

European Stability Mechanism



## EU fiscal rules: reform considerations

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This paper discusses the EU fiscal framework reform. It reviews the EU fiscal governance history and reforms, and identifies key challenges. It then takes stock of reform proposals made so far, and finally formulates a reform idea that reconciles the post-pandemic macroeconomic context with existing contributions by leading economists and institutions.

**Olga Francová, ESM**

**Ermal Hitaj, ESM**

**John Goossen, ESM**

**Robert Kraemer, ESM**

**Andreja Lenarčič, International Monetary Fund (IMF)\***

**Georgios Palaiodimos, Bank of Greece\***

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\* Andreja Lenarčič and Georgios Palaiodimos contributed to this paper when employed at the ESM.

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## Executive summary

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- The pandemic changes the macroeconomic context.** The pandemic crisis hit euro area economies hard, expanding public debt to record highs. National government intervention cushioned the downturn and mitigated social hardships, and EU institutional support helped keep borrowing costs low. The Stability and Growth Pact's (SGP) general escape clause was activated to help EU Member States adequately respond to the crisis and stabilise their economies. Now, new economic reality necessitates a fresh look at the European fiscal rules.
- The EU fiscal framework contributes to fiscal discipline.** The EU fiscal framework helped improve fiscal policymaking and coordination because the euro area's pre-pandemic aggregate fiscal position was stronger than in other jurisdictions, although it charted little progress on fiscal buffers during good times. Successive reforms aimed at strengthening the fiscal framework added complexity and made it more difficult to operate, undermining compliance and credibility.
- Reform without a treaty change could accommodate the new economic reality.** In this paper we suggest ways to simplify the rules to acknowledge the new economic reality and higher debt-carrying capacity, possibly without the need for any treaty change or national parliament ratifications. Political support could help resolve other legal constraints and support a shift to a new public debt reference value.
- For example, a two-pillar approach centred on two limits: 3% fiscal deficit and 100% public debt.** In light of existing proposals, we formulate a two-pillar approach that utilises a 3% fiscal deficit ceiling and a 100% general government debt reference value that incorporates an expenditure rule. Expenditure ceilings that track trend growth would replace existing medium-term objectives expressed in structural balance terms. A combination of a primary balance and an expenditure rule would help anchor the pace of debt reduction for countries with public debt above 100% gross domestic product (GDP), and the 100% debt ratio would converge at a pace of one twentieth per year – unless serious economic circumstances or an investment gap justified deviations. Breaching the 3% deficit limit or primary balance target would trigger an excessive deficit procedure and, in exceptional circumstances, allow recourse to a possible fiscal stabilisation instrument that would offer additional breathing room. Disbursements of EU funds under specific conditions could further incentivise fiscal discipline. An alternative solution that embraced the current debt reference value is possible, but carries several shortcomings.

# Introduction

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**Fiscal rules encourage discipline conducive to economic growth and macroeconomic stability, but no universally applicable fiscal rules exist.** There is no unique solution striking the right balance between the need for debt sustainability and fiscal stabilisation. The changing economic environment and policy challenges hinder designing rules that are at the same time simple, flexible, and enforceable.

**The SGP remained a good policy anchor for EU countries.** The fiscal rules adopted in the 1990s aimed to limit policy-makers' discretion and encourage responsible policies across diverse economies. Successive reforms introduced new elements addressing changes in Member States' preferences and economic realities.

**The pandemic crisis radically changed the economic landscape, triggering temporary suspension of the fiscal rules.** The crisis brought higher debt-financed spending, with its aftermath potentially further burdening public budgets. The monetary policy response to the crisis kept interest rates low and debt-servicing burdens manageable, making higher deficit and debt levels tolerable for the markets.

**Post-pandemic fiscal rules should provide credible policy guidance.** Well-designed and transparent rules can boost fiscal performance and prevent policy missteps. In the medium-term, revised rules can help phase out pandemic-related discretionary fiscal measures. In the long-term, they can strengthen commitment to fiscal positions stabilising public debt levels.

**This paper examines avenues for EU fiscal rules reform.** It takes stock of key proposals and reviews them against SGP evolution within the current economic environment of high public debt and low interest rates. The paper is structured as follows: Chapter 1 summarises the history of the SGP, including its track record and changes. Chapter 2 identifies challenges stemming from the current economic environment and examines reform options. Chapter 3 suggests a way forward to a revised set of fiscal rules, including legal, institutional, and economic considerations. Chapter 4 concludes with an overview of main reform elements.

## **1. Background: the current rules, and why change is needed**

*EU fiscal rules, peer pressure, market forces, and unyielding national frameworks and institutions supported fiscal discipline by constraining government discretion. The SGP helped reduce overall euro area debt faster than in peer jurisdictions, especially after the sovereign debt crisis. Nevertheless, the fiscal discipline and sound public-finance track-record across the euro area remains mixed. The need for improvement is underscored by a failure to prevent procyclical effects due to the lack of fiscal consolidation in economic good times, mounting complexity, measurement problems, and an expanding divide between low debt and high debt countries.*

### **Rationale behind the Economic and Monetary Union fiscal rules**

**National fiscal policy was meant to be the predominant macroeconomic stabilisation instrument in the Economic and Monetary Union (EMU).** When the single currency was created, concerns prevailed about moral hazard and the possibility that fiscal risk sharing could lead to permanent transfers. National fiscal policy and competitiveness-enhancing reforms – which can be difficult and politically costly to implement – remained the main economic adjustment mechanisms. The common EU budget provided limited solidarity transfers skewed towards less-developed regions, targeting economic convergence.

**Fiscal rules were needed to prevent negative spillovers, inflation risks stemming from diverging fiscal positions, and potential overburdening of the European Central Bank (ECB).** Monetary union sustainability required the prevention of spillovers from unsound national fiscal policies. The two reference values – 3% of GDP for the deficit and 60% of GDP for the public debt, while political in character, reflected the prevailing economic reality with the 3% deficit ceiling regarded as sufficient to stabilise the economy during downturns. Together with a nominal growth of 5%, including inflation of 2%, it would stabilise debt at about 60% of GDP, not far from the EMU average at the time (Boxes 2 and 3).<sup>1</sup> Meanwhile, fiscal rules enabled the ECB to focus on its core mandate, maintaining price stability.

**Rules anchored in the EU Treaty and the SGP enhanced trust in the single currency.** In the run-up to the common currency, implied risk sharing embedded in the project triggered concerns about the sustainability of the monetary union and the ability of countries with weaker fundamentals or traditionally lax fiscal policies to converge towards the euro area average. Policymakers were aware that imprudent economic and fiscal policies, particularly in countries with a long tradition of inflationary policies, could trigger inflationary pressures across the euro area. The rules made the single currency politically acceptable despite some uncertainty around the no-bail out clause.

**The original rules aimed to accommodate countercyclical fiscal policy.** The SGP's preventive arm obliged countries to improve their budget balance towards their medium-term objectives, with the original rules specifying that each EU country should aim for a balanced budget on average over the economic cycle. Accumulated fiscal buffers would ensure available fiscal space in a recession, when a fiscal deficit could only reach a maximum of 3% of GDP. Violation of the 3% threshold would trigger corrective measures, and could eventually lead to the imposition of sanctions.<sup>2</sup>

**Governments gravitated towards the 3% deficit despite it being intended as a ceiling, with balanced budgets as the prescribed target.** On average, the euro area deficit stood slightly below 2% of GDP during 1999–2007, but countries were unable to use the unanticipated revenue increases from 1999 onwards to rebuild their fiscal shock-absorption capacity. A similar situation occurred in the mid-2000s. Caselli and Wingender (2018) show that the 3% deficit rule

<sup>1</sup> Kamps, C., Leiner-Killinger, N. (2019), *Taking stock of the functioning of the EU fiscal rules and options for reform*, p. 13.

<sup>2</sup> In addition, an escape clause allowed more significant deviations in case of a severe economic downturn, defined as drop in real GDP of more than 2%. Lower drops were subject to further considerations. Source: Council Regulation No 1467/1997, Article 2.

ceiling had not acted as an upper bound but rather as a target or a ‘magnet’. The number of observations around the threshold increased, reducing the occurrence of both large government deficits and surpluses.<sup>3</sup>

**Fiscal rules aimed to complement markets as a disciplining device, but had limited effectiveness when faced with higher spending needs.** Enforcement mechanisms based on peer pressure, embedded in the original rules, failed when confronted with high French and German fiscal deficits in 2002. Economic criticism and divergent views among EU Member States broke the consensus on fiscal rules, and a 2004 European Court of Justice ruling<sup>4</sup> specified the margins for EU institutions’ discretion. As economic imbalances expanded, market inertia compressed sovereign bond yields. Abrupt market swings following the great financial crisis initiated a sovereign debt crisis and the establishment of the EFSF and ESM to provide a safety net for sovereigns (Box 1).

### Box 1. Fiscal rules and the ESM framework

**The EFSF/ESM and EU fiscal framework are economically and institutionally interlinked.** The EFSF and ESM were established at the height of the sovereign debt crisis to fend off severe repercussions of financial market pressure. The promise of stability support came with a commitment to fiscal discipline. From an economic perspective, stability support mitigates policy failures, including the lack of sufficient increases in fiscal buffers during economically advantageous times. An efficient and effective EU fiscal and economic policy coordination framework would, in principle, prevent any need for recourse to ESM financial assistance other than in exceptional circumstances such as very large exogenous shocks and spillovers that might affect ‘innocent bystanders’.

**This reasoning is reflected in the legal connection between the application of the SGP and the provision of ESM stability support.** The Treaty on Stability, Coordination and Governance (TSCG, penultimate recital)<sup>5</sup> underlines the importance of the ESM Treaty as a key element of the strategy to strengthen EMU. It stipulates that granting assistance under ESM programmes is conditional on the ratification of the TSCG and compliance with Article 3. Likewise, Recital 5 of the current ESM Treaty states that granting ESM financial assistance is conditional on TSCG ratification by the ESM Member concerned, and compliance with TSCG Article 3.

**Respect for the fiscal rules explicitly governs access to ESM precautionary assistance.** Under the amended ESM Treaty, an ESM Member will need to respect the SGP’s quantitative fiscal benchmarks to be eligible for the Precautionary Conditioned Credit Line.<sup>6</sup> A good track record of fiscal discipline acts as a guarantee of responsible policies and conditions eligibility to financial assistance programmes other than a full adjustment programme or the Enhanced Conditioned Credit Line. Future changes in the EU fiscal rules might entail discrepancies between the new fiscal framework and the recently agreed eligibility criteria for accessing the Precautionary Conditioned Credit Line stated in the ESM Treaty Annex III and would have to be accommodated. Finally, the interest earned by the European Commission on deposits lodged in accordance with Article 5 and the fines collected in accordance with Articles 6 and 8 of the Regulation 1173/2011

<sup>3</sup> Caselli, F., Wingender, P. (2018), *Bunching at 3 Percent: The Maastricht Fiscal Criterion and Government Deficits*.

<sup>4</sup> Case C-27/04, *Commission v Council*, [2004] ECR I-6649.

<sup>5</sup> Article 3 of the Treaty stipulating requirements on the national fiscal policies is often referred to as the fiscal compact.

<sup>6</sup> To be eligible for the Precautionary Conditioned Credit Line the ESM Members will need to respect the quantitative fiscal benchmarks. The ESM Member shall not be under excessive deficit procedure and needs to meet the three following benchmarks in the two years preceding the request for precautionary financial assistance: a) a general government deficit not exceeding 3% of GDP, b) a general government structural budget balance at or above the country-specific minimum benchmark, c) a debt benchmark consisting of a general government debt-to-GDP ratio below 60% or a reduction in the differential with respect to 60% at an average rate of one twentieth per year.

are assigned to the ESM.

### Adding flexibility: shortcomings and calls for change

The 2005 reform and output gap measure pitfalls

**Implementation of the SGP did not initially prevent procyclical fiscal policies, despite the intended focus on stabilisation.** In the early 2000s, strong growth led to a procyclical fiscal expansion with no buffer accumulation. The debt reference value had no adequate operating procedure. Consequently, the SGP lacked focus on debt sustainability. Setting the SGP around nominal reference values attracted experts' criticism for not sufficiently accommodating countercyclical policies in downturns and insufficiently safeguarding debt sustainability and investment.<sup>7</sup> Also, shifting economic circumstances and need to reflect the different member states' positions accelerated reform.

**To establish a sounder economic basis for the SGP, reform in 2005 replaced nominal deficit targets with structural balances and extended deadlines for correcting fiscal deficit.** This reform introduced a shift towards country-specific structural objectives, correcting for the effect of business cycles to provide more granular fiscal policy guidance and reduce procyclicality. Medium-term objectives referred to a cyclically adjusted budgetary position excluding one-off or temporary measures. Deadline extensions prolonged the procedure and the horizon for excessive deficit correction beyond one year, conditional on relevant factors. Political support for the amended rules suggested new commitment to fiscal discipline.

**However, the potential GDP and growth needed to compute structural balance are hard to estimate and subject to substantial revisions.**<sup>8</sup> Potential output could be underestimated because standard measures cannot capture an increasing share of intangibles (Anderton et al., 2020) or, conversely, overestimated by any failure to account correctly for capital stock obsolescence, especially after large shocks or recessions. The output gap divergence estimated by international institutions reaffirms these persisting challenges (Figure 2).

**As a result, the use of potential output to determine rule compliance was increasingly questioned by the member states, especially after the global financial and sovereign debt crises.** Changes in output gap estimates can lead to significant differences in a country's annual structural-adjustment requirement because the country-specific medium-term objectives are expressed in structural terms and its distance from the estimated potential plays a key role. Frequent revisions of potential GDP and output gap undermined the credibility and enforceability of fiscal rules based on cyclically adjusted variables.<sup>9</sup> Potential output estimates after crises may have provided the analytical basis for procyclical adjustment pressures.<sup>10</sup> These measurement issues reinforced scepticism about fiscal rules and eroded political consensus on the output-gap based rules.

