EUROPEAN CENTRAL BANK

EUROSYSTEM

Economic Bulletin

Issue 2 / 2025

Contents

Economic, financial and monetary developments

Overview

At its meeting on 6 March 2025, the Governing Council decided to lower the three key ECB interest rates by 25 basis points. In particular, the decision to lower the deposit facility rate – the rate through which the Governing Council steers the monetary policy stance – is based on its updated assessment of the inflation outlook, the dynamics of underlying inflation and the strength of monetary policy transmission.

The disinflation process is well on track. Inflation has continued to develop broadly as staff expected, and the March 2025 ECB staff macroeconomic projections for the euro area closely align with the previous inflation outlook. Staff now see headline inflation averaging 2.3% in 2025, 1.9% in 2026 and 2.0% in 2027. The upward revision in headline inflation for 2025 reflects stronger energy price dynamics. For inflation excluding energy and food, staff project an average of 2.2% in 2025, 2.0% in 2026 and 1.9% in 2027.

Most measures of underlying inflation suggest that inflation will settle at around the Governing Council's 2% medium-term target on a sustained basis. Domestic inflation remains high, mostly because wages and prices in certain sectors are still adjusting to the past inflation surge with a substantial delay. But wage growth is moderating as expected, and profits are partially buffering the impact on inflation.

Monetary policy is becoming meaningfully less restrictive, as the interest rate cuts are making new borrowing less expensive for firms and households and loan growth is picking up. At the same time, a headwind to the easing of financing conditions comes from past interest rate hikes still transmitting to the stock of credit, and lending remains subdued overall. The economy faces continued challenges and staff have again marked down their growth projections – to 0.9% for 2025, 1.2% for 2026 and 1.3% for 2027. The downward revisions for 2025 and 2026 reflect lower exports and ongoing weakness in investment, in part originating from high trade policy uncertainty as well as broader policy uncertainty. Rising real incomes and the gradually fading effects of past rate hikes remain the key drivers underpinning the expected pick-up in demand over time.

The Governing Council is determined to ensure that inflation stabilises sustainably at its 2% medium-term target. Especially in current conditions of rising uncertainty, it will follow a data-dependent and meeting-by-meeting approach to determining the appropriate monetary policy stance. In particular, the Governing Council's interest rate decisions will be based on its assessment of the inflation outlook in light of the incoming economic and financial data, the dynamics of underlying inflation and the strength of monetary policy transmission. The Governing Council is not pre-committing to a particular rate path.

Economic activity

The euro area economy likely grew modestly in the fourth quarter of 2024. The first two months of 2025 saw a continuation of many of the previous year's patterns. Manufacturing is still a drag on growth even if survey indicators are improving. High uncertainty, both at home and abroad, is holding back investment and competitiveness challenges are weighing on exports. At the same time, services are resilient. Moreover, rising household incomes and the robust labour market are supporting a gradual pick-up in consumption, although consumer confidence is still fragile and saving rates are high.

The unemployment rate stayed at its historical low of 6.2% in January 2025, and employment is estimated to have grown by 0.1% in the last quarter of 2024. However, demand for labour has moderated, and recent survey data suggest that employment growth was subdued in the first two months of 2025.

Persistently high geopolitical and policy uncertainty is expected to weigh on euro area economic growth, especially in investment and exports, slowing down the anticipated recovery. This follows slightly weaker than expected growth at the end of 2024. Both domestic and trade policy uncertainty are high. Although the baseline projection only includes the impact of new tariffs on trade between the United States and China, the negative effects of uncertainty regarding the possibility of further changes in global trade policies, particularly vis-à-vis the European Union, are assumed to weigh on euro area exports and investment. This, coupled with persistent competitiveness challenges, is assessed to lead to a further decline in the euro area's export market share. Despite these headwinds, the conditions remain in place for euro area GDP growth to strengthen again over the projection horizon. Rising real wages and employment, in the context of a strong, albeit cooling, labour market, are expected to support a recovery in which consumption remains a key contributor to growth. Domestic demand should also be supported by an easing of financing conditions, as implied by market expectations about the future path of interest rates. The labour market should remain resilient, with the unemployment rate expected to average 6.3% in 2025, edging down to 6.2% in 2027. As some of the cyclical factors that have recently reduced productivity start to unwind, productivity is expected to pick up over the projection horizon, although structural challenges remain. Overall, annual average real GDP growth is expected to be 0.9% in 2025, and to strengthen to 1.2% in 2026 and to 1.3% in 2027. Compared with the December 2024 Eurosystem staff macroeconomic projections for the euro area, the outlook for GDP growth has been revised down by 0.2 percentage points for both 2025 and 2026, but is unchanged for 2027. The weaker outlook is mainly due to downward revisions to exports and, to a lesser extent, to investment, reflecting a stronger impact of uncertainty than previously assumed, as well as expectations that competitiveness challenges will likely persist for longer than had been anticipated.

Fiscal and structural policies should make the economy more productive, competitive and resilient. The European Commission's Competitiveness Compass provides a concrete roadmap for action and its proposals should be swiftly adopted. Governments should ensure sustainable public finances in line with the EU's

economic governance framework and prioritise essential growth-enhancing structural reforms and strategic investment.

Inflation

According to Eurostat's flash estimate, annual inflation stood at 2.4% in February 2025, after 2.5% in January and 2.4% in December 2024. Energy price inflation slowed to 0.2%, following a strong increase to 1.9% in January, from 0.1% in December. By contrast, food price inflation rose to 2.7%, from 2.3% in January and 2.6% in December. Goods inflation ticked up to 0.6%, while services inflation eased to 3.7%, from 3.9% in January and 4.0% in December.

Most indicators of underlying inflation are pointing to a sustained return of inflation to the Governing Council's 2% medium-term target. Domestic inflation, which closely tracks services inflation, declined in January 2025. But it remains high, as wages and some services prices are still adjusting to the past inflation surge with a substantial delay. At the same time, recent wage negotiations point to a continued moderation in labour cost pressures.

Headline HICP inflation has increased over recent months but is projected to moderate marginally in the course of 2025 and then to decline and hover around the Governing Council's inflation target of 2% from the first quarter of 2026. At the start of the projection horizon upward base effects in the energy component and higher food price inflation are expected to broadly offset downward impacts from a decline in HICP inflation excluding energy and food (HICPX). The rise in energy commodity prices at the turn of the year will carry over into the annual rate of change in energy prices in 2025. Although oil and gas prices are assumed to decline in line with futures prices, energy inflation is likely to continue to record positive rates, albeit below the historical average, over the entire projection horizon. In 2027 energy inflation is seen to be driven up by the introduction of new climate change mitigation measures. Food inflation is projected to rise until mid-2025, mainly driven by recent robust increases in food commodity prices, before declining to stand at an average of 2.2% in 2027. HICPX inflation is expected to start to decline in early 2025 as the effects of lagged repricing fade, wage pressures recede and the impact from past monetary policy tightening continues to feed through to consumer prices. The decline in HICPX inflation is expected to be mainly driven by a decrease in services inflation – which has thus far been relatively persistent. Overall, HICPX inflation is projected to moderate from 2.2% in 2025 to 1.9% in 2027. Wage growth should continue to follow a downward path from the current still elevated levels as inflation compensation pressures fade. Coupled with the anticipated recovery in productivity growth, this is expected to lead to significantly slower growth in unit labour costs. As a result, domestic price pressures are projected to continue to ease, with profit margins recovering over the projection horizon. External price pressures, as reflected in import prices, are expected to remain moderate assuming that EU trade tariff policies remain unchanged. Compared with the December 2024 projections, the outlook for headline HICP inflation has been revised up by 0.2 percentage points for 2025 on account of higher energy commodity price assumptions and the

depreciation of the euro, while it has been marginally revised down for 2027 owing to a slightly weaker outlook for the energy component at the end of the horizon.

In summary, the assumption of higher energy price inflation led staff to revise up the headline inflation projection for 2025. At the same time, staff expect core inflation to continue slowing, as labour cost pressures ease further and the past monetary policy tightening continues to weigh on prices. Most measures of longer-term inflation expectations continue to stand at around 2%. All of these factors will support the sustainable return of inflation to the Governing Council's target.

Risk assessment

The risks to economic growth remain tilted to the downside. An escalation in trade tensions would lower euro area growth by dampening exports and weakening the global economy. Ongoing uncertainty about global trade policies could drag investment down. Geopolitical tensions, such as Russia's unjustified war against Ukraine and the tragic conflict in the Middle East, remain a major source of uncertainty as well. Growth could be lower if the lagged effects of monetary policy tightening last longer than expected. At the same time, growth could be higher if easier financing conditions and falling inflation allow domestic consumption and investment to rebound faster. An increase in defence and infrastructure spending could also add to growth.

Increasing friction in global trade is adding more uncertainty to the outlook for euro area inflation. A general escalation in trade tensions could see the euro depreciate and import costs rise, which would put upward pressure on inflation. At the same time, lower demand for euro area exports as a result of higher tariffs and a re-routing of exports into the euro area from countries with overcapacity would put downward pressure on inflation. Geopolitical tensions create two-sided inflation risks as regards energy markets, consumer confidence and business investment. Extreme weather events, and the unfolding climate crisis more broadly, could drive up food prices by more than expected. Inflation could turn out higher if wages or profits increase by more than expected. A boost in defence and infrastructure spending could also raise inflation through its effect on aggregate demand. But inflation might surprise on the downside if monetary policy dampens demand by more than expected.

Financial and monetary conditions

Market interest rates in the euro area decreased after the Governing Council's meeting on 30 January 2025, but rose in the run-up to its meeting on 6 March in response to a revised outlook for fiscal policy. The interest rate cuts are gradually making it less expensive for firms and households to borrow and loan growth is picking up. At the same time, a headwind to the easing of financing conditions comes from past interest rate hikes still transmitting to the stock of credit, and lending remains subdued overall.

The average interest rate on new loans to firms declined to 4.2% in January 2025, from 4.4% in December 2024. By contrast, firms' cost of issuing market-based debt rose to 3.7%, 0.2 percentage points above its December level. Over the same period, the average interest rate on new mortgages declined to 3.3%, from 3.4%.

Growth in bank lending to firms rose to 2.0% in January, up from 1.7% in December, on the back of a moderate monthly flow of new loans. Growth in debt securities issued by firms rose to 3.4% in annual terms. Mortgage lending continued to rise gradually but remained muted overall, with an annual growth rate of 1.3%.

Monetary policy decisions

The interest rates on the deposit facility, the main refinancing operations and the marginal lending facility were decreased to 2.50%, 2.65% and 2.90% respectively, with effect from 12 March 2025.

The asset purchase programme and pandemic emergency purchase programme portfolios are declining at a measured and predictable pace, as the Eurosystem no longer reinvests the principal payments from maturing securities.

Conclusion

At its meeting on 6 March 2025, the Governing Council decided to lower the three key ECB interest rates by 25 basis points. In particular, the decision to lower the deposit facility rate – the rate through which the Governing Council steers the monetary policy stance – is based on its updated assessment of the inflation outlook, the dynamics of underlying inflation and the strength of monetary policy transmission. The Governing Council is determined to ensure that inflation stabilises sustainably at its 2% medium-term target. Especially in current conditions of rising uncertainty, it will follow a data-dependent and meeting-by-meeting approach to determining the appropriate monetary policy stance. In particular, the Governing Council's interest rate decisions will be based on its assessment of the inflation outlook in light of the incoming economic and financial data, the dynamics of underlying inflation and the strength of monetary policy transmission. The Governing Council is not pre-committing to a particular rate path.

In any case, the Governing Council stands ready to adjust all of its instruments within its mandate to ensure that inflation stabilises sustainably at its medium-term target and to preserve the smooth functioning of monetary policy transmission.

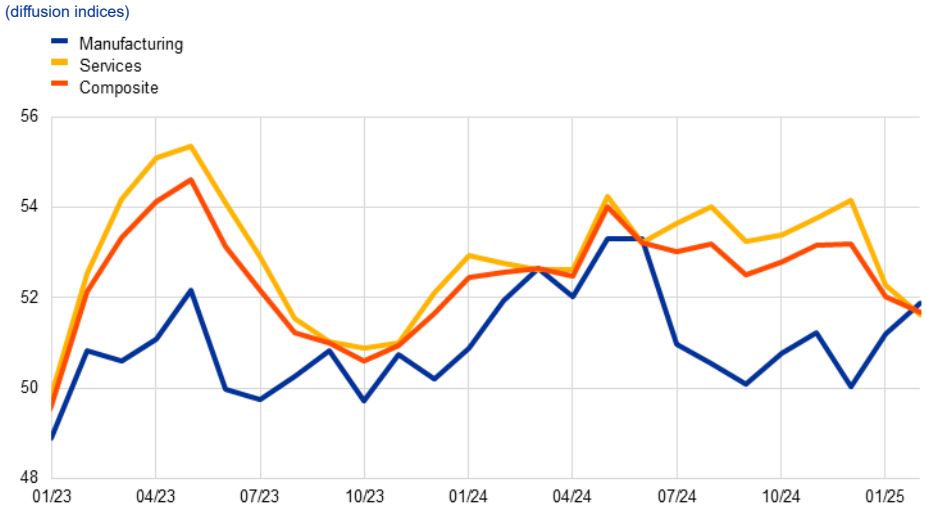
1 External environment

Over the review period from 30 January to 5 March, growth in global economic activity remained steady, although recent US trade policies imply stronger headwinds to come. Global trade growth moderated at the end of 2024, while US tariffs are putting existing trade networks at risk. The outlook for global growth and trade, as reflected in the March 2025 ECB staff macroeconomic projections for the euro area, has been revised downward due to recently implemented US tariffs and elevated trade policy uncertainty. Headline inflation across member countries of the Organisation for Economic Co-operation and Development (OECD) increased slightly due to higher energy and food prices, while core inflation continued to decline. While headline inflation across major advanced and emerging market economies is still expected to decline gradually over the projection horizon (2025-27), headline inflation projections have been revised up for 2025 to reflect the pass-through of tariffs to consumer prices in the United States and, to a lesser extent, in China. Overall, recent US policy announcements add significant uncertainty to the outlook.

Growth in global activity remained steady at the turn of the year, but recent shifts in the US trade policy stance may imply stronger headwinds to come. Although still in expansionary territory, the global composite output Purchasing Managers' Index (PMI) (excluding the euro area) declined in February 2025 due to a slowdown in the services sector (Chart 1), which had been the primary driver of growth in the second half of 2024. The drop in services sentiment was broad-based across major economies, but most pronounced in the United States. Overall, the latest ECB staff nowcasting model for global GDP, which incorporates a broad range of macroeconomic indicators in addition to PMIs, continues to point to steady growth of around 1.0% quarter-on-quarter in the first quarter of 2025. Nevertheless, near-term growth prospects are clouded by the recent changes to US trade policy, which implied not only the imposition of new tariffs on China but also an increase in trade policy uncertainty, which is expected to act as a drag on global investment.

Chart 1

Global output PMI (excluding the euro area)



Sources: S&P Global Market Intelligence and ECB staff calculations.
Note: The latest observations are for February 2025.

The outlook for global activity growth is projected to remain moderate, easing slightly over the projection horizon. Global real GDP is projected to grow by 3.4% in 2025 before decreasing to 3.2% in 2026-27. While the precise timing and scope of recent US trade policy announcements are still unclear, the March 2025 ECB staff macroeconomic projections incorporate the tariffs imposed by the United States on imports from China – which came into force on 4 February (i.e. before the projections cut-off date of 19 February 2025) – and retaliatory measures by China.[1] Compared with the December 2024 Eurosystem staff macroeconomic projections, global growth has been revised down by 0.1 percentage point for 2025 and 2026, as the newly imposed tariffs and higher trade policy uncertainty are expected to weigh on activity. In 2026-27, the slight decline in global GDP growth reflects slower growth in China amid unfavourable demographic dynamics, and in the United States due to the negative medium-term impact of US policies (e.g. lower immigration).[2] Downside risks to the global outlook prevail, driven by the threat of more US tariffs (e.g. levies on steel and aluminium, as well as tariffs on imports from Canada, Mexico and the European Union) and prevailing geopolitical tensions.

Global trade growth moderated at the end of 2024 and is projected to slow amid the impact of tariffs, elevated trade policy uncertainty, a less favourable composition of demand and an unwinding of the earlier frontloading of imports. While the mild improvement in manufacturing sentiment and industrial production can support global trade dynamics in the first quarter of 2025, growth in

1 On 1 February 2025 the United States announced an additional 10 percentage point tariff on all Chinese goods, marking a significant step in the ongoing trade dispute. In retaliation, China imposed tariffs on 80 US products, including liquefied natural gas (LNG), coal and agricultural equipment, effectively increasing the tariff on US imports by 1 percentage point. US tariffs on Chinese imports came into effect on 4 February and Chinese retaliatory tariffs on 10 February. Furthermore, China implemented export bans on critical metals such as tellurium and tungsten, which also came into effect on 4 February.

2 See "ECB staff macroeconomic projections for the euro area, March 2025", published on the ECB's website on 6 March 2025.

global activity at the turn of the year was driven mainly by components with low trade intensity, i.e. public and private consumption. In addition, elevated trade policy uncertainty and slower monetary policy easing in the United States are expected to weigh on investment in the future, affecting trade disproportionately as investment tends to be highly trade intensive. Moreover, the frontloading of trade – which supported global trade in 2024, as firms in the United States in particular stockpiled imports of foreign inputs ahead of possible trade disruptions – is expected to gradually fade in 2025 as new tariffs take effect. A partial unwinding of the frontloading of imports is also expected to weigh on demand throughout 2025, mostly across the advanced economies that frontloaded imports from emerging markets in 2024. Lastly, trade flows are expected to be significantly affected by tariffs over the projection horizon, with the March 2025 projections entailing large downward revisions to imports and exports in the United States and China by a cumulated 1.0-1.5 percentage points each over 2025-27. Against this background, growth in euro area foreign demand is projected to moderate from 3.4% in 2024 to 3.2% in 2025 and to 3.1% in 2026 and 2027, with significant downward revisions compared with the December 2024 projections.

The ongoing escalation of trade tensions poses risks to the smooth functioning of existing trade networks. The outlook for trade is clouded by uncertainty, as protectionism could significantly hamper cross-border flows. US tariffs on Canada and Mexico would affect around one-third of total US imports of goods and around three-quarters of total goods exported by Canada and Mexico, with the impact of tariffs likely to be amplified by the interconnected nature of supply chains across North America.[3] On 10 February, the US administration announced a 25% tariff on steel and aluminium entering the United States, effective as of 12 March.[4] Despite the small share of these goods in US imports (2%), US consumers and industries located downstream in supply chains (e.g. the automotive industry) are expected to be negatively affected. Furthermore, President Trump instructed his advisers to devise a comprehensive plan for reciprocal tariffs on 12 February, and announced global tariffs on cars, pharmaceuticals and semiconductors on 18 February. On 21 February he argued in favour of a review of trade partners' tariffs on US digital services, announced a 25% tariff on European imports on 26 February and an additional 10% levy on China on 27 February.

Headline inflation across OECD member countries has increased amid a slight increase in core inflation. In January 2025 the annual rate of consumer price index (CPI) inflation across OECD members (excluding Türkiye) rose to 3.0%, up from 2.9% the previous month (Chart 2). This uptick in headline CPI inflation was partly due to higher energy prices, with the contribution of food prices remaining broadly

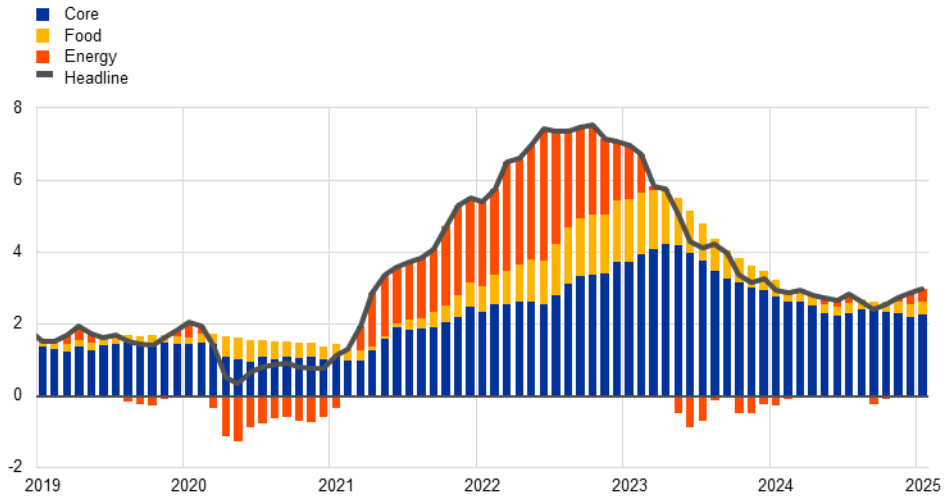
[3] The US President signed executive orders to implement tariffs on Canada and Mexico on 1 February for implementation as of 4 February. The implementation was subsequently suspended by one month (until 4 March). On 6 March the US administration announced a temporary suspension of tariffs on goods that comply with the United States-Mexico-Canada Agreement (USMCA), effective until April 2.

[4] The two new announcements foresee the reinstatement of the full 25% tariff on steel and an increase in aluminium tariffs from 10% to 25%. To this end, the US administration terminated all approved exemptions that had been granted during the first Trump presidency. This means that the countries that negotiated exemptions are likely to be the most affected by these new US tariffs. In addition, the 25% tariff has been expanded to include derivative products made of steel and aluminium.

stable. Core CPI inflation, which excludes energy and food prices, increased slightly to 3.1%.

Chart 2
OECD CPI inflation

(year-on-year percentage changes, percentage point contributions)



Sources: OECD and ECB staff calculations.
Notes: The OECD aggregate excludes Türkiye and is calculated using OECD CPI annual weights. The latest observations are for January 2025.

Notwithstanding the recent uptick across OECD members, CPI inflation across a broader group of advanced and emerging countries is projected to remain on a declining path over the projection horizon. Although the disinflation process across OECD members appears to have stalled at the end of 2024, CPI inflation across a broader group of advanced and emerging countries in the March 2025 projections is expected to decline gradually from 4.2% in 2024 to 2.5% in 2027.[5] The cooling of labour markets across OECD members is expected to drive down nominal wage inflation, allowing headline CPI inflation to gradually converge towards central bank targets. Compared with the December 2024 projections, headline CPI inflation across a broader group of advanced and emerging countries is expected to be higher in 2025, reflecting the pass-through of tariffs to consumer prices in the United States and, to a lesser extent, in China. For 2026 and 2027, CPI inflation across global economies has been revised down, as the upward impact of tariffs is more than compensated by other factors, mainly downward revisions to CPI inflation in China, reflecting entrenched deflation in producer prices amid a lingering oversupply.

Over the review period, Brent crude oil prices decreased by 5%, while European gas prices declined by 12%. Concerns about the impact of trade disputes on global activity exerted downward pressure on oil prices, which was further reinforced by an unexpected build-up in US crude oil inventories, indicating weaker-than-expected demand for oil in the United States. European gas prices experienced strong volatility, as colder temperatures and a low renewable energy output led initially to higher prices owing to an increase in the amount of gas

5 ECB staff projections include a broader set of countries, notably large emerging markets (e.g. China, India, Brazil and Russia), which are not accounted for in OECD CPI inflation.

consumed for heating and to generate power. However, gas spot prices declined as a result of announcements about Ukraine peace negotiations. Downward price pressures have also been reinforced by milder weather and by LNG tankers being redirected towards Europe. Metal prices increased by 2%, mainly as a result of US-based traders making precautionary purchases following the announcements made on 10 February regarding steel and aluminium tariffs, along with threats made on 25 February to impose levies on imported copper. Lastly, food prices declined by 2%, as cocoa prices corrected downward slightly after surging in late 2024 and early 2025.

The March 2025 ECB staff projections foresee activity in the United States remaining solid in the near term led by strong growth in consumption, although risks from US policies are accumulating. Real GDP growth in the fourth quarter of 2024 (0.6% quarter-on-quarter) was mainly driven by private consumption owing to higher real disposable incomes, while business investment fell. In the first quarter of 2025 the latest ECB staff nowcast for US GDP expects growth to remain robust at 0.6% quarter-on-quarter. The financial constraints affecting US consumers appear to be growing, although the knock-on effects on consumption seem limited. While credit card defaults have risen to above their pre-pandemic averages, the number of consumer foreclosures and bankruptcies remains low by historical comparison, and the household debt service ratio remains close to pre-pandemic levels. In addition, the largest increase in credit card defaults relates to lower-income households, who account for only 12% of total consumer spending. On the nominal side, although the January CPI release was higher than expected, it hints at a decline in both headline and core personal consumption expenditures (PCE) inflation in the near term, which is also supported by the recent deceleration in the producer price index (PPI). Overall, key sources of inflation are cooling in the United States, where labour market tightness indicators have steadily declined back to their pre-pandemic levels. Still, the inflation outlook remains subject to significant uncertainty, and US policies could further slow the gradual disinflation, as tariffs on US imports are expected to be passed through to consumer prices, while stricter immigration and deportations risk a renewed tightening of the labour market. Against this backdrop, US consumers have started to increase their short and long-term inflation expectations, which in turn may further slow the disinflationary process. Finally, the Federal Open Market Committee decided at its January meeting to keep the federal funds rate unchanged, signalling no hurry to adjust the interest rate, given the still robust economy.

The outlook for China is deteriorating, as domestic demand remains weak and exports are being hit by higher US tariffs. Following the pick-up in real GDP growth in the fourth quarter of 2024, latest indicators point to a slowdown in both manufacturing and services activity. A high frequency indicator for private consumption declined in January 2025, suggesting that the boost from previous fiscal support was short lived. Consumer confidence remains persistently negative, thus weighing on a broader spending recovery, with the main property market indicators also remaining sluggish. While new US tariffs are estimated to have a rather modest adverse impact on GDP growth, a further escalation of the US-China conflict implies downside risks, even though additional fiscal stimulus, which had

already been signalled by Chinese authorities in December 2024, could mitigate this impact. Meanwhile, Chinese CPI inflation rose to 0.5% in January, while PPI inflation remained in negative territory at -2.3%. Core CPI inflation (excluding food and energy) increased slightly to 0.6% in January from 0.4% the previous month, mainly on account of a temporary increase in services prices following a pick-up in activity helped by increased fiscal support for consumption. Overall, sluggish domestic demand and overproduction are fuelling strong price competition among firms, implying subdued inflationary pressures over the medium term.

Activity in the United Kingdom remains modest amid persistent inflation. Real GDP grew modestly (0.1% quarter-on-quarter) in the fourth quarter of 2024, as private demand and net trade made negative contributions, which were partially offset by the positive impact from inventories and higher government spending. Weak short-term indicators for private demand suggest that subdued growth might continue into 2025. Headline CPI inflation rose to 3.0% in January 2025 from 2.5% in December 2024, driven mainly by food inflation. Headline CPI inflation is expected to remain elevated throughout 2025, supported by increases in energy prices and regulated price changes, as well as the impact of government policies announced in the Autumn Budget 2024 (e.g. an increase in the rate of employer National Insurance contributions). The Bank of England lowered the key policy rate by 25 basis points in its February meeting, judging that domestic price pressures remained stable and that the recent pick-up in headline CPI inflation will not lead to additional second-round effects on underlying domestic inflationary pressures.

2 Economic activity

According to the information available at the cut-off date, the euro area economy grew by 0.1% in the fourth quarter of 2024, after expanding by 0.4% in the third quarter, amid increasing domestic demand and contracting exports. Employment rose by 0.1% in the fourth quarter, at the same pace as GDP. Across sectors, industrial activity is expected to have continued to decline in the fourth quarter, reflecting weak demand for goods, competitiveness losses and elevated uncertainty. By contrast, the services sector expanded further, boosted mainly by non-market services. Survey indicators point to moderate growth at the start of the year. The Purchasing Managers' Index (PMI) for services has remained broadly stable vis-à-vis the fourth quarter, still indicating growth. At the same time, the manufacturing index, albeit continuing to indicate falling output, has recently improved. Further headwinds are likely to come from increasing protectionism and trade distorting measures, which might disproportionately affect the manufacturing sector compared with other parts of the economy. While the labour market has softened over recent months, it continues to be robust. Looking ahead, the high level of uncertainty and persisting competitiveness losses are expected to somewhat limit the speed of recovery of the euro area economy. Nonetheless, the projected recovery should be supported by higher labour incomes and more affordable credits.

This outlook is broadly reflected in the March 2025 ECB staff macroeconomic projections for the euro area, which foresee annual real GDP growth of 0.9% in 2025, 1.2% in 2026 and 1.3% in 2027.[6]

According to Eurostat's flash estimate, real GDP edged up by 0.1%, quarter on quarter, in the fourth quarter of 2024 (Chart 3).[7] This means that output rose in all quarters of the year. As a result, GDP is estimated to have risen by 0.7% in 2024, which represents an improvement vis-à-vis 2023, when it grew by 0.4%.[8] Short-term indicators and available country data point to positive contributions from private consumption and investment, offset by falling net exports, while the contribution from changes in inventories was broadly neutral. At the same time, the industrial sector likely remained weak, while the services sector was more resilient. The fourth quarter outcome for the euro area generates a positive carry-over effect to annual growth in 2025.[9]

6 See "ECB staff macroeconomic projections for the euro area, March 2025", published on the ECB's website on 6 March 2025.

7 Quarterly euro area real GDP growth was revised up to 0.2% in the release on 7 March, which was two days after the cut-off date for data in this issue of the Economic Bulletin.

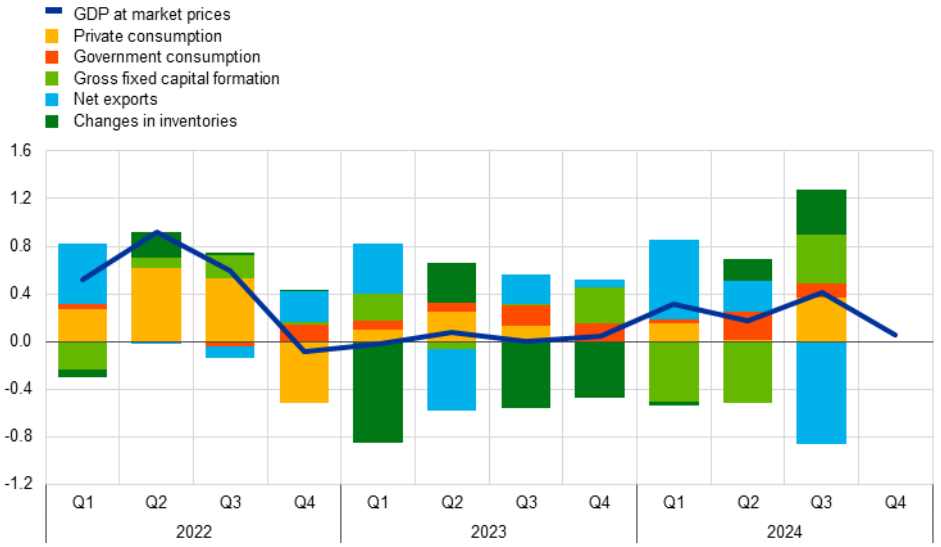
8 The annual growth rate for 2024 is based on seasonally and calendar adjusted figures. Unadjusted data are not available for all the Member States included in GDP flash estimates.

9 This implies that GDP would grow by 0.3% in 2025 if all quarterly growth rates this year were zero (i.e. if quarterly GDP remains at the same level as in the fourth quarter of 2024).

Chart 3

Euro area real GDP and its components

(quarter-on-quarter percentage changes; percentage point contributions)

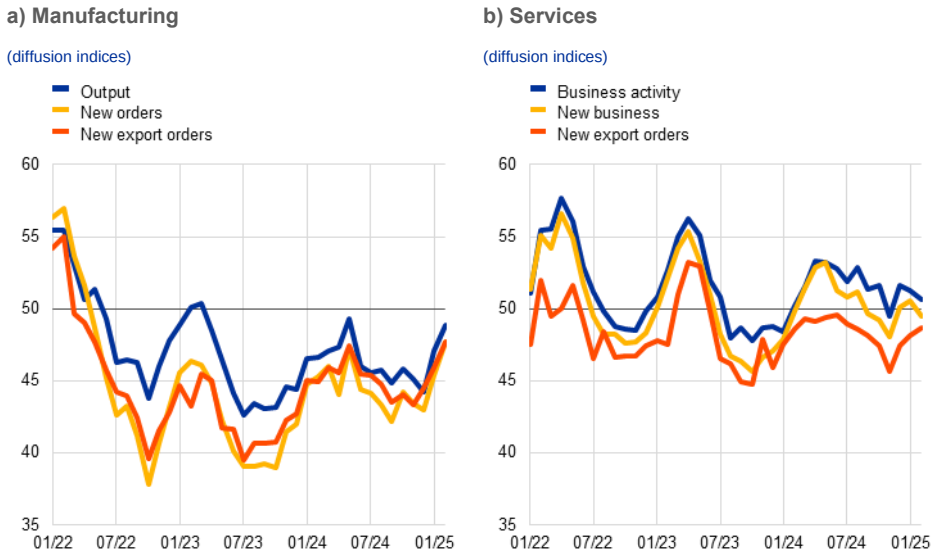


Sources: Eurostat and ECB calculations.
Note: The latest observations are for the fourth quarter of 2024 for GDP and the third quarter of 2024 for the expenditure breakdown.

Survey data point to continued moderate services sector-led growth in the first quarter of 2025 amid elevated uncertainty. Uncertainty surrounding economic policy – including trade policy – is weighing on the near-term outlook. The predominant source of uncertainty on the global stage relates to US policies, particularly in the security and trade domains. Increasing protectionism might disproportionately affect the manufacturing sector compared with other parts of the economy. Nonetheless, the composite output Purchasing Managers' Index (PMI) rose to 50.2 on average in January and February (from 49.3 in the fourth quarter), largely on the back of an increase in manufacturing. Despite this recent improvement, the manufacturing PMI still points to contracting activity, with the index having now been below 50 for almost two years (Chart 4). The PMI for new orders has also improved recently but still remains below 50, pointing to a weak short-term outlook for industry. In the services sector, the PMI remains above the no-growth threshold – although the latest readings have been below its long-term average. The European Commission's business confidence indicators portray a broadly similar picture.

Chart 4

PMI indicators across sectors of the economy



Source: S&P Global Market Intelligence.
Note: The latest observations are for February 2025.

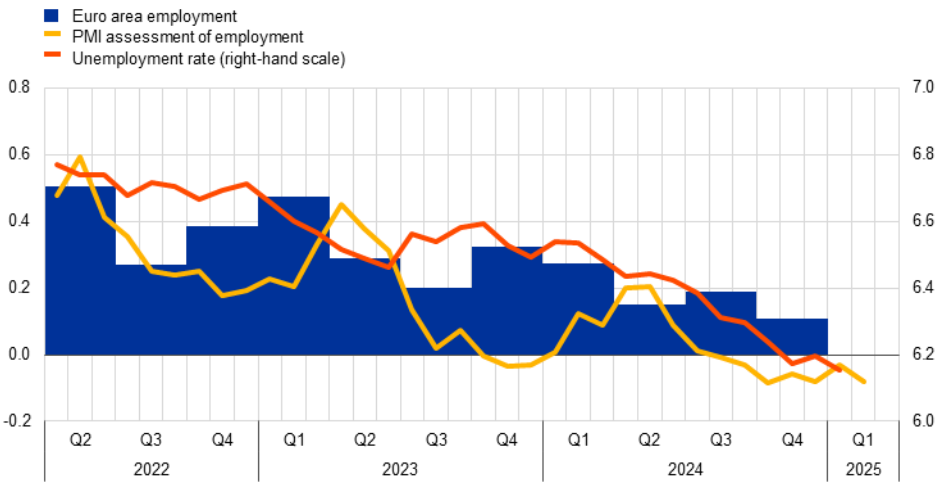
Employment increased by 0.1% in the fourth quarter of 2024. This was lower than in the other quarters of the year (Chart 5). Yet employment growth was resilient in relation to GDP growth, leading to a decline in productivity of 0.1%. The unemployment rate stood at 6.3% in December, 0.1 percentage points higher than in November, remaining close to its lowest level since the euro was introduced. Labour demand has declined somewhat from the high levels seen after the pandemic, with the job vacancy rate unchanged at 2.5% in the fourth quarter, 0.8 percentage points lower than its peak in the second quarter of 2022.[10]

[10] See box entitled "Using corporate earnings calls to forecast euro area labour demand" in this issue of the Economic Bulletin.

Chart 5

Euro area employment, PMI assessment of employment and unemployment rate

(left-hand scale: quarter-on-quarter percentage changes, diffusion index; right-hand scale: percentages of the labour force)



Sources: Eurostat, S&P Global Market Intelligence and ECB calculations.
Notes: The two lines indicate monthly developments, while the bars show quarterly data. The PMI is expressed in terms of the deviation from 50, then divided by 10 to gauge the quarter-on-quarter employment growth. The latest observations are for the fourth quarter of 2024 for employment, February 2025 for the PMI assessment of employment and January 2025 for the unemployment rate.

Short-term labour market indicators point to stable employment in the first quarter of 2025. The monthly composite PMI employment indicator declined from 49.7 in January to 49.3 in February, suggesting that employment in the first quarter is likely to be broadly unchanged compared with the fourth quarter of 2024. The PMI employment indicator for services declined from 50.9 in January to 50.8 in February, while the PMI employment indicators for manufacturing and construction remained in contractionary territory.

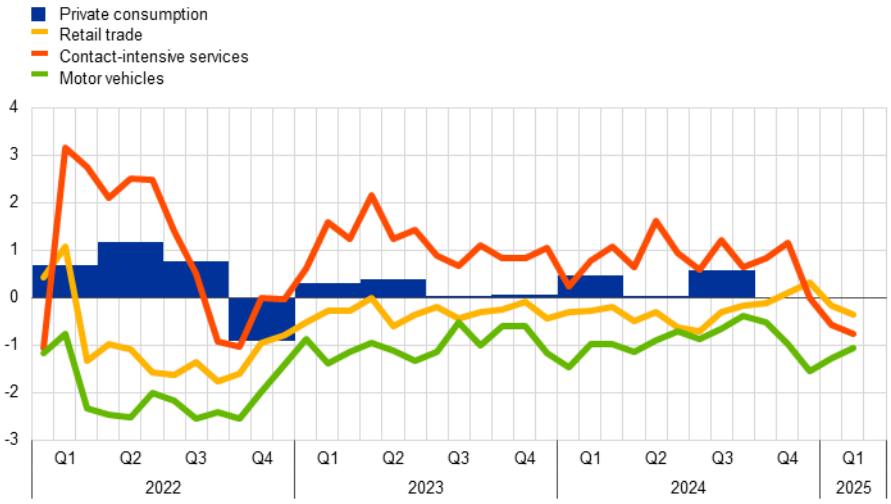
Private consumption growth likely moderated in the fourth quarter of 2024. After increasing by 0.7%, quarter on quarter, in the third quarter (Chart 6), private consumption growth seems to have moderated in the fourth quarter of 2024 – also reflecting the unwinding of some temporary factors that supported its expansion in the previous quarter, e.g. the Paris 2024 Olympic and Paralympic Games. This is corroborated by the 0.4% quarter-on-quarter increase in retail sales and the 0.5% quarter-on-quarter rise in services production. Incoming data point to moderating momentum in household spending growth in the short term as well, as reflected in the latest ECB staff macroeconomic projections. The European Commission's consumer confidence indicator edged up further in February but remains subdued overall, amid still high uncertainty. The European Commission's indicators of business expectations for demand in contact-intensive services declined further in February, while the ECB's latest Consumer Expectations Survey indicates that expected holiday purchases remain robust, despite some recent softening. At the same time, consumer expectations for major purchases in the next 12 months edged up in February, after deteriorating in the previous month. Going forward, persisting economic policy uncertainty, particularly in the context of global economic developments, should continue to weigh on households' spending decisions. However, higher purchasing power – reflecting the slowdown in inflation – and

continued rises in real labour income are expected to support consumption in the quarters ahead.

Chart 6

Private consumption and business expectations for retail trade, contact-intensive services and motor vehicles

(quarter-on-quarter percentage changes; standardised percentage balances)



Sources: Eurostat, European Commission and ECB calculations.
Notes: Business expectations for retail trade (excluding motor vehicles), expected demand for contact-intensive services and expected sales of motor vehicles refer to the next three months; "contact-intensive services" refers to accommodation, travel and food services. The contact-intensive services series is standardised for the period January 2005-19, owing to data availability, whereas motor vehicles and retail trade are standardised for the period 1999-2019. The latest observations are for the third quarter of 2024 for private consumption and February 2025 for business expectations for retail trade, contact-intensive services and motor vehicles.

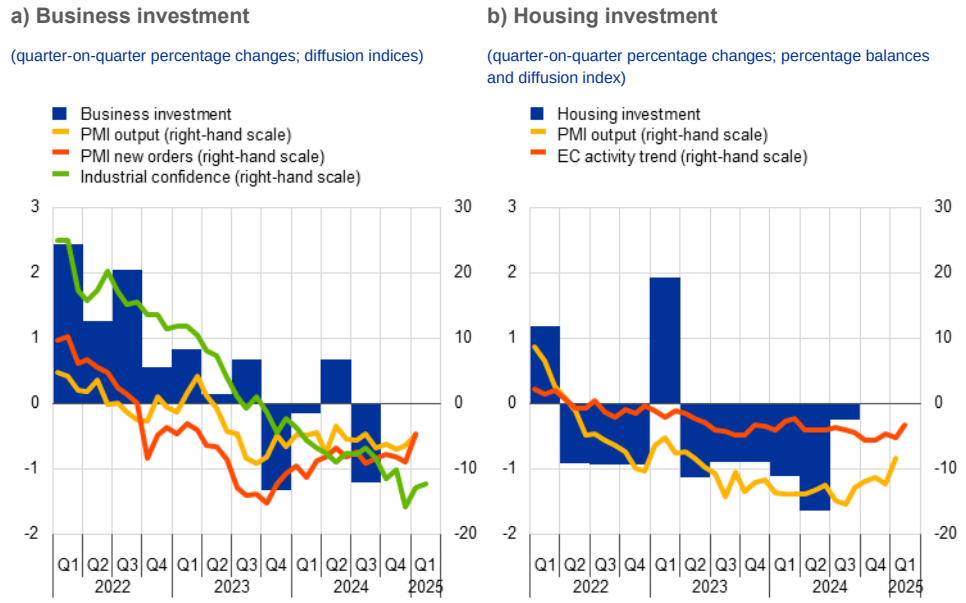
Business investment likely remained muted around the turn of the year amid high uncertainty. Following the marked contraction in the third quarter of 2024, business investment (proxied in the national accounts by non-construction investment excluding Irish intangibles) is expected to have increased slightly in the fourth quarter. However, investment in tangible assets has been particularly weak over recent quarters. In the capital goods sector, industrial production fell by 1.2%, quarter on quarter, in the fourth quarter – as anticipated by the PMI output indicators diving deep into negative territory over the course of last year and the industrial confidence indicator at levels last seen during the 2020 lockdown (Chart 7, panel a). Intangible investment continues to grow, although well below the rates seen in the United States (see Box 1). Incoming data suggest weakness at the start of 2025 against a backdrop of elevated uncertainty surrounding geopolitical and economic policy as well as trade policy uncertainty. The latest Corporate Telephone Survey, the Survey on the Access to Finance of Enterprises in the euro area and the Bank Lending Survey all anticipate subdued investment at the start of the year, with the latter expecting a further downtick in demand in the first quarter for the longer-term loans typically associated with fixed investment.[11] These factors combined are likely to weigh on investment at the start of the year. Further ahead, barring strong disruptions to trade, the gradual pick-up in the wider economy, easing financing

[11] See the box entitled "Main findings from the ECB's recent contacts with non-financial companies", *Economic Bulletin*, Issue 1, ECB, 2025, the latest ECB Survey on the Access to Finance of Enterprises in the euro area published in January 2025 and the January 2025 euro area bank lending survey.

conditions and the resolution of some sources of uncertainty should support investment. In addition, ongoing deployments of Next Generation EU funds will help to further crowd in business investment.

Chart 7

Real investment dynamics and survey data



Sources: Eurostat, European Commission (EC), S&P Global Market Intelligence and ECB calculations.
Notes: Lines indicate monthly developments, while bars refer to quarterly data. The PMIs are expressed in terms of the deviation from 50. In panel a), business investment is measured by non-construction investment excluding Irish intangibles. Short-term indicators refer to the capital goods sector. The latest observations are for the third quarter of 2024 for business investment, January 2025 for the PMIs and February 2025 for industrial confidence. In panel b), the line for the European Commission's activity trend indicator refers to the weighted average of the building and specialised construction sectors' assessment of the trend in activity compared with the preceding three months, rescaled to have the same standard deviation as the PMI. The line for PMI output refers to housing activity. The latest observations are for the third quarter of 2024 for housing investment, January 2025 for PMI output and February 2025 for the European Commission's activity trend.

Housing investment remained largely stable in the fourth quarter of 2024. After declining significantly from 2022 onwards, housing investment seems to have bottomed out in the fourth quarter of 2024, as available country data suggest a slight increase in housing investment in the fourth quarter, while production in building and specialised construction remained unchanged compared with the third quarter. Survey-based activity indicators improved at the beginning of this year. Yet overall they continue to point to muted momentum in housing investment in the first quarter of 2025, with both the PMI indicator for housing production and the European Commission's indicator for building and specialised construction activity in the last three months remaining in contractionary territory (Chart 7, panel b). However, housing investment should gradually gain momentum as 2025 progresses. According to the European Commission's survey, households' short-term intentions to buy or build a house increased further in the first quarter. This improvement in sentiment is supported by falling mortgage rates and reflects a gradual recovery in housing loans, suggesting that housing demand is slowly increasing.

Euro area exports declined at a slower pace in the fourth quarter of 2024. Total extra-euro area exports contracted by 0.1%, quarter on quarter, in the fourth quarter. This decline confirms the persisting competitiveness challenges faced by euro area

exporters (see Box 2), even amid a recovery in global demand. Looking ahead, surveys suggest that the performance of exports will continue to be subdued in the near term. The latest PMIs for new export orders remained well below the expansion threshold in February for both manufacturing and services. At the same time, monthly goods' trade data suggest that quarterly import growth slowed in the fourth quarter, suggesting an overall negative contribution of net exports to GDP.

In the March 2025 projections the economic recovery is expected to be slower than anticipated in the December 2024 projections, while uncertainty has increased. According to the March 2025 ECB staff projections, the economy is expected to grow by 0.9% in 2025, 1.2% in 2026 and 1.3% in 2027. The downward revisions for 2025 and 2026 reflect lower exports and ongoing weakness in investment, in part originating from high trade policy uncertainty as well as broader policy uncertainty. Rising real incomes and the gradually fading effects of the past rate hikes remain the key drivers underpinning the expected pick-up in demand over time.

3 Prices and costs

Euro area headline inflation decreased to 2.4% in February 2025, from 2.5% in January, primarily reflecting a decline in energy inflation. Food inflation increased while HICP inflation excluding energy and food (HICPX) edged down in February – concealing lower services inflation and higher non-energy industrial goods (NEIG) inflation. Most measures of underlying inflation suggest that it will settle at around the 2% medium-term target on a sustained basis. Wages and prices in certain sectors are still adjusting to the past inflation surge with a substantial delay, but wage growth is moderating as expected, and unit profit growth continues to partially buffer the impact of still elevated labour cost pressures on inflation. Most indicators of longer-term inflation expectations continue to stand at around 2%. Inflation has continued to develop broadly as staff expected and the latest projections closely align with the previous inflation outlook. The March 2025 ECB staff macroeconomic projections for the euro area foresee headline inflation averaging 2.3% in 2025, 1.9% in 2026 and 2.0% in 2027. The upward revision in headline inflation for 2025 reflects stronger energy price dynamics.[12]

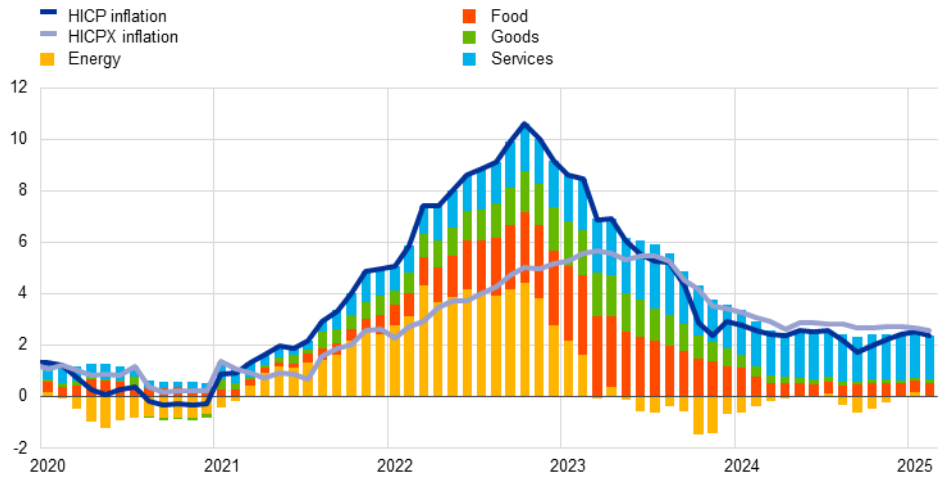
Euro area headline inflation, as measured by the Harmonised Index of Consumer Prices (HICP), decreased to 2.4% in February from 2.5% in January (Chart 8). This was primarily attributable to an expected decline in energy inflation, which fell to 0.2% in February from 1.9% in January, owing mainly to a downward base effect and a month-on-month decline in energy prices. By contrast, food inflation stood at 2.7% in February, up from 2.3% in January, reflecting a higher annual rate for unprocessed food prices, while the rate for processed food prices was unchanged. The HICPX edged down to 2.6% in February from 2.7% in January – the first decline since September 2024. This reflected lower services inflation (at 3.7% in February, down from 3.9% in January) and concealed a small increase in NEIG inflation (0.6% in February, up from 0.5% in January). The decline in services inflation in February is in line with earlier expectations of both an initial moderation driven by gradually easing wage growth and weaker repricing effects in early 2025 than in 2024.

