

IMF STAFF DISCUSSION NOTE

Toward a Fiscal Union for the Euro Area

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EXECUTIVE SUMMARY

The crisis has exposed a critical gap in EMU: the capacity for country-level shocks, whether exogenous or home-grown, to spread across the euro area, calling into question the viability of the common currency. This paper explores the role that deeper fiscal integration can play in correcting architectural weaknesses in the system, reducing the incidence and severity of *future* crises and lending long-term credibility to the crisis measures in train. The Europeans have already taken important measures to improve economic and fiscal governance and steps to further fiscal integration have been proposed (Box 1). Country-level adjustment, euro area wide support via the ESM/EFSF and the OMT backstop, and progress toward a banking union are also substantial achievements, notwithstanding the fact that cross-border fiscal oversight and transfers raise difficult political issues. Going forward, the argument is that a clearer ex ante approach to fiscal discipline and transfers will further strengthen the architecture of EMU, ensuring the stability of the euro area. This paper complements a companion paper that investigates the role of a banking union for the euro area (IMF, 2013a).

What gaps has the crisis exposed? At its inception, it was thought that the euro area would at most face moderate country-specific shocks, made rare by a common commitment to fiscal soundness. In fact, not only have there been larger and more frequent idiosyncratic shocks but also more idiosyncratic policies. For instance, many countries did not build sufficient fiscal buffers in good times. Moreover, spillovers from idiosyncratic policies were not sufficiently taken into account. Worse, the coupling of domestic fiscal and banking risks, together with extensive financial linkages across countries, turned country-specific shocks into systemic ones, as there were no existing mechanisms to deal with such shocks.

How can greater fiscal integration address these gaps? Although the first step to dealing with country-level fiscal problems must be larger national fiscal buffers, the size of shocks and their capacity to freeze up markets suggest a role for a *zone-wide* insurance mechanism. Fiscal integration can be that mechanism, providing an ex ante framework for enforced fiscal discipline and temporary transfers—and hence for more certainty that shocks will be contained. Far from diluting market discipline, insurance with strict ex ante rules could be an improvement over the current situation, where the credibility of the no bailout clause has been undermined by ad hoc responses to systemic stress. Yet, even if market discipline could be an important complementary element to prevent future crises, it will take time to establish its role in tranquil times. In the interim, fiscal union will also mean stronger enforcement powers by the center.

What are the minimal elements of a fiscal union that would make a future crisis less severe? The ultimate scope and shape of the fiscal union will remain a matter of social and political preferences. But to address the gaps identified above, four elements seem essential: (i) better oversight and stronger incentives for sound national fiscal policies to build buffers and ensure common concerns are addressed; (ii) subject to better oversight and stronger incentives, some system of temporary transfers or joint provision of common public goods or services (e.g., organized by a centralized budget) to increase fiscal risk sharing, (iii) credible pan-euro area backstops for the banking sector to help break the sovereign-banking loop in the financial system, and (iv) some form of common borrowing (backed by common revenue) to finance better risk sharing and stronger backstops, and to reduce the potential for large portfolio shifts between sovereigns by providing a safe asset.

What are the pros and cons of further fiscal integration? With these elements in place, future crises would be made less frequent, less severe and less prone to systemic spillovers. A shared approach with some elements of centralized fiscal policy would also reduce the risks of idiosyncratic national policies, expand the scope of available counter-cyclical tools, and allow for better fiscal coordination, subject to appropriate governance safeguards. Yet, there are political costs from ceding some national sovereignty over budgets. And there is always the risk that imprudent national policies are not reined in if centralized fiscal oversight proves ineffective, putting a premium on strengthening enforcement provisions prior to any further steps to increase risk sharing.

Would fiscal integration be a zero sum proposition? With appropriate safeguards, the answer is unambiguously no. It is sometimes assumed that financial costs would systematically fall on those countries with a stronger tradition of fiscal prudence. But ex ante risk sharing only means that, at any point in time, countries experiencing better cyclical conditions support those at the other end of the spectrum; it does not mean the same country is always on the giving or receiving end. Our analysis shows that, with a risk-sharing mechanism in place over a sufficiently long period, all current euro area members would have benefited from transfers at some point in time.

What are the priorities right now? Deeper fiscal integration would cement a more stable monetary union in the long term. However, one element is time sensitive: the euro area single supervisory mechanism currently being established should quickly be complemented by a firm and early commitment to establish a single resolution framework with an adequate backstop to anchor confidence in the banking system. Meanwhile, the momentum for longer-term reforms needs to be maintained. Historical experience with fiscal integration shows that effective crisis management often goes hand in hand with far-reaching long-term reforms, including introducing stronger central oversight.

What will be the remaining challenges inherited from this crisis? The proposals here are for future crises. They will not address the existing debt overhang. On the one hand, relying entirely on country-adjustment could trigger debt-deflation dynamics in the periphery, dragging the entire region into a period of prolonged stagnation. On the other hand, mutualization of existing debt would be akin to selling insurance after the fact and could reduce incentives to restore competitiveness and fiscal sustainability. Because of these important tradeoffs, dealing with the debt overhang will remain a delicate issue.

CONTEXT

1. **Euro area crisis.** The crisis has revealed critical gaps in the functioning of the monetary union. It has shown how sovereigns can be priced out of the market, or lose market access altogether, and how private borrowing costs can differ widely within the union, despite a common monetary policy. It has also highlighted how contagion can set in, with deep recessions in some member states spilling over to the rest of the membership.
2. **Architectural reform agenda.** Addressing gaps in EMU architecture could help prevent crises of such magnitude in the future, while supporting current crisis resolution efforts. To that effect, fiscal and economic governance has been strengthened, including through the “Six-Pack” legislation, “Two-Pack” regulation and the Fiscal Compact. In addition, Euro area leaders, at their June 2012 summit, asked both the European Commission (EC) and the President of the Council to issue proposals “to develop a specific and time-bound roadmap toward a genuine Economic and Monetary Union”, including greater fiscal integration, so as to ensure the irreversibility of the Economic and Monetary Union (EMU) (Box 1).² The idea of deeper fiscal integration for Europe is not a new concept: it was already developed in the 1970s in the famous MacDougall report (EC, 1977).
3. **Views.** Yet, political backing for a clear roadmap remains elusive, with views on the contours of a fiscal union differing widely among euro area members.³ Some argue in favor of greater solidarity between member states, while others point to the need to strengthen national fiscal policies as a first priority to prevent further stress. There is also a concern that any debt mutualization would lead to moral hazard, sapping members’ motivation to undertake prudent domestic policies in the future.
4. **Scope.** As a contribution to this ongoing debate, this paper and two companion background notes outline a conceptual framework to assess the case for further fiscal integration for the euro area and present new empirical analysis on the level of risk sharing at play in the euro area. To do so, this paper analyses the critical gaps in EMU architecture exposed by the crisis, derives from that the minimal elements of a fiscal union to address them, and discusses the immediate priorities in the current crisis context. The companion notes elaborate on the rationale for fiscal risk sharing and the institutional arrangements underpinning fiscal unions in international experience.

² The terms EMU and euro area are used synonymously throughout—even though, in legal terms, EMU refers to the economic and monetary union chapter in the EU Treaty, which applies to all EU members, albeit to a different extent. In practice, not all EU members have introduced the euro as their legal tender, in accordance with the procedures laid down in the EU treaties.

³ The scope of a fiscal union can vary significantly. For the purpose of this study, we consider fiscal union as a set of fiscal rules and arrangements, including possibly cross-country transfers, commonly agreed by euro area member states to deepen fiscal integration.

Box 1. European Actions and Proposals for Furthering Fiscal Integration and Governance

Actions so far. European policymakers have taken important steps to strengthen economic and fiscal governance. The Six-Pack went into force in December 2011; the Fiscal Compact, agreed upon in December 2012, has been ratified by 15 euro area member states; and the Two-Pack regulation, approved by the European Parliament in March 2013, should apply to the 2014 budgeting period.

Roadmap going forward. The European Commission and the President of the Council, in close collaboration with the Presidents of the European Commission, the Eurogroup and the ECB, both issued their proposals for a roadmap toward fiscal integration at the end of 2012, responding to a request from European leaders at their June 2012 summit. The proposals have in common that they spell out different stages of action, depending on the legal requirements to implement them.

The European Commission's blueprint.

- *Short term* (next 18 months, actions within the current Treaty framework): full implementation of the governance reforms in train (European Semester, Six-pack, and Two-pack); single resolution mechanism for the banking union funded by the industry; creation of a "Convergence and Competitiveness Instrument" to promote ex ante coordination of major structural reforms.
- *Medium term* (18 months to 5 years, actions requiring Treaty changes): Stronger control on national budgets, including a right from the center to request changes in national fiscal decisions; a central fiscal capacity with dedicated resources; borrowing under joint and several liabilities, namely a European Redemption Fund to coordinate the reduction in public debt and Eurobills to foster the integration of financial markets.

