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Lifting Binding Constraints on Growth in Europe

Actionable Priorities to Deepen the Single Market

Nathaniel Arnold, Allan Dizioli, Alexandra Fotiou, Jan Frie, Burcu Hacibedel, Tara Iyer, Huidan Lin, Malhar Nabar, Hui Tong, and Frederik Toscani

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ABSTRACT: Focusing on a cross-border perspective, this paper identifies four key binding constraints that hinder firms' ability to innovate and scale up within the EU single market—fragmented regulations, inefficient financial intermediation, limited labor mobility, and fragmented energy market. To address these constraints and facilitate firms' cross border scale up, investment and innovation, the paper proposes key action areas for deepening the integration of the single market, including lowering regulatory fragmentation, advancing the capital markets union, enhancing labor mobility within the EU, and integrating the EU energy market. Through illustrative scenarios, the paper highlights that a few actionable steps along these dimensions could lead off the process of deeper integration and deliver a meaningful initial payoff by increasing the EU GDP level relative to baseline by around 3 percent over 10 years—a sizable improvement considering that the EU potential growth is projected to be just above 1 percent annually over this horizon.

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WORKING PAPERS

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Actionable Priorities to Deepen the Single Market

Prepared by Nathaniel Arnold, Allan Dizioli, Alexandra Fotiou, Jan Frie, Burcu Hacibedel, Tara Iyer, Huidan Lin, Malhar Nabar, Hui Tong, and Frederik Toscani[1]

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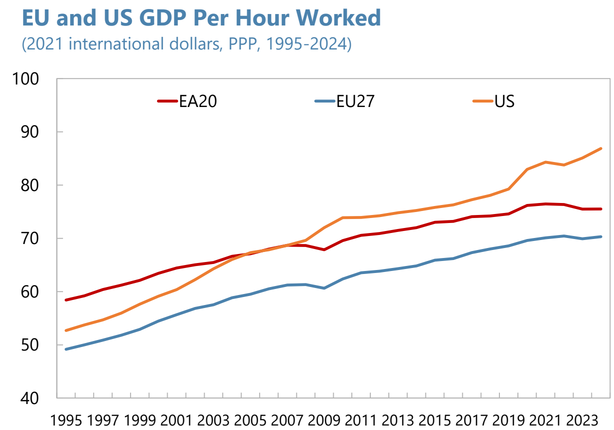
Contents

Introduction

In 1995, the level of labor productivity aggregated across the current European Union (EU)-27 member states was around 90 percent of the level of productivity in the United States (US). Over the subsequent three decades, despite having access to similar frontier technologies, the two blocks diverged. Labor productivity grew at a much slower pace in Europe than in the US such that, by 2024, output per hour in the EU was around 80 percent of the US level (IMF 2024a; Schnabel 2024; Figure 1).

Figure 1. Labor Productivity



Sources: IMF World Economic Outlook, Haver Analytics and IMF staff calculations.
Note: Current Euro area 20 members and European Union 27 members are included in the sample during 1995-2024.

Recent studies have traced Europe's relatively slow productivity growth in part to limited innovation and scale up of dynamic, innovative firms (Draghi 2024; IMF 2024a; Adilbish and others 2025; Schnabel 2024; Lopez-Garcia and Szörfi 2021; Erixon and others 2024). Specifically, small enterprises dominate Europe's production structure, accounting for a substantial portion of value added and employment. Their scale-up potential is often stymied by regulatory and financial constraints (Letta 2024; Draghi 2024).

Addressing barriers to scaling up is not only a matter of boosting productivity but also a critical step toward securing a prosperous and equitable future for Europe (European Commission 2025a). Slow productivity growth is a concern for any economy, but more so for one such as the EU, which is aging rapidly and will have increasingly fewer workers to support an expanding set of retirees. Conversely, achieving faster productivity growth and hence higher potential output in the EU would yield much needed additional resources, including for sustaining Europe's social model and intergenerational social contract; for enabling transformative investments in the clean energy and digital transitions; to strengthen defense capabilities; and to improve debt service capacity. Furthermore, stronger productivity growth can improve profitability and incentivize more investment, ultimately supporting healthy job creation and social cohesion.

In this paper, we identify four binding constraints at the level of the EU single market that impede cross-border scale up of firms, thereby hurting productivity growth: fragmented regulation, inefficient financial intermediation, insufficient labor mobility, and a fragmented energy system.

- Fragmented regulation creates inconsistencies in regulation across member states, lowers predictability, and increases transaction costs for productive firms looking to invest and scale up across borders.
- Inefficient and fragmented financial intermediation leads to small and shallow capital markets, limiting firms' access to capital, particularly for younger, smaller firms that often drive innovation and have the potential to grow.
- Insufficient labor mobility deprives productive firms of broad access to talent and reduces opportunities for improved skill matches and allocative efficiency gains. Rapid population aging adds to the scarcity of skills and accentuates the constraints on firms' ability to scale up.
- Finally, a fragmented energy market leads to high and volatile energy prices that deter investment.

Deepening the integration of the single market can help address these challenges, adding to the benefits past economic integration in the EU has delivered (IMF 2024b). Over the past three decades, the EU single market has expanded into an economic zone encompassing close to 450 million people and supports aggregate economic activity comparable to that of the economies of China and the US.[1] The benefits of a deeper single market are particularly apparent when looking at the Union as a whole. But contrary to the common political economy perception that deeper integration makes some countries win and others lose, this paper argues that gains from integration can accrue both for the entire Union and for individual member states.[2]

Enabling dynamic firms to scale up and enjoy the benefits of a larger customer base within the EU's single market will require both actions at the EU level and reforms in member states. This paper identifies actionable EU-level priorities that can deepen integration of the single market, ease the constraints listed above, and help firms scale up within Europe, thereby facilitating faster productivity growth. Further EU level actions to help boost productivity and resilience via an overhaul of the EU budget are studied in a companion IMF paper (Busse and others 2025) while complementary national level structural reforms to meaningfully narrow the gaps with the most growth-friendly regulatory settings are analyzed in a separate IMF study (Budina and others 2025).

The paper proceeds as follows. The next section draws on the extensive existing literature to expand on the key binding constraints on firms' ability to scale up and extend across borders in the EU. The section that follows identifies specific actionable policy priorities to overcome these constraints. The paper then offers an illustrative quantification of the GDP gains that could be achieved were just a few of the recommended policy priorities to be implemented, jumpstarting the process of deeper integration with meaningful initial payoffs. Results of the simulation exercise indicate that over the medium- to long-term, the level of EU GDP level could be about 3 percent higher than in the baseline—a sizable improvement considering that potential growth of the EU economy is projected at just above 1 percent. Individual member states also benefit from these reforms, with their GDP level increasing relative to baseline in a range of 2-5 percent over 10 years.[3]

Binding Constraints on Cross-Border Scale Up

Conceptually, stronger productivity growth occurs from the diffusion of new technologies and the reallocation of factor inputs—capital and labor—to firms that are more adept at integrating these innovations into their production processes. This dynamic often involves the emergence of younger and smaller firms growing to scale and challenging established incumbents, forcing them to innovate or adopt new technologies, and rendering obsolete those that don't. This process of structural transformation requires an enabling regulatory environment, easy access to finance, labor mobility, and affordable, reliable sources of energy.[4]

[1] European Council (2023): 30 year anniversary of the EU single market.

[2] Like any reform, deepening the single market could have within-country distributional implications which could be addressed by mitigating measures.

[3] The reforms discussed here could be considered as a downpayment on achieving even deeper subsequent integration and larger payoffs. IMF staff's earlier work (Baba and others 2023) for instance estimated that reducing barriers within the single market, analogous to reducing cost of trade and bilateral multinational production within the EU by 10 percent would lead to welfare gains on the order of 7 percent of GDP. See also the section on "Gains from Deepening the Single Market" in the current paper.

[4] There are other important barriers to cross-border scale up, notably remaining significant intra-EU services trade restrictions (Ebeke and others 2019) and poor border infrastructure that limits trade of goods and services (Adilbish and others 2025). Sunesen and Thelle (2018) pointed to significant potential gains from furthering services liberalization, while Busse and others (2025) recommend stronger EU-level investments, supported by a larger EU budget, in areas including border infrastructure, which would enhance productivity growth and resilience.

Currently, however, the potential for scaling up and reallocating resources in Europe is hindered by gaps in each of these areas, as discussed below.

Constraint 1: Regulations

Fragmented regulations lower regulatory predictability and increase transaction costs for firms looking to invest and scale up across borders. Companies encounter varying compliance requirements across jurisdictions, with 60 percent of EU exporters reporting the need to comply with different standards and consumer protection rules across member states, which can discourage them from scaling up and expanding across borders (EIB 2024a). The lack of uniformity hampers firms' ability to grow to efficient scale, reduces competitiveness, and contributes to subdued investment and innovation (Draghi 2024).

Elements

The EU's legislative framework operates under the principles of conferral, proportionality, and subsidiarity (Annex I). While the EU holds exclusive authority in specific areas such as customs, trade policy, and monetary policy (for the euro area), many sectors—including the single market and environmental policy—allow both the EU and individual member states to enact laws. Estimates on the share of EU-level regulations in the total range from 20 to 80 percent, depending on the specific area (e.g., Delors 1988; Bertocini 2009).[5] While respecting the Treaties, this shared competence often results in overlapping and sometimes inconsistent regulations, creating a complex and fragmented regulatory landscape that increases the governance and policy execution burden across the EU.

The varying national transposition and enforcement of EU-level legislation contributes importantly to the regulatory fragmentation, particularly with "gold-plating," where member states impose different or stricter regulations than required by the EU. OECD (2022) reported that around 90 percent of EU countries had only partially implemented international regulatory co-operation policies, contributing to varying regulatory frameworks across jurisdictions. Such diverging implementing requirements—while aimed at achieving the same agreed goals—can be particularly burdensome for companies seeking to operate across the internal market. This has also been highlighted as a problem for financial services where EU legislation mostly takes the form of directives (Véron 2024).

Effects

Because of this fragmented regulatory framework, firms must comply with multiple, often differing, versions of legislation. Moreover, variations in labeling and certification requirements increase uncertainty and operational costs for businesses. All of these elements significantly increase administrative burdens and deter cross-border scale up. In turn, this implies less demand for risk capital and fewer investable projects for investors.

