting the crisis.

The Role of the State in the Financial System

Andreas Dombret*

Of scientists and drivers

Ladies and Gentlemen,

Please let me welcome you to tonight's conference dinner. Having discussed complex issues all day, you now really deserve the opportunity to socialise with one another. But before you do so, and before we start enjoying our dinner, please let me tell you a short anecdote:

In 1919, the physicist Max Planck was awarded the Nobel Prize for his work on the quantum theory. As a consequence, he toured Germany, having to give countless speeches about quantum physics. It is said that he complained about these many talks to his driver. The driver therefore suggested: "by now, I have heard your talk so often that I can give it myself. Why don't we change places? I'll pretend to be the physicist and give the talk while you pretend to be the driver". Next time, the driver gave the talk – and his performance was quite convincing – while Planck sat in the audience. All went well until someone from the audience posed a question. Naturally, the driver was unable to answer it. But instead of admitting this, he replied: "your question seems ridiculously easy to me. I believe, even my driver can answer your question". And his 'chauffeur' did so.

Please, do not misunderstand me: considering the first-class participants list of this conference and the high quality of the papers selected, I am convinced that the academics at this conference will speak with the authority of people who absolutely know their trade. I have no doubt whatsoever on this score. However, I have to admit that when following the discussion in the media about the European debt crisis it is sometimes hard to separate the 'drivers' from the real academics. I get the impression that everyone has an opinion on these topics – and that everyone has stated that opinion at least once.

Take, for instance, the discussion about a banking union in Europe. This topic has stirred – quite understandably, I may add – quite some unrest in the German economic community. Petitions were launched, and provocative counter-petitions were issued, in some cases endorsed by some of the exact same academics. This seems striking, given that they were signed by well-respected academics. However, these petitions are perhaps not as incompatible as it might appear. Obviously, one comes to different conclusions if the reasoning is based on different assumptions. And the different assumptions stem from the various interpretations of the results of the European summit in June 2012.

The core statements of the petitions about the banking union are not disputed. For me, these core statements are: "there should not be unconditional collective accountability for the debts in the euro area" and "banking supervision in Europe needs to be harmonised and improved". And although not everybody may agree with the style and details of the different petitions, most people probably concur with these two main messages. I, for my part, concur with both statements. Both messages are related to a question which is central in economics – and which is also a topic for our conference: what role should we assign to the state? And what role should markets play?

The role of the state

Ten or even five years ago, the opinion in the academic world was relatively unanimous with respect to the role of the state in the banking sector: the state and regulators were seen as an obstacle to economic growth, and state-owned banks were perceived as the flotsam and jetsam of free market economies. "Let the market deal with the issues of the financial sector, and capital and risks will be efficiently allocated", most academics argued. A saying attributed to the

* Deutsche Bundesbank. Dinner Speech at the ifo/CESifo/Bundesbank Conference held in Munich on 14–15 September 2012.

well-respected former Bavarian Prime Minister Franz-Josef Strauss comes to mind: “a dog is more likely to put away a sausage for a rainy day than the state is to save money”.

Then came the financial crisis. The distrust in the state among mainstream academics has remained. However, there is now distrust in markets as well, perhaps surpassing distrust in the state. In the academic community and the media, there has been a debate about excessive bonuses for bankers, about distorted incentives for risk-taking in banks and, last but not least, about the role of rating agencies. To my mind, the crisis has shown that, like it or not, the state is needed as the ultimate guarantor of systemically important functions of the banking sector. In a systemic crisis, deposit insurance schemes can succeed only if the state, and thus the taxpayer, credibly guarantees the liabilities, as illustrated, for example, by the TV appearance by Chancellor Merkel and Finance Minister Steinbrück in 2008, in which they guaranteed all banking deposits in Germany. At that time there were fears of a self-fulfilling run on private deposits – clearly a case of market failure – which were discussed at length in economic literature. So there was a good reason for government to step in. The government also had the power to impose restrictions on the banks’ actions, if necessary. And the unity of liability and control represents an important condition to limit the moral hazard implications of such a guarantee.