The President of the Council's report.

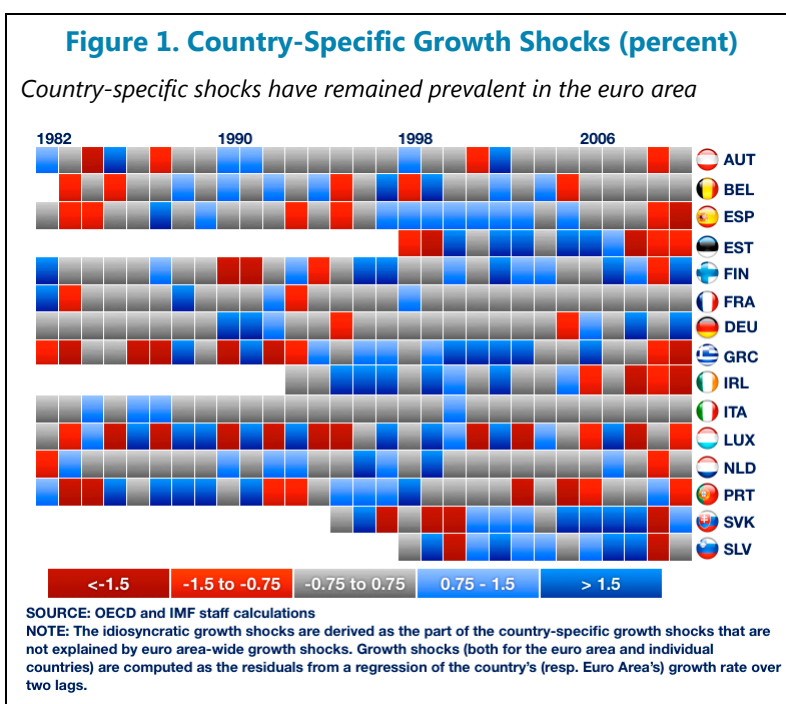
- *Stage 1* (end-2012 and 2013): completion of a stronger framework for fiscal governance (Six-pack, Fiscal Compact, Two-pack); agreement on the harmonization of national resolution and deposit guarantee frameworks with funding from the industry; setting-up of the operational framework for direct bank recapitalization through the ESM.
- *Stage 2 (2013-2014)*: completion of integrated financial framework with a common resolution authority and an appropriate backstop; setting up of a mechanism to coordinate structural policies through contractual arrangements with potentially temporary financial support.
- *Stage 3 (post 2014)*: establish a well-defined and limited fiscal capacity to improve shock absorption capacities, through an insurance system set up at the central level, with built-in incentives for countries participating to continue to pursue sound fiscal and structural policies.

Next steps. European leaders have tasked the President of the Council to present a new report in mid-2013 focused on the short-term actions proposed in his earlier report and the EC blueprint. The new governance framework will need to be implemented rigorously, with strong enforcement by the center.

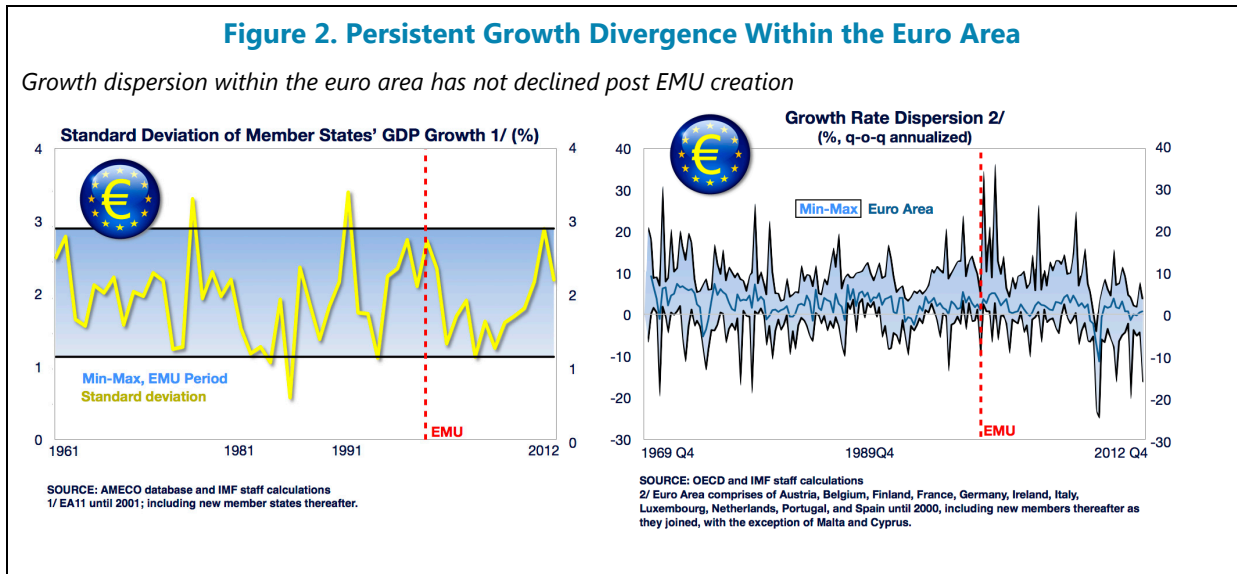
WHAT CRITICAL GAPS HAS THE CRISIS EXPOSED?

While country-specific shocks have remained more prevalent than initially expected, the high degree of trade and, even more importantly, financial integration has created the potential for substantial spillovers. Furthermore, weak fiscal governance and the absence of effective market discipline have compounded these problems. Finally, sovereign and bank stresses have moved together, setting off a vicious circle with markets starting to price in both bank and sovereign default.

5. Large country-specific shocks. While it was recognized that countries joining the euro area had significant structural differences, the launch of the common currency was expected to create the conditions for further real convergence among member countries. The benefits of the single market were to be reinforced by growing trade, and financial, links—making economies more similar and subject to more common shocks over time (Frankel and Rose, 1998). In that context, these common shocks would be best addressed through a common monetary policy. Instead, country-specific shocks have remained frequent and substantial (Pisani-Ferry, 2012; and Figure 1). Some countries experienced a specific shock through a dramatic decline in their borrowing costs at the launch of the euro, which created the conditions for localized credit booms and busts. The impact of globalization was also felt differently across the euro area, reflecting diverse trade specialization patterns and competitiveness levels (Carvalho, forthcoming). These country-specific shocks have had lasting effects on activity. And divergences in growth rates across countries have remained as sizeable after the creation of the euro as before (Figure 2).



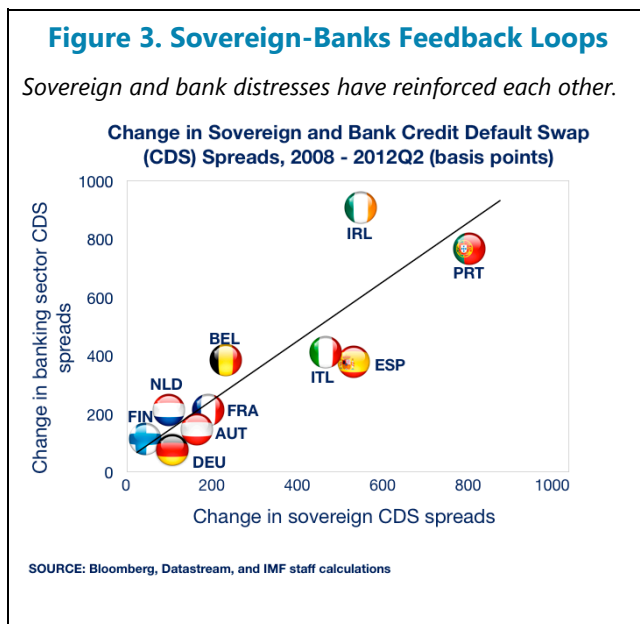
6. Government failures. The consequences of these shocks have been compounded by weak fiscal policies in some countries. In some cases, the shocks themselves were the result of idiosyncratic policies (e.g., Greece). More generally, the windfall from lower interest and debt payments were not saved, and higher revenues generated by unsustainable domestic demand booms were wrongly deemed permanent. By the time the crisis hit, countries had insufficient buffers to enable countercyclical support at the national level. Moreover, the European fiscal governance framework was too loosely implemented to ensure the appropriate management of public finances over the cycle. Government failure and political interference became especially evident when the Council decided to hold the Stability and Growth Pact's procedure in abeyance for the two largest countries of the euro area in 2003.