[12] See "ECB staff macroeconomic projections for the euro area, March 2025", published on the ECB's website on 6 March 2025.

Chart 8

Headline inflation and its main components

(annual percentage changes; percentage point contributions)



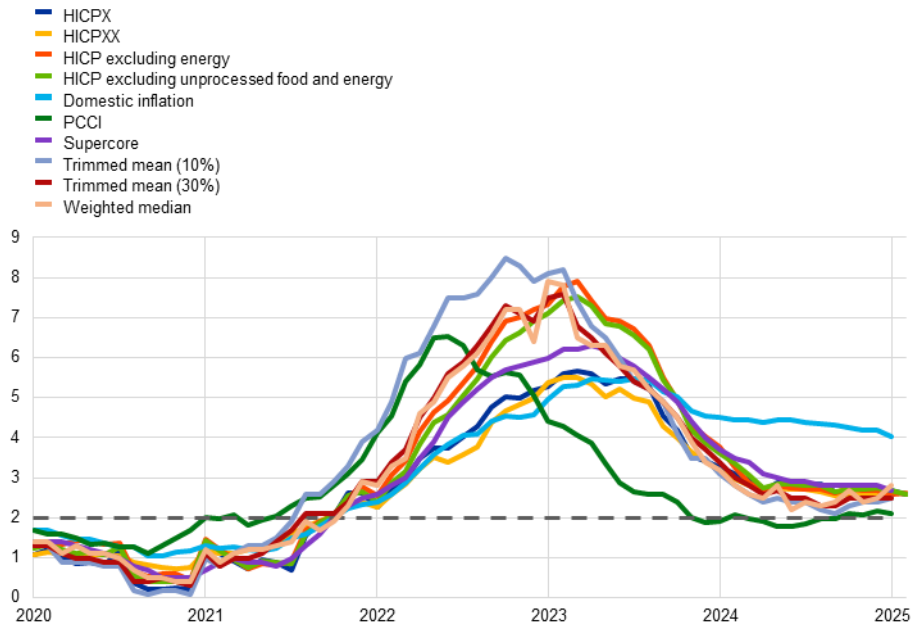
Sources: Eurostat and ECB calculations.
Notes: "Goods" refers to non-energy industrial goods. The latest observations are for February 2025 (Eurostat's flash estimate).

Most measures of underlying inflation are consistent with expectations that inflation will settle at around the 2% medium-term target on a sustained basis (Chart 9). In January 2025 – the latest month for which data are available – the bulk of the indicator values ranged from 2.1% to 2.8%. The Persistent and Common Component of Inflation (PCCI), which tends to perform best as a predictor of future headline inflation, was still at the bottom of this range, while the weighted median indicator increased to 2.8%. HICPX inflation excluding travel-related items, clothing and footwear (HICPXX) was unchanged at 2.6%, whereas the Supercore indicator, which comprises HICP items that are sensitive to the business cycle, decreased to 2.7%. Although the indicator for domestic inflation remained at a persistently high level, it edged down to 4.0% in January, from 4.2% in December 2024. This was the first time it had declined since October 2024. The change was due mainly to lower contributions from restaurant and cafe prices, as well as from insurance costs in the health and transport sectors.

Chart 9

Indicators of underlying inflation

(annual percentage changes)



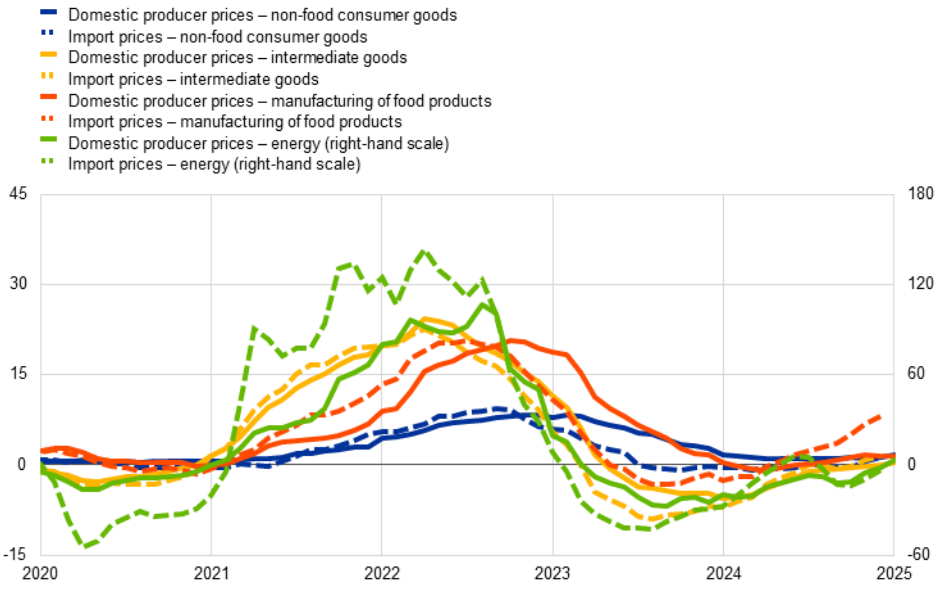
Sources: Eurostat and ECB calculations.
Notes: The grey dashed line represents the ECB's inflation target of 2% over the medium term. The latest observations are for February 2025 (Eurostat's flash estimate) for HICPX, HICP excluding energy and HICP excluding unprocessed food and energy, and for January 2025 for all other indicators.

Most indicators of pipeline pressures for goods increased but at still moderate rates (Chart 10). At the early stages of the pricing chain, producer price inflation for energy, which had been negative since April 2023, turned positive, rising to 3.5% in January 2025 from -1.6% in December 2024. The annual growth rate of producer prices for domestic sales of intermediate goods increased (to 0.5% in January, up from 0.0% in December). At the later stages of the pricing chain, domestic producer price inflation for non-food consumer goods increased to 1.6% in January, from 1.2% in December, while producer prices for the manufacturing of food products decreased slightly to 1.4% in January, from 1.5% in December. The latest available data for import prices at the cut-off date for this report refer to December 2024. For intermediate goods, the annual growth rate of import prices had continued to rise (to 1.5% in December, up from 0.9% in November). Meanwhile, import price inflation for the manufacturing of food products had increased to 8.2% in December, possibly driven by the double-digit growth rates of international food commodity prices. The growth in import price inflation also reflects the depreciation of the euro. Overall, the latest data on producer and import prices confirm that the gradual easing of accumulated pipeline pressures on consumer goods has been fading out but has not resulted in a noticeable reacceleration.

Chart 10

Indicators of pipeline pressures

(annual percentage changes)



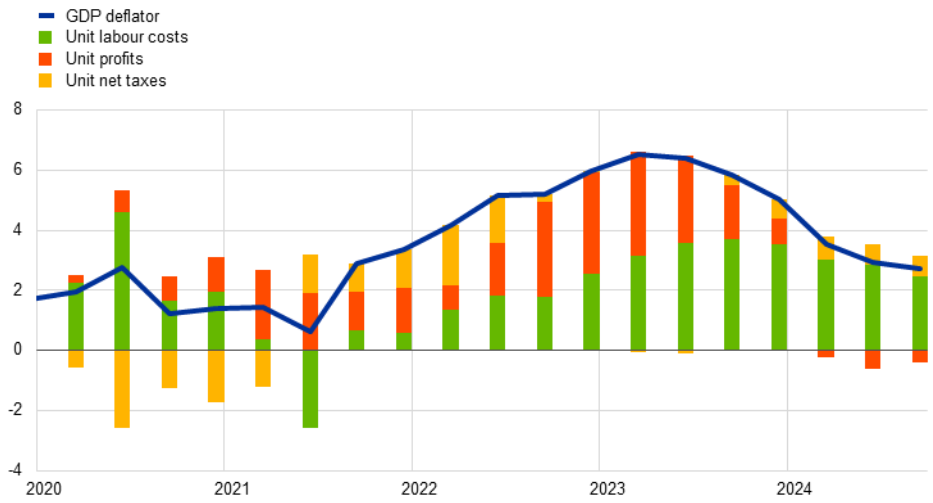
Sources: Eurostat and ECB calculations.
Note: The latest observations are for January 2025 for domestic producer prices and December 2024 for import prices.

Domestic cost pressures, as measured by growth in the GDP deflator, fell further in the third quarter of 2024, although these remained elevated (Chart 11). The latest available national account data for domestic cost pressures for the euro area continue to refer to the third quarter of 2024. The annual growth rate of the GDP deflator declined to 2.7%, from 2.9% in the previous quarter, reflecting a smaller contribution from wages and unit labour costs. Unit profit growth remained in negative territory, indicating that it is continuing to buffer still elevated labour cost pressures. Available data from national accounts for most of the euro area countries suggested that the moderating labour cost growth and profit buffering continued in the fourth quarter. Moreover, other indicators available for the euro area in the fourth quarter, such as the labour cost index and the negotiated wage indicator, confirm the further easing of labour cost pressures. Growth in the hourly wages and salary component of the labour cost index declined to 4.1%, according to Eurostat's flash estimate, from 4.4% in the third quarter. Growth in the negotiated wage indicator stood at 4.1% in the fourth quarter, down from 5.4% in the third quarter. Moreover, the ECB's forward-looking wage tracker, which includes data on negotiated wage agreements up to mid-February, keeps pointing to easing wage growth pressures at the beginning of this year. Looking forward, the March 2025 ECB staff macroeconomic projections expect growth in compensation per employee to stand at 3.4% on average for 2025 and to continue moderating to 2.6% in 2027.

Chart 11

Breakdown of the GDP deflator

(annual percentage changes; percentage point contributions)



Sources: Eurostat and ECB calculations.
Notes: Compensation per employee contributes positively to changes in unit labour costs and labour productivity contributes negatively. The latest observations are for the third quarter of 2024.

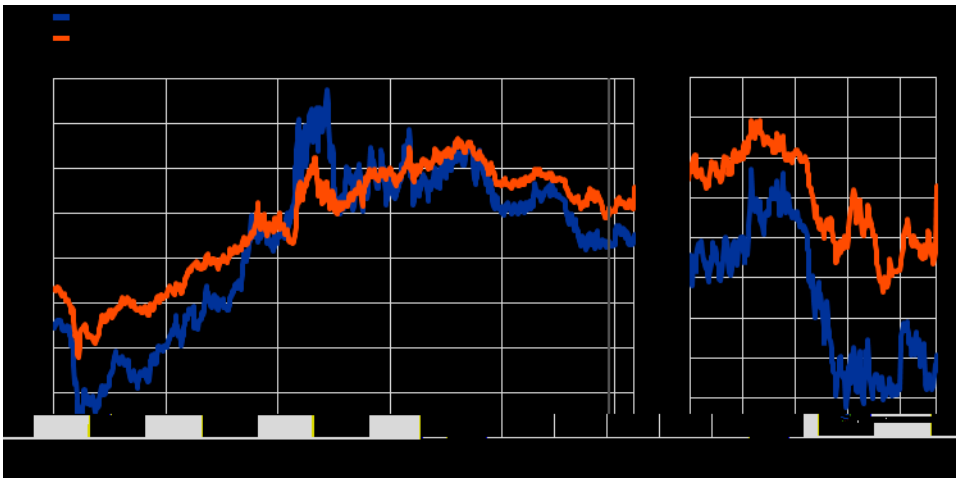
There was little change in survey-based indicators of longer-term inflation expectations, while market-based measures of medium to longer-term inflation compensation increased slightly, with most standing at around 2% (Chart 12). In both the ECB Survey of Professional Forecasters for the first quarter of 2025 and the ECB Survey of Monetary Analysts for March 2025, average and median longer-term inflation expectations remained at 2%. Shorter-term survey expectations for 2025 also stood at around 2% but saw small changes depending on the incorporation of the latest data outcomes and movements in energy commodity prices. Market-based measures of short-term inflation compensation, as measured by the one year forward inflation-linked swap rate one year ahead, have recently edged up and stand at around 1.8%. Looking at the medium and longer term, market-based measures of inflation compensation have also increased. Notably, the five-year forward inflation-linked swap rate five years ahead stands at around 2.2%, having increased by about 20 basis points since the December Governing Council meeting, largely reflecting movements following the recently announced plans for fiscal budget expansion in Europe. This rise is mostly attributed to higher inflation risk premia. Consequently, model-based estimates of genuine inflation expectations, excluding inflation risk premia, indicate that market participants continue to expect inflation to be around 2% in the longer term. On the consumer side, inflation expectations mostly resumed their downward momentum. According to the ECB Consumer Expectations Survey for January 2025, median expectations for headline inflation over the next 12 months decreased to 2.6%, from 2.8% in December 2024, while expectations for three years ahead remained unchanged at 2.4%. Median inflation perceptions over the previous 12 months declined slightly to 3.4% in January.

Chart 12

Market-based measures of inflation compensation and consumer inflation expectations

a) Market-based measures of inflation compensation

(annual percentage changes)



b) Headline HICP inflation and ECB Consumer Expectations Survey

(annual percentage changes)

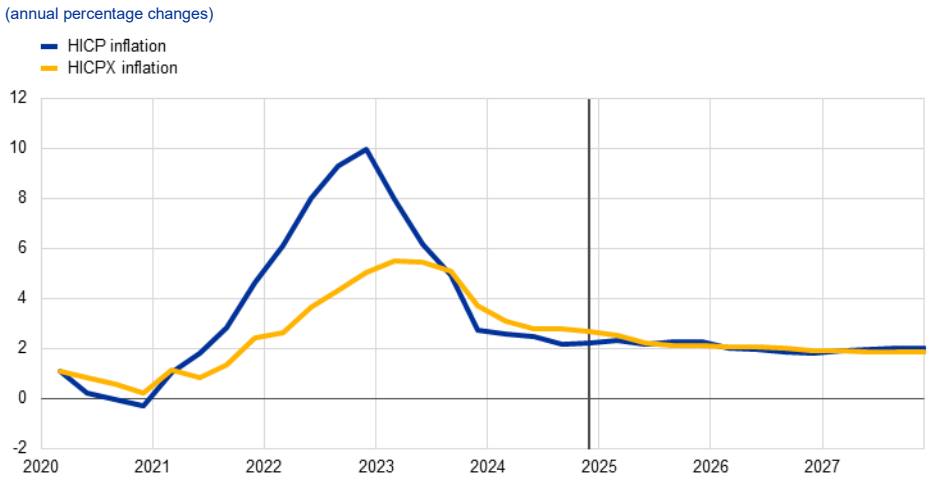
Sources: LSEG, Eurostat, ECB Consumer Expectations Survey and ECB calculations.
Notes: Panel a) shows forward inflation-linked swap rates over different horizons for the euro area. The vertical grey line indicates the start of the review period on 12 December 2024. In panel b), the dashed lines show the mean rate and the solid lines the median rate. The latest observations are for 6 March 2025 for the forward rates, February 2025 (Eurostat's flash estimate) for the HICP and January 2025 for all other measures.

The March 2025 ECB staff macroeconomic projections expect headline inflation to average 2.3% in 2025 and to decline to 1.9% in 2026 and 2.0% in 2027 (Chart 13). Headline inflation is projected to remain relatively stable in 2025, owing mainly to higher food inflation and base effects in energy prices, which broadly offset lower core inflation. It is then expected to gradually ease further in early 2026 as the base effects in energy inflation fade away. The projected increase in headline inflation in 2027 mainly reflects a temporary upward impact from energy inflation, owing to fiscal measures related to the climate change transition, in particular the introduction of a new Emissions Trading Scheme (ETS2). Compared with the

December 2024 projections, the outlook for headline inflation has been revised up by 0.2 percentage points for 2025, is unrevised for 2026 and has been revised down by 0.1 percentage points for 2027. The upward revision for 2025 is mainly owing to upward data surprises for energy inflation and higher oil and electricity price assumptions. HICPX inflation is expected to decline from 2.8% in 2024 to 2.2% in 2025,2.0% in 2026 and 1.9% in 2027, primarily driven by a decrease in services inflation. Compared with the December 2024 projections, HICPX inflation has been revised down by 0.1 percentage points for 2025 and has been revised up by 0.1 percentage points for 2026.

Chart 13

Euro area HICP and HICPX inflation



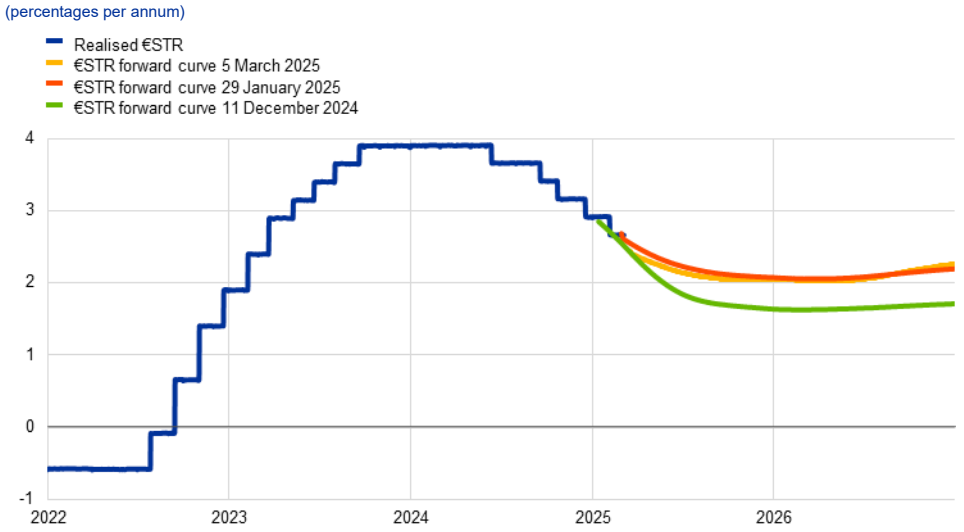
Sources: Eurostat and ECB staff macroeconomic projections for the euro area, March 2025.
Notes: The grey vertical line indicates the last quarter before the start of the projection horizon. The latest observations are for the fourth quarter of 2024 for the data and the fourth quarter of 2027 for the projections. The March 2025 ECB staff macroeconomic projections for the euro area were finalised on 19 February 2025 and the cut-off date for the technical assumptions was 6 February 2025. Both historical and projected data for HICP and HICPX inflation are reported at a quarterly frequency.

4 Financial market developments

Over the review period from 12 December 2024 to 5 March 2025, the risk-free euro short-term rate (€STR) forward curve repriced upwards with significant intermittent fluctuations. Following the December Governing Council meeting, short-term interest rates increased across major advanced economies amid concerns that US disinflation was progressing more slowly than expected. After peaking in mid-January, the euro area curve retracted as markets anticipated a continuation of disinflation and a weaker growth outlook. However, it subsequently rebounded against the backdrop of defence and infrastructure spending plans in European countries. By the end of the review period, the euro area forward curve had priced in around 65 basis points of cumulative interest rate cuts by the end of 2025. Developments in euro area sovereign bond markets broadly tracked those in risk-free rates, with yield spreads relative to overnight index swap (OIS) rates widening somewhat. Despite the weak macroeconomic outlook and tariff announcements by the US Administration, euro area equity prices were shored up by a healthy earnings season, outperforming their US counterparts. Meanwhile, in euro area corporate bond markets, spreads narrowed for both investment-grade and high-yield issuers. In the foreign exchange market, the euro appreciated in trade-weighted terms and gained more substantially against the US dollar.

Since the December Governing Council meeting, the OIS forward curve has repriced upwards with significant intermittent fluctuations (Chart 14). The benchmark €STR averaged 2.8% over the review period, following the Governing Council's widely anticipated decisions to lower the key ECB interest rates by 25 basis points at both its December and January meetings. Excess liquidity decreased by around €75 billion to €2,826 billion. This mainly reflected the repayments in December of funds borrowed in the third series of targeted longer-term refinancing operations and the decline in the portfolios of securities held for monetary policy purposes, with the Eurosystem no longer reinvesting the principal payments from maturing securities. The short end of the €STR-based OIS forward curve repriced upwards during the review period, pointing to a higher path for policy rates, with significant intermittent fluctuations. Following the December Governing Council meeting, short-term interest rates rose across major advanced economies amid concerns that US disinflation was progressing more slowly than expected. After peaking in mid-January, the euro area curve retracted as market participants anticipated a continuation of domestic disinflation and a weakening growth outlook, with the latter partly attributable to heightening trade uncertainty. However, in the run-up to the March Governing Council meeting, the euro area curve rebounded against the backdrop of defence and infrastructure spending plans in European countries. At the end of the review period, the forward curve fully priced in a rate cut of 25 basis points at the March Governing Council meeting and around 65 basis points of cumulative cuts by the end of 2025.

Chart 14
€STR forward rates



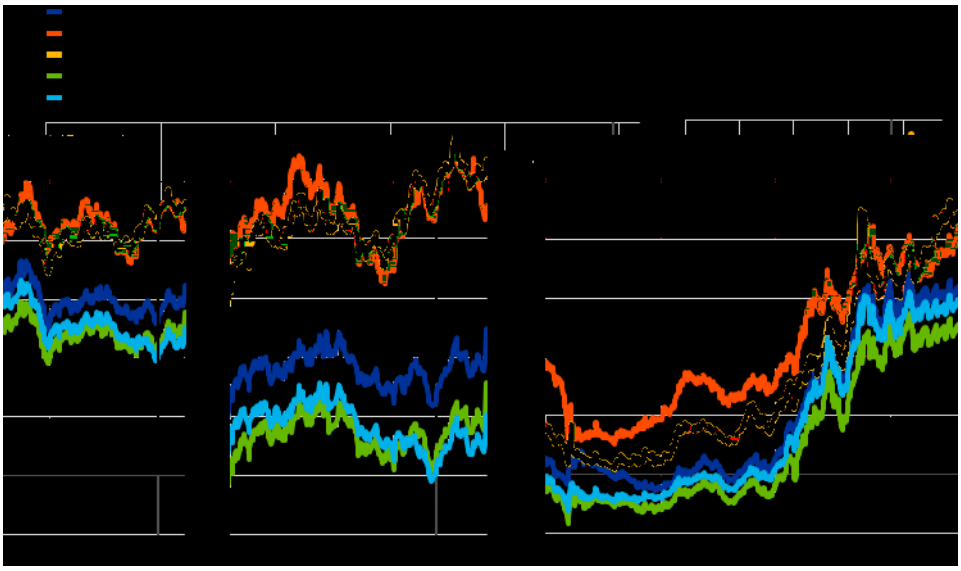
Sources: Bloomberg and ECB calculations.
Note: The forward curve is estimated using spot OIS (€STR) rates.

Euro area long-term risk-free rates fluctuated over the review period and increased overall (Chart 15). By the end of the review period, the ten-year euro area OIS rate had risen by around 45 basis points to approximately 2.5%, despite significant fluctuations throughout the period. The ten-year OIS rate climbed by around 40 basis points from the start of the review period up to mid-January on account of strong upward pressures originating from the United States. However, it subsequently retracted as market participants shifted their focus to the euro area outlook for inflation and the real economy. Finally, at the end of the review period, a ramp-up in fiscal spending plans in Europe caused long-term risk-free rates to increase by around 25 basis points. In the United States, long-term risk-free rates initially rose by around 45 basis points to reach their peak in mid-January, before falling from mid-February onwards. This retraction, which has recently been cemented by signs that US economic growth may be slowing, brought US rates down to around 4.3%, slightly below their levels at the beginning of the review period. As a result, the differential between ten-year risk-free rates in the euro area and the United States narrowed by 49 basis points. The ten-year UK sovereign bond yield increased by 31 basis points to stand at around 4.7% at the end of the review period.

Chart 15

Ten-year sovereign bond yields and the ten-year OIS rate based on the €STR

(percentages per annum)



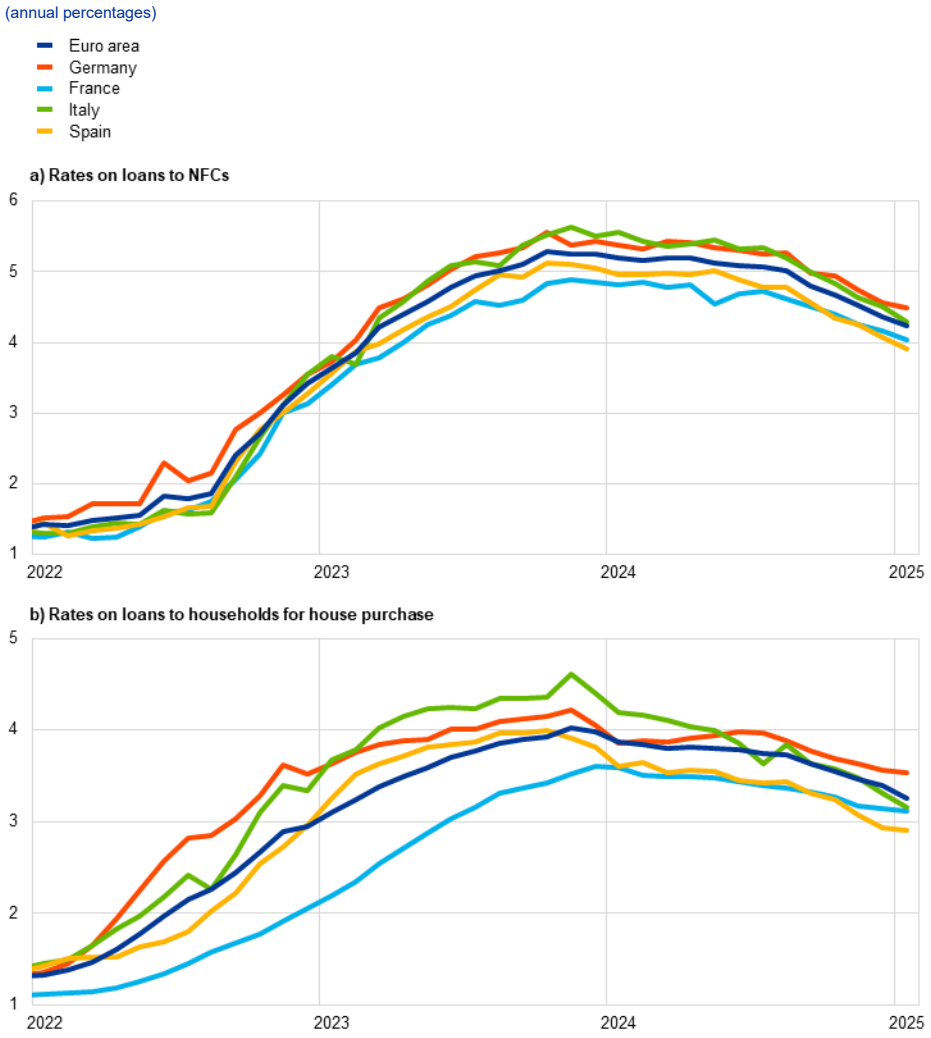
Sources: LSEG and ECB calculations.
Notes: The vertical grey lines denote the start of the review period on 12 December 2024. The latest observations are for 5 March 2025.

Long-term euro area sovereign bond yields generally tracked movements in risk-free rates, with some yield spreads widening (Chart 16). The ten-year GDP-weighted euro area sovereign bond yield closed the review period at around 3.2%, approximately 55 basis points higher than its level at the start of the period. This increase led to a widening of around 10 basis points in the spread over the €STR-based OIS rate. French sovereign bond yields performed similarly to the GDP-weighted euro area sovereign bond yield in spite of a recent perceived improvement in the country's political situation following the French Parliament's approval of the 2025 budget. The German sovereign bond spread widened by 16 basis points, remaining firmly in positive territory. Sovereign bond spreads also increased in other euro area countries, with Spanish and Portuguese sovereign bond spreads widening by 16 and 24 basis points respectively.

panel b), with variation across countries. The decline was driven solely by lower rates on renegotiated loans, while the rates on new loans excluding renegotiations were broadly unchanged.

Chart 20

Composite bank lending rates for firms and households in selected euro area countries



Sources: ECB and ECB calculations.
Notes: NFCs stands for non-financial corporations. Composite bank lending rates are calculated by aggregating short and long-term rates using a 24-month moving average of new business volumes. The latest observations are for January 2025.

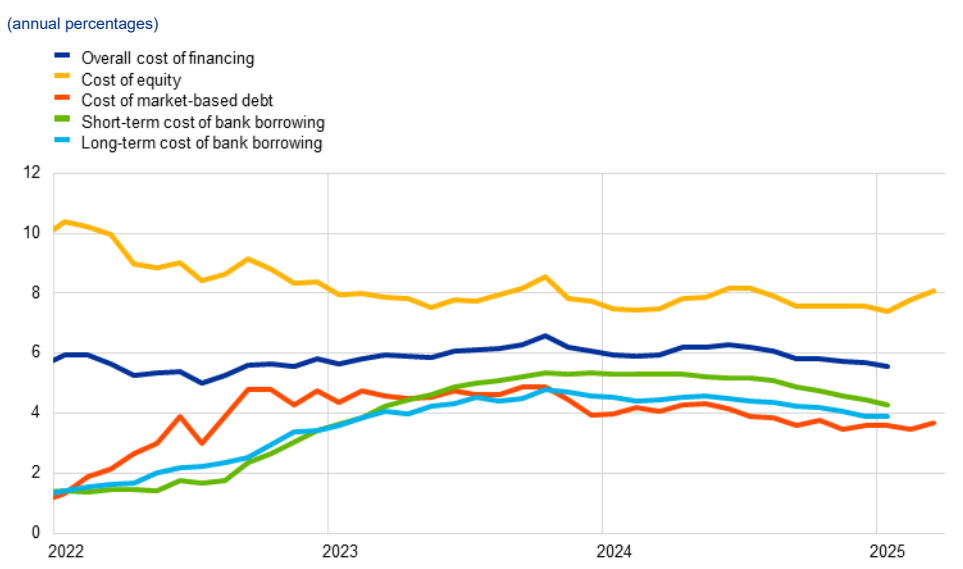
Over the period from 12 December 2024 to 5 March 2025, the cost to firms of both equity and market-based debt financing rose. Based on the monthly data available until January 2025, the overall cost of financing for NFCs – i.e. the composite cost of bank borrowing, market-based debt and equity – declined in January compared with the previous month and stood at 5.6%, below the multi-year high reached in October 2023 (Chart 21).[13] Daily data covering the period from 12 December 2024 to 5 March 2025 show that the cost of market-based debt financing

[13] Owing to lags in data availability for the cost of borrowing from banks, data on the overall cost of financing for NFCs are only available up to January 2025.

increased, driven by an upward shift in the overnight index swap (OIS) curve at the medium and long-term maturities that was only partially counterbalanced by a compression of corporate bond spreads associated with a healthy earnings season (see Section 4) that was more sizeable in the high-yield segment. The cost of equity financing rose as a result of the strengthening of the equity risk premium and – more notably – the higher long-term risk-free rate, as approximated by the ten-year OIS rate.

Chart 21

Nominal cost of external financing for euro area firms, broken down by component



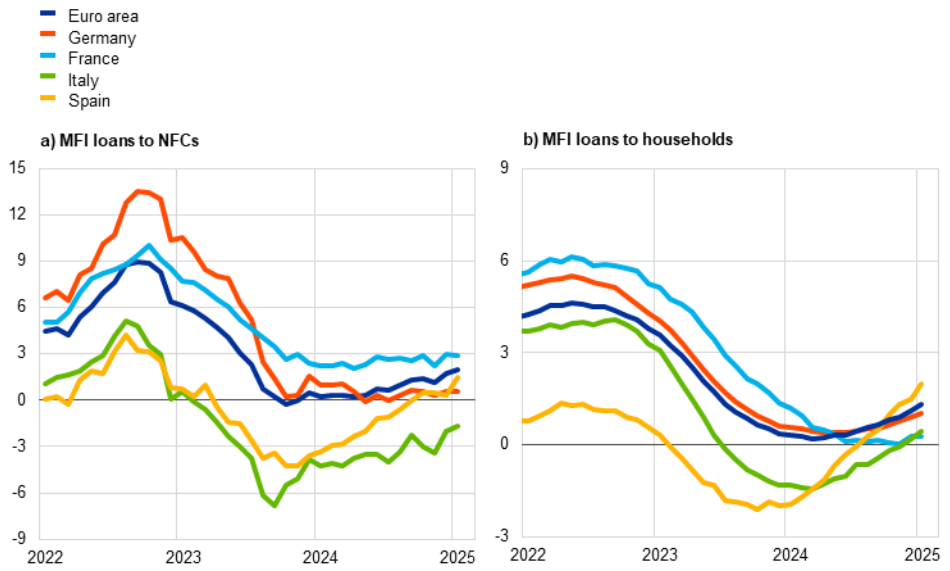
Sources: ECB, Eurostat, Dealogic, Merrill Lynch, Bloomberg, LSEG and ECB calculations.
Notes: The overall cost of financing for non-financial corporations (NFCs) is based on monthly data and is calculated as a weighted average of the long and short-term cost of bank borrowing (monthly average data), market-based debt and equity (end-of-month data), based on their respective outstanding amounts. The latest observations are for 5 March 2025 for the cost of market-based debt and the cost of equity (daily data), and for January 2025 for the overall cost of financing and the cost of borrowing from banks (monthly data).

Growth in loans to firms and households increased in January but remained weak and well below its historical average, reflecting still subdued demand and tight credit standards. The annual growth rate of bank lending to firms rose to 2.0% in January 2025, amid volatile monthly flows, up from 1.7% in December 2024 but well below its historical average of 4.8% (Chart 22, panel a). The increase occurred despite a relatively weak monthly flow in January and was primarily attributable to base effects, given that the negative flow of January 2024 ceased to be included in the annual figure. Growth in debt securities issued by firms rose to 3.4% in annual terms. The annual growth rate of loans to households continued its steady recovery. It edged up to 1.3% in January from 1.1% in December, although it remained well below its historical average of 4.1% (Chart 22, panel b). Mortgages were still the primary driving force behind this upward trend, although consumer credit continued to strengthen, with its annual growth rising to 4.0% in January. By contrast, other lending to households, including loans to sole proprietors, was again weak. The ECB's Consumer Expectations Survey in January showed that the percentage of households who perceived credit access to have been tighter still outweighs that perceiving credit access to have been easier.

Chart 22

MFI loans in selected euro area countries

(annual percentage changes)



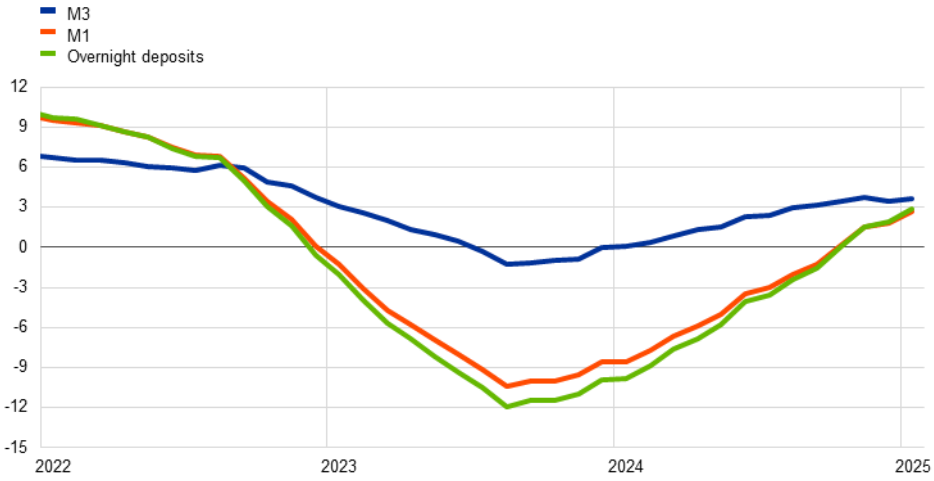
Sources: ECB and ECB calculations.
Notes: Loans from monetary financial institutions (MFIs) are adjusted for loan sales and securitisation; in the case of non-financial corporations (NFCs), loans are also adjusted for notional cash pooling. The latest observations are for January 2025.

Broad money (M3) growth remained relatively stable in January, supported by bank purchases of government securities, while net foreign inflows continued to weaken. Annual M3 growth stood at 3.6% in January 2025, up from 3.4% in December 2024 but down from 3.8% in November (Chart 23). Annual growth of narrow money (M1) – which comprises the most liquid assets of M3 – increased to 2.7% in January, compared with 1.8% in December. The increase was driven by the sharp surge in the annual growth rate of overnight deposits, which rose to 2.9% in January, up from 1.8% in December, reflecting investors' heightened preference for liquidity. The composition of money creation continued to shift. While the contribution of net foreign flows weakened further, bank net purchases of government securities picked up in January and the contribution of lending to firms and households gained weight, despite remaining subdued. At the same time, the ongoing contraction of the Eurosystem balance sheet and the increase in the issuance of long-term bank bonds (which are not included in M3) continued to contribute negatively to M3 growth.

Chart 23

M3, M1 and overnight deposits

(annual percentage changes, adjusted for seasonal and calendar effects)



Source: ECB.
Note: The latest observations are for January 2025.

6 Fiscal developments

According to the March 2025 ECB staff macroeconomic projections, the euro area general government budget deficit is estimated to have declined to 3.2% of GDP in 2024 and expected to remain broadly unchanged until the end of the forecast horizon in 2027. The euro area fiscal stance is estimated to have tightened significantly in 2024 and a smaller tightening is also expected in 2025, mainly due to tax increases. While the fiscal stance is projected to be neutral in 2026, a relatively strong tightening is expected in 2027 when the Next Generation EU (NGEU) programme is set to expire. The euro area debt-to-GDP ratio is projected to increase slowly from an already elevated level and reach close to 90% in 2027. Governments should ensure sustainable public finances in line with the EU's economic governance framework and prioritise essential growth-enhancing structural reforms and strategic investment. On 4 March 2025 the European Commission announced the ReArm Europe plan, outlining a set of proposals to use available financial levers to help EU Member States to quickly and significantly increase expenditures in defence capabilities.[14] The plan also includes making use of the flexibility in the revised economic governance framework, enabling Member States to act swiftly, as needed in the current situation.[15]

According to the March 2025 ECB staff macroeconomic projections, the euro area general government budget deficit should be unchanged at 3.2% of GDP in 2025 and remain broadly the same until 2027 (Chart 24).[16] The euro area budget deficit is estimated to have declined from 3.6% in 2023 to 3.2% of GDP in 2024, as a result of a combination of sizeable non-discretionary factors and the withdrawal of most of the energy and inflation support measures that were previously in place. The deficit should be unchanged at 3.2% in 2025 and remain broadly the same in the two following years as well, standing at 3.3% in both 2026 and 2027. The relatively stable outlook reflects a slow improvement in cyclically adjusted primary balances which is broadly offset by a gradual increase in interest expenditures. This increase reflects the pass-through of past interest rate rises, albeit proceeding at a slow pace given the long residual maturities of outstanding sovereign debt. Compared with the December 2024 Eurosystem staff macroeconomic projections, the budget balance has been revised down very marginally for 2025 and more significantly by the end of the projection horizon (by 0.4 percentage points in 2027). These revisions primarily reflect a worsening of the macroeconomic outlook but also some fiscal loosening in discretionary fiscal measures.

14 See "Press statement by President von der Leyen on the defence package", European Commission, Brussels, 4 March 2025.

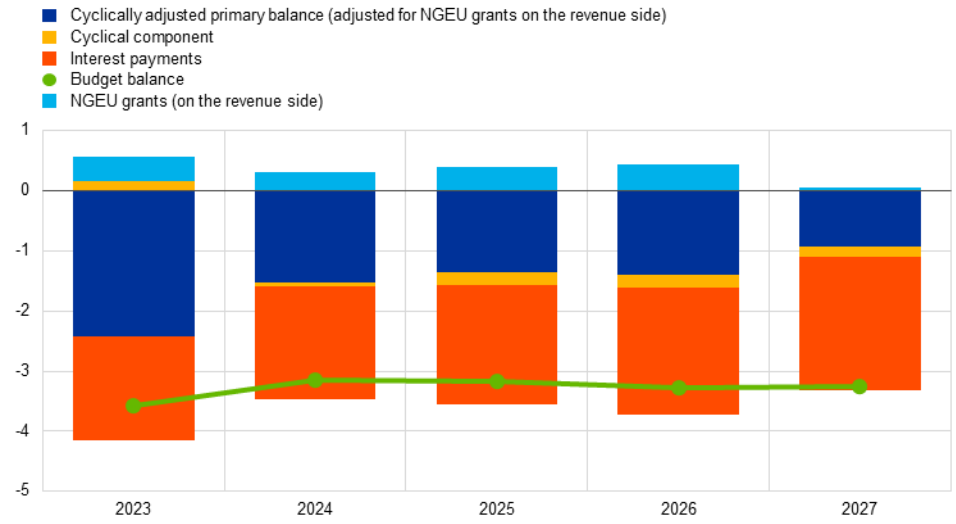
15 After the Governing Council meeting on 6 March 2025, German legislators adopted changes to the constitutional debt brake on 18 March 2025, in particular to allow for higher defence spending. They also approved the creation of a special fund for additional investment of up to €500 billion in infrastructure and climate-related projects.

16 See "ECB staff macroeconomic projections for the euro area, March 2025", published on the ECB's website on 6 March 2025.

Chart 24

Budget balance and its components

(percentages of GDP)



Sources: ECB calculations and ECB staff macroeconomic projections for the euro area, March 2025.
Note: The data refer to the aggregate general government sector of all 20 euro area countries.

The euro area fiscal stance tightened significantly in 2024 and is expected to tighten somewhat in 2025 and significantly again in 2027.[17] The estimated annual change in the cyclically adjusted primary balance, adjusted for grants extended to countries under the NGEU programme, shows a significant tightening (0.9 percentage points of GDP) of fiscal policies in the euro area in 2024. This mostly reflects the phasing-out of a large part of government energy and inflation-related support measures, as well as sizeable non-discretionary factors reflecting strong revenue developments in some countries. A tightening of 0.2 percentage points is expected in 2025, mainly due to higher taxes, which is partly offset by a negative contribution from non-discretionary factors. While the fiscal stance is expected to remain broadly neutral in 2026, it should tighten significantly − by 0.5 percentage points of GDP − in 2027 when the NGEU programme expires. As a result, the cumulative tightening of the fiscal stance over the 2024-27 projection horizon amounts to 1.6 percentage points of GDP.

The euro area debt-to-GDP ratio is projected to increase slowly throughout the projection horizon from an already elevated level (Chart 25). The debt ratio increased significantly during the pandemic, to around 97% in 2020, before falling gradually as of 2021. According to the March 2025 projections, however, this improvement has reversed, and the debt ratio is expected to increase gradually from around 87% of GDP in 2023 to about 90% of GDP in 2027. The increase over the projection horizon is driven by continued primary deficits and expected positive

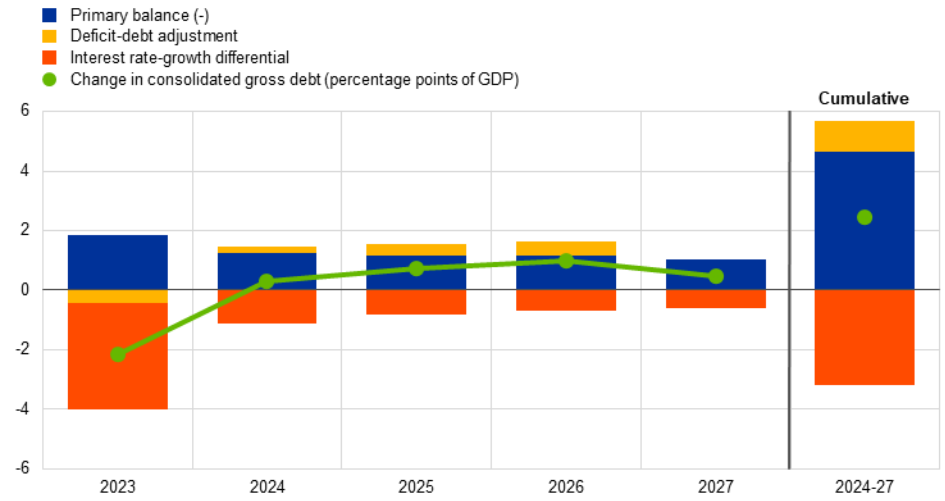
[17] The fiscal stance reflects the direction and size of the stimulus from fiscal policies to the economy beyond the automatic reaction of public finances to the business cycle. It is measured here as the change in the cyclically adjusted primary balance ratio net of government support to the financial sector. Given that the higher budget revenues related to NGEU grants from the EU budget do not have a contractionary impact on demand, the cyclically adjusted primary balance is adjusted to exclude those revenues. For more details on the euro area fiscal stance, see the article entitled "The euro area fiscal stance", *Economic Bulletin*, Issue 4, ECB, 2016.

deficit-debt adjustments that are only partly compensated by favourable (negative) interest rate-growth differentials.

Chart 25

Drivers of change in euro area government debt

(percentages of GDP, unless otherwise indicated)



Sources: ECB calculations and ECB staff macroeconomic projections for the euro area, March 2025.
Note: The data refer to the aggregate general government sector of all 20 euro area countries.

On 21 January 2025 the EU's Economics and Financial Affairs Council (ECOFIN Council) endorsed recommendations on the first set of national medium-term fiscal structural plans. Four euro area countries (Belgium, Germany, Lithuania and Austria) have not yet submitted their plans. With regard to excessive deficit procedures, the ECOFIN Council has adopted recommendations under Article 126(7) of the Treaty on the Functioning of the European Union (TFEU) which specify the pathways and deadlines for correcting excessive deficits.[18] Italy and Hungary have been asked to bring their government deficits to below 3% of GDP by 2026, Belgium, Malta and Slovakia by 2027, Poland by 2028, France by 2029 and Romania by 2030. The recommendations set a deadline of 30 April 2025 for each of the countries to take effective action and present the necessary measures to put an end to the excessive deficit situations.

On 4 March the European Commission announced the ReArm Europe plan, outlining a set of five proposals on how available financial levers can be used to help Member States to quickly and significantly increase expenditures in defence capabilities. The first proposal entails unleashing public funding for defence at the national level by activating the national escape clause of the Stability and Growth Pact, provided that fiscal sustainability is maintained. This would allow Member States to raise their expenditure on defence, by 1.5% of GDP for example, without triggering an excessive deficit procedure, and thereby to act swiftly, as needed in the current situation. According to the Commission's assessment, this would amount to additional spending of up to €650 billion over the period 2025-28. The second proposal is for a new instrument that would provide €150 billion of loans

[18] Treaty on the Functioning of the European Union (OJ C, 202, 7 6 2016, p. 13).

to Member States for defence investment to enhance pan-European defence capabilities. The third proposal is based on using the EU budget to direct funds towards defence-related investments. Finally, the last two areas of action aim at mobilising private capital by accelerating the Savings and Investment Union and through the European Investment Bank.

Boxes

1 Business investment: why is the euro area lagging behind the United States?

Prepared by Malin Andersson, Valerie Jarvis and Michel Soudan

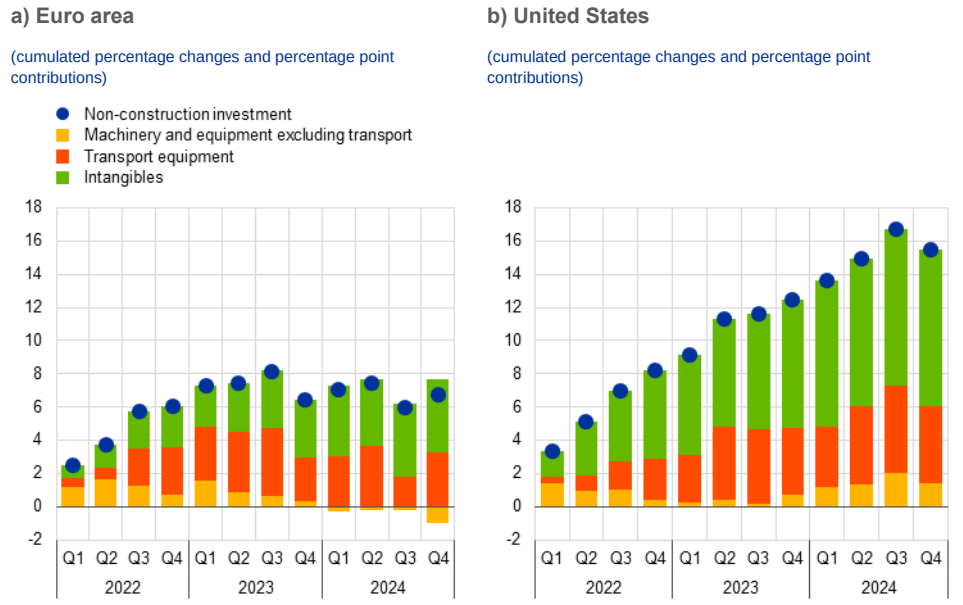
Business investment in the euro area has grown less dynamically – and its outlook remains less favourable – than in the United States.[1] In the post-pandemic period between the fourth quarter of 2021 and the fourth quarter of 2024, business investment grew by 15.4% in the United States – more than double the 6.8% cumulative increase over this period in the euro area (Chart A).[2] Across components, intangible investment – i.e. intellectual property products (IPP) – has contributed most to the differential, with euro area growth in intangibles (excluding volatile Irish IPP) only half that in the United States. In terms of the other main asset classes, transport equipment contributed only slightly less to investment in the euro area than in the United States. At the same time machinery and equipment investment declined in the euro area, while remaining slightly positive in the United States.