Another example is the international discussion on large banks. Due to their systemic importance and interconnectedness, no state can afford to let them descend into disorderly default. Therefore, resolution regimes are currently being discussed by international fora, so that, in principle, also large banks can exit the market without causing systemic disruptions. In this respect, i.e. by establishing a clear framework to limit financial stability risks, I believe the state has its role. This is exactly where regulation comes in: an appropriate, internationally harmonised regulation and resolution schemes endeavour to ensure that ‘too-big-to-fail’ banks do not abuse their status.

There are some parallels between these considerations and the challenges of the debt crisis. Nowadays, views such as: “markets help to discipline fiscal policies, which is what we urgently need to resolve the crisis” do not seem to be very popular. However, popular or not, what matters is whether or not this statement is true. It may well not be true all the time. However, to me there seems to be more truth in this view than in many so-called ‘solutions’ implying ever-increasing unconditional financial ‘assistance’. Many of these proposals ignore moral hazard implications and might therefore simply postpone solutions. They might even increase the problems they are meant to tackle in the long run. Financial assistance is necessary to buy time – nothing more and nothing less. It cannot be a long-term solution. Such a long-term solution can only be achieved through fiscal consolidation and structural reforms.

As with banks, we cannot ignore or deny the systemic importance of certain countries within the euro area. And in the same manner, it is vital to ensure that politicians cannot use this status to delay necessary steps simply because these steps are unpopular. To reach an appropriate assessment, it is also essential to know whether we are currently still in a situation in which markets can successfully exercise their disciplinary powers – or whether we already have moved to a full-blown systemic crisis in which the threat of self-fulfilling downward spirals calls for massive intervention. But even if this were the case – and let me make this very clear – it would be up to democratically elected governments, and not up to central banks, to take the necessary action. Central banks can give advice – but only governments have the authority, conferred by their democratic legitimacy, to make changes to regulatory systems.

Energy and Climate News

Marc Gronwald and Jana Lippelt*

Reserve-to-production ratio

How long will resources last? The Reserve-to-Production (R/P) ratio provides information on how long exhaustible reserves will last at current production rates. It is based on the reserves of a resource, i.e. the amount that can be produced under given technical and economic conditions.

There are some striking changes compared to the situation 3 years ago. The R/P ratio of both Libya and Canada, for instance, increased considerably – in both cases it now is greater than 100 years (see BP 2012). The causes of these developments, however, are entirely different from one to another. In the case of Libya, the main reason is the oil production collapse in the aftermath of the revolution. In Canada, however, this increase is based on an increase in the reserves that is related to the inclusion of oil sands. The development of the R/P ratio for coal in Germany is similar: lignite reserves grew significantly. According to BP (2012), oil production in Saudi Arabia, the United Arab Emirates and Qatar reached record levels in 2011. However, this affected the R/P ratios of these countries only marginally and is not reflected in the map (see Figure 2). These considerations show that the R/P ratio is a measure that generally provides some information on how long resources will last. Both the reserves themselves and current production, however, depend on various factors. A careful interpretation of this measure should take this into account.