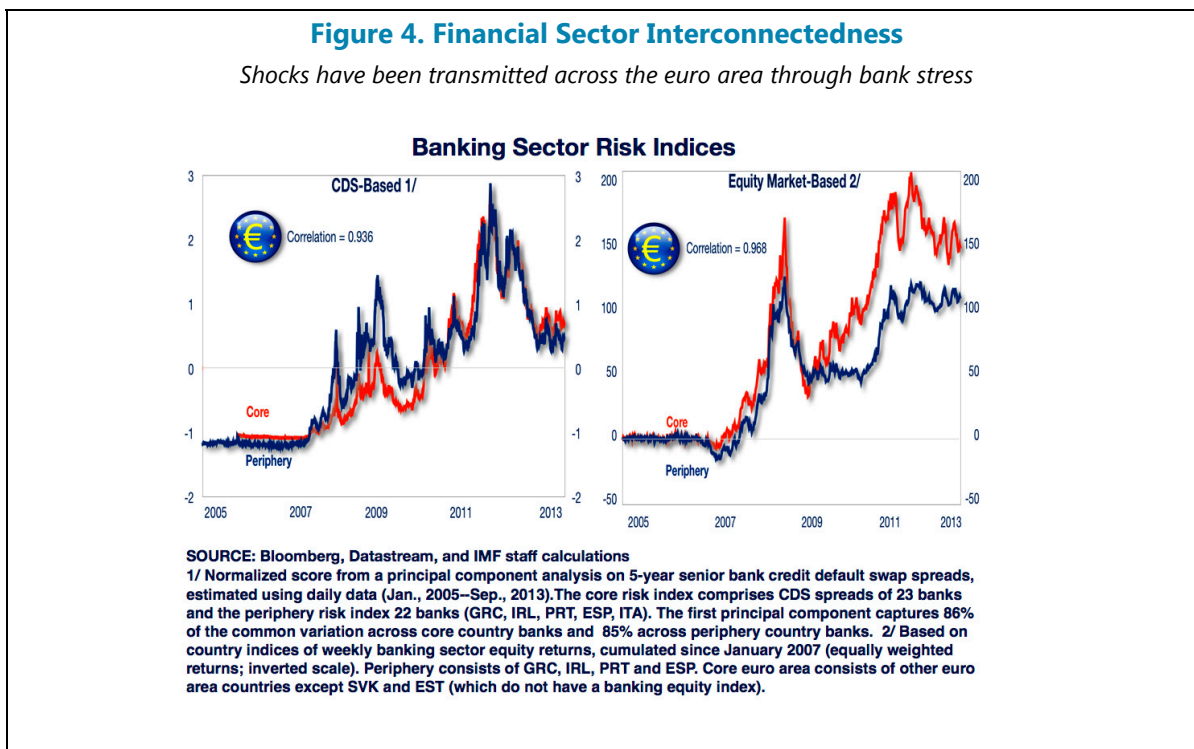
7. Market failures. While country-specific shocks remained more frequent than expected, and imprudent national policies were pursued by some, there were few market forces to correct growing fiscal and external imbalances:

- *Labor market and price rigidities:* Unlike what would have been expected in an optimal currency area, prices and wages continued to display strong downward rigidities in many euro area countries, standing in the way of the timely real exchange rate adjustment that may be required after a negative shock (Jaumotte and Morsy, 2012). This allowed the accumulation of large intra-euro area imbalances that have been at the heart of the crisis. Likewise, labor mobility—even though increasing—continued to be lower than in other common currency areas (e.g., in federations such as the United States), both because of language and cultural barriers and institutional constraints—such as the inability to port pensions or unemployment benefits across borders—inhibiting rebalancing through migration.
- *Missing incentives for markets to enforce discipline:* A corrective mechanism against unsustainable national fiscal policies could have come from capital markets. In fact, the provision enshrined in the Maastricht Treaty to ensure that no member ends up assuming another fellow member state's fiscal commitments (Article 125 of the Treaty on the Functioning of the European Union, TFEU)—hereafter referred to as the “no bailout” clause—was meant to give financial markets an incentive to price default risk in a differentiated way across the euro area. However, general optimism about the region's growth prospects at the euro's inception blunted markets' scrutiny of national fiscal policies. Moreover, it also did not help that the clause lacked credibility: With few automatic mechanisms in place *ex ante* to support individual members in distress, markets could extrapolate that the crisis in the affected countries would be deep and that spillovers would be substantial enough for policymakers to prefer to bail out a member country *ex post* rather than let it default. In other words, market discipline failed *ex ante* because the no-bailout option was not *ex post* credible. In turn, because *ex ante* market discipline was missing—and fiscal rules were not strictly enforced—some members borrowed excessively, taking on more debt than they would have if risks had been priced appropriately.

8. Sovereign-bank feedback loops. When, eventually, large adverse shocks hit at the end of the 2000s, they were left unmitigated, increasing the probability and impact of sovereign and bank distress. Domestic fiscal buffers were rapidly depleted. Meanwhile, while the launch of the euro did not foster as much real convergence as expected, financial market integration increased greatly in the first ten years of EMU, and some banks had extended themselves well beyond the capability of their national sovereigns to rescue them. Yet, many banks continued to hold a sizeable share of the debt issued by their domestic sovereign. This combination set the stage for an escalation of domestic stress, with problems in banks raising doubts about sovereign creditworthiness, and sovereign stress aggravating the pressure on banks' balance sheet—creating severe negative feedback loops between sovereigns and domestic banks (Figure 3). With no clear circuit-breaker in the system, markets could start pricing in default in a self-fulfilling way.



9. Contagion. In a highly integrated union, the deleterious impact of these shocks could travel fast across borders. Spreading through interconnected euro area banks, localized points of stress in 2010 were quickly amplified to a systemic level (Figure 4).



HOW TO ADDRESS GAPS FOR THE FUTURE?: RISK REDUCTION AND RISK SHARING

Risk reduction—through a more robust fiscal governance framework—would gear national governments toward more prudent behavior, while some fiscal risk sharing at the euro area level would help smooth the impact of adverse country-specific shocks. Common backstops for euro area banks would dampen the spillover effects of sovereign and bank distress. Borrowing from the center, by providing a safe asset, could also, to some extent, limit portfolio shifts between sovereign bonds. Taken together, these steps would contribute to reducing the severity of future crises.

Risk Reduction: Addressing government failures

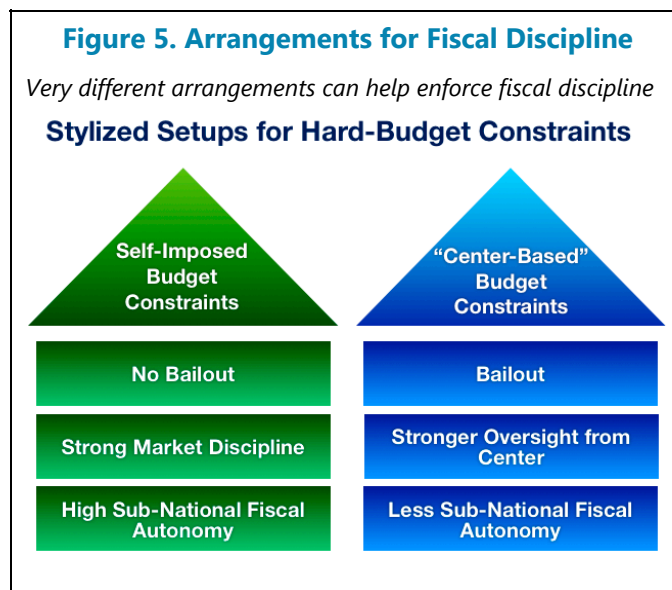
10. Fiscal discipline. The euro area cannot afford a repeat of the imprudent fiscal and financial policies undertaken by some countries in the first decade of EMU. Debt levels are approaching dangerously high levels in some places, and confidence in the existing enforcement mechanisms embedded in the Stability and Growth Pact (SGP) is low. Steps toward improving fiscal governance and restoring the commitment to fiscal discipline should be guided by the following principles:

- *Smarter fiscal rules at the national level.* While a (structural) medium term objective is also pursued, the binding target in the SGP applies to the headline fiscal balance and is therefore defined independently of the position in the cycle. This has proved suboptimal, with countries easily hitting an unambitious deficit of 3 percent of GDP under favorable economic conditions, but forced to unduly tighten during downturns to meet that same target. Medium-term targets need more prominence to establish the credibility of fiscal plans, allowing for some flexibility to spread consolidation efforts overtime, with more consideration for the position in the business cycle.
- *Robust corrective mechanisms.* The first decade of EMU has shown that, when left to the Council—which is composed on national Ministers—, the temptation remains to under-enforce fiscal rules and delay adjustment, as evidenced in 2003 when it decided to suspend the excessive deficit procedure against Germany and France—a decision that was later reversed by the EC Court of Justice SGP process. When there are policy slippages, countries should have the incentive to take corrective measures systematically, and potential for political interference should be kept to a minimum.
- *Coordination.* A stronger centralization of budget oversight would allow internalizing the negative spillovers of imprudent national fiscal policies for the other member states. While this would entail less national sovereignty on fiscal issues, such a loss would be offset by (i) the benefits of not risking being priced out of markets or lose market access in times of stress as a result of imprudent policies or contagion stemming from imprudent policies elsewhere in the union, and (ii) the benefits of belonging to a monetary union that is functioning properly.