The fragmented regulatory landscape has likely contributed to the significant remaining intra-EU trade barriers in goods and services (Figure 2). Since the start of the single market, trade costs for goods have declined by an average of 20 percent, but only by 7 percent in services (Sunesen and Thelle 2018). Remaining trade barriers within the EU are estimated at a tariff-equivalent of 44 percent for goods and 110 percent for services (Adilbish and others 2025; IMF 2024). An example of the high barriers to services trade comes from the construction sector, where the complexity of public procurement procedures and regulations deters firms from

[5] At the Debates of the European Parliament (No. 2-367/137-161) on July 6, 1988, Jacques Delors called for "*Ten years hence, 80% of our economic legislation as well, will be of Community origin*."

entering markets where the relevant requirements are more complex than in their home markets (Sunesen and Thelle 2018).

National regulations can sometimes also lead firms to remain small and neglect the opportunities of expanding within and across borders. Aghion and others (2023) find a fall in the fraction of innovating firms in France and a reduction in the innovation response of firms to demand shocks just below the size threshold where more expansive labor regulations apply. Draghi (2024) argues that fragmented national systems discourage inventors from filing for intellectual property rights, hindering innovation and while relevant EU regulations are disproportionately costly for smaller, younger firms.

Figure 2. European Union: An Example of Intra-EU Barriers in Services Trade

Sources: European Commission, EU Restrictiveness Indicator (EURI) database
Notes: The EURI measures the extent of regulatory restrictiveness by assigning a score from 0 (least restrictive) to 6 (most restrictive). The EURI scoreboard indicates minimal, if any, progress, in reducing regulatory burdens in professional services between 2017 and 2021. This includes fields such as legal services and civil engineering, as shown in the figure.

Constraint 2: Finance

Europe's financial system is largely bank- and nationally-based exhibiting a high degree of home bias, i.e. a preference for investments in assets of the home country over those of foreign countries (Bhatia and others 2019; Darvas and Schoenmaker 2017).[6] Despite plentiful savings and de jure international financial integration with global markets, Europe's capital markets remain relatively shallow. The bank-dominated system—which mobilizes a significant amount of funding from national retail depositors and is subject to essential financial regulatory and supervisory requirements to protect those depositors—is not well suited for financing risky ventures and supporting young firms that typically lack tangible collateral. National fragmentation of the EU financial system—including of payments systems—together with remaining barriers to intra-EU flow of goods, services and labor, thus imposes barriers on productive firms seeking to scale up and expand across borders (Arnold and others 2024).

[6] On the other hand, a recent ECB study (Lambert and others 2024) argues that home bias could be overstated, especially in financial centers in the EU which host a lot of funds that invest globally. They estimate that, if investment in funds that invest globally but are domiciled in the investor's home country is counted as foreign investment, euro area investors only hold 2.1 percent in domestic stocks; if such investment is counted as domestic investment (as done in the literature), then euro area investors are estimated to hold 15.5 percent in domestic stocks. For instance, they assume that investment by a French citizen in a fund domiciled in Paris and invest globally is foreign investment. It is critical, as they argue, because these funds often invest substantially less domestically than domestic funds.

Elements

The depth of capital markets is held back by the fact that EU households hold one-third of their financial assets in cash and bank deposits, compared with only one-tenth in the US. Similarly, only 24 percent of respondents to a 2023 Eurobarometer Survey during 2021-23 had an investment product (funds, stocks or bonds) and 22 percent of them had a private pension or retirement product. If EU households were to increase their ratio of deposits to financial assets to a level at par with that of US households, up to €8 trillion ($8.4 trillion) could be available for long-term, market-based investment (Lagarde 2024). This would significantly increase the size of the EU capital market available for risky investment and innovation, considering that assets held in private pension funds and insurance companies collectively amount to some $11.9 trillion in the EU, only about a quarter of the US' roughly $42.5 trillion (Arnold and others 2024).[7]

The fragmentation of capital markets along national lines reinforces the issue of shallow markets. For instance, on average almost half of EU insurers' EU equity holdings are in firms based in the insurer's home country (60 percent in Spain; 70–75 percent in Germany, the Netherlands, and Austria; and 80 percent in France). The pattern for pension funds and debt holdings is similar (Bhatia and others 2019). Figure 3 illustrates that the small (relative to the US) stock market capitalization, is fragmented over multiple EU stock exchanges limiting depth and liquidity of the EU equity markets, which in turn hurts valuations and the attractiveness of Initial Public Offerings (IPO) at home (Arnold and others 2024).

In addition, retail payments systems in Europe are largely segmented within national boundaries, inflicting relatively high private costs of retail payments for both domestic and cross-border transactions, with significant variation across countries (ECB 2022, 2024). This is another dimension of financial sector fragmentation that can impede small firms' cross-border scale up.

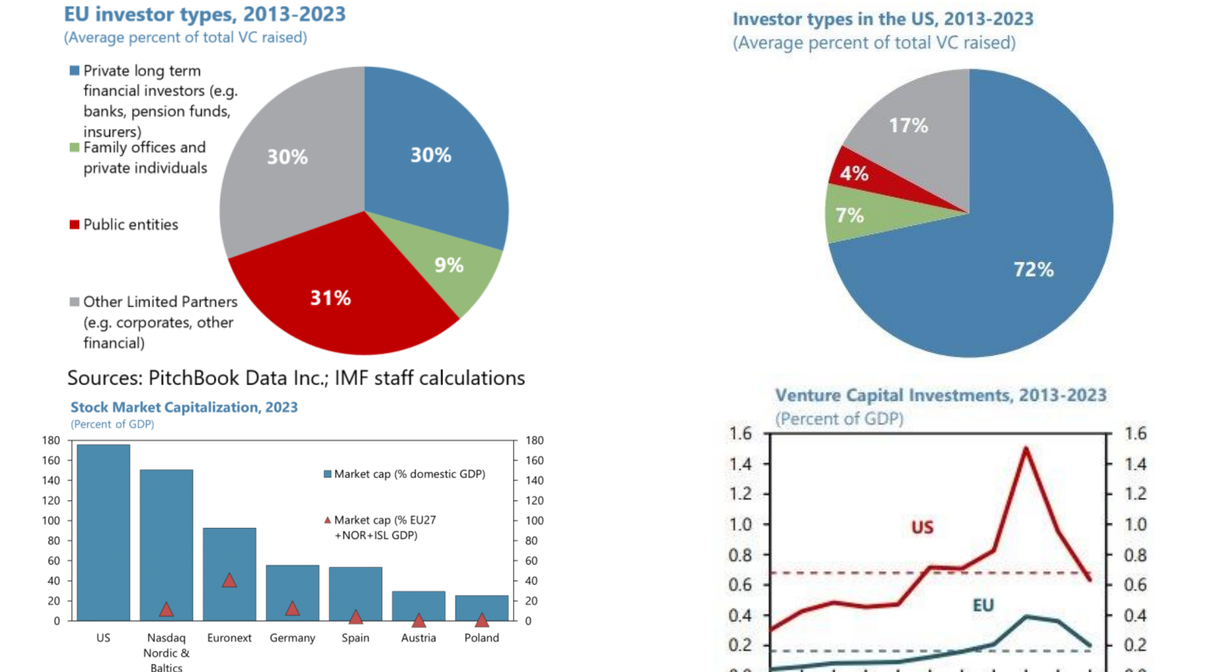
Effects

Such fragmentation of stock markets and home bias in portfolios of longer term investors makes it much more difficult for scale ups to secure the financing they need (Adilbish and others 2025; Schnabel 2024; EIB 2024b), while non-EU, particularly US investors, instead play an important role in financing the scale up phase of EU companies (Arampatzi and others 2025; Böninghausen and others (forthcoming)).[8] Moreover, high cost of retail payments increases transaction costs for cross-border services and in turn discourages small firms from setting up operations across borders. As a result, many promising scale ups relocate and/or choose to list in the US (EIB 2024b; Arnold and others 2024). The loss of promising young firms implies that positive knowledge spillovers of innovations of start-ups don't get to accrue or mature in the EU, with negative implications for productivity. The upshot of this flight of promising EU firms to jurisdictions more amenable to financing their scale up is summarized starkly by Draghi (2024): "…*there is no EU company with a market capitalisation over EUR 100 billion that has been set up from scratch in the last fifty years, while in the US all six companies with a valuation above EUR 1 trillion have been created over this period."*

[7] Bhatia and others (2019) find that assets under management in funded and private pension schemes in countries such as Denmark, Iceland, the Netherlands, and Norway with universal basic pensions (or low gross replacement rates) and in countries such as Ireland, the UK, Canada and the US with strong voluntary personal pension schemes represent a large share of GDP.

[8] EIB (2024b) finds that European scale-ups, by the time they reach ten years in operation, European scale-ups raise 50 percent less capital than their San Francisco peers. Adilbish and others (2025) find that marginal productivity of capital is higher among European "gazelles" (defined as firms that by age 10: (i) feature at least one three-year period of annualized growth in deflated sales of 20 percent or more; and (ii) eventually reach more than 100 employees) than among lager firms and flagged that one important indicator of binding financing constraints is the persistent marginal productivity over their life cycle.

Figure 3. European Union: Limited Venture Capital and Stock Market Capitalization



Sources: World Federation of Exchanges; Eurostat; and IMF staff calculations.
Note: Nasdaq includes exchanges in DNK, FIN, ISL, SWE, EST, LVA, LTU. Euronext includes exchanges in BEL, FRA, IRL, ITA, NLD, NOR, PRT. Domestic GDP defined as the sum of GDPs of countries with exchanges in the Nadaq or Euronext group.

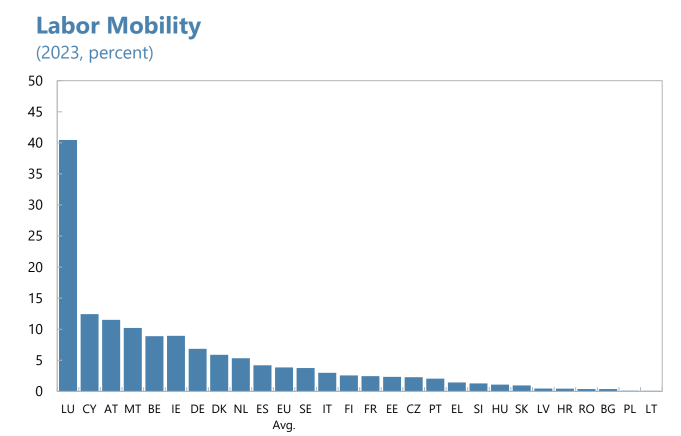
Sources: PitchBook Data, Inc.; IMF WEO April 2024; and IMF staff calculations.