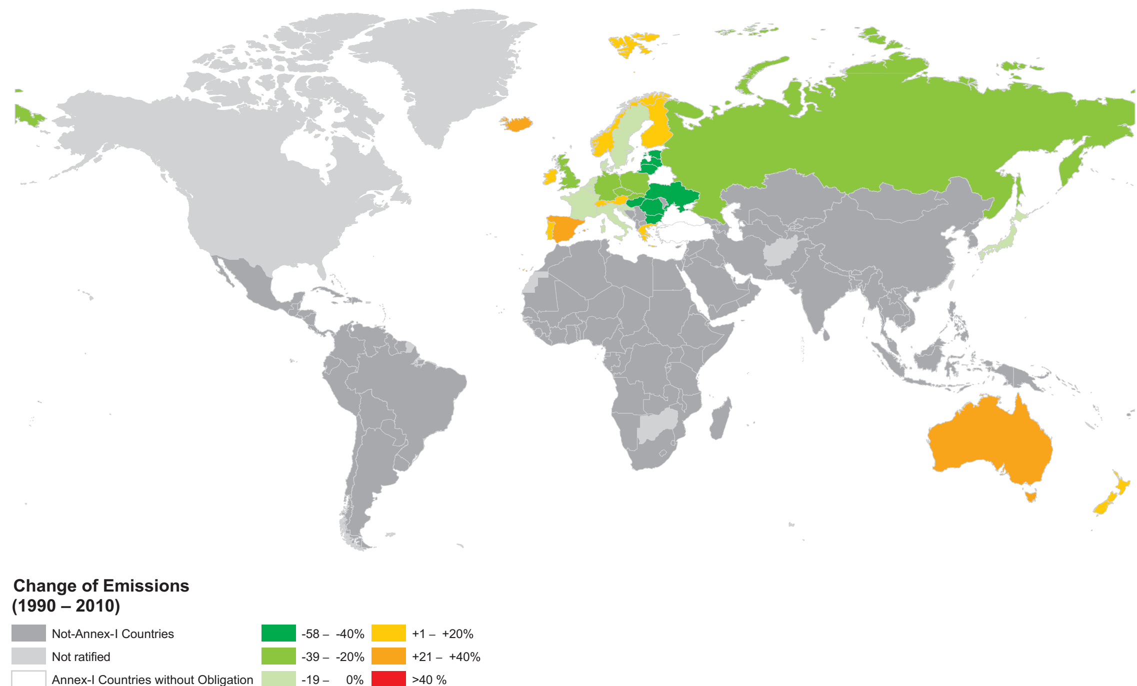
Worldwide CO_2-reduction

2012 is an important year for climate protection: both the first commitment period of the Kyoto protocol and

* Ifo Institute.

Figure 1

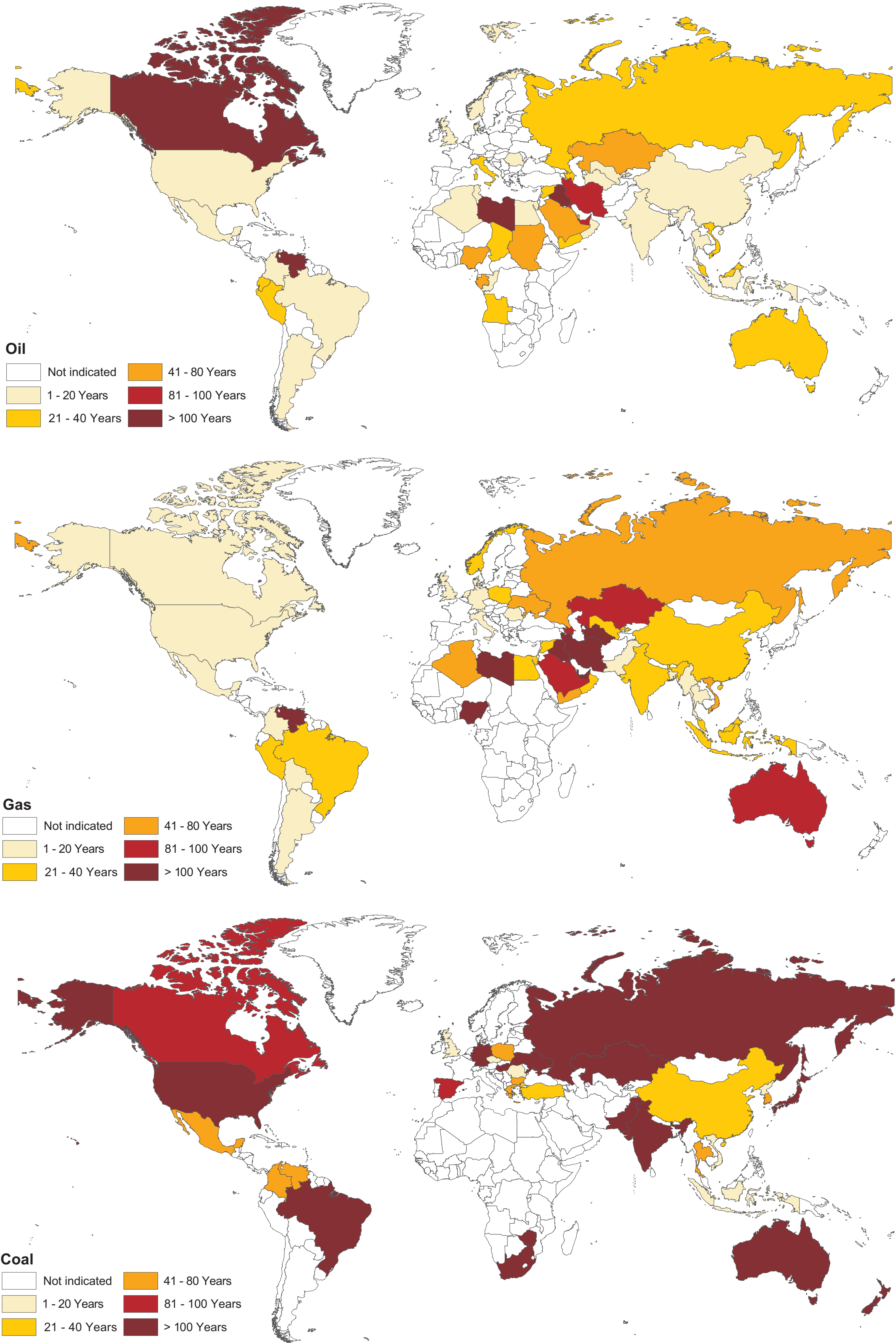
Reduction of Greenhouse Gases under the Kyoto-Protocol