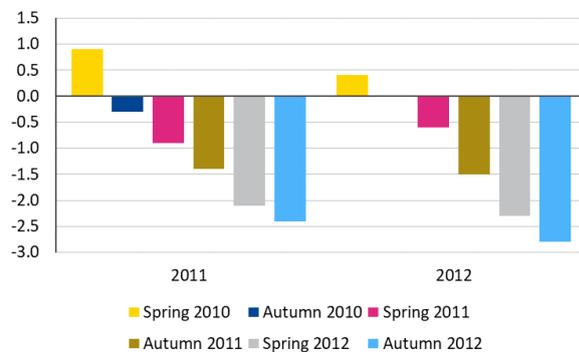
<sup>7</sup> Buiter, W., Grafe, C. (2002), *Patching up the Pact: Some suggestions for enhancing fiscal sustainability and macroeconomic stability in an enlarged European Union*. Blanchard, O., J., Giavazzi, F. (2004), *Improving the SGP through a proper accounting of public investment*.

<sup>8</sup> See Figure 1 illustrating this issue for Greece, which suffered from the turbulences of the sovereign debt crisis during this period.

<sup>9</sup> Bilbiie, F. et al. (2020), *Fiscal Policy in Europe: A Helicopter View*.

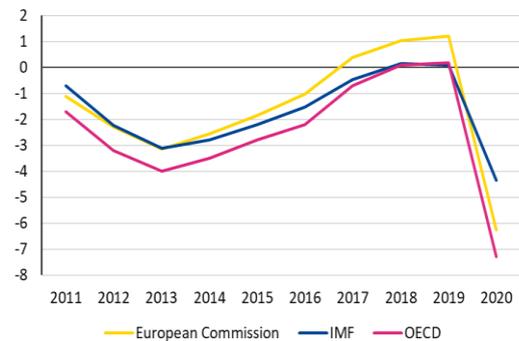
<sup>10</sup> Heimbberger, O., Kapeller, J. (2017), *The performativity of potential output: procyclicality and path dependency in coordinating European fiscal policies*.

**Figure 1**  
**Potential growth projections for 2011 and 2012, Greece**  
 (in % of potential GDP)



Source: European Commission

**Figure 2**  
**Output gap estimates for the euro area**  
 (in % of potential GDP)



Source: European Commission

**Despite the new rules, stronger growth did not lead to lower deficits.** The strong economic performance of 2003–2007 was accompanied by fiscal deficits and increased expenditures. The SGP reforms of 2005 did not have the expected impact on compliance.<sup>11</sup> The lack of national fiscal buffers and supranational risk-sharing mechanisms exacerbated financial market stress when the 2008 financial crisis hit Europe.

#### Reform in 2011 to strengthen institutions

**Financial market turmoil and the ensuing economic crisis spurred the adoption of stricter rules in 2011.** Efforts to fend off financial market pressure during the sovereign debt crisis led to SGP revision, new legislation, and sizeable financial assistance to countries in crisis. It also fostered the creation of the European Financial Stabilisation Mechanism, EFSF, ESM and intergovernmental treaties that reinforced commitments to fiscal discipline (Box 1). The revamped rules aimed to ensure stricter enforcement of the SGP's preventive and corrective arms and introduce more automaticity. The European Commission proposed that country recommendations could be overturned only by a qualified majority in the European Council, strengthening the Commission's powers and limiting the scope for political intervention by the Council previously seen in 2002–2003.

**The 2011 revisions made the SGP even more complex to interpret and apply.** The changes introduced an expenditure rule, first alongside the structural balance in the SGP preventive arm and later also in the corrective arm. They also reinforced the debt criterion within the excessive deficit procedure, and defined in detail applicable fines for non-compliance.

**Enhanced macroeconomic surveillance and independent national fiscal councils aimed to encourage fiscal discipline.** Stronger national fiscal frameworks and an obligation to establish independent fiscal institutions sought to ensure fiscal discipline at the national level. The Macroeconomic Imbalance Procedure screens both external and internal imbalances based on a scoreboard of variables and potentially imposes financial sanctions on euro area member states for persistent imbalances.

**The European Commission's enhanced authority came with an increasingly political role.** The Commission gained more power to assess and enforce the SGP, but this made assessments more technically involved and subject to political considerations and judgement. In 2015, the

<sup>11</sup> Eyraud, et al. (2017), *Fiscal Politics in the euro area*.

Commission introduced a matrix of requirements in the preventive arm that included a required speed of adjustment towards the medium-term objectives for each member state, depending on the size of the output gap and the debt level. In 2018, the margin of discretion applied. The the SGP's preventive arm allowed the Commission to deem a country compliant even if it had violated adjustment requirements based on the medium-term objectives or expenditure benchmark. Discussions on technicalities diverted attention from key policy issues.

**The market discipline channel – and European Commission surveillance – appeared stronger after the crisis, although markets remained volatile.** Markets appeared more prone to penalise countries for non-compliance when called out by the European Commission (Figures 3 and 4). Evidence suggests that higher debt and deficit levels can lead to higher risk premia.<sup>12</sup> The ECB's Outright Money Transactions commitment and, to a smaller extent, public sector purchase programme did reduce risk premia, but financial markets penalised uncertainty on fiscal policy choices perceived as risky by driving up yield spreads on bonds.

Figure 3

**Market reaction during the 2016 discussions between the Portuguese government and the European Commission, PT 10-year spread to Bund**

(in basis points)

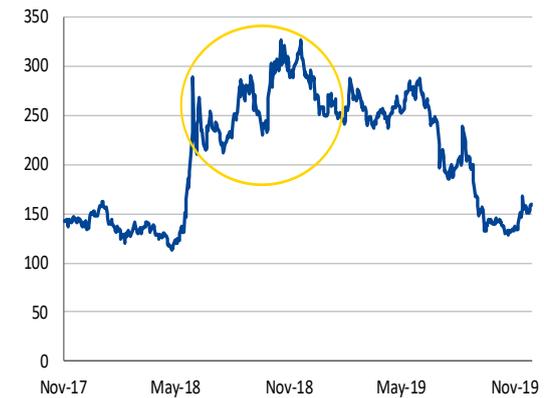


Source: Bloomberg

Figure 4

**Market reaction during the 2018 discussions between the Italian government and the European Commission, IT 10-year spread to Bund**

(in basis points)



Source: Bloomberg

**The SGP helped improve overall euro area fiscal position compared to peers, but implementation and the resulting fiscal policy stayed procyclical.** Fiscal rules helped the euro area accumulate higher fiscal buffers than the UK and US, and reign in debt (Figures 5 and 6). Despite being heterogeneous across countries, discretionary fiscal policy was procyclical 63% of the time in 2011–2018, as opposed to 17% of the time in 1999–2010.<sup>13</sup> Lacking fiscal buffers limited fiscal shock-absorption capacity. In the ensuing downturns, concerns about limited fiscal options and endangered fiscal sustainability led to procyclical fiscal tightening (Figures 7 and 8).

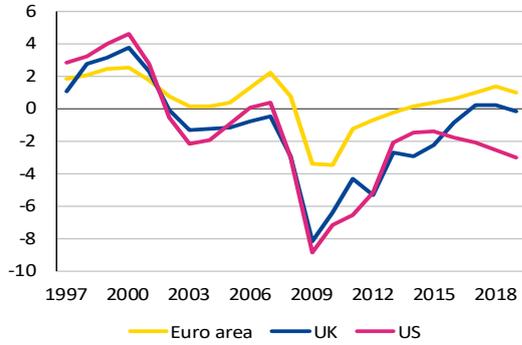
**The debt criterion has not always been respected.** The debt criterion came into operation only with the 2011 SGP reform and the introduction of the debt reduction, but even then it was applied with several caveats. The signature of the intergovernmental TSCG did reinforce the commitment to fiscal discipline, although no excessive deficit procedure has been activated on

<sup>12</sup> Engen, E. M., Hubbard, R. G. (2004), *Federal Government Debt and Interest Rates*. Ardagna et al. (2007), *Fiscal Discipline and the Cost of Public Debt Service: Some Estimates for OECD Countries*. Laubach, T. (2009), *New Evidence on the Interest Rate Effects of Budget Deficits and Debt*.

<sup>13</sup> European Fiscal Board (2019), *Assessment of EU fiscal rules with a focus on the six and two-pack legislation*, pp. 67-68.

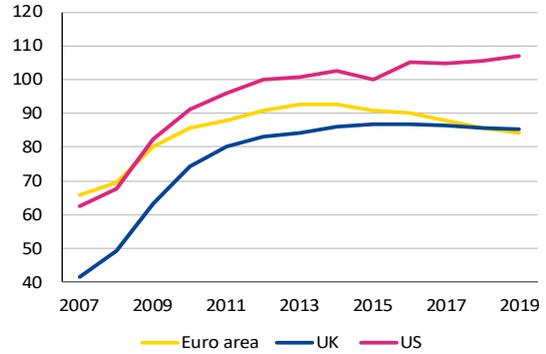
the basis of the debt rule to date.

**Figure 5**  
**Primary balance, general government for the euro area and the UK, central government for the US**  
 (in % GDP)



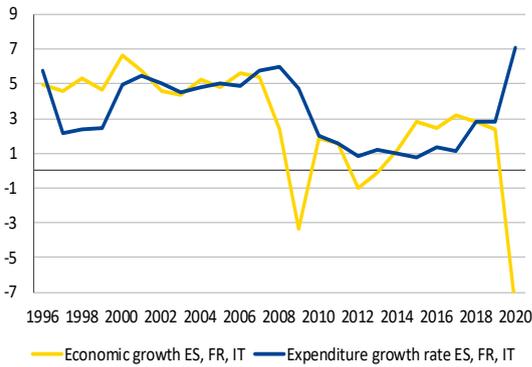
Sources: US Treasury, Eurostat, Haver Analytics

**Figure 6**  
**Public debt in the euro area, UK, and US**  
 (in % GDP)



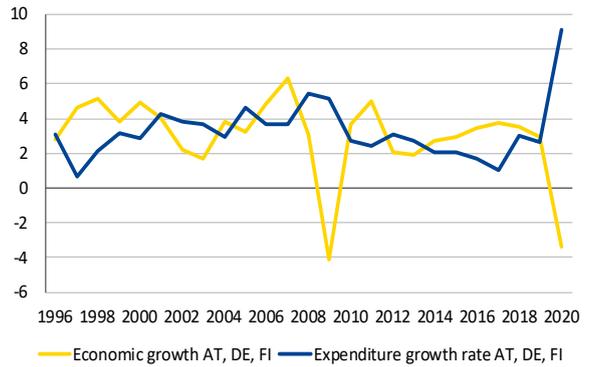
Sources: US Treasury, Eurostat, Haver Analytics

**Figure 7**  
**Economic growth and current expenditure growth, averages for ES, FR, and IT**  
 (in % GDP)



Sources: European Commission, Ameco

**Figure 8**  
**Economic growth and current expenditure growth, averages for AT, DE, and FI**  
 (in % GDP)



Sources: European Commission, Ameco

## **2. After the pandemic crisis – calls for change**

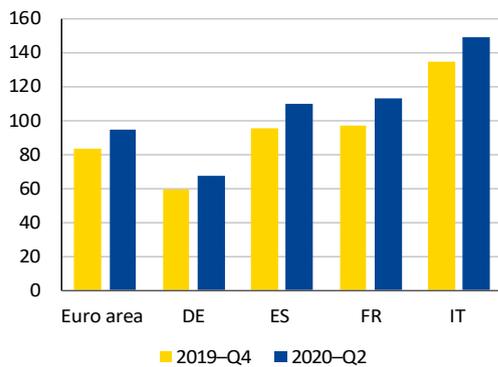
Taking stock of existing proposals for EU fiscal rules requires a review of existing economic challenges. This chapter first assesses the current macroeconomic context and policymaking debate, then reviews existing proposals for strengths and weaknesses. On that basis, it offers insights on how to revisit the EU fiscal framework in the following chapter.

### The macroeconomic context – a new normal?

**The depth of the pandemic crisis has shifted the focus from limiting the downturn to fostering a speedy, sustainable recovery.** The pandemic triggered a severe economic downturn that activated the escape clause within the SGP in March 2020, followed by rapid expansion of public spending. The sustained focus on stabilising output contrasts with the euro area reaction to the 2012–2014 sovereign crisis. The need for growth-supporting fiscal policies has become a new paradigm in the economic policy debate.

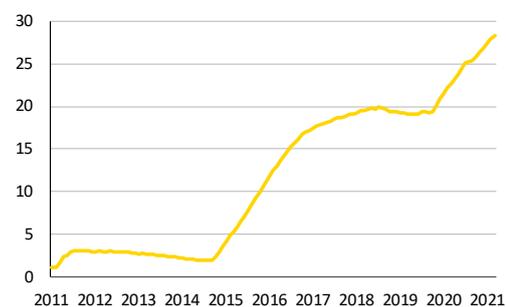
**Debt-financed spending is considered the appropriate response to the present crisis – triggered by a global, exogenous shock – and markets seem to agree.** An immediate firm fiscal and monetary policy response emerged to counter the shock, leading to substantial increases in already-high public debt levels (Figures 9, 10, and Annex 2) and the rapid expansion of central bank balance sheets (Figure 10). The nature of the shock generated strong political support for direct large-scale assistance to households and firms, which, alongside unprecedented central bank support and ultra-low interest rates, largely muted market concerns about the jump in debt levels.

**Figure 9**  
General gross government debt  
(in % of GDP)



Source: Eurostat

**Figure 10**  
Share of Eurosystem holdings of marketable euro-denominated euro area government debt  
(in % of total)



Note: Calculations are based on the assumption that 90% of PSPP and PEPP are government debt. The denominator includes marketable euro-denominated euro area central government debt securities, but excludes official loans, dollar-denominated debt and debt issued by government sub-sectors, agencies and regions.

Sources: Haver, ECB

**Economic divergence during the recovery from the pandemic crisis is a risk that could challenge the ECB's policy priorities.** The ECB policy aim of maintaining price stability would be tested if inflation threatened to exceed the target without a corresponding rebound in growth and attendant crisis risks in some euro area member states. A substantial increase in key interest rates and a tapering of central bank asset purchases could put pressure on the government finances of some member states as growth and inflation expectations diverge, widening risk premia. High government debt burdens in some countries may pressure the ECB to contain interest rates and sovereign spreads<sup>14</sup> to ensure the operation of the transmission mechanism, and safeguard fiscal sustainability and the cohesion of the monetary union.

