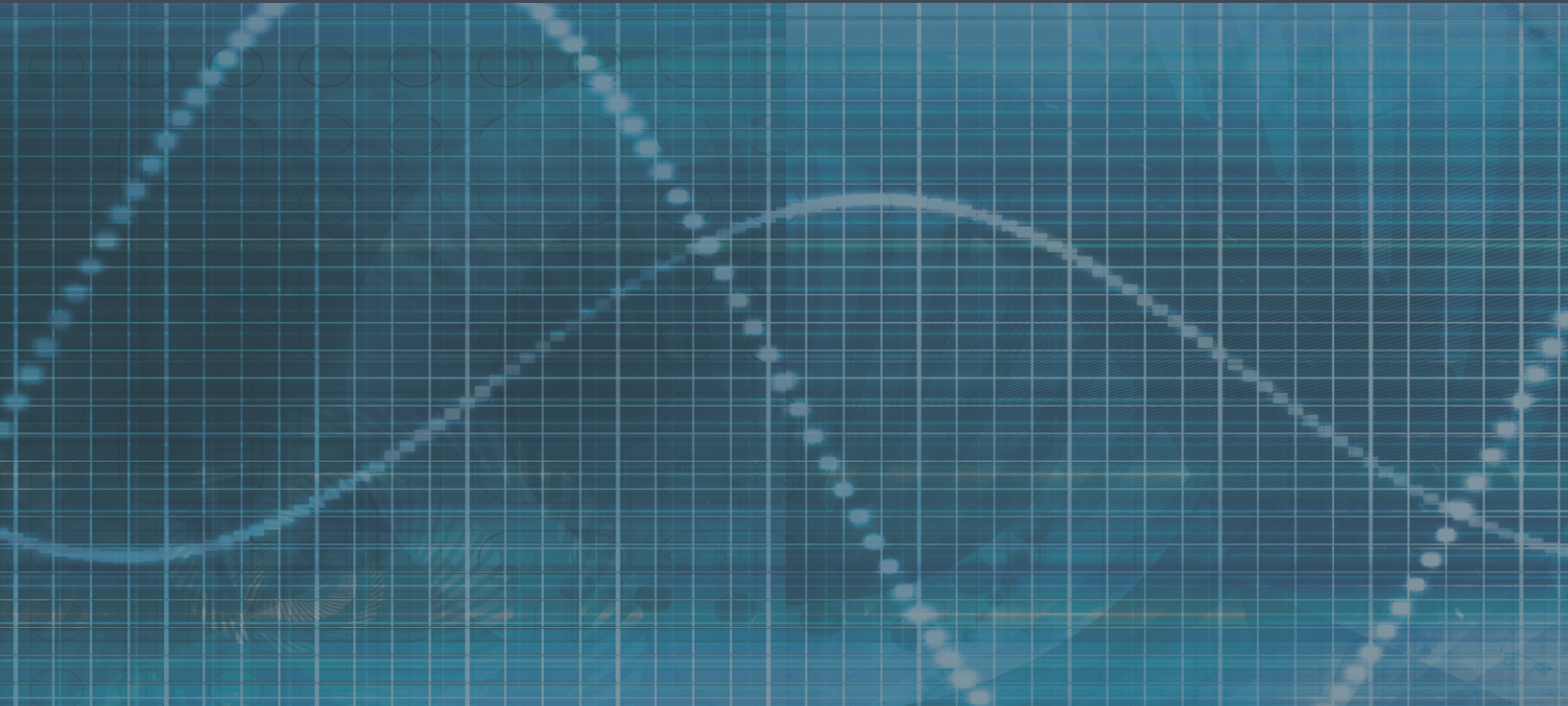


ANNUAL REPORT

2024

AMCESFI | Autoridad Macropudencial
Consejo de Estabilidad Financiera



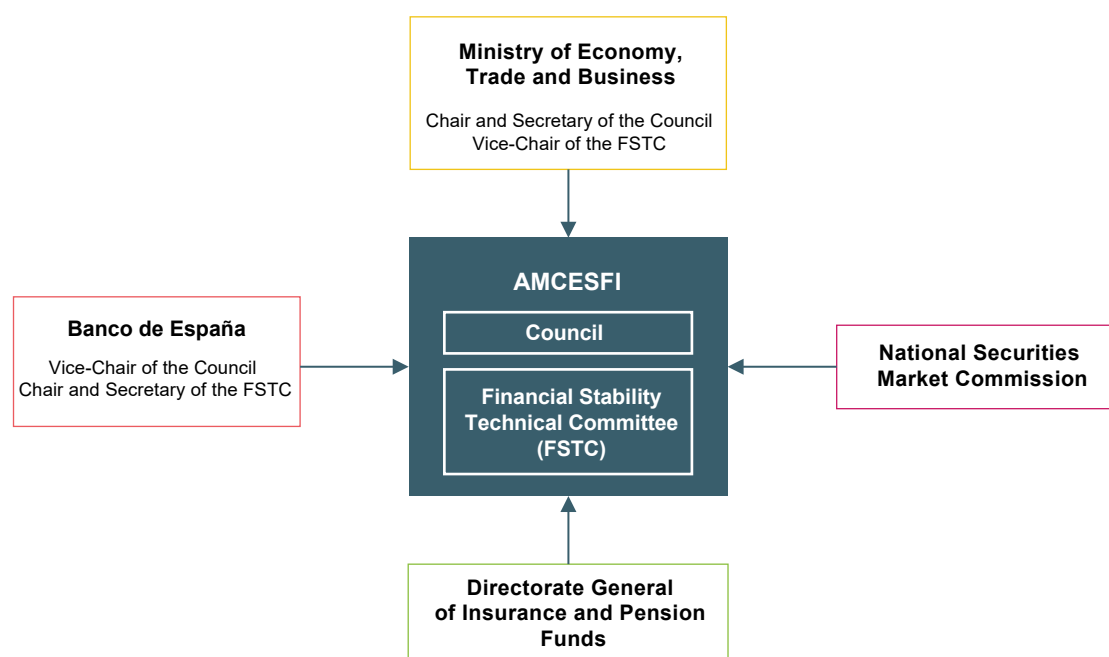
About AMCESFI

AMCESFI (Autoridad Macroprudencial Consejo de Estabilidad Financiera) is the macroprudential authority for the Spanish financial system. Set up in 2019, its goal is to contribute to the stability of the financial system as a whole by identifying, preventing and mitigating any circumstances or actions that may give rise to systemic risk. For this purpose, AMCESFI is empowered to issue opinions, warnings and recommendations on matters that could affect financial stability.