Risk Reduction: Fostering fiscal discipline

11. International experience. Various arrangements have emerged in existing federations, with distinct disciplining mechanisms.

- *Different arrangements.* In a first group of countries, market discipline at the sub-national level is underpinned by a credible “no bailout” rule and self-imposed budget constraints (U.S., Canada).⁴ At the other extreme, where bailout episodes of subnational governments have occurred in the recent past, discipline emerges from stronger center oversight (Brazil, and more recently Germany) (Figure 5). In intermediary systems, the federal government’s authority over lower jurisdictions has been supported by a culture of dialogue and intergovernmental coordination (Australia, Belgium) or by direct democracy (Switzerland)—features that have proved effective at instilling sound fiscal sub-national policies.



- *Evolution after crisis episodes.* The interplay between hard budget constraints and central control evolves over time, with crisis episodes not unlike the one currently experienced by the euro area tending to lead—at least for a time—to more central control. Following periods of stress involving subnational bailouts, fiscal discipline often increases through bailout conditionality and/or a strengthening of the central authority (as in the U.S. at the end of the 18th century, or in Brazil after the bailouts of states in the 1990s). The return to market discipline typically occurs after a transitional period when private risk sharing again becomes a possibility, and, in some cases, after a regional bankruptcy has tested the no bailout rule (as in the U.S. in the 1840s) (Box 2). Intermediary arrangements usually exist in federations that have not been tested by severe fiscal crises.

⁴ The mobility of workers’ and firms’ across states can also increase competitive pressures at sub-national levels to maintain fiscal discipline, while ensuring low taxation and high quality public services.

Box 2. International Experiences with Resolutions of Sub-national Crises in Federations

A stronger center after bailout episodes. In the United States in 1790, the central government assumed liabilities of states bankrupt after the Revolutionary War under Treasury Secretary Alexander Hamilton. In the process, the central government secured dedicated revenues—customs duties in that case—, marking the beginning of a federal budget (Henning and Kessler, 2012). In Brazil in the 1990s, the central government bailed out a number of states in exchange for strict centralized spending and borrowing controls. These controls took the form of bilateral contracts between the central government and states, and important elements of these contracts have been enacted in the Fiscal Responsibility Law in 2000.

Reinstating market discipline after local defaults. When in the 1830s and 1840s, many U.S. states faced bankruptcy following the end of an investment boom in railroads, canals, and state banks, the federal government withheld direct financial support. In light of these episodes, many states self-imposed fiscal rules in their constitutions to signal commitment to sound fiscal policies and prevent future defaults. Today, 49 U.S. states have some form of balanced budget rules. At the same time, federal institutions provide significant fiscal support and risk sharing across the United States even in case of financial distress at the state level (e.g. through federal programs or the FDIC—see background note).

12. Long-term options for the euro area. Cooperative approaches to foster fiscal discipline have shown their limits in the first decade of EMU. On that basis, and in light of international experience, two options emerge to foster fiscal discipline in the euro area in the longer term. One could be to aim to restore the credibility of the no bailout clause, including through clear rules for the involvement of private creditors when support facilities are activated. But the transition to such a regime would have to be carefully managed and implemented in a gradual and coordinated fashion, so as to not trigger sharp readjustments in investors' portfolios and abrupt moves in bond prices. Another option would be to rely extensively on a center-based approach and less on market price signals. This would, however, have to come at the expense of a permanent loss of fiscal sovereignty for euro area members. In practice, the steady state regime might have to embed elements of both options, with market discipline complementing stronger governance.

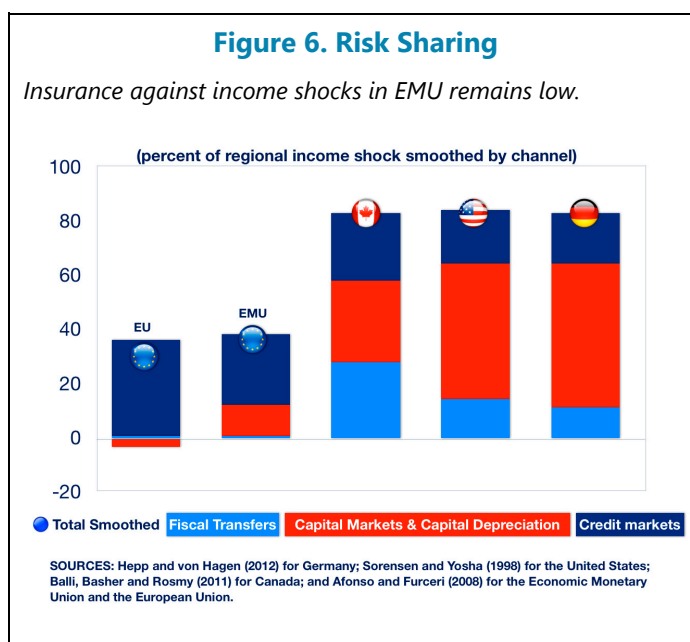
13. Prerequisites for market discipline. For incentives for market discipline to function properly, certain conditions would have to be fulfilled, including to minimize the spillover effects of sovereign financial distress. These conditions include:

- *A minimum of fiscal risk sharing.* With a minimum of fiscal risk sharing in place, a country facing severe financial distress would not be deprived of essential government services, social security, and financial stability. This would contain the social and economic costs of the crisis. Country-specific shocks would then be less likely to damage the economies of other members of the euro area, alleviating the need for ex post financial support and hence making the no bailout clause more credible. Approaches to achieving greater risk sharing are the focus of the next section.

- *Ex ante rules involving private actors in bailouts.* A complementary approach should be to combine the existing crisis support facilities for distressed sovereigns with predictable resolution mechanisms when these facilities are activated. This would help markets better assess, and therefore price, sovereign risks, and would strengthen incentives for borrower and creditor countries to avoid excessive sovereign borrowing, even in the presence of bailout arrangements. The requirement in the ESM treaty for all new euro area government bond issuances with maturity above one year to include aggregated collective action clauses as of January 2013 is a step in that direction.

Risk Sharing: Insuring against country-specific risks

14. Rationale for risk sharing. Larger fiscal buffers at the national level would help smooth the impact of country-specific shocks but, given their magnitude and the potential for contagion, some insurance mechanisms at the euro area level would be beneficial. These would give individual countries the means to smooth demand in the face of negative income or activity shocks—and, as a consequence, better insulate fellow euro area members from damaging spillovers. Such mechanisms take on an added importance in a currency union, where countries operating under fixed nominal exchange rates cannot use monetary policy tools to respond to country-specific shocks.



15. Channels. Cross-country risk-sharing can be provided by markets and governments. In the first case, smoothing is provided by cross-border credit markets, allowing countries to save in good times and borrow when crisis hits. Private capital markets can also provide insurance against income shocks, as they allow households or governments to hold a diversified portfolio of euro area and international investment assets, and hence to diversify their income streams. In the second case, intergovernmental fiscal arrangements can allow for temporary transfers of resources across member states. A central budget with dedicated revenues to finance the common provision of public services can also play that role (see background note).

16. Risk sharing in the euro area. An international comparison shows that the euro area lacks the degree of risk sharing seen in existing federations (Figure 6):

- *Little overall insurance.* While federations such as the U.S., Canada or Germany manage to smooth about 80 percent of local shocks, the euro area only manages to insulate half of that amount—in other words, when GDP contracts by 1 percent in one of the euro area countries,

households' consumption in that country is depressed by as much as 0.6 percent (as opposed to 0.2 percent in the U.S., Canada or Germany).⁵

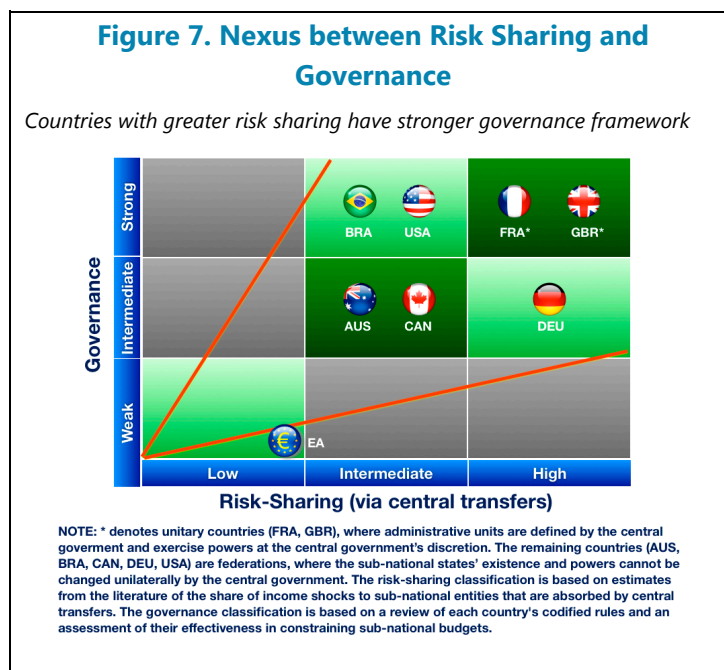
- *Little market-based insurance.* Capital markets in the euro area play much less of an insurance role than elsewhere, in part because cross-border ownership of assets within the euro area remains more limited than, for example, across states of the U.S. or across German Länder—despite the single market. To the extent that there is insulation from negative shocks in the euro area, it occurs through cross-border saving and borrowing. Yet, this channel tends to break down in periods of severe downturns and financial crisis, when risk sharing is most needed, as international credit markets become unwilling to grant loans (Furceri and Zdzienicka, 2013). The current crisis was no exception, as evidenced by the freezing of financial markets in the euro area periphery.
- *Little fiscal risk sharing.* Cross-country fiscal risk sharing is almost nonexistent, both in the EU and the euro area. This is not surprising given the small size of the EU budget, its focus on harmonizing living standards (through the structural and cohesion funds) as opposed to providing risk sharing, and the overall limited transfer of fiscal authority to the EU level.

