
Bargaining the Euro: Making an EU Fiscal Union Politically Acceptable

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An EU Fiscal Union is being discussed as a way to avoid future euro-crises and guarantee the stability of the euro. So far, however, it has proved politically impossible, as EU countries are unwilling to give up their sovereignty on fiscal policy. This article develops a bargaining model that sheds light on how fiscal pooling could become politically acceptable. The model differentiates between the ‘South’ (net beneficiaries) and the ‘North’ (net payers). We find that fiscal pooling should be done via a combination of the fiscal instruments with the highest fiscal multipliers. Instead of a single Fiscal Union, we therefore propose a combination of fiscal pooling instruments which, together, add up to the sufficient level of fiscal integration.

Introduction

The recent approval of an EU Recovery and Resilience Fund (RRF), to address the economic consequences of the COVID pandemic, has led to renewed debate on the desirability of an EU Fiscal Union (Giovannini *et al.* 2020). Such a union has long been discussed as a way to avoid future euro-crises and guarantee the stability of the euro (Bargain *et al.* 2013; de Grauwe and Ji 2013). The 2008 financial crisis showed that the eurozone is not an optimum currency area (henceforth OCA, as defined by Mundell 1961), and was heavily affected by the asymmetric shock brought by the crisis (Jager and Hafner 2013). At the same time, eurozone governments have clearly shown their will to keep the currency together. Therefore, it can be argued that some level of fiscal integration has become unavoidable to allow the euro currency to survive (Bordo *et al.* 2011; Fidrmuc 2015; de Grauwe and Ji 2014). However, EU countries have so far been unwilling to transfer more funds to the EU level, as this is seen as an unacceptable

loss of sovereignty (Woźniakowski 2018). The RRF does not significantly change this situation, since it is only a temporary instrument, and does not constitute a permanent increase in the EU's fiscal powers (Schelkle 2021; Lionello 2020; Kaletsky 2020).

Although there is an extensive literature which explores the fiscal solutions to the euro crisis (Bargain *et al.* 2013; Bordo *et al.* 2011; Jager and Hafner 2013), the debate usually stays at an abstract level – what would be an ideal fiscal solution? – and does not focus on the political economy aspects which make such an ideal scheme difficult to implement. This article aims to fill that gap, by proposing a model that makes it possible to identify which solutions are efficient in making the euro currency both viable and politically feasible. While there already exists a body of literature that explores the political feasibility of fiscal integration, and investigates individual preferences and public opinion in this area (see, for example, Bremer *et al.* 2021; Baccaro *et al.* 2022; Burgoon *et al.* 2022), this article takes a different approach, by focusing on negotiating positions rather than on public opinion. This allows us to offer a new perspective on this topic, and to examine how preferences can be made to coincide so that political agreement can be reached. Our research thus has policy implications in relation to finding solutions that can satisfy the interests of different Member States, and help to reach a political agreement.

This article proposes a bargaining model that sheds light on how fiscal pooling could become politically acceptable, by showing which fiscal instrument(s) can be both effective in stabilizing the euro, and realistic given the EU decision-making framework. We model EU-level decision-making on fiscal integration as a bargaining game, as important decisions at EU level are taken, not by vote, but by consensus; a so-called ‘culture of consensus’ prevails in the Council of the EU (Heisenberg 2005; Novak 2013; Bailer *et al.* 2015), whereby most decisions are taken via unofficial trade-offs between Member States.

The players bargaining in this model are the European ‘North’ and the European ‘South’. The ‘North’ is assumed to include the wealthier EU countries, which would be net contributors in an EU-wide fiscal scheme, while the ‘South’ is assumed to include the less wealthy countries, which would be net beneficiaries.^a Bailer *et al.* (2015) show that at EU level most decisions are not according to a left–right divide, but according to a divide between rich Member States and the poorer, Southern and Eastern, Member States. The Council of the European Union can therefore be considered to include only these two types of countries.^b Fahrholz and Wojcik (2012, 2013) also model the EU as two players in a bargaining game following similar assumptions.^c

This article uses the Nash Bargaining Solution (Nash 1950) to model the negotiations surrounding a fiscal union. Nash Bargaining has been used for a similar question asked by Persson and Tabellini (1996), who also analyse risk sharing across regions of a fiscal union, when there are no private markets for international risk sharing (a realistic representation of financial markets). But Persson and Tabellini (1996) analyse theoretical set-ups for the kind of federal fiscal instruments allowed (full set of state-contingent transfers; output tax and transfer; federal social insurance), whereas we take as given the set of fiscal instruments used in Europe. An advantage of their model, however, is that they allow for heterogeneity within

a region, so that political decisions are made by the median voter, whereas we abstract from that complication. Persson and Tabellini (1996) find that if all state-contingent fiscal instruments are available, Nash bargaining leads to full insurance across countries. If only output tax/transfers or federal insurance are available, the Nash equilibrium leads to incomplete risk sharing across regions. Another finding of Persson and Tabellini (1996) is that because the region with a more favourable stochastic distribution of output is less harmed by the threat of autarky, it has more bargaining power.

In our article, North and South are bargaining to agree on the terms of a fiscal union; both see the stability of the euro as a common public good, yet while the North would prefer to minimize the amounts involved, the South would prefer to maximize them. Both parties will bargain until an agreement is reached because if they fail to agree the outcome will be worse for both. But, by agreeing to it, the North is effectively binding itself to the obligation of supporting South countries that need funding in the future. This article thus considers countries' bargaining positions as the key indicator of political feasibility, rather than public opinion. This is possible because, in this particular case, the bargaining positions are very closely linked with public opinion, as citizens in the North are weary of fiscal integration, while those in the South favour it (Howarth and Schild 2021; Matthijs and Merler 2020; Vasilopoulou and Talving 2020; Dolls and Wehrhöfer 2021).