Source: UNFCCC database.

Figure 2

RESERVE-TO-PRODUCTION RATIO 2011



Source: BP (2012).

the second trading period of the European Union Emission Trading Scheme (EU ETS) are due to end in December 2012. Since the beginning of January the aviation industry has been covered by the EU ETS (see BMU 2011). Moreover, the one-billionth certified emission reduction (CER) was issued to a project at a manufacturing plant in India that switched its fuel source from coal and oil to locally gathered biomass in September (see UNEP 2012).

By 2012 the EU member states will have exceeded their emissions reduction targets set out in the 1997 Kyoto protocol by 8.8 percent. Compared to 1990, overall greenhouse gas emissions in the EU27 have decreased by about 18 percent, which is 10 percent higher than the figure agreed (see European Commission 2012). Unlike 2008, additional countries have also reached their reduction targets, including Belgium, Portugal and Ireland. Other countries are also close to reaching these goals, either through their own reductions or thanks to their purchase of emission certificates (Luxembourg, the Netherlands and Spain). Figure 1 shows that, other than in 2008, no Kyoto-country emitted 40 percent of greenhouse gases compared to the base year of 1990.

In the wake of the climate conference in Durban 2011, however, Canada resigned from the Kyoto Protocol and had little chance of meeting its targets. Moreover, Japan, New Zealand and Russia are opposed to continuing the Kyoto Protocol and will not sign the protocol in the future. Alarmingly, global CO_2 emissions also increased by 51 percent between 1990 and 2011, and soared by 286 percent and 198 percent in China and India respectively (see Joint Research Centre 2012).

During the climate conference in Durban a new binding global framework for all countries was concluded, which is not due to come into force until 2020. In addition to the developed countries, this framework should also include emerging and developing countries. Furthermore, a second EU-wide commitment period starting in 2013 has been agreed upon, which will (in addition to the EU27 countries) also include Croatia and Iceland (see European Commission 2012). Besides electricity and heat production, the largest emitters include road transport and the cement industry. Emissions from road transport have increased by 16 percent in recent years (20 percent in the EU27). In order to achieve the targets set for the future, it will also be necessary to achieve reductions in non-EU ETS sectors, e.g. waste management, agriculture and the construction sector. The most recent climate conference in Doha, however, only achieved a minimal degree of consensus.