Constraint 3: Labor

The European labor market is considerably less integrated than the US (interstate) labor market, limiting firms' access to a broader pool of talent for productive firms.

On average, less than 4 percent of the working-age population are nationals of other EU member states, varying from less than 1 percent in several CESEE countries including Poland, Hungary, Romania to around 10 percent in Cyprus, Austria, Malta, Belgium and Ireland, and 40 percent in Luxembourg (Figure 4).

Figure 4. Limited Labor Mobility in the EU



Source: Eurostat.
Note: Mobility is defined as the share of working-age individuals (20–64 years old) residing in an EU Member State who are nationals of another EU Member State ('EU movers').

Elements

While the limited labor mobility in the EU arises partly from the cultural and language barriers unique to the European context, policy-induced barriers or those that can be eased with policy actions also play an important role, such as limited recognition of professional qualifications, insufficient coordination of social security systems and portability of supplementary pension rights, and shortages of affordable housing.

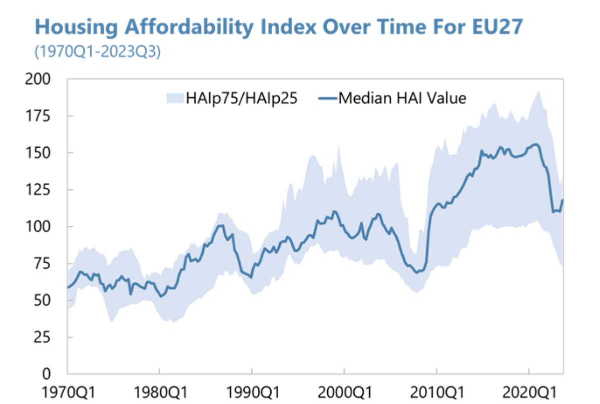
- **Language barriers:** Language acts as both a barrier to cross-EU labor mobility and a facilitator depending on the level of proficiency. For many individuals, migrating to countries where they do not speak the local language limits their job opportunities and integration into the labor market. The language challenge appears to be particularly prominent in sectors where communication is key or specialized knowledge (such as for jobs related to venture capital investment) is scarce.

- **Professional qualifications:** Around 5,400 professions covering 22 percent of the EU workforce are subject to regulations across member states (Letta 2024; Ebeke and others 2019). These professionals need to satisfy the requirements under the Directive on recognition of professional qualifications before they can take up a job in another member state.[9] However, only a small share (6 percent) of workers who moved within the EU between 2017-2019 used the systems for recognizing professional qualifications (ECA 2024). The difficulty in obtaining recognition of professional qualifications could either discourage moving or compel the mover into switching professions (such as lower-qualified roles), potentially leading to a loss of human capital and exacerbating skills mismatch.

- **Social security and pension rights:** As stipulated by EU regulation, workers moving within the EU are subject to only one social security scheme at any time. The Regulation calls for more effective coordination between the unemployment insurance schemes and the employment services of all the member states to foster intra-EU labor mobility.[10] European Commission (2005) had earlier documented that the main obstacles to mobility of workers across the EU relate to the acquisition, preservation, and transfer of pension rights. The final Directive 2014/50/EU however only stipulated requirements on *acquisition* and *preservation*, but left it to member states for improving the *transfer* of workers' vested pension rights (or "exports of pensions"), reflecting significant obstacles to portability / transferability that were traced to the heterogeneity of national retirement systems and practices (Guradianich 2015).

- **Housing affordability**: Housing costs in metropolitan areas, where high-productivity jobs are concentrated have risen sharply relative to incomes, leading to worsening housing affordability over time (Figure 5 based on Biljanovska and others 2023). For instance, European Parliament (2024) noted that average house prices in the EU increased by 48 percent during 2015-23 and nearly 11 percent of households in cities and 7 percent in rural areas face housing costs exceeding 40 percent of

Figure 5. Housing Affordability Index



Source: IMF staff calculations.
Note: Index composition changes over time due to availability of data in given year.

[9] Directive 2005/36/EC on recognition of professional qualifications and its revised directive in 2013 set the rules for the recognition of professional qualifications, in order to address issues including recognized professions, language requirements, common training tests, and solutions through the SOLVIT system. In 2018, this directive was strengthened with a complementing, "proportionality directive" aimed at improving the analytical framework for regulatory impact analysis of EU countries.

[10] According to Intra-EU mobility report (2023), this and other relevant regulations and agreements specify which country is responsible for providing social security benefits and under what conditions. They allow individuals to aggregate (according to the principle of aggregation of periods) and to transfer (according to the principle of exportability of benefits) social security rights when moving within the EU (and EFTA). For example, a person who has worked in several EU countries can combine periods of insurance, employment, or residence to qualify for benefits.

their disposable incomes. Worsening housing affordability is compounded by a mismatch between the demand for housing in economically vibrant areas and the insufficient construction of new homes, often due to restrictive land-use policies and inadequate incentives for expanding the housing supply. Limited availability of affordable rental housing adds to housing shortages and increases the costs of relocation (Elfayoumi and others 2021), while renters in rent-controlled accommodations stay put due to financial considerations (De Boer and Bitetti 2014; Diamond and others 2019).

Effects

Survey results point to significant, persistent labor shortages and skill mismatches in the EU economy, with negative consequences for investment and scale up. According to EIB (2024a), the availability of staff with the right skills is a major obstacle to investment for about half of the survey respondents. This is a high share, though lower than the EIB survey results in 2018 (EIB 2018a) where nearly 80 percent of firms reported skills as an obstacle to investment.

Each of the elements discussed above imposes barriers on labor mobility. Together, they reinforce each other and aggravate distortions in the labor market.

- Without adequate *language skills*, migrants may struggle to secure employment, despite potential economic incentives like higher wages. For example, Marconi and others (2023) highlights the importance of English in the EU job market, pointing to the significant share of online job vacancies in 27 EU countries and the UK in 2021 that require some knowledge of English.

- Given the Directive nature of the rules on *professional qualifications*, the requirements imposed on individuals wishing to practice the regulated professions vary significantly in individual member states (partly due to gold-plating). Some countries impose higher fees for recognition, require documents beyond what is set out in the Directive, have prolonged procedures, or conduct arbitrary checks that delay recognition. These barriers are particularly problematic in sectors where mobility is crucial, such as healthcare and transport.[11] Without a streamlined and consistent system for recognizing qualifications, many workers are unable to take advantage of job opportunities in other member states, limiting both their personal career growth and broader economic integration across the EU.[12]

- Ineffective coordination of *social security* (leading to higher administrative costs and uncertainty about social protection) and difficulties in transferring occupational pension rights between member states create significant barriers to workers' free movement (Holzmann 2018; Eurofound 2018).

- Worsening *housing affordability* and shortages of rental accommodations can deter workers—particularly low-income households, young people, and newcomers—from relocating to regions with better economic opportunities

[11] For instance, truck drivers need to adhere to varying wage standards in terms of minimum and overtime pay, and working time, making labor mobility more complex and constraining efficient cross-border trade and services. Healthcare workers face similar constraints in labor mobility in terms of social legislation and wage standards (European Parliament 2019).

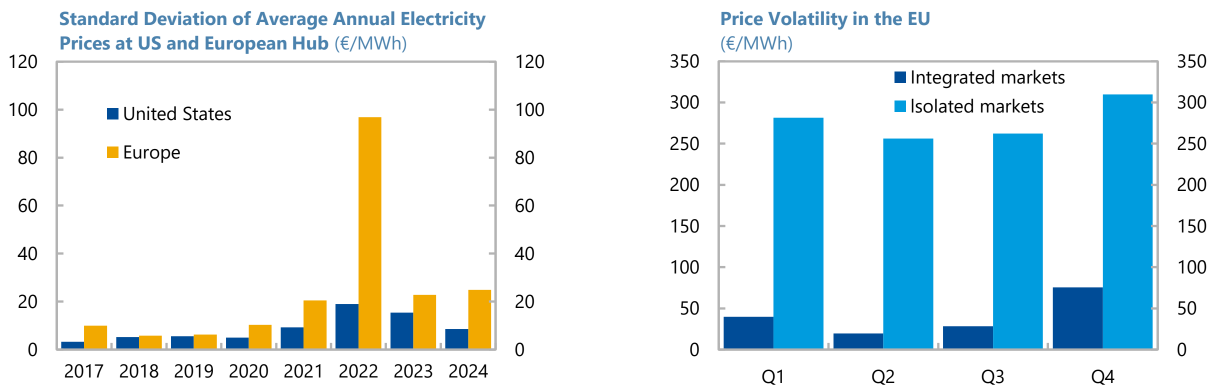
[12] In addition, lack of recourse to digital tools adds to the length of the qualification process. ECA (2024) noted that only a couple of national competent authorities allow fully online procedure without requesting additional physical documents, for all regulated professions.

Constraint 4: Energy

The energy crisis following Russia's invasion of Ukraine and Russia's shutdown of gas flows to most of Europe exposed three critical weaknesses in the EU's energy system: (i) an overreliance on imported fossil fuels; (ii) uneven vulnerabilities and fragilities across countries, due to differences in energy mix and sources of energy supply; and (iii) the fragmentation of the internal energy market, in particular of the electricity market, and interconnection between EU countries (Kammer 2025). The fragmented energy market contributes to high and volatile energy prices, deterring firms from investing and scaling cross border.

Both natural gas and electricity prices spiked and diverged sharply across Europe during the 2022 crisis. While the divergence in wholesale natural gas prices has since dissipated, this is not the case for electricity prices. Over 2023-24 the median wholesale electricity price across EU countries doubled relative to the pre-pandemic level and electricity price dispersion within the EU tripled. Electricity price volatility over time and across electricity hubs remains more than three times its pre-pandemic average. Cross-border trade in electricity has helped curb extreme volatility, but not sufficiently (in the extreme, estimates suggest that if there had been no cross-border trade at all, volatility could be more than five times the observed level) (Figure 6).