We use Nash Bargaining to identify which type of fiscal arrangement is desirable for the eurozone. For that, we plot the stabilizing power of the different instruments against the size of the current transfer from North to South that a pooling of the instrument would imply. We find that, to be on the efficiency frontier which emerges as a solution to the game, it is necessary to use a combination of fiscal instruments, starting from those with the largest fiscal multipliers first. We conclude that the best option is a combination of instruments, for instance an EU-wide unemployment scheme and European Value-Added taxes on certain products. Instead of a single Fiscal Union, we therefore propose a combination of fiscal pooling instruments, which, together, add up to yield a sufficient level of fiscal integration. This solution is in keeping with a major finding from the literature on the political feasibility of fiscal integration – support for fiscal integration depends on the specific design and purpose of the fiscal instrument (Bremer *et al.* 2021; Beetsma *et al.* 2022; Kuhn *et al.* 2020). In addition, support is higher when the transfer meets a particular policy goal which is popular among voters (Bremer *et al.* 2021; Beetsma *et al.* 2022; Kuhn *et al.* 2020). Thus, while fiscal transfers without a specific purpose may be opposed by public opinion, targeted fiscal instruments attached to a particular policy goal are more likely to be acceptable to individuals across the EU.

The remainder of this article is structured as follows. The next section explains the debates and developments on this issue at EU level, and offers an overview of the key literature. The third section describes and justifies the model proposed in this paper. The fourth section translates the results obtained by the model into a concrete policy proposal. The final section concludes and identifies limitations and areas for future research.

The Shifting Debate on the Desirability of a Fiscal Union

A decade ago, the euro-crisis had led to multiple calls by scholars to step up fiscal integration (Bargain *et al.* 2013; de Grauwe and Ji 2013), as well as attempts by the European Commission to propose new avenues for integration (Van Rompuy *et al.* 2012; Juncker *et al.* 2015; European Commission 2017). However, those initiatives had largely failed in the face of reluctance by Member States, given the significant implications this would have for national sovereignty (Woźniakowski 2018; Maris 2020). The EU's response to the COVID-19 crisis, and the creation of the RRF, have brought a new twist to this debate: in the context of a severe crisis, the creation of a temporary but significant fiscal instrument suddenly became amenable to agreement between Member States. This shows that fiscal integration is not impossible, but depends on the political context and on the type of fiscal instruments on offer.

The literature on the political feasibility of a fiscal union offers invaluable insights in this context. Bremer *et al.* (2021) and Beetsma *et al.* (2022) examine the preferences of individuals in different EU countries in relation to a COVID-19 pandemic recovery fund, and find that the design and purpose of fiscal instruments significantly affects support. Burgoon *et al.* (2022) and Kuhn *et al.* (2020) also examine how policy design affects public support, focusing on options for European Unemployment Risk Sharing, and reach a similar conclusion. Baccaro *et al.* (2022) examine how preferences towards EU fiscal integration are affected by recent developments and by information processed by individuals. Both Howarth and Schild (2021) and Dolls and Wehrhöfer (2021) focus specifically on German preferences regarding fiscal integration, and on which factors underpin them. This body of literature offers invaluable insights into how public opinion responds to potential fiscal integration, and the article builds on them by exploring how Member States' bargaining positions (themselves heavily influenced by public opinion) can be brought together into consensus, so that a political agreement can be found.

This debate is also closely connected with the literature, which explores the impact of fiscal integration on national sovereignty and on the EU's democratic deficit (Maris 2020; Fabbrini 2013; Moravcsik 2012). Maris (2020) investigates whether monetary integration reduces national sovereignty. Maris and Manoli (2022), Maris and Sklias (2020), Fabbrini (2015) and Schild (2020) look at whether monetary integration affects the legitimacy of the EU by leading to some Members States gaining power over others. Overall, the conclusion from this body of literature is that, while on the one hand fiscal integration appears to worsen the democratic deficit, on the other hand, given the existence of the euro, the absence of fiscal union leads to legitimacy problems, so fiscal integration is actually the best way to reduce the democratic deficit (Moravcsik 2012). Finding a realistic path towards further fiscal integration is thus not only needed to ensure the stability of the euro, but also to guarantee its legitimacy. The next sections attempt to offer such a solution.

The Model

Our model is an adaptation of a static Nash Bargaining Solution (henceforth NBS) to the negotiations between EU countries on which fiscal instruments should be pooled at EU level. Although NBS has, along with other game theoretical methodologies, been applied to the negotiations surrounding the Greek bailout (Fahrholz and Wojcik 2013), it has not been applied frequently to analyse the negotiations between EU countries' representatives in the Council of the EU on a particular issue. Persson and Tabellini (1996) use a NBS to discuss the implication of different theoretical sets of fiscal instruments for the design of a fiscal union. Schneider *et al.* (2010) use the Nash Bargaining Solution to analyse which factors affect legislative decisions by the Council of the EU. Their analysis is therefore focused on Council decisions as a whole, as opposed to analysing the negotiations in one area in particular.