1 For earlier analysis, see the box entitled "The post-pandemic recovery – why is the euro area growing more slowly than the United States?", *Economic Bulletin*, Issue 4, ECB, 2024.

2 The detailed national accounts data became available shortly after the cut-off date for this issue of the Economic Bulletin. Business investment is proxied by whole-economy non-construction investment in the euro area (excluding the volatile Irish IPP) and private fixed non-residential non-structural investment in the United States. For the euro area, see "Intangible assets of multinational enterprises in Ireland and their impact on euro area activity", *Occasional Paper Series*, No 350, ECB, 2024.

Chart A

Business investment and breakdown by asset



Sources: Eurostat, US Bureau of Economic Analysis, and ECB staff calculations.
Notes: Euro area non-construction investment and intangibles exclude intellectual property products (IPP) in Ireland. Non-construction investment in the United States refers to private fixed non-residential investment excluding structures. Intangibles refers to IPP. The latest observations are for the fourth quarter of 2024.

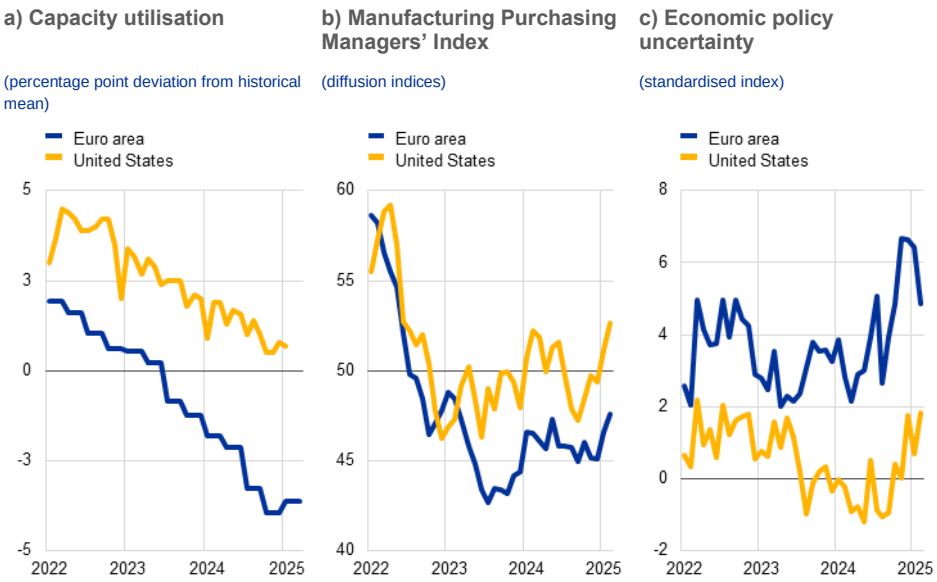
Weaker tangible investment in the euro area can be partly explained by lower demand. Since early 2022 domestic demand for goods – which is a key driver of tangible investment in machinery and equipment, including transport – has been considerably more subdued in the euro area. This has resulted in capacity utilisation falling markedly below its historical average since mid-2023 (Chart B, panel a). Stronger aggregate demand in the United States, supported by a swift deployment of investment-boosting policy measures, kept manufacturing capacity utilisation above its pre-pandemic average. In addition, sharper rises in energy prices in the euro area, coupled with heightened geopolitical uncertainty following Russia's invasion of Ukraine, are likely to have dampened euro area demand for investment to a greater degree than in the United States, given the EU's greater reliance on Russian gas as an energy source and proximity to the war zone. They would have had an impact both directly, through higher production costs and lower confidence, and indirectly, through competitiveness losses in export markets.[3] Confidence in the euro area has shown a particularly strong and extended decline since 2022 (Chart B, panel b). The fact that economic policy uncertainty was higher in the euro area than in the United States over this period also acted as a stronger drag on demand for investment in the euro area compared with the United States (Chart B, panel c).[4]

[3] See the article entitled "Past and future challenges for the external competitiveness of the euro area", *Economic Bulletin,* Issue 6, ECB, 2024.

[4] See, for instance, the box entitled "What are the economic signals from uncertainty measures?", *Economic Bulletin*, Issue 8, ECB, 2024 and Chen et al., "Economic policy uncertainty and firm investment: evidence from the U.S. market" *Applied Economics*, Vol. 51, No 31, 2019, pp. 3423-3435, for an assessment the adverse impact of policy uncertainty on investment.

Chart B

Capacity utilisation, manufacturing Purchasing Managers' Index and economic policy uncertainty



Sources: The European Commission's Directorate General for Economic and Financial Affairs; S&P Global Market Intelligence; Baker et al. "Measuring Economic Policy Uncertainty", *The Quarterly Journal of Economics*, Vol. 131, No 4, November 2016, pp. 1593-1636; and ECB staff calculations.
Notes: Capacity utilisation is shown as the deviation from the 1999-2019 mean and euro area economic policy uncertainty is the GDP-weighted average for the four largest euro area economies (standardised over 1999-2019). The latest observations are for January 2025 for capacity utilisation in the United States, for February 2025 for both the Purchasing Managers' Index (PMI) and economic policy uncertainty, and for the first quarter of 2025 for capacity utilisation in the euro area.

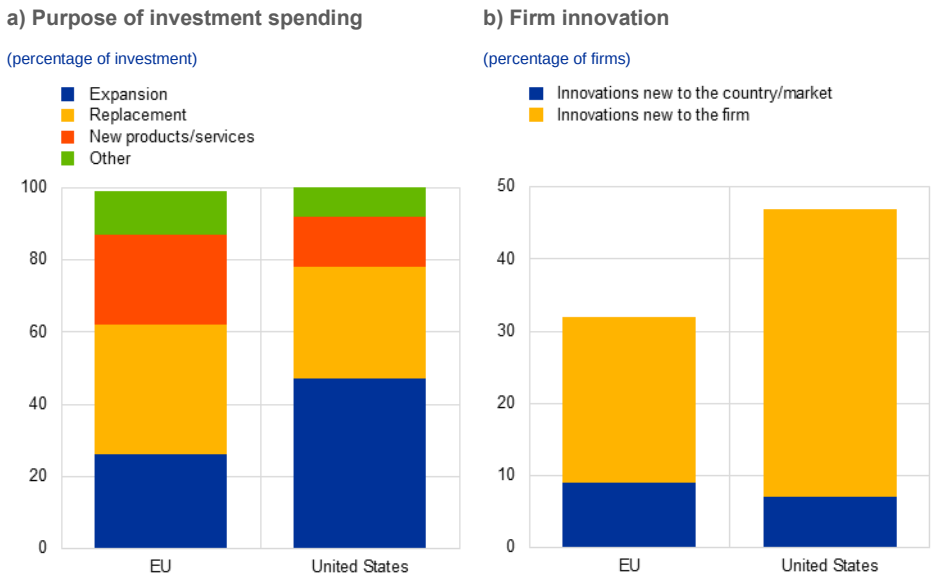
There is also a significant intangible investment differential, related to innovation and research and development (R&D) spending, contributing to a widening productivity gap between the EU and the United States. According to the European Investment Bank's Investment Survey 2024, which provides comparative data from a large survey of firms in the United States and the EU, expansion of capacity has been a greater driver of investment in the United States than in the EU. By contrast in the EU the primary purpose of investment has been replacement (Chart C, panel a).[5] US firms' investment also tends to focus more on innovation than that of firms in the EU (Chart C, panel b). The 2024 EU Industrial R&D Scoreboard shows that euro area R&D investment is focused on mature industries such as cars and equipment, while in the United States it is increasingly concentrated in ICT-based activities, including data centres and artificial intelligence-related facilities. Intangible investment is key for longer-term growth and is likely contributing to the rising productivity gap between the two economies.[6]

5 The euro area breakdown is not yet available.

6 See McKinsey & Company, "Getting tangible about intangibles: The future of growth and productivity?", 2021; the box entitled "Labour productivity growth in the euro area and the United States: short and long-term developments", *Economic Bulletin*, Issue 6, ECB, 2024; and Herzog, Stein and Horn, "The Productivity Puzzle: It's the Lack of Investment, Stupid!", *Intereconomics*, No 2, 2018.

Chart C

Investment and innovation



Source: European Investment Bank (EIB) Investment Survey 2024.
Notes: In panel a), the figures may not add up to 100 due to rounding. In panel b), the data are based on replies to two questions on the proportion of total investment devoted to developing or introducing new products, processes or services, with a breakdown into innovations new to the company, to the country or to the global market. The latest observations are for 2024.

Firms point to higher obstacles to investment in the EU than in the United States. In the EU the main obstacles reported by corporates relate to a lack of skilled staff, high energy costs, elevated uncertainty and onerous regulation, according to the EIB Investment Survey 2024 (Chart D). Both energy costs and uncertainty appear to be somewhat more important in the EU than in the United States, in part reflecting the greater exposure of EU firms to the impact of Russia's war in Ukraine. While uncertainty could be seen as a temporary factor, large and long-standing differences in energy costs, regulations in product and labour markets, and aspects related to productivity differentials are likely to be more persistent.[7] Heavier regulation is also contributing to a less dynamic corporate landscape in the euro area, with fewer firm entries and exits, and typically weaker firm growth. This is likely to hold back investment, notably in intangibles.[8]

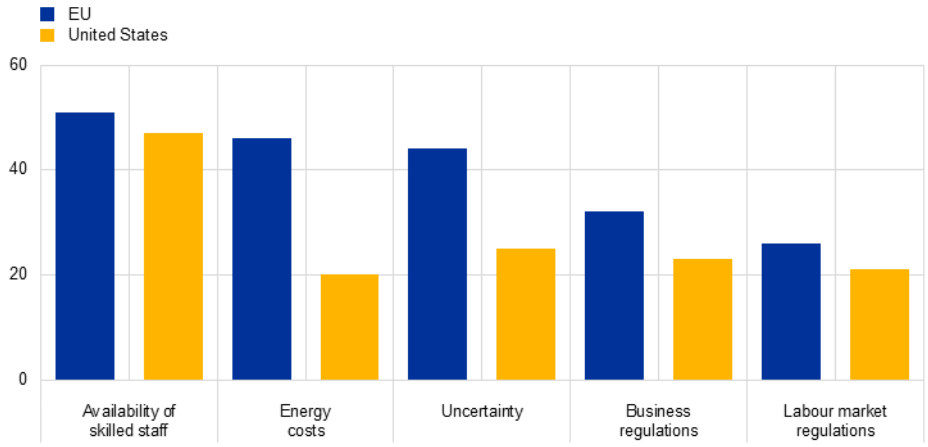
7 See the article entitled "European competitiveness: the role of institutions and the case for structural reforms", *Economic Bulletin*, Issue 1, ECB, 2025.

8 See Thum-Thysen et al., "Investment dynamics in Europe: Distinct drivers and barriers for investing in intangible versus tangible assets?", Vol. 51, December 2019, pp. 77-88.

Chart D

Perceived major obstacles to investment

(percentage point contributions)



Source: EIB Investment Survey 2024.
Note: The latest observations are for 2024.

A faster implementation of investment-boosting policies also helped shape the swifter and stronger rebound in US investment. While the Next Generation EU (NGEU) funds, amounting to €750 billion, are expected to boost EU business investment in digitalisation and the green transition, their deployment has been very gradual and delayed. The size of the associated fiscal multipliers is also uncertain.[9] In the United States, the Inflation Reduction Act (IRA) combined with the CHIPS and Science Act amount to about USD 835 billion of spending on clean energy and chip manufacturing. This is slightly larger than the NGEU programme in the EU in absolute terms, but represents a smaller share of GDP. These programmes have already given a major boost to US private non-residential investment in structures, which is not included in Chart A. The impact is particularly visible in manufacturing investment – especially investment in factories, which increased by more than in the EU.[10] The faster deployment of IRA funding compared with the NGEU may in part reflect the greater maturity of the single market in the United States. In addition, the IRA focuses on federal direct tax credits to firms and households, while in the EU tax policies remain national.[11]

Recent EU policy initiatives to improve the investment environment in the euro area should help to close the gap with the United States. The European Commission's newly-announced Competitiveness Compass is a welcome step forward. Notably, the Compass aims to boost competitiveness and innovation

9 See the article entitled "Four years into the Next Generation EU programme: an updated preliminary evaluation of its economic impact", *Economic Bulletin*, Issue 8, ECB, 2024 on the economic impact and "The real effects of Next Generation EU", *Recovery Watch*, 2024, on the fiscal multipliers.

10 The IRA spurred investment in factories and other production facilities, notably the construction of data centres – a development which has been much less pronounced in the EU except in Ireland. As President Trump halted all IRA-related disbursements as of 20 January 2025, its potential long-term benefits are in doubt. Investment in non-residential manufacturing structures in the United States grew by 112% between the end of 2021 and the third quarter of 2024, although it only amounted to 0.5% of GDP and less than 4% of private non-residential fixed investment.

11 See Cahen et al., "Is Next Generation EU a game changer? A Comparison with IRA and ways to respond", *Eurofi Regulatory Update*, February 2024.

through the following measures: simplifying and reducing the regulatory burden, removing barriers to fully benefiting from the Single Market, better coordinating policies at EU and national level, and improving access to – and affordability of – financing. It is thus vital to advance the capital markets union agenda, particularly as more sophisticated venture capital markets would make it easier for innovative EU firms to access risk capital and to grow. The swift implementation of these measures is of the utmost importance.

2 Have euro area exports missed the tech train?

Prepared by Mattia Banin, Virginia Di Nino, Laura Lebastard, Noémie Lecourt and Stefan Schaefer

Euro area export market shares have declined since the pandemic. The share of euro area firms in global goods exports has fallen by about 2 percentage points since 2019.[1] The weakness of euro area export growth is a sign of lower productivity gains of European firms compared to other major economies. While there are a number of factors behind the euro area's competitiveness challenges, the Draghi report pointed to Europe's lack of competitiveness in high-tech sectors as one key factor in the euro area's subdued economic performance.[2] This box assesses the sectoral composition of the euro area's recent performance in global markets by categorising exports according to the intensity of their technological content, as reflected in the level of research and development expenditure relative to value added. This helps in identifying the sectoral drivers of the losses in market share. Specifically, the box examines whether aggregate euro area export market share losses reflect a limited presence in fast-growing high-tech sectors or a deteriorating performance in established sectors.

Understanding the role of the sectoral composition of export dynamics is important when analysing the impact of policy tools that have been deployed to boost production in particular sectors in recent years. Since 2019 both the United States and China have introduced new policies, including with a view to strengthening their export market dynamics in specific sectors. In the United States, the Inflation Reduction Act and the CHIPS and Science Act are aimed at increasing investment in high-tech sectors and onshoring production back to the United States. In China, government policies aimed at developing national champions employ a long-standing strategy of boosting technological advancement through substantial subsidies for high-tech industries.[3] These subsidies have resulted in overcapacities, enabling Chinese producers to adopt aggressive pricing strategies in foreign markets. This is aligned with China's concept of "new productive forces", which prioritises innovation and technological development as key drivers of economic growth, with a focus on sectors such as electric vehicles, microchip technology, artificial intelligence and new materials.[4] With authorities in other major economies using such tools to boost both investment and production in particular sectors, it is important to understand how sectoral dynamics are shaping the euro area's overall export performance.

1 See the article entitled "Past and future challenges for the external competitiveness of the euro area", *Economic Bulletin*, Issue 6, ECB, 2024.

2 See Draghi, M., "The future of European competitiveness", European Commission, September 2024.

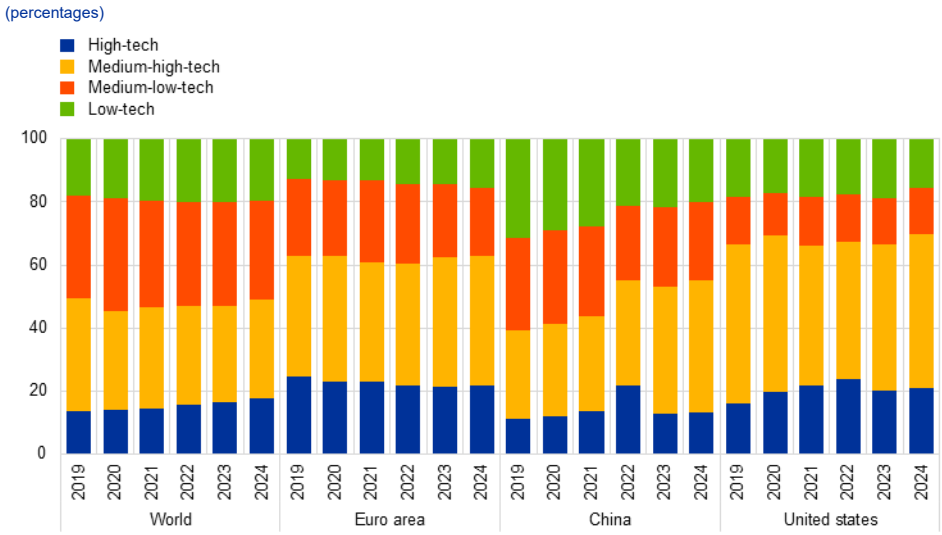
3 For more information, see Institute for Security & Development Policy, "Made in China 2025", *Backgrounder*, June 2018.

4 See the article entitled "The evolution of China's growth model: challenges and long-term growth prospects", *Economic Bulletin*, Issue 5, ECB, 2024.

Eurostat divides manufacturing sectors into four categories according to the technological content of the goods produced. High-tech sectors include pharmaceuticals, telecommunications equipment and aerospace, while medium-high-tech sectors include motor vehicles, chemicals and electrical equipment.[5] Medium-high-tech represents the largest global export market (32% in 2024), well ahead of high-tech (18% in 2024) (Chart A). However, while medium-high-tech sectors have been shrinking since 2019, high-tech sectors have grown by 6 percentage points.

Chart A

Manufacturing exports by technology intensity



Sources: Trade Data Monitor (TDM), Eurostat and ECB staff calculations.
Notes: Exports are in nominal value. 2024 data are incomplete. The latest observations are for November 2024.

The technological composition of euro area, Chinese and US exports has converged in recent years. The sectoral composition of euro area exports has been relatively stable since 2019, with medium-high-tech sectors making up 41% of total manufacturing exports in 2024 (Chart A). In the same period, China's medium-high-tech exports increased significantly from 28% to 42%. This shift indicates that China's exports have moved up the value chain, making its export structure increasingly similar to that of the euro area.[6] Meanwhile, the United States has seen the most significant growth in high-tech exports.

A shift-share analysis highlights that the euro area has lost ground in all manufacturing export sectors, although market share losses in medium-high-tech sectors have been particularly significant. Chart B decomposes developments in aggregate export market shares by sector. For each economy, it distinguishes between two aspects of sector contributions: (i) a "performance" component, which measures changes in the economy's market share for each sector

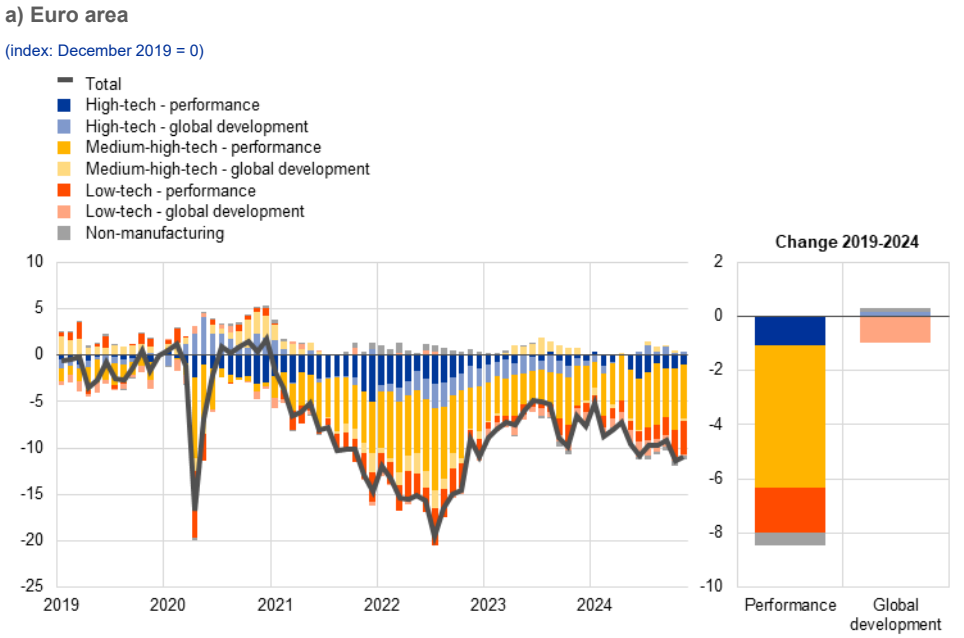
5 For a detailed description of the sectors within the "high-tech", "medium-high-tech", "medium-low-tech" and "low-tech" categories, see "High-tech classification of manufacturing industries" on Eurostat's website.

6 See Al-Haschimi, A., Emter, L., Gunnella, V., Ordoñez Martínez, I., Schuler, T. and Spital, T., "Why competition with China is getting tougher than ever", *The ECB Blog*, ECB, 3 September 2024.

(the ratio of the economy's export growth to global import growth in each sector); and (ii) a "global development" component, which measures the global growth of each sector (measured as the ratio of global imports in the sector to total global imports). In other words, this analysis identifies whether changes in an economy's aggregate share of global export markets reflect gains in market share within particular sectors or the overall global growth of those sectors. While the euro area has lost export market shares in all segments, medium-high-tech sectors have been the main drivers of this trend, being responsible for 55% of the cumulated losses since 2019 (Chart B, panel a). The performance of high-tech sectors has also been relatively weak. In spite of benefiting from strong global demand in high-tech sectors, the euro area has still lost ground relative to other major economies.

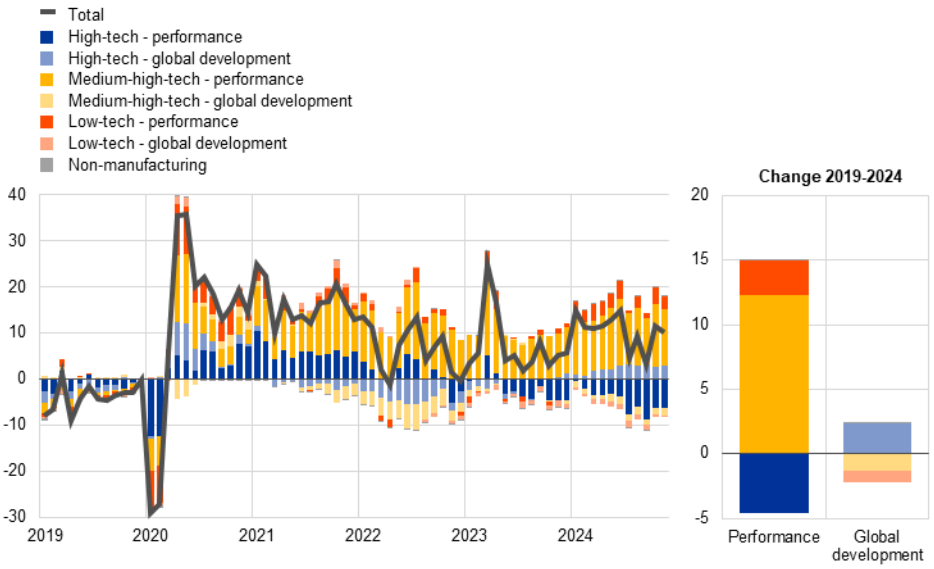
Chart B

Sector contributions to developments in export market shares



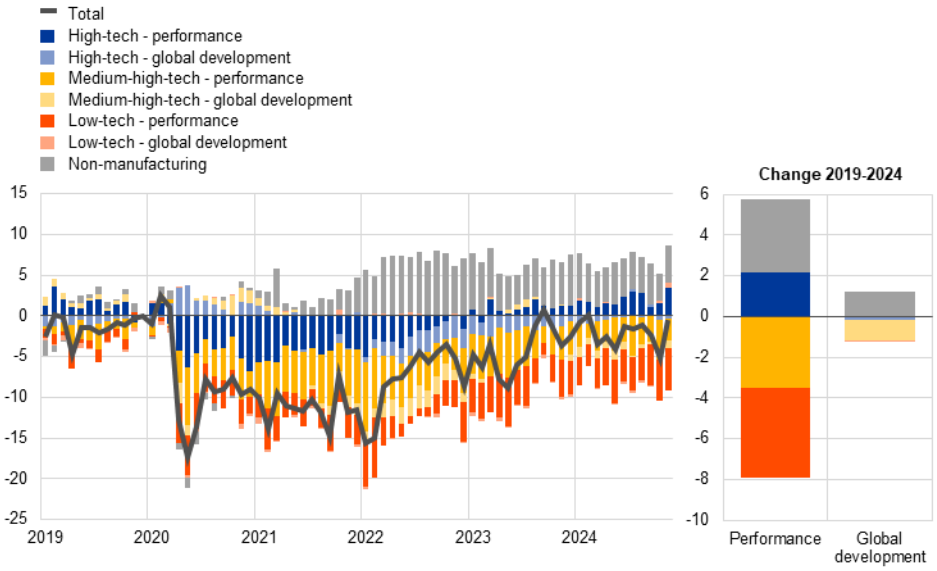
b) China

(index: December 2019 = 0)



c) United States

(index: December 2019 = 0)



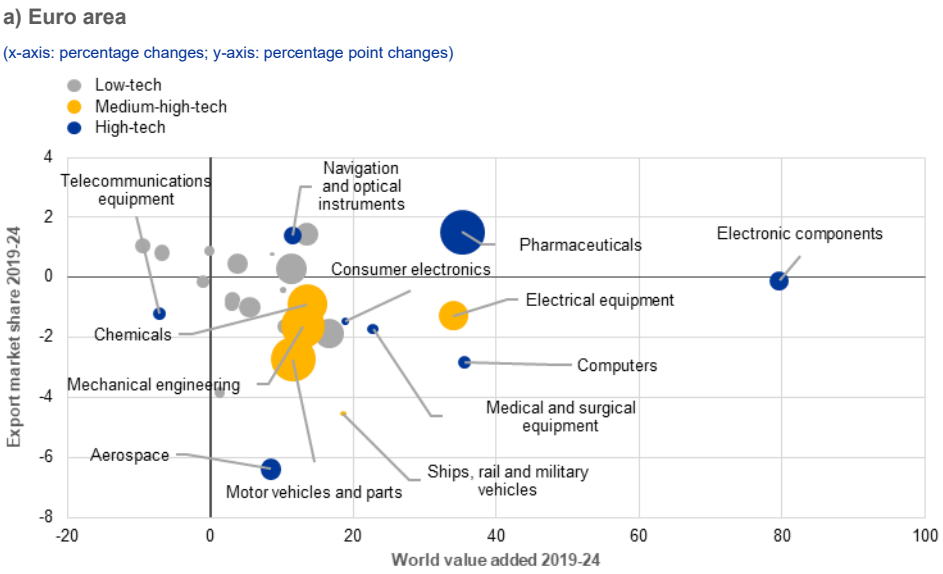
Sources: TDM, CPB Netherlands Bureau for Economic Policy Analysis, Eurostat and ECB staff calculations.
Notes: Seasonally adjusted data. Export market shares are in value terms and for goods only. CPB data are used to calculate aggregate market shares. TDM data are used to calculate sector weights. The latest observations are for November 2024.

China has gained significant export market shares in medium-high-tech sectors, while the United States has expanded its share in high-tech sectors. China's export performance seems to be almost the inverse of that of the euro area, with strong gains in market share primarily in medium-high-tech sectors (Chart B, panel b). Meanwhile, the United States achieved an almost complete recovery of its export market shares in 2024 compared to 2019, outperforming others in high-tech sectors and non-manufacturing sectors – mainly oil and gas extraction (Chart B, panel c).

The export performance of the euro area in high-tech sectors is mixed, with notable strengths in pharmaceuticals but significant weaknesses in electronics and computers. On aggregate, high-tech industries have experienced the strongest growth in global value added since 2019 (Chart C). The euro area is a global leader in the pharmaceutical sector, with 36% of global exports, and continued to gain market shares.[7] "Navigation and optical instruments" is another high-tech sector in which the euro area performed well. However, exports in other high-tech sectors were weak, with market shares steadily declining. In the fastest-growing sectors, the euro area lost ground to other major economies, e.g. to China in electronics and to the United States in computers.

Chart C

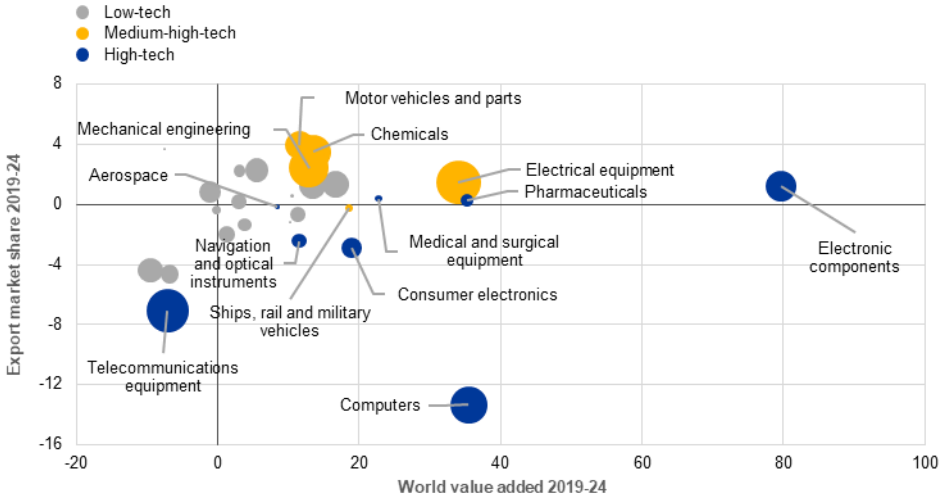
Market share growth and world value added growth by sector



[7] US firms account for 42% of the value added in Irish pharmaceutical exports (which represented 17% of euro area pharmaceutical exports in 2024). Half of this value added is exported back to the United States.

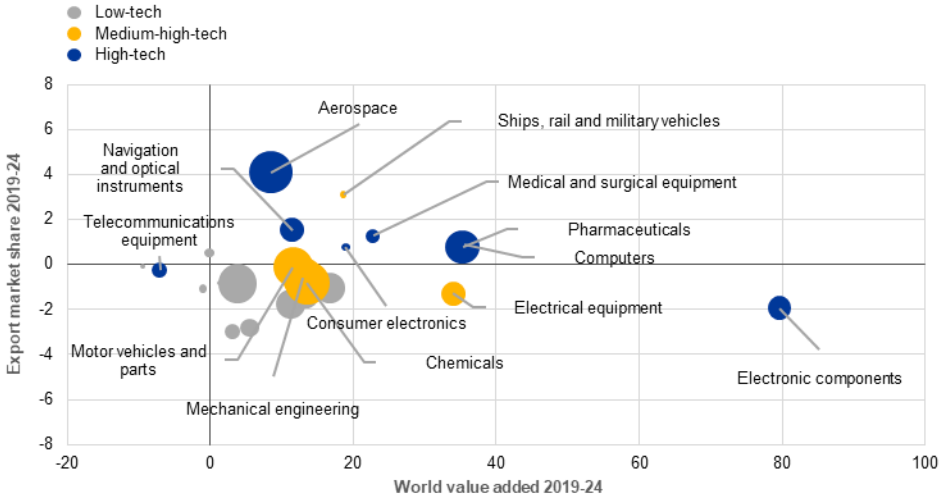
b) China

(x-axis: percentage changes; y-axis: percentage point changes)



c) United States

(x-axis: percentage changes; y-axis: percentage point changes)



Sources: TDM, Oxford Economics, Eurostat and ECB staff calculations.
Notes: Sector classification follows NACE Rev. 2. The following high-tech and medium-high-tech sectors are included (NACE Rev. 2 divisions/groups in parenthesis): chemicals (20), pharmaceuticals (21), electronic components (26.1), computers (26.2), telecommunications equipment (26.3), consumer electronics (26.4), medical and surgical equipment (26.6), navigation and optical instruments (26.5, 26.7, 26.8), electrical equipment (27), mechanical engineering (28), motor vehicles and parts (29), aerospace (30.3), ships, rail and military vehicles (30 minus 30.3). Technology intensity of sectors follows Eurostat's "High-tech classification of manufacturing industries". Bubble sizes reflect the share in the economy's total nominal exports in 2024. Growth in world value added for the fourth quarter of 2024 is forecast. 2024 data are incomplete for exports and export market shares. The latest observations are for November 2024.

The euro area has lost the most ground to China in medium-high-tech sectors. For the euro area, medium-high-tech exports constitute a large portion of total exports, far exceeding those for high-tech industries. The United States has also lost market shares in this segment, albeit to a smaller extent. China is gaining market shares at the expense of market leaders such as the euro area, especially in the field of electric vehicles, which is strongly benefiting from China's industrial policies.

3 The increasing energy demand of artificial intelligence and its impact on commodity prices

Prepared by Vlad Burian and Arthur Stalla-Bourdillon

The adoption of artificial intelligence (AI) models has surged across the globe, requiring substantial computing power. AI-related energy consumption in data centres is currently limited, estimated at around 20 terawatt-hours (TWh) or 0.02% of global energy consumption.[1] However, AI models are increasingly being used to develop intelligent applications, ranging from AI assistants to self-driving vehicles. Generative AI models, particularly those used for creating text and image-based content, require large amounts of power in terms of both training and operation. For example, a single query on ChatGPT3 uses roughly ten times more energy than a typical Google search.[2] With the development of newer and more computationally intensive large language models (LLMs), the related energy demand is expected to grow further.[3]

There is already a clear link between increased use of AI and energy consumption. Energy consumption among the "Magnificent Seven" – the seven largest US tech companies, including Alphabet and Microsoft – and data centre firms has grown much faster than that of S&P 500 companies, a development potentially linked to the rising use of AI. Changes in annual energy consumption in 2023 reveal that, while the median energy consumption of S&P 500 companies remained flat, it rose significantly for the Magnificent Seven and data centre firms, by 19% and 7% respectively.

Looking ahead, the surge in AI-related energy demand is projected to persist, with an uneven distribution across countries. Although there is much uncertainty about future AI adoption, the International Energy Agency (IEA) projects that data centres, both AI-driven and non-AI-driven, could use 80% more energy in 2026 than in 2022, even taking into account efficiency gains (Chart A).[4] More specifically, the electricity consumption of AI-driven data centres is expected to rise by 90 TWh, contributing 20 percentage points to the overall growth in data centre energy consumption. This is equivalent to around 4% of the EU's current electricity consumption. According to the IEA, data centre energy consumption, covering both AI and non-AI applications, is projected to grow most rapidly in China and the United States, rising by 70 TWh and 60 TWh respectively.

1 See "World Energy Outlook 2023", International Energy Agency, October 2023.

2 De Vries, A., "The growing energy footprint of artificial intelligence", *Joule*, Vol. *7,* No 10, October 2023, pp. 2191-2194.

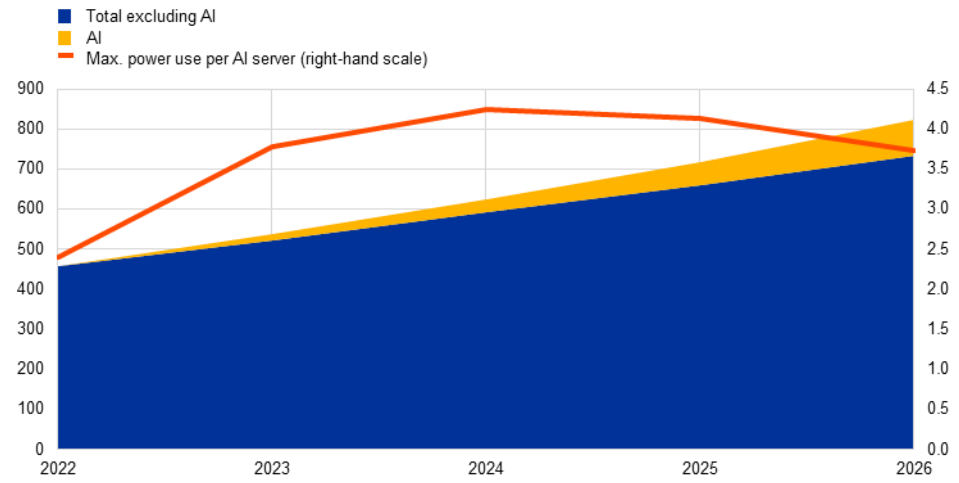
3 AI-related energy demand is expected to increase even though the licence fees for some LLMs are charged per query, which could result in lower usage relative to free-of-charge models.

4 See "Electricity 2024", International Energy Agency, January 2024. The IEA expects not only AI, but also cloud computing and cryptocurrencies to be major drivers of data centre electricity consumption.

Chart A

Projected growth in the electricity demand of data centres

(left-hand scale: terawatt-hours; right-hand scale: kilowatts)



Sources: IEA, Goldman Sachs and ECB staff calculations.
Notes: AI electricity demand between 2022 and 2026 is linearly interpolated with values for 2026 taken from IEA forecasts. The orange line shows the projected maximum power use of an AI server, highlighting expected efficiency gains.

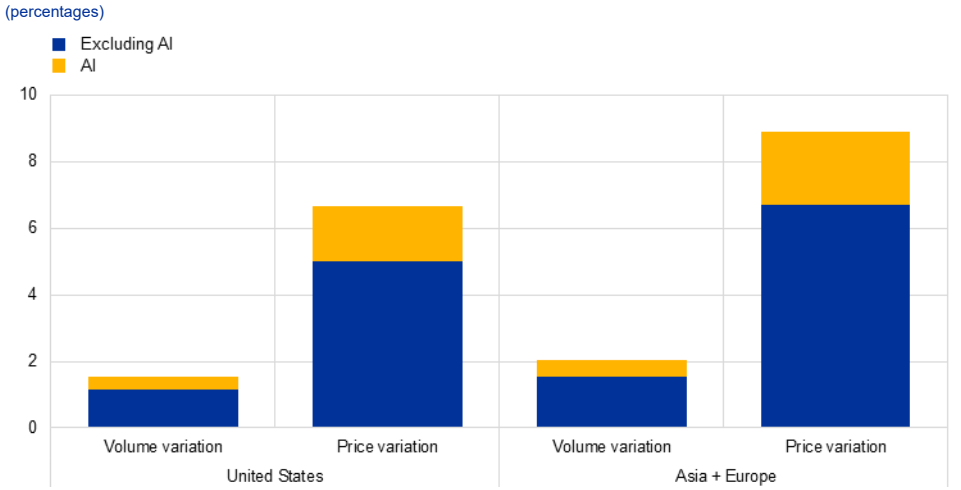
The rise in AI-related energy demand is expected to be met by natural gas power plants or renewables. Regulatory efforts to reduce carbon footprints are driving companies to prioritise carbon-neutral energy options, particularly renewables. Tech giants are also exploring alternatives such as new nuclear power plants, but neither solutions involving partnerships with new large facilities nor those involving acquisition of dedicated small modular reactors are likely to be up and running before 2026. In the event of electricity shortfalls, natural gas is expected to supplement renewables, as it is less polluting than coal. Two polar and extreme scenarios could therefore be considered: one in which all energy demand is met by natural gas, and another in which it is covered entirely by renewables.

Even under the first scenario assuming that the electricity demand of AI-driven data centres is fully met with natural gas, the impact on gas prices is limited. By scaling the IEA's estimated data centre energy demand to the size of the US gas market and the size of the Asian and European gas markets combined, and then applying elasticities from the literature, it is found that gas prices could rise by around 9% in Asia and Europe, and by 7% in the United States (Chart B).[5] Moreover, AI-driven data centres would account for around 2 percentage points of the increase in both the Asian-European market and the US market. AI adoption is therefore expected to put only limited upward pressure on gas prices. This is because the AI-related energy demand shock – even under this extreme scenario – is minimal relative to the overall size of the US and Asian-European gas markets, despite being large in absolute terms.

5 The elasticities used are taken from Albrizio, S. et al., "Sectoral Shocks and the Role of Market Integration: The Case of Natural Gas", *AEA Papers and Proceedings*, Vol. 113, May 2023, pp. 43-46.

Chart B

Estimated gas demand and gas price variation when all data centre energy demand is met with natural gas by 2026



Sources: IEA and ECB staff calculations.
Notes: The figures are based on IEA projections for future data centre energy demand, assuming that all additional energy needs during the period from 2022 to 2026 are met by gas power plants. Data centre energy demand is converted to gas demand using a conversion rate of 45% (see "More than 60% of energy used for electricity generation is lost in conversion", *Today in Energy*, U.S. Energy Information Administration, 21 July 2020). AI-related energy demand for each region is estimated by assuming a constant share of AI-related electricity consumption in the total data centre electricity consumption across both regions.

Under the second scenario, in which the additional energy demand is covered by renewables, demand for critical minerals increases, but their prices are unlikely to be affected significantly as a result. Critical materials, such as lithium and nickel, are essential for wind farms and solar panels. They are already in high demand due to the energy transition, and their mining is highly concentrated in specific countries, which makes them particularly vulnerable to supply chain disruptions and geopolitical tensions.[6] However, like natural gas, and unlike electricity, these minerals are relatively easy to transport across regions. As a result, the AI-related growth in demand is expected to be modest relative to the overall size of the market, so that upward price pressures specifically attributable to AI will be contained.

The surge in AI-related electricity demand could, however, create price pressures in national electricity markets. Owing to limited interconnection capacities and energy loss during transmission, electricity markets consist of multiple submarkets that are relatively isolated. As a result, countries such as Ireland, which are big players in the data centre sector, may find it particularly challenging to meet the growing AI-related demand locally. The overall potential impact on national electricity markets is more difficult to estimate, however, as it will depend on the concentration of AI-driven data centres in each country, the specific characteristics of their markets and the regulatory requirements for data centres to contribute to the power supply.

6 Adolfsen, J.F., Kedan, D. and Lappe, M-S., "The geopolitics of green minerals", *The ECB Blog*, ECB, 10 July 2024.

4 Using corporate earnings calls to forecast euro area labour demand

Prepared by Claudia Foroni and Christofer Schroeder

Evidence from earnings calls of euro area companies suggests that labour demand is continuing to decline. An earnings call is a conference call that takes place between the management of a publicly listed company and its investors, financial analysts and the press. Earnings calls offer a rich and timely source of economic data which are available at a high frequency.[1]

In this box, we apply textual analysis to a large database of transcripts of corporate earnings calls to construct an indicator of euro area labour demand. We then use our indicator to produce nowcasts and forecasts of the euro area job vacancy rate – a traditional measure of labour demand and a key labour market metric.[2] The database of earnings calls we access contains information on the exact date and time of each earnings call and is updated every two weeks. This allows us to extract information from earnings calls well in advance of official data releases, including those of the job vacancy rate, which are only available with a significant lag.[3]

Our measure of labour demand from earnings calls closely tracks the job vacancy rate (Chart A). To construct our indicator, we first restrict our sample of earnings calls to those by companies which were headquartered in the euro area at the time the earnings call took place. This leaves us with a sample of roughly 600 calls per quarter. Next, we add up the number of sentences from earnings calls containing at least one word from a list of keywords that reference the pressures firms face from unmet labour demand following Dueholm, Kalyani and Ozkan.[4] Although it is somewhat more volatile, our indicator closely tracks the euro area job vacancy rate, with a correlation coefficient of around 0.9. In particular, it captures the steady increase in the job vacancy rate between 2016 and 2020 and its sharp rise in 2021. Both our indicator of labour demand and the job vacancy rate peaked in the first half of 2022 and have been trending downwards ever since, suggesting that labour demand is cooling.

1 For a further use of earnings calls to inform macroeconomic indicators, see the box entitled "Earnings calls: new evidence on corporate profits, investment and financing conditions", *Economic Bulletin*, Issue 4, ECB, 2023.

2 The job vacancy rate is defined as the number of job vacancies divided by the sum of the number of occupied posts and the number of job vacancies.

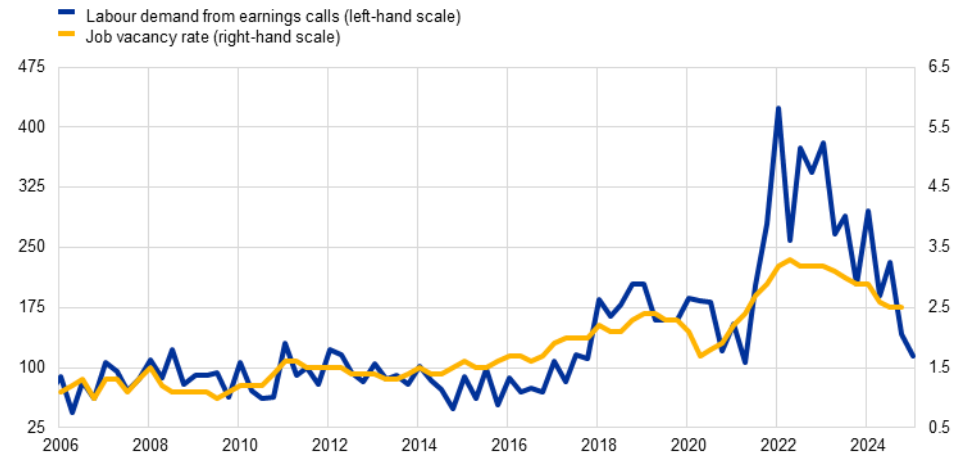
3 The flash estimate of the job vacancy rate in the euro area is typically released around one and a half months after the end of the quarter to which it refers, while the first release is published around three months after the end of the quarter.

4 See Dueholm, M., Kalyani, A. and Ozkan, S., "Can Earnings Calls Be Used to Gauge Labor Market Tightness?", *On the Economy Blog*, Federal Reserve Bank of St. Louis, 18 June 2024.

Chart A

Indicator of labour demand from earnings calls and the euro area job vacancy rate

(left-hand scale: number of sentences; right-hand scale: percentages)



Sources: Eurostat, NL Analytics and ECB staff calculations.
Notes: The blue line plots the indicator of labour demand derived from earnings calls as described in the text. The yellow line plots the job vacancy rate for the euro area. The latest observations are for the first quarter of 2025 for the indicator of labour demand from earnings calls and the fourth quarter of 2024 for the job vacancy rate.

Data obtained from recent earnings calls suggest that the job vacancy rate will continue to decline modestly (Chart B). To produce an early measure of the job vacancy rate ahead of official data releases, we employ a mixed data sampling (MIDAS) regression approach to generate nowcasts as well as forecasts up to two quarters ahead.[5] MIDAS regressions offer the key advantage of enabling us to predict a low-frequency variable (the job vacancy rate) using high-frequency data (our indicator of labour demand derived from earnings calls). To reduce the potential for model misspecification, we estimate a series of MIDAS regressions over several specifications, including different polynomial lag structures and restrictions on the model's parameters.[6] We then consider the range and mean forecast from the various specifications. These point to a sustained cooling in labour demand for the current and coming quarters. The job vacancy rate is projected to have hovered at around 2.5% in the first quarter of 2025 and to remain the same in the second quarter – 0.8 percentage points lower than its peak in the second quarter of 2022 but still above its pre-pandemic average of 1.9%. For the third quarter of 2025, our forecasts suggest a marginal decline towards 2.4% with risks broadly balanced, as the range of predicted outcomes is fairly equally distributed around the mean. The profile of our forecasts is broadly in line with projections of economic activity from the

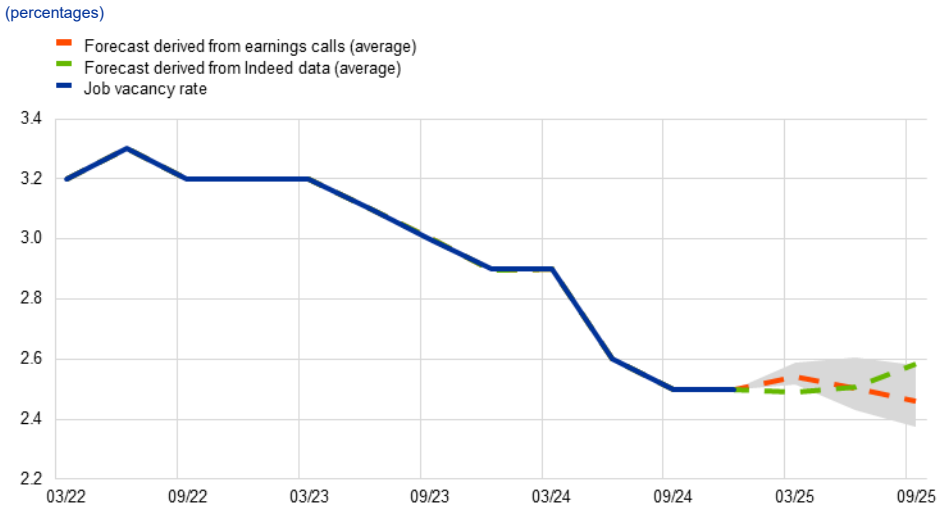
5 MIDAS regressions are often used to produce short-term forecasts, as the informational benefits extracted from timely, high-frequency data fade the further the projection horizon stretches into the future (see Foroni, F. and Marcellino, M., "A survey of econometric methods for mixed-frequency data", *Working Papers*, Norges Bank Research, No 06, 2013).