17. Increasing risk sharing going forward. The euro area would benefit from larger overall smoothing of these country-specific income shocks.

- *Crisis management measures:* Financial support through the EFSF and the ESM has provided some elements of fiscal risk sharing, and the TARGET2 system has cushioned against the sharp reversal in private capital outflows since the beginning of the crisis. Yet, these measures have come *ex post*, namely once the crisis had already severely impacted the economy, with a high cost in terms of lost output.
- *Banking union.* The creation of a banking union would help reinforce the role of credit markets in providing risk sharing. In particular, it would help develop banking services in a truly integrated way and prevent financial markets fragmentation along national borders, especially in times of stress (IMF, 2013a).
- *Capital market (re-)integration.* While the widening in TARGET2 positions has prevented a sudden stop, the impact of the shocks has still been exacerbated, rather than smoothed, by capital markets movements. A reversal of the recent financial de-integration, let alone further capital market integration, will take time to materialize. The functioning of capital markets in the euro area could also be improved through common financial market reporting standards, and further harmonization of financial market regulations.

⁵ While the euro area is not a federal state itself and legal arrangements differ significantly from existing federations, the degree of economic and financial integration between member states is of the same order of magnitude as that of the different regions of many federal states. This suggests that, on economic grounds, federal states offer the closest benchmark for the euro area (see background note).

- *A role for fiscal risk-sharing.* In that context, and going forward fiscal risk sharing can play a complementary role beyond crisis mechanisms, both by providing a minimum amount of smoothing, when other channels break down, but also to serve as a catalyst for investors' behavior (Fahri and Werning, 2012). Knowing that there is a floor on the impact of negative shocks, private markets would view countries under stress as less risky than they do currently and hence be more willing to support them through market-based mechanisms. In other words, the existence of a credible form of government insurance would catalyze the provision of market insurance .



18. Moral hazard. If (and when) the union provides a safety net in case of an accident, countries may be tempted to implement riskier policies ("free-riding" or moral hazard), which calls for reinforced governance. Indeed, international experience shows that stronger risk-sharing and stronger governance typically go hand in hand (Figure 7). This implies that, as a prerequisite for any increase in fiscal risk sharing in the euro area, governance and enforcement provisions should be further strengthened.

Dampening spillovers, stemming contagion

19. A common backstop for the banking union. An effective common macro-prudential supervisory framework would help prevent the build-up of imbalances in the financial sector, while a single resolution mechanism, covering all banks regardless of their nationality, would provide a powerful tool to sever the adverse feedback loop between sovereigns and domestic banks at play in times of stress. Some of the insurance against banking accidents should be funded by the industry. But common backstops for the recapitalization, resolution and deposit insurance schemes of all banks within the jurisdiction of the single supervisory mechanism would contribute to reduce the risk of contagion. They would in particular limit the extent that sovereign distress in any one country is transmitted to another through the banking system.

20. Pooled debt instruments. Large reversals in capital flows going to sovereign bonds can also amplify and propagate shocks. With very few sovereign bonds still considered as safe assets, the risk of sharp portfolio shifts between sovereigns will persist in the future. The existence of common debt (in the sense of debt incurred by euro area bodies) could provide some relief against this channel of contagion, and a more stable source of funding.

MINIMAL ELEMENTS FOR A FISCAL UNION

The ultimate scope and shape of further fiscal integration will remain a matter of social and political preferences. But to make a future crisis less severe, four elements seem essential: (i) better oversight of national fiscal policies and enforcement of fiscal rules to build buffers and ensure common concerns are addressed; (ii) subject to strong oversight and enforcement of fiscal discipline, some system of temporary transfers or joint provision of common public goods or services to increase fiscal risk sharing; (iii) credible pan-euro area backstops for the banking sector; and, (iv) some common borrowing to finance greater risk sharing and stronger backstops and provide a common—albeit limited in size—safe asset.

Better oversight of fiscal policies

21. Fiscal policy design. Ex ante, fiscal policies can be better organized, with commonly agreed rules essential. In that respect, the Fiscal Compact usefully complements the existing framework, as it requires national authorities to translate into national legislation these commonly-agreed rules. But enforcement capability will remain a key test. Critical ingredients include:

- *Structural fiscal targets.* The flexibility introduced in the 2005 reform of the SGP (through the “effective action” clause) and the Fiscal Compact allows for the focus to be put more on structural—instead of headline—fiscal balance targets. But that concept should be applied more systematically.
- *Independent forecasts.* Assessing the position in the cycle in real time will always remain a difficult exercise. Switching to structural targets will therefore require careful estimates of the output gap. Furthermore, governments have tended to rely on overly optimistic forecasts to build their budget. For all these reasons, relying on independent national agencies—in coordination with central oversight (see below)—to assess fiscal policy design and implementation would improve the process, as is foreseen in the “Two Pack” regulation.
- *Binding medium-term fiscal plans.* Flexibility in the fiscal rules will only be credible if fiscal policy is anchored in medium-term fiscal plans that clearly state the path back to lower debt levels. In particular, any accommodation for the cycle during downturns needs to be accompanied with plans to offset this over the medium term, possibly in an automatic way. While such corrective mechanisms have in principle been agreed in the Fiscal Compact, they still have to be designed at the national level, and made consistent across countries.
- *Increased transparency.* Fiscal transparency and accountability could be enhanced by entrusting Fiscal Councils or other national independent agencies with the task of assessing the credibility of medium-term plans and any corrective measures. Harmonization of budget presentation, fiscal reporting and accounting at all levels of government, as well as timely reporting of fiscal outturns, would all improve the functioning of the fiscal oversight framework.

22. Transitional considerations on reinstating discipline. To ensure that the agreed fiscal rules are implemented, countries need to be provided with the proper incentives to comply, but also with a credible threat in case they do not.

- *“Center-based” approach.* As argued earlier, while market discipline could be an important element to prevent future fiscal imbalances from emerging, it cannot be restored overnight, and certainly not until this crisis is resolved. Therefore, in the interim—and possibly as a long term solution too—enforcement will have to be imposed more directly by the center.
- *Clear bailout rules for now.* While the other elements underpinning deeper fiscal integration are put in place, ESM support to sovereigns under market stress will continue to constitute the best line of defense against further systemic shocks. Yet, credible rules in the form of conditionality will be needed to preserve the incentives to reform and ensure decisive implementation of adjustment measures at the country level.

23. Enforcement. In a “center-based” approach, stronger involvement in national fiscal decisions could take various forms, along the following lines:

- *Legal challenges at the national level.* With fiscal rules soon to be enshrined into national legislation, enforcement will also become a national matter, and it could be possible to bring cases of infringement to domestic courts, depending on the domestic legal tradition of the member, and on the specific provisions of the domestic legal instruments implementing fiscal rules. EU court jurisdiction over compliance of national domestic rules could also be considered. However, this would likely require treaty changes and it remains to be seen whether such a deterrent would be effective in generating enforcement in real time.
- *Leverage to sanction with a larger central budget.* The case for controls on national fiscal policies would be even stronger in the context of greater risk sharing between the euro area countries. For example, if a larger euro area budget were to emerge (see below), member states could be under threat of losing some transfers from the center in cases of non-compliance with relevant rules or policy recommendations. Such a mechanism, in triggering more systematic sanctions, possibly deferred over time, could act as a more credible device to generate conformity with the rules. In the same vein, some in Europe have suggested the introduction of targeted transfers to countries that implement beneficial structural reforms. Conditions could also be applied for access to a rainy day fund or to existing crisis mechanisms like the ESM. While this approach has merit in encouraging reforms, by making such support or transfers contingent on compliance, the main drawback would be to reduce the automatic stabilization effect of these transfers.
- *A veto power from the center.* The “Two Pack” envisages that national authorities may be requested to revise their budget if plans are not deemed to be in accord with common principles for the euro area. Yet, this does not give the center the power to enforce compliance. Consideration should be given to stronger powers for the center, either to set national spending and/or borrowing plans or to veto national fiscal decisions, when they breach commonly agreed rules. While very intrusive, such an arrangement would have the benefit to provide timely and pre-emptive intervention when budget plans are clearly inconsistent with the targets derived from fiscal rules. However, it would also require treaty changes and a significant loss of national

sovereignty. To mitigate this concern, a gradation in the loss in sovereignty could be considered, depending on the degree of non-compliance with the fiscal rules. Significant loss in fiscal autonomy and extensive fiscal custody would be reserved to the most extreme cases of rule violation and when financial support is being extended—variations of which can be found in countries such as Brazil or Germany.