It seems appropriate to model EU-level decision making as a bargaining game between the richer 'North' and the poorer 'South', as important decisions at EU level are taken, not by vote, but by consensus. As already mentioned, a 'culture of consensus' prevails in the Council (Bailer *et al.* 2015), whereby most decisions are taken via unofficial trade-offs between Member States. This applies particularly to EU spending, as countries often accept being net contributors to a policy in exchange for a having more say in another policy (Kauppi and Widgren 2004). EU countries' high-level government officials debate those issues, often informally (as opposed to taking a formal vote), and come to a decision that is acceptable to all. Nevertheless, we acknowledge that the concepts of North and South are very simplified. First, there are important differences in policy preferences between countries in the regions roughly labelled as North and South. Second, the classification can change as a function of the crisis: not all crises affect the two groups similarly. For instance, the 2022 energy crisis is hurting Germany disproportionately. Third, preferences within countries are not homogeneous, although the political economy literature has used the median voter's preference to resolve this heterogeneity. However, despite these limitations, this assumption is used frequently in the EU studies literature (see, for example, Bailer *et al.* 2015; Matthijs and Merler 2020; Fahrholz and Wojcik 2013), and we follow those works in seeing it as a useful (albeit imperfect) tool for modelling the interests of EU countries within a simple and clear framework.

We highlight two dimensions in the bargaining process: the stabilizing power of the fiscal instrument (i.e. the effect of the fiscal transfer on the private sector, measured by GDP growth in the tradition of what is called automatic stabilizers – see Blanchard and Leigh 2013; Buti *et al.* 2002; van den Noord 2000) and the size of transfers that applying the instrument would entail (with immediate consequences on its political feasibility). Our analysis therefore does not take into account other factors which have been identified by the literature as drivers of preferences over fiscal union. Bremer *et al.* (2021) usefully classify these drivers into different dimensions of importance for citizens: the purpose of policy instruments (for instance, supporting the young unemployed, supporting healthcare); the duration of support

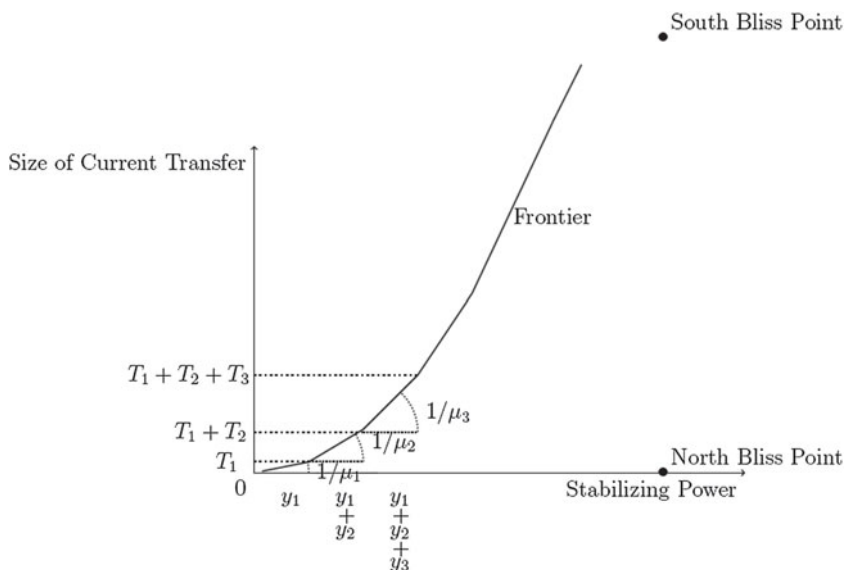


Figure 1. Fiscal instruments.

given; risk-sharing and redistribution; and how decisions are made on the money spent. Beetsma *et al.* (2022) also note that progressivity of taxation and long-run redistribution to poorer countries are important aspects of populations’ preferences over the design of an EU fiscal capacity. Our analysis is in the macroeconomic tradition of public finance and focuses on the macro-stabilization properties of different fiscal instruments. This is why we model North and South preferences looking only at the risk-sharing and redistribution dimensions of preferences for a fiscal union.

Figure 1 first presents the different fiscal instruments (I_1, I_2, \dots, I_n) available for a fiscal union in a space representing these two dimensions: on the horizontal axis is the stabilizing power $y_i, i=1, \dots, n$, that different instruments would provide, expressed in euros, and on the vertical axis is the size of transfers T_1, T_2, \dots, T_n (also expressed in euros) that choosing such instruments would currently imply, i.e. given the large divergences in output gap within the EU. The (additional) stabilizing power y_i of an instrument index by i is equal to the fiscal multiplier (μ_i) times the size of the current transfer T_i .

For example, if unemployment benefits for those who lost their jobs in the past two years were entirely centralized at EU level, this would effectively result in a certain amount of government revenue from the North being used to help unemployed people in the South. It is hypothesized that the South would like fiscal union to lead to large transfers and to high stabilizing power for now and the future, whereas the North, although committed to a working Union and thus to powerful stabilizers, would prefer to minimize current transfers.^d

The time horizon of the model is one period, i.e. we assume governments only take into account current transfers. This implies that we push the argument that governments are myopic and thus policy is time-inconsistent to its limit, for

simplicity. The model thus assumes fixed exogenous preferences for both the North and the South. We will later see how the outcome of the bargaining model changes these preferences (exogenously).