6 In particular, we estimate two different polynomial specifications. First, we include an exponential Almon lag polynomial (see Ghysels, E., Sinko, A. and Valkanov, R., "MIDAS Regressions: Further Results and New Directions", *Econometric Review*, Vol. 26, Issue 1, 2007, pp. 53-90). Second, we estimate an unrestricted MIDAS as set out in Foroni, C., Marcellino, M. and Schumacher, C., "Unrestricted mixed data sampling (MIDAS): MIDAS regressions with unrestricted lag polynomials", *Journal of the Royal Statistical Society Series A*, Vol. 178, No 1, pp. 57-82, January 2015. Furthermore, for each model specification we consider various windows for smoothing the indicator of labour demand from earnings calls using a moving average.

March 2025 ECB staff macroeconomic projections for the euro area, suggesting lower momentum in growth in the first half of 2025.

Chart B

Forecasting the euro area job vacancy rate



Sources: Eurostat, NL Analytics, Indeed and ECB calculations.
Notes: The solid blue line plots the euro area job vacancy rate up to the fourth quarter of 2024. The grey area indicates the min-max range of forecasts obtained with several MIDAS and unrestricted MIDAS specifications and different variants of the indicator of labour demand from earnings calls. The red dashed line plots the average forecast. The green dashed line plots the average forecast of the job vacancy rate using data on job postings from Indeed in our MIDAS regression forecasting framework. The latest observations are for January 2025 for the underlying indicators of labour demand derived from earnings calls and Indeed job postings. The forecasts cover the period up to the third quarter of 2025.

The short-term forecasts of the job vacancy rate using earnings calls are broadly in line with those derived from alternative indicators of labour demand. Data on vacancies from the online job portal Indeed are another novel and useful source of information on the euro area labour market. Both the number of open vacancies listed on the site and the number of new vacancies posted can help gauge labour demand. As with our indicator of labour demand derived from earnings calls, data from Indeed are timely and available at a high frequency, albeit over a much shorter time horizon.[7] The stock of job vacancies listed on Indeed has steadily declined since late 2023. By the end of 2024, it was around 10% lower than at the start of the year. At the same time, the flow of new job vacancies, considered a more responsive measure of labour demand, has also trended downwards, also indicating a moderation of labour demand. Incorporating these data into our MIDAS regression approach produces forecasts of the euro area job vacancy rate which are broadly aligned with those obtained using information from earnings calls, especially in the short term (Chart B). The forecasts point to a relatively stable job vacancy rate of around 2.5% until mid-2025, with a slight increase expected towards the end of the forecast period.[8]

7 The database on earnings calls that we access stretches back to the beginning of 2002, while the time series of job postings data from Indeed only start at the beginning of 2018.

8 The Indeed-based forecast points to a mild increase in the third quarter of 2025 but still within the range of the earnings calls-based forecasts in mid-2025. This might be driven by the higher seasonality of the Indeed data series or the shorter sample available, which helps to push the forecast towards its recent historical highs.

In summary, transcripts of corporate earnings calls provide timely and useful information on the euro area labour market. Our findings suggest that labour demand will moderate very gradually in the euro area over the coming quarters as the labour market continues to cool overall.

5 Euro area rent developments: insights from the CES

Prepared by Colm Bates, Christian Höynck, Omiros Kouvavas, Desislava Rusinova and Larissa Zimmermann

This box analyses recent developments in the euro area rental market using data from the ECB Consumer Expectations Survey (CES). Rents are a large component of household spending, but their analysis has been somewhat challenging as harmonised data on households' rent expenditure are not readily available across the euro area. The CES can contribute to filling this data gap as it collects timely information about household spending.[1] It also allows for the analysis of heterogeneity across the countries covered by the CES, as well as individual households.[2]

The share of renter households and the level of nominal rents vary considerably across countries. In the euro area, the average share of renters stands at around 28% and nominal rental expenditure amounts to around one-third of households' monthly income. However, the share of renters varies widely across countries, currently ranging from 15% in Italy to almost 50% in Germany and Austria (Chart A, panel a, left-hand side).[3] The share of renters is highest in the lowest income group (Chart A, panel a, right-hand side). A closer look at the level of nominal rents also reveals a great deal of cross-country and within-country dispersion (Chart A, panel b).[4] Rent dispersion is very high in Ireland, where there are large location-dependent differences (i.e. between urban and rural areas; as also visible in the stark difference between the mean and the median), while it is much lower in Greece and the Netherlands. Overall, the highest nominal rents are observed in Ireland, Austria and Belgium. When looking at rent expenditure relative to household income (Chart A, panel c), the country ranking changes: Ireland still has the highest average rent to income ratio, followed by Greece and Finland, while Germany has the lowest. Countries where renters make up a larger share of the population also tend to have more high-income households as renters, which pushes down the average rent to income ratio.

1 Housing-related expenditure, including rent, house maintenance and insurance (excluding mortgage payments) is collected quarterly as part of a broader question on household consumption in 12 expenditure categories.

2 As of 2022 the countries covered by the CES are Belgium, Germany, Ireland, Greece, Spain, France, Italy, Netherlands, Austria, Portugal and Finland.

3 This is broadly in line with findings from EU statistics on income and living conditions and the Eurosystem Household Finance and Consumption Survey in terms of both country ranking and percentages.

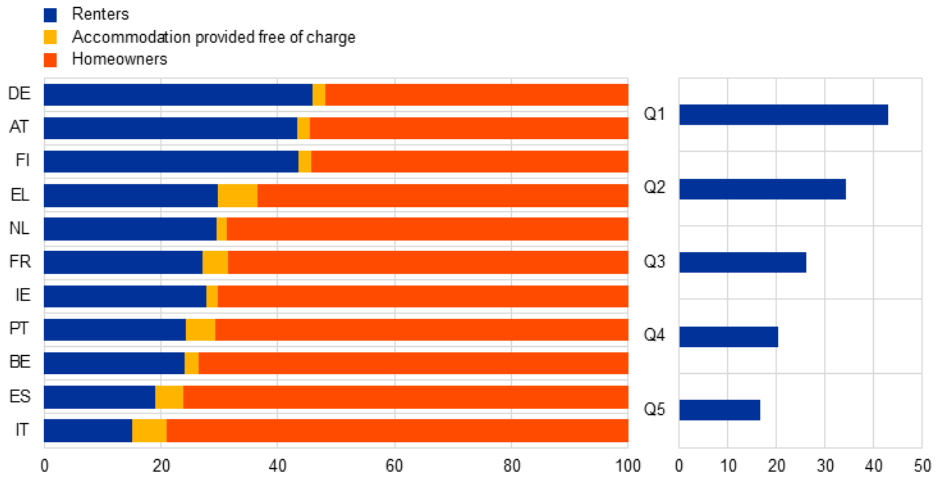
4 The main rent growth indicator presented in this box does not account for systematic differences in quality and age across countries. However, these are controlled for in the non-mover series that considers only non-movers shown in Chart C, panel a), where growth rates are calculated for the rent of the same individuals in the same dwelling, 12 months apart.

Chart A

Share of renters and rent levels by country

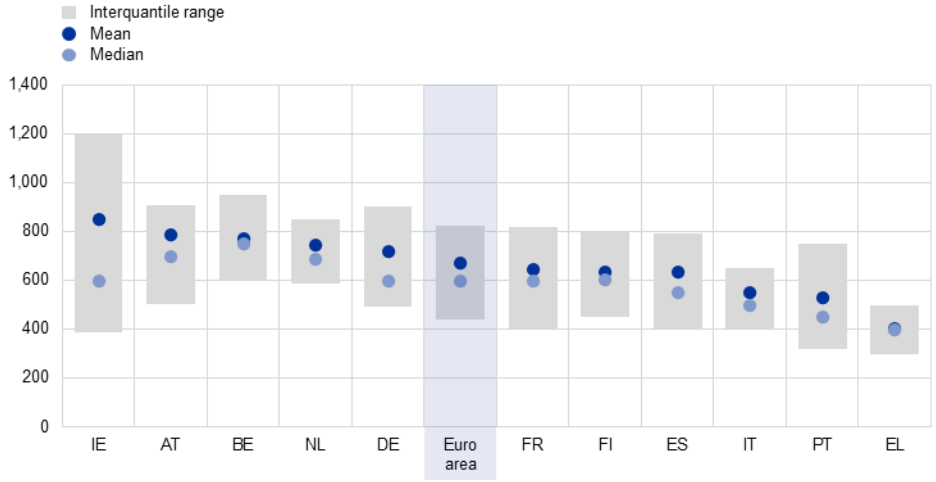
a) Share of renters by country and income quintile

(percentages of respondents)



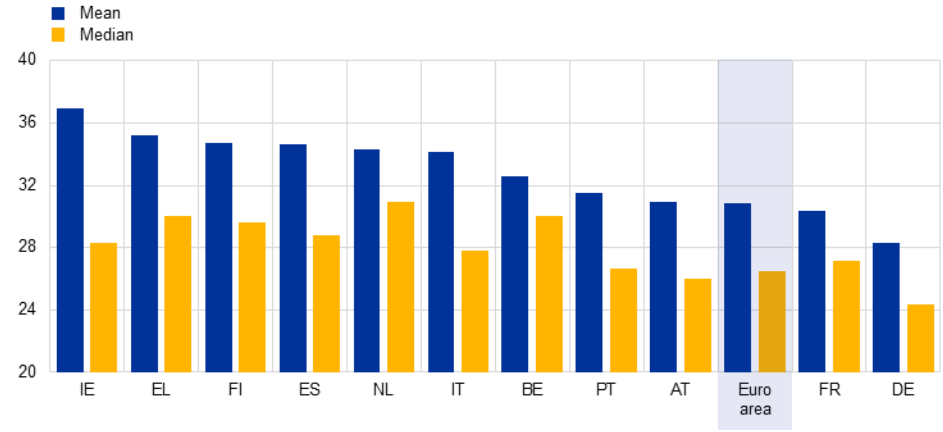
b) Rent levels and dispersion

(EUR per month)



c) Rent levels relative to monthly household income

(percentages of income)



Sources: ECB Consumer Expectations Survey (CES) and ECB calculations.
Notes: The calculations are based on weighted estimates. Panel a) comprises a full sample of respondents for 2024 and January 2025. Percentages of housing types are by country and income quintile (Q). Income quintiles are calculated for a full sample of respondents for all waves in 2024 and January 2025. Panel b) comprises a full sample of renters for January 2025 and panel c) comprises a full sample of renters from January 2024 to January 2025. The analysis of the rents does not control for dwelling size. Values are winsorised at the country level (at the second and 98th percentiles).

The CES-based rent expenditure growth indicator suggests that rent growth eased after peaking in the third quarter of 2023 but remained above 3% in the third quarter of 2024. The indicator is constructed as the weighted average of the individual household growth rates, once the data have been cleaned to ensure that they are not influenced by strong outliers or by composition effects from respondents entering or leaving the panel.[5] The average year-on-year rent growth rate in the euro area increased from the beginning of 2022, reaching a peak of above 5% in 2023 (Chart B, panel a) and declined gradually afterwards, remaining close to 3% for most of 2024. The CES-based rent indicator uses a more harmonised approach than the Harmonised Index of Consumer Prices (HICP), which follows rental changes over time for the same households, regardless of whether they remain in the same dwelling or move. The resulting indicator is more responsive to inflation and the business cycle than HICP rents, especially for certain countries (e.g. Germany). This may be related to different practices, as the HICP regulation allows countries to choose which methodology they apply as reflected in the HICP methodological manual.[6]

There have been substantial cross-country differences in reported rent growth. The average year-on-year rent growth reported in the CES over the last 12 months has been above 7% in Ireland and Portugal, but below 3% in the Netherlands, Germany and Italy (Chart B, panel b). In the third quarter of 2024 (the most recent values), households in Portugal reported the highest rent growth (this was also much

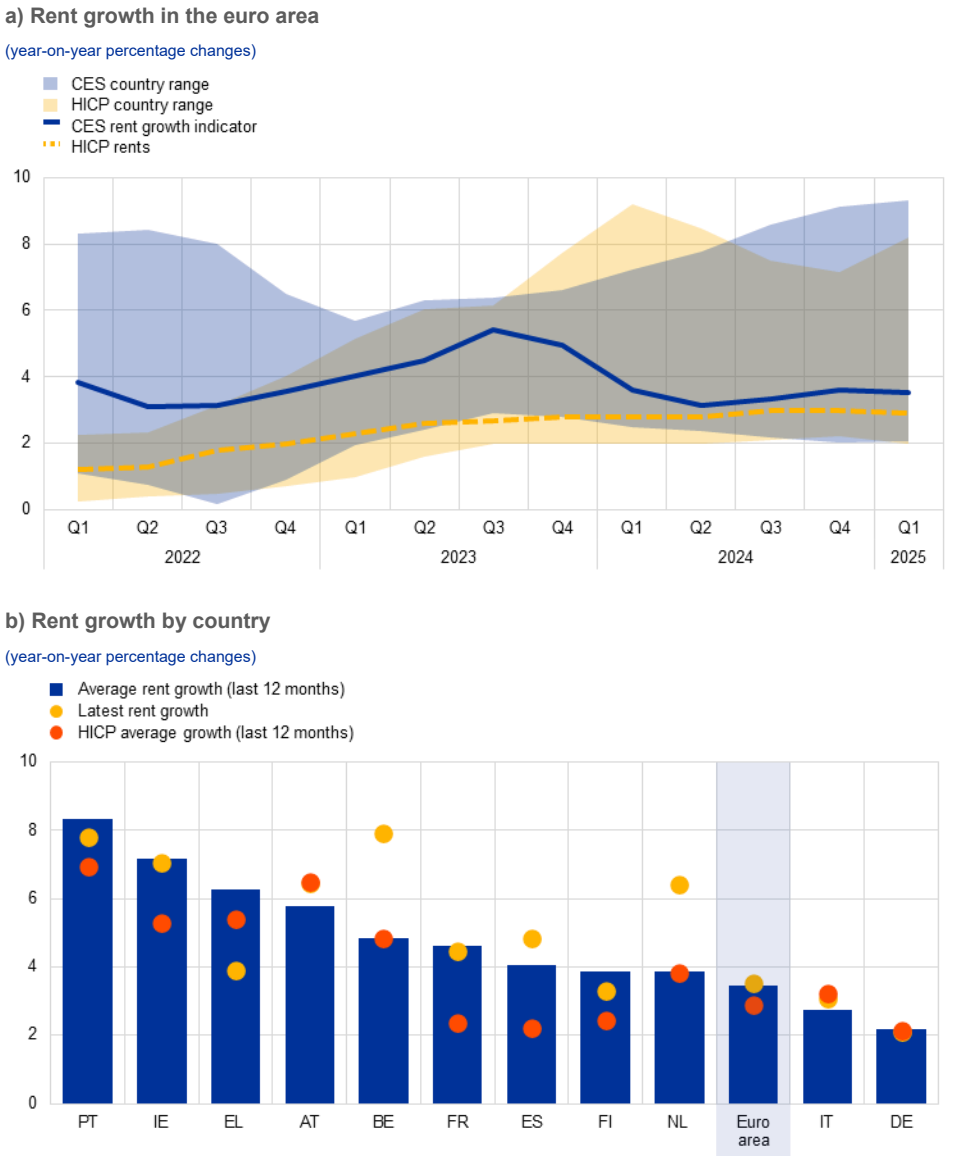
5 The mean of individual growth rates is heavily trimmed to avoid the effects of outliers stemming from reporting errors. To do this, unrealistically large year-on-year changes (negative growth of less than 50% or positive growth of more than 200% within a year) are trimmed (removed from the sample). Additionally, rent increases and decreases of more than 50% are winsorised (observations exceeding the limits are replaced with the limit).To contain the impact of compositional changes, which could lead to mechanical effects unrelated to actual rental growth, a household's rent only enters the growth indicator if the household is a renter both at the beginning and at the end of the 12-month period.

6 In the HICP, rentals can be calculated by following households, dwellings or landlords. This flexibility could potentially lead to different practices across national statistical offices that, in turn, could have a differential effect on the observed outcomes. For more details, see Section 12.4.4 of the HICP methodological guide.

higher than past averages), while the values for Italy and Finland were lower than their past averages. In Ireland and Austria, rent growth has remained consistently high.

Chart B

Rent growth in the euro area and by country



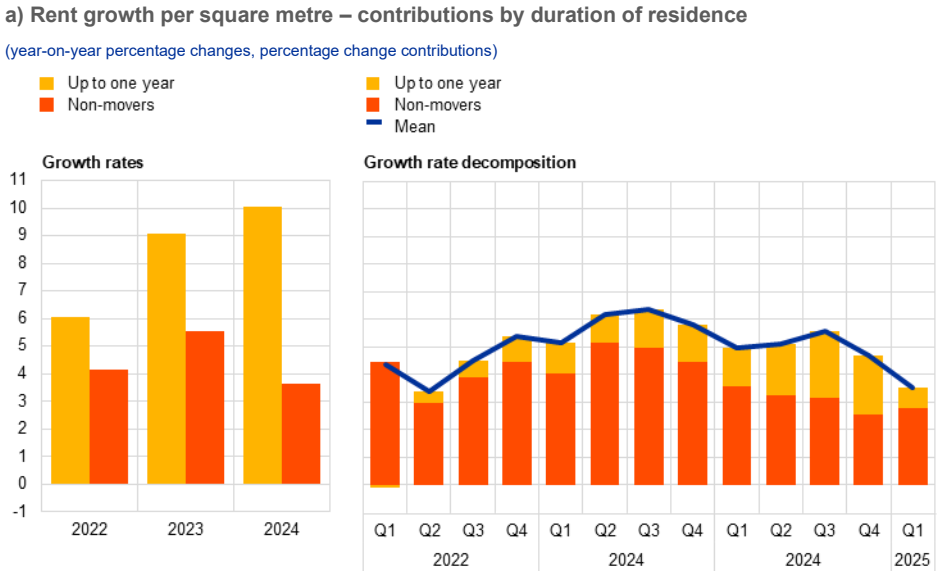
Sources: ECB Consumer Expectations Survey (CES) and ECB calculations.
Notes: Panel b) comprises a full sample of renters. Calculations are based on weighted estimates. The latest two-quarter moving average for the year-on-year growth rate (yellow dots) refers to January 2025. The blue columns show the average rent growth for the sample period (January 2024 to January 2025). The red dots refer to average HICP rent growth over the past 12 months.

Recent CES-based rent growth per square metre has been more than proportionally driven by new rental contracts. The average rate of rent growth per square metre for households that have moved in the previous year has been consistently higher than the rent growth for households that have not moved; and it has increased steadily over the past three years (Chart C, panel a, left-hand side). General rent increases in the economy usually start with higher rents for new leases, as tenant protections on existing contracts encourage landlords to raise rents when

there is a change of tenant. Over time, rents for existing contracts gradually rise as well. The higher rent growth for new contracts may have also been partly driven by households moving to higher-quality accommodation or to better areas. Indeed, the predominant reason indicated by households for changing accommodation was the desire to improve their living conditions. Decomposing the overall rent growth rate into contributions from recent movers (i.e. renters who have moved up to one year earlier) and non-movers shows that the latter play a bigger role in the overall growth rate as they account for a larger share. Nevertheless, given the higher rent growth in this segment, movers – who represent about 15% of renters – make a more than proportional contribution, accounting for around one-third of the overall growth rate (Chart C, panel a, right-hand side).

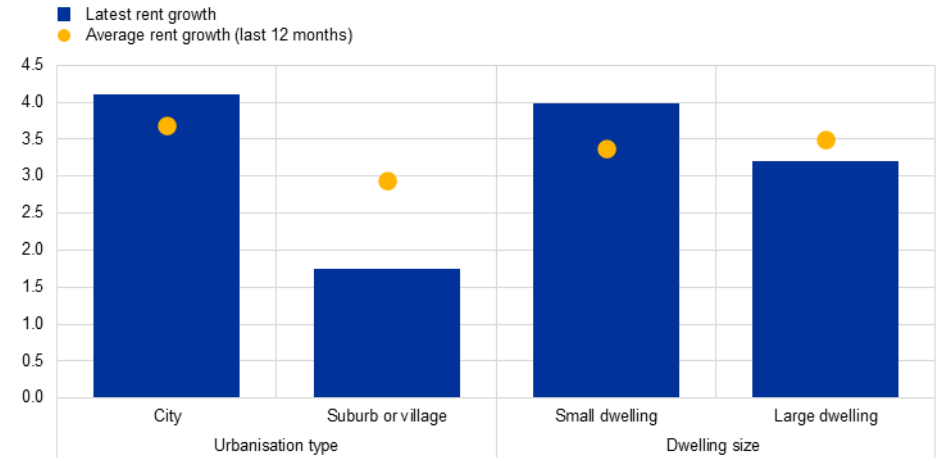
Chart C

Breakdown of rent growth



b) Rent growth by urbanisation type and dwelling size

(year-on-year percentage changes)



Sources: ECB Consumer Expectations Survey (CES) and ECB calculations.
Notes: Calculations are based on weighted estimates. Panel a) comprises a subsample of renters with a known duration of residence. The blue line depicts the combined two-quarter moving average of the year-on-year growth rate of the rents divided by square metres. "Up to one year" refers to the contribution of respondents who have lived in their current residence for one year or less. Panel b) comprises a full sample of renters. The latest two-quarter moving average of the year-on-year growth rate refers to January 2025. "Average rent growth" is the average of the year-on-year growth rates in the sample period (January 2024 to January 2025).

Recent rent growth reported in the CES has been higher in cities and for smaller dwellings. Chart C, panel b) shows that rent growth in cities has remained higher than rent growth in suburbs and rural areas and that the difference seems to have widened in the recent past. CES data also point to somewhat higher rent growth for smaller dwellings compared with larger ones, whereas growth rates were broadly equal in the past.

The CES-based rent tracker allows for timely in-depth monitoring of the rental market. These individual-level CES data can expand the possibilities of monitoring rental developments also with respect to heterogeneity across households. Future work will seek to further validate this indicator – including cross-validating the CES data with external sources. Furthermore, the role of quality adjustments in rent growth could be explored more thoroughly by considering factors such as dwelling age, location and renovation, to gauge the extent to which the growth rate reflects changes in housing quality.

6 Understanding the relative development of goods and services inflation

Prepared by Catalina Martínez Hernández, Mario Porqueddu, Blanca Prat I Bayarri and Lourdes Maria Zulli Gandur

The gap between services and non-energy industrial goods (NEIG) inflation varies over time, but it had remained positive for a long period until the 2021-2022 inflation surge (Chart A).[1] Historically, services prices have increased at faster rates than NEIG prices, implying a persistent positive gap between the two inflation rates. The gap in annual inflation rates changed from an average of 1.5 percentage points in the period from 1999 to 2008 to an average of 1.0 percentage points between 2008 and 2019. This narrowing was mainly due to a decrease in services inflation, probably reflecting subdued demand and low wage growth after the financial and sovereign debt crises.[2] During the COVID-19 pandemic, restrictions such as social distancing and widespread lockdown measures affected the relative consumption of goods and services and associated price pressures. By 2022, the rapid and strong increase in NEIG inflation, which outpaced the increase in services inflation, led to a negative gap of more than 1 percentage point, which only reverted to positive territory when goods inflation normalised in 2023 and 2024 in a way that was almost symmetrical to the previous surge. However, while NEIG inflation came down, services inflation remained elevated and has since hovered around 4%. The positive gap has thus widened to an average of 2.5 percentage points in recent quarters.

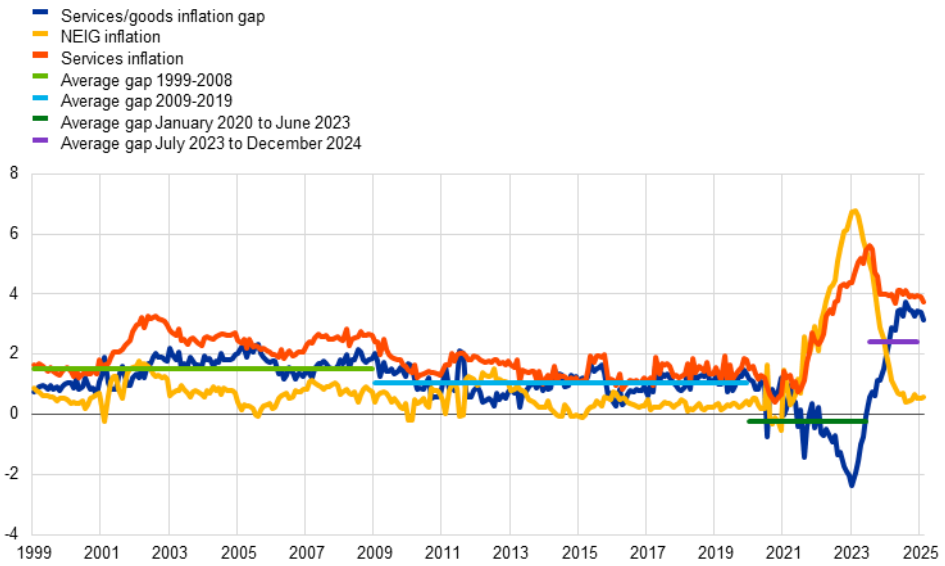
1 For a discussion of relative price developments and their theoretical underpinning by Baumol's cost disease hypothesis and the Balassa-Samuelson hypothesis, see Lane, P., "Inflation Diagnostics", *The ECB Blog*, 25 November 2022.

2 See the box entitled "What is behind the change in the gap between services price inflation and goods price inflation?", *Economic Bulletin*, Issue 5, ECB, 2019.

Chart A

Services and goods inflation and the gap between the two

(annual percentage changes and percentage points)



Sources: Eurostat and ECB calculations.
Notes: The services/goods inflation gap is the difference between the annual rates of change in the HICP components for services and NEIG. The latest observations are for February 2025.

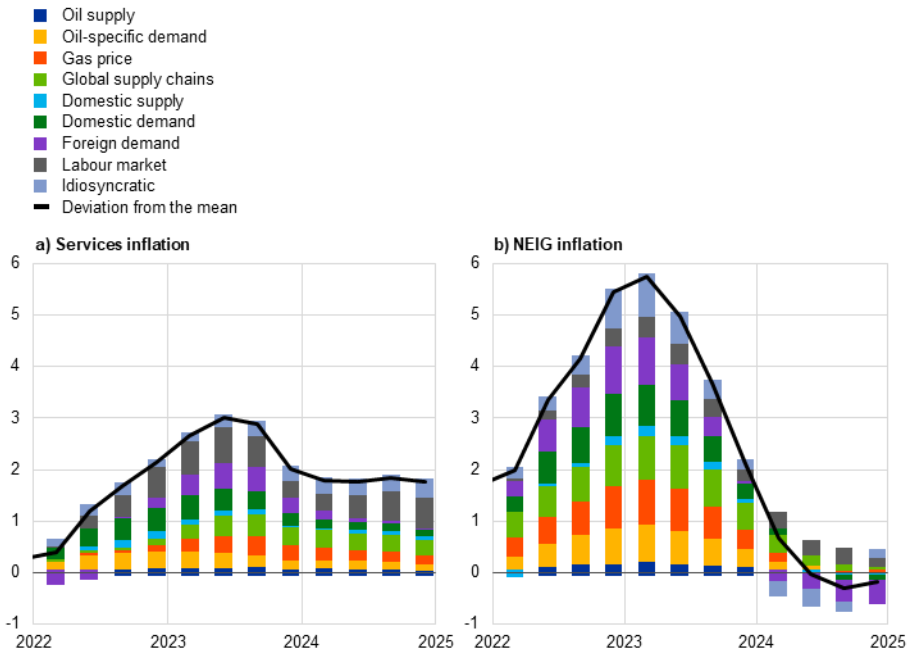
The sizeable movements in the inflation gap over recent years largely reflect the stronger impact of energy costs and global supply chains on goods inflation and the dynamics of wages and labour costs. Evidence from a structural Bayesian vector autoregression (BVAR) indicates that supply-side shocks, particularly those related to energy and global supply chains, had a larger and quicker but less persistent effect on NEIG inflation than on services inflation (Chart B).[3] In the latest data, the effects of these shocks have essentially faded away in NEIG inflation, which is currently being held down mainly by weak foreign demand. In contrast, in services inflation the impact of supply shocks has been more persistent and there is continued upward pressure from labour market shocks associated with still strong wage pressures. Looking forward, the moderation in energy prices, the gradual unwinding of supply shocks and lower wage growth are expected to contribute to a slowdown in services inflation.

[3] We estimate a quarterly version of the structural BVAR in Bańbura, M., Bobeica E. and Martínez Hernández, C., "What drives core inflation? The role of supply shocks", *Working Paper Series*, No 2875, ECB, 2023. The model includes HICP, HICPX, HICP services, real GDP, world GDP, PMI output, PMI supplier delivery times and the Global Supply Chain Pressure Index (GSCPI) from Benigno, G., di Giovanni, J., Groen, J.J.J. and Noble, A.I., "The GSCPI: A New Barometer of Global Supply Chain Pressures", *Staff Reports*, No 1017, Federal Reserve Bank of New York, May 2022, as well as oil prices, oil production, gas prices, farm gate prices, total producer prices, producer prices in the energy and intermediate goods sectors, the EUR/USD exchange rate, and compensation per employee. The historical decomposition of NEIG inflation is constructed using the decompositions of HICPX inflation and services inflation and the corresponding HICP weights.

Chart B

Historical decomposition of services inflation and NEIG inflation

(percentage points and percentage point contributions in deviations from the mean implied by the model and initial conditions)



Sources: Eurostat, Haver and ECB calculations.
Notes: The panels show the pointwise mean contribution of structural shocks to services inflation and NEIG inflation in deviation from the impact of initial conditions and the mean. The model is based on a quarterly version of the structural BVAR in Bańbura, M, Bobeica, E. and Martínez Hernández, C., "What drives core inflation? The role of supply shocks", *Working Paper Series*, No 2875, ECB, 2023. The estimation sample is from the fourth quarter of 1996 to the fourth quarter of 2024.

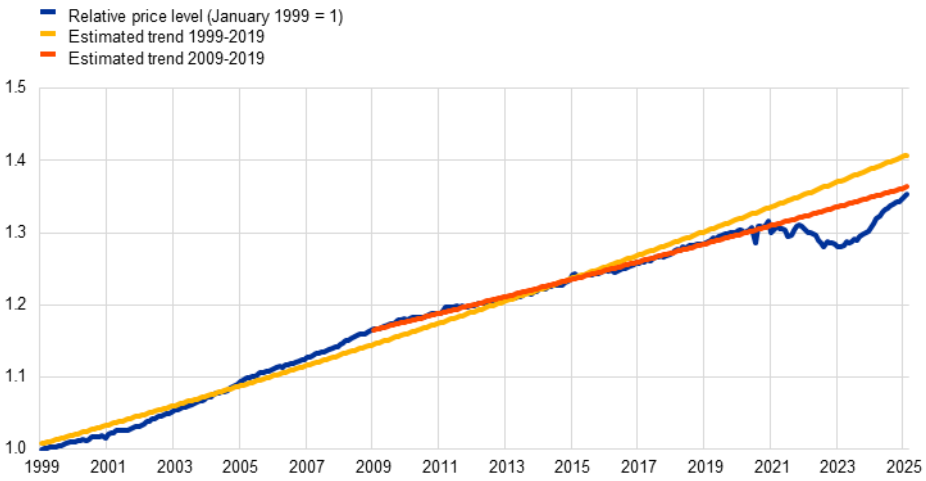
The recently strongly positive inflation gap implies that the relative price level of services over goods is converging to the pre-pandemic trend (Chart C). Between 2021 and mid-2023, the relative price level of services over NEIG moved to well below long-term trends. By February 2025 this deviation had grown to around 3.9% below the trend estimated over the period 1999-2019. Relative prices vis-à-vis the trend provide an additional perspective to assessing inflation rates vis-à-vis longer-term inflation averages, as the latter may not be a reliable benchmark for future developments. For instance, the below-target "low inflation" period led to a pre-pandemic longer-term average for core inflation of just 1.6%, while currently available projections see core inflation settling at around 2.0% over the years ahead. Looking at the convergence of the relative price level to trend has the advantage that, in principle, it does not depend on a specific assumption for the core inflation rate. Unless the shocks of past years have led to a permanent shift in preferences and productivity, the relative price level can be expected to converge to its pre-pandemic trend, at least over the medium term. The recent evolution of the gap points to an almost symmetrical unwinding of the build-up to mid-2023.[4]

[4] Amatyakul, P., Igan, D. and Lombardi, M.J., "Sectoral price dynamics in the last mile of post-Covid-19 disinflation", *BIS Quarterly Review*, Bank for International Settlements, March 2024, provide econometric estimates of such "error correction" for advanced economies (euro area, United States and United Kingdom), suggesting convergence to trend within around two years.

Chart C

Relative price of services over NEIG

(ratio of price level indices: January 1999 = 1)



Sources: Eurostat and ECB calculations.
Notes: The chart shows price developments in services relative to those for NEIG. The data are seasonally adjusted. The latest observation is for February 2025. Trends are estimated by regressing the logarithm of the relative price level on a constant and a linear trend.

Future trends in relative prices are surrounded by a large degree of uncertainty as these depend on structural factors related to global trends, digitalisation, demographics and climate change. For instance, deglobalisation due to geopolitical and trade fragmentation could push up prices of tradable goods.[5] Digitalisation and developments in artificial intelligence (AI) could affect services and goods prices differently.[6] The size of the overall effect remains uncertain and depends on how quickly these technologies are adopted in the production process. Demographic trends, such as ageing, could lead to stronger demand for services and push up prices by affecting wage costs in the comparatively labour-intensive services sector. Climate change and related mitigation measures could affect goods and services prices to different extents, both via exposure to sector-specific consequences of climate change and via exposure to sector-specific mitigation policies, such as higher carbon taxes as part of the energy transition.[7]

5 For an overview, see Attinasi, M.G. et al., "Navigating a fragmenting global trading system: insights for central banks", *Occasional Paper Series*, No 365, ECB, 2024.

6 For the United States, Gazzani, A.G. and Natoli, F., "The Macroeconomic Effects of AI-based Innovation", SSRN, December 2024, find a negative effect of AI innovation on goods prices and a positive but non-significant effect on services prices. The downward effect on goods prices is driven by a decline in prices of durable and high-tech goods.

7 For an analysis of physical risks to euro area inflation rates, see Ciccarelli, M., Kuik, F. and Martínez Hernández, C., "The asymmetric effects of temperature shocks on inflation in the largest euro area countries", *European Economic Review*, Vol. 168, September 2024.

7 Insights from banks and firms on euro area credit conditions: a comparison based on ECB surveys

Prepared by Maria Dimou, Annalisa Ferrando, Petra Köhler-Ulbrich and Judit Rariga

This box provides a comprehensive assessment of survey data on bank lending to euro area firms from the perspective of banks and firms. The euro area bank lending survey (BLS) and the survey on the access to finance of enterprises (SAFE) are long-standing surveys that provide qualitative information on credit supply and demand and interaction between them.[1] Both surveys offer important early indications of future trends in loan volumes and provide information on factors driving loan supply and demand. The BLS focuses on bank lending conditions, including their interactions with alternative sources of financing, as assessed by banks. The SAFE provides more detailed insights, based on the answers of firms, into the broader capital structure of firms. By combining findings from both the BLS and the SAFE, the surveys complement hard data on lending volumes and interest rates and enhance the interpretation of financial and economic conditions within the euro area.[2]

BLS credit standards and SAFE bank loan availability are conceptually closely related, and these evolve similarly (Chart A). Banks' assessment of their credit standards (i.e. their loan approval criteria) in the BLS has broadly co-moved with firms' perceptions of the availability of bank loans in the SAFE over the history of the two surveys. Still, in 2015-22 firms indicated a net improvement in bank loan availability, while banks' assessments showed a more contained net easing of credit standards, with net percentages fluctuating around zero. Such differences in net percentages between BLS credit standards and SAFE bank loan availability signal differences between the risk assessments of banks and firms, indicating a stronger focus on credit risk among banks. Differences can also arise from changes in the composition of banks' exposures to firms with specific risk profiles. More recently, during the monetary policy tightening cycle in 2022-23, both surveys showed a substantial tightening in credit supply, followed by a more moderate tightening over

1 For the BLS, see the article entitled "Happy anniversary, BLS – 20 years of the euro area bank lending survey", *Economic Bulletin*, Issue 7, ECB, 2023. For the SAFE, see the article entitled "The Survey on the Access to Finance of Enterprises: monetary policy, economic and financing conditions and inflation expectations", *Economic Bulletin*, Issue 7, ECB, 2024. The BLS is representative of euro area bank lending to firms and households, while the SAFE is representative of the overall population of firms in the euro area. The BLS has been conducted at a quarterly frequency since its inception in 2003. The SAFE, initiated in 2009 with a semi-annual schedule, transitioned to a quarterly frequency in the first quarter of 2024. This allows it to be effectively compared with the BLS. Both surveys are qualitative and ask banks/firms about changes in credit supply and demand. The analysis focuses on "net percentages", defined as the difference between the share of banks or firms reporting a tightening/an increase and the share of those reporting an easing/a decrease. Therefore, net percentages should not be interpreted as being equivalent to growth rates, but rather as indications of the direction of changes.

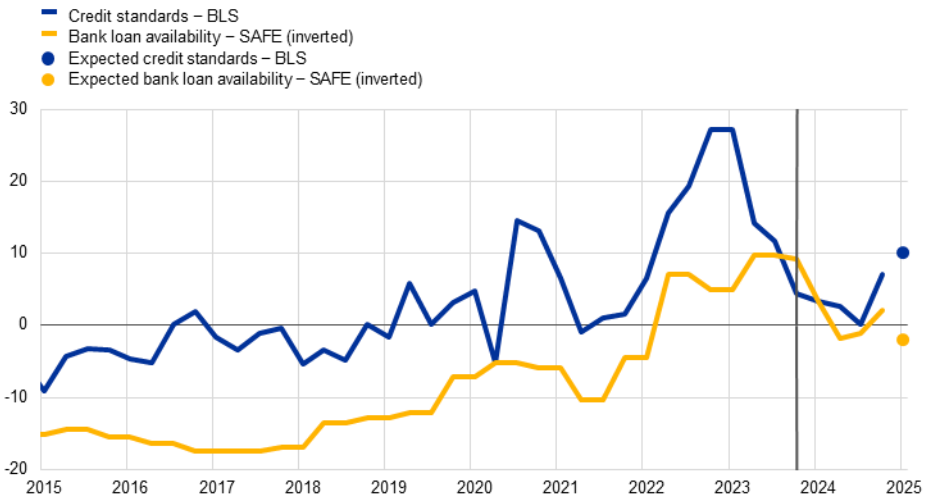
2 For the BLS, see the box entitled "What information does the euro area bank lending survey provide on future loan developments?", *Economic Bulletin*, Issue 8, ECB, 2022, and Altavilla, C., Darracq Paries, M. and Nicoletti, G., "Loan supply, credit markets and the euro area financial crisis", *Journal of Banking & Finance*, Vol. 109, 2019. For the SAFE, see the box entitled "Firms' access to finance and the business cycle: evidence from the SAFE", *Economic Bulletin*, Issue 8, ECB, 2022, and the box on "Corporate vulnerabilities as reported by firms in the SAFE", *Economic Bulletin*, Issue 1, ECB, 2024.

the first three quarters of 2024. In the fourth quarter of 2024, euro area banks indicated a renewed net tightening of their credit standards for firms in the BLS, which was echoed by firms reporting a renewed deterioration in bank loan availability in the SAFE.

Chart A

Changes in credit standards and bank loan availability for firms

(net percentages of banks reporting a tightening and net percentages of firms reporting a deterioration)



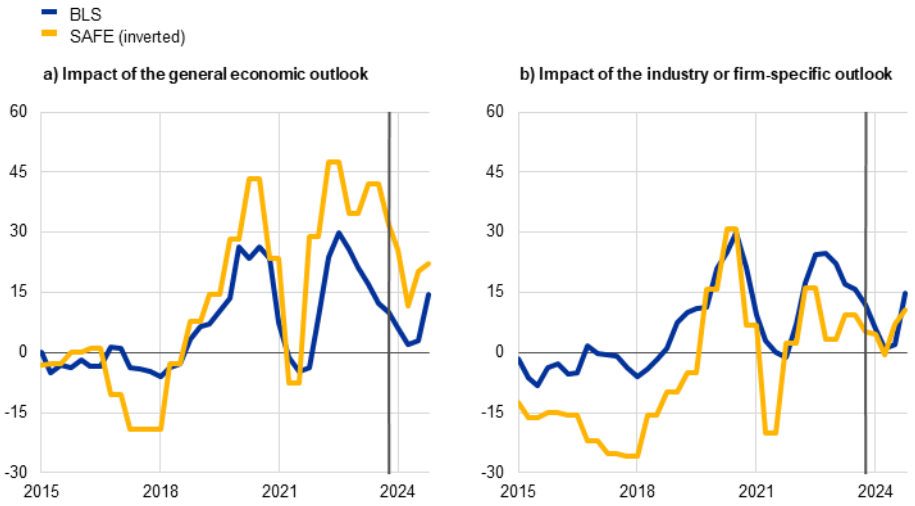
Sources: ECB (BLS), ECB and European Commission (SAFE) and ECB calculations.
Notes: For the BLS a positive value represents a net tightening of credit standards; for the SAFE a positive value represents a net decrease in bank loan availability. SAFE figures are inverted. The dots refer to expectations over the next three months (BLS and SAFE). The vertical line marks the fourth quarter of 2023, the period as of which results are directly comparable between the surveys on a quarterly basis.

In both surveys, the general economic and firm-specific outlook are key drivers of credit standards and bank loan availability (Chart B). Banks and firms assess the impact of the general economic outlook on credit supply in a very similar way, closely linked to the cyclical swings in the euro area economy (Chart B, panel a). Banks' and firms' assessment of the impact of the industry or firm-specific outlook on credit supply also follows similar dynamics, but with firms reporting their own situation as tending to have a more positive impact on bank loan availability than is reported by banks (Chart B, panel b). This could be due to firms potentially focusing more on their long-term creditworthiness, while banks may concentrate more on the forward-looking assessment of credit risks for the industry and firms' balance sheets. In the fourth quarter of 2024, both banks and firms mentioned the general economic outlook and the firm-specific outlook as important factors reducing the availability of bank loans.

Chart B

Impact of selected factors on credit standards and bank loan availability

(net percentages of banks reporting a tightening impact and net percentages of firms reporting a negative impact)



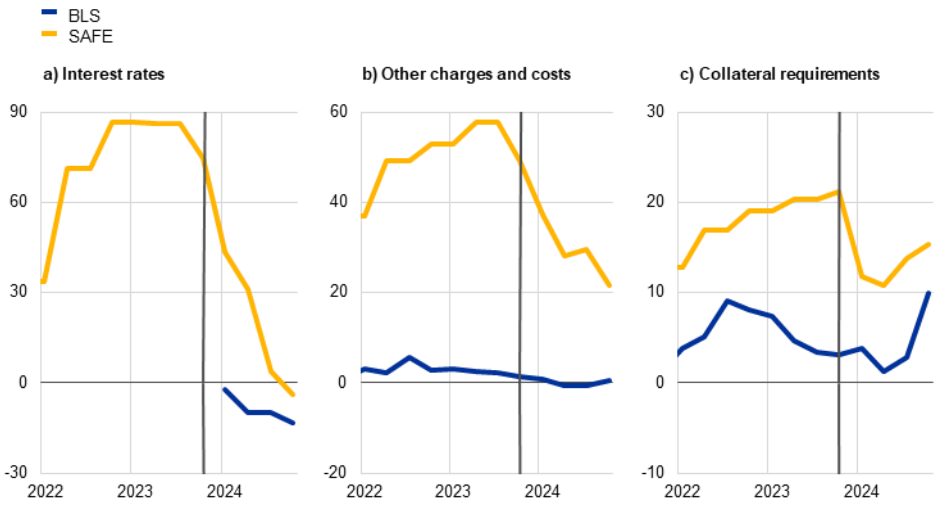
Sources: ECB (BLS), ECB and European Commission (SAFE) and ECB calculations.
Notes: See notes to Chart A. In panel b), the BLS indicator refers to the industry and firm-specific outlook, while the SAFE indicator refers to firms' sales and profitability or business plans.

Price and non-price terms and conditions on loan contracts contribute to the understanding of credit dynamics, reflecting the interaction of loan supply and demand (Chart C). Terms and conditions can change owing to changes in interest rates, changes in financing costs other than interest rates – such as charges, fees and commissions – or through other non-price terms and conditions, such as collateral requirements. In the fourth quarter of 2024 both banks and firms reported that the decrease in interest rates was accompanied by a tightening in collateral requirements. Moreover, firms reported that financing costs other than interest rates continued to have a net tightening effect, while banks assessed their non-interest charges as being broadly unchanged.

Chart C

Changes in terms and conditions for loans to firms

(net percentages of banks and firms respectively reporting an increase or a tightening)



Sources: ECB (BLS), ECB and European Commission (SAFE) and ECB calculations.
Notes: For both the BLS and SAFE, a positive value is a net increase in interest rates or other charges and costs, or a net tightening of collateral requirements. Interest rates in the BLS refer to lending rates, which have been included since the first quarter of 2024. Other charges and costs are non-interest rate charges reported in the BLS and other financing costs reported in the SAFE. See Chart A for details of the vertical line.

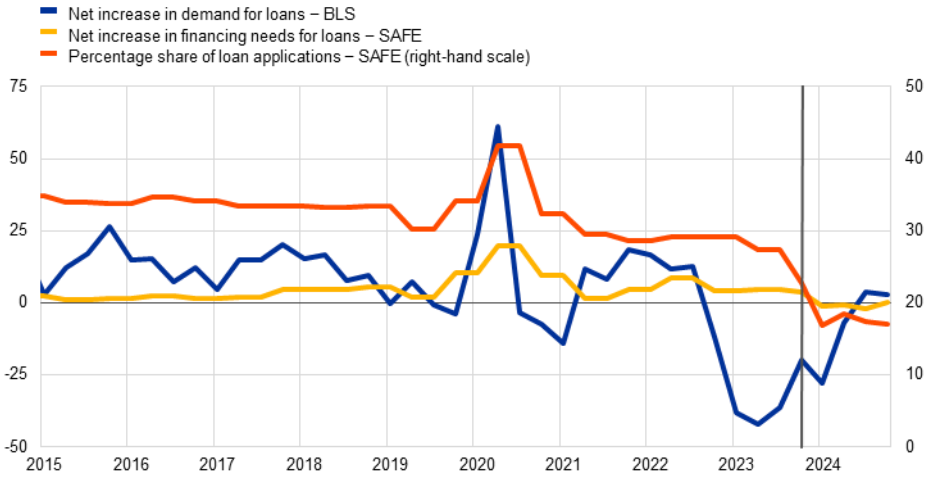
Firms' demand for bank loans in the BLS captures changes in demand as observed by banks, which are highly cyclical, whereas the SAFE reports the overall changes in firms' need for bank loans to run their business, which are less cyclical (Chart D). In the BLS, the demand for bank loans refers to firms' bank loan financing needs as observed by banks, regardless of whether these needs ultimately result in a loan.[3] In the SAFE, firms' financing needs for bank loans reflect their own perceptions and assessment of their external financing requirements, which may not always lead to firms approaching a bank for a loan. Therefore, the SAFE indicator captures both the financing needs observed by banks and those that might otherwise go unnoticed, such as those of firms without any bank contact or those of discouraged borrowers. Another SAFE indicator provides information on the share of firms that applied for bank loans. Historically the BLS demand indicator has been more cyclical than the demand measures from the SAFE, which might be due to differences in how banks and firms assess demand. Banks might be more focused on the assessment of firms' loan demand in the context of the general economic situation and business outlook, whereas firms focus more on their operations and business opportunities. Still, indicators from both surveys have pointed to a persistent weakness in loan demand from the end of 2022 until the fourth quarter of 2024, despite declining interest rates.

[3] Based on their regular contacts with their existing corporate clients, banks in the BLS develop an assessment of the changes in firms' financing needs, even when these firms are not reaching out to them. This is also reflected in banks' replies on, for instance, the impact of alternative sources of financing on firms' loan demand. In addition, banks may receive further signals from potential new clients, if these firms reach out to the banks.