Figure 6: Electricity Price Dispersion and Volatility



Sources: Bloomberg Financial L.P.; and IMF staff calculations.
Note: Latest data for 2024 is through end-November.

Source: Zachmann et al. (Bruegel, 2024) based on ACER (2022).
Note: Simulation based on patterns in 2021.

Elements

The lack of integration of European energy market is driven by multiple factors.

First and foremost, energy policy remains a national prerogative. While energy was at the heart of the European integration effort from the very beginning (the European Coal and Steel Community), energy policy remains an intrinsically national prerogative with limited formal powers of the Commission in this area. For example, the EU treaties leave the choice of the aggregate energy mix to national governments.

Moreover, member countries differ in their energy intensity, potential for renewable power generation, and financing costs, which implies that the gains from market integration would be different and the incentives for further integration would vary across member states. As an illustration, Baker and others (2018) flagged that infrastructure is not always the main constraint to increased electricity trade in the EU—in fact, member states could already reap benefits by raising the utilization of existing interconnector capacity but purposefully choose not to.

Finally, network externalities are not internalized due to a fragmented institutional set up. While it might entail short-term costs in some cases, an integrated energy approach would deliver a long-term gain not only at the EU level but also in individual member countries through greater resilience to shocks, more secure supplies, and ultimately lower prices (Dolphin and others 2024).

Effects

High and volatile energy prices deter investment, with implications for productivity growth and economic resilience. An ECB study (Longaric and others 2024) found that energy shocks hamper corporate investment, especially in fixed capital and R&D expenditures, with firms in energy-intensive sectors and those with financial constraints more susceptible.[13] The European Investment Bank's 2024 annual survey reveals that 77 percent of European firms view high energy costs as a significant barrier to investment, compared to an also elevated 68 percent of U.S. firms. This concern likely holds back investment in Europe and could have contributed to a decline in investment intentions among European companies, with the net share planning to increase investment dropping to 7 percent for 2024 from 14 percent in 2023.

Actionable Priorities to Deepen the Single Market

Following decades of progress on economic integration that has brought huge success to the EU (IMF 2024b), EU-level reforms aimed at deepening the single market have encountered considerable obstacles. Divergent national interests and conflicting incentives arise from varying conditions and local business priorities. Uncertainty about the consequences of further market opening—such as concerns about potential compromises in service quality—hinders necessary reforms. Furthermore, limited progress in key areas that fall under national authority, such as taxation and insolvency, remains a challenge. National financial supervisory bodies often hesitate to relinquish control over cross-border regulatory matters due to concerns about local impacts–for instance, policymakers in smaller or less developed capital markets may resist changes that could lead to greater financial concentration in major EU financial centers elsewhere (Arampatzi and others 2025).

However, without a concerted effort to harmonize regulations, improve financial intermediation, foster labor mobility, and integrate the energy system, Europe's slow productivity growth would very likely persist.

Building on the diagnosis of the four key binding constraints on cross-border scale up in the EU, this section identifies 10 actionable priorities, which we view as critical single market reforms to allow new, younger firms to scale up effectively both within and across borders. These reforms can help jumpstart the process of deeper integration and can deliver meaningful initial payoffs for the union as a whole and for individual member states, as discussed further below. Many of priorities discussed below overlap with the Commission's ongoing efforts and proposals (e.g. European Commission 2025a and 2025b). Together with proper mitigating measures to address the concerns of those adversely affected by the reforms, these actionable priorities would benefit the Union as a whole and all member states.

[13] Energy supply shocks are also found to significantly lower real consumer spending in the euro area, particularly affecting durable goods consumption (Bobasu and Gareis 2022).

Reducing Regulatory Fragmentation – A "28th regime"

Less fragmented regulation across borders can provide greater predictability and reduce information asymmetries that hold back cross-border scale up. Two actionable priorities in this regard are: providing an alternative (28th) regime that establishes uniform regulations crucial for the formation, operation, and dissolution of firms; and introducing fully harmonized EU-level legislation through prioritizing regulations over directives.

Action 1. Introduce a 28th regime with harmonized legal rules for areas key to firms' formation, operation and dissolution.

While harmonizing the EU company law and insolvency law frameworks is ultimately the first-best solution to providing a lean framework for firms' formation, operation, and dissolution, progress with harmonization has been modest and full harmonization cannot be achieved in the near term. Meanwhile, a 28th regime—as a practical alternative—can provide a voluntary EU-wide legal framework to facilitate firms' expansion without requiring them to navigate divergent national regulations. This can help lower the regulatory burden, improve legal certainty for firms, and reduce transactions costs of navigating multiple cross-border regimes.

Under this new 28th regime, the Business Code would harmonize areas key to firms' *formation* (corporate and securities law), *operation* (accounting rules), and *dissolution* (insolvency procedures and the courts to adjudicate and enforce them). Critical aspects include: (i) a uniform company law framework that would significantly remove the extra burden on firms in their expansion across the EU, (ii) a standardized investment procedure (for instance, inspired by the French Bon de Souscription d'Actions par Accord d'Investissement Rapide (BSA Air) or the Simple Agreement for Future Equity (SAFE) available in the US) that would allow investors to easily invest in small, young firms, and (iii) accounting standards and insolvency procedures that are unified and applied uniformly across jurisdictions. Importantly, insolvency procedures should be subject to a single regime, be applied uniformly, and be dealt with by a specialized court/judge in the country of incorporation.

In other areas, the divergent national frameworks would continue to apply. "Coalition of willing," or, as argued by a recent ECB study (Arampatzi and others 2025), linking a 28th regime with a legal tool that anchors member states' political commitment, such as enhanced cooperation[14] or an intergovernmental agreement (as done for the launch of the EFSF in 2010), could increase the chances of success.

The process will be challenging. The adoption of such an alternative regime alongside divergent national regimes is a complex process, requiring delicate negotiations and cost-benefit analyses. Moreover, the implementation of the regime will be difficult because this unified regime cannot be as exhaustive as national regimes, and there could be cases where national rules have to be used, thus lowering the effectiveness of the regime.

Nonetheless, a 28th regime could help overcome the problems identified above that disincentivize firms' cross-border scale up (specifically, the need to deal with divergent corporate structures and contractual or legal practices, increasing compliance costs and legal uncertainty). The latter matters importantly also for investors. In particular, for small and young firms, industry representatives note that some national corporate regimes are not well suited for venture capital investors needed to support these firms' scaling up (Biernat and others 2024). The Commission's Competitiveness Compass thus proposes a 28th legal regime for innovative firms, to

[14] Arampatzi and others (2025) noted that the European Treaties allow "enhanced cooperation", under which a minimum of nine member states can advance in a particular field when there is clear evidence that the EU as a whole cannot achieve the goals of such cooperation within a reasonable period.

"*simplify applicable rules and reduce the cost of failure*", with the proposal possibly covering relevant aspects of corporate law, insolvency, labor and tax law (European Commission 2025a).

Action 2. For new rules, prioritize fully harmonized EU-level legislation and, for existing rules, simplify, consolidate and codify.

Another important way to reduce the regulatory fragmentation is to introduce fully harmonized EU-level legislation from the start, such as prioritizing regulations (over directives) to the extent is allowed by the dual legislation framework (Annex I). Where directives are required (instead of regulations), enforcement should be strengthened to prevent gold-plating and ensure uniformity. For the stock of existing EU-level rules, there seems room for simplification, consolidation, and codification (European Commission 2025a).

Prioritizing regulations over directives would ensure direct applicability and uniformity, helping address one key source of the regulation fragmentation in the EU that deters firms from expanding across borders. Where the EU has sole or shared responsibility in legislation (Annex I), EU institutions should prioritize regulation (over directives) in formulating binding rules (Letta 2024), to prevent member states from deviating during transposition. Strengthening EU-level enforcement, leveraging on advanced technologies, is critical to deterring gold-plating and ensuring consistent rule application across member states, as stressed by both the Letta and Draghi reports. The Commission indeed plans to prioritize the detection and removal of gold-plating of commonly agreed EU legislation and reducing national options and discretions (European Commission 2025a).

A horizontal review of EU-level regulations could help identify areas of overlapping regulation, or areas where simplification, consolidation, and codification can help lower regulatory burden on reporting companies (European Commission 2025a). For example, harmonizing reporting requirements across EU member states could help streamline administrative processes and reduce bureaucratic burdens on businesses, particularly SMEs. Expediting the implementation of the "Once-Only Principle"—an EU initiative (as part of the plan to develop the Digital Single Market) would reduce administrative burdens by requiring citizens and businesses to provide data to public authorities only once.

EU-level actions should be accompanied by national level actions to lower regulatory barriers. For instance, the "Once-Only Principle" can be accompanied by adopting a whole-of-government approach at the national level to ensure coordination across government departments and agencies. Leveraging digital tools at both EU and national levels can streamline regulatory processes, improve transparency, and facilitate better communication with stakeholders, making regulation more effective and responsive.

Advancing the Capital Markets Union

CMU can sometimes refer to different aspirations. According to the Commission, CMU is "*a plan to create a single market for capital, aimed at getting money—investments and savings—flowing across the EU so that it can benefit consumers, investors and companies, regardless of where they are located* "(European Commission 2025d). Under this overarching goal, a CMU could be anchored by a permanent European safe asset that provides a benchmark yield curve, enables better pricing of risky financial products, and helps diversify bank and non-bank exposure, as argued by ECB (2023a).[15]

[15] A few others see the creation of a European safe asset as an element that a strong European capital market can ultimately include (Lindner and Mack 2024) or be a vital part of a genuine (complete) CMU (Draghi 2024; European Parliament 2024).

In the current analysis, we have in mind integration along very specific dimensions that can help with the scale up of firms. That is, moving the EU's financial structure away from a bank-dominated, mostly national-based system where savings remain silo-ed in low yielding deposits to a financial system that supports risk-taking and scale up and offers better returns on savings.