If instrument I_1 (e.g. unemployment benefits for the young) is merged at the EU level, and applied with the maximum scope possible (e.g. all the young eligible for the most generous unemployment benefit in the EU), the amount T_1 is transferred from the ‘North’ to the ‘South’ and GDP in the South is stabilized by y_1 . The slope dT_1/dy_1 is thus the inverse of the fiscal multiplier μ_1 . In Figure 1, fiscal instruments have been ordered by a decreasing fiscal multiplier, and what we call the ‘Frontier’ thus describes the cumulative GDP impact for the cumulative fiscal transfers implied by the set of fiscal instruments that have been pooled, adding instruments one by one, from the one with the highest multiplier to the one with the lowest multiplier, and maximizing the scope of each instrument before adding a new one.^e

It is important to note a limitation of the discussion of fiscal integration only in terms of existing, traditional, fiscal instruments and their fiscal multiplier and automatic stabilizer property. Automatic stabilizers work well when economies are confronted with demand shocks, which lead to concurrent reductions in GDP and in household incomes (in particular because of unemployment). These demand shocks have been dominant in Europe over the period 1990–2020, but the two most recent crises (the COVID-19 pandemic and the inflation shock of 2021–2022) also involved major supply shocks, which is why the traditional indicators of recessions (unemployment, deflation) have not turned red.^f Automatic stabilizers do not stabilize economic activity well in the face of supply shocks (Blanchard 2000) and, because of this, the pandemic required new (and somewhat heterodox) policy responses. In the largest European countries, the biggest fiscal programmes during the pandemic were not automatic stabilizers or even discretionary changes to tax rates and spending, but were wage subsidies, expansion of short-time work, and government guarantees (IMF 2021). The fiscal multipliers of these measures remain difficult to assess. Because these fiscal instruments are appropriate only in extreme crises (Battersby *et al.* 2022), we focus in this article on the more traditional fiscal instruments and recessions.

Given the fiscal possibilities presented, the bargaining problem is discussed in the context of Nash’s (1950) bargaining approach with two players, representing the ‘North’ and the ‘South’. Figure 2 shows the bargaining problem assuming, for the sake of simplicity, that the Frontier is differentiable. Since a convex combination of strategies should also be possible (including one-off transfers that have no macroeconomic stabilizing power), the feasible set is the light shaded area to the north-west of the Frontier.

The North’s indifference curves point towards the bottom right corner of the chart, with a higher stabilizing power but lower North–South transfers as one moves from one indifference curve to another one further down and further to the right. The South indifference curves point towards the top right-hand corner of the chart, with higher stabilizing power and larger transfers as one moves from one indifference curve to another one further up and further right. The threat point, at which there

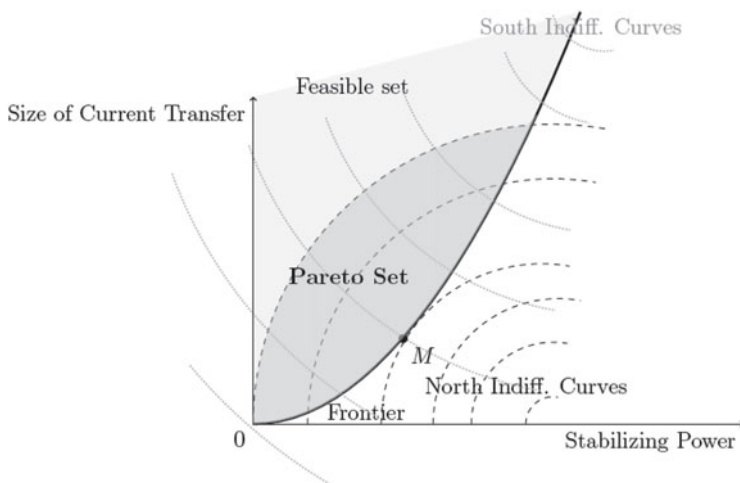


Figure 2. Bargaining problem.

is no cooperation and thus no European-wide action for fiscal integration is assumed to be the origin (0). The threat point and the possibility Frontier define a first Pareto Set, which is the set of points where both the North and the South are better off than in the absence of any action (we will next show this Pareto Set is too broad and that a smaller set is more relevant). In other words, when bargaining, the North faces a trade-off between stabilization and fiscal support, the South is interested in both stabilization and fiscal support, and the solution has to be such that both parties reach an agreement.

The graphical presentation in Figure 2 is such that the (non-cooperative) optimum solution for the North (the point of tangency between the frontier and North's indifference curve – point M) is at a higher indifference curve than the threat point, for both North and South. This seems a reasonable assumption given the commitment by the Northern countries to deepen European integration (even though this commitment has not led yet to significant fiscal integration). Since M is within the Pareto set and on higher indifference curves for both South and North, the status quo would be unlikely to be maintained. Indeed, a take-it or leave-it move by the North to propose point M (as with any point in the Pareto set, of course) would be accepted by the South. This also means that point O is not a credible threat for either parties, and thus the negotiation of which point to choose within the Pareto Set will not rely further on the threat point O.

Indeed, it appears that not all the Pareto set initially defined is relevant as a bargaining outcome. For any point A in the Pareto Set but not on the Frontier (see Figure 3), there exists a point B that leaves the South indifferent whilst being on a higher indifference curve for the North. Thus, bargaining would never yield an outcome that is not on the Frontier. This means that pooling of fiscal instruments that have zero or near zero fiscal multipliers (for instance, pooling of debt) is not efficient, in the sense of achieving the strongest economic stabilization for a given

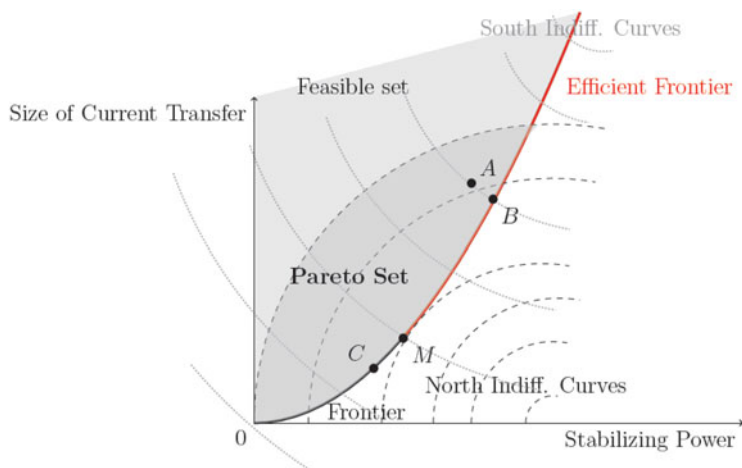


Figure 3. Efficient frontier.

fiscal transfer, and thus would not be a desirable solution to the design flaw of the Eurozone.