AMCESFI is organised as an operationally independent collegiate body attached to the Ministry of Economy, Trade and Business. It also includes representatives of the three Spanish authorities with sectoral responsibilities for the regulation and prudential supervision of the Spanish financial system, namely the Banco de España, the National Securities Market Commission (CNMV) and the Directorate General of Insurance and Pension Funds (DGSFP) of the Ministry of Economy, Trade and Business.

AMCESFI comprises two permanent structures: a Council and a Financial Stability Technical Committee (FSTC). By its very nature, it has no human, material or financial resources of its own; its activity is underpinned by the support it receives from its member institutions.

Figure 1 Structure of AMCESFI



SOURCE: AMCESFI.

This *Annual Report* is published in compliance with the accountability obligation envisaged in Article 19 of Royal Decree 102/2019 of 1 March 2019 creating the Spanish macroprudential authority (AMCESFI), establishing its legal regime and implementing certain aspects relating to macroprudential tools.

For more information about AMCESFI, see <https://www.amcesfi.es/wam/en/>.

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Introductory letter from the Minister for Economy, Trade and Business



Carlos Cuerpo,
Chair of the AMCESFI
Council

Dear reader,

I am honoured to present AMCESFI's *Annual Report 2024*. This was a particularly significant year for the institution, marking five years since it was created by Royal Decree 102/2019, and is cause to reflect on the journey so far and to renew the commitment to its foundational mission: to safeguard the stability of the Spanish financial system and help it to drive the steady, inclusive and sustainable growth of the Spanish economy.

Since its creation in March 2019, AMCESFI has cemented its position as a key and useful part of the institutional framework that oversees the stability of the financial system in Spain, serving as a crucial forum for coordinating the national financial authorities. These years have witnessed episodes that have put the financial system's resilience to the test: the COVID-19 pandemic, geopolitical tensions and the increase in violent conflicts, the inflationary period of 2022-24, the US and Swiss banking crises of spring 2023 and, more recently, trade disruptions and extreme weather events that remind us of the growing interconnection between financial and non-financial risks. In all these cases, AMCESFI's work has enhanced the risk mitigation and prevention mechanisms and boosted consistency and synergies across the different regulatory and supervisory policies. This report focuses on 2024, marked by some of the above-mentioned events, in an international setting that remained characterised by high levels of uncertainty.

Against this background, the Spanish economy's performance has continued to stand out. In 2024 it once again recorded a growth rate above the euro area average. These dynamics are expected to continue in 2025 and 2026, with the European Commission and the International Monetary Fund (IMF) having raised their growth forecasts for both years, compared with the widespread cuts to global growth expectations. Spanish economic growth is underpinned by positive labour market developments (which have driven the unemployment rate to its lowest levels of the last 15 years and social security registrations to all-time highs), productive investment supported by the Recovery, Transformation and Resilience Plan and European funds, and the sound performance of the external sector. In addition,

this growth has been compatible with fiscal consolidation, a gradual decline in the government debt-to-GDP ratio, continued deleveraging by households and non-financial corporations and the improvement in Spain's negative net international investment position.

Such a positive domestic macroeconomic environment has been favourable for the Spanish financial system, which has evidenced its sound position and benefited from the structural headway made over the last decade, including banks' greater efficiency and solvency, a strengthened regulatory and supervisory framework and prudent risk exposure. The banking sector, in particular, has maintained high levels of profitability and liquidity (generally above those of its European peers), compatible with maintaining credit quality against a backdrop of high interest rates.

In 2025 to date the Spanish economy has continued to exhibit its strength in absolute and relative terms compared with other advanced economies, amid growing uncertainty. In the financial markets, the IBEX 35 has reached highs unseen since 2007, reflecting investor confidence in the domestic macroeconomic setting. Against this background, both the IMF and the European Commission have recently revised up their growth forecasts for 2025 and the employment figures remain robust. Meanwhile, the announcements of changes to US tariff policy have increased the uncertainty and volatility on the financial markets, although for the time being this has not prompted a significant impact on the real economy. Nonetheless, in April the Spanish Council of Ministers adopted a raft of measures to support Spanish export companies that could potentially be affected by possible changes in international trade patterns.

In 2024 AMCESFI stepped up its analysis and identification of systemic risks, in addition to holding regular Council and FSTC meetings and preparing and publishing regular reports, including the publication this May of the second *Biennial Report on Climate Change Risks to the Financial System*, thus delivering on the mandate established in the Climate Change and Energy Transition Law. Spain is already directly suffering the consequences of extreme weather events, in particular the October 2024 flash floods, which affected different areas of the country but most especially the Valencia province. The biennial report includes an analysis of the effects of the flash floods from a financial stability standpoint, highlighting the need for a just and orderly transition to a sustainable economy.

For its part, in 2024 the IMF completed and published the conclusions of its Financial Sector Assessment Program, a five-yearly assessment of Spain's financial system. The IMF staff prepared a Technical Note on the macroprudential policy framework and tools in Spain, analysing the role played by AMCESFI. In this respect, the IMF concluded that the creation of AMCESFI had strengthened the institutional and legal framework for macroprudential policy and highlighted the value it adds to the institutional architecture. To continue improving its functioning, the IMF made a series of recommendations that are already being considered. Indeed, in some cases they are already being implemented, such as AMCESFI

assuming a broader coordination and analysis role for cross-agency matters, through the creation of the Artificial Intelligence Subcommittee, whose aim is to anticipate and analyse the possible systemic implications of the growing use of new technologies linked to artificial intelligence in the financial system.

Looking ahead, AMCESFI will continue to play a key role in the monitoring and analysis of the financial system's structural transformations, such as the digitalisation of financial services, the emergence of new business models, interconnections between sectors and countries and the management of persistent geopolitical risk, among others. These matters do not just concern Spain; they are global issues that must be addressed in a coordinated manner with our European partners. Thus, in the European Union headway is being made to improve how our capital markets function, so that they are open and integrated and foster growth, innovation and competitiveness, through initiatives such as the European Competitiveness Lab and the Savings and Investments Union. These are necessary developments to drive investment and strategic autonomy in Europe.