<sup>14</sup> Philip Lane made it clear in his inaugural blog that the ECB would “stand ready to do more ... if needed to ensure that the elevated spreads that we see in response to the acceleration of the spreading of the coronavirus do not undermine transmission.”

**The European pandemic crisis response alleviates pressure on governments but cannot replace fiscal rules reform that would better handle high sovereign debt and recognise new economic realities.** Grants from the European Recovery and Resilience Facility create fiscal space without burdening governments' balance sheets. Still, rising indebtedness implies governments will need to rollover increasing amounts of debt and finance newly issued debt. Repeated failures of a rules-based system to reduce public debt imply a risk that the Eurosystem and other central banks will be called upon to stabilise government bond markets in future times of stress.

#### **Supporting the recovery comes at a cost – medium- to long-term risks**

**The interest rate-growth ( $r-g$ ) differential has steadily decreased, a trend accentuated by accommodative monetary policy in recent years.** This has made the intertemporal budget constraint, the solvency condition for public debt sustainability, less binding, and shifted the emphasis of the debt sustainability analysis from debt levels to rollover risks.

**In the short- to medium-term  $r-g$  can be expected to remain negative.** Accommodative ECB policies have helped narrow spreads and contain interest rates (Figure 11). A positive short-term outlook on growth can be justified, given the magnitude of the fall in GDP in 2020, and the extensive monetary and fiscal stimulus employed to stem the economic consequences of the Covid-19 pandemic.

**Salient longer-term secular trends include lower long-run productivity and output growth, shifting demographics, and safe asset shortages.** These trends, which are likely to continue, suggest that long-term interest rates will remain lower on average compared to the past.

**Potential growth has been declining for decades in advanced economies.** The decline can be attributed to shrinking total factor productivity partly due to a lower rate of technology diffusion, with the gap amplifying over time between labour productivity growth in firms operating at the technology frontier and that of firms lagging behind.<sup>15</sup>

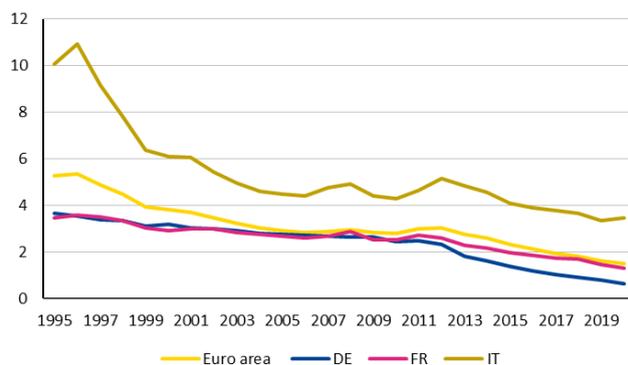
**Population ageing reduces investment and increases savings, and both cut the natural rate of interest.** The ratio of capital invested relative to workforce size increases as the population ages, weakening the demand for capital. If the productivity of the older aged is lower than that of the younger, then ageing can also dampen productivity growth and reduce investment opportunities.<sup>16</sup> Rising life expectancy implies longer retirement periods, with escalating incentives to save more, leading to higher savings rates. In turn, the increased savings raise demand for safe assets, which leads to lower yields when combined with relatively limited supply.

**Lower interest rates, longer maturities, and a more robust European crisis prevention and management framework have reduced rollover risks and raised debt levels that can be sustainably serviced.** The strengthened EU/euro area institutional framework – evidenced by the swift and strong European response to the Covid-19 crisis and successful ECB action to stabilise markets – have reduced debt servicing costs especially in some euro area countries (Figure 11) and helped contain spreads even in times of crisis. As a result, market demand for government debt remains high, and rollover risks are deemed to have declined substantially.

<sup>15</sup> European Central Bank (2017), *The slowdown in euro area productivity in a global context*. OECD (2015), *The future of productivity*.

<sup>16</sup> For comparison see Goodhart, Ch., Pradhan, M. (2020), *The Great Demographic Reversal: Ageing Societies, Waning Inequality, and an Inflation Revival*.

**Figure 11**  
**Interest expenditure: selected euro area countries, 1995–2019**  
 (in % of GDP)



Source: Eurostat

**However,  $r < g$  may not last.** Scarring effects, lower-than-expected fiscal multipliers, insufficient structural reforms, and low absorption of available funds might keep growth low. Also, due to absorption capacity issues, suboptimal project planning and implementation, and an overall lack of structural reforms, the Recovery and Resilience Facility may not lead to the expected lift in potential growth. Furthermore, fiscal discipline and pressure for structural reforms could weaken should easy funding conditions persist. This could lead to structural weakening and lower growth in the long run.

**Population ageing and rising healthcare costs may increase government spending faster than revenue, leading to higher deficits with low interest rates.** Rogoff (2019) claims that most social security systems are debt-like in the sense that the government extracts money now with the promise to repay with interest later.<sup>17</sup> For some countries, this ‘junior’ debt is relatively large compared to the ‘senior’ market debt that sits atop it. Thus, hidden risks lurk within existing government debt levels emanating from a shrinking labour force and a mounting dependency rate.

**An alternative school of thought suggests that global population ageing will lead to a trend reversal, with savings rates falling, real wages increasing, and greater inflationary pressures.** An increase in ageing-related expenditures together with a structural weakening of the dependency ratio is deemed inflationary. Inflation trends can be further exacerbated by labour shortages and a rise in labour bargaining power relative to capital. Change in China’s economic model from forced saving towards increased consumption could further amplify these trends.<sup>18</sup>

**Regardless of assumptions about future economic developments, limits exist as to how much debt markets will sustain, and establishing thresholds is difficult.** Empirically, reversals are more likely to come with higher economic and social costs when debt is higher. Indeed, elevated debt is associated with a greater likelihood of an exceptionally high interest rate to growth differential in the future, and with higher interest rates in response to adverse shocks from weak domestic growth and global volatility.<sup>19</sup>

**Fiscal support programmes initiated during the current crisis include public loan guarantee programmes that establish contingent liabilities on government balance sheets.** These could become actual liabilities when grace periods end, especially if scarring effects materialise. The

<sup>17</sup> Rogoff, K. (2019), *Government Debt Is not a Free Lunch*.

<sup>18</sup> See e.g. Goodhart, Ch., Pradhan, M. (2020), *The Great Demographic Reversal: Ageing Societies, Waning Inequality, and an Inflation Revival*.

<sup>19</sup> Lian, et al. (2020), *Public Debt and  $r - g$  at Risk*.

sovereign-corporate nexus could emerge as a new euro area challenge, with uncertainty around the true level of government debt created by these contingent liabilities reducing the markets' debt tolerance. Till now corporate bankruptcies have been limited and risks seem contained.

### Advantages and limitations of current proposals

**Expenditure rules gained prominence before the pandemic and remain popular.** Before the pandemic, reform proposals from leading scholars and institutions<sup>20</sup> promoted expenditure rules that would limit increases in adjusted current expenditure<sup>21</sup> to expected potential growth. Some stipulated that spending growth reflects a given macroeconomic scenario and the size of existing debt stock, given the main target was debt reduction.

**Despite wide support for an expenditure rule with a debt anchor, the consequences of the pandemic suggest existing proposals targeting debt reduction be revisited.** Existing proposals focus on different forms of expenditure rules with a debt anchor. The main differences relate to operational rules, debt targets, benchmarks for expenditure growth, debt correction speed, and the selected expenditure aggregate. The sharp debt increase after the pandemic calls for revisiting the debt anchor and debt reduction pace proposed before 2020.

### Box 2. Feasible debt reduction: raising the 60% reference value

**In post-pandemic times, the new economic reality will challenge member states striving to shrink debt through extended periods of high primary surpluses in line with the current debt limit and reduction pace.** Some countries have achieved a primary surplus of 3.5% of GDP and above, and maintained it for up to five consecutive years. However, the post-pandemic debt level is higher, widening the distance to the 60% reference value and the period in which sovereigns would need to maintain high primary surpluses far beyond those maintained in the past. Moreover, high primary surpluses achieved in the past accumulated from strong economic growth at rates substantially above those that can be expected in the longer-term. Finally, maintaining high primary surpluses for extended periods would work against the need for investment in modernisation and a greening of European economies, so inhibiting growth.

**At this juncture, requiring all euro area member states to converge to the current 60% debt-to-GDP reference value appears unrealistic, and risks undermining fiscal framework credibility** (Figure 12). Keeping the 60% reference value and assuming a 20-year horizon to achieve it would necessitate unrealistically high fiscal surpluses for several countries. For example, Portugal would need a primary surplus of close to 2.5% of GDP on average for the next 20 years despite a significant decline in debt service costs since the 1990s.<sup>22</sup> The required primary surplus would be even higher for some other countries, which risks undermining the credibility of the EU fiscal framework, thus impairing the market discipline channel and causing countries to adopt inappropriately tight and unsustainable policies.

**Where exactly to set the higher debt-to-GDP limit is partly a practical question, analogous to the context for adopting the 60% limit several decades ago.** The 3% deficit limit has proven a good fiscal policy anchor, and general agreement suggests it has been effective and should be kept. From there one can infer a debt limit of 100% of GDP, because a 3% deficit would stabilise the debt-to-GDP ratio under the baseline macroeconomic outlook scenario (with nominal growth at 1% and inflation at 2%). In addition, a 100% reference value would be close to the

<sup>20</sup> See e.g. proposals by Andrieu et al. (2015), Carnot (2014), Claeys et al. (2016), Bénassy-Quéré et al. (2018), Darvas et al., 2018, Christofzik et al., 2018, and EFB (2018), EFB (2020).

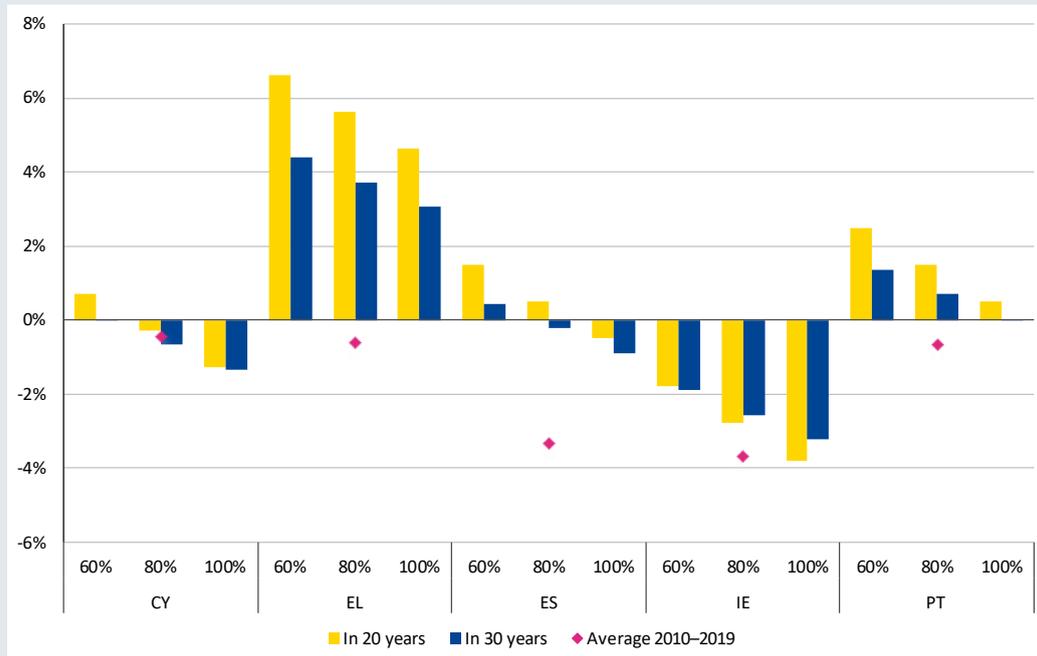
<sup>21</sup> Current expenditures are adjusted according to a narrowly set definition that excludes certain spending items.

<sup>22</sup> This is an illustrative exercise, and the surplus quoted is different from that implied by the existing debt rule. Debt dynamics could evidently vary over time and for example, require higher consolidation efforts, at the start with higher debt levels. Structural measures of the primary surplus may lead to different outcomes, and possibly showing even higher adjustment needs.

current euro area average, as was the 60% limit when adopted.

Figure 12

Primary balance (vertical axis) required to reduce debt ratio towards a selected anchor (horizontal axis) (both axes in % of GDP)



Note: The assumptions on growth and implicit interest rates are based on the European Commission's Debt Sustainability Monitor 2020. For PT, ES, IE, and CY the starting level of debt is considered as of 2022 and the average implicit interest rate, inflation rate and real GDP growth are based on 2023-2031 period and extrapolated over the 20- and 30-year period. For EL, the initial debt level reflects the level projected for 2022 and the growth and interest rates are averages for period 2023-2043 and 2023-2053 respectively. The computations are based on a number of simplifying assumptions. The values were computed using the basic debt stabilising primary balance equation.

Sources: European Commission (2020) Debt Sustainability Monitor, Ameco, ESM calculations

**The updated European Fiscal Board (EFB) recommendations (2020) suggest a country-specific debt adjustment speed.** The 2020 EFB report's proposals included an expenditure ceiling rule, a benchmark based on the trend growth of potential output, and a debt adjustment speed based either on a matrix reflecting a fixed set of variables or on a case-by-case macroeconomic scenario prepared by an independent assessor. These measures would translate into three-year expenditure ceilings, which would encourage countercyclical fiscal policy, with its direction and speed depending on both debt levels and macroeconomic conditions, so increasing debt in bad times and reducing it in good times. The EFB 2020 proposal suggested the 60% debt-to-GDP reference value should not necessarily be achieved within the 15 year maximum set in their 2018 proposal, and could be achieved at a different speed. It also considered a differentiated debt target.