Finally, one should note that if prisoner's dilemma equilibria can be ruled out (because of the capacity and willingness of the different policy actors in the Council to cooperate) bargaining would only lead to points on the Frontier that are also on the right of M – what we will call the 'Efficient Frontier'. This is because on the left of M, say at point C, M is a superior equilibrium for both North and South. Thus, we conclude that the relevant set of bargaining outcomes is on the Efficient Frontier.

There are, of course, many more dimensions than the ones discussed previously. First, in periods of large imbalances, it is rational for the North to defer decision on fiscal integration. This can be simply shown by comparing the bargaining problem with a future period with smaller imbalances. For any given fiscal instrument that becomes pooled (i.e. for a given Stabilizing Power), the size of transfer is smaller. Thus, the Frontier moves to the right and the Pareto Set becomes strictly larger (Figure 4). As a result, the optimum for the North moves from point M to point N. On one hand, the improvement in the trade-off between transfers and power is beneficial, since the Pareto Set widens, and indeed N is a solution with stronger stabilizing power. On the other hand, this chart shows that the optimum for North and the Efficient Frontier move to a higher indifference curve for North; thus it is optimal for the North to 'drag its feet' in periods of large imbalances.

However, the feasible set is not the only element of the bargaining problem that can move as time passes by. The preferences of policymakers can also change, and in particular the North's acceptance of transferring resources to the South could be eroded if crises become less acute. This situation is represented by Figure 5, where the indifference curves of the North are flatter, i.e. where the transfer accepted in order to improve stabilizing power is smaller. The North optimum moves from

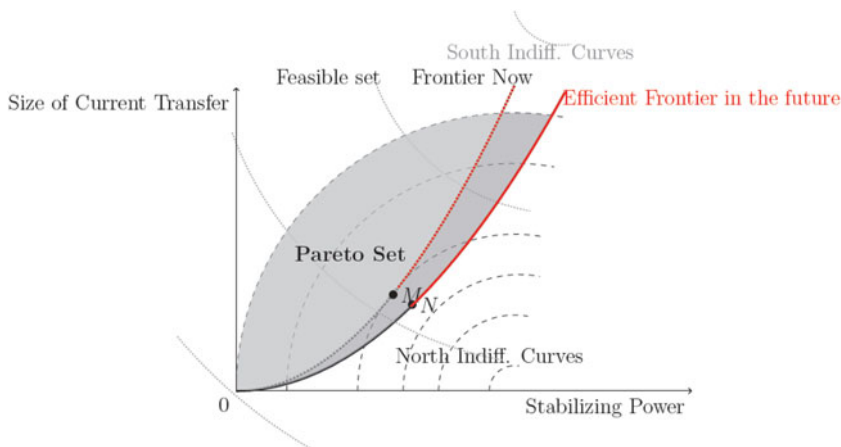


Figure 4. Bargaining problem if future imbalances are smaller.

M to P, where stabilizing power is lower and transfers are smaller. As a result, the Efficient Frontier extends in a direction that is detrimental to the South.

Overall, the bargaining model suggests that:

- (i) Fiscal instruments that have the largest multipliers should be pooled first; a bargaining solution would never lead to the use of an instrument that has a lower multiplier than another available instrument;
- (ii) However, the focus on a unique instrument for fiscal union is misguided, because the stabilizing power of a unique instrument is not large enough; a solution to the lack of fiscal integration in the eurozone will require that fiscal instruments with smaller multipliers also be used, although only once the more efficient instruments have been used to their full extent;
- (iii) The North has an incentive to defer decisions on fiscal union when imbalances are large;
- (iv) If decisions are deferred, this could lead either to more ambitious union plans or to less ambitious union plans (as shown in Figure 5), depending on whether the shift of the North preferences (‘the crisis has passed, so there is no need for union anymore’, Figure 5) outweighs the shift of the Frontier (‘we can proceed now with fiscal union since the current size of transfers will be acceptable by our electorate’, Figure 4).

From a dynamic perspective, it is also useful to note that the trade-off may change over time. The North has an interest in delaying the measures if it believes that a smaller transfer would achieve the same result in the future. This could be because, when the economy is performing better, a smaller transfer results in the same stabilization. This could also be because time leads to more convergence between North and South (Frankel and Rose, 1997), or at least policymakers hope that convergence will continue, for instance thanks to structural reforms. The trade-off represented is therefore between short-term, narrower, national interests (how much needs to be

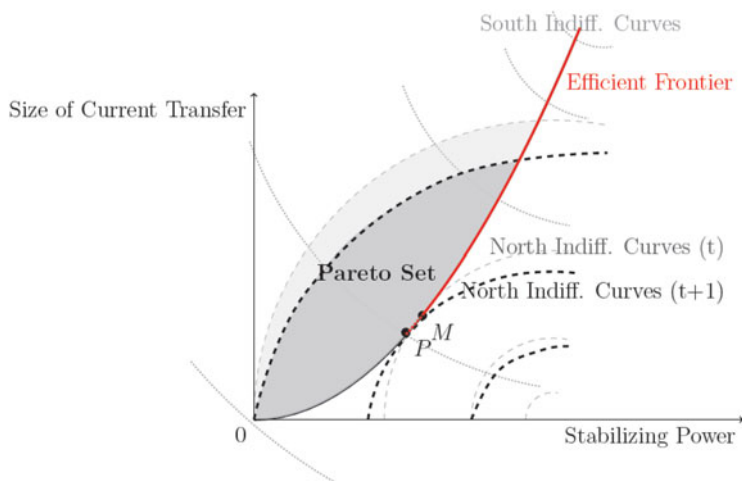


Figure 5. Bargaining problem as North's preferences change.

transferred from the North to the South) and long-term, wider, EU interests (ensuring the viability of a common currency).