To conclude, on behalf of all the authorities that comprise AMCESFI, I am grateful for the collective effort that has made this report possible and I reaffirm the commitment to continue working in a coordinated manner to ensure the stability of the Spanish financial system.

1 AMCESFI activities in 2024

AMCESFI carried out its activities in 2024 against a backdrop of geopolitical risks associated with the EU and US elections, Russia's ongoing invasion of Ukraine, the Middle East conflict and the devastating flash floods that affected various areas in eastern peninsular Spain in October. Specifically, the Council and the Financial Stability Technical Committee (FSTC) held seven meetings to discuss the following issues:

- (i) The main risks and vulnerabilities of the Spanish financial system,
- (ii) Developments in the sectors comprising the Spanish financial system; the macroprudential policy approach of (i) the Banco de España regarding the countercyclical capital buffer (CCyB) and (ii) the National Securities Market Commission (CNMV) regarding asset management activities,
- (iii) The unprecedented challenges posed by the flash floods for the insurance sector,
- (iv) The preparation of the second *Biennial Report on Climate Change Risks to the Financial System* (2025), and
- (v) The conclusions of the IMF's Financial Sector Assessment Program (FSAP) for Spain and the discussion of the *Annual Report 2023*.

In 2024 AMCESFI published advisory opinions on three Banco de España proposals for macroprudential measures. In accordance with Articles 11 and 16 of Royal Decree 102/2019, AMCESFI issued favourable opinions on these measures:

- (i) The activation in October 2024, for the first time, of a CCyB (calibrated at 0.5% of risk-weighted assets (RWAs) located in Spain) to foster the banking sector's overall resilience in a standard risk environment (according to the Banco de España's revised CCyB methodology).
- (ii) The introduction, in accordance with the recommendation of the European Systemic Risk Board (ESRB), of two macroprudential measures reciprocating systemic risk buffers (SyRBs) previously adopted by other Member States, consisting of the following:
 - In Portugal, a sectoral SyRB buffer of 4% applicable from October 2024 to three Spanish banks on their retail exposures to Portuguese residential real estate.

- In Italy, an SyRB (similar in design to the CCyB) of 0.5%, applicable to the two Spanish banks with the strongest presence in Italy, calibrated at 0.5% of RWAs from 31 December 2024 to 29 June 2025 and at 1% of RWAs thereafter, on all credit risk exposures and counterparty credit risk exposures in Italy.

Additionally, AMCESFI's FSTC was informed in advance of other quarterly measures on maintaining the CCyB, and of the annual identification of Spanish domestic and global systemically important institutions along with their associated capital buffers (for 2025 and 2026, respectively). For their part, the CNMV and the Directorate General of Insurance and Pension Funds (DGSFP) did not inform AMCESFI of any macroprudential initiatives in 2024.

AMCESFI has continued to serve as a platform to coordinate issues relating to the ESRB. Through AMCESFI, working relationships are established at various levels between its member authorities: in addition to engagement on the Council and the FSTC, their technical staff interact in subcommittees and, more generally, as part of coordinating the secretariat, meetings and publications. In turn, these work channels facilitate coordination between the Banco de España, the CNMV and the DGSFP as members of the ESRB (the EU's macroprudential committee) and dialogue between AMCESFI and the ESRB (of which it is not a member) through the Banco de España, the CNMV and the DGSFP, for example, in the context of occasional requests for information on the recommendations issued by the ESRB to the national authorities (see Chapter 5).

AMCESFI also acts as a forum for sharing documents about financial stability and macroprudential policy among its member institutions. The FSTC was informed in a timely manner of the publication of the half-yearly editions of the Banco de España's *Financial Stability Report* and *Financial Stability Review*, as well as the CNMV's *Financial Stability Notes*, among other documents.¹ The Banco de España also shared its latest 2024 report on the stress testing of the Spanish banks under its direct supervision, which it submitted to the Spanish Parliament.²

In 2024 AMCESFI's Council decided to set up an artificial intelligence (AI) subcommittee. In view of the unquestionable emergence of this matter globally, the Council agreed to set up a temporary subcommittee geared towards the joint analysis of the latest AI developments applicable to financial oversight. This subcommittee is intended to inform AMCESFI on issues related to the degree of penetration of AI in the sectors composing the financial system, assessing, from a cross-cutting standpoint, its potential implications for financial stability. It is led by the Banco de España and is expected to complete its tasks in 2025. The Interconnections Subcommittee, created in 2020, saw its mandate renewed to

¹ Annex 3 includes a detailed breakdown of the main publications of AMCESFI's member institutions over the past twelve months.

² Non-public report.

Table 1.1 Composition of AMCESFI's Council at 31 December 2024

Institution	Position	Name	Position on the Council
Ministry of Economy, Trade and Business	Minister	Carlos Cuerpo Caballero	Chair
Banco de España	Governor	José Luis Escrivá Belmonte	Vice-Chair
National Securities Market Commission	Chair	Carlos San Basilio Pardo	Member
Banco de España	Deputy Governor	Soledad Núñez Ramos	Member
National Securities Market Commission	Vice-Chair	Paloma Marín Bona	Member
Ministry of Economy, Trade and Business	Secretary of State for Economy and Business Affairs	Israel Arroyo Martínez	Member
Ministry of Economy, Trade and Business	Director General of Insurance and Pension Funds	José Antonio Fernández de Pinto	Member
Ministry of Economy, Trade and Business	Secretary-General of the Treasury and International Financing	Paula Conthe Calvo	Secretary

SOURCE: AMCESFI.

become a permanent structure, given the importance of its analyses for AMCESFI. As in previous editions of the Annual Report, the work of this subcommittee is summarised in Chapter 4.

As regards AMCESFI's governance, notable in 2024 were the extensive changes in membership owing to the appointment of senior officials across all its member institutions. Seven of AMCESFI's eight Council members (all ex officio members) were newly appointed (see Table 1.1), with the following individuals taking office: Israel Arroyo and Paula Conthe at the Ministry of Economy, Trade and Business (January 2024), José Antonio Fernández de Pinto at the DGSFP (May 2024), José Luis Escrivá and Soledad Núñez at the Banco de España (September 2024) and Carlos San Basilio and Paloma Marín at the CNMV (December 2024). Similarly, the FSTC saw six of its nine members replaced (see Table 1.2) with the formalisation of four of the above-mentioned appointments, and the movements of Carla Díaz Álvarez de Toledo within the Ministry of Economy, Trade and Business (February 2024) and Daniel Pérez Cid in the Banco de España (December 2024). These changes have led to a major renewal of AMCESFI's Council, where none of its 2019 founding members remain³ (see Figure 1.1).