**The EFB proposal does not fully address the risks of policy missteps on the revenue side and the need to identify discretionary measures required to define an appropriate countercyclical fiscal stance.** Netting the expenditure aggregate of discretionary revenue measures requires distinction between discretionary and nondiscretionary revenue changes and quantifying individual measures.<sup>23</sup> The IMF and the Organisation for Economic Co-operation and Development (OECD) emphasise the risk of increased tax expenditures (i.e. advantageous tax treatments), as countries relying on expenditure rules have experienced an increase in their number.<sup>24</sup> Any expenditure ceiling aiming to reduce debt should assess the extent to which tax-

<sup>23</sup> See e.g. EFB (2020), *Annual Report 2020*, p. 88-90. European Commission (2019), *Vadamecum on the Stability and Growth Pact*, p.35.

<sup>24</sup> OECD (2010), *Tax expenditures in OECD countries*.

raising capacity supporting net expenditure growth is compatible with the required debt reduction pace. Correspondingly, the assessment of revenue should guarantee that the revenue contribution is at minimum not cancelling out the countercyclical fiscal policy stance.

**A rule similar to the Swiss debt brake, which includes a tax dimension, would be constrained by a limited EU authority.** The Swiss debt brake requires that maximum expenditure must equal revenue multiplied by the business cycle adjustment factor ( $k$ ), which consists of the ratio of the trend in real output to actual real output. Therefore, if  $k$  is greater than one, a (cyclical) deficit is allowed, and if  $k$  is less than one, a (cyclical) budgetary surplus is required.<sup>25</sup> However, the rule could necessitate revenue commitments, on which the EU has limited coordination powers.

**In their 2018 analysis, the German Council of Economic Experts suggested a rule with the structural balance as an intermediate target.**<sup>26</sup> The paper combined a long-term debt limit with an obligation to avoid structural deficits in the medium term, and an annual growth ceiling on nominal expenditure. The debt-to-GDP limit remained 60%, and the discussed public debt reduction pace was a symmetric one of one seventy-fifth or one fiftieth per year.

**The German proposal makes strong points on governance.** A limited number of exceptions and escape clauses would simplify the framework. Together with improved enforcement and monitoring, this would raise the political cost of non-compliance and strengthen the fiscal framework.

**Other researchers have suggested a country-specific debt adjustment pace.**<sup>27</sup> The growth rate of nominal public spending would be set at the sum of real potential growth and expected inflation, minus a debt brake term taking into account any difference between the observed debt-to-GDP ratio and the long-term target of e.g. 60% of GDP. The debt brake term would set the speed at which a country converges towards its long-term debt target and should reflect country-specific, five-year intermediate debt reduction objectives.

**A more modest debt adjustment could help avoid unrealistic targets and increase credibility in the current high-debt environment.** Periodically updated country-tailored debt reduction objectives would avoid unrealistic debt reduction efforts in high-debt countries.

**Empirical evidence suggests benefits do flow from national expenditure rules.** Manescu and Bova (2020) analysed the performance of 14 national expenditure rules. Using the European Commission's fiscal rules database,<sup>28</sup> they concluded that such rules reduce spending procyclicality and correlate to relatively higher compliance rates. Expenditure ceilings tend to achieve better results than expenditure growth targets. A higher rate of compliance with expenditure rules could reflect governments' ability to exercise direct control over expenditures.<sup>29</sup>

**However, a comparison with other rules highlights room for improvement.** The research highlights that budget balance rules contribute to countercyclical changes in overall and investment spending, while expenditure rules exhibit a countercyclical impact on overall spending and a procyclical impact on investment, making cuts during bad times more politically palatable.<sup>30</sup>

**Revisions in medium-term potential growth projections could also dampen expenditure rules' credibility.** An important feature of expenditure rules is the anchor of a simple and not-

<sup>25</sup> Geier, A. (2011), *The Debt brake – the Swiss fiscal rule at the federal level*.

<sup>26</sup> Christofzik et al. (2018), *Uniting European fiscal rules: How to strengthen the fiscal framework*.

<sup>27</sup> Darvas et al. (2018), *European fiscal rules require a major overhaul*.

<sup>28</sup> Manescu, C. B., Bova, E. (2020), *National Expenditure Rules in the EU: An Analysis of Effectiveness and Compliance*.

<sup>29</sup> Cordes et al. (2015), *Expenditure Rules: Effective Tools for Sound Fiscal Policy?*

<sup>30</sup> Guerguil et al. (2016), *Flexible Fiscal Rules and Countercyclical Fiscal Policy*.

frequently-revised variable. Numerous proposals use the medium-to-long term rate of potential output growth, which should be relatively stable.<sup>31,32</sup> Conversely, Gros and Jahn (2020) argue that revisions to medium-term potential growth tend to be similar in size to those of the output gap used to compute medium-term objectives under the current framework.<sup>33</sup>

**An alternative proposal by Blanchard et al. (2021) would drop fiscal rules in favour of standards accompanied by a stochastic debt sustainability analysis.**<sup>34</sup> The proposal steered the debate towards risks stemming from a potential rise in interest rates. Qualitative guidance would give prominence to judgments on whether debt remains sustainable. Country-specific assessments would use stochastic debt sustainability analysis to assess the probability of the debt-stabilising primary balance exceeding the actual primary balance to indicate risks to debt sustainability. These assessments could be led by national independent fiscal councils and/or the European Commission. Disputes between member states and the European Commission would preferably be adjudicated by an independent institution, such as the European Court of Justice or a specialised chamber, rather than by the European Council.

**Similarly, Martin et al. (2021) suggest debt sustainability analysis as a key instrument of the revamped SGP to help avoid mechanical application of debt and deficit limits.**<sup>35</sup> Every government would have a country-specific numeric debt target to be achieved in five years. Its pertinence would be evaluated at national level by an independent fiscal institution and validated by the Ecofin, employing commonly agreed debt sustainability analysis methodology. An agreed debt target would be broken down into five yearly spending targets. To respond to any unexpected challenges, the European Commission could have the power to propose the use of an exceptional circumstances instrument and recommend reorientation of the member state's budgetary policy.

**Another strand of proposals suggests abandoning traditional deficit and debt sustainability metrics in favour of debt stocks compared to the present value of GDP or interest rate flows with GDP flows.** Furman and Summers (2020) propose to shift away from traditional metrics in favour of debt stock as a percentage of the present value of GDP, or real interest payments as a share of GDP.<sup>36</sup> Hughes et al. (2019) suggest keeping the interest payments/revenue ratio commonly used by rating agencies as an alternative metric. They argue that the long average maturity of the UK government debt, roughly 14 years, means sharp falls or increases in conventional interest rates take a number of years to work through the debt stock. This gives governments time to gradually adjust fiscal policy settings to any new financing environment and avoid breaching the limit.<sup>37</sup>

**The vision of Blanchard et al. is challenged in the short-run by the treaty change it requires.** In addition, the proposal raises operational questions. The Greek experience showed that even debt sustainability analysis and its assumptions can lead to discord among the member states.<sup>38</sup> Also, the complexity in the underlying assessment increases the need for independent bodies to provide the analysis. Lack of an appropriate operational setting would undermine the trust in the rules. A proposal to allow the European Commission to prevent governments from adopting national draft budgetary plans is legally not viable because the existing legal framework clearly

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<sup>31</sup> Christofzik et al. (2018), *Uniting European fiscal rules: How to strengthen the fiscal framework*. Darvas et al. (2018), *European fiscal rules require a major overhaul*.

<sup>32</sup> Clayes et al. (2016), Gros, D., Jahn, M. (2020), *Benefits and drawbacks of an "expenditure rule", as well as of a "golden rule in the EU fiscal framework"*, pp. 20-23.

<sup>33</sup> Gros, D., Jahn, M. (2020), *Benefits and drawbacks of an "expenditure rule", as well as of a "golden rule in the EU fiscal framework"*.

<sup>34</sup> Blanchard et al. (2020), *Redesigning the EU Fiscal Rules: From Rules to Standards*.

<sup>35</sup> Martin et al. (2021), *Reforming the European Fiscal Framework*.

<sup>36</sup> Furman, J., Summers, L. (2020), *A Reconsideration of Fiscal Policy in the Era of Low Interest Rates*.

<sup>37</sup> Hughes et al. (2019), *Totally (net) Worth It: the next generation of UK fiscal rules*.

<sup>38</sup> Independent Evaluator (2020), *Lessons from Financial Assistance to Greece – Independent Evaluation Report*.

defines the powers of EU institutions in the area of fiscal policy coordination.

**Giving up the deficit and debt metrics would be challenging.** Decisions about debt maturity fall under national competences and member states employ different structures to administer government debt and rollover needs, which could prevent EU institutions from cross-country comparisons and transparent and even-handed treatment. Any metrics beyond debt and deficits might be too complex to explain to the wider public.

### Can fiscal rules help boost investment?

**After the global financial crisis, efforts to comply with fiscal rules might have discouraged public investment.** The financial crisis and ensuing market pressure led to cuts in government investment expenditure in many advanced economies. The decrease in public investment was significant, especially in countries subject to economic adjustment programmes such as Greece, Ireland, and Portugal.

**Post-pandemic, governments will have to address investment shortfalls and ensure additional funding to meet targets set by key European initiatives and also to boost growth.** Productive investment enhances growth and reduces risks to medium-term debt sustainability. The European Green Deal<sup>39</sup> sets ambitious goals in the commitment to a zero-carbon transition and keeping pace with the digital revolution, while rebuilding Europe's social cohesion will also demand substantial investment efforts. The European Commission has projected that the current 2030 climate and energy targets will necessitate €260 billion of extra investment each year, about 1.5% of 2018 GDP. The European Investment Bank (EIB) estimated an overall infrastructure investment gap of about €155 billion per year (about 1% of 2018 GDP) to attain the goals the EU wishes to achieve by 2030, including 'climate and energy' and broadband penetration. A similar gap of 1% of EU GDP exists in information and communications technology compared to the US.<sup>40</sup>

**Introducing European fiscal rules that allow for higher investment remains a priority, but needs to address related challenges.** Resuming growth in the short-term and raising potential growth rates over the medium-term calls for long-term investment. But, promoting investment through fiscal rules must address concerns about transparency of a more complex framework.

**Safeguarding investment through fiscal rules had mixed results.** Decisions to facilitate public investment by allowing for deviations from fiscal targets set at the EU level did not prevent investment cuts during fiscal consolidation periods in the EU. Investment-friendly rules can lead to excessive borrowing and weaken the link between fiscal targets and debt dynamics, fostering potential risks to debt sustainability.<sup>41</sup> Creative accounting and the reclassification of unproductive expenditures as investments to circumvent rules could challenge monitoring and enforcement.<sup>42</sup> Recent research suggests investment-friendly rules can increase investment expenditure without necessarily undermining fiscal discipline and public debt sustainability, but only if investment efficiency is high.<sup>43</sup>

**A strong public investment and accounting framework mitigates risks from investment-friendly rules or spending constraints in the short-term.** Evidence suggests that improving the governance of infrastructure investment can generate cost-savings and boost effectiveness.<sup>44</sup> To increase institutional capacity, the European Commission could conduct regular assessments, issue reports and, potentially, also recommendations to improve public investment systems and

<sup>39</sup> European Commission (2019), *Communication from the Commission: The European Green Deal*.

<sup>40</sup> European Investment Bank (2019), *EIB Investment Report 2019/2020 –Accelerating Europe's Transformation*.

<sup>41</sup> For overview of obstacles to promoting investment through fiscal rules see EFB (2019), *Annual Report 2019*, p. 77.

<sup>42</sup> Servén, L. (2007), *Fiscal rules, public investment, and growth*.

<sup>43</sup> IMF (2014), *Is It Time for an Infrastructure Push? The Macroeconomic Effects of Public Investment. Making Public Investment More Efficient*.

<sup>44</sup> Schwartz et al. (2020), *Well Spent: How Strong Infrastructure Governance Can End Waste in Public Investment*.

practices in member states, as proposed in the earlier suggestion to create the European Investment Stabilisation Function. In the medium term, discussions on indicative investment targets could be an alternative to explore.

**A golden rule to protect productive public investment implying a separate capital account remains attractive, but challenging.** The EU division of powers implies that decisions on expenditure composition are taken by the national governments, and removing investment from reference values might alienate the targets from the numbers and reduce transparency.

**Focusing on public sector net worth could boost investment in the medium term.** Public sector balance sheet accounting goes beyond the traditional debt and deficit approach and could enable governments to take advantage of lower interest rates to borrow and invest in modernising public infrastructure.<sup>45</sup> This approach accounts for the value of the assets created, acquired, or sold using new statistical data on the public sector balance sheet, and it encourages governments to generate assets with value exceeding the cost of financing. It could also guide discussions about non-debt liabilities such as unfunded public sector pensions.<sup>46</sup>

**Country-specific solutions might require discretionary decisions.** Building on existing arrangements, member states could retain their discretion over decision-making about conditions that would allow for a country-specific budgetary leeway to safeguard investment spending. As with the old investment clause, member states might require respect for safety margins to ensure the 3% of GDP deficit reference value<sup>47</sup> or respect for a reinforced investment framework, with decisions possibly taken in accord with independent assessment guidelines.

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<sup>45</sup> See e.g. Hughes et al. (2019), *Totally (net) Worth It: the next generation of UK fiscal rules*.

Gaspar, V. (2019), *Future of Fiscal Rules in the Euro Area*.

<sup>46</sup> Auerbach, A. (2019), *The future of fiscal policy*.

<sup>47</sup> In spring 2014, the European Commission rejected a request by the Italian authorities' to activate the investment clause because they could not ensure the compliance with the debt rule.

### **3. Towards a new fiscal framework: a way forward**

*The pandemic offers an opportunity to draw lessons from the past and improve the existing rules. The member states could agree on a more credible framework after a transition period, contingent on economic developments, political reality, and subject to legal constraints to SGP revisions. Our ideas, articulated in this chapter, aim to balance sustainability and stabilisation in the 'new normal', which includes growth challenges, lower interest rates, and a strong interaction between fiscal and monetary policy. The proposal combines elements from the existing framework and recent proposals, with an emphasis on simplicity and enforceability. It also takes into account hurdles stemming from the EU legal framework and the transaction costs of political decision-making.*

*We suggest a public debt anchor at 100% of GDP, an expenditure rule that would cap expenditure growth by output trend growth, and a hard fiscal deficit limit at 3% of GDP. Member states with debt above the 100% threshold would need to adopt a target expressed in terms of primary balance consistent with a common predetermined debt reduction pace, complementing the general expenditure rule. A new condition-based framework could provide additional compliance incentives.*

**Any change to the future fiscal framework and its adoption timeline will depend on political, legal, and economic factors, and should be carefully calibrated.** The pandemic crisis required the activation of the general escape clause, and the aftermath generated questions about the duration of the clause and the relevance of existing rules. Key decisions on fiscal guidance for 2023 will be taken between March and May 2022, and the discussions on any new rules will be shaped by both economic arguments and political considerations.