Options for Fiscal Integration

Having shown in our model under what conditions fiscal integration can guarantee both efficiency and political realism, we now proceed to identify the actual policy measures that would implement those results. This section therefore explores the different options for fiscal integration. We only consider fiscal integration because it is argued that all other policy options to turn the Eurozone into an OCA are unrealistic in the short-term. Increasing labour mobility at EU level to the degree necessary is not possible due to cultural and language differences. Flexibility in wages and prices could not realistically be modified in the short term. Ending asymmetric shocks over the entire area of the Eurozone is again not viable in the short term, and may not ever be possible to achieve through policymaking. This leaves fiscal integration as the only possible option (Fidrmuc 2015; de Grauwe and Ji 2014; McKinnon 1963).

Despite the attention generated by the EU's new Recovery and Resilience Fund (RRF), set up to address the COVID-19 pandemic, scholars agree that this initiative does not constitute the foundation for a fiscal union (Schelkle 2021; Kaletsky 2020) and is not sufficient to provide the Eurozone with the level of fiscal integration it needs to be sustainable in the future (Lionello 2020). This is because, although it does contribute towards preventing economic divergence within the Eurozone as a result of COVID-19 (Watt and Watska 2020), it is only a temporary instrument, and does not constitute a permanent increase in the EU's fiscal powers (Lionello 2020).

The EU budget is the most visible form of European fiscal integration, but its size is too small to allow it to play a role and there is widespread reluctance to increase it,

particularly given that it is not being used in an efficient way (Sapir 2003). As a result, the debate on European fiscal integration has developed independently from the debate on EU budget reform (Dullien and Schwartz 2009). As will be explained below, there are more efficient ways (from a political economy perspective) of achieving stabilization.

The stabilization funds that were set up to deal with the last, still ongoing, euro-crisis (as part of the European Stability Mechanism – ESM) are the sources of loans, not grants, which limits their power, especially for persistent shocks. The attempt to give them a short-run stabilization power was largely a failure because they were combined with so-called austerity programmes (de Grauwe and Ji 2013). Those programmes largely backfired, yielding weak economic results, large social costs and democratic deficit problems.

We therefore focus on other, more effective, fiscal instruments, since our bargaining model illustrated that forms of fiscal integration with strong stabilization power are the only viable ones from a political economy perspective. In other words, the wealthier countries of the ‘North’ are open to fiscal transfers only to the extent that they help the weaker countries of the ‘South’ avoid crises in bad times. That is because the only motivation for the ‘North’ to finance the ‘South’ is to avoid euro-wide crises, by guaranteeing that the South can withstand economic shocks more easily.

A ‘blank cheque’ from the North to the South is excluded, as it would not necessarily help the euro survive politically, since there would be no control on how the South governments spend the money (Dullien and Schwartz 2009).⁸ Similarly, an expansion of the existing EU budget to a size sufficient to achieve stabilization would be politically impossible, as it would involve providing the EU with very large discretionary spending powers. We also exclude so-called Eurobonds from our analysis, as this solution is effectively a fiscal transfer with zero economic stabilization power, and would therefore only address the symptoms (interest rate differentials) rather than the actual problem (Favero and Missale 2012). It therefore makes more sense to use other fiscal instruments, for which the same stabilization power can be achieved with less fiscal centralization.

That is why we consider automatic fiscal stabilizers to be the relevant policy instruments in this context. Automatic stabilizers are fiscal instruments whose normal operation ‘automatically’ attenuates the economic cycle (Christiano 1984). For example, in an economic downturn, some benefits automatically increase – unemployment benefits, as more people become unemployed, housing benefits and food vouchers, as more people become eligible, and so on. Similarly, taxes can also work as automatic stabilizers. In a downturn, lower salaries and unemployment lead to less consumption, thus reducing VAT revenue. Lower salaries and unemployment lead to lower social security contributions from employees. Less good performance by companies leads to lower contributions in terms of corporate taxes.

The key intuition is that these policy instruments require a smaller increase in EU integration than their alternatives. Fiscal integration via a common budget large

enough to achieve fiscal stabilization would vastly increase the power of the EU. It would transform it from a mainly legal union into a fiscal one. By contrast, the use of automatic stabilizers would not transfer any fiscal powers to the EU level, since the design of the scheme and the resulting transfers would be decided in advance, by the Member States. The European Commission would not have any decision-making powers. There would be no additional 'EU money', as the funds would be transferred directly between Member States' budgets.

Having argued that the fiscal instrument needs to be an automatic stabilizer,^h we now proceed to examine the different forms of automatic stabilizers available. Although estimates of fiscal multipliers vary widely across models, fiscal instruments with a greater stabilization impact are typically thought to include unemployment benefits, personal income taxes and social security contributions, followed by corporate taxes (van den Noord 2000). However, personal income tax is often collected with a one-year delay, and corporate taxes can be deferred by various accounting techniques, so these two instruments may therefore not be ideal with respect to the criterion of high sensibility to the cycle (criterion (i) in the third section of this article), leaving unemployment benefits as one of the most promising instruments.