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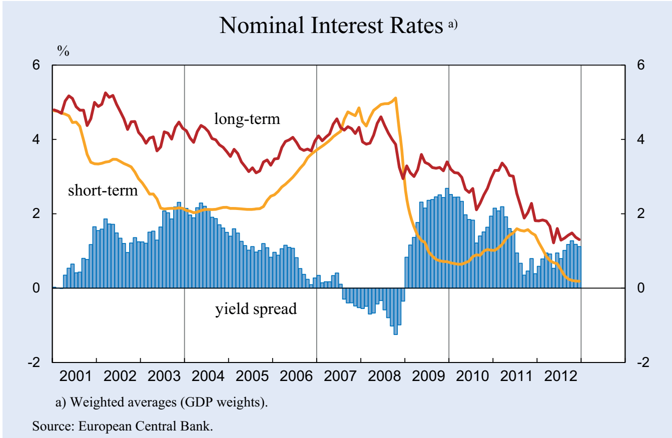
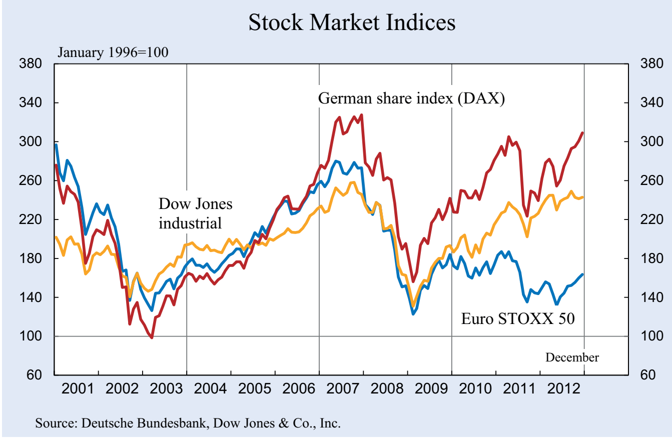
Financial conditions in the euro area



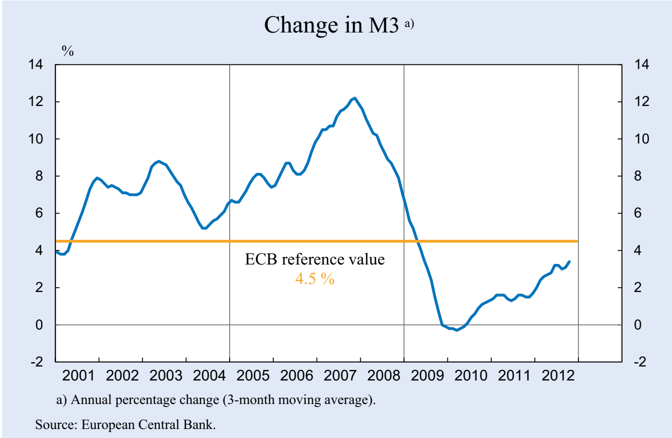
a) Weighted averages (GDP weights).
Source: European Central Bank.

In the three-month period from October to December 2012 short-term interest rates decreased. The three-month EURIBOR rate declined from an average 0.21% in October 2012 to 0.19% in December 2012. The ten-year bond yields also decreased from 1.49% to 1.31% in the same period of time. Furthermore the yield spread declined from 1.28% in October 2012 to 1.12% in December 2012.



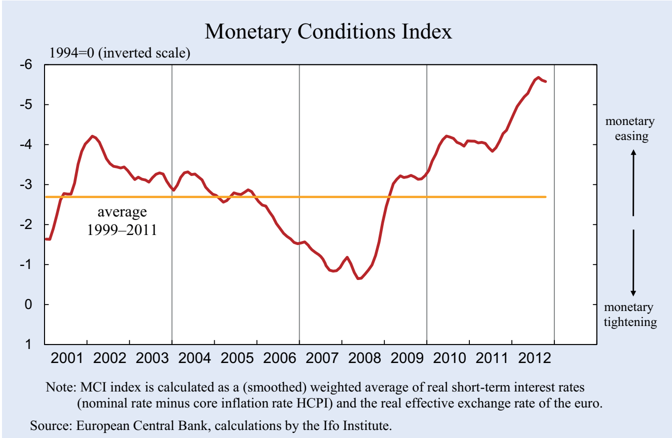
Source: Deutsche Bundesbank, Dow Jones & Co., Inc.

The German stock index DAX increased in December 2012, averaging 7,612 points compared to 7,406 points in November 2012. The Euro STOXX also grew from 2,575 to 2,636 in the same period of time. Moreover, the Dow Jones International increased, averaging 13,104 points in December 2012 compared to 13,026 points in November 2012.



a) Annual percentage change (3-month moving average).
Source: European Central Bank.