**Taking decisions on fiscal guidance and potential reform of the fiscal framework matters for market perceptions.** Markets' attention has shifted from the immediate crisis response to post-2021 fiscal policy plans. As the pandemic crisis abates, markets will increasingly scrutinise EU sustainability and national policy responses. Temporary fiscal support will have to be gradually phased out to maintain sustainable debt levels.

**The transition towards a new fiscal framework should ensure transparency of fiscal accounts, and balance growth with fiscal sustainability concerns.** The transition to a new set of rules should depend on the pace of the recovery and incorporate clear guidance to ensure responsible fiscal behaviour and minimise moral hazard.

### **EU legal framework and constraints to Stability and Growth Pact revision**

**The SGP is anchored in European and international law.** Since the Maastricht Treaty, EU primary law has acted as the backbone for fiscal policy coordination. Its provisions and the annexed protocol stipulate key procedures and requirements that include the key reference values of 3% for deficit-to-GDP and 60% for debt-to-GDP. The overall commitment to fiscal discipline was further developed in a number of EU regulations and was reinforced by the 2012 TSCG signature in, an international treaty outside the EU legal framework.

**The complex interaction between different rules is further specified in non-legislative documents.** In practice, two key documents – the Vade Mecum on the SGP and the Code of Conduct – guide the European Commission and the member states when applying EU legislation.

**The two reference values could be amended without a treaty change or national ratification.**

The 3% and 60% criteria are defined in Article 126(2) of the Treaty on the Functioning of the European Union (TFEU), and quantified in Protocol 12. The one twentieth rule is specified in Regulation 1467/1997<sup>48</sup>, and codified in the TSCG. In our view, all of these could be amended by an EU Regulation based on the TFEU Article 126(14). This would require unanimity in the European Council, but would not be subject to national ratification.<sup>49</sup> Changes to the Treaty and Protocol 12 can normally be made only through formal treaty revision, via the ‘ordinary’ or ‘simplified’ procedure.<sup>50</sup> The simplified procedure can be used to change the 3% and the 60% thresholds in the Protocol 12.<sup>51</sup> However, TFEU Article 126 provides for a special legislative procedure that allows amendments to the individual provisions of Protocol 12, upon unanimous decision in the European Council and after consultation of the ECB and the European Parliament.<sup>52</sup>

**The one twentieth debt reduction rule is laid down in both EU and international law, and would likely be more difficult to change.**

Adjusting the one twentieth rule would require amending Regulation 1467/1997,<sup>53</sup> but that is also laid down in the TSCG, together with the 60% threshold. According to the TSCG,<sup>54</sup> when a country’s debt-to-GDP ratio exceeds 60%, it shall reduce it at an average rate of one twentieth per year as a benchmark, as provided for in the EU Regulation. The TSCG explicitly only applies to the extent that it is compatible (i.e. not conflicting) with EU law. The relevant acts of secondary law do not entail a full harmonisation of the rules on government debt, but rather define minimum requirements. As a result, EU Member States remain free, in principle, to adhere to incremental, stricter rules that go beyond their EU law obligations. Consequently, it is legally possible that they remain bound by the TSCG as a matter of international law, even if the respective EU law requirements are amended.<sup>55</sup> This might be remedied, depending on the precise issue, by a joint interpretative declaration, or by the TSCG signatories mutually agreeing to a (temporary) suspension of the operation of certain provisions of the TSCG pursuant to Article 57 of the 1969 Vienna Convention on the Law of Treaties.

**The one twentieth debt reduction rule may best be adjusted by using a TSCG clause on transposition into EU law to avoid changing the TSCG (including ratification).**

The TSCG includes an obligation to incorporate its provisions into EU law within five years from its ratification.<sup>56</sup> Therefore, the EU could arguably adopt or amend a regulation, still on the basis of TFEU Article 126(14), to incorporate the TSCG in secondary EU law. In the course of doing so, it may even slightly alter its substance, subject to the general conditions and limits set out in the EU Treaties. In this way, the one twentieth rule may arguably be amended without the need for national ratification procedures.

<sup>48</sup> Council Regulation (EC) No 1467/97 of 7 July 1997 on speeding up and clarifying the implementation of the excessive deficit procedure, as amended by Council Regulation (EU) No 1177/2011 of 8 November 2011.

<sup>49</sup> As regards Germany, using Article 126(14) TFEU is not listed in the *Integrationsverantwortungsgesetz* as a matter that requires prior approval of the Bundestag. However, the possibility of the Federal Constitutional Court taking a different view cannot be ruled out.

<sup>50</sup> Article 48, EU Treaty on European Union.

<sup>51</sup> The conditions for using the simplified procedure of 48(6), namely that the change does not create new competences for the Union and pertains to Title III of the TFEU (Union policies), are met for changing the 3% and/or 60% thresholds.

<sup>52</sup> Art. 126(14) TFEU provides that “[t]he Council shall, acting unanimously in accordance with a special legislative procedure and after consulting the European Parliament and the European Central Bank, adopt the appropriate provisions which shall then replace the said Protocol”. This is a *lex specialis* that allows the Council, within the parameters defined by Art. 126 and other Treaty provisions, to adjust the reference values of the deficit and debt ratios.

<sup>53</sup> Article 2(1a) of Council Regulation (EC) No 1467/1997 on speeding up and clarifying the implementation of the excessive deficit procedure, as amended by Council Regulation (EU) No 1177/2011 of 8 November 2011.

<sup>54</sup> Article 4, TSCG.

<sup>55</sup> The introductory phrase of Article 3(1) TSCG makes clear that its stricter rules (notably the lower structural deficit limit of 0.5%) apply “in addition and without prejudice to” EU law.

<sup>56</sup> Article 16 TSCG expressly provides that, “within five years, at most [...], the necessary steps shall be taken [...] with the aim of incorporating the substance of this Treaty into the legal framework of the European Union”.

## A new fiscal framework

**Our proposal starts from a realisation that the original link between the deficit and debt anchor is no longer valid.** As discussed in Chapter 1, the 3% deficit limit was considered adequate to stabilise the economy in response to shocks and, conditional on the 5% nominal growth, to stabilise debt-to-GDP at 60%. The 60% debt ratio was close to the euro area average at the time, and deemed serviceable under the prevailing macroeconomic situation.

**Now, higher debt levels are serviceable, even though the expected nominal growth is lower.** Interest rates and the debt servicing burden – already on a steadily falling trend before the pandemic – have been driven lower globally for an extended period of time and are likely to remain below levels seen during the 1990s when the EU fiscal framework was derived. The interest rate decline has raised the debt level that can be comfortably serviced, even though steady state nominal growth for most euro area countries is now lower, estimated at about 3%.

**In the foreseeable future with lower growth and a low interest rate environment, the 3% deficit limit would be consistent with a debt anchor at 100% of GDP.** The 100%-debt-to-GDP reference value is consistent, at the steady state, with the 3% deficit limit and a 3% nominal growth rate. In the present macroeconomic context of weak demand, restrained inflation compared to the decades ago, and interest rates at the effective lower bound, public spending remains a strong driver of growth, increasing the steady state debt level. Market appetite for more public debt renders the 100% debt-to-GDP anchor acceptable. Given the present debt levels, the 100% value is a more realistic target (Boxes 3–5), close to the current euro area average, as was the 60% limit when adopted. Insisting on a 60% debt-to-GDP anchor would either involve unrealistic reduction efforts over 20-year, or necessitate extending the convergence horizon beyond that, essentially rendering the limit ineffective.

### Box 3. The 3% reference value

**The deficit reference value has been a reasonable and empirically backed anchor.** The fiscal deficit growth elasticity implied that a 1% decrease in output would lead to a 0.5% deficit increase. With a deficit at about 1.5% of GDP in normal times, a 3% output gap – consistent with a typical recession – would push deficit to 3% of GDP.<sup>57</sup> The 60% limit for debt-to-GDP reflected the average value in the euro area, and was linked to the 3% deficit limit through the basic debt accumulation equation.<sup>58</sup> In a steady state, a country's debt-to-GDP ratio should converge to a level that equals the deficit ratio divided by the nominal growth rate of GDP, at the time expected to hover around 5%. The framework's simplicity made political buy-in easier.

**Experts and institutions supported the 3% deficit reference value and the medium-term target of balanced or positive budget outturn.** Buti et al. (1997) applied the envisaged framework to the European fiscal and macroeconomic data over 1961–1996.<sup>59</sup> Their results emphasised a need for a shift in member state policies towards accumulation of buffers in upswings. Such fiscal buffers help countries restore a deficit swiftly to under the 3% ceiling in any cyclical downturn. The OECD<sup>60</sup> and the IMF<sup>61</sup> confirmed that a structural deficit between 0.5 and 1.5% GDP would provide sufficient space to allow automatic stabilisers to operate without breaching

<sup>57</sup> Canzoneri, M. B., Diba, B. T. (2000), The SGP: Delicate balance or Albatross? In *The Stability and Growth Pact – The Architecture of Fiscal Policy in EMU* eds. by Brunila et al. (2001).

<sup>58</sup>  $b=d/y$ ;  $b$ =debt-to-GDP,  $d$ =deficit-to-GDP,  $y$ =nominal growth. Morris, R., Ongena, H., Schuknecht, L. (2006), *The Reform and Implementation of the Stability and Growth Pact*.

<sup>59</sup> Buti et al. (1997), *Budgetary Policies during Recessions – Retrospective Application of the Stability and Growth Pact to the Post-War Period in the European Commission*.

<sup>60</sup> OECD (1997), *Economic Outlook*, 1997, p. 24.

<sup>61</sup> IMF (1998), *World Economic Outlook: October 1998*, pp 131-136.

the 3% reference value in the event of a mild cyclical downturn.<sup>62</sup>

**The 3% deficit value remains a good policy anchor, consistent with a higher public debt anchor.** The 3% deficit limit has proven a good anchor for fiscal policy, and there is a general agreement that it has been an effective limit and should be retained; it is consistent with the higher 100% of GDP debt limit, the more realistic target this paper endorses.<sup>63</sup>

**The new rules would contain debt and deficit reference values, adjusted to new economic circumstances, and would incorporate an expenditure rule.** The new framework could be centred around two reference values. The 3% deficit-to-GDP reference value, which appears broadly acceptable and is institutionally well-established, could be preserved as a limit whose breach would trigger an excessive deficit procedure. As suggested by the IMF (2015, 1998)<sup>64</sup> and Heinemann (2020), highly sophisticated rules complicate communication and reduce the political cost of non-compliance. The 100%-debt-to-GDP reference value would replace the current 60% debt benchmark.<sup>65</sup>

**The medium-term objectives would be expressed as yearly expenditure ceilings.** For all member states, the growth in expenditure – net of EU funds co-financing, the cyclical impact of automatic stabilisers, and one-offs – would not be higher than the potential growth or trend growth rate.<sup>66</sup> For countries experiencing an investment gap identified by the European Commission and the EIB, expenditure growth could temporarily stand higher than the trend GDP growth rate. The expenditure path for the three years ahead would be expressed in terms of annual spending ceilings, to be revisited yearly on a rolling basis (alongside the projected growth path). For countries breaching the deficit or debt rule, expenditure growth could also be held below trend, leading to a faster debt reduction pace.

**Countries with debt below 100% of GDP would only be bound by the expenditure rule.** Given the macroeconomic situation, we do not envisage a debt-reduction pace for countries with debt levels lower than the 100% benchmark. The expenditure rule would act as an implicit debt brake for these countries, which would avoid unnecessary tightening in the euro area. This would also support domestic demand in lower-debt member states and external demand in higher-debt member states with greater consolidation needs.

**In addition to the expenditure rule, countries with debt above 100% of GDP would need to follow a realistic debt reduction path anchored on a primary-balance rule that reflected the economic situation.** The European Commission would calibrate the primary balance needed for the targeted debt reduction of excess debt of at least one twentieth per year, across a ‘rolling’ three-year horizon, to ensure continuous convergence towards the debt anchor. The required debt reduction pace would reflect economic circumstances, and deviations would be possible in exceptional circumstances – if warranted by economic developments – based on the Commission’s proposal and approval by the European Council. In the event of a severe downturn, the primary balance rule would be temporarily suspended in favour of the expenditure rule to allow for national stabilisation policies but still keeping expenditure in check<sup>67</sup> (Scheme 1 and Annex 1). The right balance between political and expert discretion would contribute to the definition of a realistic adjustment path by adapting the required

<sup>62</sup> For comparison see a) Artis, M., J., Buti, M., *Setting Medium-Term Fiscal Targets in EMU*;

b) Dalsgaard, T., de Serres, A., *Estimating Prudent Budgetary Margins In The Stability and Growth Pact – The Architecture of Fiscal Policy in EMU* eds. By Brunila et al. (2001).

<sup>63</sup> The 3% deficit would stabilise the debt-to-GDP ratio at 100% under the baseline macroeconomic outlook scenario (with nominal growth and inflation at 1% and 2% respectively).

<sup>64</sup> Andrieu et al. (2015), *Reforming Fiscal Governance in the European Union*, p. 4. Kopits, G., Symansky, S. A. (1998), *Fiscal Policy Rules*. Heinemann, F. (2018), *How could the Stability and Growth Pact be simplified?*

<sup>65</sup> The 3% deficit limit would remain valid for all including for lower-debt euro area member states.

<sup>66</sup> This could be exploited, and tax breaks added to the package. It is a risk, but remains contained to years of economic shocks.

<sup>67</sup> Switching to the expenditure rule in downturns will necessitate defining downturns, which could be different from recessions.

adjustment speed.

Scheme 1.