Chart D

Changes in BLS loan demand and bank loan financing needs and applications in the SAFE

(left axis: net percentages, right axis: percentages)



Sources: ECB (BLS), ECB and European Commission (SAFE) and ECB calculations.
Notes: On the left axis, for the BLS, a positive value is a net increase in loan demand at the bank; for the SAFE, a positive value is a net increase in firms' need for bank loans. On the right axis, the percentages show the proportion of firms that applied for a bank loan relative to all firms for which bank loans are a relevant source of finance. See the notes to Chart A for details of the vertical line.

Overall, the BLS and SAFE results enrich the analysis of lending dynamics by providing additional insights through the lenses of banks and firms.

Consequently, the surveys also enhance the interpretation of financial and economic conditions within the euro area. Concerning the most recent developments, in the fourth quarter of 2024 the BLS and the SAFE consistently signalled a renewed tightening in bank credit supply to firms in the euro area, which appeared to be driven by higher credit risks. In addition, banks and firms reported still muted demand developments.

8 Liquidity conditions and monetary policy operations from 23 October 2024 to 4 February 2025

Prepared by Samuel Bieber and Vladimir Tsonchev

This box describes the Eurosystem liquidity conditions and monetary policy operations in the seventh and eighth reserve maintenance periods of 2024. Together, these two maintenance periods ran from 23 October 2024 to 4 February 2025 (the "review period").

Average excess liquidity in the euro area banking system continued to decline over the review period. Liquidity provision decreased, owing to lower Eurosystem holdings under the asset purchase programme (APP) and the pandemic emergency purchasing programme (PEPP), as a result of the discontinuation of reinvestments under the APP at the beginning of July 2023 and only partial reinvestments under the PEPP from the beginning of July 2024. Reinvestments under the PEPP were fully discontinued at the end of December 2024. The decline in liquidity provision also reflected the maturing of the last operation under the third series of targeted longer-term refinancing operations (TLTRO III) on 18 December 2024. It was partly offset by the continuing reduction in liquidity absorption through net autonomous factors.

Liquidity needs

The average daily liquidity needs of the banking system, defined as the sum of net autonomous factors and reserve requirements, decreased by €39 billion to €1,423 billion over the review period. This reflected the fact that liquidity-absorbing autonomous factors increased by less than liquidity-providing autonomous factors (Table A). Minimum reserve requirements rose by €1 billion to €164 billion, having only a marginal effect on the change in aggregate liquidity needs.

Liquidity-absorbing autonomous factors increased by €54 billion over the review period, owing mainly to a rise in other autonomous factors. On average, net other autonomous factors grew by €54 billion. This was primarily due to an increase in the revaluation accounts, as a result of higher gold prices, that was more than offset by the corresponding rise in net foreign asset holdings (see the paragraph on liquidity-providing autonomous factors below). Government deposits fell by €7 billion to €111 billion. The overall decrease in this item since 2022 reflects the normalisation of cash buffers held by national treasuries as well as changes in the remuneration of government deposits with the Eurosystem that made it financially more attractive to place funds in the market. The average value of banknotes in circulation rose by €7 billion over the review period to €1,569 billion. Banknote demand continues to be broadly stable after peaking in July 2022.

Liquidity-providing autonomous factors rose by €93 billion, owing primarily to an increase in net foreign assets of €71 billion. This rise in net foreign asset

holdings was driven mainly by an increase in gold prices and in foreign currency claims on non-euro area residents. Net assets denominated in euro grew by €22 billion over the review period.

Table A

Eurosystem liquidity conditions

Liabilities

(averages; EUR billions)

	Current review period: 23 October 2024-4 February 2025						Previous review period: 24 July-22 October 2024	
	Seventh and eighth maintenance periods		Seventh maintenance period: 23 October-17 December 2024		Eighth maintenance period: 18 December 2024-4 February 2025		Fifth and sixth maintenance periods	
Liquidity-absorbing autonomous factors	2,739	(+54)	2,725	(+23)	2,756	(+31)	2,686	(+45)
Banknotes in circulation	1,569	(+7)	1,563	(+3)	1,577	(+13)	1,563	(+8)
Government deposits	111	(-7)	114	(-3)	107	(-7)	118	(+1)
Other autonomous factors (net)[1)]	1,059	(+54)	1,047	(+23)	1,072	(+25)	1,005	(+37)
Current accounts above minimum reserve requirements	6	(-1)	5	(-1)	7	(+2)	7	(+1)
Minimum reserve requirements[2)]	164	(+1)	163	(+0)	164	(+1)	162	(+1)
Deposit facility	2,917	(-115)	2,928	(-61)	2,904	(-24)	3,032	(-139)
Liquidity-absorbing fine-tuning operations	0	(+0)	0	(+0)	0	(+0)	0	(+0)

Source: ECB.
Notes: All figures in the table are rounded to the nearest €1 billion. Figures in brackets denote the change from the previous review or maintenance period.
1) Computed as the sum of the revaluation accounts, other claims and liabilities of euro area residents, capital and reserves.
2) Memo item that does not appear on the Eurosystem balance sheet and should therefore not be included in the calculation of total liabilities.

Assets

(averages; EUR billions)

	Current review period: 23 October 2024-4 February 2025						Previous review period: 24 July-22 October 2024	
	Seventh and eighth maintenance periods		Seventh maintenance period: 23 October-17 December 2024		Eighth maintenance period: 18 December 2024-4 February 2025		Fifth and sixth maintenance periods	
Liquidity-providing autonomous factors	1,480	(+93)	1,437	(+30)	1,528	(+91)	1,386	(+68)
Net foreign assets	1,170	(+71)	1,146	(+22)	1,198	(+53)	1,099	(+54)
Net assets denominated in euro	309	(+22)	292	(+8)	330	(+38)	287	(+14)
Monetary policy instruments	4,346	(-154)	4,384	(-69)	4,303	(-81)	4,501	(-160)
Open market operations	4,346	(-154)	4,384	(-69)	4,303	(-81)	4,501	(-160)
Credit operations	40	(-37)	50	(-7)	28	(-22)	76	(-58)
- MROs	10	(+5)	9	(+1)	11	(+2)	5	(+1)
- Three-month LTROs	14	(+5)	12	(+1)	17	(+6)	10	(+2)
- TLTRO III	16	(-46)	29	(-9)	0	(-29)	62	(-61)
Outright portfolios[1)]	4,306	(-118)	4,334	(-62)	4,275	(-59)	4,424	(-102)
Marginal lending facility	0	(+0)	0	(+0)	0	(+0)	0	(+0)

Source: ECB.
Notes: All figures in the table are rounded to the nearest €1 billion. Figures in brackets denote the change from the previous review or maintenance period. MRO stands for main refinancing operation, LTRO for longer-term refinancing operation and TLTRO III for the third series of targeted longer-term refinancing operations.
1) With the discontinuation of net asset purchases, the individual breakdown of outright portfolios is no longer shown.

Other liquidity-based information

(averages; EUR billions)

	Current review period: 23 October 2024-4 February 2025						Previous review period: 24 July-22 October 2024	
	Seventh and eighth maintenance periods		Seventh maintenance period: 23 October-17 December 2024		Eighth maintenance period: 18 December 2024-4 February 2025		Fifth and sixth maintenance periods	
Aggregate liquidity needs[1)]	1,423	(-39)	1,451	(-7)	1,392	(-59)	1,462	(-22)
Net autonomous factors[2)]	1,260	(-40)	1,288	(-7)	1,228	(-60)	1,300	(-23)
Excess liquidity[3)]	2,923	(-116)	2,933	(-62)	2,911	(-22)	3,039	(-138)

Source: ECB.
Notes: All figures in the table are rounded to the nearest €1 billion. Figures in brackets denote the change from the previous review or maintenance period.
1) Computed as the sum of net autonomous factors and minimum reserve requirements.
2) Computed as the difference between autonomous liquidity factors on the liabilities side and autonomous liquidity factors on the assets side. For the purposes of this table, items in the course of settlement are also added to net autonomous factors.
3) Computed as the sum of current accounts above minimum reserve requirements and the recourse to the deposit facility minus the recourse to the marginal lending facility.

Interest rate developments

(averages; percentages and percentage points)

	Current review period: 23 October 2024-4 February 2025				Previous review period: 24 July-22 October 2024			
	Seventh maintenance period: 23 October-17 December 2024		Eighth maintenance period: 18 December 2024-4 February 2025		Fifth maintenance period: 24 July-17 September 2024		Sixth maintenance period: 18 September-22 October 2024	
MROs	3.40	(-0.25)	3.15	(-0.25)	4.25	(+0.00)	3.65	(-0.60)
Marginal lending facility	3.65	(-0.25)	3.40	(-0.25)	4.50	(+0.00)	3.90	(-0.60)
Deposit facility	3.25	(-0.25)	3.00	(-0.25)	3.75	(+0.00)	3.50	(-0.25)
€STR	3.16	(-0.25)	2.92	(-0.25)	3.66	(+0.00)	3.41	(-0.25)
RepoFunds Rate Euro	3.23	(-0.26)	2.97	(-0.26)	3.73	(+0.01)	3.49	(-0.24)

Sources: ECB, CME Group and Bloomberg.
Notes: Figures in brackets denote the change in percentage points from the previous review or maintenance period. MRO stands for main refinancing operation and €STR for euro short-term rate.

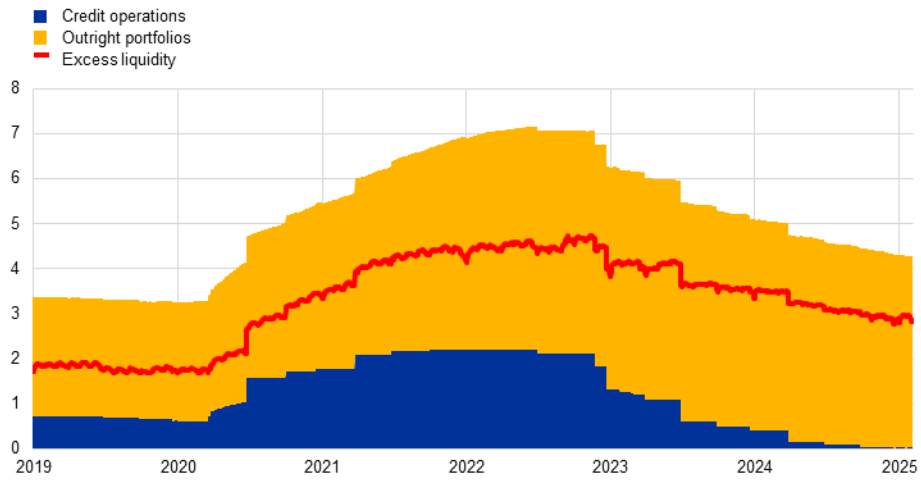
Liquidity provided through monetary policy instruments

The average amount of liquidity provided through monetary policy instruments decreased by €154 billion to €4,346 billion over the review period (Chart A). The decline in liquidity supply was driven primarily by a reduction in Eurosystem outright portfolios and, to a lesser extent, in credit operations.

Chart A

Changes in daily liquidity provided through open market operations and excess liquidity

(EUR trillions)



Source: ECB.
Note: The latest observations are for 4 February 2025.

The average amount of liquidity provided through outright portfolio holdings decreased by €118 billion to €4,306 billion over the review period. This decline was due to the maturing of APP holdings and to the only partial reinvestments under

the PEPP between 1 July and 31 December 2024, after which all reinvestments were discontinued.[1]

The average amount of liquidity provided through credit operations fell by €37 billion to €40 billion over the review period. This decrease largely reflects the reduction in outstanding TLTRO III amounts following the maturing of the last operation under TLTRO III on 18 December 2024 (€29 billion). The average outstanding amounts of three-month longer-term refinancing operations (LTROs) and main refinancing operations (MROs) both increased by €5 billion. Banks' relatively limited participation in these regular operations, despite the sizeable TLTRO repayments, reflects their comfortable liquidity position in aggregate and the availability of alternative funding sources at attractive market rates and maturities.

Excess liquidity

Average excess liquidity decreased by €116 billion over the review period to stand at €2,923 billion (Chart A). Excess liquidity is the sum of bank reserves held in excess of minimum reserve requirements and banks' recourse to the deposit facility net of their recourse to the marginal lending facility. It reflects the difference between the total liquidity provided to the banking system and the liquidity needed by banks to cover their minimum reserves. After peaking at €4,748 billion in November 2022, excess liquidity has steadily declined, falling to below €3,000 billion over the review period.

Interest rate developments

In the review period the Governing Council twice cut the three key ECB interest rates – in particular the deposit facility rate, through which it steers the monetary policy stance – by 25 basis points. The rates on the deposit facility, MROs and the marginal lending facility thus stood at 2.75%, 2.90% and 3.15% respectively immediately after the end of the review period.

The average euro short-term rate (€STR) over the review period reflected the ECB's rate cuts, while maintaining a negative spread with the deposit facility rate. On average, the €STR was 8.4 basis points below the deposit facility rate over the review period, compared with an average of 8.7 basis points in the fifth and sixth maintenance periods of 2024. The pass-through of policy rate changes to unsecured money market rates was complete and immediate.

The average euro area repo rate, as measured by the RepoFunds Rate Euro index, remained closer to the deposit facility rate than to the €STR. On average, the repo rate was 2.6 basis points below the deposit facility rate over the review period, compared with 1.6 basis points in the fifth and sixth maintenance periods of 2024. The relatively tight spread between repo rates and the deposit facility rate

[1] Securities held in the outright portfolios are carried at amortised cost and adjusted at the end of each quarter, which has a marginal impact on the changes in the outright portfolios.

reflects the increasing availability of collateral as a result of higher net issuance, the release of collateral pledged against maturing/repaid TLTROs and the decline in the Eurosystem's APP and PEPP holdings. Another factor contributing to the upward pressure on repo rates was higher demand from leveraged investors to finance long positions in bonds. The pass-through of the policy rate changes to repo rates was also smooth and immediate.

Article

1 Developments in the recent euro area house price cycle

Prepared by Christian Höynck, Moreno Roma and Kathinka Schlieker

1 Introduction

Developments in house prices play an important role in the economic and monetary analyses conducted by central banks. Notably, they are indicative of the strength of monetary policy transmission and of household balance sheet positions. Residential property prices, in conjunction with financing conditions, affect the affordability of housing and this can have knock-on effects for, among other things, construction activity and the rental market. This article reviews developments in the recent house price cycle in the euro area to better understand the possible implications for the economy.

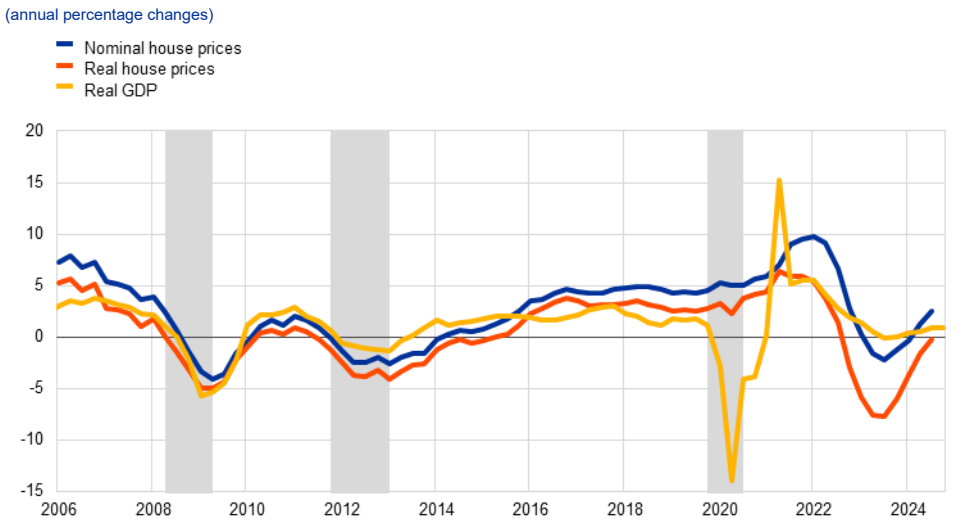
House price cycles typically follow a boom-bust pattern but can display marked differences in their underlying triggers and drivers. Assessing house price cycles in relation to business cycles only offers a partial perspective. While there is a fair degree of coherence between residential property price and real GDP cycles (Chart 1), the former tends to be longer and have a larger amplitude. Higher volatility associated with boom-bust patterns suggests a larger role for expectations (including speculation) in house price cycles in addition to fundamentals such as income and demand that govern both residential property price and real GDP cycles.[1] Moreover, the degree of synchronicity across countries is lower for house price cycles than real GDP cycles, suggesting that a euro area house price cycle can reflect many country-specific influences.[2] Therefore, this article focuses on stylised facts and broad drivers of house price cycles that are visible at the euro area-wide level.

1 The ECB Consumer Expectations Survey (CES) shows an increase in house price expectations before the most recent peak in house prices. The role of expectations and possible exuberance are in line with the theory that housing is held as an asset for which the value should appreciate over time. Asset pricing theory is a common concept used to assess house price developments. See, for instance, the box entitled "The impact of rising mortgage rates on the euro area housing market", *Economic Bulletin,* Issue 6, ECB, 2022.

2 See "Real and financial cycles in EU countries: stylised facts and modelling implications", *Occasional Paper Series*, No 205, ECB, January 2018.

Chart 1

Real GDP, nominal and real house prices in the euro area



Sources: Eurostat, ECB and ECB staff calculations.
Notes: Grey areas delimit recessions, as identified by the Centre for Economic Policy Research Euro Area Business Cycle Dating Committee. Real house prices are nominal house prices deflated by the GDP deflator. The latest observations are for the third quarter of 2024 for nominal and real house prices and for the fourth quarter of 2024 for real GDP.

2 Recent house price dynamics compared with previous house price cycles

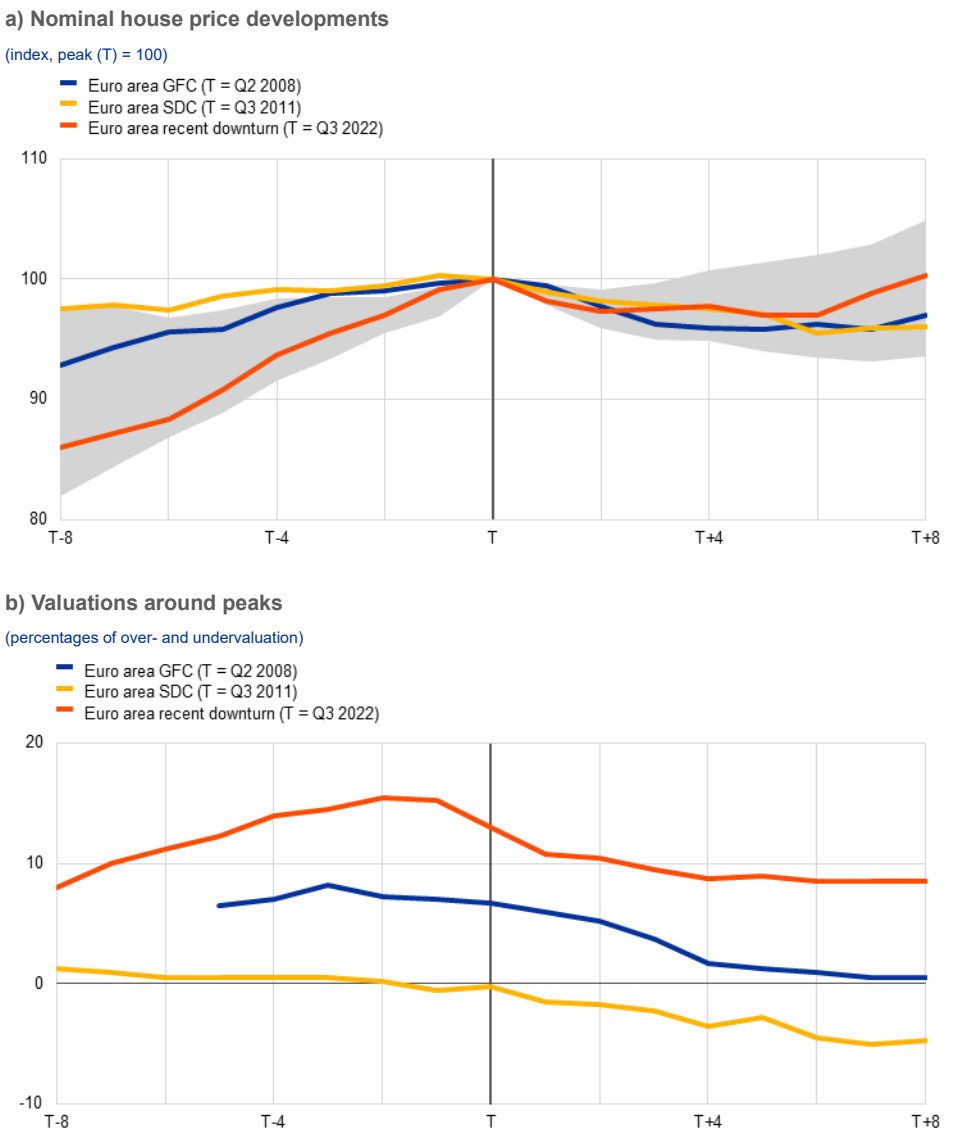
The recent downturn in euro area house prices was relatively mild and short-lived. Data for the third quarter of 2024 suggest that the house price cycle has safely moved past its trough and the level of house prices has already recovered to that of the previous peak observed in the third quarter of 2022. This recovery has been much faster than those following the global financial crisis (GFC) and the sovereign debt crisis (SDC) (Chart 2, panel a). In retrospect, the peak-to-trough part of the cycle saw a cumulative decline of 3% over one and a half years, which was shallower and shorter than the almost 5% cumulative decline recorded over two years during the GFC and the SDC.[3] The relatively limited "bust" in house prices stands out compared with previous cycles, as the run-up to the peak in 2022 had been accompanied by estimated residential property price valuations relative to fundamentals that exceeded those observed at the peaks during the GFC and the SDC (Chart 2, panel b).[4]

[3] In real terms, the cumulative decline in the most recent house price cycle was around 10% when adjusting house prices to developments in the GDP deflator (compared with 6% during the GFC and 8% during the SDC) or to developments in the HICP inflation indicator (compared with 7% during the GFC and 9% during the SDC). Real house prices can be seen as accounting for changes in purchasing power and therefore they can approximate changes in affordability, which is useful in the analysis of longer-term house price trends. That said, the strong surge in the general inflation cycle was initially accompanied by losses in purchasing power, as it took a while for these losses to be recouped through higher nominal wage growth.

[4] Estimates of house price over/undervaluation are surrounded by uncertainty and there can be large differences between different measures in terms of levels and developments. For instance, measuring the overvaluation based on real house prices suggests that the correction has now already taken place.

Chart 2

Comparison of nominal house price developments and valuations around peaks



Sources: ECB, Eurostat and ECB staff calculations.
Notes: The shaded area denotes the interquartile range of house price developments around peaks for all individual euro area countries and the aggregate. The identification of house price cycles is based on the Bry-Boschan algorithm with a minimum length of five quarters per cycle and two quarters for up- and downturns. Note that the build-up phase before the peak of the sovereign debt crisis (SDC) is also the post-peak phase of the global financial crisis (GFC). For Panel b), the lines refer to the average of the estimates based on four different valuation methods, as regularly reported in Chart 3.12 of the ESRB risk dashboard. The latest observations are for the third quarter of 2024.

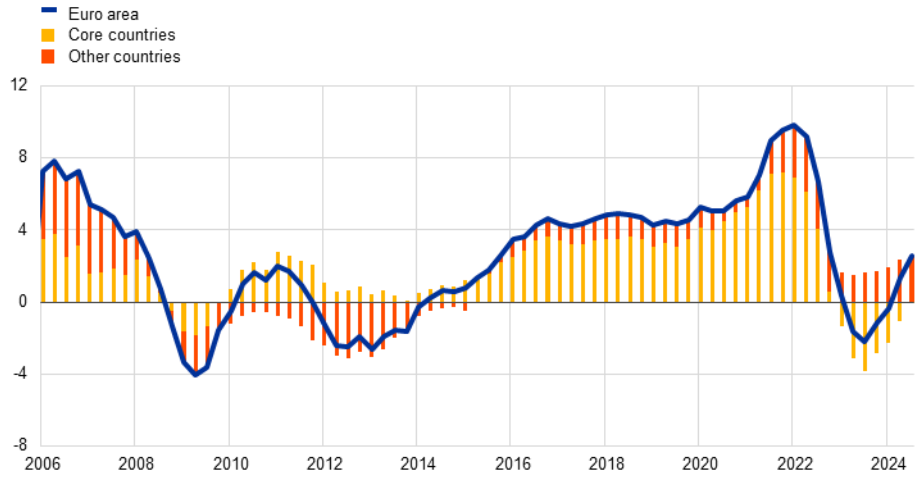
Disaggregation of euro area house price growth into different characteristics can provide additional insight into the features of the recent house price cycle. While euro area-wide house price dynamics during the GFC and the SDC were largely explained by what, at the time, was called “periphery” countries, recent dynamics were much more strongly driven by “core” countries (Chart 3), and in particular by Germany with its high weight in aggregate house prices. With only 12 of the euro area countries experiencing a decline in prices, the latest cycle was less pervasive than that during the GFC where all but one country experienced a downturn. The change in country composition of euro area-wide dynamics could

point to a rotation of boom-busts in combination with an overall broad trend of rising house prices. For some countries, the shift to a more favourable interest rate environment after the introduction of the euro led to a boom-bust cycle that took quite some time to clean up and recover from (as in the case of Spain). During the low interest rate period following the GFC and the SDC, it was mainly other, previously less affected countries that saw their housing markets react to favourable financing conditions, with them eventually seeing a correction of exuberant price dynamics (as in the case of Germany).

Chart 3

Contributions to euro area house price growth by subgroups of countries

(annual percentage changes, percentage point contributions)



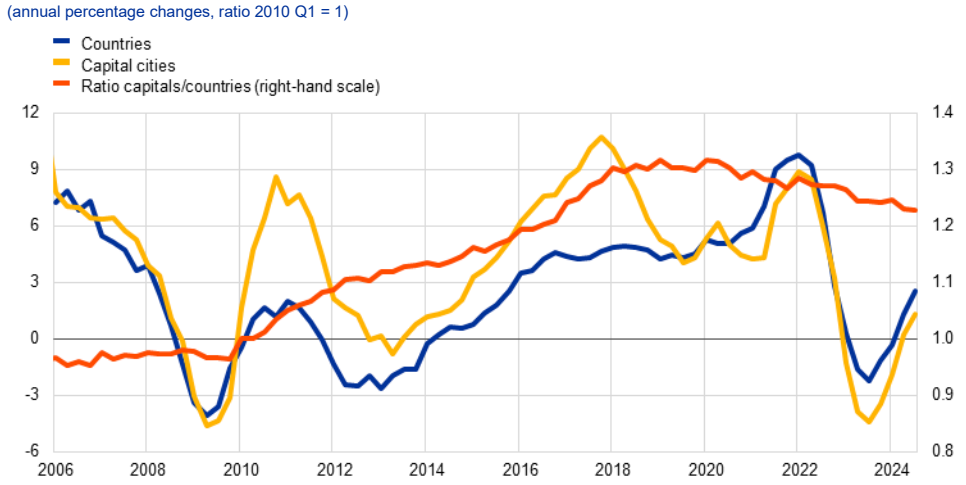
Sources: Eurostat, ECB and ECB staff calculations.
Notes: Eurostat's series for individual countries have different starting dates. Previous to that starting date, the series are backcasted based on growth rates from an ECB series. The bars represent percentage point contributions to the euro area growth rate based on GDP weights. Germany, France, the Netherlands, Austria, Belgium, Luxembourg and Finland are classified as belonging to the group of "core" countries, those countries classified under "Other countries" broadly speaking saw a more pronounced house price cycle during the GFC and the SDC. The latest observations are for the third quarter of 2024.

The recent house price cycle saw more balanced developments between house prices in capital cities and the average house price in their respective countries. Up until the pandemic, house prices in capital cities had a history of growing more strongly than in their respective countries as a whole. At the same time, there was more acceleration and deceleration in the house price dynamics of capital cities (Chart 4). These differences are consistent with the notion that "location" is a key element in house prices and that dynamics are more buoyant in supply constrained markets. A larger share of affluent buyers and a perception of reliable resale values in good locations such as capitals can amplify price movements driven by fundamentals, expectations or speculation as compared with other locations. At the end of 2019, house prices in capital cities were 71% higher than during the pre-GFC period in early 2006, as compared with 28% for the euro area aggregate. The most recent house price cycle has somewhat realigned these relative dynamics, with house prices in euro area capital cities witnessing slower price dynamics than the euro area country average. This could reflect the already high and possibly less affordable price levels in capital cities but, more likely, also the specific and reinforcing impact of the pandemic and its implications for remote

working that allowed workers to live further away from their offices and in less expensive locations.[5]

Chart 4

Nominal residential property prices for the euro area and a synthetic euro area aggregate of capital cities



Sources: ECB, Eurostat, Bank for International Settlements and national sources, ECB staff calculations.
Notes: The country average refers to Eurostat's euro area series. The euro area synthetic aggregate series for capital cities is a weighted average based on GDP weights. The aggregate includes Belgium, Germany, Estonia, Ireland, Spain, France, Italy, the Netherlands, Austria Slovenia and Finland. The latest observations are for the third quarter of 2024.

House price dynamics in the recent cycle reflected particularly buoyant developments in the prices of existing dwellings. These dwellings account for the bulk of housing transactions and their prices therefore typically define the shape of the overall house price cycle. At the peak of the cycle, the annual growth rate of prices for existing dwellings was half a percentage point higher than that of new dwellings and at the trough it was around 6 percentage points lower, a larger difference than that which had been observed in the GFC and – in particular – the SDC cycles (Chart 5). This likely reflects the long duration of the housing market upturn that may, towards its end, have increasingly been facing supply constraints for new dwellings, making buyers increasingly turn to existing properties. This was then reinforced during the pandemic when construction activity slumped and, at the same time, buyers were looking for dwellings that implied an upgrade in terms of square meters which could be situated in locations with hitherto lower price levels.[6] Once the exuberance element in buying existing dwellings had faded and energy costs became a more relevant element in the type of preferred housing, prices for existing dwellings dwindled much faster than those for new dwellings. The latter's unwinding was also more constrained, as there were limits to lowering prices in view

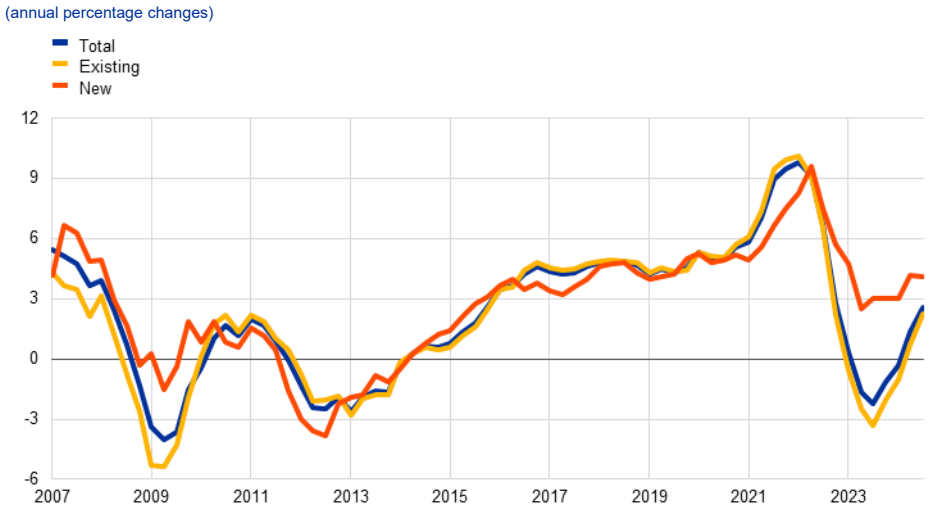
5 This is confirmed by OECD relocation data available until the fourth quarter of 2022 (most countries only show up to the fourth quarter of 2021), illustrating a shift in demand away from metropolitan centres to suburbs in close proximity to metropolitan centres (reduction in the price-to-distance-gradient) or to small cities (however not necessarily to rural areas as such). See "Expanding the doughnut? How the geography of housing demand has changed since the rise of remote work with COVID-19", *OECD Regional Development Papers*, OECD, 11 October 2023.

6 See the box entitled "The impact of rising mortgage rates on the euro area housing market", *Economic Bulletin,* Issue 6, ECB, 2022. Eurostat's data on housing and living conditions suggest that the rate of housing cost overburden was larger in cities than rural areas in recent years, and that there was a temporary increase in the share of people living in overcrowded homes during the pandemic years.

of the high construction costs under which new dwellings had been built in recent years.

Chart 5

Euro area residential property prices by types of dwelling



Sources: ECB, Eurostat and ECB staff calculations.
Notes: Eurostat's euro area series for new and existing dwellings only starts in the fourth quarter of 2009. Data for the period prior to this are based on backcasting with growth rates from a GDP-weighted country aggregation, including Germany, France, Spain, the Netherlands, Belgium, Estonia, Greece, Croatia, Latvia, and Lithuania. The latest observations are for the third quarter of 2024.

The stylised facts indicate that the recent house price cycle was different from those during the GFC and the SDC. The price boom appears to have been broader based across categories and may reflect the fact that increases had also extended to less central locations or to less modern dwellings, particularly in relation to pandemic-related shifts in preferences. This implies that the boom may have come with less financial stretching and exposure of buyers than at other times and that this helped to contain the subsequent bust (Section 3). Ultimately, the price correction unwound the additional surge in prices in the aftermath of the pandemic but left the sustained increases recorded in pre-pandemic years in these price levels. The busts during the GFC and SDC cycles had implied relatively more erosion of previous multi-year price gains.

3 Key factors shaping the recent house price cycle

Model-based analysis suggests that, generally speaking, the largest driver in boom-bust house price cycles is the demand factor. The model used in Box 1 identifies housing-specific demand shocks as the main drivers of the house price downturns during the GFC and SDC cycles, but not during the latest downturn. Instead, aggregate supply shocks related to energy price shocks and pandemic-related supply disruptions had a relatively larger impact. Contrary to past cycles, the model also sees monetary policy more noticeably contributing to the recent downturn than the past declines in house prices. This is consistent with the profound change from a long period of low mortgage interest rates to a period of steep tightening of

financing conditions and possible non-linear effects emanating from such a change.[7] Decompositions of house price developments into originating shocks can be a starting point for an assessment of driving factors but they are naturally model-specific, depending on the selection of variables and shocks and how these shocks are identified. Assessing house price cycles therefore also benefits from a model-free discussion of pertinent groups of factors and indicators.[8]

Demand factors go some way towards explaining the recent house price cycle. Looking beyond the short-lived constraints in activity during the lockdown of the pandemic period, growth in housing investment and transactions point to a period of sustained strong housing demand in the run-up to the recent house price boom (Chart 6, panel a). This is also reflected in the continued rise of intentions to purchase or build a home to levels not seen since the introduction of the euro. Indeed, the pandemic period appears to have ultimately coincided with an additional boost in demand, likely related to housing relocations in times of an increased preference for remote working.[9] This is in line with a large shock in preferences that some models identify for the pandemic period as compared with what had been observed in previous house price cycles.[10] The subsequent fall in housing demand effectively unwound the exceptional pandemic surge in demand and was relatively limited. Housing investment and transactions declined but show signs of having bottomed out, and intentions to purchase a home have only seen a temporary dent at continued high levels (Chart 6, panel a). This provides the basis for the observed, relatively fast recovery in house prices.

7 See, for instance, "House prices and ultra-low interest rates: exploring the non-linear nexus" *Empirical Economics,* September 2024 or "Drivers of rising house prices and the risk of reversal", *Financial Stability Review,* ECB, May 2022.

8 For an example of different demand and supply factors in the housing market, see the article entitled "The state of the euro area housing market", *Economic Bulletin,* Issue 7, ECB, 2018.

9 See Richard, M., "Working from home: Effects on housing demand and inequality", *The ECB Blog*, 8 January 2025. The COVID-19 lockdowns induced a structural change in the organisation of work (i.e. working from home), changing what residents looked for in a house, increasing overall demand for housing but in particular for larger properties located further away from city centres.

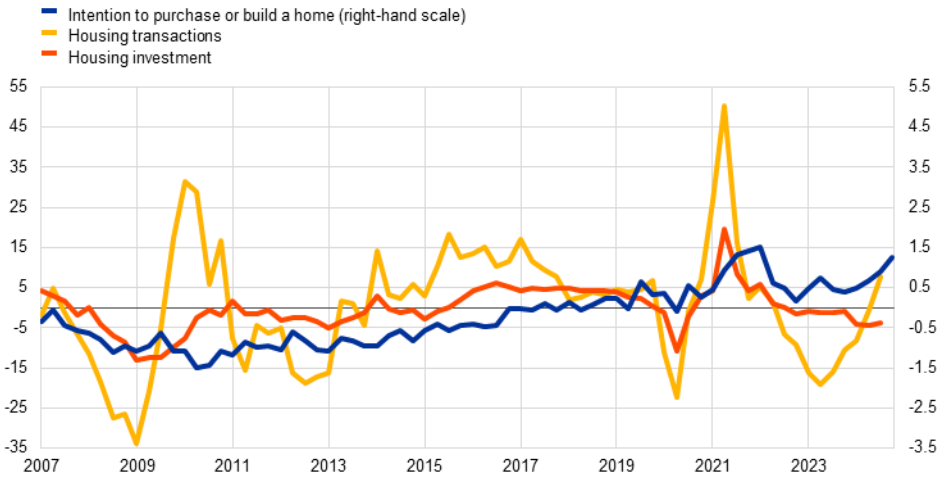
10 See "Analysing drivers of residential real estate (RRE) prices and the effects of monetary policy tightening on RRE vulnerabilities", *Macroprudential Bulletin,* Issue 10, ECB, 2022.

Chart 6

Euro area indicators relevant for housing demand

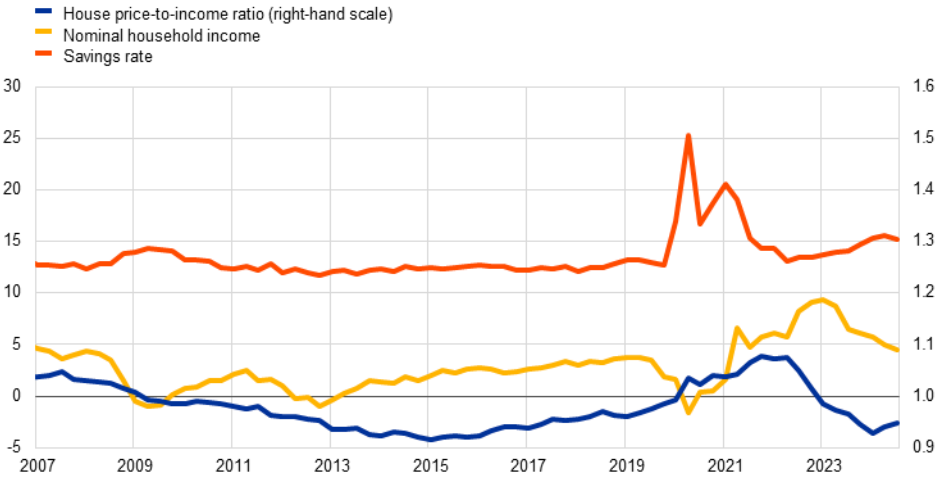
a) Housing-specific indicators

(standardised percentage balances, annual percentage changes)



b) Aggregate demand indicators

(index 2005 Q1 = 1, annual percentage changes, percentage of gross disposable income)



Sources: European Commission, Eurostat, ECB, Agenzia Entrate and ECB staff calculations.
Notes: Standardisation of intentions to buy implies a zero mean and unit standard deviation from the first quarter of 1999 to 2019. Housing transactions are an aggregation of Eurostat's available data and information from national sources for euro area countries that together account for around 70% of euro area GDP. This coverage declines for years before 2015. The latest observations are for the third quarter of 2024, except for the fourth quarter of 2024 for intentions to buy a home.

Robust growth in disposable income supported housing demand and the debt servicing capacity of euro area households. Unlike in the GFC and SDC downturns, labour market conditions generally remained favourable during the recent house price cycle. Together with income support measures by governments during the pandemic and energy crises, this allowed household income to increase more than mortgage costs and contained the increase in the house price-to-income ratio during the house price boom (Chart 6, panel b). Households could afford higher mortgage payments and the savings accumulated during the pandemic also put them in a position to make larger downpayments. The financial burden for homeowners with a mortgage remained overall relatively low compared both with

that for owners without a mortgage or that for tenants paying rents, as well as with what was the relative burden in earlier house price cycles.[11] In contrast to the GFC and SDC cycles, the recent downturn in house prices coincided with robust income developments and the decline in the house price-to-income ratio therefore implied an improvement in affordability that has underpinned the current recovery of house prices despite less favourable financing conditions than at the start of the house price cycle.

The role of tighter financing conditions in the adjustment of house prices was mitigated by relatively sound balance sheet positions. The sharp increase in interest rates in response to the 2022 surge in inflation coincided with still substantially overvalued house prices.[12] This could have been expected to lead to a much stronger bust in prices than was ultimately observed. One reason for differences with corresponding adjustments in the GFC and SDC cycles was that these overvaluations coincided with sounder household and bank balance sheet positions than had been the case at the time of the previous two cycles. Much lower mortgage credit growth and a lower debt service ratio compared with the pre-GFC period, which was partly due to the more widespread use of macroprudential policy, also implied more resilient household balance sheets and less risk of a disorderly unwinding of the house price boom, and consequently less volatility in the house price cycle (Chart 7).[13] Moreover, many euro area countries had moved in the direction of a stronger prevalence of fixed rate mortgages, which temporarily protect homeowners from higher borrowing rates and imply lower default rates that could exacerbate house price busts. At the same time, this suggests that, for many households, nominal mortgage payments are likely to increase once their current fixed rate contracts expire and are replaced by those with meanwhile higher interest rates.[14] The recent normalisation of interest rates limits this risk, as it kept the period during which households had to renegotiate their contracts at higher rates rather short. It also ends a short period in which the return on housing as an asset had become less attractive than the return on fixed income investments, which had therefore dampened the demand for housing.[15]

11 See Eurostat's data on housing cost overburden by tenure status. The latest available data for the euro area are for 2023.

12 Across relevant indicators, average house price overvaluation in mid-2022 remained above 10% (Chart 2, panel b). However, measures deriving valuations on the basis of real house prices, and thus accounting for the surge in inflation, suggest that overvaluation had already unwound by that stage.

13 See, for instance, "Assessing the strength of the recent residential real estate expansion", *Financial Stability Review,* ECB, November 2021.

14 According to the ECB Financial Stability Review in November 2023, estimates based on nowcasted survey data show that over 30% of the euro area's outstanding fixed rate mortgage stock is expected to expire within the next ten years.

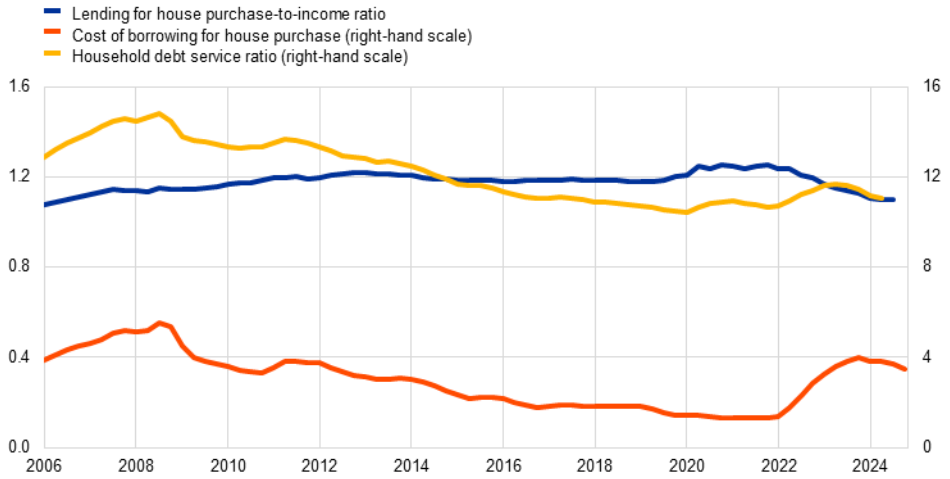
15 For a discussion, see the box entitled "Why has housing lost its lure? Evidence from the ECB's Consumer Expectations Survey", *Economic Bulletin*, Issue 5, ECB, 2023.

Chart 7

Euro area household borrowing and debt servicing conditions

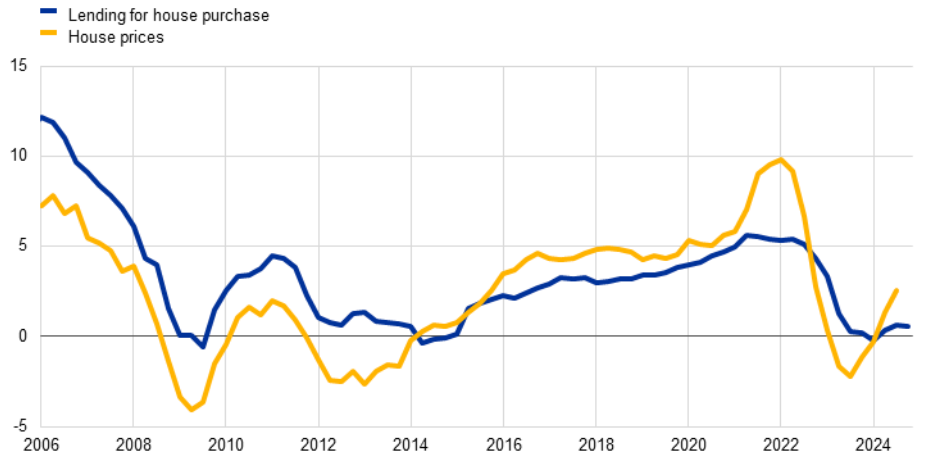
a) Household borrowing conditions

(index 2005 Q1 = 1, annual percentage changes)



b) Lending for house purchase and house prices

(annual percentage changes)



Sources: Eurostat, ECB (MIR) and ECB staff calculations.
Notes: The lending for house purchase-to-income ratio is the lending for house purchase divided by households' disposable income based on the aggregate macroeconomic series. This ratio is different to that of lending standards, which is calculated at loan level at origination. The debt service ratio is defined as the ratio of fixed debt service costs (i.e. interest payments plus amortisations) to disposable income, as reported in the ECB Financial Stability Review in May 2024. The latest observations are for the third quarter of 2024, except for the fourth quarter of 2024 which is for the cost of borrowing and for the lending for house purchase.

The impact of monetary policy tightening on house prices also depends on the link between the housing market and the rental market. If higher interest rates imminently dampen affordability and therefore house purchases, households can be expected to turn more strongly to the rental market to satisfy their demand for shelter.[16] This should put downward pressure on house prices and upward pressure on rental prices (Box 2 discusses the relation between house prices and rental prices). However, the elasticity of households to shift between owning and renting depends on both the general level of rental prices and the availability of let property.

[16] See, for instance, Castellanos et al., "The aggregate and distributional implications of credit shocks on housing and rental markets", *Working Paper Series*, No 2977, ECB, 2024.

In this respect, the tightening of financing conditions has also affected the attractiveness of investing in buy-to-let property and ultimately the supply in the rental market. This holds true even more if prices in the rental market are subject to regulation or if the availability in the rental market is subject to shocks such as immigration.

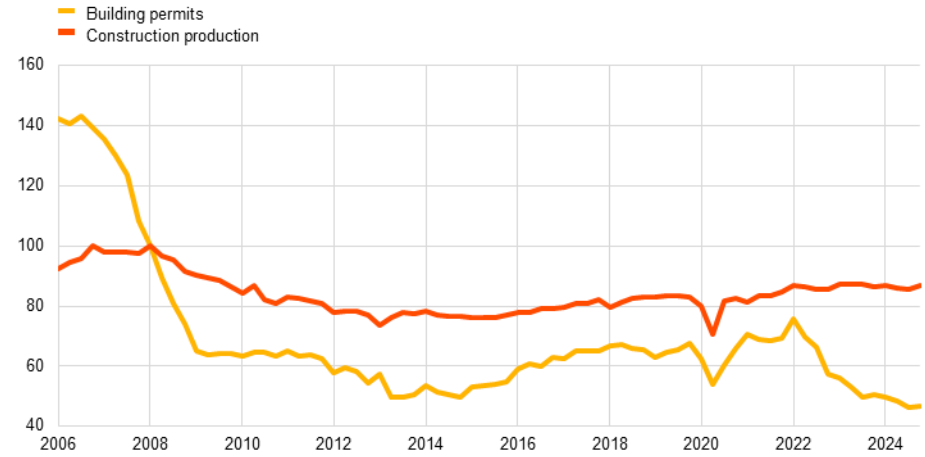
The impact of housing demand and monetary policy factors on house prices also depends on the state of the housing supply. In this respect, the model in Box 1 points to a relatively large role played by supply shocks in the recent house price downturn. This relates to both housing-specific and aggregate supply factors. Building permits, as a proxy for new housing supply, increased since the SDC cycle but remained at substantially lower levels than during the GFC cycle. In the recent house price downturn, they declined sharply reaching historical lows (Chart 8, panel a). This indicates that supply-side shortages prevail, and this helps to explain the relatively short-lived unwinding of house prices and their latest upturn as soon as improved financing conditions started to underpin demand. Economy-wide factors related to supply chain and energy price shocks also affected the construction sector and the supply of housing. Construction costs had risen sharply during the pandemic and post-pandemic periods related to both materials and labour shortages (Chart 8, panel b). This put upward pressure on house prices primarily via house prices for new buildings but also via those for existing buildings where the transaction was conditional upon prior renovation and maintenance. This has, for instance, been the case for measures that increase the energy efficiency of older buildings. The costs of such measures and the corresponding hesitance of potential buyers also help explain why prices for existing dwellings slumped much more than those for new dwellings.