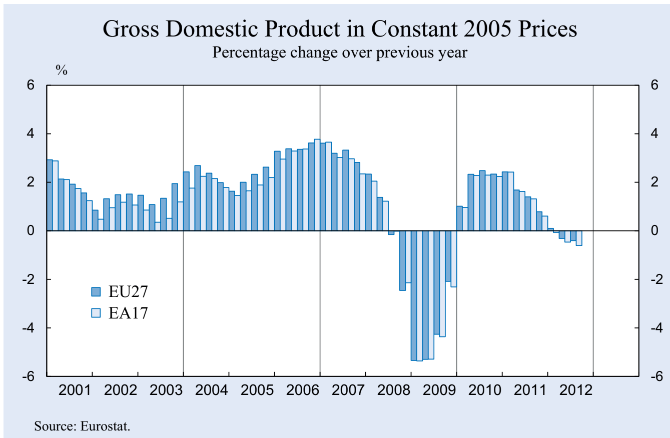
The annual growth rate of M3 decreased to 3.8% in November 2012, compared to 3.9% in October. The three-month average of the annual growth rate of M3 over the period from September 2012 to November 2012 increased to 3.4%, from 3.1% in the period from August 2012 to October 2012.



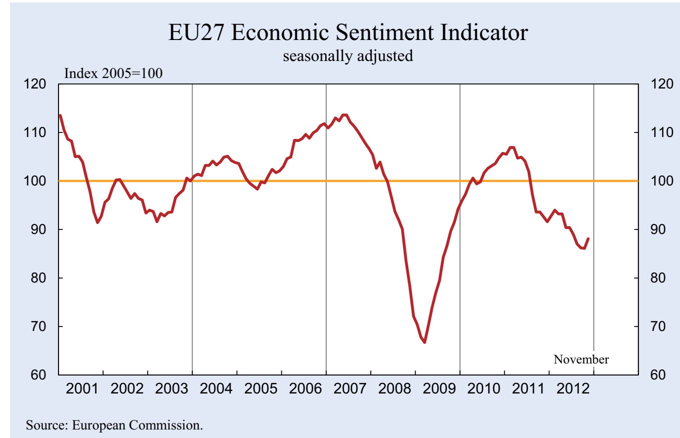
Note: MCI index is calculated as a (smoothed) weighted average of real short-term interest rates (nominal rate minus core inflation rate HCPI) and the real effective exchange rate of the euro.
Source: European Central Bank, calculations by the Ifo Institute.

Between April 2010 and July 2011 the monetary conditions index remained rather stable. This index then continued its fast upward trend since August 2011 and reached its peak in July 2012, signalling greater monetary easing. In particular, this was the result of decreasing real short-term interest rates. In October 2012 the index continued its downward trend, initiated in August 2012.

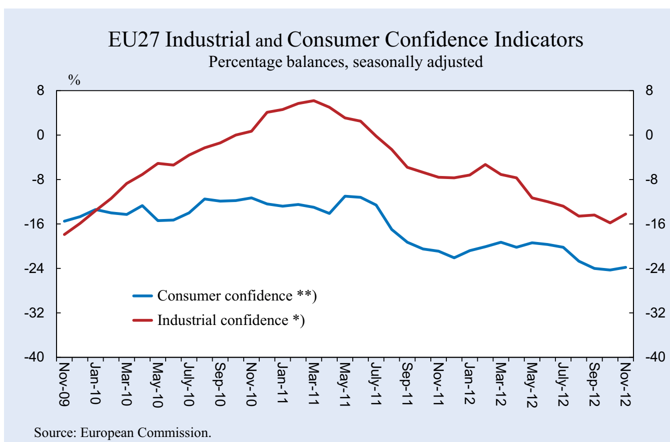
EU SURVEY RESULTS



According to the second Eurostat estimates, GDP decreased by 0.1% in the euro area (EA17) and increased by 0.1% in the EU27 during the third quarter of 2012, compared to the previous quarter. In the second quarter of 2012 the growth rates were – 0.2% in both zones. Compared to the third quarter of 2011, i.e. year over year, seasonally adjusted GDP decreased by 0.6% in the euro area and by 0.4% in the EU27.