#### Sequencing of the expenditure and primary balance rules

Member states with debt > 100% of GDP	Member states with debt < 100% of GDP
<p><b>No downturn</b></p> <ul style="list-style-type: none"> <li>• Primary balance rule implying a debt reduction of one twentieth per year</li> </ul> <p><b>Severe downturn or productive investment gap</b></p> <ul style="list-style-type: none"> <li>• Expenditure rule</li> <li>• No pre-set debt reduction requirement</li> </ul>	<p><b>Under all circumstances</b></p> <ul style="list-style-type: none"> <li>• Expenditure rule</li> </ul>

**A recession or productive investment gap could trigger an exception clause and allow a deviation from the annual targets.** Should a recession occur, or the European Commission and the EIB identify a significant investment gap, member states could ask the Commission to activate an escape clause, with European Council approval. The European Commission could then grant leeway to finance predefined productive investments. This arrangement could build on existing provisions,<sup>68</sup> further underpinned by requirements that outline investment accounting details.<sup>69</sup>

**Breaching the 3% deficit limit, expenditure ceilings, or primary balance targets for member states above the 100% reference value would trigger a discussion on whether circumstances justify it or an excessive deficit procedure is warranted.** Exceptional circumstances justifying the breach could at the same time allow to activate European safety nets, such as a new fiscal stabilisation instrument (Box 6). Breaching the expenditure or deficit limits would not lead to sanctions, but would be registered in an adjustment account that keeps track of repeated non-compliance. Cumulative deviations could serve as a starting point for discussions about conditions to be attached to financial support, for example in the context of the subsequent EU's Multiannual Financial Framework.

<sup>68</sup> For comparison, see e.g. Darvas, Z., Wolff, G. (2021), *A green fiscal pact: climate investment in times of budget consolidation*.

<sup>69</sup> For details, see e.g. Cottarelli, C. (2020), *The role of fiscal rules in relation with the green economy*.

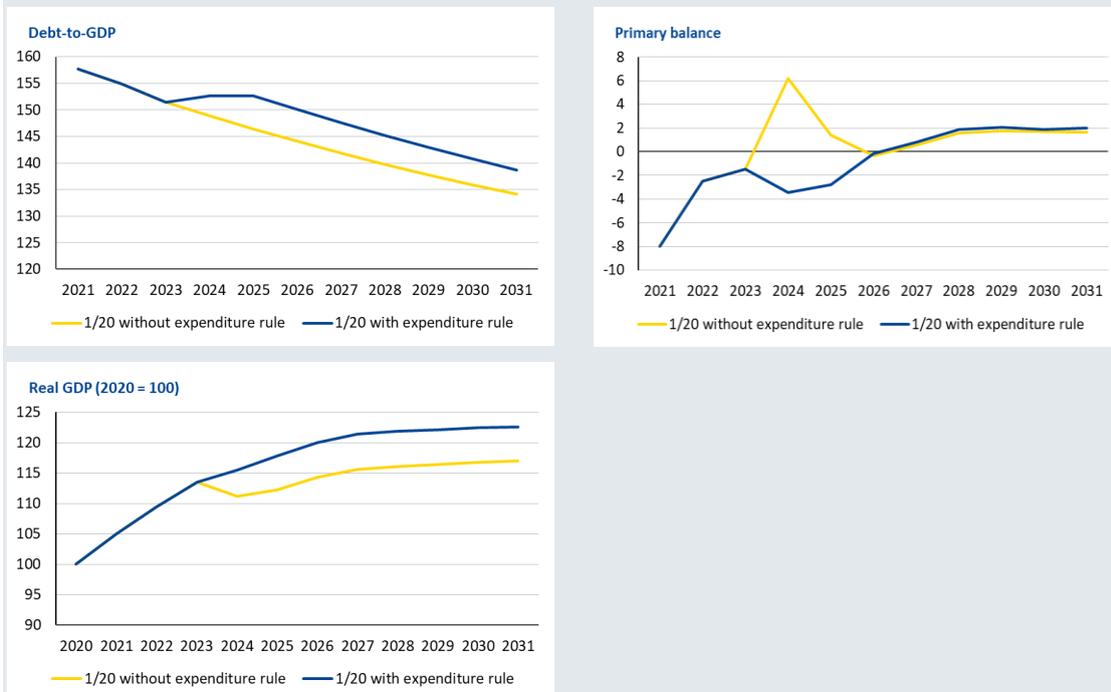
#### Box 4. Combining a debt rule and an expenditure rule: flexibility when most needed

**Strict compliance with a debt rule would require extraordinary fiscal effort during times of crisis.** We illustrate the benefits of flexibility with a hypothetical and simplified exercise that uses as an example a country with debt close to 160% of GDP, and discuss the implications of sticking to a debt rule that foresees debt reduction by one twentieth of the excess over the 100% debt threshold during an economic downturn. The exercise assumes an economic downturn that depresses growth by two percentage points below the baseline, and a recovery towards baseline growth by 2026. In such a situation, the primary balance required to comply with the debt rule would amount to about 6% of GDP in 2024 and 1.5% of GDP in 2025, and settle on average to about 1.7% of GDP after the recovery.<sup>70</sup> Sticking to the debt reduction rule would bring debt to 134% of GDP in 2031, at the cost of a sharp fiscal adjustment during a downturn.

**On the other hand, a transition period of two years, during which the debt reduction rule is suspended and expenditure grows in line with trend GDP, would support a steady GDP growth in the medium run (Figures 13–15).** We next assume the same economic downturn as above, but allow primary expenditure over 2024–2025 to grow in line with historical trend growth, using the 2012–2019 average. The debt rule would apply again in 2026. We also assume a constant revenue-to-GDP ratio for these two years. In such a scenario, the required fiscal effort over the 2024–2025 period would be much less, with a strong positive effect on growth. Primary balance over 2026–2031 would be marginally higher than in the debt-rule scenario, settling on about 2%. The debt-to-GDP ratio in 2031 would amount to about 138%, about four percentage points higher compared to the debt rule scenario. However, real GDP would suffer no major contraction, permanent output loss would be minimised, and a painful fiscal adjustment avoided.

Figures 13–15

#### Macro-fiscal effects of a strict application of the debt rule and a transitional expenditure rule (Debt, primary balance: % of GDP, GDP: 2020 = 100)



Note: The computations are based on simplifying assumptions.  
Sources: ESM, Ameco

**Our proposal entails two main differences from that of the EFB: an expenditure rule with real growth trend as a benchmark, and an additional primary balance rule for debt reduction.** While the expenditure growth benchmark in the EFB report is based on trend growth of potential output, ours is based on that of real output to avoid polemics about revisions of potential output. In addition, we introduce a primary balance rule for debt reduction, to minimise the need for revenue-side adjustments.<sup>71</sup> In our proposal, the debt reduction pace would be at one twentieth per year. The required adjustment would shrink significantly were the debt reference value to increase to 100% debt-to-GDP.

**Deviations from the debt reduction pace should only be allowed in economically tough times, but this is likely a politically sensitive issue.** Changing the debt reference value to 100% of GDP could help avoid creative rule interpretation that would undermine its effectiveness. While ostensibly allowing for higher debt, the 100% reference value would help strengthen the credibility of the fiscal framework and a more realistic benchmark would support a straightforward interpretation of the rules, preventing stretching the framework.

#### **Box 5. A counter-argument to a change in the 60% reference value for debt?**

**What would be the argument for keeping the current 60% debt-to-GDP reference value?** Apart from the legal question as to what it would take to raise the debt limit (see below), the economic case for retaining the existing limit rests on the view that public debt above 60% of GDP is too dangerous because it would entail a heightened rollover risk, which should be minimised. The argument notes that fiscal shocks are unevenly distributed (biased to the downside), exacerbated by the time inconsistency of fiscal policy. In particular, there is the pervasive risk of a very large adverse shock, like the Covid-19 one, resulting in an acute market reaction and a sudden stop. While such a risk may seem small, it would generate a very high negative impact were it to materialise. Therefore, policies ‘in peace time’ should guard against it, mainly by building buffers and keeping debt and financing needs low. In terms of the EU fiscal rules, this would imply that, for any country with debt above a relatively low level, fiscal policy should be geared toward debt reduction. In this perspective, the precise level of the debt limit is also somewhat arbitrary, although certainly far below 100%, and keeping the 60% is seen as the most practical. The problem of resulting unrealistic adjustment paths for a number of countries could be addressed by lengthening – possibly by a lot – the one twentieth rule.

**These arguments have some value, but we believe the disadvantages outweigh the potential benefits and, on balance, a strong case exists for raising the debt limit to 100%.** A rule that posits a debt limit very distant from current levels for many euro area countries appears to be a major flaw that cannot be cured by simply lengthening the adjustment period, and so reduces credibility. This period would have to be very long for a number of countries to realistically achieve a 60% target; for some it could stretch to over half a century or longer, so the adjustment period rule itself would likely come to be regarded as esoteric and lacking policy relevance. From an economic viewpoint, keeping the 60% value also ignores the secular changes noted above that have improved sovereign financing conditions in a significant and sustained way, undoubtedly raising the debt carrying capacity of euro area countries.

<sup>70</sup> The exercise assumes a fiscal multiplier of 0.4 during the recession. Tightening spending would deepen the economic downturn, and necessitate a significant primary surplus to compensate for the drop in output and keep the debt-to-GDP ratio in line with the rule.

<sup>71</sup> Currently, both the expenditure benchmark as well as the medium-term objective require quantification of the discretionary revenue and expenditure measures. The focus on primary balance could shift the discussion towards the country’s capacity to raise taxes to finance the desired net expenditure growth that is compatible with the required speed of debt reduction. See e.g. EFB (2020), Annual Report 2020, p. 88-90. European Commission (2019), *Vada Mecum on the Stability and Growth Pact*, p.35.

**Strong fiscal councils and statistical offices that underpin the transparent and encompassing reporting and monitoring of public finances will help to reduce fiscal risks and promote efficient management of public finance.** The pandemic crisis has again demonstrated the value of transparent reporting, quantification, and classification of public finances. Independent institutions and statistical offices could further improve EU reporting at both the national and EU level, together with stronger monitoring. Giving independent fiscal councils or other institutions appropriate mandates and resources would help enhance fiscal performance and avoid past mistakes that aggravated earlier crises.<sup>72</sup>

**However, EU fiscal targets could benefit from additional compliance incentives and enforcement.** Extra incentives could make the state-contingent rules more credible and palatable, without resorting to frequent framework changes. Incentives could be strengthened by linking the EU financial support to the prior compliance with fiscal rules or tightening the policy conditions when financial support is provided.

**The EU budget could support compliance with fiscal rules and fiscal discipline through the momentum of accelerated growth.** Maintaining the reform momentum to ensure strong growth remains key, and helps longer-term compliance with fiscal rules. A strong EU budget would support growth and help encourage reforms. Mauro and Zilinsky (2016) show that differences in growth rates are key in determining changes in the debt-to-GDP ratios.<sup>73</sup>

**Conditions associated with the EU financial instruments should more clearly reflect their economic purpose.** The conditions<sup>74</sup> attached to the EU budget and to financial assistance should reflect the stabilization, structural support or crisis resolution objective of the respective instrument. This is particularly relevant for discussions about deeper fiscal integration, including the establishment of a stronger central European budget and about a fiscal stabilisation function (Box 6).<sup>75</sup>

#### Box 6. Euro area fiscal stabilisation function and its interaction with fiscal rules

**The case for a euro area fiscal stabilisation function triggered in exceptional circumstances is well established.**<sup>76</sup> Euro area countries<sup>77</sup> cannot benefit from country-specific monetary policy, unlike EU Member States outside the euro area. An instrument that provides fiscal stimulus or loans at low cost when a country faces a severe external, asymmetric shock would provide the needed and timely fiscal space, and allow for discretionary stimulus alongside automatic stabilisers.

**A strong countercyclical response would build confidence, reduce spillovers from affected countries, and preserve monetary union stability.** Public spending, notably investment, consumption, or transfers targeted to liquidity-constrained households, has proven effective in

<sup>72</sup> Beetsma et al. (2018), *Independent Fiscal Councils: Recent Trends and Performance*.

<sup>73</sup> Mauro, M., Zilinsky, J. (2016), *Reducing Government Debt Ratios in an Era of Low Growth*.

<sup>74</sup> The Multiannual Financial Framework is associated with ex-ante conditionality and ex-post conditionality. For 2014–2020, legislation governing the Multiannual Financial Framework stipulated a set of 48 ex-ante conditionalities including legal, policy and administrative requirements. The Multiannual Financial Framework is also associated with ex-post macroeconomic and infringement conditionality. See e.g. Vita, V. (2018), *Research for REGI Committee - Conditionalities in Cohesion Policy*.

<sup>75</sup> For comparison see Alloza et al. (2021), *The Reform of the European Union's Fiscal Governance Framework in a New Macroeconomic Environment*.

<sup>76</sup> The stabilisation instrument could take the form of unemployment insurance or reinsurance fund, macroeconomic stabilisation fund, rainy day fund or an ESM credit line. A number of concrete models have been proposed in the last decade, e.g. Dullien (2013), Dolls et al. (2017), Beblavý, M., Lenaerts, K. (2017), Beblavý et al. (2015), Brandolini et al. (2015), Enderlein et al. (2013), Delbecq (2013), Furceri, D., Zdzienicka, A. (2013), Carnot, N., et al. (2017), Beetsma, R. et al. (2018), Lenarčič, A., Korhonen, K. (2018).

<sup>77</sup> This refers to a certain degree also to the ERM II countries.

stabilising output.<sup>78</sup> After the pandemic crisis, higher debt ratios may make it more challenging to maintain sufficient fiscal options, particularly when monetary policy support is phased out. Fiscal stabilisation policies are also considered more effective when monetary policy is constrained by the zero lower bound. This strengthens the case for a euro area fiscal stabilisation function.

**A revolving facility could serve this purpose.** It would not require an annual budget. For example, the ESM could provide a loan-based fiscal stabilisation facility to be repaid over the business cycle, subject to economic conditions and forecast-based eligibility criteria, and this could replace the temporary Pandemic Crisis Support instrument.