In 2024 AMCESFI published its *Annual Report 2023*. The report was published in Spanish and English on 9 September 2024 and is available on AMCESFI's website (www.amcesfi.es).

³ As an exception, however, one of its current members, Carlos San Basilio, served at AMCESFI between 2019 and 2021 in his capacity as Secretary-General of the Treasury and International Financing.

Table 1.2 Composition of AMCESFI's FSTC at 31 December 2024

Institution	Position	Name	Position on the Committee
Banco de España	Deputy Governor	Soledad Núñez Ramos	Chair
Ministry of Economy, Trade and Business	Secretary-General of the Treasury and International Financing	Paula Conthe Calvo	Vice-Chair
National Securities Market Commission	Vice-Chair	Paloma Marín Bona	Member
Ministry of Economy, Trade and Business	Director General of the Treasury and Financial Policy	Carla Díaz Álvarez de Toledo	Member
Ministry of Economy, Trade and Business	Director General of Insurance and Pension Funds	José Antonio Fernández de Pinto	Member
Banco de España	Director General Financial Stability, Regulation and Resolution	Daniel Pérez Cid	Member and Secretary
Banco de España	Director General Banking Supervision	Mercedes Olano Librán	Member
National Securities Market Commission	Director General of Strategic Policy and International Affairs	Víctor Rodríguez Quejido	Member
National Securities Market Commission	Director General of Markets	Ángel Benito Benito	Member
National Securities Market Commission	Director General of Institutions	José María Marcos Bermejo	Member

SOURCE: AMCESFI.

Figure 1.1 Composition of AMCESFI's Council at 31 December 2024

SOURCE: AMCESFI.

2 Macro-financial environment

2.1 Main macro-aggregates

The Spanish economy maintained a brisk pace of growth in 2024. GDP grew by 3.2% in 2024, exceeding analysts' forecasts and outstripping the 2023 figure by 0.5 percentage points (pp). This marks four consecutive years of expansion for the Spanish economy, which continues to outperform the main euro area economies. On the demand side, domestic demand was the main driver of growth in 2024 (contributing 2.8 pp), especially through consumption and investment in construction and capital goods. The contribution of external demand for goods weakened, whereas that of external demand for services remained robust. As in 2023, the growth remained underpinned by a strong labour market, with notable productivity gains.

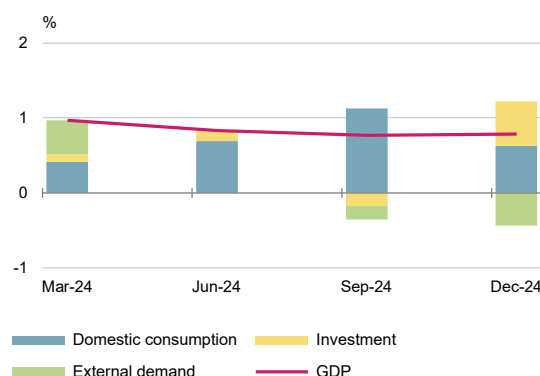
Job creation once again stood at all-time highs, outpacing the previous year's figures. 2024 ended with 21.2 million social security registrations (21.3 million in seasonally adjusted terms), marking 56 months of consecutive growth. Headcount employment rose by 501,551. As a result, by end-2024 the unemployment rate had fallen to 10.6% (see Chart A1.1 of Annex 1), the lowest year-end figure since 2007.

In Europe, highlights included the gradual recovery in the euro area economy and the change in the monetary policy stance, with a progressive reduction in interest rates. Growth improved slightly in the euro area (to 0.9% from 0.4% in 2023) but is still far from regaining robust levels. The recovery has been fuelled by improvements in the services sector and external demand. In Spain, lower policy rates drove down the cost of borrowing for households and firms in 2024, which explains the increase in new lending in both segments and the incipient recovery in the stock of outstanding loans to households. The non-performing loan (NPL) ratio remained low, ending 2024 on a downward trajectory at 3.3% of total credit.

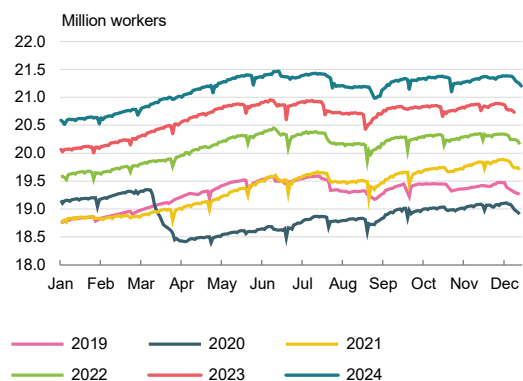
The Spanish economy's core internal and external metrics performed well in 2024. The economy's net lending climbed from 3.7% in 2023 to 4.2% in 2024, the highest figure in the series since 1993. The current account balance amounted to 3% of GDP (up from 2.7% in 2023). This was underpinned by the services surplus (with a marked improvement in the travel surplus, which offset the income deficit), while the capital account surplus reached 1.2% of GDP, with both maintaining their surplus positions from 2023. Coupled with nominal GDP growth, this net lending allowed the negative net international investment position to shrink further (-44% of GDP in 2024, compared with -51.3% in 2023). Turning to the core internal metrics, the deleveraging process continued, with private debt declining to 107.2% of GDP in 2024, its lowest level since 2001. This is largely attributable to higher incomes, although lower nominal debt has also played a role in the households segment.