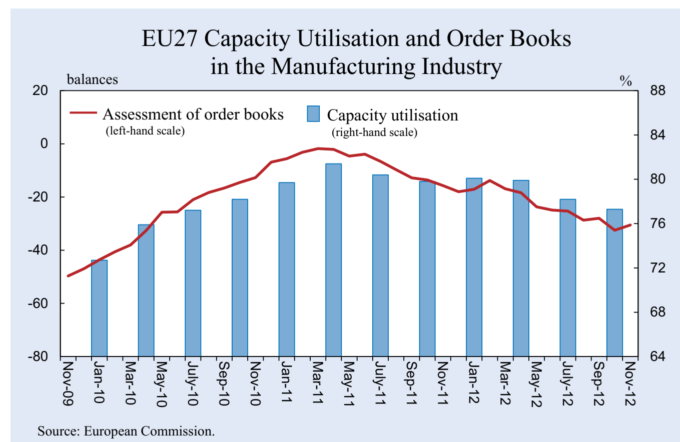
In November 2012 the Economic Sentiment Indicator (ESI) increased by 2.0 points in the EU27, to 88.1, and by 1.4 points in the euro area (EA17), to 85.7. In both the EU27 and the euro area the ESI stands below its long-term average.



* The industrial confidence indicator is an average of responses (balances) to the questions on production expectations, order-books and stocks (the latter with inverted sign).

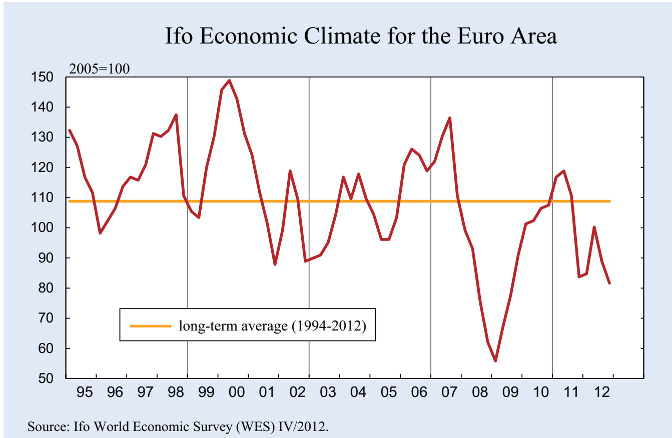
** New consumer confidence indicators, calculated as an arithmetic average of the following questions: financial and general economic situation (over the next 12 months), unemployment expectations (over the next 12 months) and savings (over the next 12 months). Seasonally adjusted data.

In November 2012, the *industrial confidence indicator* significantly increased by 1.6 in the EU27 and by 3.2 in the euro area. The *consumer confidence indicator* improved in the EU27 by 0.5 but dropped in the euro area by 1.2.

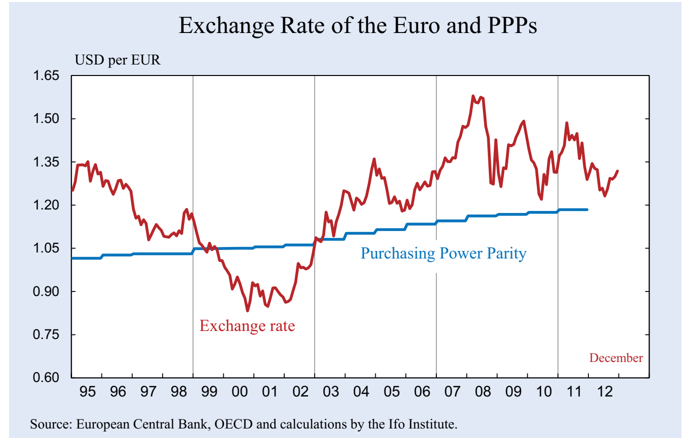


Managers' assessment of *order books* worsened from – 28.0 in September to – 30.5 in November 2012. In August 2012 the indicator had reached – 28.7. *Capacity utilisation* also decreased to 77.3 in the fourth quarter of 2012, from 78.2 in the previous quarter.