As argued by Kammer and Fotiou (2025), more integration along these dimensions will help channel savings to risk capital for start-ups and scale-ups while ensuring better financial futures for households. In addition, EU member states will also benefit from improved risk sharing. With more diversified EU-wide (or worldwide) equity portfolios, households will be able to smooth consumption through the business cycle based on the performance of their diversified investments. When one part of their portfolio underperforms, other investments may perform well, helping to stabilize portfolio returns by absorbing losses and gains elsewhere within the EU and therefore maintaining consumption. This will ultimately improve the resilience of the EU economy.

Advancing the CMU requires a multifaceted approach aimed at enhancing the efficiency and integration of capital markets across Europe. Actionable priorities should focus on: (i) expanding the pool of long-term capital; (ii) channeling more funds to early-stage risk assets; and (iii) allowing more efficient cross-border allocation through more integrated markets. All of this can help with scale up of dynamic young firms (Arnold and others 2024).

Action 3. Expand the pool of capital.

According to ESMA (2023), EU retail investors pay about 60 percent more in fees when investing in mutual funds than their US counterparts do. If the pool is increased by lowering transaction costs and incentivizing EU households to rebalance their financial assets away from bank deposits toward capital markets, innovative scale ups would benefit.

EIOPA's 2024 Eurobarometer survey reveals that only 20 percent of EU citizens participate in an occupational pension scheme (EIOPA 2024c). Implementing automatic enrollment—where participation in the voluntary occupational pension scheme is the default option (unless individuals choose to opt out)—would increase participation rates of EU households in capital markets.[16] The Commission's agenda for the Savings and Investments Union (SIU) acknowledges the significant potential of automatic enrollment and rightly argues that the practice should be promoted (European Commission 2025b). Drawing on the experience of member states that have already introduced automatic enrollment, the Commission can facilitate peer-to-peer learning through its convening platform.

Improved financial literacy, if supported with an increase in the level of human capital, is found to increase stock market participation (Thomas and Spataro 2018). The 2023 European Commission survey on financial literacy documented that on average in the EU 52 percent of the respondents are financially knowledgeable, pointing to room for improvement.[17] Education programs should aim at helping individuals understand investment options and risks, while user-friendly digital platforms can improve accessibility of investment products. The importance of financial literacy is well recognized by the European Commission as reflected in the Communication on the Union of Skills (European Commission 2025b) and the SIU communication (European Commission 2025c). Considering that education is mostly a national competency, the forthcoming

[16] Bhatia and others (2019) notes that starting from a low level the coverage rate in the UK increased with the introduction of the compulsory automatic enrollment of employees in a pension scheme by employers.

[17] The survey assumes a low threshold for being financially knowledgeable and measures understanding of fundamental concepts that are relevant in daily financial decision making.

strategy on financial literacy should underline the centrality of national measures and promote exchanges of best practices.

Action 4. Channel saving to early-stage, risky assets through increasing venture capital investment.

For start-ups (with hard-to-collateralize intangible assets), who currently find it difficult to secure financing, the CMU will offer broadened options of funding (such as venture capital) and exit strategies (into the public market or private equity). EU pension and insurance funds allocate just 0.02 percent of total assets to VC, while US pension and insurance funds allocate 0.12 percent to VC (IMF staff calculation based on PitchBook and OECD data 2023). This implies that an increase to about half of the level of VC investments of US pension funds and investment funds (in US dollar terms) would transform Europe's VC ecosystem, promoting risk taking. Adilbish and others (2025) find that the median intangible assets of firms after receiving VC-backing grows significantly faster than not-yet-funded firms with similar attributes.

Industry surveys suggest that pension funds don't increase their exposure to VC due to a lack of familiarity and the perceived riskiness of the asset class (Atomico 2023). Various public initiatives at the national (e.g. Tesi in Finland) and EU level (e.g., European Tech Champions Initiative), primarily through promotional banks, have helped crowd in institutional investors and familiarize them with VC as an asset class (Kraemer-Eis and Croce 2023). Such programs should be adopted—where not already existent—and where successful—expanded. At the EU level, it will be important for the European Investment Fund to receive more funds and set up a sizable fund-of-funds aimed at institutional investors across Europe to invest in large (>€500 million) pan-EU focused VC funds (Arnold and others 2024). The Commission's plans to expand work with the EIB Group and private investors to crowd in private investment into venture capital are important steps in this direction (European Commission 2025b).

In cases where regulation limits the ability of institutional investors to get exposure to VC, equity, and other risky projects, or limits it unduly, a review of such practices would be important.[18] The recent changes to Solvency II (the framework for insurers) should help to increase exposure of insurers to VC. The forthcoming Delegated Act on Solvency II is important to ensure that this is indeed the case.[19] Meanwhile, several EU countries have quantitative limits in place that may unduly constrain investments in private equity and VC, such as restrictions on asset allocation shares, as well as fees charged by alternative investment funds that effectively discourage investing in VC (OECD 2023). The EU should support member states in reviewing such limits and address any undue restrictions on pension funds, while ensuring regulation remains adequate for the risk profiles of these sectors.

Action 5. Allow more efficient cross-border allocation through more integrated markets.

Improving the efficiency of cross-border allocation can better connect savers to investment opportunities, providing better access to finance for firms and higher investment returns for savers. To this end, offering saving products—drawing upon national best practices—that provide a range of low-cost options for savers to invest across the EU would be critical.

The Pan-European Personal Pension Product (PEPP) Regulation was put in place to foster cross-border competition in personal pension products, so that pension funds may exploit economies of scale and retail

[18] Eleven MS reported that they do not have a special regime in place, while there are many different systems in place (Report to March 2024 EG+ Statement).

[19] According to the Commission, the Delegated Act contains the implementing rules that "*aim to set out more detailed requirements for individual insurance undertakings as well as for groups, based on the provisions set out in the Solvency II Directive*." and "*They will make up the core of the single prudential rulebook for insurance and reinsurance undertakings in the Union*."

investors can benefit from lower fees. While the take-up of PEPP products fell short of expectations, an ambitious review of the framework could go a long way toward identifying actions to increase the attractiveness of private pension products for European retail investors (Box 1). The Commission's forthcoming review of the regulation (European Commission 2025b) should aim for an ambitious revision. The agreement on the FASTER Directive for expeditious relief of excess withholding taxes is aimed at addressing an important obstacle to cross-border investment and could be adopted on a more accelerated timeline.[20] Relatedly, the proposed digital euro could help reduce broader obstacles to cross-border commerce by reducing the segmentation of retail payment systems in Europe (Box 2). Through enhancing the efficiency of the cross-border retail payment system, the digital euro could help better integrate financial services in Europe and ultimately facilitate greater cross-border economic activity within the EU.

In addition, more efficient capital allocation across the EU capital market will require continued progress toward regulatory and supervisory convergence, which could, for instance, benefit from strengthening the European Securities and Markets Authority's (ESMA) institutional and governance arrangements for supervision, by providing it a wider range of supervisory powers, as well as a sustainable funding framework.

[20] The deadline for national transposition of the FASTER Directive to become applicable is only 2030.

Box 1. Need for a Review of Pan-European Personal Pension Product Regulation (PEPP)

To ensure that the PEPP deliver more competition, economies of scale, lower fees and ultimately higher returns for retail investors, the framework should be reviewed along the following lines:

- *Expanding the PEPP to occupational pensions*. A EIOPA staff paper from November 2024 (EIOPA 2024a) considers that allowing tax-efficient employer contributions alongside personal contributions, would increase the appeal of the product, exploiting the potential scale and lowering relative costs for suppliers (similar products have been successful in France and New Zealand).
- *Equalizing taxation to that of national pension products*. A 2024 discussion paper by the EIOPA Occupational Pensions Stakeholder Group (EIOPA 2024b) found that PEPP products do not receive equal tax treatment relative to other pension products. Full harmonization across member states for PEPP would be challenging as taxation is a national prerogative. However, aligning PEPP tax treatment in the jurisdiction it is offered to that of national pension products will help remove one important disadvantage against PEPPs.
- *Equalizing regulatory treatment to that of national pension products*. Many countries do not allow savers to switch between national personal pension products (PPP) and PEPPs, thereby reducing the ability of PEPP products to compete against existing PPPs (EIOPA 2024b).
- *Review of existing cap on fees*. The PEEP regulation caps fees and costs at 1 percent annually of assets under management for basic PEPP products. EIOPA (2024a) argues that the fee cap may hinder the private sector participation in offering PPEPs in the short term given initial expenses (e.g., mandatory advice, onboarding) and lack of scale. The EIOPA 2024b report suggests that the cap should be lifted if clear evidence can be established that potential PEPP providers are restricted by the current distributional channel costs beyond what is covered by the current fee cap.
- *Review of compartments for cross-border workers*. The requirement to manage sub-accounts across various member states with, for instance, divergent accumulation and decumulation rules adds to the inherent expenses of PEPP products (EIOPA 2024a). A review should evaluate whether this requirement can be made optional, applicable throughout the lifetime of the PEPP product. This would not only lower costs but also enable holders to request sub-accounts (against a fee) when they plan to take up work abroad. The revision should also ensure that sub-accounts are accessible for temporary cross-border workers, most notably by clarifying the definition of “residence” (EIOPA 2024b).