Chart 8

Euro area indicators relevant for housing supply

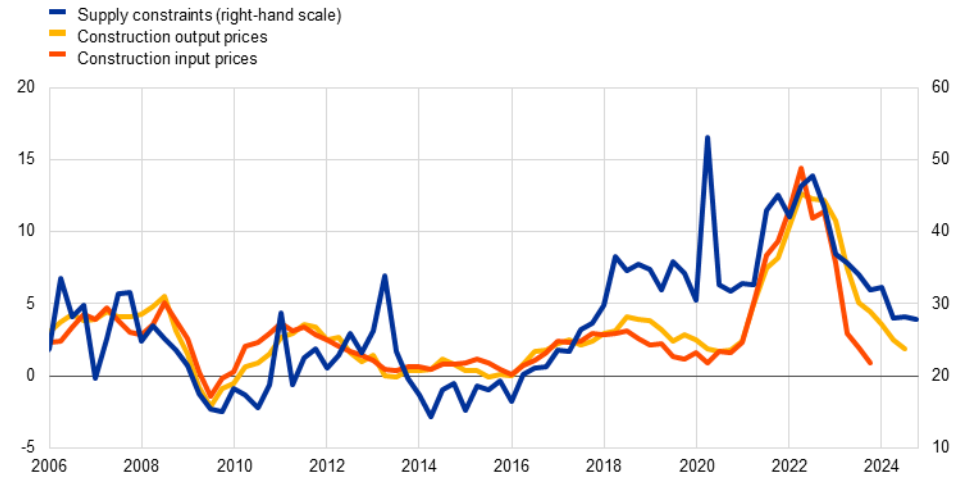
a) Housing-specific indicators

(index, 2008 Q1 = 100)



b) Aggregate supply indicators

(percentages, annual percentage changes)



Sources: Eurostat and ECB staff calculations.
Notes: For panel b), the series for construction input prices is only available until the fourth quarter of 2023. The latest observations are for the third quarter of 2024 for construction output prices and the fourth quarter of 2024 for building permits, construction production and supply constraints compiled on the basis of the European Commission's business survey for the construction sector.

Evidence from models and pertinent indicators corroborates the notion that the recent house price cycle exhibited some special features. This relates particularly to the strong upward demand shocks and their likely overlap with a strong preference shock during the house price boom. The pure unwinding of these shocks can explain a substantive part of the subsequent house price bust. The tightening of monetary policy and bank lending standards contributed to the turn of the cycle, despite resilient income fundamentals and constraints in the supply of housing.

Box 1
The fundamental drivers of euro area house prices

Prepared by Niccolò Battistini and Johannes Gareis

This box provides an empirical assessment of the fundamental drivers of house price developments in the euro area. To this end, it uses a structural Bayesian vector autoregression (SBVAR) model that includes real private consumption, the private consumption deflator, real housing investment, nominal house prices, the short-term risk-free interest rate, and the long-term interest rate spread.[17] The model imposes sign and zero restrictions on the responses of the model variables to various shocks.[18] In addition to aggregate demand and supply shocks, the model considers housing-specific demand and supply shocks, as well as a risk-free rate shock and a term spread shock. The latter two shocks refer to unexpected changes in the risk-free rate and the term spread beyond their systematic reaction to economic fluctuations. Hence, risk-free rate and term spread shocks capture conventional and unconventional monetary policy shocks, commonly interpreted as shocks affecting short-term risk-free rates and the slope of the yield curve, respectively.[19] In the context of the recent monetary policy tightening, these shocks broadly reflect the reversal of the ECB's loose monetary policy stance beyond historical regularities, through a steepening of the yield curve and a sequence of hikes in short-term rates to counter the exceptional rise in inflation. The model is estimated based on data between the first quarter of 1995 and the third quarter of 2024.[20]

To gain insight from a historical perspective, the model-based impact of fundamental drivers of euro area house prices is compared across upturns and downturns from different periods in the past, namely the global financial crisis and the sovereign debt crisis, as well as in the period from the recent monetary policy tightening up to the latest available quarter (Chart A). Considering these past periods, housing demand shocks always dominated downturns in house prices. Indeed, housing demand shocks played the largest role in the fall in house prices during the global financial crisis and the sovereign debt crisis, largely mirroring their crucial role in the build-up of house prices before the global financial crisis. Among the other shocks, contractionary housing supply shocks led to higher house prices during the upturns of both of these periods, while contractionary aggregate supply shocks weighed on house prices during the downturns of both of these periods, highlighting the detrimental wealth effects of cost-push inflation for households. Moreover, term spread shocks moderately supported house prices throughout the various phases of the past periods. Instead, risk-free rate shocks exerted a limited impact on house price fluctuations during the past periods under review.

17 All variables are included in log levels, except for the short-term risk-free interest rate and the long-term interest rate spread, which are measured in levels. The short-term risk-free interest rate refers to the three-month EURIBOR and the long-term interest rate spread is the difference between the euro area ten-year government bond yield and the short-term risk-free interest rate.

18 See, among others, Smets, F. and Jarociński, M., "House prices and the stance of monetary policy", *Working Paper Series*, No 891, ECB, April 2008; and Nocera, A. and Roma, M., "House prices and monetary policy in the euro area: evidence from structural VARs", *Working Paper Series*, No 2073, ECB, June 2017.

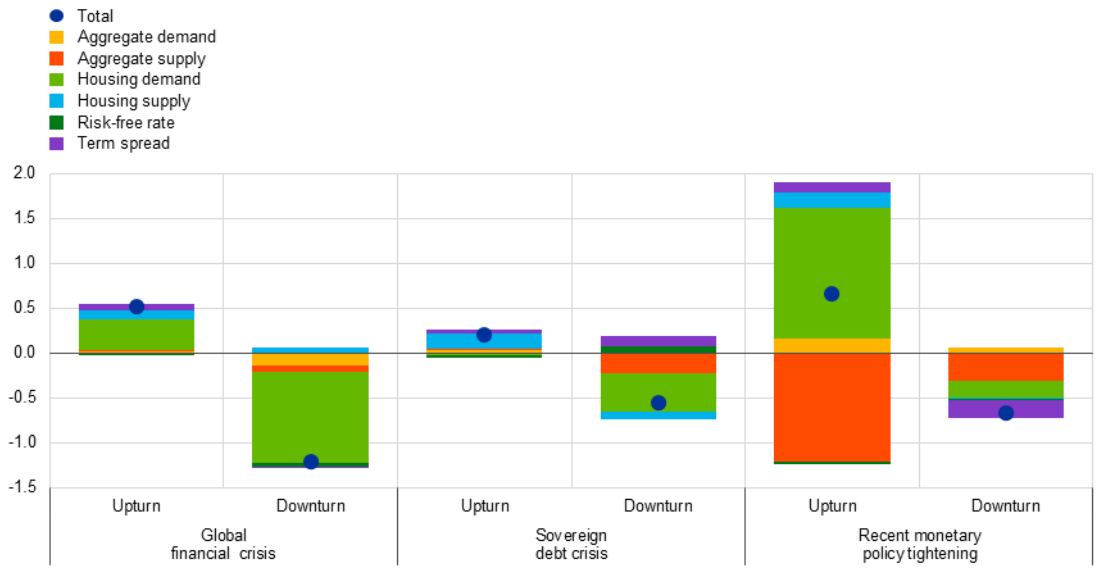
19 See, for instance, Baumeister, C. and Benati, L., "Unconventional Monetary Policy and the Great Recession: Estimating the Macroeconomic Effects of a Spread Compression at the Zero Lower Bound", *International Journal of Central Banking*, Vol. 9, Issue 2, June 2013, pp. 165-212.

20 The model takes account of the marked volatility of macroeconomic data in 2020 by using a pandemic heteroskedasticity adjustment. See Lenza, M. and Primiceri, G., "How to estimate a vector autoregression after March 2020", *Journal of Applied Econometrics*, Vol. 37, Issue 4, June 2022, pp. 688-699.

Chart A

The impact of fundamental drivers on euro area house prices during different periods

(average quarterly changes during the considered periods, percentages and percentage points, deviations from trend)



Sources: Eurostat, ECB, and ECB staff calculations.
Notes: The chart shows the average quarterly impact of identified shocks derived from a SBVAR model with sign and zero restrictions on house prices over the periods under review. The global financial crisis includes the period from the first quarter of 2004 to the second quarter of 2008 for the upturn and the period from the second quarter of 2008 to the second quarter of 2009 for the downturn, the sovereign debt crisis from the second quarter of 2009 to the third quarter of 2011 for the upturn and from the third quarter of 2011 to the first quarter of 2013 for the downturn, and the recent monetary policy tightening from the first quarter of 2020 to the fourth quarter of 2021 for the upturn and from the fourth quarter of 2021 to the third quarter of 2024 for the downturn.

Turning to the recent monetary policy tightening, according to the model results, the decline in house prices was broadly in line with the previous downturns during the global financial and the sovereign debt crises in terms of average quarterly size. Yet, it was substantially different in nature, reflecting a different combination of fundamental drivers. First, compared with the previous two crises, aggregate supply shocks played a larger role. This likely reflected the lasting effects of the energy price shock resulting from Russia's war against Ukraine, which extended and exacerbated the pandemic-related supply disruptions and pushed up inflation to exceptionally high levels, dampening general economic and housing market activity. Moreover, housing demand shocks also exerted a negative impact, but their effect was smaller as compared with the previous two crisis periods, likely reflecting the prolonged impact of the significant shift in household preferences towards residential (rather than other types of) real estate during the COVID-19 pandemic, induced by the mandatory and voluntary restrictions on mobility, the diffusion of remote working and the accumulation of excess savings.[21] Finally, while risk-free rate shocks played a limited role in the recent decline in house prices, as was also the case in previous periods, term spread shocks significantly dampened house price growth in contrast to previous periods. These results are consistent with the timing of the ECB's recent monetary policy tightening, with the ECB first announcing the exit from unconventional monetary policy at the end of 2021, before raising

[21] See the article entitled "The euro area housing market during the COVID-19 pandemic", *Economic Bulletin*, ECB, Issue 7, 2021 and Gamber, W., Graham, J. and Yadav, A., "Stuck at home: Housing demand during the COVID-19 pandemic", *Journal of Housing Economics*, Vol. 59, Part B, March 2023.

monetary policy rates as of mid-2022.[22] In sum, the model results show that while the house price decline in the previous two downturns was mainly driven by housing-specific demand shocks, the latest downturn in house prices was characterised by a variety of factors, with prominence being given to the lasting effects of the pandemic and other subsequent adverse macroeconomic shocks.

Box 2
The relation between rental and house prices: how indicative is this for the euro area?

Prepared by Moreno Roma

The asset pricing model and the user cost of capital model provide conceptual frameworks for housing valuation. The first model works with the discounted flow of future rental income, the second with the annual cost of a unit of owner-occupied housing services. To the extent that owner-occupied housing costs can be approximated by rental prices, both frameworks can entail a long-term theoretical relation between house prices and rental prices.[23] House prices should therefore be high, as compared with rental prices, when, among other things, interest rates are low, expected house price appreciation is high, the risk premium for holding a housing asset is low or maintenance costs are low. Over the past 25 years, house prices in the euro area more than doubled and, on average, substantially outpaced rental prices. The house price-to-rental price ratio drifted upwards from its long-term average for protracted periods of time and remained above this average even after the recent correction of house prices (Chart A).[24] Such a situation would normally suggest a downside risk to house price growth and an upside risk to rental price growth, as it suggests that buying is relatively expensive as compared to renting, with households adjusting their relative demand.

22 This result is also due to a larger role of term spread shocks relative to risk-free rate shocks in explaining house price fluctuations on average (with the opposite applying to housing investment). This is consistent with the larger importance of unconventional relative to conventional monetary policy shocks in house prices (with the opposite applying to construction value added), documented by Battistini, N., Falagiarda, M., Hackmann, A. and Roma, M., "Navigating the housing channel of monetary policy across euro area regions", *European Economic Review*, Vol. 171, January 2025, 104897.

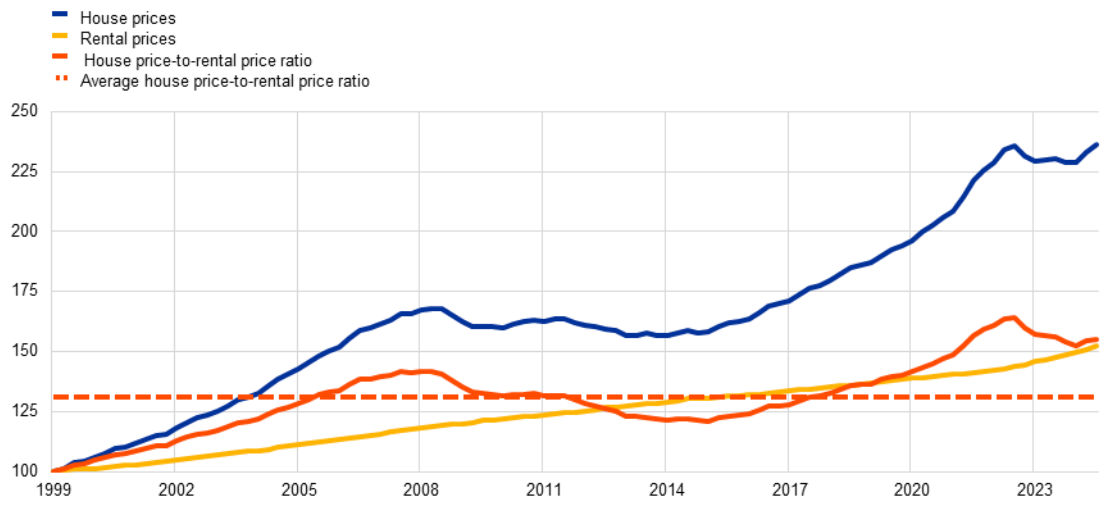
23 For a discussion, see, for instance, Dieckelmann et al., "House prices and ultra-low interest rates: exploring the non-linear nexus", *Working Paper Series*, No 2789, ECB, February 2023.

24 See the box entitled "Rent inflation in the euro area since the crisis", *Economic Bulletin,* Issue 4, ECB, 2019. Note that the actual rent component in the HICP mainly reflects existing contracts and only in part new lettings, which are more subject to market forces and more responsive to housing market conditions.

Chart A

House prices, rental prices and the house price-to-rental price ratio in the euro area

(index 1999 = 100)

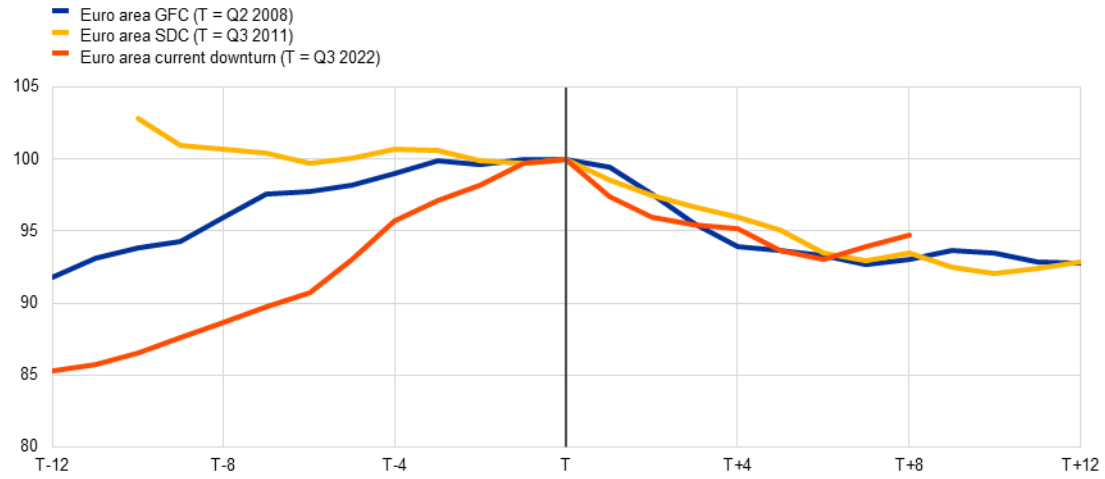


Sources: Eurostat and ECB staff calculations.
Notes: The latest observations are for the third quarter of 2024.

Chart B

Euro area house price-to-rental price ratio across boom-bust cycles

(index, peak (T) = 100)



Sources: Eurostat and ECB staff calculations.
Notes: The latest observations are for the third quarter of 2024.

The magnitude of decline in the house price-to-rental price ratio following a house price peak is broadly comparable across boom-bust house price cycles. This holds true even in the recent house price cycle, albeit the increase in this ratio in the run-up to the peak was much stronger than during the GFC and SDC cycles owing to the sizeable and sustained increase in house prices until mid-2022 (Chart B). This is in line with the extended period of exceptionally low interest rates, the expectation of house price appreciation likely triggered by sustained increases in house prices, or with a lower risk-premium of holding a housing asset in times when transactions were high and working from home options lowered the hurdle for tying oneself to a house rather than retaining flexibility by renting.

Beyond economic and financial considerations, the decision between renting and buying is also related to preferences. According to the ECB's Consumer Expectation Survey (CES), the "desire to own instead of renting" was the third most important reason for moving in the period from February 2023 to February 2024.[25] The total share of euro area households renting a property increased by around 1 percentage point since 2020 to close to 35% in 2023. Such developments can have many grounds (including country-specific motives). For example, a limited housing supply, tighter financing conditions or reduced access to credit can make purchasing a property more difficult and push households towards renting. In addition, regulation and consumer protection in the rental market can make renting a preferred option.[26] The stickiness of rents due to regulation and the fact that HICP rental prices primarily cover existing contracts call for caution in using the house price-to-rental price ratio as an unambiguous valuation measure and indication of whether there is an adjustment need for house prices. This is underpinned by evidence from a new rental price indicator based on the ECB's CES, which shows that dynamics in rental prices have lately been driven increasingly by recent moves towards rental accommodation (see the box entitled "Euro area rent developments: insights from the CES" in this issue of the Economic Bulletin).

To this end, an additional useful gauge to benchmark house prices are the actual costs incurred to acquire and maintain a property as summarised in Eurostat's owner-occupied housing price index (OOHPI). While the house price-to-rental price ratio remains well above its long-term average, the house price-to-OOHPI ratio did not increase as much in the first instance, declining substantially, however, during the recent house price downturn as the OOHPI continued to show moderating but positive rates of growth (Chart C). The recent large gap observed between the two ratios can be explained by considering the breakdown of the OOHPI into its acquisition and maintenance components. These illustrate that the major repairs and maintenance costs of owned property (quite aside from the acquisition costs) have been developing more dynamically than rental prices. This underpins the notion that a high share of existing rental contracts (possibly fixed for extended periods) in the rental price index does not necessarily make this index a good benchmark for assessing whether house prices correspond to the fundamental conditions in real time.

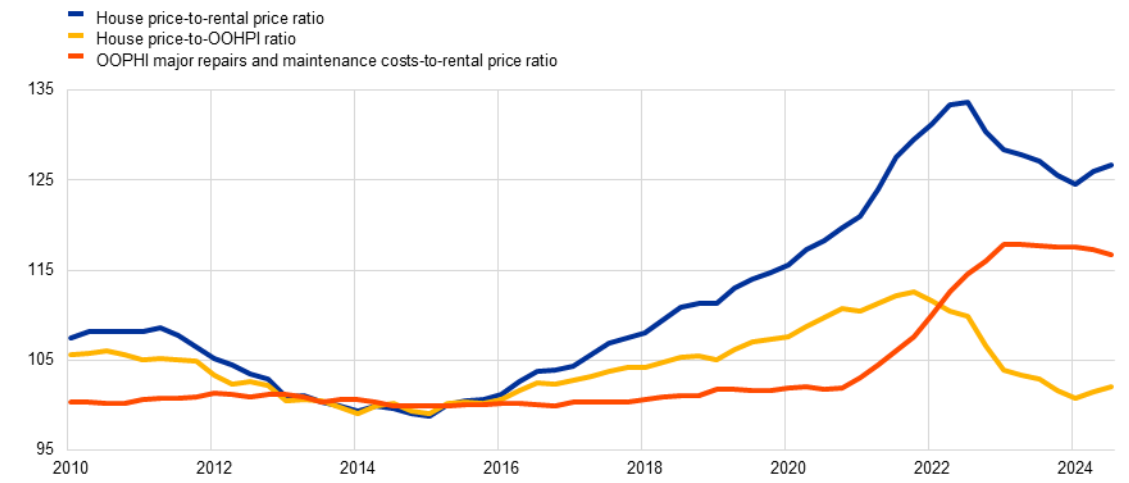
[25] Around one-quarter of those households that moved mentioned the "desire to own instead of renting". The first reason was the "desire to improve living conditions" and the second the "desire to spend less on housing". For further details, see the box entitled "Euro area rent developments: insights from the CES" in this issue of the Economic Bulletin, ECB, 2025.

[26] See, for instance, Castellanos, J., Hannon, A. and Paz-Pardo, G., "The aggregate and distributional implications of credit shocks on housing and rental markets", which shows that a shock that reduces credit access to potential mortgagors increases rents, reduces house prices and decreases homeownership rates, *Working Paper Series*, No 2977, ECB, 2024.

Chart C

Ratios of house prices to rental prices and housing costs in the euro area

(index 2015=100)



Sources: Eurostat and ECB staff calculations
Notes: Data for the owner-occupied housing price index are available from 2010 to the third quarter of 2024. The latest observations are for the third quarter of 2024.

4 Conclusion

The latest data confirm that the recent downturn in house prices was relatively mild compared with previous bust periods. By the third quarter of 2024, the level of house prices in the euro area had moved back above the earlier peak level in 2022. While estimates of housing valuations are surrounded by uncertainty, current readings imply that the relatively mild and short-lived decline in house prices implied less adjustment to overvaluations than had been observed during the GFC and the SDC house price cycles (although this adjustment has been more substantial in measures derived on the basis of real house prices). One reason for the limited adjustment is that the bust in house prices took place in a limited number of countries and, therefore, did not bear the same hallmarks as an outright recession as in previous periods, with income fundamentals remaining solid in the most recent house price cycle. In this respect, it resembled an orderly unwinding of the additional boost in house prices recorded during the pandemic period.

While a relatively shallow bust in house prices circumvents adverse consequences for household and bank balance sheets, the level of house prices have remained high. This has negatively affected the affordability of housing despite a meanwhile less tight monetary policy. High construction costs and high purchase prices for housing currently stand in the way of generating additional supply in the housing market, which also implies scarcity in the rental market. In view of the combination of supply limitations and continued sound demand fundamentals, house price developments may well continue on their upward path, even though this may not be an entirely healthy outlook for the economy as a whole.

Statistics

Contents

Further information

Data published by the ECB can be accessed from the ECB Data Portal:	https://data.ecb.europa.eu/
Detailed tables are available in the ”Publications” section of the ECB Data Portal:	https://data.ecb.europa.eu/publications
Methodological definitions, general notes and technical notes to statistical tables can be found in the ”Methodology” section of the ECB Data Portal:	https://data.ecb.europa.eu/methodology
Explanations of terms and abbreviations can be found in the ECB’s statistics glossary:	https://www.ecb.europa.eu/home/glossary/html/glossa.en.html

Conventions used in the tables

-	data do not exist/data are not applicable
.	data are not yet available
...	nil or negligible
(p)	provisional
s.a.	seasonally adjusted
n.s.a.	non-seasonally adjusted

1 External environment

1.1 Main trading partners, GDP and CPI

	GDP [1] (period-on-period percentage changes)						CPI (annual percentage changes)						
							OECD countries						
	G20	United States	United Kingdom	Japan	China	Memo item: euro area	Total	excluding food and energy	United States	United Kingdom (HICP)	Japan	China	Memo item: euro area [2] (HICP)
	1	2	3	4	5	6	7	8	9	10	11	12	13
2022	3.3	2.5	4.8	0.9	3.0	3.5	9.5	6.8	8.0	9.1	2.5	2.0	8.4
2023	3.3	2.9	0.4	1.5	5.2	0.4	6.8	7.0	4.1	7.4	3.2	0.2	5.4
2024	.	2.9	0.9	0.1	5.0	.	5.2	5.7	2.9	2.5	2.7	0.2	2.4
2024 Q1	0.8	0.4	0.8	-0.5	1.5	0.3	5.7	6.5	3.2	3.5	2.6	0.0	2.6
Q2	0.7	0.7	0.4	0.7	0.9	0.2	5.8	6.1	3.2	2.1	2.7	0.3	2.5
Q3	0.8	0.8	0.0	0.4	1.3	0.4	4.9	5.3	2.6	2.0	2.8	0.5	2.2
Q4	.	0.6	0.1	0.7	1.6	0.1	4.6	5.0	2.7	2.5	2.9	0.2	2.2
2024 Sep.	-	-	-	-	-	-	4.5	5.2	2.4	1.7	2.5	0.4	1.7
Oct.	-	-	-	-	-	-	4.6	5.1	2.6	2.3	2.3	0.3	2.0
Nov.	-	-	-	-	-	-	4.7	5.0	2.7	2.6	2.9	0.2	2.2
Dec.	-	-	-	-	-	-	4.7	4.9	2.9	2.5	3.6	0.1	2.4
2025 Jan.	-	-	-	-	-	-	4.7	.	3.0	3.0	4.0	0.5	2.5
Feb.	-	-	-	-	-	-	.	.	.	.	.	.	2.4

Sources: Eurostat (col. 6, 13); BIS (col. 9, 10, 11, 12); OECD (col. 1, 2, 3, 4, 5, 7, 8).
1) Quarterly data seasonally adjusted; annual data unadjusted.
2) Data refer to the changing composition of the euro area.

1.2 Main trading partners, Purchasing Managers' Index and world trade

	Purchasing Managers' Surveys (diffusion indices; s.a.)									Merchandise imports [1]		
	Composite Purchasing Managers' Index						Global Purchasing Managers' Index [2]					
	Global [2]	United States	United Kingdom	Japan	China	Memo item: euro area	Manufacturing	Services	New export orders	Global	Advanced economies	Emerging market economies
	1	2	3	4	5	6	7	8	9	10	11	12
2022	-	-	-	-	-	-	-	-	-	3.1	4.6	1.8
2023	-	-	-	-	-	-	-	-	-	-0.6	-3.9	2.6
2024	52.9	53.7	52.5	51.3	52.1	50.1	50.7	53.1	49.0	2.6	3.5	1.8
2024 Q1	52.6	52.2	52.9	51.3	52.6	49.2	51.1	52.4	49.2	0.0	0.7	-0.6
Q2	53.2	53.5	53.1	51.5	53.2	51.6	52.1	53.3	50.1	1.3	1.9	0.7
Q3	52.9	54.3	53.1	52.5	50.9	50.3	49.8	53.4	48.4	1.2	1.9	0.6
Q4	53.0	54.8	50.9	50.1	51.8	49.3	49.9	53.3	48.4	1.0	0.5	1.4
2024 Sep.	52.4	54.0	52.6	52.0	50.3	49.6	49.1	52.9	47.5	1.2	1.9	0.6
Oct.	52.8	54.1	51.8	49.6	51.9	50.0	50.1	53.1	48.3	1.4	1.2	1.6
Nov.	53.2	54.9	50.5	50.1	52.2	48.3	50.4	53.1	48.6	0.7	0.6	0.8
Dec.	53.2	55.4	50.4	50.5	51.4	49.6	49.2	53.8	48.2	1.0	0.5	1.4
2025 Jan.	52.0	52.7	50.6	51.1	51.1	50.2	50.7	52.2	49.4	.	.	.
Feb.	.	50.4	50.5	.	.	50.2	51.5	.	49.6	.	.	.

Sources: S&P Global Market Intelligence (col. 1-9); CPB Netherlands Bureau for Economic Policy Analysis and ECB calculations (col. 10-12)
1) Global and advanced economies exclude the euro area. Annual and quarterly data are period-on-period percentages; monthly data are 3-month-on-3-month percentages. All data are seasonally adjusted.
2) Excluding the euro area.

2 Economic activity

2.1 GDP and expenditure components

(quarterly data seasonally adjusted; annual data unadjusted)

	GDP											
	Total	Domestic demand								External balance [1]		
		Total	Private consumption	Government consumption	Gross fixed capital formation				Changes in inventories [2]	Total	Exports [1]	Imports [1]
					Total	Total construction	Total machinery	Intellectual property products				
	1	2	3	4	5	6	7	8	9	10	11	12
	Current prices (EUR billions)											
2021	12,612.9	12,106.2	6,453.7	2,785.8	2,734.4	1,403.8	785.7	539.0	132.3	-506.7	6,111.6	5,605.0
2022	13,724.0	13,446.4	7,228.7	2,941.9	3,017.5	1,558.0	869.2	584.1	258.3	-277.6	7,395.7	7,118.0
2023	14,594.5	14,077.8	7,736.2	3,093.0	3,195.1	1,641.9	925.8	621.1	53.4	-516.7	7,375.6	6,858.9
2023 Q4	3,706.6	3,570.4	1,960.5	791.6	814.7	411.9	230.6	170.6	3.6	-136.2	1,834.4	1,698.2
2024 Q1	3,738.6	3,564.8	1,981.3	796.8	799.0	413.7	226.6	157.1	-12.2	-173.8	1,852.0	1,678.1
Q2	3,764.0	3,578.7	1,989.5	810.4	782.1	410.7	227.9	141.9	-3.3	-185.3	1,894.4	1,709.1
Q3	3,799.6	3,639.2	2,008.8	819.3	801.9	412.0	224.9	163.3	9.1	-160.5	1,870.0	1,709.6
	as percentage of GDP											
2023	100.0	96.5	53.0	21.2	21.9	11.3	6.3	4.3	0.4	-3.5	-	-
	Chain-linked volumes (prices for the previous year)											
	quarter-on-quarter percentage changes											
2024 Q1	0.3	-0.4	0.3	0.1	-2.3	-0.2	-1.2	-8.8	-	-	1.1	-0.3
Q2	0.2	-0.1	0.0	1.1	-2.4	-0.9	0.4	-10.5	-	-	1.5	1.1
Q3	0.4	1.3	0.7	0.6	2.0	-0.2	-1.9	14.7	-	-	-1.5	0.2
Q4	0.1	.	.	.	.	.	.	.	-	-	.	.
	annual percentage changes											
2021	6.3	5.1	4.7	4.4	3.8	6.2	8.0	-6.8	-	-	11.4	9.0
2022	3.5	3.8	4.9	1.1	2.0	0.0	3.7	4.9	-	-	7.3	8.4
2023	0.4	0.1	0.6	1.5	1.6	0.6	2.2	3.6	-	-	-0.7	-1.3
2024 Q1	0.4	0.0	1.0	2.0	-1.1	-1.8	-3.0	3.5	-	-	-0.7	-1.7
Q2	0.5	-0.7	0.5	2.7	-3.2	-1.9	-2.3	-8.4	-	-	1.9	-0.6
Q3	0.9	0.9	1.0	2.5	-1.4	-1.6	-4.6	4.1	-	-	1.4	1.2
Q4	0.9	.	.	.	.	.	.	.	-	-	.	.
	contributions to quarter-on-quarter percentage changes in GDP; percentage points											
2024 Q1	0.3	-0.4	0.2	0.0	-0.5	0.0	-0.1	-0.4	0.0	0.7	-	-
Q2	0.2	-0.1	0.0	0.2	-0.5	-0.1	0.0	-0.4	0.2	0.3	-	-
Q3	0.4	1.3	0.4	0.1	0.4	0.0	-0.1	0.6	0.4	-0.9	-	-
Q4	0.1	.	.	.	.	.	.	.	.	.	-	-
	contributions to annual percentage changes in GDP; percentage points											
2021	6.3	5.1	2.5	1.0	0.9	0.7	0.5	-0.3	0.6	1.5	-	-
2022	3.5	3.7	2.6	0.2	0.4	0.0	0.2	0.2	0.5	-0.2	-	-
2023	0.4	0.1	0.3	0.3	0.4	0.1	0.1	0.2	-0.9	0.3	-	-
2024 Q1	0.4	0.0	0.5	0.4	-0.2	-0.2	-0.2	0.1	-0.7	0.5	-	-
Q2	0.5	-0.7	0.3	0.6	-0.7	-0.2	-0.1	-0.3	-0.8	1.2	-	-
Q3	0.9	0.8	0.5	0.5	-0.3	-0.2	-0.3	0.2	0.1	0.1	-	-
Q4	0.9	.	.	.	.	.	.	.	.	.	-	-

Sources: Eurostat and ECB calculations.
1) Exports and imports cover goods and services and include cross-border intra-euro area trade.
2) Including acquisitions less disposals of valuables.

2 Economic activity

2.2 Value added by economic activity

(quarterly data seasonally adjusted; annual data unadjusted)

	Gross value added (basic prices)											
	Total	Agriculture, forestry and fishing	Manufac-turing energy and utilities	Const-ruction	Trade, transport, accomo-dation and food services	Infor-mation and commu-nication	Finance and insurance	Real estate	Pro-fessional, business and support services	Public administra-tion, education, health and social work	Arts, entertain-ment and other services	Taxes less subsidies on products
	1	2	3	4	5	6	7	8	9	10	11	12
Current prices (EUR billions)												
2021	11,253.2	185.1	2,158.3	592.5	2,017.7	602.8	521.9	1,275.7	1,363.7	2,208.1	327.5	1,359.7
2022	12,339.8	217.9	2,421.4	646.9	2,342.6	633.1	543.3	1,341.1	1,490.9	2,324.5	377.9	1,384.3
2023	13,203.6	225.2	2,584.8	721.5	2,440.3	678.4	605.2	1,477.4	1,602.1	2,460.1	408.7	1,390.9
2023 Q4	3,350.6	55.8	643.3	182.8	616.4	172.5	154.3	379.1	410.3	632.8	103.5	356.0
2024 Q1	3,369.9	55.8	631.8	184.6	623.5	176.2	157.7	384.9	412.6	637.8	105.1	368.7
Q2	3,389.7	56.0	627.5	184.7	628.5	177.1	159.4	386.9	418.4	645.3	105.9	374.3
Q3	3,417.4	56.6	632.0	185.1	632.2	179.6	160.6	386.9	422.9	654.5	107.1	382.3
as percentage of value added												
2023	100.0	1.7	19.6	5.5	18.5	5.1	4.6	11.2	12.1	18.6	3.1	-
Chain-linked volumes (prices for the previous year)												
quarter-on-quarter percentage changes												
2023 Q4	0.3	0.3	0.2	-0.3	-0.1	1.4	-0.1	0.8	0.8	0.5	-1.6	-2.4
2024 Q1	0.2	0.6	-0.7	0.1	0.4	0.7	0.9	1.0	-0.1	0.2	1.3	1.2
Q2	0.1	-1.9	-0.2	-1.0	0.3	0.4	-0.1	0.2	0.6	0.3	0.1	0.9
Q3	0.3	-0.7	0.4	-0.5	0.4	1.2	-0.1	-0.1	0.4	0.5	1.3	1.1
annual percentage changes												
2021	6.2	2.6	8.0	3.7	8.2	10.6	6.1	2.2	9.0	3.7	5.2	7.1
2022	3.9	-0.9	0.7	0.0	8.1	5.6	-1.8	2.8	6.2	2.9	16.3	0.3
2023	0.7	0.7	-1.5	1.3	0.0	4.4	-1.7	2.3	1.5	1.0	3.9	-2.2
2023 Q4	0.5	0.4	-2.4	1.8	-0.2	4.6	-2.0	2.3	1.8	1.1	2.5	-3.3
2024 Q1	0.6	0.3	-1.9	-1.3	0.6	4.0	0.0	2.1	1.8	1.2	1.7	-1.1
Q2	0.6	-2.0	-1.8	-1.9	0.7	3.2	0.2	2.2	2.0	1.5	1.2	-0.2
Q3	1.0	-1.7	-0.3	-1.8	0.9	3.8	0.5	1.9	1.8	1.6	1.1	0.8
contributions to quarter-on-quarter percentage changes in value added; percentage points												
2023 Q4	0.3	0.0	0.0	0.0	0.0	0.1	0.0	0.1	0.1	0.1	-0.1	-
2024 Q1	0.2	0.0	-0.1	0.0	0.1	0.0	0.0	0.1	0.0	0.0	0.0	-
Q2	0.1	0.0	0.0	-0.1	0.0	0.0	0.0	0.0	0.1	0.1	0.0	-
Q3	0.3	0.0	0.1	0.0	0.1	0.1	0.0	0.0	0.1	0.1	0.0	-
contributions to annual percentage changes in value added; percentage points												
2021	6.2	0.0	1.6	0.2	1.5	0.6	0.3	0.3	1.1	0.8	0.2	-
2022	3.9	0.0	0.1	0.0	1.5	0.3	-0.1	0.3	0.8	0.6	0.5	-
2023	0.7	0.0	-0.3	0.1	0.0	0.2	-0.1	0.3	0.2	0.2	0.1	-
2023 Q4	0.5	0.0	-0.5	0.1	0.0	0.2	-0.1	0.2	0.2	0.2	0.1	-
2024 Q1	0.6	0.0	-0.4	-0.1	0.1	0.2	0.0	0.2	0.2	0.2	0.1	-
Q2	0.6	0.0	-0.4	-0.1	0.1	0.2	0.0	0.2	0.2	0.3	0.0	-
Q3	1.0	0.0	-0.1	-0.1	0.2	0.2	0.0	0.2	0.2	0.3	0.0	-

Sources: Eurostat and ECB calculations.

2 Economic activity

2.3 Employment [1)]

(quarterly data seasonally adjusted; annual data unadjusted)

		By employment status		By economic activity									
	Total	Employees	Self-employed	Agriculture forestry and fishing	Manufacturing, energy and utilities	Construction	Trade, transport, accommodation and food services	Information and communication	Finance and insurance	Real estate	Professional, business and support services	Public administration, education, health and social work	Arts, entertainment and other services
	1	2	3	4	5	6	7	8	9	10	11	12	13
Persons employed													
as a percentage of total persons employed													
2022	100.0	86.0	14.0	2.9	14.2	6.4	24.2	3.3	2.3	1.1	14.2	24.9	6.6
2023	100.0	86.1	13.9	2.8	14.1	6.4	24.4	3.4	2.3	1.1	14.2	24.9	6.5
2024	100.0	.	.	.	.	.	.	.	.	.	.	.	.
annual percentage changes													
2022	2.4	2.5	1.9	-0.6	1.2	3.7	3.3	6.1	0.1	3.4	3.8	1.5	1.3
2023	1.4	1.5	0.8	-2.0	0.9	1.3	1.9	3.6	0.6	1.8	1.7	1.4	1.1
2024	0.9	.	.	.	.	.	.	.	.	.	.	.	.
2024 Q1	1.1	1.1	0.9	-0.4	0.2	1.6	1.4	2.8	0.9	0.3	0.9	1.5	0.4
Q2	1.0	1.0	0.9	-0.5	0.4	1.2	0.7	2.0	0.7	-1.3	0.8	1.7	0.9
Q3	0.9	0.9	1.0	-0.7	0.2	0.7	0.9	1.6	0.8	-1.7	1.0	1.6	1.0
Q4	0.7	.	.	.	.	.	.	.	.	.	.	.	.
Hours worked													
as a percentage of total hours worked													
2021	100.0	81.7	18.3	4.0	15.0	7.3	24.2	3.5	2.5	1.1	14.0	22.6	5.8
2022	100.0	81.7	18.3	3.8	14.7	7.4	25.1	3.6	2.4	1.1	14.2	22.0	5.9
2023	100.0	81.9	18.1	3.7	14.6	7.3	25.2	3.6	2.4	1.1	14.2	22.0	5.9
annual percentage changes													
2021	6.1	5.9	7.3	1.6	5.0	9.2	7.2	7.5	2.6	6.2	8.6	4.3	6.4
2022	3.6	3.6	3.3	-1.3	1.1	4.2	7.4	6.4	-0.7	5.3	4.4	0.8	4.8
2023	1.3	1.6	0.2	-2.1	0.6	0.9	1.7	3.5	0.2	1.4	1.7	1.5	1.6
2023 Q4	1.4	1.6	0.4	-1.1	0.5	1.6	1.5	3.3	0.5	0.5	1.5	1.8	1.5
2024 Q1	0.7	0.8	0.4	-2.1	-0.4	1.3	0.9	2.4	0.1	-0.9	1.1	1.0	0.4
Q2	0.8	0.9	0.5	-1.0	0.3	0.9	0.4	2.1	0.4	-2.2	1.0	1.4	1.5
Q3	0.5	0.6	-0.1	-1.7	-0.3	0.5	0.5	1.5	0.6	-2.5	0.9	0.8	1.2
Hours worked per person employed													
annual percentage changes													
2021	4.5	4.1	6.6	1.2	4.9	5.8	6.6	3.0	2.2	5.0	5.5	2.0	5.4
2022	1.1	1.1	1.4	-0.6	-0.1	0.6	4.0	0.2	-0.8	1.9	0.6	-0.7	3.5
2023	-0.1	0.0	-0.6	-0.1	-0.3	-0.4	-0.2	-0.1	-0.4	-0.3	0.0	0.1	0.5
2023 Q4	0.1	0.2	-0.5	-0.3	0.0	-0.2	-0.1	0.4	-0.1	-0.6	0.3	0.3	0.0
2024 Q1	-0.4	-0.4	-0.5	-1.8	-0.6	-0.3	-0.4	-0.4	-0.8	-1.1	0.2	-0.4	-0.1
Q2	-0.2	-0.1	-0.4	-0.5	-0.1	-0.3	-0.3	0.1	-0.3	-0.9	0.2	-0.2	0.6
Q3	-0.5	-0.3	-1.1	-1.1	-0.5	-0.2	-0.5	0.0	-0.2	-0.8	-0.1	-0.8	0.2

Sources: Eurostat and ECB calculations.
1) Data for employment are based on the ESA 2010.

2 Economic activity

2.4 Labour force, unemployment and job vacancies

(seasonally adjusted, unless otherwise indicated)

	Labour force, millions	Under-employment, % of labour force	Unemployment [1]												Job vacancy rate [3]
			Total		Long-term unemploy-ment, % of labour force [2]	By age				By gender					
						Adult		Youth		Male		Female			
			Millions	% of labour force		Millions	% of labour force	Millions	% of labour force	Millions	% of labour force	Millions	% of labour force		% of total posts
	1	2	3	4	5	6	7	8	9	10	11	12	13		14
% of total in 2020			100.0			80.1		19.9		51.3		48.7			
2022	167.962	3.1	11.400	6.8	2.7	9.148	6.0	2.252	14.6	5.732	6.4	5.668	7.2		3.2
2023	170.275	2.9	11.186	6.6	2.4	8.890	5.8	2.296	14.5	5.648	6.2	5.538	6.9		3.0
2024	.	.	.	.	.	.	.	.	.	.	.	.	.		2.6
2024 Q1	171.578	2.9	11.161	6.5	2.3	8.829	5.7	2.332	14.6	5.668	6.2	5.493	6.8		2.9
Q2	171.843	2.8	11.064	6.4	2.1	8.719	5.6	2.344	14.7	5.642	6.2	5.422	6.7		2.6
Q3	172.059	2.8	11.001	6.4	1.9	8.623	5.5	2.379	14.9	5.713	6.2	5.288	6.6		2.5
Q4	.	.	.	.	.	.	.	.	.	.	.	.	.		2.5
2024 Aug.	-	-	10.855	6.3	-	8.496	5.4	2.359	14.8	5.632	6.1	5.223	6.5		-
Sep.	-	-	10.839	6.3	-	8.486	5.4	2.352	14.7	5.610	6.1	5.229	6.5		-
Oct.	-	-	10.733	6.2	-	8.424	5.4	2.309	14.5	5.530	6.0	5.203	6.5		-
Nov.	-	-	10.637	6.2	-	8.352	5.3	2.285	14.4	5.487	6.0	5.150	6.4		-
Dec.	-	-	10.697	6.2	-	8.437	5.4	2.260	14.2	5.511	6.0	5.186	6.4		-
2025 Jan.	-	-	10.655	6.2	-	8.392	5.3	2.263	14.1	5.500	6.0	5.155	6.4		-

Sources: Eurostat and ECB calculations.
1) Where annual and quarterly Labour Force Survey data have not yet been published, they are estimated as simple averages of the monthly data. There is a break in series from the first quarter of 2021 due to the implementation of the Integrated European Social Statistics Regulation. Owing to technical issues with the introduction of the new German system of integrated household surveys, including the Labour Force Survey, the figures for the euro area include data from Germany, starting in the first quarter of 2020, which are not direct estimates from Labour Force Survey microdata, but based on a larger sample including data from other integrated household surveys.
2) Not seasonally adjusted.
3) The job vacancy rate is equal to the number of job vacancies divided by the sum of the number of occupied posts and the number of job vacancies, expressed as a percentage. Data are non-seasonally adjusted and cover industry, construction and services (excluding households as employers and extra-territorial organisations and bodies).

2.5 Short-term business statistics

	Industrial production						Construc-tion production	Retail sales				Services produc-tion [1]	New passenger car regis-trations
	Total (excluding construction)		Main Industrial Groupings										
	Total	Manu-facturing	Inter-mediate goods	Capital goods	Consumer goods	Energy		Total	Food, beverages, tobacco	Non-food	Fuel		
	1	2	3	4	5	6	7	8	9	10	11	12	13
% of total in 2021	100.0	88.7	32.4	33.2	22.5	11.9	100.0	100.0	38.1	54.4	7.5	100.0	100.0
	annual percentage changes												
2022	1.7	2.5	-1.4	3.6	5.8	-3.0	3.3	1.1	-2.7	3.4	4.5	9.9	-4.3
2023	-1.7	-1.2	-6.0	3.1	-1.0	-5.3	1.5	-1.9	-2.6	-1.0	-1.7	2.3	14.6
2024	-2.9	-3.2	-4.0	-4.9	0.1	-0.1	-0.9	1.0	0.2	1.6	1.0	.	-0.1
2024 Q1	-4.6	-4.8	-4.0	-5.3	-5.6	-1.7	-0.3	0.0	-0.4	0.3	-0.6	2.1	5.3
Q2	-3.8	-4.1	-5.5	-6.2	0.7	-0.2	-1.6	0.2	0.0	0.4	0.7	1.3	2.3
Q3	-1.6	-1.9	-3.7	-3.6	2.5	1.7	-1.9	2.0	0.5	2.8	2.6	0.9	-8.7
Q4	-1.6	-1.7	-2.6	-4.3	3.0	0.1	0.0	1.8	0.6	2.7	1.2	.	-1.6
2024 Aug.	-0.4	-0.7	-2.5	-0.5	1.1	2.2	-2.2	2.5	1.4	2.5	5.2	1.0	-11.5
Sep.	-2.1	-2.4	-4.0	-5.8	4.6	2.1	-1.9	3.2	0.1	5.6	2.4	1.0	-6.3
Oct.	-1.0	-1.0	-3.1	-2.0	2.7	-0.3	-0.5	2.1	0.8	3.1	1.3	1.5	-4.0
Nov.	-1.8	-2.0	-2.4	-3.0	0.0	0.0	0.3	1.6	0.8	2.0	1.1	2.0	0.3
Dec.	-2.0	-2.4	-2.4	-8.1	7.0	0.5	-0.1	1.9	0.2	3.1	1.2	.	-1.1
2025 Jan.	.	.	.	.	.	.	.	.	.	.	.	.	-3.4
	month-on-month percentage changes (s.a.)												
2024 Aug.	1.2	1.0	0.0	3.0	-0.2	0.3	0.3	1.0	0.9	1.3	1.4	0.3	-0.1
Sep.	-1.5	-1.4	-1.5	-3.9	1.9	-1.0	-0.4	0.6	-0.5	1.3	-0.7	-0.1	4.0
Oct.	0.2	0.1	0.3	1.7	-2.0	-1.2	0.4	-0.3	0.1	-0.6	-0.2	0.3	-0.4
Nov.	0.4	0.6	0.5	0.2	0.0	2.1	0.6	0.0	-0.1	-0.4	0.7	0.3	3.9
Dec.	-1.1	-1.8	-1.9	-2.6	4.5	0.5	0.0	-0.2	-0.7	0.3	0.2	.	-1.9
2025 Jan.	.	.	.	.	.	.	.	.	.	.	.	.	-1.2

Sources: Eurostat, ECB calculations and European Automobile Manufacturers Association (col. 13).
1) Excluding trade and financial services.