24. Political accountability. A larger role for the center raises difficult questions about political and democratic accountability for European and euro area decision bodies. Existing fiscal unions are also political unions, and moving toward deeper fiscal integration in the euro area may not be possible without changes in the political organization of the union. While the issue of the steady-state political regime for the euro area is beyond the scope of this paper, it will be essential to ensure that the political bodies implementing and enforcing fiscal rules at the central level are mandated to do so with the euro area’s collective interest in mind—rather than individual members’ national interests.

Temporary transfers or common provision of public services

25. Various options. There are a number of options to ensure better common insurance against country-specific shocks, with various degrees of centralization and requirements in terms of legislative changes:

26. A rainy-day fund. The simplest way of organizing temporary transfers to deal with adverse shocks at the country level would be through a common, dedicated “rainy-day fund”, similar to the one suggested by the Report from the Tommaso Padoa-Schioppa Group (2012).

- *General features.* Such a fund would collect revenues from euro area members at all times and make transfers to countries when they experience negative shocks. With a dedicated and guaranteed flow of revenues, the fund might even be able to borrow at low cost to smooth the impact of downturns throughout the union.
- *Size of the fund.* While any such evaluation comes with numerous caveats, we estimate that if the fund had existed since the inception of the euro, annual contributions of the order of 1½ to 2½ percent of GNP would have been sufficient to provide a level of overall income stabilization comparable to that found within Germany—where 80 percent of regional income shocks are smoothed, as compared to the 40 percent currently smoothed in the euro area (see background note). While still limited, these amounts are larger than the resources transferred under the existing EU budget, and could be underestimated if the risk of contagion has increased. Any misidentification of the nature of shocks (see below) would also lead to higher transfers. In comparison, the total resources devoted to the euro area firewalls (ESM and EFSF), at their maximum, will amount to about 7½ percent of GNP (euro 700 billion).
- *Pros.* Unlike the ESM, it would provide *ex ante* support—namely before the shocks have turned into funding crises. But like the ESM, it would be lighter to manage than a full-fledged euro area budget and would not involve any devolution of spending responsibilities to the center. Furthermore, in addition to providing cross-country insurance—against idiosyncratic shocks—,

the fund would allow for region-wide counter-cyclical fiscal policy responses, with contributions saved in good times and paid out to the contributing countries in tough times—in times of common shocks, or when idiosyncratic shocks have spilled over to other euro area countries.

- *Cons.* The main practical challenge in such a scheme would be to correctly detect the events warranting the activation of the insurance scheme, and hence transfer payments. While technical methods exist to identify negative growth shocks, they are not free of errors and complex to implement in real time, making it hard to disentangle temporary from permanent shocks, and exogenous shocks from policy shocks. The parameters of intervention could also be hard to communicate to the public, raising challenging issues of transparency and accountability. As with any insurance scheme—that is, without any conditionality—“free-riding” would remain a risk, especially if the scheme ends up delivering more permanent transfers than warranted: countries could be less inclined to build fiscal buffers at the national level or implement difficult adjustment measures, knowing that ultimately, the rainy-day fund would provide support.

27. Common unemployment insurance. Social protection could also be a candidate for more fiscal risk sharing. More specifically, moving a minimum level of provision of unemployment benefits to the euro area level would naturally provide insurance against individual income risk across the union. Indeed, in most existing federations, unemployment insurance is highly centralized; and even in the case of the U.S. where states also finance part of the unemployment benefits, the role of the federal government typically increases in the event of severe negative shocks (see IMF 2014 and background note). Such a scheme should go hand-in-hand with efforts to enhance and harmonize labor market arrangements across countries.

- *Pros.* The funding (via social security contributions) and provision of unemployment benefits are highly related to the cycle. A common scheme would also require a minimum amount of harmonization in labor taxation as well as potentially, pension rights—a beneficial step on its own toward a Single Labor Market. Finally, by focusing on unemployment, a highly identifiable variable, a common social security fund would be more understandable and acceptable to the public than a rainy-day fund. With ex ante defined parameters, transfers in the form of unemployment benefits would also have the advantage of automaticity.
- *Cons.* Unemployment reacts with lags to activity shocks, so the transfers may not be sufficiently timely. In addition, given the wide variation in long-term unemployment levels across the euro area, the focus should be restricted to short-term unemployment benefits, which are directly connected to negative shocks—as opposed to long-term unemployment—which are more closely linked to labor market and other structural rigidities. Providing insurance against long-term unemployment from the center would immediately give rise to permanent transfers from low-unemployment level regions to high-unemployment regions. This would be akin to redistribution, and not risk sharing, and could provide disincentives to reform labor markets in recipient countries. Focusing on short-term unemployment insurance would, however, reduce the amount of smoothing, although it would still enable the immediate mitigation of adverse shocks to employment.

28. A euro area budget. A full-fledged budget at the euro area level would allow for risk sharing both through revenues—as countries hit by negative shocks would automatically contribute less—and through spending—as countries hit by negative shocks and in compliance with relevant rules and policy recommendations would still benefit from the same amount of centrally-provided public services. An example of such jointly provided services is public infrastructure, where the central government retains an important role in many existing federations, often using such outlays as a counter cyclical tool.

- *Pros.* The extent of risk sharing would increase with the extent of centralization of fiscal revenue and spending responsibilities. Along that dimension, the euro area budget would therefore be superior to the other options explored above. In addition, it would facilitate the coordination of the fiscal stance at the euro area level and foster some fiscal harmonization for those taxes that are dedicated to fund the common budget and spending responsibilities moved to the center.
- *Cons.* Setting up a dedicated full-fledged euro area budget would require more extensive loss of fiscal sovereignty at the national level than other options—as this would require transferring some taxation and spending responsibilities to the center. At this stage, such a move is unlikely to have the support of the constituent electorates.

A common backstop for the banking union

29. Rationale. A single resolution mechanism covering all banks regardless of their nationality, including a common backstop, would provide a powerful tool to sever the adverse feedback loop between sovereigns and domestic banks at play in times of stress. It would also provide a mechanism to internalize home-host concerns and reach agreement on cross-border resolution and burden sharing. As such, it would naturally complement the single supervisory mechanism being put in place and avoid protracted and costly resolutions.

30. Funding. As resolution involves sensitive choices over the distribution of losses, clear ex ante burden sharing mechanisms—as recently agreed between European ministers of Finance in the context of the Bank Resolution and Recovery Directive—are necessary to achieve least-cost resolution, while they also help provide the right incentives for investors and foster market discipline. At the same time, when systemic risks prevail, exceptional treatment may require recourse to taxpayer money, and hence a fiscal backstop from the center (IMF 2013a). Indeed, in no existing federation has the responsibility for resolving or providing deposit insurance for troubled banks—especially systemic ones—fallen on the sub-national level in this crisis.⁶ And even when no ex ante national bank resolution fund existed prior to the crisis, these funds have all been put in place, with public means, as ad hoc crisis responses (see background note).

- *Funding from the industry.* Contributions from the industry—in the form of a resolution fund—should be used first to finance resolution. The fund would build resources over time through

⁶ Even in Germany where the presumption that support to banks would come from the *Länder*, bailouts were provided on an ad hoc basis by the federal government.

levies on the industry, as is common for existing national deposit insurance schemes or resolution funds. Use of the funds could also be complemented by arrangements to recoup net losses through ex post levies on the industry.

- *Fiscal backstop.* But insofar as private sector contributions and loss allocation across uninsured and unsecured claimants would be insufficient in a systemic crisis, a common backstop would need to be tapped, including through a credit line from the ECB—with appropriate safeguards—to ensure adequate liquidity. Even if such a backstop would only be tapped in exceptional circumstances, the mere existence of a common backstop would help anchor confidence in the euro area banking system. The ESM can provide a bridge to such permanent fiscal backstops, as is considered with ESM direct bank recapitalization. But ultimately, a credit line from pooled fiscal resources would provide the best insurance against financial risks.