Chart 2.1 Main macro-aggregates

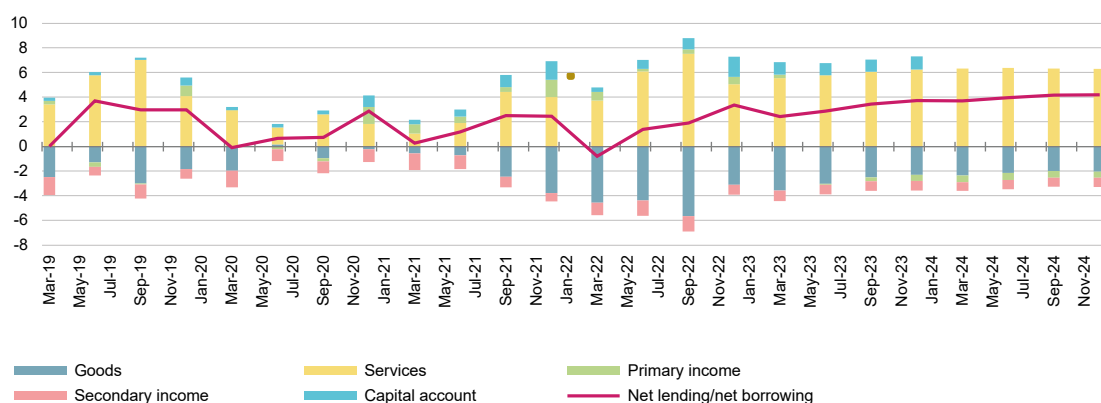
1 Quarterly GDP by component



2 Social security registrations



3 Balance of payments



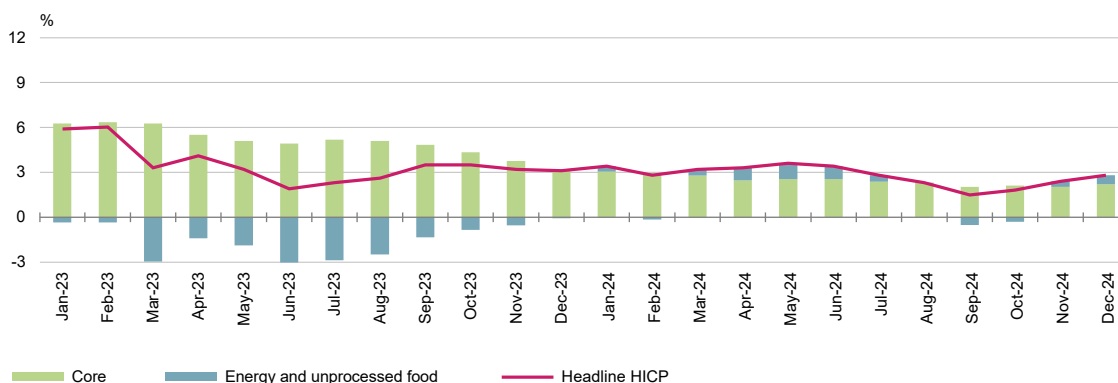
SOURCES: INE, Ministry of Inclusion, Social Security and Migration and Ministry of Economy, Trade and Business.

The disinflationary process continued in Spain during 2024, albeit at a slower pace than in previous years, with CPI inflation standing at 2.8% in December 2024. Inflation ticked up in December, largely due to rising energy prices, particularly fuel. Core inflation stood at 2.6% year-on-year at end-2024, having risen in December after a weak performance since August.

The government deficit shrank from 3.5% in 2023 to 2.8% in 2024 (or 3.2% including the aid related to the October deadly floods), driven by higher revenue and lower expenditure (net of flood-related aid) in relative terms. Tax revenue in cash terms was again at record levels (€294,734 million, up 8.4% on the 2023 figure) thanks to stronger economic activity, job creation and, to a lesser extent, inflation. As a result, resources in national accounts rose by 0.3 pp compared with 2023. In GDP terms, government expenditure ended 2024 unchanged from a year earlier. However, excluding the flood-related aid, such expenditure would have been 0.35% lower.

These developments enabled the government debt ratio to continue its downward trend, reaching 101.8% of GDP in 2024 from 105.1% at end-2023

Chart 2.2 Breakdown of the inflation rate (year-on-year rate of change)



SOURCE: INE.

(see Chart A1.1 of Annex 1). This represents a 22.4 pp drop from the March 2021 peak (124.2% of GDP). Net sovereign issuance was down by €10 billion, to €55,034 million in 2024, with gross issuance at €259,365 million, an increase of €7.37 billion on 2023, owing to the higher volume of redemptions in 2024. In 2024 the cost of new debt issuance eased to 3.16%, 28 basis points (bp) down on the 2023 average (3.44%), in tandem with the monetary policy cycle shift in the euro area and Spain's improved positioning in sovereign debt markets.

2.2 Money markets and central banks

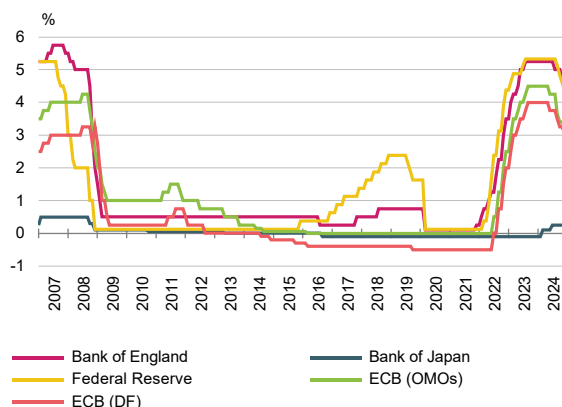
Central banks changed their monetary policy stances in 2024, which had a significant impact on money markets. The year saw a shift in monetary policy cycles: the Federal Reserve initiated rate cuts in September, lowering rates by a cumulative 100 bp, while the Bank of England did so in August, with a cumulative reduction of 50 bp. Conversely, the Bank of Japan raised its key policy rates in March, the first such move since 2007.

The European Central Bank (ECB) lowered the deposit facility rate by 100 bp in 2024, having initiated the cutting cycle in June and opting for three consecutive cuts from September. The ECB Governing Council had held the deposit facility rate (the benchmark rate used to steer the monetary policy stance) at 4% until its June meeting, when it implemented a 25 bp cut. After pausing in July, it opted for three consecutive cuts in September, October and December, bringing the rate down to 3% by year-end.