2 Economic activity

2.6 Opinion surveys
(seasonally adjusted)

	European Commission Business and Consumer Surveys (percentage balances, unless otherwise indicated)								Purchasing Managers' Surveys (diffusion indices)			
	Economic sentiment indicator (long-term average = 100)	Manufacturing industry		Consumer confidence indicator	Construction confidence indicator	Retail trade confidence indicator	Service industries		Purchasing Managers' Index (PMI) for manufacturing	Manufacturing output	Business activity for services	Composite output
		Industrial confidence indicator	Capacity utilisation (%)				Services confidence indicator	Capacity utilisation (%)				
	1	2	3	4	5	6	7	8	9	10	11	12
1999-20	99.5	-4.3	80.6	-11.1	-12.7	-6.7	6.0	.	-	-	-	-
2022	102.3	5.0	82.4	-21.9	5.2	-3.6	9.3	89.9	-	-	-	-
2023	96.4	-5.8	80.9	-17.4	-1.2	-4.1	6.8	90.4	-	-	-	-
2024	95.9	-10.8	78.5	-14.1	-4.5	-6.9	6.5	90.2	45.9	46.2	51.5	50.1
2024 Q2	96.0	-10.3	79.0	-14.3	-5.2	-7.2	6.5	90.0	46.2	47.6	53.1	51.6
Q3	96.3	-10.7	78.3	-13.1	-5.0	-8.5	6.2	90.3	45.5	45.4	52.1	50.3
Q4	95.1	-12.8	77.4	-13.6	-3.8	-5.6	6.1	90.4	45.4	45.1	50.9	49.3
2025 Q1	.	.	77.2	.	.	.	.	90.3	.	.	.	.
2024 Sep.	96.4	-11.1	.	-13.0	-4.5	-8.4	7.0	.	45.0	44.9	51.4	49.6
Oct.	95.7	-12.9	77.4	-12.5	-3.8	-7.3	6.9	90.4	46.0	45.8	51.6	50.0
Nov.	95.8	-11.4	.	-13.8	-3.7	-4.7	5.4	.	45.2	45.1	49.5	48.3
Dec.	93.8	-14.0	.	-14.5	-3.9	-4.8	5.9	.	45.1	44.3	51.6	49.6
2025 Jan.	95.3	-12.7	77.2	-14.2	-3.0	-5.3	6.7	90.3	46.6	47.1	51.3	50.2
Feb.	96.3	-11.4	.	-13.6	-3.5	-5.3	6.2	.	47.6	48.9	50.6	50.2

Sources: European Commission (Directorate-General for Economic and Financial Affairs) (col. 1-8) and S&P Global Market Intelligence (col. 9-12).

2.7 Summary accounts for households and non-financial corporations
(current prices, unless otherwise indicated; not seasonally adjusted)

	Households							Non-financial corporations					
	Saving rate (gross)	Debt ratio	Real gross disposable income	Financial investment	Non-financial investment (gross)	Net worth[2]	Housing wealth	Profit rate[3]	Saving rate (gross)	Debt ratio[4]	Financial investment	Non-financial investment (gross)	Financing
	Percentage of gross disposable income (adjusted)[1]		Annual percentage changes					Percentage of gross value added		Percentage of GDP	Annual percentage changes		
	1	2	3	4	5	6	7	8	9	10	11	12	13
2021	17.3	94.0	2.4	3.4	17.9	7.6	7.5	36.7	7.5	77.4	5.6	10.3	3.4
2022	13.6	91.1	0.5	2.2	12.8	2.0	7.8	37.6	5.3	72.8	4.8	9.8	3.3
2023	14.1	85.0	1.2	1.9	3.0	3.6	0.9	35.6	5.2	68.6	1.7	1.9	0.8
2023 Q4	14.1	85.0	1.5	1.9	2.1	3.6	0.9	35.6	5.2	68.6	1.7	-0.6	0.8
2024 Q1	14.6	83.8	2.8	2.0	-3.4	3.4	1.0	34.7	4.5	68.0	1.8	-5.9	0.8
Q2	14.9	83.2	2.0	2.3	-1.7	3.5	1.7	34.0	3.8	67.9	2.0	-8.0	1.0
Q3	15.2	82.5	2.4	2.4	-0.3	5.3	2.0	33.4	3.4	67.4	2.0	4.1	1.0

Sources: ECB and Eurostat.
1) Based on four-quarter cumulated sums of saving, debt and gross disposable income (adjusted for the change in pension entitlements).
2) Financial assets (net of financial liabilities) and non-financial assets. Non-financial assets consist mainly of housing wealth (residential structures and land). They also include non-financial assets of unincorporated enterprises classified within the household sector.
3) The profit rate is gross entrepreneurial income (broadly equivalent to cash flow) divided by gross value added.
4) Defined as consolidated loans and debt securities liabilities.

2 Economic activity

2.8 Euro area balance of payments, current and capital accounts

(EUR billions; seasonally adjusted unless otherwise indicated; transactions)

	Current account											Capital account [1]	
	Total			Goods		Services		Primary income		Secondary income			
	Credit	Debit	Balance	Credit	Debit	Credit	Debit	Credit	Debit	Credit	Debit	Credit	Debit
	1	2	3	4	5	6	7	8	9	10	11	12	13
2024 Q1	1,439.0	1,331.2	107.8	706.5	599.5	365.2	331.8	321.3	320.6	46.0	79.3	18.9	31.6
Q2	1,492.5	1,358.0	134.4	715.1	615.9	387.7	336.6	343.1	316.4	46.5	89.2	25.2	22.1
Q3	1,466.1	1,382.0	84.1	704.9	621.0	373.2	339.0	338.1	329.7	49.9	92.3	20.5	15.8
Q4	1,455.1	1,362.3	92.7	722.8	623.1	366.8	323.1	320.6	324.5	44.8	91.7	31.5	20.9
2024 July	491.3	460.2	31.2	235.5	204.2	125.0	112.9	113.9	112.0	16.9	31.2	6.8	5.8
Aug.	490.5	467.0	23.5	235.2	210.1	126.6	114.5	112.0	111.7	16.6	30.8	8.5	4.5
Sep.	484.3	454.8	29.4	234.1	206.7	121.5	111.7	112.2	106.1	16.4	30.3	5.2	5.5
Oct.	480.2	450.9	29.3	235.7	204.2	120.0	105.5	108.8	110.8	15.6	30.4	6.6	4.1
Nov.	486.3	461.2	25.1	244.0	209.1	120.8	109.6	106.2	112.4	15.3	30.1	5.8	4.6
Dec.	488.7	450.3	38.4	243.1	209.7	126.1	108.0	105.6	101.3	13.9	31.3	19.1	12.2
	12-month cumulated transactions												
2024 Dec.	5,852.6	5,433.6	419.1	2,849.4	2,459.5	1,492.8	1,330.5	1,323.1	1,291.2	187.3	352.4	96.2	90.4
	12-month cumulated transactions as a percentage of GDP												
2024 Dec.	39.0	36.2	2.8	19.0	16.4	9.9	8.9	8.8	8.6	1.2	2.3	0.6	0.6

1) The capital account is not seasonally adjusted.

2.9 Euro area external trade in goods [1], values and volumes by product group [2]

(seasonally adjusted, unless otherwise indicated)

	Total (n.s.a.)		Exports (f.o.b.)					Imports (c.i.f.)					
			Total				Memo item:	Total				Memo items:	
	Exports	Imports	Total	Intermediate goods	Capital goods	Consumption goods	Manufacturing	Total	Intermediate goods	Capital goods	Consumption goods	Manufacturing	Oil
	1	2	3	4	5	6	7	8	9	10	11	12	13
	Values (EUR billions; annual percentage changes for columns 1 and 2)												
2024 Q1	-2.8	-12.0	713.0	336.9	143.3	219.1	589.1	655.1	372.0	105.9	158.9	467.6	75.7
Q2	1.7	-4.4	716.9	338.5	137.2	224.2	592.4	672.6	384.6	109.5	162.7	481.1	78.9
Q3	2.2	0.4	710.8	338.3	136.6	218.7	589.8	675.1	380.4	111.9	164.8	490.3	75.0
Q4	1.3	2.0	715.7	.	.	.	592.5	680.8	.	.	.	488.2	.
2024 July	9.1	3.7	236.9	112.8	45.2	73.4	195.4	224.0	127.4	37.5	54.3	161.8	26.7
Aug.	-2.7	-1.7	237.3	113.2	45.2	73.7	197.1	227.9	128.0	37.4	55.7	164.8	26.0
Sep.	0.2	-1.0	236.6	112.3	46.1	71.5	197.3	223.2	125.1	37.0	54.8	163.8	22.3
Oct.	2.4	3.1	233.5	110.4	44.1	73.2	195.1	226.5	126.9	35.9	56.8	164.3	24.1
Nov.	-1.4	-0.7	241.4	112.1	47.6	75.3	199.7	228.1	127.4	37.3	56.7	164.0	23.5
Dec.	3.1	3.8	240.8	.	.	.	197.7	226.2	.	.	.	160.0	.
	Volume indices (2000 = 100; annual percentage changes for columns 1 and 2)												
2023 Q4	-3.6	-8.3	94.5	92.0	93.8	101.2	93.4	102.9	100.7	101.9	108.0	104.0	164.9
2024 Q1	-3.6	-6.8	95.1	92.9	91.6	103.1	93.7	101.4	99.6	98.7	106.6	101.2	164.4
Q2	-1.0	-4.2	93.9	92.0	87.0	103.6	92.4	102.6	100.7	102.1	107.6	102.9	169.0
Q3	-0.5	-0.9	92.7	91.2	85.5	101.6	91.5	102.9	100.5	104.1	108.3	104.5	164.8
2024 June	-8.9	-9.3	93.0	90.8	86.0	102.8	91.6	101.9	99.2	102.4	106.9	102.4	162.1
July	5.4	1.0	92.0	91.4	84.4	100.7	90.5	101.9	99.8	103.4	106.3	103.1	161.8
Aug.	-5.0	-3.4	93.8	91.5	85.4	104.6	93.0	103.9	101.4	105.2	110.2	105.6	168.6
Sep.	-2.1	-0.2	92.2	90.6	86.7	99.4	91.2	102.9	100.5	103.8	108.4	104.9	164.0
Oct.	-0.5	4.0	90.8	88.9	83.1	100.0	90.2	104.0	101.6	98.7	111.7	105.2	169.3
Nov.	-4.2	-0.9	93.8	89.7	87.6	105.0	92.7	104.3	101.5	101.3	111.2	104.2	171.9

Sources: ECB and Eurostat.
1) Differences between ECB's b.o.p. goods (Table 2.8) and Eurostat's trade in goods (Table 2.9) are mainly due to different definitions.
2) Product groups as classified in the Broad Economic Categories.

3 Prices and costs

3.1 Harmonised Index of Consumer Prices [1)]

(annual percentage changes, unless otherwise indicated)

	Total					Total (s.a.; percentage change vis-à-vis previous period) [2)]						Administered prices	
	Index: 2015 = 100	Total		Goods	Services	Total	Processed food	Unprocessed food	Non-energy industrial goods	Energy (n.s.a.)	Services	Total HICP excluding administered prices	Administered prices
		Total	Total excluding food and energy										
	1	2	3	4	5	6	7	8	9	10	11	12	13
% of total in 2024	100.0	100.0	70.6	55.1	44.9	100.0	15.1	4.3	25.7	9.9	44.9	88.5	11.5
2022	116.8	8.4	3.9	11.9	3.5	-	-	-	-	-	-	8.5	7.8
2023	123.2	5.4	4.9	5.7	4.9	-	-	-	-	-	-	5.5	4.9
2024	126.1	2.4	2.8	1.1	4.0	-	-	-	-	-	-	2.3	3.3
2024 Q1	124.4	2.6	3.1	1.5	4.0	0.7	0.8	0.0	0.2	0.2	1.1	2.7	2.3
Q2	126.3	2.5	2.8	1.3	4.0	0.5	0.4	-0.4	0.0	-0.5	1.1	2.5	2.8
Q3	126.6	2.2	2.8	0.6	4.0	0.5	0.8	0.9	0.3	-1.4	1.0	1.9	4.0
Q4	126.9	2.2	2.7	0.8	3.9	0.5	0.8	1.7	0.1	-0.6	0.7	2.0	4.3
2024 Sep.	126.6	1.7	2.7	0.0	3.9	0.0	0.3	0.6	0.0	-1.7	0.1	1.5	3.9
Oct.	127.0	2.0	2.7	0.4	4.0	0.3	0.4	1.3	0.0	0.4	0.3	1.7	4.1
Nov.	126.6	2.2	2.7	0.9	3.9	0.1	0.2	0.1	0.1	0.5	0.1	2.0	4.3
Dec.	127.1	2.4	2.7	1.2	4.0	0.2	0.1	-0.3	0.0	0.6	0.3	2.2	4.4
2025 Jan.	126.7	2.5	2.7	1.4	3.9	0.5	0.2	0.1	0.1	3.0	0.3	2.3	4.3
Feb. [3)]	127.3	2.4	2.6	.	3.7	0.2	0.2	0.6	0.1	-0.3	0.3	.	.

	Goods						Services					
	Food (including alcoholic beverages and tobacco)			Industrial goods			Housing		Transport	Communication	Recreation and personal care	Miscellaneous
	Total	Processed food	Unprocessed food	Total	Non-energy industrial goods	Energy	Total	Rents				
	14	15	16	17	18	19	20	21	22	23	24	25
% of total in 2024	19.5	15.1	4.3	35.6	25.7	9.9	9.6	5.6	7.4	2.2	16.4	9.3
2022	9.0	8.6	10.4	13.6	4.6	37.0	2.4	1.7	4.4	-0.2	6.1	2.1
2023	10.9	11.4	9.1	2.9	5.0	-2.0	3.6	2.7	5.2	0.2	6.9	4.0
2024	2.9	3.2	1.9	0.0	0.8	-2.2	3.3	2.9	4.2	-0.9	4.9	4.0
2024 Q1	4.0	4.4	2.8	0.1	1.6	-3.9	3.4	2.8	3.6	-0.2	5.3	3.8
Q2	2.6	2.9	1.4	0.6	0.7	0.0	3.3	2.8	3.7	-0.5	5.1	4.0
Q3	2.3	2.7	1.2	-0.3	0.5	-2.7	3.3	3.0	4.5	-0.9	4.8	4.0
Q4	2.7	2.8	2.3	-0.2	0.6	-2.2	3.3	3.0	5.0	-2.2	4.6	4.0
2024 Sep.	2.4	2.6	1.6	-1.4	0.4	-6.1	3.3	3.0	4.3	-1.7	4.7	4.0
Oct.	2.9	2.8	3.0	-0.9	0.5	-4.6	3.3	3.0	4.8	-2.2	4.7	4.0
Nov.	2.7	2.8	2.3	-0.1	0.6	-2.0	3.4	3.1	5.0	-1.9	4.5	4.0
Dec.	2.6	2.9	1.6	0.4	0.5	0.1	3.3	3.0	5.1	-2.4	4.7	4.0
2025 Jan.	2.3	2.6	1.4	0.9	0.5	1.9	3.3	2.9	4.4	-1.9	4.6	4.1
Feb. [3)]	2.7	2.6	3.1	.	0.6	0.2	.	.	.	.	.	.

Sources: Eurostat and ECB calculations.
1) Data refer to the changing composition of the euro area.
2) In May 2016 the ECB started publishing enhanced seasonally adjusted HICP series for the euro area, following a review of the seasonal adjustment approach as described in Box 1, Economic Bulletin, Issue 3, ECB, 2016 (https://www.ecb.europa.eu/pub/pdf/ecbu/eb201603.en.pdf).
3) Flash estimate.

3 Prices and costs

3.2 Industry, construction and property prices

(annual percentage changes, unless otherwise indicated)

	Industrial producer prices excluding construction [1]										Construction [2]	Residential property prices	Experimental indicator of commercial property prices [3]
		Total		Industry excluding construction and energy						Energy			
							Consumer goods						
	Total (index: 2021 = 100)	Total	Manufacturing	Total	Intermediate goods	Capital goods	Total	Food, beverages and tobacco	Non-food				
	1	2	3	4	5	6	7	8	9	10	11	12	13
% of total in 2021	100.0	100.0	77.8	72.3	30.9	19.3	22.2	15.7	6.5	27.7			
2022	132.7	32.7	17.0	13.8	19.8	7.1	12.2	16.6	6.8	81.1	11.9	7.1	0.6
2023	130.0	-2.1	1.9	3.7	-0.2	4.8	8.3	8.4	5.6	-13.3	6.9	-1.2	-8.1
2024	124.6	-4.2	-0.6	-0.1	-2.4	1.6	1.6	0.3	1.2	-12.2	2.3	.	.
2024 Q1	124.9	-7.9	-1.6	-1.3	-5.3	2.1	1.6	-0.2	1.5	-20.5	3.6	-0.3	-8.0
Q2	122.8	-4.4	-0.2	-0.4	-3.1	1.6	1.1	-0.4	1.1	-12.2	2.5	1.4	-6.4
Q3	124.4	-2.7	-0.6	0.4	-0.9	1.3	1.5	0.5	1.1	-8.9	1.8	2.6	.
Q4	126.2	-1.5	-0.2	0.9	-0.3	1.4	2.0	1.5	1.2	-6.0	1.2	.	.
2024 Aug.	124.8	-2.3	-0.7	0.3	-0.9	1.3	1.5	0.4	1.0	-7.8	-	-	-
Sep.	124.1	-3.5	-1.5	0.6	-0.8	1.3	1.7	0.9	1.1	-11.6	-	-	-
Oct.	124.6	-3.3	-0.9	0.8	-0.5	1.3	2.1	1.3	1.3	-11.2	-	-	-
Nov.	126.7	-1.2	-0.1	0.9	-0.3	1.4	2.0	1.6	1.1	-5.0	-	-	-
Dec.	127.3	0.1	0.4	1.0	0.0	1.4	2.1	1.5	1.2	-1.6	-	-	-
2025 Jan.	128.3	1.8	1.0	1.3	0.5	1.6	2.2	1.4	1.6	3.5	-	-	-

Sources: Eurostat, ECB calculations, and ECB calculations based on MSCI data and national sources (col. 13).
1) Domestic sales only.
2) Output prices for residential buildings.
3) Experimental data based on non-harmonised sources (see https://www.ecb.europa.eu/stats/ecb_statistics/governance_and_quality_framework/html/experimental-data.en.html for further details).

3.3 Commodity prices and GDP deflators

(annual percentage changes, unless otherwise indicated)

	GDP deflators								Oil prices (EUR per barrel)	Non-energy commodity prices (EUR)					
			Domestic demand				Exports [1]	Imports [1]		Import-weighted [2]			Use-weighted [2]		
	Total (s.a.; index: 2020 = 100)	Total	Total	Private consumption	Government consumption	Gross fixed capital formation				Total	Food	Non-food	Total	Food	Non-food
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
% of total										100.0	45.5	54.6	100.0	50.4	49.6
2022	107.3	5.1	7.0	6.7	4.5	8.2	12.8	17.4	95.0	18.3	28.8	9.6	19.3	27.7	10.9
2023	113.7	5.9	4.6	6.4	3.5	4.2	0.5	-2.3	76.4	-12.8	-11.6	-14.0	-13.7	-12.5	-15.0
2024	.	.	.	.	.	.	.	.	77.8	9.3	13.5	5.1	9.1	12.1	5.5
2024 Q1	116.0	3.6	2.6	3.3	3.3	2.1	-0.8	-2.9	76.5	-2.3	3.1	-7.5	-2.7	1.8	-7.8
Q2	116.6	2.9	2.7	2.6	2.9	1.7	0.7	-0.1	85.0	13.0	16.5	9.4	11.4	13.1	9.4
Q3	117.2	2.7	2.3	2.1	2.6	1.8	1.2	0.1	.	10.0	11.6	8.2	10.9	12.4	9.1
Q4	.	.	.	.	.	.	.	.	.	17.4	22.9	11.8	17.7	21.7	12.8
2024 Aug.	-	-	-	-	-	-	-	-	.	10.3	11.5	9.2	11.5	12.7	10.1
Sep.	-	-	-	-	-	-	-	-	.	7.6	9.6	5.6	9.0	11.1	6.4
Oct.	-	-	-	-	-	-	-	-	.	13.5	14.7	12.2	13.0	13.1	12.9
Nov.	-	-	-	-	-	-	-	-	.	17.6	23.0	12.0	17.9	21.7	13.2
Dec.	-	-	-	-	-	-	-	-	.	21.2	31.1	11.2	22.2	30.4	12.3
2025 Jan.	-	-	-	-	-	-	-	-	.	22.8	34.7	10.7	23.6	33.7	11.6

Sources: Eurostat, ECB calculations and Bloomberg (col. 9).
1) Deflators for exports and imports refer to goods and services and include cross-border trade within the euro area.
2) Import-weighted: weighted according to 2009-11 average import structure; use-weighted: weighted according to 2009-11 average domestic demand structure.

3 Prices and costs

3.4 Price-related opinion surveys
(seasonally adjusted)

	European Commission Business and Consumer Surveys (percentage balance)					Purchasing Managers' Surveys (diffusion indices)			
	Selling price expectations (for next three months)				Consumer price trends over past 12 months	Input prices		Prices charged	
	Manu-facturing	Retail trade	Services	Construction		Manu-facturing	Services	Manu-facturing	Services
	1	2	3	4	5	6	7	8	9
1999-20	4.7	5.8	4.0	-3.3	29.0	-	-	-	-
2022	48.5	53.1	27.4	42.1	71.6	-	-	-	-
2023	9.5	28.6	19.3	14.7	74.5	-	-	-	-
2024	6.0	14.2	14.5	4.3	54.9	49.0	59.7	48.8	54.2
2024 Q1	4.5	16.5	16.7	5.9	64.4	44.9	62.3	48.2	56.0
Q2	5.9	13.9	14.5	4.1	56.6	49.9	60.5	48.6	54.6
Q3	6.4	13.1	13.2	2.5	50.1	52.0	57.9	50.1	53.0
Q4	7.2	13.4	13.6	4.7	48.5	49.1	58.0	48.2	53.3
2024 Sep.	6.3	11.6	13.0	2.9	46.8	49.1	56.0	49.2	52.4
Oct.	6.7	12.2	14.0	2.8	46.4	48.2	56.5	48.2	52.8
Nov.	7.2	13.9	12.4	5.0	49.1	49.3	57.9	47.9	53.3
Dec.	7.6	14.2	14.5	6.3	50.1	50.0	59.6	48.6	53.9
2025 Jan.	8.8	16.8	15.7	6.4	51.3	52.0	60.8	50.0	53.9
Feb.	9.8	15.9	12.7	3.9	49.6	52.2	60.8	49.8	54.7

Sources: European Commission (Directorate-General for Economic and Financial Affairs) and S&P Global Market Intelligence.

3.5 Labour cost indices
(annual percentage changes, unless otherwise indicated)

			By component		For selected economic activities		
	Total (index: 2020=100)	Total	Wages and salaries	Employers' social contributions	Business economy	Mainly non-business economy	Memo item: Indicator of negotiated wages [1]
	1	2	3	4	5	6	7
% of total in 2020	100.0	100.0	75.3	24.7	69.0	31.0	
2022	105.7	4.5	3.7	7.0	5.1	3.4	2.9
2023	110.7	4.7	4.6	4.9	5.0	4.0	4.4
2024	115.8	4.7	4.7	4.6	4.7	5.0	4.5
2024 Q1	108.5	5.4	5.5	5.1	5.1	6.0	4.8
Q2	120.0	5.2	5.0	5.8	5.0	5.7	3.6
Q3	112.1	4.6	4.4	5.2	4.6	4.6	5.4
Q4	122.8	3.7	4.1	2.6	4.1	4.0	4.1

Sources: Eurostat and ECB calculations.
1) Experimental data based on non-harmonised sources (see https://www.ecb.europa.eu/stats/ecb_statistics/governance_and_quality_framework/html/experimental-data.en.html for further details).

3 Prices and costs

3.6 Unit labour costs, compensation per labour input and labour productivity

(annual percentage changes, unless otherwise indicated; quarterly data seasonally adjusted; annual data unadjusted)

			By economic activity									
	Total (index: 2020 =100)	Total	Agriculture, forestry andfishing	Manu-facturing, energy and utilities	Con-struction	Trade, transport, accom-modation and food services	Information and commu-nication	Finance and insurance	Real estate	Professional, business and support services	Public ad-ministration, education, health and social work	Arts, enter-tainment and other services
	1	2	3	4	5	6	7	8	9	10	11	12
Unit labor costs												
2021	99.6	-0.4	1.4	-2.9	4.7	-1.9	-0.2	-1.7	5.2	-1.0	1.1	-0.8
2022	103.0	3.4	4.4	4.4	8.0	1.4	3.0	5.1	5.8	3.3	2.1	-5.8
2023	109.7	6.4	3.1	7.9	5.0	7.9	4.3	7.9	3.4	6.6	5.0	2.4
2023 Q4	111.9	6.4	3.9	8.5	4.4	7.2	3.0	8.4	3.0	4.7	5.5	4.1
2024 Q1	113.2	5.5	3.5	7.0	7.0	4.9	2.7	6.0	2.1	4.2	5.6	5.0
Q2	114.2	5.2	5.8	7.1	7.1	4.8	2.8	6.5	0.1	3.5	5.2	4.7
Q3	114.9	4.4	5.6	4.7	7.3	4.5	2.0	5.6	-0.1	3.6	4.5	4.0
Compensation per employee												
2021	104.3	4.3	3.6	4.8	5.3	5.5	5.8	3.9	6.3	4.8	2.5	3.3
2022	109.0	4.5	4.1	3.9	4.2	6.1	2.5	3.1	5.2	5.7	3.5	8.1
2023	114.9	5.4	5.9	5.4	4.9	5.8	5.0	5.3	4.0	6.4	4.7	5.3
2023 Q4	117.1	5.2	5.2	5.4	4.5	5.3	4.8	5.7	4.2	5.4	5.0	5.1
2024 Q1	118.5	4.8	4.1	4.8	4.0	4.1	4.0	5.1	4.0	5.1	5.3	6.4
Q2	119.5	4.8	4.1	4.7	3.8	4.8	4.0	6.0	3.7	4.7	4.9	5.1
Q3	120.6	4.4	4.5	4.2	4.6	4.5	4.2	5.3	3.6	4.4	4.6	4.1
Labour productivity per person employed												
2021	104.7	4.7	2.1	8.0	0.5	7.6	6.0	5.6	1.0	5.8	1.4	4.2
2022	105.8	1.1	-0.3	-0.5	-3.5	4.7	-0.5	-1.9	-0.6	2.3	1.3	14.8
2023	104.7	-1.0	2.7	-2.3	-0.1	-1.9	0.7	-2.4	0.6	-0.2	-0.4	2.8
2024 Q1	104.6	-0.6	0.6	-2.0	-2.8	-0.8	1.2	-0.9	1.8	0.9	-0.3	1.3
Q2	104.6	-0.4	-1.6	-2.2	-3.1	0.0	1.2	-0.5	3.5	1.2	-0.2	0.3
Q3	104.8	0.0	-1.0	-0.5	-2.5	0.0	2.2	-0.3	3.7	0.8	0.0	0.1
Q4	104.8	0.2	.	.	.	.	.	.	.	.	.	.
Compensation per hour worked												
2021	100.2	0.2	1.6	0.1	0.5	-0.8	3.0	1.9	2.3	0.1	0.7	-1.4
2022	103.6	3.4	5.5	4.0	4.0	2.0	2.5	3.8	3.8	4.6	4.2	5.0
2023	109.1	5.3	5.4	5.7	5.0	5.8	5.0	5.8	4.7	6.2	4.5	4.5
2023 Q4	110.8	4.9	5.2	5.4	4.0	5.3	4.2	5.6	4.1	4.9	4.7	4.6
2024 Q1	112.2	5.2	5.6	5.3	4.1	4.6	4.2	5.8	4.4	5.0	5.8	6.5
Q2	113.1	4.9	3.6	4.9	4.1	5.1	3.7	6.2	4.2	4.4	5.2	4.2
Q3	114.2	4.8	4.0	4.8	4.4	4.8	4.1	5.5	2.8	4.6	5.3	3.7
Hourly labour productivity												
2021	100.2	0.2	0.9	2.9	-5.0	0.9	2.9	3.4	-3.8	0.3	-0.6	-1.2
2022	100.1	0.0	0.4	-0.5	-4.0	0.7	-0.7	-1.1	-2.4	1.7	2.1	11.0
2023	99.2	-0.9	2.8	-2.1	0.3	-1.7	0.9	-1.9	0.9	-0.2	-0.4	2.3
2023 Q4	98.7	-1.2	1.5	-2.9	0.2	-1.7	1.3	-2.4	1.8	0.4	-0.8	0.9
2024 Q1	98.8	-0.2	2.4	-1.5	-2.5	-0.3	1.6	-0.1	3.0	0.7	0.1	1.3
Q2	98.9	-0.3	-1.1	-2.1	-2.7	0.3	1.1	-0.2	4.5	1.0	0.0	-0.3
Q3	99.2	0.5	0.1	0.0	-2.2	0.4	2.2	-0.1	4.5	0.8	0.8	-0.1

Sources: Eurostat and ECB calculations.

4 Financial market developments

4.1 Money market interest rates
(percentages per annum, period averages)

	Euro area [1]					United States	Japan
	Euro short-term rate (€STR)	1-month deposits (EURIBOR)	3-month deposits (EURIBOR)	6-month deposits (EURIBOR)	12-month deposity (EURIBOR)	Secured overnight financing rate (SOFR)	Tokyo overnight average rate (TONAR)
	1	2	3	4	5	6	7
2022	-0.01	0.09	0.35	0.68	1.10	1.63	-0.03
2023	3.21	3.25	3.43	3.69	3.86	5.00	-0.04
2024	3.64	3.56	3.57	3.48	3.27	5.15	0.12
2024 Sep.	3.56	3.44	3.43	3.26	2.94	5.15	0.23
Oct.	3.34	3.21	3.17	3.00	2.69	4.85	0.23
Nov.	3.16	3.07	3.01	2.79	2.51	4.66	0.23
Dec.	3.06	2.89	2.82	2.63	2.44	4.53	0.23
2025 Jan.	2.92	2.80	2.70	2.61	2.52	4.32	0.29
Feb.	2.69	2.61	2.52	2.46	2.41	4.34	0.48

Source: LSEG and ECB calculations.
1) Data refer to the changing composition of the euro area.

4.2 Yield curves
(End of period; rates in percentages per annum; spreads in percentage points)

	Spot rates					Spreads			Instantaneous forward rates			
	Euro area [1] [2]					Euro area [1] [2]	United States	United Kingdom	Euro area [1] [2]			
	3 months	1 year	2 years	5 years	10 years	10 years - 1 year	10 years - 1 year	10 years - 1 year	1 year	2 years	5 years	10 years
	1	2	3	4	5	6	7	8	9	10	11	12
2022	1.71	2.46	2.57	2.45	2.56	0.09	-0.84	-0.24	2.85	2.48	2.47	2.76
2023	3.78	3.05	2.44	1.88	2.08	-0.96	-0.92	-1.20	2.25	1.54	1.76	2.64
2024	2.58	2.18	2.01	2.13	2.45	0.27	0.41	-0.06	1.86	1.89	2.50	2.91
2024 Sep.	3.12	2.43	2.03	1.93	2.24	-0.20	-0.23	-0.39	1.81	1.58	2.19	2.78
Oct.	2.88	2.47	2.24	2.25	2.52	0.05	0.00	-0.19	2.10	2.00	2.52	2.96
Nov.	2.73	2.18	1.91	1.92	2.19	0.00	-0.12	-0.26	1.72	1.65	2.20	2.59
Dec.	2.58	2.18	2.01	2.13	2.45	0.27	0.41	-0.06	1.86	1.89	2.50	2.91
2025 Jan.	2.45	2.17	2.06	2.21	2.53	0.37	0.38	0.11	1.94	2.00	2.59	3.01
Feb.	2.24	2.06	1.97	2.11	2.47	0.41	0.11	0.53	1.90	1.91	2.50	3.03

Source: ECB calculations.
1) Data refer to the changing composition of the euro area.
2) ECB calculations based on underlying data provided by Euro MTS Ltd and ratings provided by Fitch Ratings.

4.3 Stock market indices
(index levels in points; period averages)

	Dow Jones EURO STOXX Indices												United States	Japan
	Benchmark		Main industry indices											
	Broad index	50	Basic materials	Consumer services	Consumer goods	Oil and gas	Financials	Industrials	Technology	Utilities	Telecoms	Health care	Standard & Poor's 500	Nikkei 225
	1	2	3	4	5	6	7	8	9	10	11	12	13	14
2022	414.6	3,757.0	937.3	253.4	171.3	110.0	160.6	731.7	748.4	353.4	283.2	825.8	4,098.5	27,257.8
2023	452.0	4,272.0	968.5	292.7	169.2	119.2	186.7	809.8	861.5	367.8	283.1	803.6	4,285.6	30,716.6
2024	502.8	4,870.4	992.6	299.1	161.1	123.9	231.6	951.6	1,069.3	378.7	301.6	792.1	5,430.7	38,395.3
2024 Sep.	505.0	4,877.0	987.6	281.9	165.0	121.6	241.8	950.5	1,029.0	402.8	320.1	843.4	5,621.3	37,307.4
Oct.	511.2	4,948.4	1,000.1	285.2	164.7	123.6	244.9	977.8	1,036.0	402.4	327.0	840.7	5,792.3	38,843.8
Nov.	497.5	4,795.1	939.9	271.5	155.5	121.6	241.8	975.3	997.8	386.1	328.9	816.8	5,929.9	38,617.4
Dec.	507.4	4,918.3	932.6	283.1	151.7	118.8	245.5	996.6	1,065.8	381.4	331.4	816.9	6,012.2	39,297.0
2025 Jan.	523.1	5,098.1	939.9	292.0	149.6	123.8	258.2	1,024.4	1,103.1	380.9	334.7	859.5	5,979.5	39,298.0
Feb.	553.7	5,420.0	1,008.0	305.6	155.4	128.1	282.1	1,084.2	1,154.8	387.0	364.1	901.7	6,038.7	38,735.3

Source: LSEG.

4 Financial market developments

4.4 MFI interest rates on loans to and deposits from households (new business) [1), 2)]

(percentages per annum, period average, unless otherwise indicated)

	Deposits				Revolving loans and overdrafts	Extended credit card credit	Loans for consumption			Loans to sole proprietors and unincorporated partnerships	Loans for house purchase					
			With an agreed maturity of:				By initial period of rate fixation				By initial period of rate fixation					
	Overnight	Redeemable at notice of up to 3 months	Up tp 2 years	Over 2 years			Floating rate and up to 1 year	Over 1 year	APRC [3)]		Floating rate and up to 1 year	Over 1 and up to 5 years	Over 5 and up to 10 years	Over 10 years	APRC [3)]	Composite cost-of-borrowing indicator
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
2024 Feb.	0.38	1.71	3.18	3.07	8.19	16.85	7.61	7.93	8.62	5.30	4.81	4.01	3.64	3.49	4.12	3.84
Mar.	0.39	1.72	3.18	2.91	8.19	16.95	8.03	7.79	8.53	5.15	4.80	3.99	3.57	3.44	4.05	3.80
Apr.	0.39	1.73	3.13	2.89	8.14	16.98	8.03	7.85	8.57	5.20	4.84	3.98	3.59	3.42	4.05	3.81
May	0.39	1.73	3.10	2.81	8.21	17.04	7.65	7.94	8.68	5.26	4.81	3.96	3.62	3.42	4.04	3.81
June	0.38	1.74	3.03	2.84	8.18	17.01	7.41	7.71	8.45	5.15	4.80	3.95	3.63	3.39	4.03	3.78
July	0.38	1.74	3.01	2.77	8.15	17.00	7.55	7.79	8.49	5.03	4.75	3.93	3.64	3.38	4.00	3.75
Aug.	0.38	1.75	2.97	2.69	8.16	16.99	7.85	7.82	8.60	5.03	4.69	3.87	3.62	3.37	3.99	3.73
Sep.	0.37	1.75	3.00	2.73	8.23	17.04	7.55	7.76	8.53	4.89	4.58	3.79	3.55	3.28	3.89	3.64
Oct.	0.36	1.74	2.73	2.63	8.06	16.89	7.24	7.71	8.46	4.65	4.37	3.69	3.47	3.22	3.79	3.55
Nov.	0.35	1.74	2.61	2.52	7.96	16.84	6.52	7.69	8.41	4.58	4.27	3.62	3.43	3.16	3.72	3.47
Dec.	0.35	1.74	2.45	2.51	7.91	16.84	6.77	7.48	8.26	4.36	4.16	3.57	3.36	3.09	3.65	3.39
2025 Jan.	0.34	1.72	2.33	2.42	7.80	16.76	7.16	7.69	8.50	4.40	4.06	3.49	2.88	2.97	3.41	3.25

Source: ECB.
1) Data refer to the changing composition of the euro area.
2) Including non-profit institutions serving households.
3) Annual percentage rate of charge (APRC).

4.5 MFI interest rates on loans to and deposits from non-financial corporations (new business) [1), 2)]

(Percentages per annum; period average, unless otherwise indicated)

	Deposits			Revolving loans and overdrafts	Other loans by size and initial period of rate fixation									Composite cost-of-borrowing indicator
		With an agreed maturity of:			Up to EUR 0.25 million			over EUR 0.25 and up to 1 million			over EUR 1 million			
	Overnight	Up tp 2 years	Over 2 years		Floating rate and up to 3 months	Over 3 months and up to 1 year	Over 1 year	Floating rate and up to 3 months	Over 3 months and up to 1 year	Over 1 year	Floating rate and up to 3 months	Over 3 months and up to 1 year	Over 1 year	
	1	2	3	4	5	6	7	8	9	10	11	12	13	14
2024 Feb.	0.90	3.65	3.50	5.37	5.52	5.76	5.60	5.49	5.15	4.38	5.11	4.84	3.97	5.16
Mar.	0.91	3.68	3.60	5.37	5.47	5.73	5.52	5.44	5.18	4.33	5.18	5.17	4.15	5.20
Apr.	0.91	3.67	3.34	5.37	5.31	5.64	5.62	5.38	5.11	4.30	5.20	5.01	4.14	5.20
May	0.91	3.65	3.61	5.33	5.37	5.77	5.68	5.40	5.09	4.29	4.99	4.96	4.19	5.12
June	0.87	3.54	3.54	5.25	5.33	5.69	5.67	5.24	4.99	4.22	5.02	5.05	4.14	5.08
July	0.87	3.48	3.28	5.21	5.13	5.44	5.50	5.27	4.93	4.17	5.08	4.99	4.12	5.07
Aug.	0.89	3.42	3.12	5.18	5.14	5.40	5.47	5.17	4.85	4.11	5.03	4.78	4.06	5.01
Sep.	0.88	3.28	2.97	5.12	5.03	5.29	5.49	5.02	4.64	4.04	4.73	4.47	3.85	4.79
Oct.	0.82	3.06	2.96	4.89	4.82	5.10	5.29	4.80	4.39	3.92	4.64	4.29	3.85	4.67
Nov.	0.81	2.92	2.65	4.80	4.80	4.99	5.29	4.62	4.26	3.85	4.42	4.20	3.70	4.52
Dec.	0.77	2.80	2.80	4.64	4.63	4.79	5.08	4.48	4.14	3.76	4.31	4.06	3.62	4.36
2025 Jan.	0.76	2.66	2.61	4.48	4.33	4.60	4.82	4.34	4.02	3.73	4.18	3.88	3.62	4.24

Source: ECB.
1) Data refer to the changing composition of the euro area.
2) In accordance with the ESA 2010, in December 2014 holding companies of non-financial groups were reclassified from the non-financial corporations sector to the financial corporations sector.

4 Financial market developments

4.6 Debt securities issued by euro area residents, by sector of the issuer and original maturity

(EUR billions; transactions during the month and end-of-period outstanding amounts; market values)

	Outstanding amounts							Gross issues [1]						
	Total	MFIs	Non-MFI corporations			General government		Total	MFIs	Non-MFI corporations			General government	
			Financial corporations other than MFIs		Non-financial corporations	Total	of which central government			Financial corporations other than MFIs		Non-financial corporations	Total	of which central government
			Total	FVCs						Total	FVCs			
	1	2	3	4	5	6	7	8	9	10	11	12	13	14
Short-term														
2022	1,385.9	482.3	141.5	51.2	95.1	667.0	621.7	480.2	179.9	115.8	48.3	50.6	133.9	97.1
2023	1,570.5	619.5	162.6	69.3	86.6	701.8	659.1	501.4	210.8	114.1	39.8	49.1	127.5	103.8
2024	1,565.3	565.7	187.7	69.1	70.8	741.1	674.6	468.9	179.6	115.3	44.8	39.2	134.7	108.2
2024 Aug.	1,587.7	575.0	194.5	68.8	94.1	724.1	659.5	448.3	189.7	104.4	42.9	30.4	123.8	101.3
Sep.	1,589.0	603.9	196.0	71.8	83.4	705.7	642.4	486.3	201.7	102.5	46.8	37.8	144.3	113.4
Oct.	1,564.4	577.0	184.8	66.4	84.7	717.9	656.0	472.5	157.1	128.9	44.7	39.6	146.9	126.5
Nov.	1,568.5	575.3	189.0	68.6	79.9	724.4	665.7	478.8	187.3	119.9	48.5	31.9	139.7	125.8
Dec.	1,565.3	565.7	187.7	69.1	70.8	741.1	674.6	432.9	161.8	122.5	51.4	28.9	119.6	91.5
2025 Jan.	1,539.8	580.4	178.5	64.7	78.4	702.5	637.1	585.3	262.4	141.4	52.3	40.8	140.8	118.1
Long-term														
2022	17,698.1	3,896.7	3,098.9	1,323.2	1,429.7	9,272.9	8,560.9	291.8	76.5	67.7	28.2	17.1	130.4	121.0
2023	19,326.3	4,437.6	3,238.7	1,318.6	1,543.8	10,106.1	9,366.3	319.9	93.1	67.1	25.6	21.4	138.4	129.9
2024	20,477.7	4,769.9	3,554.9	1,354.7	1,643.0	10,509.9	9,738.2	349.8	89.6	87.3	25.0	27.0	145.8	135.2
2024 Aug.	20,122.7	4,675.0	3,419.5	1,315.6	1,597.8	10,430.4	9,662.6	210.3	42.4	55.7	17.3	10.5	101.7	97.1
Sep.	20,415.1	4,731.0	3,454.7	1,318.7	1,626.4	10,603.0	9,824.2	378.6	86.4	99.3	33.3	39.8	153.1	143.2
Oct.	20,343.7	4,746.6	3,471.3	1,326.1	1,626.2	10,499.7	9,722.4	364.6	88.5	95.4	27.4	25.0	155.8	145.6
Nov.	20,679.1	4,792.8	3,534.3	1,340.7	1,656.1	10,695.9	9,915.1	317.3	68.3	94.9	32.6	27.9	126.3	119.6
Dec.	20,477.7	4,769.9	3,554.9	1,354.7	1,643.0	10,509.9	9,738.2	255.0	69.7	96.0	35.7	18.6	70.8	64.7
2025 Jan.	20,695.9	4,840.2	3,565.2	1,340.0	1,659.2	10,631.3	9,848.9	483.9	164.5	77.7	16.6	29.7	212.0	188.4

Source: ECB.
1) In order to facilitate comparison, annual data are averages of the relevant monthly data.

4.7 Annual growth rates and outstanding amounts of debt securities and listed shares

(EUR billions and percentage changes; market values)

	Debt securities							Listed shares			
	Total	MFIs	Non-MFI corporations			General government		Total	MFIs	Financial corporations other than MFIs	Non-financial corporations
			Financial corporations other than MFIs		Non-financial corporations	Total	of which central government				
			Total	FVCs							
	1	2	3	4	5	6	7	8	9	10	11
Outstanding amount											
2022	19,084.0	4,379.0	3,240.4	1,374.4	1,524.7	9,939.9	9,182.6	8,704.0	525.2	1,289.8	6,888.4
2023	20,896.8	5,057.1	3,401.4	1,387.9	1,630.4	10,807.9	10,025.4	9,675.7	619.8	1,418.8	7,636.6
2024	22,043.0	5,335.5	3,742.6	1,423.7	1,713.8	11,251.0	10,412.8	10,169.2	751.2	1,591.3	7,826.3
2024 Aug.	21,710.4	5,249.9	3,614.1	1,384.4	1,691.9	11,154.5	10,322.1	10,246.1	724.0	1,563.9	7,957.8
Sep.	22,004.1	5,334.9	3,650.7	1,390.5	1,709.7	11,308.8	10,466.6	10,410.0	746.7	1,570.1	8,092.7
Oct.	21,908.2	5,323.6	3,656.1	1,392.5	1,710.8	11,217.6	10,378.4	10,096.3	751.1	1,556.1	7,788.7
Nov.	22,247.6	5,368.1	3,723.3	1,409.3	1,735.9	11,420.3	10,580.8	10,176.1	723.0	1,589.3	7,863.5
Dec.	22,043.0	5,335.5	3,742.6	1,423.7	1,713.8	11,251.0	10,412.8	10,169.2	751.2	1,591.3	7,826.3
2025 Jan.	22,235.7	5,420.6	3,743.6	1,404.8	1,737.6	11,333.8	10,486.1	10,855.5	829.9	1,685.0	8,340.2
Growth rate [1]											
2024 June	4.9	7.6	3.7	-2.1	3.9	4.3	4.2	-0.6	-3.3	-1.1	-0.3
July	4.5	5.7	4.0	-2.3	3.1	4.2	4.2	-0.4	-3.5	-0.7	0.0
Aug.	4.6	5.3	4.5	-1.6	3.6	4.5	4.4	-0.3	-3.4	-0.7	0.0
Sep.	4.7	6.2	4.6	-1.3	3.7	4.2	4.0	-0.2	-2.1	-0.6	0.1
Oct.	4.7	5.7	4.1	-1.7	3.8	4.7	4.5	0.2	-2.2	-0.6	0.6
Nov.	4.5	4.5	5.4	0.0	3.6	4.5	4.4	0.2	-1.9	-0.7	0.6
Dec.	4.4	3.9	6.1	0.7	3.0	4.2	4.1	0.1	-2.5	-0.7	0.5
2025 Jan.	4.3	3.4	4.5	-1.3	3.5	4.7	4.6	0.1	-2.3	-0.7	0.5

Source: ECB.
1) For details on the calculation of growth rates, see the Technical Notes.

4 Financial market developments

4.8 Effective exchange rates [1)]

(period averages; index: 1999 Q1=100)

	EER-19						EER-42	
	Nominal	Real CPI	Real PPI	Real GDP deflator	Real ULCM	Real ULCT	Nominal	Real CPI
	1	2	3	4	5	6	7	8
2022	95.3	90.8	93.6	84.4	64.4	82.8	116.1	90.9
2023	98.1	94.0	98.1	88.9	66.7	86.6	121.8	94.7
2024	98.4	94.4	98.2	.	.	.	124.1	95.1
2024 Q1	98.4	94.4	98.4	89.6	68.1	87.7	123.7	95.2
Q2	98.7	94.6	98.5	89.6	67.7	87.9	124.1	95.2
Q3	99.0	95.0	98.8	90.0	67.1	88.1	125.1	95.6
Q4	97.6	93.7	97.3	.	.	.	123.6	94.2
2024 Sep.	98.8	94.8	98.7	-	-	-	125.2	95.6
Oct.	98.2	94.3	98.0	-	-	-	124.4	95.0
Nov.	97.5	93.6	97.2	-	-	-	123.5	94.2
Dec.	96.9	93.0	96.7	-	-	-	122.7	93.5
2025 Jan.	96.7	93.0	96.4	-	-	-	122.3	93.4
Feb.	96.3	92.8	96.1	-	-	-	121.8	93.0
	Percentage change versus previous month							
2025 Feb.	-0.4	-0.3	-0.3	-	-	-	-0.4	-0.4
	Percentage change versus previous year							
2025 Feb.	-1.9	-1.5	-2.0	-	-	-	-1.2	-2.0

Source: ECB.
1) For a definition of the trading partner groups and other information see the General Notes to the Statistics Bulletin.

4.9 Bilateral exchange rates

(period averages; units of national currency per euro)

	Chinese renminbi	Croatian kuna	Czech koruna	Danish krone	Hungarian forint	Japanese yen	Polish zloty	Pound sterling	Romanian leu	Swedish krona	Swiss franc	US Dollar
	1	2	3	4	5	6	7	8	9	10	11	12
2022	7.079	7.535	24.566	7.440	391.286	138.027	4.686	0.853	4.9313	10.630	1.005	1.053
2023	7.660	.	24.004	7.451	381.853	151.990	4.542	0.870	4.9467	11.479	0.972	1.081
2024	7.787	.	25.120	7.459	395.304	163.852	4.306	0.847	4.9746	11.433	0.953	1.082
2024 Q1	7.805	.	25.071	7.456	388.182	161.150	4.333	0.856	4.9735	11.279	0.949	1.086
Q2	7.797	.	24.959	7.460	391.332	167.773	4.300	0.853	4.9750	11.504	0.974	1.077
Q3	7.870	.	25.195	7.461	394.101	163.952	4.283	0.845	4.9746	11.451	0.952	1.098
Q4	7.675	.	25.248	7.459	407.465	162.549	4.307	0.832	4.9754	11.494	0.936	1.068
2024 Sep.	7.861	.	25.099	7.460	394.863	159.081	4.276	0.840	4.9744	11.358	0.941	1.111
Oct.	7.728	.	25.298	7.459	401.901	163.197	4.317	0.835	4.9750	11.405	0.939	1.090
Nov.	7.662	.	25.301	7.458	409.251	163.234	4.332	0.834	4.9762	11.583	0.936	1.063
Dec.	7.630	.	25.136	7.459	411.986	161.083	4.270	0.828	4.9749	11.504	0.934	1.048
2025 Jan.	7.556	.	25.163	7.461	411.725	161.921	4.247	0.839	4.9752	11.480	0.941	1.035
Feb.	7.575	.	25.077	7.459	403.128	158.087	4.172	0.831	4.9770	11.247	0.941	1.041
	Percentage change versus previous month											
2025 Feb.	0.3	.	-0.3	0.0	-2.1	-2.4	-1.8	-1.0	0.0	-2.0	0.0	0.6
	Percentage change versus previous year											
2025 Feb.	-2.4	.	-0.6	0.1	3.9	-2.0	-3.5	-2.8	0.0	0.0	-0.5	-3.5

Source: ECB.