Borrowing at the center

31. A solution for the long term. Provided the appropriate governance structure is in place, and fiscal revenues have been assigned to the center—be it in a dedicated fund or through a full-fledged budget—a euro area debt instrument backed by those revenues could help finance the temporary transfers and spending responsibilities moved to the center, and/or provide a credible common backstop to the banking union. Such debt issued by the center would also help in developing a new safe asset for investors—although it should be recognized that, at least initially, common debt would only contribute marginally to reducing the scope for portfolio shifts between sovereign bonds driven by safe haven motives. Finally, while any spending responsibility at the center would have to be backed by revenue, borrowing from the center could increase the counter-cyclical nature of these instruments, by providing also inter-temporal risk sharing. However, any common bonds would require the creation of entities at the center able to issue debt on their own behalf (for example, a euro area Stabilization Fund, a euro area Unemployment Fund, or an entity managing the euro area budget).

PROS, CONS, AND IMMEDIATE CONSIDERATIONS

While the elements outlined above could prevent future crises from reaching systemic levels seen today, progress in this direction faces serious political hurdles. Yet, the current approach is already stretching the political fabric of the euro area, and the collective cost of the crisis is rising over time. In that context, the immediate priority should be to put in place adequate and credible fiscal backstops for the banking union while making progress on a roadmap for the other elements underpinning further fiscal integration.

32. Pros. The benefits from further fiscal integration would accrue both in the short and long term. In the steady state, with these elements in place, the likelihood of future crises will be decreased, and when they occur, they would be less severe and less prone to systemic spillovers. But spelling out today a roadmap toward further fiscal integration would have immediate effects in raising confidence in the viability of the union, by itself supporting current crisis management efforts. In addition, a shared approach with some elements of centralized fiscal policy would allow for better fiscal coordination. It would expand the scope of available counter-cyclical tools when national policies are constrained by limited market access or fiscal rules—avoiding, for example, excessively restrictive fiscal stances during severe recessions. In these circumstances, it would more than offset the loss of some stabilization capacity at the country level resulting from stronger control on national budgets and the transfer of some fiscal responsibility to the center.

33. Cons. There are also costs to deepening fiscal integration.

- *Political costs.* Political hurdles to ceding some national sovereignty over budgets are considerable, and they would require extensive public debate. Many steps may necessitate legal changes. In some cases, where existing EU Treaties provide only a limited legal basis for euro-area specific reforms, strengthening the legal framework over time would help clarify the role of euro area versus EU members—but it would require approval by all EU countries. Alternatively, intergovernmental treaties outside the EU framework could be considered, where feasible, as was done with the Fiscal Compact (Box 3).
- *Operational challenges:* The mechanisms suggested here could be complex to put in place. Mistakes in the identification of temporary shocks could lead to more permanent transfers than desirable. The costs of a fiscal union could also be financial if centralized fiscal oversight proves ineffective in curbing moral hazard and instilling policy discipline. In addition, fiscal risk sharing would have a headline cost in terms of transferred revenues to central institutions—although deeper fiscal integration would also mean transferring some spending responsibilities to the center.
- *Costs versus the costs of ex post crisis measures.* Yet, the current approach to dealing with the crisis ex post instead of ex ante also comes with a substantial cost—even if creditor countries have indirectly benefited from safe haven flows that have kept their cost of funding at record low levels: first a cost in terms of lost output and increased unemployment, as ex post measures are delayed in implementation; but also a cost in providing subsidized financial support to countries under stress through programs (Box 4). In addition, (contingent) TARGET2 liabilities would not have increased as much in the presence of ex ante fiscal risk sharing.

Box 3. Legal Considerations

Missing euro area framework. While the EU legal framework allows for key elements of a fiscal union (e.g., a small central budget with own resources, a system of allocation and redistribution of resources, and the SGP to support fiscal discipline), the TFEU does not envisage common elements of fiscal policy specifically at the euro area level. In addition, it does not recognize the euro area as a separate entity, and the currency union lacks a legal personality. While some of the reforms considered here could be introduced as EU secondary legislation, strengthening the legal framework might be required in the long run to anchor deeper fiscal integration in the euro area as an objective under the Treaty. Alternatively, euro area countries could enter into an intergovernmental treaty outside the EU framework, as they did with the Fiscal Compact.

Fiscal policy design. The current EU framework provides flexibility to assess *fiscal targets* in structural terms, alongside headline targets. Secondary legislation could be used to introduce *independent agencies* responsible for fiscal forecasting (Articles 121 and 136 TFEU), as was recently decided as part of the so-called two-pack. *Automatic correction mechanisms* are being introduced in national legislation, as required by the Fiscal Compact.

Enforcement mechanisms. Options to *veto national budgets* when national policies are deemed non-compliant with common fiscal rules would require Treaty changes. Changes to national legislation and constitutions—possibly also referenda—could be required as well.

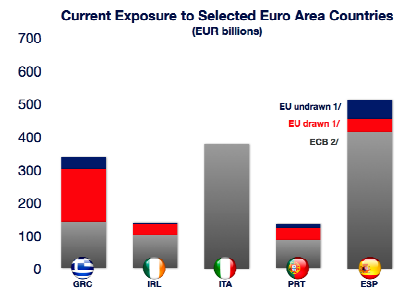
Increased fiscal risk sharing. Secondary legislation could be used to introduce a *rainy-day fund* (Articles 122, 136, and 352 TFEU) and a *euro area budget* could be established as part of the larger EU budget, but a euro area *unemployment benefit scheme* would be more complex to accommodate in the current legal framework. In the long run, Treaty changes may be necessary to clarify the role of euro area versus EU members, as the current framework would continue to involve the full Council and European Parliament in all decisions. Alternatively, an intergovernmental treaty among euro area countries could be considered along with the creation of a euro area entity to manage the fund, scheme or budget.

Fiscal backstop to the banking union. Secondary legislation could establish a euro area resolution fund with *industry contributions* collected at the national level (Article 114 and 352 TFEU). In the medium term, providing an explicit legal underpinning in the EU treaties for financial stability arrangements, including for the introduction of a *fiscal backstop* for the banking union, would strengthen their legal soundness. Alternatively, the ESM Board of Governors could decide to provide a more general ESM backstop for the banking union—in addition to direct recapitalization of banks (Article 19 ESM Treaty).

Box 4. The Implicit Cost of Existing Crisis Management Measures

Crisis Financing. Euro area countries have disbursed about €277 billion out of €390 billion in program commitments from ESM, EFSF, EFSM, and the Greek Loan Facility (see figure). The Eurosystem has an additional exposure of about €1,137 billion to countries with liquidity needs, including through the ECB balance sheet and TARGET2 payment system.

Implicit Transfers. The rates charged on most crisis financing reflect the average cost of funding of creditor countries and the ECB's lending rate and fall well below the market rates faced by crisis countries. In particular, liquidity provision through the Eurosystem has allowed the reduction in foreign investors' exposure to occur without a generalized liquidity or currency crisis. In order to give a sense of the magnitude of the implicit transfer, we compare actual interest expenses for crisis



SOURCES: IMF staff calculations
1/ Includes EFSF, ESM, EFSM, and Greek Loan Facility, as of January 2013.
2/ Includes change in Target 2 debts and excess banknote allocation accumulated since December 2007, as well as SMP holdings.

financing with the hypothetical costs if (i) similar amounts had been raised by crisis countries at current long term yields, or alternatively, at rates reflecting fundamentals (derived from a model, as market rates might have overshoot in the current context); or (ii) creditor countries had hedged their exposures at prevailing CDS rates to insure against the risks taken on their balance sheet. The implicit transfer is estimated at between €44 and €75 billion per year for Greece, Ireland, Italy, Portugal, and Spain (see table). Netting out the contributions by these countries to crisis financing, the implicit transfer by euro area net creditors ranges between $\frac{3}{4}$ and $1\frac{1}{4}$ percent of their GDP. These are rough estimates of the magnitudes involved. It is important to note, however, that they do not capture the potentially very large costs (longer crisis duration, lower output, and higher unemployment) that could be associated with the current approach of *ex post* risk sharing.

Implicit Transfer to Selected Euro Area Countries

(Billions of euro, as of February 2013)

	Cost paid (a)	Cost derived from market rates			Implicit transfer p.a.		
		Bonds (b)	CDS 4/ (c)	Model 5/ (d)	Bonds (b)-(a)	CDS (c)-(a)	Model (d)-(a)
EU arrangements 1/ ECB 2/	5.8 20.3	20.5 49.7	20.1 48.1	31.0 70.2	14.7 29.3	14.3 27.7	25.2 49.9
Gross total (percent of euro area GDP)	26.1 0.3	70.2 0.7	68.1 0.7	101.2 1.1	44.1 0.5	42.0 0.4	75.1 0.8
Net total 3/ (percent of net contributors' GDP)	24.7 0.4	67.5 1.1	66.0 1.0	98.4 1.5	42.8 0.7	41.3 0.6	73.7 1.2

Source: IMF staff estimates.