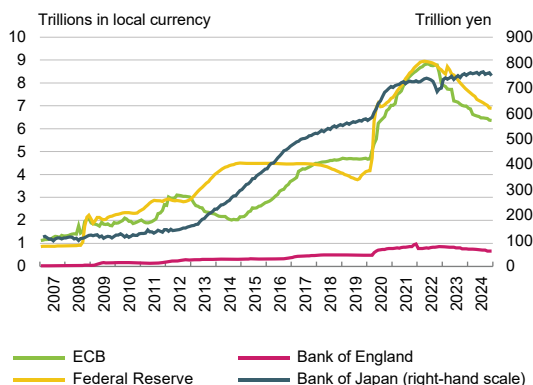
In 2024 the ECB announced its new operational framework, confirming that the Governing Council would continue to steer the monetary policy stance through the deposit facility rate. Against this backdrop, the interest rate spread between the marginal lending facility and the deposit facility narrowed from 75 bp to

Chart 2.3 Central banks

1 Main central banks' policy interest rates



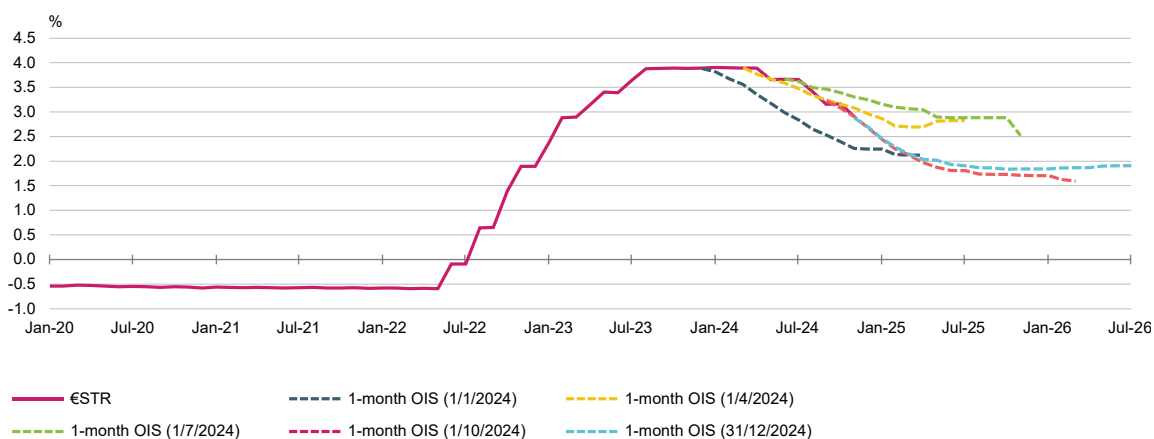
2 Size of main central banks' balance sheets



SOURCES: ECB, the Federal Reserve System, Bank of England and Bank of Japan.

NOTE: DF: deposit facility; OMOs: open market operations.

Chart 2.4 Changes in the €STR and future outlook based on 1-month forward OIS agreements (a)



SOURCES: Refinitiv and own calculations.

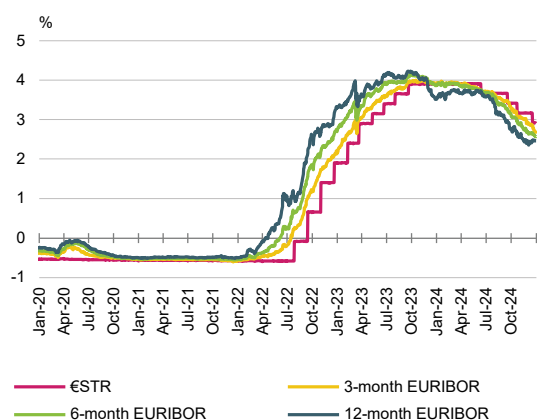
a The different dotted lines show the implied future rates in an €STR-based overnight index swap (OIS) that were quoted on the market on the dates indicated.

40 bp, while that between main refinancing operations and the deposit facility shrank from 50 bp to 15 bp. The change came into effect on 18 September. The Eurosystem will provide liquidity through a broad mix of instruments, including short-term and three-month credit operations. At a later stage, once the Eurosystem balance sheet begins to grow durably again, structural longer-term credit operations and a structural portfolio of securities will be introduced.

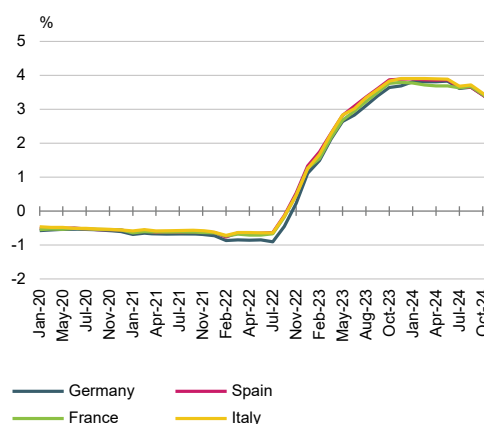
The expected path of ECB policy interest rates was somewhat volatile over 2024. According to the forward curve for the overnight rate (a proxy for interest rate

Chart 2.5 Reference money market interest rates

1 Reference unsecured money market interest rates



2 Reference secured money market interest rates, by country (a)



SOURCES: ECB (Money Market Statistical Reporting) and Refinitiv.

a For overnight transactions.

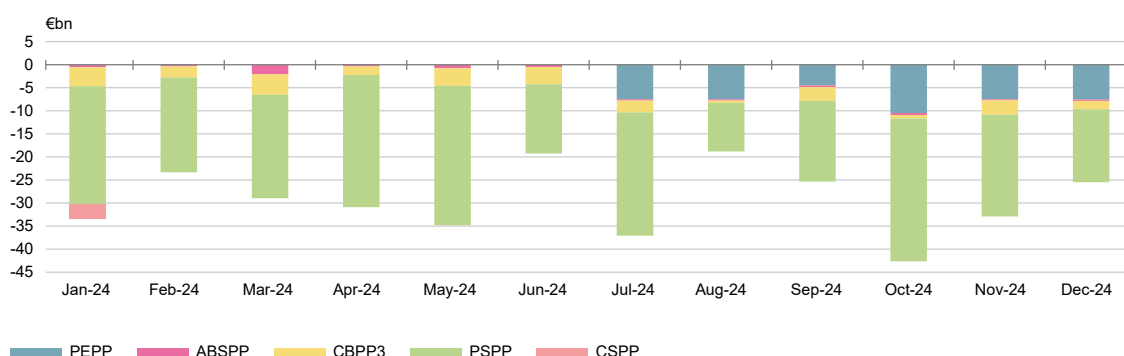
expectations), during the early months of 2024 the market anticipated a slower pace of rate cuts than it had in January (see Chart 2.4). From June, market expectations for interest rates were revised down. In December 2024 the markets anticipated a terminal rate of 1.86%.