4 Financial market developments

4.10 Euro area balance of payments, financial account

(EUR billions, unless otherwise indicated; outstanding amounts at end of period; transactions during period)

	Total [1]			Direct investment		Portfolio investment		Net financial derivatives	Other investment		Reserve assets	Memo: Gross external debt
	Assets	Liabilities	Net	Assets	Liabilities	Assets	Liabilities		Assets	Liabilities		
	1	2	3	4	5	6	7	8	9	10	11	12
Outstanding amounts (international investment position)												
2023 Q4	32,386.9	32,041.0	345.9	12,121.5	9,944.6	12,465.4	14,520.1	-4.0	6,656.2	7,576.3	1,147.8	16,219.7
2024 Q1	33,684.6	33,138.9	545.7	12,390.0	10,014.1	13,124.9	15,268.1	-0.5	6,955.1	7,856.7	1,215.1	16,699.7
Q2	34,253.2	33,286.0	967.2	12,398.7	9,921.7	13,540.9	15,549.6	7.1	7,038.9	7,814.7	1,267.6	16,653.6
Q3	34,531.2	33,419.0	1,112.2	12,171.4	9,733.1	13,843.4	15,888.5	-3.9	7,201.3	7,797.4	1,319.0	16,690.5
Outstanding amounts as percentage of GDP												
2024 Q3	230.2	222.7	7.4	81.1	64.9	92.3	105.9	0.0	48.0	52.0	8.8	111.2
Transactions												
2024 Q1	568.3	453.8	114.5	128.2	32.3	172.1	198.5	13.5	253.4	223.1	1.2	-
Q2	180.2	51.3	128.9	-31.7	-104.8	173.1	254.2	16.9	18.1	-98.1	3.7	-
Q3	412.3	274.2	138.0	5.4	-12.7	166.5	217.4	-8.3	252.6	69.5	-4.0	-
Q4	-13.1	-112.9	99.8	-28.0	-16.7	152.0	141.2	20.6	-161.5	-237.4	3.9	-
2024 July	127.8	78.1	49.7	14.4	-11.9	51.9	59.9	-2.2	66.9	30.1	-3.1	-
Aug.	94.1	69.5	24.6	-9.6	-1.9	40.6	64.3	-7.7	73.8	7.1	-3.0	-
Sep.	190.4	126.7	63.7	0.6	1.2	74.0	93.1	1.6	112.0	32.4	2.2	-
Oct.	86.3	49.7	36.6	11.9	7.7	69.5	41.7	20.2	-15.1	0.3	-0.2	-
Nov.	165.8	152.3	13.5	6.8	1.5	38.6	61.7	-1.8	120.9	89.2	1.3	-
Dec.	-265.2	-315.0	49.8	-46.7	-25.9	43.9	37.9	2.2	-267.3	-326.9	2.7	-
12-month cumulated transactions												
2024 Dec.	1,147.7	666.5	481.2	74.0	-101.9	663.7	811.2	42.6	362.6	-42.9	4.8	-
12-month cumulated transactions as percentage of GDP												
2024 Dec.	7.6	4.4	3.2	0.5	-0.7	4.4	5.4	0.3	2.4	-0.3	0.0	-

Source: ECB.
1) Net financial derivatives are included in total assets.

5 Financing conditions and credit developments

5.1 Monetary aggregates [1)]

(EUR billions and annual growth rates; seasonally adjusted; outstanding amounts and growth rates at end of period; transactions during period)

	M3											
	M2							M3-M2				Total
	M1			M2-M1			Total					
	Currency in circulation	Overnight deposits	Total	Deposits with an agreed maturity of up to 2 years	Deposits redeemable at notice of up to 3 months	Total		Repos	Money market fund shares	Debt securities with a maturity of up to 2 years	Total	
	1	2	3	4	5	6	7	8	9	10	11	12
Outstanding amounts												
2022	1,538.9	9,758.1	11,297.0	1,366.9	2,565.3	3,932.2	15,229.2	123.0	646.3	49.7	819.0	16,048.2
2023	1,536.2	8,809.4	10,345.6	2,294.1	2,460.4	4,754.6	15,100.2	184.9	739.7	70.8	995.3	16,095.5
2024	1,556.9	9,021.5	10,578.4	2,528.2	2,469.1	4,997.3	15,575.7	253.4	869.4	27.8	1,150.5	16,726.2
2024 Q1	1,526.2	8,740.0	10,266.3	2,440.0	2,427.5	4,867.6	15,133.8	193.9	787.0	72.9	1,053.8	16,187.6
Q2	1,533.9	8,796.3	10,330.3	2,536.0	2,422.7	4,958.7	15,288.9	211.2	815.9	59.2	1,086.3	16,375.2
Q3	1,541.7	8,842.5	10,384.2	2,590.7	2,424.8	5,015.5	15,399.8	238.1	858.7	47.4	1,144.2	16,543.9
Q4 [p]	1,556.9	9,021.5	10,578.4	2,528.2	2,469.1	4,997.3	15,575.7	253.4	869.4	27.8	1,150.5	16,726.2
2024 Aug.	1,538.8	8,794.5	10,333.2	2,558.5	2,423.8	4,982.3	15,315.5	243.1	839.9	52.2	1,135.2	16,450.7
Sep.	1,541.7	8,842.5	10,384.2	2,590.7	2,424.8	5,015.5	15,399.8	238.1	858.7	47.4	1,144.2	16,543.9
Oct.	1,545.6	8,892.8	10,438.3	2,555.8	2,427.7	4,983.5	15,421.8	249.7	854.5	50.5	1,154.7	16,576.6
Nov.	1,550.9	8,996.8	10,547.7	2,560.0	2,433.8	4,993.7	15,541.4	245.6	858.1	39.3	1,143.0	16,684.4
Dec.	1,556.9	9,021.5	10,578.4	2,528.2	2,469.1	4,997.3	15,575.7	253.4	869.4	27.8	1,150.5	16,726.2
2025 Jan. [p]	1,555.8	9,043.3	10,599.1	2,511.8	2,471.9	4,983.8	15,582.9	267.7	856.9	47.4	1,172.0	16,754.9
Transactions												
2022	69.9	-57.3	12.6	425.5	55.6	481.1	493.7	3.6	2.4	76.8	82.8	576.5
2023	-4.1	-969.2	-973.3	920.6	-99.5	821.2	-152.1	40.3	93.8	23.5	157.6	5.5
2024	21.3	167.9	189.2	201.1	9.0	210.1	399.2	75.7	119.2	-38.6	156.4	555.6
2024 Q1	-9.3	-75.0	-84.3	144.2	-32.4	111.8	27.4	11.0	47.1	7.2	65.3	92.8
Q2	7.7	55.5	63.2	71.5	-4.8	66.8	130.0	16.9	25.9	-13.3	29.4	159.3
Q3	7.8	24.5	32.3	59.4	2.1	61.5	93.8	28.2	38.8	-10.9	56.1	149.9
Q4 [p]	15.2	162.8	178.0	-74.0	44.0	-29.9	148.1	19.7	7.4	-21.6	5.5	153.6
2024 Aug.	2.3	18.7	20.9	20.5	1.9	22.4	43.3	17.2	11.4	-5.8	22.8	66.2
Sep.	3.0	50.7	53.7	33.3	1.0	34.3	88.0	-4.7	17.4	-3.4	9.3	97.3
Oct.	3.9	44.4	48.3	-38.5	2.8	-35.7	12.6	10.6	-5.2	3.3	8.7	21.3
Nov.	5.3	97.6	102.9	-1.6	6.0	4.3	107.2	-5.4	2.8	-14.1	-16.7	90.5
Dec.	6.0	20.8	26.8	-33.9	35.3	1.4	28.2	14.5	9.9	-10.8	13.6	41.8
2025 Jan. [p]	-1.1	22.2	21.1	-16.1	1.8	-14.3	6.8	18.8	-13.7	19.8	24.9	31.7
Growth rates												
2022	4.8	-0.6	0.1	45.9	2.2	14.0	3.4	2.9	0.4	458.3	11.1	3.7
2023	-0.3	-9.9	-8.6	67.0	-3.9	20.9	-1.0	32.7	14.5	44.4	19.3	0.0
2024	1.4	1.9	1.8	8.8	0.4	4.4	2.6	41.3	16.1	-58.8	15.8	3.4
2024 Q1	-1.1	-7.6	-6.7	49.9	-4.7	16.6	-0.3	69.6	18.1	-16.8	20.8	0.9
Q2	-0.1	-4.0	-3.4	34.8	-3.6	12.7	1.2	62.8	17.0	-29.5	18.9	2.3
Q3	0.5	-1.6	-1.3	22.9	-1.7	9.6	2.0	61.6	19.3	-34.2	21.8	3.2
Q4 [p]	1.4	1.9	1.8	8.8	0.4	4.4	2.6	41.3	16.1	-58.8	15.8	3.4
2024 Aug.	0.3	-2.4	-2.0	26.2	-2.3	10.4	1.7	79.1	19.2	-37.4	22.8	2.9
Sep.	0.5	-1.6	-1.3	22.9	-1.7	9.6	2.0	61.6	19.3	-34.2	21.8	3.2
Oct.	0.7	0.1	0.2	16.8	-1.1	7.3	2.4	55.6	18.7	-37.2	20.1	3.4
Nov.	1.1	1.5	1.5	13.3	-0.6	6.1	2.9	39.3	17.7	-48.3	17.0	3.8
Dec.	1.4	1.9	1.8	8.8	0.4	4.4	2.6	41.3	16.1	-58.8	15.8	3.4
2025 Jan. [p]	1.5	2.9	2.7	5.7	1.1	3.3	2.9	51.3	12.3	-43.7	14.7	3.6

Sources: ECB.
1) Data refer to the changing composition of the euro area.

5 Financing conditions and credit developments

5.2 Deposits in M3 [1)]

(EUR billions and annual growth rates; seasonally adjusted; outstanding amounts and growth rates at end of period; transactions during period)

	Non-financial corporations [2)]					Households [3)]							
	Total	Overnight	With an agreed maturity of up to 2 years	Redeemable at notice of up to 3 months	Repos	Total	Overnight	With an agreed maturity of up to 2 years	Redeemable at notice of up to 3 months	Repos	Financial corporations other than MFIs and ICPFs [2)]	Insurance corporations and pension funds	Other general government [4)]
	1	2	3	4	5	6	7	8	9	10	11	12	13
Outstanding amounts													
2022	3,361.5	2,721.2	499.5	134.7	6.2	8,374.2	5,542.6	437.9	2,392.9	0.9	1,282.8	231.5	563.3
2023	3,334.1	2,419.5	771.8	131.3	11.6	8,421.5	5,110.8	1,015.9	2,293.3	1.4	1,223.9	227.0	542.3
2024	3,430.7	2,500.8	791.9	133.7	4.3	8,756.4	5,199.1	1,254.3	2,301.5	1.5	1,304.8	232.1	548.2
2024 Q1	3,337.5	2,381.4	817.7	127.5	10.9	8,455.8	5,056.9	1,133.0	2,264.9	1.0	1,244.8	223.0	540.4
Q2	3,381.9	2,410.2	833.8	127.1	10.8	8,529.1	5,062.8	1,203.4	2,261.6	1.3	1,299.7	221.8	533.8
Q3	3,364.9	2,404.7	823.6	125.6	11.0	8,618.7	5,091.3	1,260.2	2,266.2	1.0	1,331.7	230.1	550.8
Q4 [p]	3,430.7	2,500.8	791.9	133.7	4.3	8,756.4	5,199.1	1,254.3	2,301.5	1.5	1,304.8	232.1	548.2
2024 Aug.	3,363.8	2,396.1	831.9	126.0	9.7	8,589.5	5,091.2	1,232.9	2,264.4	1.0	1,305.1	218.0	543.5
Sep.	3,364.9	2,404.7	823.6	125.6	11.0	8,618.7	5,091.3	1,260.2	2,266.2	1.0	1,331.7	230.1	550.8
Oct.	3,378.3	2,422.2	815.9	127.5	12.7	8,658.5	5,122.5	1,267.6	2,267.3	0.9	1,319.9	220.5	548.7
Nov.	3,408.8	2,453.8	812.1	129.8	13.2	8,699.3	5,165.8	1,261.5	2,271.2	0.8	1,335.1	229.4	563.5
Dec.	3,430.7	2,500.8	791.9	133.7	4.3	8,756.4	5,199.1	1,254.3	2,301.5	1.5	1,304.8	232.1	548.2
2025 Jan. [p]	3,431.5	2,473.3	809.4	136.0	12.8	8,751.6	5,203.1	1,245.4	2,301.8	1.3	1,330.6	229.9	551.2
Transactions													
2022	122.9	-89.2	207.7	5.9	-1.5	295.8	166.8	74.9	54.0	0.1	-10.2	6.2	12.5
2023	-31.6	-306.8	271.1	-1.4	5.6	18.9	-459.8	572.6	-94.5	0.6	-64.2	-3.0	-27.8
2024	94.5	75.9	15.6	2.9	0.1	297.5	55.7	233.6	8.2	0.1	54.5	4.0	3.2
2024 Q1	2.1	-40.1	45.1	-3.2	0.3	31.5	-54.8	115.1	-28.4	-0.4	20.6	-4.6	-1.9
Q2	42.0	28.9	13.6	-0.3	-0.2	72.6	5.6	70.0	-3.3	0.2	34.0	-1.5	-8.0
Q3	-11.0	-1.7	-8.1	-1.7	0.4	60.5	-1.9	57.9	4.7	-0.3	38.9	9.3	16.5
Q4 [p]	61.4	88.9	-35.1	8.1	-0.5	132.9	106.7	-9.6	35.2	0.5	-39.0	0.7	-3.4
2024 Aug.	3.1	0.0	3.3	-0.6	0.3	8.1	0.0	5.7	2.4	0.0	40.2	3.1	3.8
Sep.	1.8	9.0	-8.0	-0.5	1.3	30.5	1.0	27.7	1.8	0.0	28.5	12.6	6.8
Oct.	9.5	15.0	-9.0	1.9	1.6	37.5	29.7	6.8	1.1	0.0	-14.9	-10.0	-2.6
Nov.	26.3	29.0	-5.2	2.3	0.3	38.7	43.7	-8.7	3.8	-0.2	8.7	8.3	14.5
Dec.	25.6	44.9	-20.9	3.9	-2.3	56.8	33.4	-7.7	30.3	0.8	-32.7	2.3	-15.3
2025 Jan. [p]	0.8	-27.5	17.5	2.3	8.5	-5.7	4.1	-8.9	-0.7	-0.2	30.8	-2.2	3.1
Growth rates													
2022	3.8	-3.2	70.3	4.6	-17.5	3.7	3.1	20.6	2.3	19.9	-0.5	2.8	2.3
2023	-0.9	-11.2	54.2	-1.1	90.8	0.2	-8.3	129.3	-4.0	67.7	-4.9	-1.3	-4.9
2024	2.8	3.1	2.0	2.2	1.8	3.5	1.1	23.0	0.4	6.1	4.4	1.8	0.6
2024 Q1	0.1	-8.3	36.4	-3.4	38.9	0.8	-7.1	101.7	-4.7	11.9	1.3	-2.2	-6.0
Q2	1.8	-3.3	21.4	-3.0	-8.9	2.0	-4.8	71.5	-3.6	48.4	6.8	-2.1	-5.5
Q3	1.6	-1.0	11.5	-4.2	-15.0	2.8	-2.7	47.9	-1.4	21.7	6.9	10.0	-1.6
Q4 [p]	2.8	3.1	2.0	2.2	1.8	3.5	1.1	23.0	0.4	6.1	4.4	1.8	0.6
2024 Aug.	1.8	-1.9	15.5	-4.0	10.4	2.3	-3.3	51.9	-2.2	16.3	10.3	-1.3	-3.0
Sep.	1.6	-1.0	11.5	-4.2	-15.0	2.8	-2.7	47.9	-1.4	21.7	6.9	10.0	-1.6
Oct.	1.7	0.5	5.9	-2.5	17.5	3.3	-1.2	39.1	-0.9	25.2	7.9	3.6	0.2
Nov.	2.3	1.8	4.5	-1.0	-4.1	3.5	0.2	30.1	-0.4	-3.1	7.8	1.6	4.6
Dec.	2.8	3.1	2.0	2.2	1.8	3.5	1.1	23.0	0.4	6.1	4.4	1.8	0.6
2025 Jan. [p]	3.1	3.5	0.4	6.2	188.4	3.3	1.7	16.4	0.8	19.1	8.1	2.9	3.5

Sources: ECB.
1) Data refer to the changing composition of the euro area.
2) In accordance with the ESA 2010, in December 2014 holding companies of non-financial groups were reclassified from the non-financial corporations sector to the financial corporations sector. These entities are included in MFI balance sheet statistics with financial corporations other than MFIs and insurance corporations and pension funds (ICPFs).
3) Including non-profit institutions serving households.
4) Refers to the general government sector excluding central government.

5 Financing conditions and credit developments

5.3 Credit to euro area residents [1)]

(EUR billions and annual growth rates; seasonally adjusted; outstanding amounts and growth rates at end of period; transactions during period)

	Credit to general government			Credit to other euro area residents								
	Total	Loans	Debt securities	Total	Loans						Debt securities	Equity and non-money market fund investment fund shares
					Total		To non-financial corporations [3)]	To households [4)]	To financial coprorations other than MFIs and ICPFs [3)]	To insurance corporations and pension funds		
					Total	Adjusted loans [2)]						
	1	2	3	4	5	6	7	8	9	10	11	12
Outstanding amounts												
2022	6,352.0	1,001.3	5,325.7	15,389.8	12,987.5	13,174.9	5,126.5	6,631.8	1,082.5	146.7	1,565.9	836.4
2023	6,305.3	990.6	5,289.3	15,492.9	13,033.8	13,253.1	5,123.2	6,648.1	1,124.5	138.0	1,560.7	898.4
2024	6,259.1	988.5	5,244.7	15,762.4	13,246.4	13,501.8	5,183.1	6,677.1	1,246.2	140.0	1,578.5	937.5
2024 Q1	6,219.2	976.6	5,217.1	15,546.1	13,046.8	13,278.2	5,116.5	6,641.9	1,151.2	137.2	1,569.2	930.1
Q2	6,195.6	978.6	5,191.2	15,572.4	13,101.2	13,339.7	5,130.7	6,644.8	1,194.9	130.9	1,553.8	917.3
Q3	6,255.2	975.4	5,254.1	15,633.3	13,143.6	13,377.8	5,140.2	6,661.4	1,209.2	132.8	1,561.0	928.7
Q4	6,259.1	988.5	5,244.7	15,762.4	13,246.4	13,501.8	5,183.1	6,677.1	1,246.2	140.0	1,578.5	937.5
2024 Aug.	6,234.3	976.8	5,231.8	15,614.7	13,133.2	13,366.9	5,137.1	6,655.4	1,207.4	133.3	1,556.2	925.3
Sep.	6,255.2	975.4	5,254.1	15,633.3	13,143.6	13,377.8	5,140.2	6,661.4	1,209.2	132.8	1,561.0	928.7
Oct.	6,246.0	986.6	5,233.6	15,668.5	13,166.0	13,415.8	5,144.3	6,660.6	1,225.4	135.7	1,573.0	929.6
Nov.	6,276.4	990.4	5,260.2	15,686.4	13,179.3	13,419.7	5,149.8	6,673.8	1,221.2	134.5	1,576.0	931.1
Dec.	6,259.1	988.5	5,244.7	15,762.4	13,246.4	13,501.8	5,183.1	6,677.1	1,246.2	140.0	1,578.5	937.5
2025 Jan.	6,306.9	996.4	5,284.6	15,808.8	13,281.6	13,527.7	5,194.6	6,696.4	1,253.9	136.8	1,577.0	950.1
Transactions												
2022	173.8	8.5	163.8	636.4	623.8	680.5	269.0	241.8	126.3	-13.3	18.6	-5.9
2023	-161.1	-17.4	-144.0	65.2	24.5	72.3	-5.7	7.7	30.7	-8.2	-4.6	45.4
2024	-63.1	-1.4	-62.2	269.6	228.7	271.0	76.6	44.7	105.6	1.8	9.1	31.7
2024 Q1	-61.8	-11.6	-50.4	61.6	31.1	44.6	-2.2	-2.7	36.8	-0.8	8.6	22.0
Q2	-2.8	2.4	-5.4	18.2	37.6	47.8	16.3	5.2	22.5	-6.5	-15.1	-4.3
Q3	-4.4	-3.2	-1.2	68.3	59.8	53.5	18.7	20.0	19.0	2.1	3.7	4.8
Q4	5.9	11.0	-5.2	121.5	100.3	125.2	43.9	22.3	27.2	6.9	12.0	9.2
2024 Aug.	9.3	2.8	6.5	23.5	15.2	15.9	12.8	10.7	-9.5	1.2	9.6	-1.3
Sep.	-5.1	-1.6	-3.6	21.3	15.5	14.6	5.4	7.7	2.8	-0.4	3.7	2.0
Oct.	6.9	8.6	-1.7	36.5	22.2	41.1	5.9	-0.1	13.6	2.8	11.5	2.8
Nov.	-6.5	4.8	-11.3	5.7	6.3	-3.1	3.5	14.0	-9.9	-1.2	-1.5	0.9
Dec.	5.6	-2.4	7.9	79.3	71.9	87.2	34.5	8.4	23.6	5.4	2.0	5.5
2025 Jan.	51.4	7.9	43.5	42.5	40.7	31.1	14.9	21.0	7.8	-3.1	-2.0	3.9
Growth rates												
2022	2.7	0.9	3.0	4.3	5.0	5.4	5.5	3.8	13.4	-7.9	1.2	-0.6
2023	-2.5	-1.7	-2.7	0.4	0.2	0.5	-0.1	0.1	2.8	-5.5	-0.3	5.3
2024	-1.0	-0.1	-1.2	1.7	1.8	2.0	1.5	0.7	9.4	1.3	0.6	3.5
2024 Q1	-2.6	-1.6	-2.8	0.8	0.4	0.8	-0.2	-0.2	6.6	-1.3	1.1	7.0
Q2	-1.4	-0.4	-1.6	0.9	0.9	1.1	0.3	0.3	8.4	-8.5	-1.1	4.6
Q3	-1.2	-0.9	-1.2	1.2	1.3	1.6	0.8	0.6	8.5	-3.7	-1.5	4.2
Q4	-1.0	-0.1	-1.2	1.7	1.8	2.0	1.5	0.7	9.4	1.3	0.6	3.5
2024 Aug.	-1.1	-0.6	-1.2	1.2	1.3	1.6	0.6	0.5	9.6	1.5	-1.6	4.0
Sep.	-1.2	-0.9	-1.2	1.2	1.3	1.6	0.8	0.6	8.5	-3.7	-1.5	4.2
Oct.	-0.8	-0.1	-1.0	1.2	1.2	1.7	0.8	0.5	7.9	0.2	-0.1	3.7
Nov.	-0.7	0.6	-1.0	1.3	1.2	1.5	1.0	0.5	6.3	0.0	0.2	4.8
Dec.	-1.0	-0.1	-1.2	1.7	1.8	2.0	1.5	0.7	9.4	1.3	0.6	3.5
2025 Jan.	0.3	1.2	0.2	2.0	2.2	2.3	2.0	1.2	9.5	1.8	-0.9	3.1

Source: ECB.
1) Data refer to the changing composition of the euro area.
2) Adjusted for loan sales and securitisation (resulting in derecognition from the MFI statistical balance sheet) as well as for positions arising from notional cash pooling services provided by MFIs.
3) In accordance with the ESA 2010, in December 2014 holding companies of non-financial groups were reclassified from the non-financial corporations sector to the financial corporations sector. These entities are included in MFI balance sheet statistics with financial corporations other than MFIs and insurance corporations and pension funds (ICPFs).
4) Including non-profit institutions serving households.

5 Financing conditions and credit developments

5.4 MFI loans to euro area non-financial corporations and households [1)]

(EUR billions and annual growth rates; seasonally adjusted; outstanding amounts and growth rates at end of period; transactions during period)

	Non-financial corporations [2)]					Households [3)]				
	Total		Up to 1 year	Over 1 and up to 5 years	Over 5 years	Total		Loans for consumption	Loans for house purchase	Other loans
	Total	Adjusted loans [4)]				Total	Adjusted loans [4)]			
	1	2	3	4	5	6	7	8	9	10
Outstanding amounts										
2022	5,126.5	5,126.4	960.0	1,076.9	3,089.6	6,631.8	6,832.5	715.1	5,214.2	702.6
2023	5,123.2	5,138.3	907.2	1,090.3	3,125.8	6,648.1	6,866.2	731.3	5,228.8	688.0
2024	5,183.1	5,204.0	921.7	1,099.1	3,162.3	6,677.1	6,928.6	745.0	5,255.2	676.9
2024 Q1	5,116.5	5,132.7	885.4	1,089.6	3,141.5	6,641.9	6,873.4	738.9	5,221.4	681.6
Q2	5,130.7	5,148.1	902.5	1,088.0	3,140.2	6,644.8	6,880.6	737.5	5,227.1	680.1
Q3	5,140.2	5,162.3	912.5	1,090.1	3,137.7	6,661.4	6,899.1	742.3	5,245.1	674.0
Q4	5,183.1	5,204.0	921.7	1,099.1	3,162.3	6,677.1	6,928.6	745.0	5,255.2	676.9
2024 Aug.	5,137.1	5,145.1	906.9	1,086.7	3,143.6	6,655.4	6,890.7	741.5	5,239.5	674.3
Sep.	5,140.2	5,162.3	912.5	1,090.1	3,137.7	6,661.4	6,899.1	742.3	5,245.1	674.0
Oct.	5,144.3	5,162.7	920.8	1,088.3	3,135.3	6,660.6	6,907.1	741.8	5,240.6	678.2
Nov.	5,149.8	5,166.2	919.2	1,087.4	3,143.3	6,673.8	6,918.6	741.3	5,250.4	682.1
Dec.	5,183.1	5,204.0	921.7	1,099.1	3,162.3	6,677.1	6,928.6	745.0	5,255.2	676.9
2025 Jan.	5,194.6	5,208.5	924.8	1,102.7	3,167.0	6,696.4	6,941.7	747.5	5,271.7	677.3
Transactions										
2022	269.0	308.3	78.0	77.3	113.7	241.8	250.0	23.2	217.7	0.9
2023	-5.7	24.2	-44.0	10.3	27.9	7.7	26.5	18.9	10.1	-21.3
2024	76.6	87.8	21.1	14.3	41.2	44.7	77.0	26.6	28.3	-10.1
2024 Q1	-2.2	0.9	-16.6	-0.6	14.9	-2.7	9.2	8.4	-6.1	-5.0
Q2	16.3	19.0	17.1	-0.6	-0.2	5.2	10.9	0.4	5.9	-1.1
Q3	18.7	22.7	13.6	4.5	0.6	20.0	20.7	7.1	17.9	-5.1
Q4	43.9	45.2	7.0	11.0	25.8	22.3	36.3	10.7	10.6	1.0
2024 Aug.	12.8	4.4	6.8	0.6	5.4	10.7	7.5	2.5	9.0	-0.8
Sep.	5.4	19.1	6.5	4.5	-5.6	7.7	9.1	1.8	5.9	0.0
Oct.	5.9	4.8	6.5	-1.2	0.7	-0.1	9.3	3.4	-3.1	-0.4
Nov.	3.5	1.0	-2.7	-1.0	7.1	14.0	12.2	1.9	9.1	3.0
Dec.	34.5	39.3	3.2	13.2	18.0	8.4	14.7	5.4	4.6	-1.6
2025 Jan.	14.9	7.4	3.0	5.3	6.6	21.0	15.1	3.0	17.4	0.6
Growth rates										
2022	5.5	6.4	8.8	7.7	3.8	3.8	3.8	3.3	4.4	0.1
2023	-0.1	0.5	-4.6	1.0	0.9	0.1	0.4	2.6	0.2	-3.0
2024	1.5	1.7	2.4	1.3	1.3	0.7	1.1	3.7	0.5	-1.5
2024 Q1	-0.2	0.3	-4.1	-0.2	1.0	-0.2	0.2	3.3	-0.2	-3.1
Q2	0.3	0.7	-0.8	0.0	0.7	0.3	0.3	2.7	0.4	-2.5
Q3	0.8	1.3	2.0	0.7	0.4	0.6	0.6	2.7	0.6	-2.2
Q4	1.5	1.7	2.4	1.3	1.3	0.7	1.1	3.7	0.5	-1.5
2024 Aug.	0.6	1.0	0.9	0.2	0.6	0.5	0.5	2.9	0.6	-2.5
Sep.	0.8	1.3	2.0	0.7	0.4	0.6	0.6	2.7	0.6	-2.2
Oct.	0.8	1.4	2.7	0.3	0.4	0.5	0.8	3.1	0.4	-1.9
Nov.	1.0	1.2	2.4	0.4	0.7	0.5	0.9	3.2	0.4	-1.5
Dec.	1.5	1.7	2.4	1.3	1.3	0.7	1.1	3.7	0.5	-1.5
2025 Jan.	2.0	2.0	4.3	1.7	1.4	1.2	1.3	3.9	1.1	-1.1

Source: ECB.
1) Data refer to the changing composition of the euro area.
2) In accordance with the ESA 2010, in December 2014 holding companies of non-financial groups were reclassified from the non-financial corporations sector to the financial corporations sector. These entities are included in MFI balance sheet statistics with financial corporations other than MFIs and insurance corporations and pension funds (ICPFs).
3) Including non-profit institutions serving households.
4) Adjusted for loan sales and securitisation (resulting in derecognition from the MFI statistical balance sheet) as well as for positions arising from notional cash pooling services provided by MFIs.

5 Financing conditions and credit developments

5.5 Counterparts to M3 other than credit to euro area residents [1)]

(EUR billions and annual growth rates; seasonally adjusted; outstanding amounts and growth rates at end of period; transactions during period)

	MFI liabilities						MFI assets			
		Longer-term financial liabilities vis-à-vis other euro area residents						Other		
	Central government holdings [2)]	Total	Deposits with an agreed maturity of over 2 years	Deposits redeemable at notice of over 3 months	Debt securities with a maturity of over 2 years	Capital and reserves	Net external assets	Total	Repos with central counter-parties [3)]	Reverse repos to central counter-parties [3)]
	1	2	3	4	5	6	7	8	9	10
Outstanding amounts										
2022	639.4	6,731.2	1,783.0	45.7	2,109.0	2,793.4	1,332.5	344.5	137.2	147.2
2023	447.4	7,327.2	1,827.5	90.2	2,413.8	2,995.6	1,858.1	213.8	152.1	152.6
2024	377.9	7,833.7	1,843.9	116.5	2,588.3	3,285.0	2,688.6	227.7	140.4	135.9
2024 Q1	395.4	7,457.0	1,829.0	103.9	2,488.6	3,035.6	2,051.2	223.5	178.0	174.2
Q2	410.5	7,526.1	1,828.2	109.9	2,526.1	3,061.9	2,243.8	300.1	182.6	176.5
Q3	402.8	7,679.4	1,833.1	114.3	2,541.1	3,190.9	2,490.4	247.2	184.9	188.5
Q4 (p)	377.9	7,833.7	1,843.9	116.5	2,588.3	3,285.0	2,688.6	227.7	140.4	135.9
2024 Aug.	419.2	7,609.0	1,822.6	112.7	2,534.0	3,139.7	2,397.7	232.2	193.2	170.7
Sep.	402.8	7,679.4	1,833.1	114.3	2,541.1	3,190.9	2,490.4	247.2	184.9	188.5
Oct.	445.4	7,753.3	1,832.3	115.7	2,561.1	3,244.3	2,599.6	261.2	169.6	172.2
Nov.	424.2	7,805.9	1,839.8	115.9	2,575.6	3,274.6	2,641.7	310.1	176.8	164.0
Dec.	377.9	7,833.7	1,843.9	116.5	2,588.3	3,285.0	2,688.6	227.7	140.4	135.9
2025 Jan. (p)	404.4	7,921.5	1,840.1	117.4	2,591.5	3,372.5	2,757.3	207.8	163.2	146.6
Transactions										
2022	-93.4	51.9	-88.8	-4.6	13.2	132.2	-69.0	-206.2	10.4	18.0
2023	-198.2	324.3	25.2	40.0	227.0	32.1	457.2	-229.7	17.1	9.0
2024	-69.1	283.8	16.3	26.2	164.1	77.2	564.7	-0.8	-11.7	-16.7
2024 Q1	-51.7	109.9	4.1	13.6	88.4	3.7	137.2	13.9	25.9	21.5
Q2	15.7	42.8	-0.8	6.0	31.8	5.8	149.4	53.0	4.6	2.3
Q3	-7.7	64.1	7.5	4.4	38.2	14.0	173.8	-31.3	2.4	12.0
Q4 (p)	-25.4	67.1	5.5	2.2	5.7	53.7	104.2	-36.4	-44.5	-52.6
2024 Aug.	14.4	26.5	2.4	1.1	20.1	2.9	46.4	27.9	26.4	15.8
Sep.	-16.4	31.9	11.1	1.6	12.8	6.4	61.6	35.0	-8.3	17.8
Oct.	42.5	11.2	-3.0	1.4	5.2	7.6	42.1	-10.4	-15.3	-16.3
Nov.	-21.5	5.4	5.5	0.2	-0.5	0.2	10.5	64.8	7.2	-8.2
Dec.	-46.5	50.5	3.0	0.6	1.0	45.9	51.6	-90.7	-36.3	-28.1
2025 Jan. (p)	26.5	22.1	-3.8	1.8	5.2	18.9	0.0	-13.6	22.8	10.6
Growth rates										
2022	-12.7	0.8	-4.8	-13.0	0.5	4.6	-	-	7.8	12.7
2023	-30.8	4.7	1.4	80.3	10.7	1.1	-	-	12.4	6.0
2024	-15.5	3.8	0.9	29.1	6.8	2.4	-	-	-7.7	-10.9
2024 Q1	-31.8	5.0	1.4	89.7	11.7	0.6	-	-	18.6	7.1
Q2	-16.1	4.4	0.7	78.5	9.8	0.9	-	-	9.6	4.3
Q3	-11.2	3.8	0.0	54.7	9.2	0.6	-	-	20.5	15.4
Q4 (p)	-15.5	3.8	0.9	29.1	6.8	2.4	-	-	-7.7	-10.9
2024 Aug.	-4.6	3.9	0.2	63.4	9.2	0.6	-	-	17.9	7.6
Sep.	-11.2	3.8	0.0	54.7	9.2	0.6	-	-	20.5	15.4
Oct.	0.6	3.6	0.1	47.0	8.3	0.8	-	-	5.5	13.7
Nov.	0.2	3.4	0.7	37.4	7.6	0.8	-	-	5.7	1.2
Dec.	-15.5	3.8	0.9	29.1	6.8	2.4	-	-	-7.7	-10.9
2025 Jan. (p)	-10.1	3.2	0.6	23.5	5.4	2.2	-	-	0.0	-8.2

Sources: ECB.
1) Data refer to the changing composition of the euro area.
2) Comprises central government holdings of deposits with the MFI sector and of securities issued by the MFI sector.
3) Not adjusted for seasonal effects.

6 Fiscal developments

6.1 Deficit/surplus

(as a percentage of GDP; flows during one-year period)

	Deficit (-)/surplus (+)					Memo item:
	Total	Central government	State government	Local government	Social security funds	Primary deficit (-)/ surplus (+)
	1	2	3	4	5	6
2020	-7.0	-5.7	-0.4	0.0	-0.9	-5.5
2021	-5.1	-5.1	0.0	0.0	0.0	-3.7
2022	-3.5	-3.7	0.0	0.0	0.3	-1.8
2023	-3.6	-3.6	-0.2	-0.2	0.4	-1.8
2023 Q4	-3.6	.	.	.	.	-1.8
2024 Q1	-3.6	.	.	.	.	-1.8
Q2	-3.5	.	.	.	.	-1.6
Q3	-3.2	.	.	.	.	-1.4

Sources: ECB for annual data; Eurostat for quarterly data.

6.2 Revenue and expenditure

(as a percentage of GDP; flows during one-year period)

	Revenue						Expenditure						
		Current revenue						Current expenditure					
	Total	Total	Direct taxes	Indirect taxes	Net social contribu-tions	Capital revenue	Total	Total	Compen-sation of employ-ees	Inter-mediate consump-tion	Interest	Social benefits	Capital expenditure
	1	2	3	4	5	6	7	8	9	10	11	12	13
2020	46.6	46.1	12.7	12.9	15.4	0.5	53.6	48.9	10.7	6.0	1.5	25.1	4.7
2021	46.9	46.2	13.0	13.2	15.0	0.8	52.0	46.9	10.3	6.0	1.4	23.7	5.1
2022	46.5	45.8	13.3	12.9	14.6	0.8	50.0	44.8	9.8	5.9	1.7	22.4	5.2
2023	46.0	45.1	13.2	12.3	14.6	0.8	49.5	44.2	9.8	5.9	1.7	22.3	5.3
2023 Q4	46.0	45.1	13.2	12.3	14.6	0.8	49.5	44.2	9.8	5.9	1.7	22.3	5.3
2024 Q1	46.0	45.2	13.2	12.3	14.6	0.8	49.5	44.2	9.8	5.9	1.8	22.4	5.3
Q2	46.2	45.4	13.3	12.3	14.7	0.8	49.6	44.4	9.9	5.9	1.8	22.6	5.3
Q3	46.4	45.5	13.3	12.4	14.7	0.8	49.6	44.5	9.9	6.0	1.9	22.7	5.1

Sources: ECB for annual data; Eurostat for quarterly data.

6.3 Government debt-to-GDP ratio

(as a percentage of GDP; outstanding amounts at end of period)

	Total	Financial instrument			Holder			Original maturity		Residual maturity			Currency	
		Currency and de-posits	Loans	Debt securi-ties	Resident creditors		Non-resident credi-tors	Up to 1 year	Over 1 year	Up to 1 year	Over 1 and up to 5 years	Over 5 years	Euro or participating currencies	Other curren-cies
					Total	MFIs								
	1	2	3	4	5	6	7	8	9	10	11	12	13	14
2020	96.5	3.1	14.5	78.8	53.9	38.8	42.6	11.1	85.4	18.7	30.7	47.1	94.8	1.6
2021	93.8	2.9	13.8	77.1	54.4	40.9	39.4	9.8	84.1	17.3	29.8	46.8	92.4	1.4
2022	89.5	2.6	13.1	73.7	52.5	39.6	37.0	8.7	80.8	16.0	28.4	45.2	88.5	1.0
2023	87.4	2.4	12.2	72.8	49.3	35.9	38.1	7.9	79.5	15.0	28.1	44.3	86.6	0.8
2023 Q4	87.4	2.4	12.2	72.8	.	.	.	.	.	.	.	.	.	.
2024 Q1	87.9	2.3	12.0	73.6	.	.	.	.	.	.	.	.	.	.
Q2	88.2	2.2	11.9	74.0	.	.	.	.	.	.	.	.	.	.
Q3	88.2	2.2	11.8	74.1	.	.	.	.	.	.	.	.	.	.

Sources: ECB for annual data; Eurostat for quarterly data.

6 Fiscal developments

6.4 Annual change in the government debt-to-GDP ratio and underlying factors [1)]

(as a percentage of GDP; flows during one-year period)

	Change in debt-to-GDP ratio [2)]	Primary deficit (+)/ surplus (-)	Deficit-debt adjustment								Interest-growth differential	Memo item: Borrowing requirement
			Total	Transactions in main financial assets					Revaluation effects and other changes in volume	Other		
				Total	Currency and deposits	Loans	Debt securities	Equity and investment fund shares				
	1	2	3	4	5	6	7	8	9	10	11	12
2020	12.9	5.5	2.2	2.5	2.0	0.5	-0.1	0.1	-0.3	0.0	5.2	9.5
2021	-2.7	3.7	-0.1	0.6	0.4	0.1	0.0	0.1	-0.1	-0.7	-6.2	5.0
2022	-4.3	1.8	-0.2	-0.2	-0.7	0.3	0.1	0.1	0.6	-0.6	-5.9	2.7
2023	-2.1	1.8	-0.4	-0.4	-0.5	-0.2	0.1	0.1	0.6	-0.5	-3.6	2.6
2023 Q4	-2.1	1.8	-0.4	-0.4	-0.5	-0.2	0.1	0.1	0.6	-0.5	-3.6	2.6
2024 Q1	-1.4	1.8	-0.5	-0.7	-0.8	-0.1	0.1	0.1	0.4	-0.3	-2.6	2.6
Q2	-0.6	1.6	-0.3	-0.5	-0.6	-0.1	0.1	0.1	0.3	-0.1	-2.0	2.8
Q3	-0.2	1.4	0.0	-0.3	-0.4	0.0	0.1	0.1	0.3	0.0	-1.6	3.0

Sources: ECB for annual data; Eurostat for quarterly data.
1) Intergovernmental lending in the context of the financial crisis is consolidated except in quarterly data on the deficit-debt adjustment.
2) Calculated as the difference between the government debt-to-GDP ratios at the end of the reference period and a year earlier.

6.5 Government debt securities [1)]

(debt service as a percentage of GDP; flows during debt service period; average nominal yields in percentages per annum)

	Debt service due within 1 year [2)]					Average residual maturity in years [3)]	Average nominal yields [4)]						
	Total	Principal		Interest			Outstanding amounts					Transactions	
										Fixed rate			
		Total	Maturities of up to 3 months	Total	Maturities of up to 3 months		Total	Floating rate	Zero coupon	Total	Maturities of up to 1 year	Issuance	Redemption
	1	2	3	4	5	6	7	8	9	10	11	12	13
2022	12.9	11.7	4.1	1.2	0.3	8.0	1.6	1.2	0.4	1.9	2.0	1.1	0.5
2023	12.9	11.6	4.1	1.4	0.3	8.1	2.0	1.2	1.9	2.0	1.6	3.6	1.9
2024	12.9	11.5	4.3	1.4	0.4	8.2	2.1	1.3	1.9	2.2	1.9	3.5	2.9
2024 Q1	12.8	11.4	3.8	1.3	0.3	8.3	2.0	1.3	2.1	2.1	1.5	3.7	2.5
Q2	13.0	11.6	3.6	1.4	0.4	8.3	2.1	1.3	2.1	2.1	1.6	3.8	2.8
Q3	13.0	11.5	3.9	1.4	0.4	8.2	2.1	1.3	2.3	2.1	1.6	3.7	2.9
Q4	12.9	11.5	4.3	1.4	0.4	8.2	2.1	1.3	1.9	2.2	1.9	3.5	2.9
2024 Aug.	13.0	11.6	4.1	1.4	0.4	8.2	2.1	1.3	2.1	2.1	1.6	3.8	2.8
Sep.	13.0	11.5	3.9	1.4	0.4	8.2	2.1	1.3	2.3	2.1	1.6	3.7	2.9
Oct.	13.2	11.7	3.8	1.4	0.4	8.2	2.1	1.3	2.0	2.1	1.8	3.6	2.9
Nov.	13.0	11.6	3.7	1.4	0.4	8.2	2.1	1.3	2.0	2.1	1.8	3.6	2.9
Dec.	12.9	11.5	4.3	1.4	0.4	8.2	2.1	1.3	1.9	2.2	1.9	3.5	2.9
2025 Jan.	12.9	11.4	4.1	1.5	0.4	8.2	2.1	1.3	2.0	2.2	1.9	3.5	2.9

Source: ECB.
1) At face value and not consolidated within the general government sector.
2) Excludes future payments on debt securities not yet outstanding and early redemptions.
3) Residual maturity at the end of the period.
4) Outstanding amounts at the end of the period; transactions as 12-month average.

6 Fiscal developments

6.6 Fiscal developments in euro area countries

(as a percentage of GDP; flows during one-year period and outstanding amounts at end of period)

	Belgium	Germany	Estonia	Ireland	Greece	Spain	France	Croatia	Italy	Cyprus
	1	2	3	4	5	6	7	8	9	10
	Government deficit (-)/surplus (+)									
2020	-9.0	-4.4	-5.4	-4.9	-9.6	-9.9	-8.9	-7.2	-9.4	-5.6
2021	-5.4	-3.2	-2.6	-1.4	-6.9	-6.7	-6.6	-2.6	-8.9	-1.6
2022	-3.6	-2.1	-1.1	1.7	-2.5	-4.6	-4.7	0.1	-8.1	2.6
2023	-4.2	-2.6	-2.8	1.5	-1.3	-3.5	-5.5	-0.9	-7.2	2.0
2023 Q4	-4.2	-2.6	-2.8	1.5	-1.3	-3.5	-5.5	-0.9	-7.2	2.0
2024 Q1	-4.1	-2.7	-3.0	1.4	-0.6	-3.7	-5.6	-0.8	-6.6	3.7
Q2	-4.2	-2.6	-3.5	1.9	0.3	-3.3	-5.7	-1.7	-6.1	4.3
Q3	-4.5	-2.6	-3.1	5.0	1.1	-3.2	-6.0	-2.0	-5.1	4.2
	Government debt									
2020	111.2	68.0	19.1	57.0	209.4	119.3	114.8	86.5	154.3	113.6
2021	108.4	68.1	18.4	52.6	197.3	115.7	112.7	78.2	145.7	96.5
2022	102.6	65.0	19.1	43.1	177.0	109.5	111.2	68.5	138.3	81.0
2023	103.1	62.9	20.2	43.3	163.9	105.1	109.9	61.8	134.8	73.6
2023 Q4	103.1	62.9	20.2	43.3	163.9	105.1	110.0	61.8	134.8	73.6
2024 Q1	106.6	62.6	24.1	42.5	161.8	106.3	110.8	62.0	135.2	72.6
Q2	106.6	61.9	23.8	42.7	160.0	105.3	112.4	60.0	136.9	70.5
Q3	105.6	62.4	24.0	42.2	158.2	104.3	113.8	59.7	136.3	69.7

	Latvia	Lithuania	Luxembourg	Malta	Netherlands	Austria	Portugal	Slovenia	Slovakia	Finland
	11	12	13	14	15	16	17	18	19	20
	Government deficit (-)/surplus (+)									
2020	-4.1	-6.3	-3.1	-8.7	-3.6	-8.2	-5.8	-7.7	-5.3	-5.5
2021	-7.2	-1.1	1.0	-7.0	-2.2	-5.7	-2.8	-4.6	-5.1	-2.7
2022	-4.9	-0.7	0.2	-5.2	0.0	-3.3	-0.3	-3.0	-1.7	-0.2
2023	-2.4	-0.7	-0.7	-4.5	-0.4	-2.6	1.2	-2.6	-5.2	-3.0
2023 Q4	-2.4	-0.7	-0.8	-4.6	-0.4	-2.6	1.2	-2.6	-5.2	-3.0
2024 Q1	-1.9	-0.6	-0.1	-3.8	-0.3	-2.8	0.9	-2.0	-5.1	-3.5
Q2	-1.8	-0.9	-0.1	-3.5	-0.4	-3.3	1.2	-2.0	-5.5	-4.1
Q3	-1.1	-1.4	0.0	-2.9	-0.3	-3.7	1.0	-1.8	-4.6	-4.7
	Government debt									
2020	44.0	45.9	24.5	48.7	53.3	83.2	134.1	80.2	58.4	75.4
2021	45.9	43.3	24.4	49.6	50.4	82.4	123.9	74.8	60.2	73.2
2022	44.4	38.1	24.6	49.4	48.3	78.4	111.2	72.7	57.7	74.0
2023	45.0	37.3	25.5	47.4	45.1	78.6	97.9	68.4	56.1	77.1
2023 Q4	45.0	37.3	25.6	47.7	45.2	78.6	97.9	68.4	56.1	77.3
2024 Q1	46.3	39.1	27.1	47.3	44.0	80.9	99.4	70.0	60.6	78.1
Q2	46.4	37.4	26.8	46.4	43.3	82.9	100.7	69.5	60.4	80.1
Q3	47.7	38.4	26.6	45.3	42.2	83.2	97.5	66.9	60.3	81.5

Source: Eurostat.

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For specific terminology please refer to the ECB glossary (available in English only).

The cut-off date for the statistics included in this issue was 5 March 2025.

PDF ISSN 2363-3417, QB-01-25-072-EN-N
HTML ISSN 2363-3417, QB-01-25-072-EN-Q