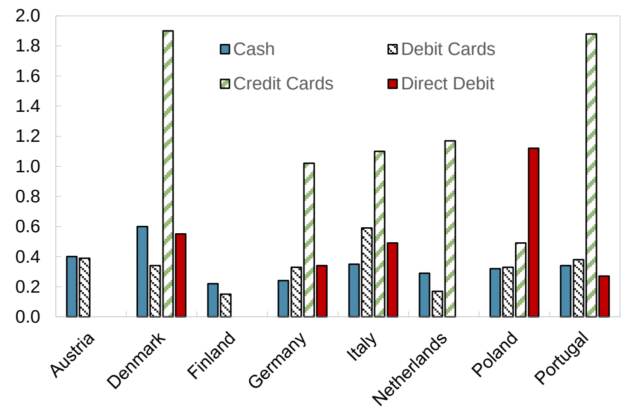
Box 2. Reducing Fragmentation of Retail Payment Systems- Possible Role for the Digital Euro[1]

Europe has a fragmented retail payments system that is largely confined to national boundaries and lacks a unified pan-euro area solution for peer-to-peer (P2P) payments (ECB, 2023b). The fragmented retail payments system has led to costly cross-border payments in Europe, which still exceeds the G20 target of 1 percent by 2027 (FSB 2024).[2]

An ECB (2022) study involving nine EU countries finds that while substantially falling throughout the 2010s, the private costs of payments (incurred by the relevant individual parties in the payment chain; ECB 2012) ranged from 0.2 to 1.6 percent of GDP (mainly due to the cost of handling cash and of debit cards). The social costs of payments (namely, "costs to society, reflecting the use of resources in the production of payment services; that is, the total cost of production excluding payments, e.g. fees, tariffs, etc., made to other participants in the payment chain. In this sense, social costs measure the sum of the pure costs of producing payment instruments incurred by the different stakeholders in the payments market"; ECB, 2012) stood between 0.1 percent (Finland) and 1¾ percent of GDP (Hungary, including opportunity cost of time spent on transactions). Newer studies for other Nordic countries relying mostly on digital payments report social costs of 0.8-0.9 percent of GDP (Norges Bank, 2022; Sveriges Riksbank, 2022). Importantly for consumers, the unit cost of transactions averaged between €0.35 for cash and debit cards to €1.8 for credit cards (Box Figure 2.1), also mindful of the EU's Interchange Fee Regulation that since 2015 has capped credit card fees between PSP and participating bank at 0.3 percent of payment value (ECA, 2025).

Box Figure 2.1. Cost of Retail Payments per Instrument

(unit costs in EUR)



Sources: ECB (2022) and IMF staff calculations.

The ECB is exploring the introduction of a digital euro to strengthen the European retail payments system. The proposed digital euro—as a secure, low-cost pan-European payment solution—can help deepen the integration of financial services within the European market, by streamlining and unifying both domestic and cross-border retail payments. Importantly, it could help improve payment system efficiency, reduce transaction costs for users, especially households and small firms, and enhance competition in the retail payments system. The digital euro, serving as legal tender in the euro area, can promote wider acceptance and help close existing gaps in digital retail payments (e.g., credit cards are used widely for digital payments but cannot be used for digital peer-to-peer transactions and are not universally accepted for point-of-sale transactions; Cipollone 2024) and, depending on the chosen fee structure, lower costs for end users (merchant costs using credit cards can be more than twice as high as when using cash; European Commission 2024), thereby fostering competition among existing payment services. It would be free of charge for basic use (ECB 2024a; 2024b; 2025a) and would include safeguards for merchants by capping the fees they pay to banks for processing payments and narrowing the cost gap between larger and smaller merchants (the latter currently pay higher fees; ECB 2024a). At the same time, the digital euro should be designed to be interoperable with existing popular payment networks, including commercial bank and e-money networks.

[1] This box draws on an internal note by Berkmen, Mohommad, and Wezel.

[2] The fragmented system has also led to a heavy reliance on private digital payment methods provided by foreign entities. In the second half of 2023, more than two-thirds of card transactions in the euro area were settled through international payment schemes, with 13 of the 20 euro-area countries relying entirely on international schemes for all card transactions due to lack of domestic payment schemes (ECB, 2025a and 2025b; Letta 2024).

Fostering Labor Mobility

Given ongoing demographic shifts, improving labor mobility has become even more urgent for a more efficient allocation of labor across the internal market that would offer productive firms greater access to talent.

The actionable priorities we recommend in this area build on past progress such as modernizing the professional qualification recognition which is of significant relevance to cross-border labor mobility but under-utilized due to the cumbersome and lengthy process.[21] In addition, strengthening social security coordination and portability of supplementary pension rights can help remove the financial uncertainty associated with migration within the EU, while promoting portability of wage contracts in some sectors could help the labor market better adapt to the evolving demand from firms.

Action 6. Modernize and harmonize professional qualification recognition.

Modernizing the Recognition of Professional Qualifications Directive, including leveraging digitalization, can help align with technological advancements and the emergence of new professions, particularly in the tech industry crucial for innovation. The Directive should be made more adaptable and responsive to evolving labor market needs, including through expanding its scope and extending the system of automatic recognition of professional qualifications beyond the five existing professions that are eligible for the European professional card.

Harmonizing qualification recognition across member states can start with further aligning national education and professional standards with the European Qualifications Framework (EQF). Despite significant progress in standardizing the recognition of qualifications through frameworks such as EQF and the Directive on the Recognition of Professional Qualifications, discrepancies persist in how skills and qualifications are recognized across member states, adding to hurdles to mobility and exacerbating skill mismatch.

Action 7. Strengthen social security coordination and portability of supplementary pension rights and promote portability of wage contracts.

Despite significant progress,[22] for many companies and individuals, the administrative burden required to ensure full portability of their social security rights remains cumbersome (Letta 2024). Measures to strengthen social security coordination can include the full implementation of the electronic exchange of social security information by all member states and continued engagement by member states in European Social Security Pass pilot activities leveraging digital solutions for verifying social security entitlements in another EU country

[21] 22 percent of the EU work force, or 50 million people, work in professions covered by licensing or qualification certifications (Adamis-Császár and others 2019).

[22] According to Letta (2025), in 2021, around 235 million people in Europe held a European Health Insurance Card, which allows them access to medical services in another EU country. In addition, 6 million were paid to pensioners living in another EU country.

(Letta 2024). Working toward a unified EU framework regulating the portability of supplementary occupational pension rights can start from a comprehensive review of the obstacles to better portability of supplementary pension rights.

Promoting portability of wage contracts in sectors characterized by significant cross-border mobility, such as transportation and logistics, could facilitate worker movement across countries without subjecting them to discriminatory wage practices based on location. Reducing barriers to temporary and freelance work across borders would benefit both employers and employees, particularly in sectors like technology, where remote work is increasingly prevalent. Finally, broader availability of cross-border pension products (such as PEPP) will better allow mobile workers to carry their savings when seeking employment in another EU country, facilitating intra-EU mobility (see discussion under Action 5 and Box 1).

Action 8. Improve housing affordability and continue to address language barriers.

Policies can incentivize higher housing supply in high-demand areas by easing zoning laws, reducing regulatory barriers to construction (e.g., expediting approval processes and streamlining land-use policies), and investing in urban expansion initiatives (including allocating more public land for housing projects). Furthermore, improving transportation links between suburban regions and major urban centers could broaden the economic reach of cities, facilitating easier access to high-paying jobs from more affordable living areas. Policies that facilitate remote work (e.g., investing in digital connectivity infrastructure) may indirectly enhance housing affordability. By enabling employees to move to regions with lower housing costs, remote work options can alleviate the burden on rental and property prices, particularly in areas implementing housing supply measures.

Publicly funded language courses, particularly for cross-border workers, are seen as an effective tool to address foreign workers' language barriers. Moreover, earlier interventions, such as expanding programs like Erasmus, can help improve foreign language proficiency at the educational level, preparing future workers for a multilingual labor market. Migrant networks can also help ease the transition, as established communities can provide language support and facilitate integration into local job markets.

Energy Market Integration

Our recommended actionable priorities in this area align with the overarching objectives of the European Commission's Action Plan for Affordable Energy to improve energy affordability, strengthen energy security, and advance the clean energy transition. While the Commission's Action Plan prioritizes near- and medium-term reforms through targeted policies and regulatory measures, our proposal emphasizes the need for a strategic, long-term blueprint to guide the energy system transition, with a particular focus on improved system-level coordination, data-driven planning, and strengthened institutional capacity (Kammer 2025). The priorities reflect the importance of a more integrated electricity system, streamlined permitting processes, and enhanced governance structures. Overcoming barriers to integration and developing a coordinated strategy (anchored in a Europe-wide perspective but tailored to country specifics) at the member state level will be critical for efficiently transforming the EU's energy system (generation, storage, transmission) into a fully integrated, single energy market.

Action 9. Develop a coordinated EU strategy for the energy system transformation that combines a blueprint for action with strengthened coordination and collaboration of EU and national policies.

A comprehensive, data-driven EU blueprint is needed for the energy transformation. This blueprint could serve as a foundation for identifying where EU-level action is most needed, coordinating EU and national policies, and aligning resources and actions to address externalities and maximize the collective impact.

Information gaps can be closed by investing in data, modeling, and analytical tools to identify the most cost-effective and critical investments in generation, storage, transmission and complementary infrastructure. Using the improved data and estimates on critical investments, the strategy should provide a roadmap for actions over the next few decades to prioritize efficiency and cost-effectiveness, and strengthen energy security, while internalizing the externalities and addressing national incentives that have hampered integration thus far. In addition, collaborative action and pooling resources at the EU level, through an enhanced EU budget (such as boosting resources for research and innovation and coordinating funding to support the scale up of new clean technologies) can maximize economies of scale (Busse and others 2025).

This should be supported by efforts to strengthen the institutional and financing frameworks, to ensure institutional and market structures are able to deliver the network capacity the EU needs (Cremona 2023). This may require a new EU entity to coordinate or even implement the necessary investments, such as an EU grid interconnector operator (IMF 2024d; Heussaff and Zachmann 2025). Financial instruments under the EU budget can help facilitate the energy transition through incentivizing complementary reforms in addition to direct investment as discussed above (Busse and others 2025).

Action 10. Streamline permitting processes.

The permitting process is a major impediment to the rapid deployment of renewables and grids—the overall permit-granting process taking several years in some member countries (e.g., up to 9 years in Greece and Ireland for wind energy, see Draghi 2024).

Standardizing and expediting permitting timelines, including across member states, can help speed up the process. According to EIB (2018b), for cross-project country projects like the electrification of the road network, higher returns from private investments could be achieved by harmonizing administrative procedures, speeding up permitting processes, facilitating more effective interaction between different levels of government, and putting in place clear and speedy procedures for land acquisition and access to the grid network.

Implementation

For some of the actionable priorities listed above, implementation requires member states to move in lockstep (such as adopting a 28th regime). Some reforms instead require a coordinated approach with member states acting individually (such as increasing the retail investor participation in the capital market). Some member states already have experience with implementation in certain areas (such as automatic enrolment in voluntary vocational pension schemes), which should be shared with others, facilitated by the Commission's platform of peer-to-peer learning. The success of any reform hinges on the social acceptability of the reform agenda, which can be enhanced through a thorough two-way dialogue with stakeholders and population. It is important to conduct informed and inclusive engagement with them throughout the reform process to strengthen their understanding of potential gains from the reform. To cement trust and ensure that reforms endure, it is equally critical to adapt reform and policy design based on stakeholder inputs as warranted, and identify and put mitigating measures in place that can address their economic and social concerns (IMF 2024e).