Lower policy rates were passed through to money market rates, which declined in the second half of 2024. The overnight rate in the unsecured interbank market (€STR) has largely moved in tandem with the deposit facility rate, holding around 10 bp below it. The various EURIBOR rates at different maturities followed similar patterns, mirroring market expectations for rate cuts at varying horizons. The shift in the monetary policy stance also passed through to rates in the secured (or repo) segment, although episodes of collateral scarcity for certain sovereigns delayed this transmission somewhat.

In 2024 the Eurosystem continued to reduce its balance sheet, which was down by €636 billion to €6.36 trillion, attributable largely to repayments of targeted longer-term refinancing operations (TLTROs). TLTRO repayments accounted for €379 billion of that reduction, with banks repaying all remaining TLTRO amounts on 18 December, drawing that phase of the Eurosystem's balance sheet normalisation to a close.

The ECB Governing Council announced adjustments to its asset purchase programmes for monetary policy purposes, as part of the balance sheet normalisation process. By June 2024, holdings under the pandemic emergency purchase programme (PEPP) had decreased by €141 million. Thereafter they declined by an average of €7.5 billion per month as the Governing Council stopped

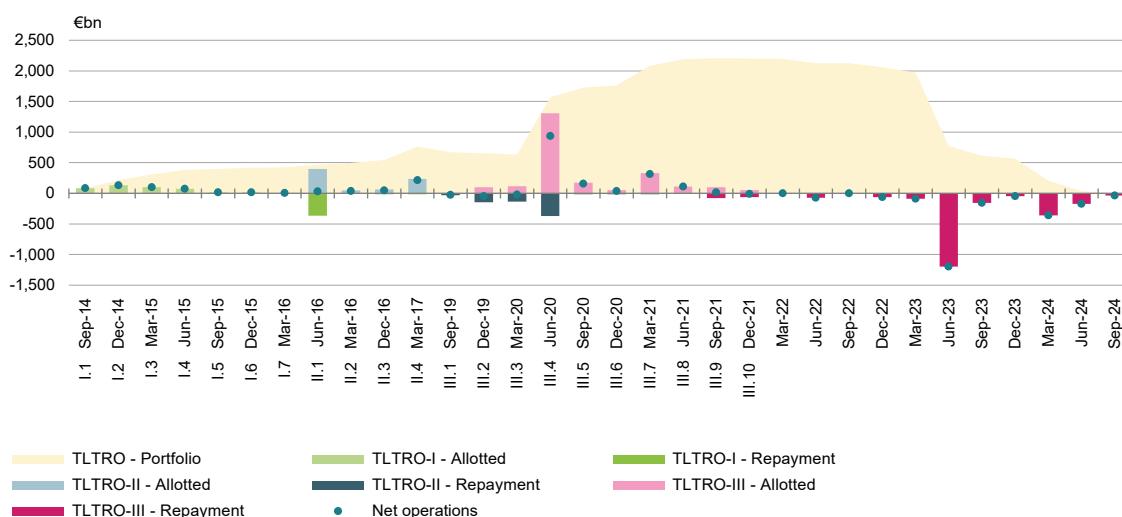
Chart 2.6 Net Eurosystem asset purchases, by programme



SOURCE: ECB.

NOTE: The asset purchase programme (APP) comprises the public sector purchase programme (PSPP), the third covered bond purchase programme (CBPP3), the corporate sector purchase programme (CSPP), the asset-backed securities purchase programme (ABSPP) and the pandemic emergency purchase programme (PEPP).

Chart 2.7 Targeted longer-term refinancing operations



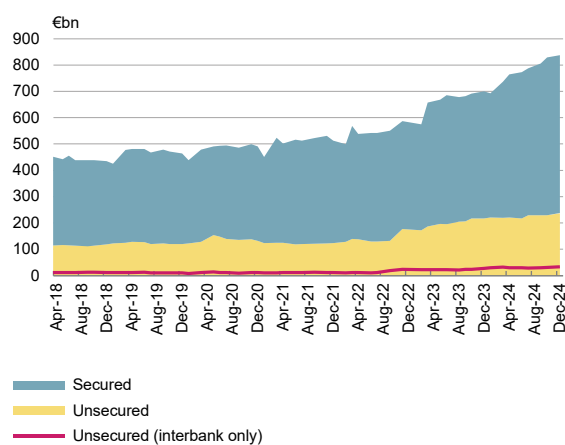
SOURCES: ECB and Banco de España.

fully reinvesting maturing securities, with reinvestments discontinued altogether since the start of 2025. Thus, in 2024 the net balance of the PEPP decreased by €45,183 million. Moreover, holdings of securities purchased under the ordinary asset purchase programme (APP) were down by €353 billion in 2024 (see Chart 2.6), since principal payments from maturing securities have not been reinvested since 2023 H2. At December 2024 the Eurosystem's total holdings of Spanish government debt stood at €463,247 million.

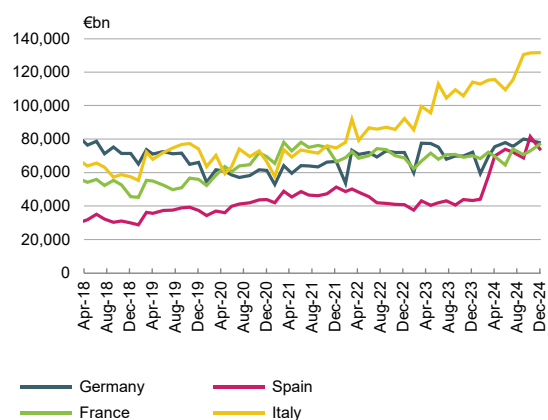
The volume of money market transactions grew by €117 billion in 2024. The ECB maintaining its balance sheet reduction policy forced banks to seek market-based funding. This was reflected on the money markets, where average daily transaction

Chart 2.8 Money market financing

1 Average daily volume of transactions in the EU money market, by segment



2 Total lending to banks in selected countries



SOURCE: ECB (Money Market Statistical Reporting).

volumes were up 10% for unsecured transactions (e.g. interbank deposits) and 22% for secured transactions (e.g. repos). Banks in Italy continued to make greater use of money market financing than their counterparts in countries such as France and Germany (see Chart 2.8).