**The fiscal stabilisation funding could be triggered by exceptional circumstances,**<sup>79</sup> such as a severe economic downturn or an unusual event outside member state control. This kind of formulation excludes any automaticity in deciding that the member states in question is indeed facing exceptional circumstances. The European Commission's economic analysis would determine whether additional fiscal stabilisation and deficit above 3% are warranted. The assessment could be based on a combination of macroeconomic indicators, such as labour market indicators, GDP growth, or high frequency indicators of economic activity such as the purchasing managers' index. Access to the funds could be conditional on compliance with EU law, e.g. absence of European Council decisions on no effective action under the excessive deficit procedure or successive recommendations under the Macroeconomic Imbalance Procedure in the period preceding the severe circumstances.

**Recognition of exceptional circumstances and condition-based support provide for a natural link between the stabilisation function and fiscal rules.** Additional funds from a fiscal stabilisation function due to exceptional circumstances would mean that the European Commission and the European Council could consider a breach of the 3% budgetary deficit rule exceptional, such that it would not trigger an excessive deficit procedure and might also justify suspending the primary balance rule guiding debt reduction in the proposal explained above. Similarly, when a member state is already subject to an excessive deficit procedure, the European Commission and the European Council may issue revised recommendations granting longer deadlines – one more year usually – to meet their deficit targets when exceptional economic circumstances hamper the country's ability to achieve them. At the same time, a country's past track record of sufficient compliance with the rules would be an important determinant to access the funds, also supporting fiscal discipline in normal times.

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<sup>78</sup> IMF (2020), *World Economic Outlook*.

<sup>79</sup> The definition and applicability of the exceptional circumstances clause would need to be agreed upon by the European Commission and the European Council.

## 4. Conclusions

**Fiscal discipline is no less important now than when EMU was established, and a credible fiscal framework is needed that suits the macroeconomic context.** Fiscal discipline remains a cornerstone of the monetary union. But returning to the pre-crisis combination of a 60%-of-GDP debt target and a debt adjustment pace could undermine economic recovery and potentially weaken commitment to the rules. The changed macroeconomic context calls for a reconsideration of the current fiscal framework, with realistic and effective rules that can credibly guide fiscal policies over the coming years.

**Agreeing on new rules as soon as possible and phasing them in once growth is on a stable footing could help guide market expectations and contain potential volatility.** Market uncertainty could push interest rates up, impacting government financing. A quick agreement on new rules, and on a timeline and conditions for their implementation as growth accelerates, could help stabilise expectations and increase transparency. Credible debt reduction paths could also help ensure favourable market financing conditions.

**At the same time, a transition period to converge to the fiscal rules may be necessary taking into account the prevailing economic uncertainty.** The application of fiscal rules, when the escape clause currently in place is lifted, should avoid abrupt fiscal tightening potentially undermining growth and triggering adverse feedback loops through financial systems and markets. Consistent application of flexibilities accounting for a severe downturn and investment gaps on a country-specific basis could prevent premature fiscal consolidation and limit the risks of persistent scarring.

**Our suggested approach combines elements from the existing framework with recent proposals, and takes into account hurdles stemming from EU law.** We suggest a public debt anchor at 100% of GDP, an expenditure rule that would cap expenditure growth by output trend growth, and a fiscal deficit limit at 3% of GDP. Member states with debt above the 100% threshold would in addition need to adopt a target expressed in terms of the primary balance consistent with a common predetermined debt reduction pace, complementing the general expenditure rule.

**The fiscal stabilisation instrument could help the euro area cope with external shocks and higher volatility related to uncertainty and macro-financial linkages.** In the last 10 years, three major crises hammered the euro area. Stronger macro-financial linkages have amplified macroeconomic volatility and contributed to sharper economic downturns in the past couple of decades. Asset price fluctuations can have a significant impact on the real economy.<sup>80</sup> Higher aggregate demand volatility, in turn, can lead to financial distress and prolonged economic downturns. The fiscal stabilisation instrument would help euro area governments cope with sharper downturns that could require additional public spending flexibility and ensure sustainable debt reduction.

**The revision of the EU fiscal framework provides a unique opportunity to promote sound fiscal institutions.** The revised framework could encourage regular discussions about good public financial management, the quality of public finances, the level and composition of public expenditure, and its financing via revenue and deficits. European peer pressure could also help ensure that independent fiscal institutions have the financing and conditions to fulfil their mandates and tasks. In addition, rethinking the non-legislative documents that interpret EU law could further increase the transparency across the methodology to assess rule compliance.

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<sup>80</sup> Adrian, T., Shin, H.S. (2010), *Liquidity and leverage*. Adrian, T., Shin, H.S. (2009), *Financial Intermediaries and Monetary Economics*. Brunnermeier, M., Oehmke, M. (2013), *Bubbles, Financial Crises, and Systemic Risk*.

## References

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Adrian, T., Shin. H.S. (2009), *“Financial Intermediaries and Monetary Economics”*, Federal Reserve Bank of New York, Staff Report no. 398 October 2009, Revised May 2010.

Adrian, T., Shin. H.S. (2010), *“Liquidity and leverage”*, *Journal of Financial Intermediation*, 2010, vol. 19, issue 3, 418-437, July 2010.

Alloza, M., Andrés, J., Burriel, P., Kataryniuk, I., Pérez, J. J., Vega, J. L. (2021), *“The Reform of the European Union’s Fiscal Governance Framework in a New Macroeconomic Environment”*, Banco de Espana, Documentos Ocasionales N.º 2121, August 2021.

Anderton, R., V. Jarvis, V. Labhard, J. Morgan, F. Petroulakis and L. Vivian (2020), *“Virtually everywhere? Digitalisation and the euro area and EU economies”*, ECB Occasional Paper, 244, December 2020.

Andrieu, M., Bluedorn, J., Eyraud, L., Kinda, T., Koeva Brooks, P., Schwartz, G. and Weber, A. (2015), *“Reforming Fiscal Governance in the European Union”*, IMF Staff Discussion Note SDN/15/09, May 2015.

Ardagna, S., Caselli, F., Lane, T. (2007), *“Fiscal Discipline and the Cost of Public Debt Service: Some Estimates for OECD Countries”*, ECB Working Paper Series No. 411, November 2004.

Artis, M. J., Buti, M., *Setting Medium-Term Fiscal Targets in EMU*, In *The Stability and Growth Pact – The Architecture of Fiscal Policy in EMU* eds. By Brunila A, Buti, M., Franco, D. (2001) Palgrave, ISBN: 978-0-230-62926-4

Dalsgaard, T., de Serres, A., *“Estimating Prudent Budgetary Margins”* In *The Stability and Growth Pact – The Architecture of Fiscal Policy in EMU* eds. By Brunila A, Buti, M., Franco, D. (2001) Palgrave, ISBN: 978-0-230-62926-4

Auerbach, A. (2019), *“The future of fiscal policy”*, Key note speech, Fourth ECB biennial conference on fiscal policy and EMU governance, December 2019.

Beblavy, M. and Lenaerts, K. (2017), *“Stabilising the European Economic and Monetary Union: What to expect from a common unemployment benefits scheme?”* CEPS Research Report No 2017/02, February 2017

Beblavy, M. Gros, D., Maselli, L. (2015), *“Reinsurance of National Unemployment Benefit Schemes,”* Centre For European Policy Studies, No. 401. January 2015.

Beetsma, R., Cima, S., Cimadomo, J. (2018), *“A minimal moral hazard central stabilisation capacity for the EMU based on world trade,”* CEPR Discussion Paper No. DP12600, January 2018

Beetsma, R., Debrun, X., Fang, X., Kim, Y., Lledó, V., Mbaye, S., Zhang, X. (2018), *“Independent Fiscal Councils: Recent Trends and Performance”*, IMF WP/18/68, March 2018.

Bénassy-Quéré, A., Brunnermeier, M., Enderlein, H., Farhi, E., Fratzscher, M., Fuest, C., Gourinchas, P.O., Martin, P., Pisani-Ferry, J., Rey, H., Schnabel, I., Véron, N., Weder di Mauro, B., Zettelmeyer, J. (2018), *“Reconciling risk sharing with market discipline: A constructive approach to euro area reform”*, CEPR Policy Insight No. 91, January 2018.

Bilbie, F., Monacelli, T., Perotti, R. (2020), *“Fiscal Policy in Europe: A Helicopter View”*, NBER Working Paper

28117, November 2020.

Blanchard, O., J., Giavazzi, F. (2004), *“Improving the SGP through a proper accounting of public investment”*, CEPR Discussion Paper No 4220, February 2004.

Blanchard, O., Leandro, A., Zettelmeyer, J. (2021), *“Redesigning the EU Fiscal Rules: From Rules to Standards”*, Working Paper. Peterson Institute for International Economics. February 2021.

Brandolini A., Carta, F., D’Amuri, F. (2015), *“A Feasible Unemployment-Based Shock Absorber for the Euro Area,”* IZA Policy Papers 97, Institute for the Study of Labor (IZA).

Brunnermeier, M., Oehmke, M. (2013), *“Bubbles, Financial Crises, and Systemic Risk”*, *Handbook of the Economics of Finance*, Volume 2, Part B. 2013, pp. 1221-1288, Amsterdam: Elsevier.

Buiter, W., Grafe, C. (2002), *“Patching up the Pact: Some suggestions for enhancing fiscal sustainability and macroeconomic stability in an enlarged European Union”*, Centre for Economic Policy Research, Discussion Paper Series No 3496, August 2002.

Buti, M., Franco, D., Ongena, H. (1997), *“Budgetary Policies during Recessions – Retrospective Application of the Stability and Growth Pact to the Post-War Period in the European Commission”*, *Recherches Economiques de Louvain*, vol. 63: 321-66, May 1997.

Canzoneri, M. B., Diba, B. T. (2000), *“The SGP: Delicate balance or Albatross?”* In *The Stability and Growth Pact – The Architecture of Fiscal Policy in EMU* eds. by Brunila A, Buti, M., Franco, D. (2001) Palgrave, ISBN 978-0-230-62926-4

Carnot, N. (2015), *“Evaluating Fiscal Policy: A Rule of Thumb”*. European Economy. Economic Papers 526. August 2014. Brussels.

Carnot, N., Kizior, M., Mourre, G. (2017), *“Fiscal stabilisation in the Euro-Area: A simulation exercise,”* No 17-025, Working Papers CEB, Université Libre de Bruxelles.

Caselli F., Wingender, P. (2018), *“Bunching at 3 Percent: The Maastricht Fiscal Criterion and Government Deficits”*, IMF Working Paper No. 18/182, January 2018.

Christofzik, D., Feld, L. P., Reuter, H. W., Yeter, M. (2018), *“Uniting European Fiscal Rules: How to strengthen the fiscal framework”*, Arbeitspapier, No. 04/2018, Sachverständigenrat zur Begutachtung der Gesamtwirtschaftlichen Entwicklung, Wiesbaden, February 2018.

Claeys, G., Darvas, Z., Leandro, A. (2016), *“A proposal to revive the European Fiscal Framework”*, *Bruegel Policy Contribution*, No. 2016/07, March 2016.

Cordes, T., Kinda, T., Muthoora, P., Weber, A. (2015), *“Expenditure Rules: Effective Tools for Sound Fiscal Policy?”*, IMF Working Paper 15/29, February 2015.

Cottarelli, C. (2020), *“The role of fiscal rules in relation with the green economy”*, European Parliament, Economic Governance Support Unit and Policy Department A Directorate-General for Internal Policies, PE 651.364, In-depth analysis requested by the ECON committee. August 2020.

Darvas, Z., Martin, P., Ragot, X. (2018), *“European fiscal rules require a major overhaul”*, *Bruegel Policy Contribution*, Issue no 18, October 2018.

Darvas, Z., Wolff G. (2021), *“A green fiscal pact: climate investment in times of budget consolidation”*, Policy Contribution 18/2021, Bruegel, September 2021.

Delbecq, B. (2013), *“Proposal for a Stabilisation Fund for the EMU,”* CEPS working document No. 385, October 2013.

Dolls, M., Fuest, C., Neumann, D., Peichl, A. (2017), *“A Comparison of Different Alternatives using Micro Data,”* International Tax and Public Finances, January 2017.

Enderlein, H., Guttenberg, L., Spiess, J. (2013), *“Blueprint for a cyclical shock insurance in the euro area,”* Jacques Delors Institute, September 2013.

Engen, E. M., Hubbard, R. G. (2004), *“Federal Government Debt and Interest Rates”*, NBER, Working Paper 10681, August, 2004.

European Central Bank (2017), *“The slowdown in euro area productivity in a global context”*, Economic Bulletin, Issue 3, pp. 47-67.

European Commission (2019), *“Communication from the Commission: The European Green Deal”*, Brussels, 11 December 2019 COM (2019) 640 final.

European Commission (2020), *“Debt Sustainability Monitor 2020”*, Institutional Paper 143, February 2021.

European Fiscal Board (2018), *“Annual Report 2018”*, September 2018.

European Fiscal Board (2019), *“Annual Report 2019”*, October 2019.

European Fiscal Board (2019), *“Assessment of EU fiscal rules with a focus on the six and two-pack legislation”*, August 2019.

European Fiscal Board (2020), *“Annual Report 2020”*, October 2020.

European Investment Bank (2019), *“EIB Investment Report 2019/2020 –Accelerating Europe’s Transformation”*, November 2019.

Eurlex (2021), Treaty on Stability, Coordination and Governance, in the Economic and Monetary Union. Council of the European Union, 2012.

Eyraud, L., Gaspar, V., Poghosyan, T. (2017), *“Fiscal Politics in the euro area”*, IMF Working Paper No. 17/18, January 2017.

Furceri, D., Zdzienicka, A. (2013), *“The Euro Area Crisis: Need for a Supranational Fiscal Risk Sharing Mechanism?”* IMF Working Paper 13/198.

Furman, J., Summers, L. (2020), *“A Reconsideration of Fiscal Policy in the Era of Low Interest Rates”*, Brookings, November 2020.

Gaspar, V. (2019), *“Future of Fiscal Rules in the Euro Area”*, Keynote Address by the Director, Fiscal Affairs Department Workshop on “Fiscal Rules in Europe: Design and Enforcement” DG ECFIN, in Brussels, Belgium, January 2020.