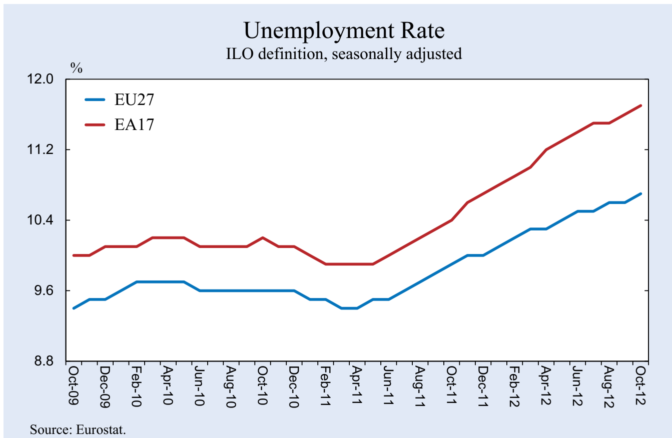
EURO AREA INDICATORS



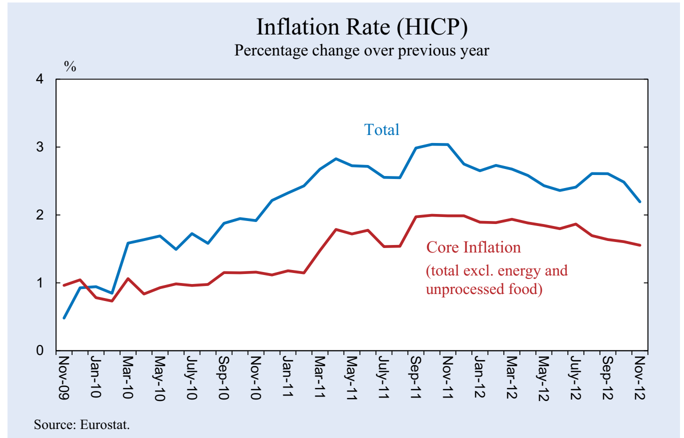
The Ifo Economic Climate Indicator for the euro area (EA17) continued to fall in the fourth quarter of 2012. While assessments of the current economic situation deteriorated only slightly, the six-month economic outlook was significantly more negative. There are no signs of an economic recovery on the horizon yet.



The exchange rate of the euro against the US dollar averaged approximately 1.30 $/€ between October and December 2012. (In September 2012 the rate had amounted to around 1.29 $/€.)



Euro area (EA17) unemployment (seasonally adjusted) amounted to 11.7% in October 2012, up from 11.6% in September. EU27 unemployment stood at 10.7% in October 2012, up from 10.6 in September. In both zones, rates have risen markedly compared to October 2011, when they were 10.4% and 9.9%, respectively. In October 2012 the lowest unemployment rate was registered in Austria (4.3%), Luxembourg (5.1%), Germany (5.4%) and the Netherlands (5.5%), while the rate was highest in Spain (26.2%).



Euro area annual inflation (HICP) was 2.2% in November 2012, down from 2.5% in October. A year earlier the rate had amounted to 3.0%. The EU27 annual inflation rate reached 2.4% in November 2012, down from 2.6% in October. A year earlier the rate had been 3.3%. An EU-wide HICP comparison shows that in November 2012 the lowest annual rates were observed in Greece (0.4%), Sweden (0.8%) and Cyprus (1.4%), and the highest rates in Hungary (5.3%), Estonia (4.3%) and Poland (3.9%). Year-on-year EA17 core inflation (excluding energy and unprocessed foods) decreased to 1.55% in November 2012, from 1.64% in September.

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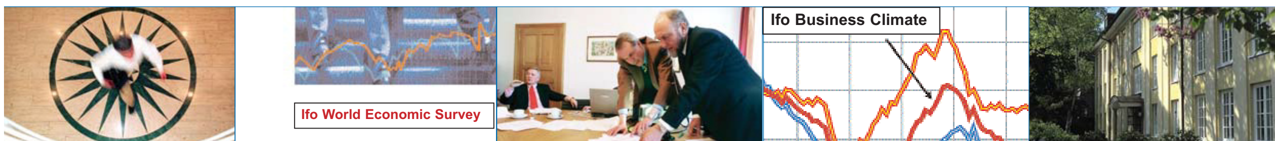

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Ifo World Economic Survey

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Business Surveys Division/WES
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