1/ Includes EFSF, ESM, EFSM, and Greek Loan Facility.

2/ Includes increase in Target2 and currency issuance above allocation since December 2007.

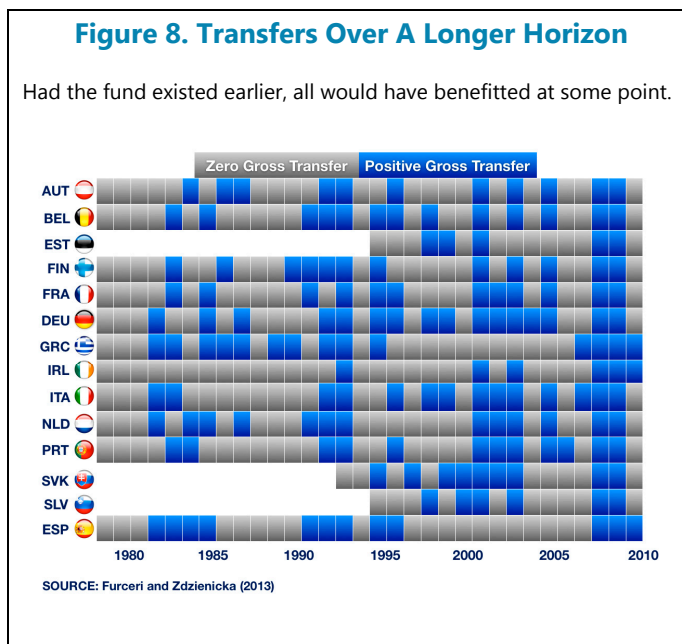
3/ Totals net of the contributions by Greece, Ireland, Italy, Portugal and Spain.

4/ Germany bond yield plus CDS spread. 10-year bond yield for Greece.

5/ Estimates for 10-year yields, see Fiscal Monitor, October 2012, p. 40.

34. Fiscal union not a zero sum proposition. It is often assumed that greater risk sharing would invariably morph into a system of permanent transfers, with financial costs systematically falling on those countries with a stronger tradition of fiscal prudence. So would risk-sharing mean redistribution? With appropriate safeguards, the answer is no.

- *All benefit in the long run.* Deeper integration would provide insurance from fellow euro area members against bad events, thereby also preventing worse outcomes for the membership at large. But while support could span over several years if shocks are persistent—as they appear to be in the current crisis—no system should provide permanent transfers to compensate for a permanent lack of competitiveness or enduringly low income levels. Put differently, risk-sharing means that *at any given point in time* countries facing relatively better economic circumstances would support countries facing less favorable



outcomes. But this does not mean that the same countries would *always* be on the receiving end. In fact, our analysis shows that the net beneficiaries would have varied greatly year-to-year, had a risk-sharing mechanism been in place over the last thirty years. Using the example of a rainy day fund described earlier, we find that since the late 1970s, all countries would have benefited from transfers at some point in time (Figure 8).

- *Small versus large countries.* That said, the support afforded by centralized stabilization mechanisms may vary between small and large countries. On the one hand, activity in smaller countries might be more volatile than in larger ones. Their economies might also be more prone to idiosyncratic shocks if their business cycles are less synchronized with the euro area—for example if they trade relatively more with non euro area countries. In that case, there could be instances where they resort more frequently to fiscal risk sharing mechanisms than larger euro area members. On the other hand, when larger countries are affected by country-specific shocks, to the extent that inflation evolution in these countries weighs relatively more on euro area-wide price indices, some stabilization is also provided through monetary policy support. Fiscal risk sharing mechanisms at the euro area level would thus naturally complement other policy instruments in fostering macroeconomic stability.

35. Immediate priorities. Crisis management measures taken since 2010 must remain in place to accompany the ongoing adjustment at the country-level. Progress toward a banking union is also in train. The current proposals to strengthen fiscal governance (Box 1) are a major step in the right direction, and any element of fiscal risk sharing will have to be preceded by further strengthening in

that framework and a stronger role for the center. However, deeper fiscal integration needs not and will not occur overnight, but defining a clear roadmap and beginning the journey will help anchor expectations, and as such contribute to instilling confidence in the resolve to a more stable monetary union.

- *Progress on fiscal backstop for the banking union.* However, one element is time sensitive: a euro area common fiscal backstop for the region's systemic banks should be put in place quickly to sever the negative sovereign-bank feedback loops and anchor confidence in the banking system. Hence, the single supervisory mechanism currently being put in place should be complemented by a firm and early commitment to establish a single resolution framework with adequate backstops.
- *A roadmap now for future fiscal integration.* Meanwhile, the momentum for longer-term reforms needs to be maintained. Agreeing on the details of the above elements, alongside a time-bound roadmap for implementation, will help anchor confidence in EMU viability. Governance reforms in train should proceed. Once the roadmap is agreed, legal requirements to support stronger center oversight, fiscal risk sharing and eventually borrowing at the center should be assessed in a comprehensive manner.

36. Legacy issues. The proposals laid out in this paper are for future crises. They will not tackle the existing debt overhang. Dealing with it will remain a delicate issue, pertaining to burden sharing rather than risk sharing.

- *Striking the appropriate balance.* On the one hand, relying entirely on national adjustment could trigger debt-deflation dynamics in the periphery, dragging the entire region into a period of prolonged stagnation, with heightened risk of financial instability. On the other hand, debt mutualization at this stage would be akin to selling insurance after the fact and could even reduce the incentives to restore competitiveness.
- *Conditioning support.* One compromise could be to transform part of the sovereign debt where it is excessive to common debt—in the sense that euro area entities would hold the debt—against a commitment from participating countries to repay that debt over time, and conditional on fiscal medium-term plans and structural reforms. The Debt Redemption Fund proposal, as put forward by the German Council of Economic Experts (2011), could be one such option.
- *Linking legacy issues to the roadmap.* More generally, resolving the legacy issues and providing a common fiscal backstop to banking union could provide for an embryonic framework for stronger fiscal risk sharing. It could also be a window of opportunity to generate momentum for some of the more ambitious reforms to strengthen fiscal governance and central oversight.

References

- Carvalho, I., 2013, *Trade Shocks in Europe*, IMF Working Paper, forthcoming.
- IMF, 2013a, *A Banking Union for the Euro Area*, IMF Staff Discussion Note 13/01, February 2013.
- IMF, 2014, *Designing a European Fiscal Union: Lessons from the Experience of Fiscal Federations?*, edited by C. Cottarelli and M. Guerguil, forthcoming.
- European Commission, 1977, *Report of the Study Group on the role of Public Finances in European Integration (MacDougall Report)*, available at http://ec.europa.eu/economy_finance/emu_history/documentation/chapter8/19770401en73macdougallrepvol1.pdf and http://ec.europa.eu/economy_finance/emu_history/documentation/chapter8/19770401en517macdougallrepv2_a.pdf.
- European Commission, 2012, *A Blueprint for a Deep and genuine Economic and Monetary Union—Launching the Debate*, November 30, 2012.
- European Council, 2012, *Towards a Genuine Economic and Monetary Union, Report by the President of the European Council, in collaboration with the Presidents of the Commission, the Eurogroup and the ECB*, December 5 2012.
- Farhi, E. and I. Werning, 2012, *Fiscal Unions*, NBER Working Paper No. 18280 <http://www.nber.org/papers/w18280>
- Frankel, J. and A. Rose, 1998, *The endogeneity of the optimal currency area criterion*, *The Economic Journal*, Vol. 108, No 449 (July), pp. 1009-25.
- Furceri, D. and A. Zdzienicka, 2013, *The Euro Area Crisis: Need for a Supranational Fiscal Risk Sharing Mechanism?*, IMF Working Paper (forthcoming).
- German Council of Economic Experts, 2011, *Euro area in crisis*, Chapter 3 of the Annual Report 2011/2012, available at www.sachverstaendigenrat-wirtschaft.de/
- Henning C. R., and M. Kessler, 2012, *Fiscal Federalism: U.S. History for Architects of Europe's Fiscal Union*, Peterson Institute for International Economics Working Paper, No 12/1.
- Jaumotte, F. and H. Morsy, 2012, *Determinants of Inflation in the Euro Area: The role of Product and Labor Market Institutions*, IMF Working Paper No 12/37.
- Pisani-Ferry, J., 2012, "The Known Unknown and Unknown Unknowns of EMU," *Bruegel Policy Contribution*, Issue 2012/18, October.
- Tommaso Padoa-Schioppa Group, 2012, *Completing the Euro: a Roadmap Toward fiscal Union in Europe*, <http://www.eng.notre-europe.eu/011-3317-Completing-the-EuroA-road-map-towards-fiscal-union-in-Europe.html>, June 26, 2012.