Given that unemployment is the economic variable most closely related with the economic cycle, an unemployment scheme offers the way to obtain most stabilization out of the same amount of fiscal integration. In other words, a smaller amount of fiscal integration is needed in order to achieve the stabilization necessary to make the Eurozone viable. Since unemployment in the event of an asymmetric shock cannot be averted through devaluation or expansionary fiscal policies because of euro membership, there is also a logical justification for all Euro members to fund this scheme, since it is needed as a consequence of the common currency. Finally, this scheme would not lead to permanent transfers between member states, because it would be activated only in case of asymmetric shocks, and the benefits to the South would accrue for a short period of time following the shock. All this would minimize the opposition of countries that would be net payers into the scheme.

Among possible fiscal instruments, the proposal for a European unemployment scheme has begun to raise interest among analysts and policymakers. As proposed by Dullien (2007, 2014), a European Unemployment Scheme should be based on a certain share of countries' national unemployment contributions being paid into a European fund, rather than the national fund. To ensure that these are not permanent transfers, benefits would only be paid for a short period of time, for example one year. Moreover, benefits would only be paid to those who were in employment for a certain amount of time before the start of the scheme, to ensure that long-term unemployment is not covered. This scheme nonetheless ensures that the scheme contributes to macroeconomic stabilization, as countries benefit from it when their level of unemployment rises.

As argued by Dullien (2007, 2014) such a scheme could partly substitute for a common fiscal policy, as it would effectively result in transfers from the core to the periphery in times of crisis. It would thus provide a replacement to the transfer system in place in the United States (Feyrer and Sacerdote 2013). The European

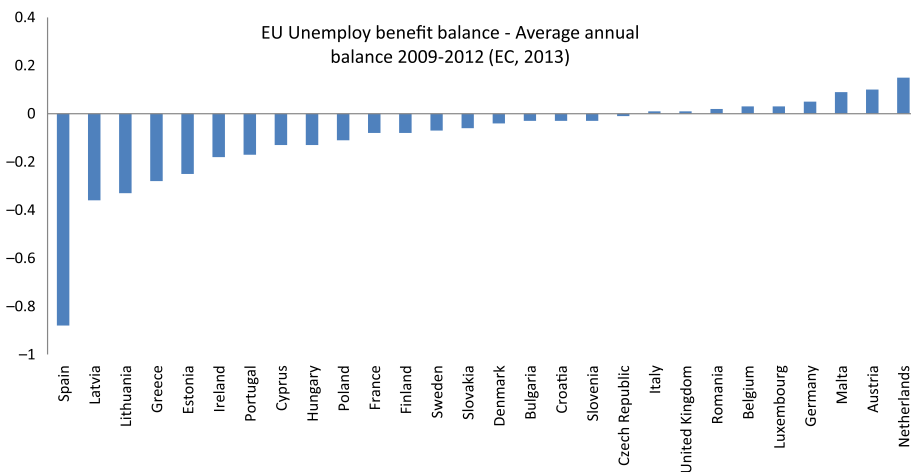


Figure 6. Estimated impact of an EU Unemployment benefit scheme during the eurozone crisis. Source: European Parliament (2013).

Commission has also been favourable to an EU-wide unemployment benefits scheme (European Commission 2013a).

However, our analysis finds that this instrument, while efficient, would not be sufficient by itself due to the small amounts involved. Instead, a combination of instruments is needed to ensure the viability of the euro. The European Parliament (2013) estimated the impact the scheme would have had if it had been in place between 2009 and 2012 – that is, what percentage of the GDP variation due to the crisis would have been offset by the scheme.ⁱ Its findings are given in Figure 6. For example, in the case of Spain, the system would have covered between about 20 and 30% of the recession. According to Dullien (2007, 2014), this constitutes a ‘sizable stabilization impact’. However, is that impact sufficient to ensure the viability of a monetary union?

The relevant literature appears to show that it is not. Gros argued for instance that ‘a fiscal shock absorber mechanism which smooths only one-fifth of the shock would have been of limited value in the euro crisis’ (Gros 2014: 203). This implies that a European Unemployment Benefits scheme would not suffice on its own.^j Other scholars point to a comparison with the United States to indicate that larger transfers would be needed. In the example of Florida provided by Krugman (2012), the Federal government transferred 4% of GDP to Florida, divided between unemployment benefits (US\$3 billion), poverty alleviation programmes (US\$3 billion), and reduced tax receipts (US\$25 billion). The focus on unique instruments for fiscal union is therefore misguided: a working fiscal union will require more than one instrument since the size of the most efficient instrument (say, unemployment benefits) would pale compared with the size of transfers required.

We therefore propose, in accordance with the results of our model, to use a combination of fiscal instruments. The European Unemployment Scheme could be the first

instrument in our range, and other instruments could include European Value-Added taxes on certain products including, for example, an EU-wide demerit tax on cigarettes and alcohol. The Eurozone's 'fiscal union' would therefore consist of a combination of pre-set rules relating to each of these fiscal instruments, whereby, in response to an economic shock, part of those taxation revenues would automatically be transferred from the Eurozone countries least hit by the shock to those most affected.

Instead of a single Fiscal Union, we therefore propose a combination of fiscal pooling instruments, which, together, add up to the sufficient level of fiscal integration. This solution minimizes both explicit and implicit reallocation of policymaking power to the EU level, making it viable at a time when there is little appetite for further EU integration.