Gains from Deepening the Single Market

To understand the potential payoffs to the EU and member states from the various reforms set out above, we study their impact on potential output (i.e. the output that would result if all resources were utilized at the maximum rate consistent with macroeconomic stability).

This section focuses on illustrating gains from a subset of actions discussed above that are aimed at: (i) lowering the fragmentation of regulation through adopting a high-quality insolvency regime; (ii) advancing the CMU through increasing the venture capital investment in the economy; (iii) improving labor mobility within the EU; (iv) lowering energy prices.

Mapping reform actions to their effect on potential GDP is not trivial. We take the following general approach. First, we identify one or two intermediate outcomes from each reform based on existing studies. Second, we make assumptions about the magnitude of the improvement in the intermediate outcomes in line with benchmarks from the literature, such as narrowing the gap with the US, catching up with the current best EU performers, or lowering prices or costs from current levels. The horizon considered here is 10 years, allowing for the possibility that reforms take time to have a meaningful impact through not only direct but also indirect impacts. Improvements vary across countries depending on their starting positions. Third, we map the improvement in the intermediate outcomes to parameters in a semi-structural model described below, which simulates the impact of the reforms on the level of potential output. See Table 1 for a summary.

Simulation Assumptions

Lowering the Fragmentation of Regulations

For the area of regulation, adopting a high-quality insolvency regime uniformly for all firms—one (but key) aspect of a 28th regime described in Action 1—is modelled to illustrate the impact of improved insolvency quality and legal certainty across the EU. Achieving insolvency convergence is high on the EU's policy agenda though progress has been slow (Hallak 2025). The benefits to the broader economy are relatively well documented in the literature.[23]

Adopting a high-quality insolvency regime uniformly for all firms across the EU helps lower cost of funding and facilitates scale-up. We map insolvency reform to a lower cost of funding/risk premia for firms in two steps. First, we use data from the André and others (2022) and EBA (2020) to calculate a normalized z-score for the quality of insolvency systems. The André et al (2022) data capture the main features of insolvency systems in numerical indicators, while the EBA data are average country-level net recovery rates on corporate and SME bank loans derived from loan-level data. To combine the data from both datasets, we normalize them by calculating the z-scores and taking a simple average. We assume that all countries adopt a similar framework to that of the best performer (Denmark) by 2035. Second, we use the estimated coefficients from Bhatia and others (2019) which found a one-standard-deviation shock to the quality of insolvency systems reduces the cost of funding by around 25 bps. In addition, higher legal certainty arising from similar insolvency regimes across the EU helps encourage more cross-border mergers and acquisitions, contributing to higher investment and TFP.

[23] For instance, Neira (2019) estimated that moving the level of bank loan recovery rate (proxy for bankruptcy efficiency) from the highest among OECD countries to the lowest is associated with lowering TFP by 30 percent as it results in shifting firms toward less productive ones in the economy. See also André and Demmou (2022) and McGowan and others (2017).

Advancing the Capital Markets Union

For the area of finance, we select one specific action—increasing venture capital (VC) investment in the economy (Action 4)—which can foster an ecosystem for more innovation, leading to higher TFP. We focus on increasing VC investment to quantify the benefits from taking actions recommended by Arnold and others (2024).

We map reforms aimed at increasing venture capital investment in Europe to higher TFP using elasticities from the literature. First, we assume that our policy recommendations lead to an increase of EU pension and insurance funds' VC investments from currently 0.02 percent of assets under management, to about 0.19 percent of assets under management. The outcome of 0.19 percent of assets under management would equal about 50 percent of the level of US pension and insurance funds' VC investments (in US dollar values). We assume that at the country level this leads to countries with low VC catching up with the current level of the top three member states (Estonia, Denmark, and Sweden). This implies tripling VC at the EU level from a very low level (0.075 percent of GDP over 2021-2023) by 2035. Second, we take this shock at the member state level and apply the coefficient of Mollica and Zingales (2007), who found that an increase of 10 percent in the volume of VC investment increases the total number of newly created firms by 2.5 percent. Third, we apply the coefficient of Gourio and others (2016), who find that a one-standard-deviation shock to the number of start-ups leads to an increase in TFP of about 0.09 percent after four years.

Increasing Labor Mobility across the EU

For the area of labor, we model increased labor mobility—an immediate outcome from implementing Actions 6-8. We assume, based on recent migration experience within the EU, that 12 advanced EU countries (that are individually included in the model) on average receive additional immigrants from the rest of EU from increased labor mobility, resulting in a 2-percent increase of the labor supply during 2025-2035. However, we are agnostic about how all or a subset of Actions 6-8 should be implemented in order to bring out this 2-percent increase in the labor supply, as quantitative links between these actions and increased labor mobility have not been well established in the literature, creating modeling challenges. The modeled increase in labor supply is lower than the peak interstate mobility in the US in 1990s (3.5-4 percent of the labor force) documented by Kaplan and Schulhofer-Wohl (2015) and 3 percent during 2019-2022 documented by Bick and others (2024). This implies that the rest of EU would experience additional net emigration, if the total EU labor force stays unchanged from the baseline. Additional labor supply would help alleviate labor shortages in the receiving countries. Therefore, countries experiencing more labor shortages (based on rankings derived from ECB quarterly data as of the first quarter of 2025) would have higher increases in labor supply.

The estimation for improved skill matching is informed by two OECD studies (McGowan and Andrews, 2015a; McGowan and Andrews, 2015b) that examined industry data from the OECD's Programme for the International Assessment of Adult Competencies (PIAAC) across 19 countries and estimated the impact of skill mismatches on productivity (through lower allocative efficiency). We use their findings to assume that each country catches up with best practices. For countries not included in the analysis, such as Greece, Portugal, and Ireland, we employ interpolation based on skills mismatch rankings (Guo and others 2022), using analogous rankings to estimate the TFP impact. Even for countries experiencing additional net emigration, the skill matching would gradually improve, in part because better job prospects due to improved labor mobility would encourage people to pursue more skills and higher education, supporting overall improvement in human capital.

Integrating the Electricity Market

For the area of energy, we also model lower electricity prices—an immediate outcome from implementing Actions 9-10, while being agnostic about how strongly Actions 9-10 should be implemented in order to bring forth the reduction in electricity prices discussed below (due to lack of a quantitative link between them which creates modeling challenges). Using the average wholesale electricity price from January 2004 to March 2025 as the baseline, future prices are projected to decline as market mechanisms become more efficient.[24] Countries with initially high electricity costs, such as Ireland, Italy, and Greece, are assumed to experience the largest reductions. This downward trend is primarily attributed to the enhanced cross-border energy sharing, which helps stabilize prices and mitigate risks across the region. As the interconnections between national grids strengthen, electricity prices are expected to converge partially across the EU. Countries like Austria, Belgium, Germany, and the Netherlands, are assumed to experience moderate reductions. Countries with already relatively low prices, such as Finland, Portugal, Spain, and Sweden, will see smaller reductions.

The decline in wholesale electricity prices is expected to gradually translate into lower retail electricity prices for both households and firms. As wholesale costs fall, energy suppliers can pass on the savings through reduced retail tariffs, lowering energy bills for consumers and production costs for businesses. This reduction in energy expenses enhances household purchasing power and improves firms' competitiveness, ultimately stimulating consumption, investment, and overall economic activity.

Semi-structural Model

The Model-Updated Projection Framework (MUP-F) is used to measure the economic impacts of the actions discussed above. The MUP-F is an analytical tool that combines impulse response functions (IRFs) for different structural shocks to produce a scenario analysis. Here, the Flexible System of Global Models (FSGM)—a semi-structural, multi-region model with a global commodity market, well suited to study supply-side reforms—is used to produce the IRFs. Specifically, the reforms discussed above are mapped into the parameters of the MUP-F tool as follows:

- Adopting a high-quality insolvency regime for all firms across the EU is modeled as a permanent reduction in corporate risk premia, which in turn increases Tobin's Q value of existing and new projects incentivizing lending for capital accumulation. Moreover, higher capital accumulation increases labor productivity and raises demand for labor, which lifts wages and boosts consumption.
- Increasing VC investment contributes to more creation of new firms, which lowers funding costs for startups and scaleups. Faster technology development and diffusion to other companies boosts TFP and increases capital accumulation.
- Improved labor mobility within the EU constitutes a positive labor supply shock to advanced economies but lowers labor supply in the rest of EU, compared to the baseline. In addition, improved labor mobility would encourage people in emigrating countries to pursue more skills and higher education. Therefore, even for emigrating countries investment in human capital and eventually improved skill matching would gradually lift labor productivity.

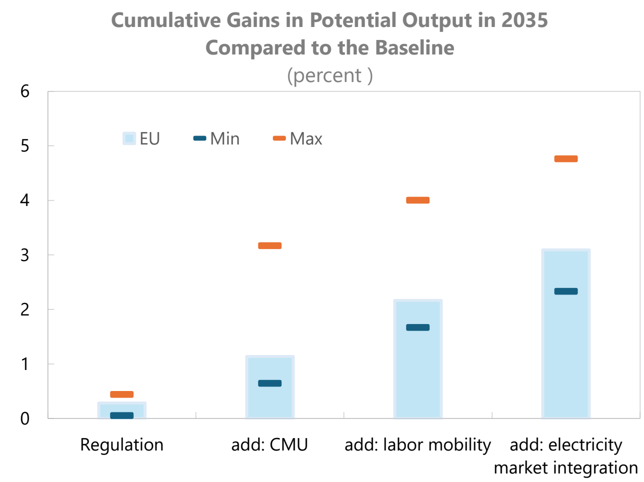
[24] The assumption here is highly stylized. In practice, the country level distribution of wholesale energy prices following greater interconnection is a complex issue and might temporarily include higher prices in those with the lowest initial costs. What the simulations try to capture is both a general improvement in price levels, as well as lower volatility and better hedging against risks (see Kammer 2025).