Geier, A. (2011), *“The Debt brake – the Swiss fiscal rule at the federal level”*, Working Paper of the FFA No 1,

February 2011.

Goodhart, Ch., Pradhan, M. (2020), *“The Great Demographic Reversal: Ageing Societies, Waning Inequality, and an Inflation Revival.”* Palgrave Macmillan 2020. ISBN 978-3-030-42657-6.

Gros, D., Jahn, M. (2020), *“Benefits and drawbacks of an “expenditure rule”, as well as of a “golden rule in the EU fiscal framework”*, Economic Governance Support Unit, Directorate-General for Internal Policies, PE 614.523 - July 2020.

Guerguil, M., Mandon, P., Tapsoba, R. (2016), *“Flexible Fiscal Rules and Countercyclical Fiscal Policy”*, IMF Working paper, WP/16/8, January 2016.

Heimberger, O., Kapeller, J. (2017), *“The performativity of potential output: pro-cyclicality and path dependency in coordinating European fiscal policies”*, *Review of International Political Economy*, Volume 24, 2017 - Issue 5, August 2017.

Heinemann, F. (2018), *“How could the Stability and Growth Pact be simplified?”*, European Parliament, Economic Governance Support Unit, Directorate-General for Internal Policies of the Union, PE 614.501, April 2018

Hughes, R., Leslie, J., Pacitti, C., Smith, J. (2019), *“Totally (net) Worth It: the next generation of UK fiscal rules”*, Resolution Foundation, October 2019.

IMF (1998), *“World Economic Outlook”*, Washington, DC, October 1998.

IMF (2020), *“World Economic Outlook”*, Washington, DC, April 2020.

Independent Evaluator Joaquín Almunía (2020), *“Lessons from Financial Assistance to Greece”*, ESM, June 2020.

Kamps, Ch., Leiner-Killinger, N. (2019), *“Taking stock of the functioning of the EU fiscal rules and options for reform”*, ECB Occasional Paper No 231, August 2019.

Kopits, G., Symansky, S. A. (1998), *“Fiscal Policy Rules”*, IMF Occasional Paper No. 162, July 1998.

Laubach, T. (2009), *“New Evidence on the Interest Rate Effects of Budget Deficits and Debt”*, *Journal of the European Economic Association*, Vol. 7, No. 4 (Jun., 2009), pp. 858-885.

Lenarčič, A., Korhonen K. (2018), *“A case for a European rainy day fund”*, ESM Working Paper, November 2018.

Lian, W., Presbitero, A. F., Wiriadinata, U. (2020), *“Public Debt and  $r - g$  at Risk”*. IMF WP/20/137, June 2020.

Manescu, C. B., Bova, E. (2020), *“National Expenditure Rules in the EU: An Analysis of Effectiveness and Compliance”*, European Commission, Discussion Paper 124, April 2020, Brussels.

Martin, P., Pisani-Ferry, J., Ragot, X. (2021), *“Reforming the European Fiscal Framework”*, French Council of Economic Analysis. No. 63. April 2021.

Mauro, M., Zilinsky, J. (2016), *“Reducing Government Debt Ratios in an Era of Low Growth”*, Peterson Institute for International Economics Policy Brief 16-10, July 2016.

OECD (1997), *“Economic Outlook”*, OECD, Paris, 1997.

OECD (2010), *"Tax expenditures in OECD countries"*, OECD, Paris 2010.

OECD (2015), *"The future of productivity"*, OECD, Paris, 2015.

Rogoff, K. (2019), *"Government Debt Is not a Free Lunch"*, Project Syndicate. December 2019.

Schwartz, G., Fouad, M., Hansen, T., Verdier, G. (2020), "Well Spent: How Strong Infrastructure Governance Can End Waste in Public Investment", in *"Well Spent"*, eds. Schwartz, G., Fouad, M., Hansen, T., S., Verdier, G., (2020), IMF, Washington, September 2020, ISBN 9781513511818.

Servén, L. (2007), "Fiscal Rules, Public Investment, and Growth", *Policy Research Working Paper*, No. 4382. World Bank, Washington, DC.

## Annex 1: 100% reference value proposal

Debt level	Public debt < 100% of debt-to-GDP	Public debt > 100% of debt-to-GDP
<b>Rule description</b>	<b>Expenditure rule:</b> One operational target formulated as a ceiling on the growth rate of primary expenditure, net of discretionary revenue measures. The benchmark value for the growth rate of nominal expenditure could be set based on the trend growth of GDP.	<b>Expenditure rule:</b> One operational target formulated as a ceiling on the growth rate of primary expenditure, net of discretionary revenue measures. The benchmark value for the growth rate of nominal expenditure could be set based on the trend growth of GDP. <b>Additional key benchmark:</b> Primary balance rule including country-specific debt reduction pace to prevent member states from missteps on the revenue side.
<b>Debt limit/target</b>	100%	100%
<b>Annual operational rule</b>	Expenditure ceiling	Primary balance target Expenditure ceiling
<b>Benchmark against which the growth of nominal expenditures will be evaluated</b>	Trend output growth	Trend output growth
<b>Adjustment horizon/adjustment path</b>	Country-specific debt adjustment pace based on macroeconomic scenario, three-year rolling targets subject to yearly revisions if considered warranted by the Commission	
<b>Adjustment/compensation account absorbing limited deviations</b>	Deviations from expenditure ceiling Deviations from primary balance targets	
<b>Escape clause</b>	Allows deficit above 3% GDP, if existence of exceptional circumstances: a) severe downturn b) investment gap Access allowed to fiscal stabilisation function Access denied: increased conditionality attached to future EU funding	
<b>Sanctions</b>	Increased degree of ex-ante conditionality attached to future EU funding	
<b>Positive incentives</b>	Additional funding available in case of good track-record, only limited or no conditionality attached to the EU budget	
<b>Preventive arm</b>	Violation of 3% deficit, expenditure ceiling, primary balance targets	
<b>Corrective arm</b>	Breaching pre-defined limit on adjustment/compensation account	
<b>Escape clause</b>	Only one: existence of pre-defined exceptional circumstances a) investment gap b) severe downturn	

## Annex 2: Public debt developments: 1995–2022, projections for 2021–2022

year/country	Euro area	AT	BE	CY	EE	ES	FI	FR	DE	EL	IE	IT	LT	LU	LV	MT	NL	PT	SK	SI
1995	71.43%	68.32%	131.29%	49.04%	7.96%	61.54%	55.15%	56.11%	54.90%	98.99%	78.62%	119.36%	11.53%	9.79%	13.89%	34.15%	73.09%	62.21%	21.59%	18.24%
1996	73.46%	68.26%	129.00%	50.29%	7.49%	65.41%	55.31%	60.00%	57.79%	101.34%	69.94%	119.11%	13.92%	9.55%	13.26%	38.51%	71.34%	63.31%	30.64%	21.56%
1997	72.96%	63.49%	124.27%	54.12%	6.88%	64.25%	52.22%	61.43%	58.87%	99.45%	61.60%	116.78%	15.37%	9.39%	10.65%	46.39%	65.77%	58.72%	32.99%	22.06%
1998	72.58%	63.86%	119.19%	55.67%	5.94%	62.31%	46.83%	61.35%	59.53%	97.43%	51.46%	114.13%	16.54%	9.07%	9.03%	50.74%	62.67%	55.62%	33.92%	22.73%
1999	71.48%	66.69%	115.36%	55.79%	6.43%	60.80%	44.05%	60.50%	60.14%	98.91%	46.63%	113.29%	22.70%	7.96%	12.08%	61.65%	58.57%	55.41%	47.05%	23.71%
2000	69.01%	66.12%	109.59%	55.74%	5.11%	57.82%	42.45%	58.88%	59.07%	104.93%	36.07%	109.03%	23.52%	7.46%	12.09%	60.65%	52.07%	54.19%	50.45%	25.92%
2001	68.01%	66.73%	108.22%	57.32%	4.77%	54.05%	40.92%	58.34%	57.94%	107.08%	33.23%	108.89%	22.92%	7.67%	13.84%	64.89%	49.44%	57.38%	51.11%	26.06%
2002	67.96%	66.73%	105.44%	60.52%	5.66%	51.25%	40.18%	60.26%	59.70%	104.86%	30.55%	106.36%	22.17%	7.43%	13.02%	63.15%	48.78%	60.04%	45.30%	27.36%
2003	69.30%	65.85%	101.66%	63.84%	5.60%	47.71%	42.75%	64.41%	63.31%	101.46%	29.93%	105.49%	20.39%	7.45%	14.12%	68.63%	49.98%	63.90%	43.24%	26.78%
2004	69.62%	65.19%	97.17%	64.77%	5.11%	45.37%	42.64%	65.94%	64.99%	102.87%	28.21%	105.10%	18.69%	7.91%	14.61%	71.29%	50.28%	67.10%	41.72%	26.90%
2005	70.33%	68.64%	95.14%	63.44%	4.70%	42.43%	39.93%	67.38%	67.35%	107.39%	26.07%	106.56%	17.65%	8.02%	11.91%	69.90%	49.80%	72.25%	34.73%	26.40%
2006	68.34%	67.31%	91.49%	59.26%	4.63%	39.06%	38.11%	64.61%	66.70%	103.61%	23.63%	106.74%	17.26%	8.30%	10.04%	64.28%	45.19%	73.68%	31.43%	26.06%
2007	65.94%	65.03%	87.32%	54.03%	3.77%	35.76%	33.90%	64.54%	63.99%	103.10%	23.92%	103.89%	15.89%	8.20%	8.46%	61.91%	42.98%	72.73%	30.35%	22.85%
2008	69.63%	68.70%	93.16%	45.55%	4.50%	39.71%	32.56%	68.78%	65.52%	109.42%	42.44%	106.16%	14.58%	15.36%	18.59%	61.83%	54.69%	75.64%	28.60%	21.79%
2009	80.22%	79.85%	100.22%	54.29%	7.20%	53.26%	41.53%	83.04%	72.99%	126.74%	61.66%	116.60%	27.99%	16.15%	36.84%	66.34%	56.77%	87.80%	36.36%	34.53%
2010	86.01%	82.70%	100.27%	56.43%	6.61%	60.52%	46.90%	85.26%	82.38%	147.49%	86.02%	119.20%	36.21%	20.15%	47.92%	65.32%	59.25%	100.21%	40.93%	38.27%
2011	88.39%	82.44%	103.49%	65.94%	6.10%	69.85%	48.27%	87.83%	79.80%	175.22%	110.98%	119.70%	37.13%	19.00%	43.67%	69.27%	61.70%	114.40%	43.41%	46.46%
2012	92.68%	81.92%	104.81%	80.34%	9.76%	86.31%	53.62%	90.60%	81.14%	161.94%	119.95%	126.50%	39.70%	22.00%	42.18%	65.93%	66.21%	129.04%	51.69%	53.56%
2013	94.93%	81.27%	105.49%	103.95%	10.16%	95.78%	56.23%	93.41%	78.72%	178.43%	119.90%	132.46%	38.67%	23.69%	40.04%	65.79%	67.66%	131.43%	54.64%	70.01%
2014	95.16%	84.05%	106.99%	109.09%	10.55%	100.70%	59.83%	94.89%	75.67%	180.23%	104.22%	135.37%	40.53%	22.74%	41.63%	61.59%	67.85%	132.94%	53.50%	80.30%
2015	93.09%	84.89%	105.17%	107.16%	10.00%	99.30%	63.64%	95.58%	72.21%	177.01%	76.71%	135.28%	42.52%	21.99%	37.07%	55.88%	64.63%	131.18%	51.88%	82.59%
2016	92.21%	82.84%	105.01%	103.06%	9.91%	99.17%	63.18%	97.96%	69.28%	180.80%	74.08%	134.78%	39.72%	20.09%	40.40%	54.20%	61.93%	131.51%	52.41%	78.52%
2017	89.74%	78.48%	102.01%	93.51%	9.11%	98.56%	61.17%	98.32%	65.12%	179.21%	67.00%	134.13%	39.12%	22.34%	39.01%	48.52%	56.94%	126.14%	51.54%	74.15%
2018	87.72%	74.04%	99.77%	99.18%	8.20%	97.43%	59.72%	97.95%	61.80%	186.24%	62.97%	134.40%	33.68%	20.95%	37.11%	44.80%	52.43%	121.48%	49.59%	70.29%
2019	85.82%	70.51%	98.07%	94.04%	8.44%	95.51%	59.47%	97.62%	59.66%	180.51%	57.36%	134.56%	35.91%	22.01%	36.97%	41.96%	48.71%	116.84%	48.23%	65.60%
2020	100.01%	83.92%	114.14%	118.23%	18.23%	119.96%	69.17%	115.72%	69.79%	205.65%	59.52%	155.81%	47.26%	24.85%	43.46%	54.27%	54.46%	133.60%	60.57%	80.85%
2021	102.35%	87.19%	115.34%	112.25%	21.27%	119.56%	71.02%	117.42%	73.02%	208.83%	61.38%	159.81%	51.94%	26.98%	47.32%	64.71%	57.94%	127.24%	59.46%	78.97%
2022	100.75%	85.03%	115.55%	106.57%	24.00%	116.85%	70.07%	116.38%	72.15%	201.47%	59.68%	156.57%	54.10%	26.85%	46.40%	65.48%	56.77%	122.27%	58.99%	76.72%

Source: European Commission, Ameco, May 2021

# Acronyms and abbreviations

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## ACRONYMS

ECB	European Central Bank
EFB	European Fiscal Board
EFSF	European Financial Stability Facility
EIB	European Investment Bank
EMU	Economic and Monetary Union
ESM	European Stability Mechanism
Eurostat	Statistical office of the European Union
GDP	Gross domestic product
IMF	International Monetary Fund
OECD	Organisation for Economic Co-operation and Development
SGP	Stability and Growth Pact
TFEU	Treaty on the Functioning of the European Union
TSCG	Treaty on Stability, Coordination and Governance in the Economic and Monetary Union

## COUNTRY CODES

ES	Spain
FR	France
IT	Italy
AT	Austria
DE	Germany
FI	Finland
EL	Greece
NL	The Netherlands
PT	Portugal
CY	Cyprus
IE	Ireland
UK	United Kingdom
US	United States of America