Conclusion

This article has discussed the political economy constraints in the pooling of fiscal instruments in view of a functioning monetary union. In particular, the article proposed a theoretical framework for analysing EU decision-making in this area. We also focused on the properties that fiscal instruments need to have to be attractive options for pooling, discussing in particular the trade-off between high stabilization power (which is needed to effectively manage asymmetric cycles) and the current size of transfers (which are not approved by the electorate and thus that governments need to minimize).

Current debates at EU level provide further support for our model. Scholars and policymakers are calling to build on the momentum created by the one-off RRF measures and create more permanent fiscal transfer mechanisms (Watt and Watska 2020; Lionello 2020; Strupczewski 2021). The European Commission has also long been calling for fiscal pooling to support the monetary union (European Commission 2013b, 2015) and this call has been echoed by some of Europe's leading politicians, including French president Macron (Macron 2017). The EU 2015 'Five Presidents Report' (European Commission 2015), representing the view of the main EU institutions, called for a 'mechanism of fiscal stabilization for the euro area' to 'improve the cushioning of large macroeconomic shocks'. That report did not propose a specific mechanism, saying instead that an expert group should be set up to design it. However, it pointed out that the mechanism should not lead to permanent transfers, be designed as to avoid moral hazard, be part of the EU framework and focus on preventing, rather than managing, crises. It also suggested that the scheme should be implemented in a gradual way, and be preceded by measures to enhance cohesion and fiscal coordination between Eurozone countries. This is in line with this article's suggestion that fiscal pooling will be more acceptable to the North once the transfers necessary become smaller.

In particular, a European unemployment scheme has been widely discussed within the European Commission (European Commission 2013a; Andor 2014),

under the justification that it would be well related to the cycle, have a high multiplier, and contribute to political integration. During the eurozone crisis, unemployment levels diverged markedly between the North (e.g. less than 5% in Austria and Germany) and the South (more than 20% in Spain, Greece, Portugal), which would have implied large transfers across countries, one of the reasons this proposal did not attract political support.

Our model indeed shows that the North has incentives to defer a decision on fiscal union. Whether a deferred decision would lead to an ambitious or to a watered-down proposal will depend on the shift in policy preferences and the convergence in the economic situation between North and South.

The model has several important limitations, which would need to be addressed in future research. First, the time dimension has been discussed in a simplified way, in order to focus on the two other dimensions of interest. But the time dimension of the model could be improved in at least two respects: (i) the entire path of future transfers (appropriately discounted) could be taken into account in the objective function of governments; (ii) in the absence of a commitment technology, the framework could model what happens when governments take into account the effect of their decisions on future governments (as in Alesina and Tabellini 1990; or Debortoli and Nunes 2013). Second, the model abstracts from countries in the middle-ground (e.g. France) that can neither be classified as South or North, and that could broker arrangements. Other negotiation or voting models could shed light on the role of third countries in such situations.

Third, our model assumes equal bargaining power between North and South for simplicity, but a growing body of literature argues that the bargaining power of the North is higher than the bargaining power of the South in the context of fiscal integration (Maris and Manoli 2022; Maris and Sklias 2020; Schild 2020; Fabbrini, 2015). Future research could adapt this model to factor in that inequality.

The model proposed could also be extended to other areas of EU studies. The bargaining process between a European North and a European South can potentially apply to other areas of EU policymaking in which financial considerations are involved. The trade-off between short-term, narrow, national concerns and longer-term, wider, EU-wide concerns is a key feature of several areas of European integration.

Competing Interests

The authors declare there are no competing interests.

Notes

- a. For simplicity we consider that the North is composed of the countries that are currently net contributors to the EU budget while the South is composed by the net beneficiaries of the EU budget.
- b. This justifies our underlying assumption that the North group and the South group are fully coordinated and can be modelled as one single player.

- c. Those authors identify as the two players ‘Twin Deficit Countries’ (TD) and ‘Current Account Surplus Countries’ (CA).
- d. This implies that the North governments are fully myopic and apply a discount factor of 0 to future transfers in their objective function. Although this is an extreme assumption, modifying to take into account a discount factor higher than 0 but lower than 1 would not affect our results.
- e. It will become clear below why this presentation (ordering the instruments with highest multipliers first) is sensible. Intuitively, we will show that priority for a fiscal union should be to pool instruments with the highest fiscal multipliers first.
- f. Economic activity was first restricted to prevent COVID-19 contagion (the Great Lockdown, see IMF 2020). Labor supply was then curtailed by the Great Resignation (Pizzinelli and Shibata 2022). As a result, unemployment rates have remained relatively low despite the output losses due to the pandemic. The current inflation crisis, which is hurting real household incomes, is also driven by supply shocks (including the energy crisis due to the war in Ukraine) and is occurring as the EU unemployment rate is, at 6%, much below historical average.
- g. For example, Majocchi and Rey (1993) had suggested a scheme of fiscal transfers specifically targeted at offsetting shocks. Aside from the problems already mentioned, such a scheme would suffer from the difficulties in estimating the output gap (European Commission 2013b).
- h. Automatic stabilizers have the further advantage that they avoid problems inherent in discretionary fiscal policy, such as time lags in detection, decision and policy impact (Andersen, 2005).
- i. The analysis carried out has as a reference period of 2009–2012 of the euro-crisis, but is relevant for any asymmetric shock with unemployment as the main negative effect of the business cycle.
- j. Instead, Gros suggests that large shocks (over 1% of GDP) should be fully offset, while smaller shocks would not require any transfer. This implies that, in the case of large shocks, the transfer needed would be five times larger than what is obtained with an unemployment insurance scheme.

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