- Lower and more stable energy prices encourage long-term investment. The reduction in energy expenses raises household purchasing power, potentially boosting consumption more broadly. It also improves firms' competitiveness and profits, ultimately stimulating investment. For energy importers, lower energy prices also boost terms-of-trade, enabling cheaper imports to further boost consumption, investment and overall economic activity.

Simulation Results

Simulation results suggest that a few reforms along these dimensions (regulation, capital, labor, energy) would increase the GDP level in the EU relative to baseline over 10 years by around 3 percent (Figure 7). This is a sizable improvement considering that EU potential growth is projected to be just above 1 percent annually over this horizon. Individual member states would all benefit, with output gains relative to baseline ranging from around 2 to 5 percent. The reforms can boost growth for some time beyond this horizon for instance if they also successfully promote innovation.

Figure 7. Gains from EU-Level Reforms



Sources: IMF staff estimates.
Shows the range among 12 countries (Austria, Belgium, Finland, France, Germany, Greece, Ireland, Italy, the Netherlands, Portugal, Spain, and Sweden) and rest of EU.

A growth accounting exercise indicates that roughly 20 percent of the increase in the level of potential GDP can be attributed to gains in TFP, which captures improvements in efficiency and technological progress. The remaining 80 percent is explained by factor accumulation—specifically, increased labor input, such as higher employment or hours worked, and a larger capital stock resulting from greater investment.

This decomposition highlights that the bulk of the impact on potential output from the reforms will be driven by accumulation of factor inputs.[25] There are upside risks to this estimation from better productivity improvements than assumed in this exercise (e.g., from reforms reinforcing each other), or complementary national reforms contributing to lowering the intra-EU trade barriers. For instance, considering national reforms, Budina and others (2025) estimate that business regulation reforms, through boosting private sector competition and innovation, could add over 1 percent to GDP over the medium term across west Balkan and central and southeastern European economies, and up to 0.7 percent in advanced economies.[26] It is also possible that higher investment embeds new technology that could further boost GDP gains relative to what is estimated here, as the current analysis assumes TFP to be exogenous. On the other hand, GDP gains could turn out smaller than suggested by the simulation results. For instance, the measure of initial insolvency regime quality

[25] Note that the FSGM model does not assume any feedback loop from higher investment or better allocation of labor to higher TFP growth. In this sense, it is possible that the decomposition presented here is understating TFP gains.

[26] Budina and others (2025) identify domestic structural reform priorities for individual European countries and highlight that successful implementation—by which countries aim to close 50 percent of their prioritized policy gaps (in the areas of labor market and human capital, fiscal structural, business regulation, and credit and capital markets) relative to the most growth-friendly regulatory settings—would entail sizable gains of around 5 and 7 percent for advanced European and CESEE economies, respectively, in the medium term.

used in the simulation may be outdated if countries have implemented reforms after 2022 to improve the insolvency regime. Similarly, if energy market integration (such as building cross-border energy interconnectors) is not done in tandem among all countries, the reduction in both level and volatility of energy prices could be more limited than simulated in the model.

The output impact estimated here from these selected actions would constitute a down payment on a more complete reduction on internal barriers for goods and services trade. IMF staff's earlier work (Baba and others 2023) estimated that reducing remaining barriers within the single market, analogous to reducing cost of trade and bilateral multinational production within the EU by 10 percent, would lead to welfare gains on the order of 7 percent of GDP.

Conclusion

Addressing Europe's slow productivity growth, driven in part by EU firms' relatively limited innovation and scale up, is paramount for ensuring strong long-term economic growth and resilience. The persistent productivity gap between the EU and the United States not only threatens the region's economic competitiveness but also hampers its ability to adapt to demographic shifts and sustain its social model.

This paper identifies four binding constraints—fragmented regulations, inefficient financial intermediation, limited labor mobility, and a fragmented energy market—that hinder the scaling up and innovation of firms across Europe. By tackling these issues heads-on, the EU can unlock significant potential within its single market, fostering an environment more conducive to innovation and growth.

The proposed priorities for reform, centered around regulatory harmonization, enhanced access to finance, improved labor mobility, and energy market integration, present a pathway toward deepening the single market. These reforms will not only benefit firms and households but also promise substantial economic gains for the EU, with estimates indicating a potential increase in output relative to baseline of around 3 percent by 2035.

In an increasingly complex global environment, deepening the EU single market has become particularly urgent as a means of boosting Europe's productivity and resilience. Europe cannot afford delays in pushing ahead with the agenda outlined in the Letta and Draghi reports. The set of actionable priorities outlined in this paper can help jumpstart the process. To maximize the impact of these EU-level actions, it is essential that they are complemented with growth-friendly domestic structural reforms tailored to member states' unique circumstances and challenges.

Table 1. Simulation Assumptions, Channels and Results

Reform area	10 Actionable Priorities	Actions/ Reform outcomes included in the simulation	Assumption and channel	GDP impact in 10 years (percent)
Regulation	1. Adopt a 28th regime with harmonized legal rules for areas key to firms' formation, operation and dissolution.	Adopt a unified high-quality insolvency regime.	All countries adopt a similar framework to that of the best performer. Lower corporate risk premia, lower funding cost.	0.3
	2. For new rules, prioritize fully harmonized EU-level legislation and, for existing rules, simplify, consolidate and codify.			
Capital	3. Expand the pool of long-term capital.			
	4. Channel saving to early-stage, risky assets through increasing venture capital investment.	Increase the share of VC investment by pension funds and insurers in the economy.	Increase the share of VC investment by pension and insurance funds, thereby tripling VC at the EU level from a currently low level (0.075 percent of GDP over 2021-2023). This is comparable, in terms of magnitude, to EU countries catching up to the top three performers in terms of VC as a share of GDP (Estonia, Denmark and Sweden). More firm creation leading to higher investment and TFP directly, and pressuring incumbent for more innovation indirectly.	0.9
	5. Allow more efficient cross-border allocation through more integrated markets.			
Labor	6. Modernize and harmonize professional qualification recognition. 7. Strengthen social security coordination and portability of supplementary pension rights and promote portability of wage contracts. 8. Improve housing affordability and continue to address language barriers.	Enhance within-EU labor mobility.	Increased within-EU labor mobility with increases in AE by 2 percent, holding total EU population/labor force unchanged from baseline. Positive labor supply shock for advanced economies; gradually improved skills matching for all, in part because better job prospects encourage people to pursue more skills and higher education, supporting overall improvement in human capital.	1.1
Energy	9. Develop a coordinated EU strategy for the energy system transformation that combines a blueprint for action with strengthened coordination and collaboration of EU and national policies. 10. Streamline permitting processes.	Lower electricity prices.	Lowering electricity prices across EU arranging from a reduction of 3-23 percent. Lower energy expenses enhances household purchasing power and improves firms' competitiveness, stimulating consumption, investment.	0.9

Sources: IMF staff estimates.

Annex I. National and EU-level Regulations: Guiding Principles and Responsibilities

This annex draws on the legal principles published by the European Commission.

Guiding principles: (i) conferral, which limits the EU's authority to what is granted by the treaties; (ii) proportionality, ensuring actions are necessary to achieve treaty objectives; and (iii) subsidiarity, allowing EU intervention only when it can act more effectively than national governments.

- The EU has exclusive competences in areas such as customs union and monetary policy, where only it can legislate.
- Shared competences, like the single market and environment, allow both the EU and member states to legislate, with the EU's laws taking precedence.
- Supporting competences, such as in public health and culture, enable the EU to assist member states without legislative power.
- Lastly, special competences allow the EU to coordinate economic policies and conduct foreign relations, demonstrating the balance of power and responsibilities between the EU and its member countries.

The above competencies guide how laws are set either as regulations or directives:

- Regulations are binding legislative acts that must be applied fully across the EU. They have direct applicability in all member states without the need for national legislation.
- Directives, on the other hand, set out goals that member states must achieve, but they allow countries the flexibility to devise their own laws on how to reach these goals.

Areas/ sectors in which legislation is EU-level versus national-level:

<u>EU-level regulations</u>

- Customs Union: The EU establishes a common customs tariff on goods imported from outside the EU, meaning only the EU can legislate on customs duties.
- Competition Rules for the Single Market: The EU can investigate and sanction companies for anti-competitive practices, such as the European Commission's action against Google for abusing its market dominance.
- Monetary Policy: The ECB controls monetary policy for countries that use the euro, including setting interest rates.
- Trade and International Agreements: The EU negotiates trade agreements on behalf of its member states, such as the Comprehensive Economic and Trade Agreement (CETA) with Canada.
- Common Fisheries Policy: The EU sets fishing quotas and manages fish stocks across member states to ensure sustainable fishing practices.

<u>Shared</u>

- Single Market: The EU establishes rules for the free movement of goods, services, capital, and people, while member states can also legislate in these areas as long as they do not conflict with EU rules.
- Employment and Social Affairs: The EU sets minimum standards for workers' rights, such as the Working Time Directive, while member states can enact additional protections.

- Agriculture: The Common Agricultural Policy (CAP) is an example where the EU provides a framework, but member states can implement specific measures tailored to their needs.
- Environment: The EU's Environmental Impact Assessment Directive requires assessments for projects, while member states can adopt stricter national standards.
- Consumer Protection: The EU sets regulations on product safety (e.g., General Product Safety Directive), but individual member states may enforce additional consumer rights.

National level but EU-supported

- Public Health: The EU supports member states in initiatives such as the Health Program which funds health-related projects but does not legislate health policy.
- Culture: The EU promotes cultural exchanges and initiatives, such as the Creative Europe program, while member states maintain control over their cultural policies.
- Education and Training: The EU supports educational programs like Erasmus+, which fosters student exchanges, but member states decide their own education systems.
- Civil Protection: The EU’s Civil Protection Mechanism helps coordinate responses to disasters, but individual countries remain responsible for their disaster management.
- Administrative Cooperation: The EU encourages cooperation among member states for better governance through initiatives like the European Administrative Space.
- Coordination of Economic and Employment Policies: The EU sets the European Semester process to coordinate economic policies among member states, while each country retains sovereignty over its economic policies.
- Foreign and Security Policy: The EU conducts diplomatic missions and has common positions on foreign affairs, although member states can pursue their own foreign policies.
- Flexibility Clause: This clause allows the EU to take action in areas not explicitly covered by the treaties, such as during a crisis when rapid response is necessary.

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