3 Financial system sectoral developments

3.1 Banking sector

In 2024 the Spanish banking sector's profitability increased again, from what were already historically high levels. This improvement in consolidated profit owed mainly to growth in net interest income, driven by both a higher net interest margin and a recovery in the intermediation business. This recovery was particularly evident in increased lending to both households and non-financial corporations (NFCs) in business in Spain, against a background of falling monetary policy rates. In addition, the non-performing loan (NPL) and stage 2 ratios for such loans declined, helping keep impairment losses subdued in 2024. Funding costs rose moderately in 2024, but stabilised in the final stretch of the year. Deposits were the main driver of this increase, again reflecting a certain lag in the pass-through of higher interest rates. However, term deposits make up a relatively small share of total liabilities, ensuring their total cost remains contained. As was true in the two previous years, the strong profitability of Spanish banks in 2024 helped improve the sector's solvency ratios. Indeed, the Spanish banking sector's CET1 capital ratio stands well above regulatory requirements, albeit short of the ratio for comparable European banking systems. Meanwhile, its leverage ratio is in line with that of European peers. Liquidity ratios remained comfortable relative to regulatory requirements, despite the reduction in the Eurosystem's balance sheet in 2024 and the above-mentioned increase in funding costs.

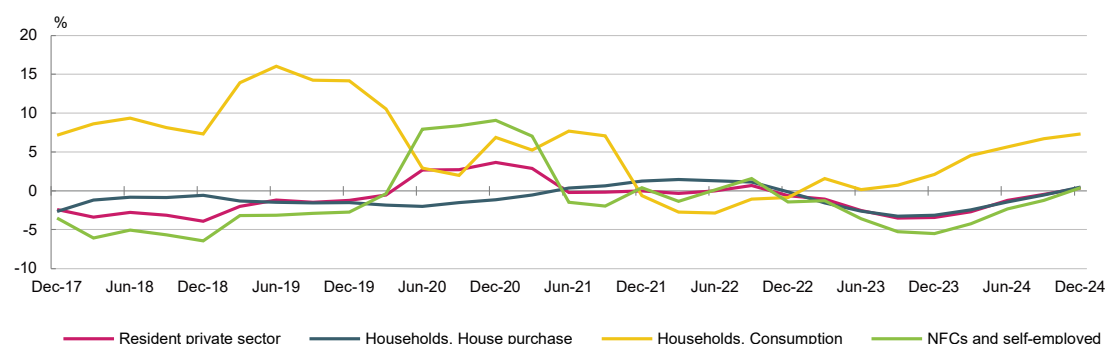
Lending developments in business in Spain and abroad

In 2024 the volume of bank loans to the resident private sector in Spain increased, in contrast with the declines recorded in previous years. The stock of loans grew by 0.4% year-on-year in the year as a whole (see Chart 3.1.1, panel 1), driven by lending both to households and to NFCs and the self-employed, particularly in 2024 Q4. This growth was broad-based across the banking sector. For NFCs and the self-employed, credit grew by 0.4%, contrasting with the 5.5% decline in 2023, while lending to households grew by 1.1% (-2.4% in 2023). Credit to financial corporations contracted by 5.7%, compared with an increase of 2.0% in 2023.

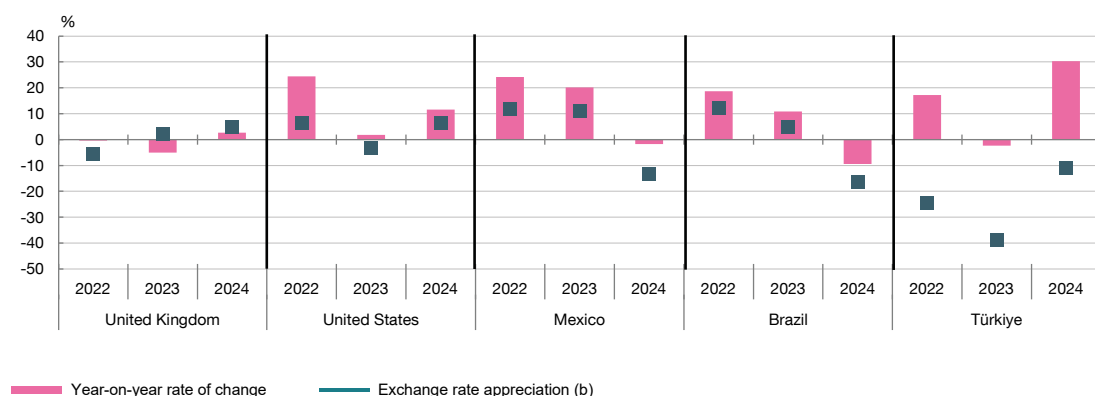
The recovery in lending to NFCs was widespread across sectors and firm sizes, although the stock of lending did not grow in all of them in 2024. By firm size, growth rates recovered across all segments, but only lending to large firms achieved positive growth (3.1% in 2024, up from -1.8% in 2023). SMEs still recorded a decline (-2.3% on aggregate), but one that was far more moderate than in 2023 (-8.8% year-on-year). In lending to the self-employed, the negative growth

Chart 3.1.1 Change in the stock of credit in Spain and abroad

1 Year-on-year rate of change in credit. Individual data, business in Spain



2 Year-on-year rate of change in credit to the foreign private sector (a) (expressed in euro) and appreciation of the local currency vis-à-vis the euro. Consolidated data



SOURCE: Banco de España.

- a The private sector includes households, NFCs, the self-employed/sole proprietors and non-bank financial institutions (e.g. insurance companies). Total credit granted to residents in each of the jurisdictions represented in the chart is considered, irrespective of whether it is local or cross-border business
- b A positive (negative) value indicates appreciation (depreciation) of the local currency vis-à-vis the euro.

rate eased considerably to -1.9% year-on-year in 2024 (-8.7% in 2023). By sector of activity, growth rates improved across the board, with lending to construction and real estate activities recording positive annual growth for the first time in recent years. The stock of loans backed by COVID-19 ICO guarantees shrank by 30.8% compared with the previous year.⁴

Lending to households grew both in loans for house purchase and consumer loans. In 2024 loans for house purchase grew moderately (0.5%), contrasting with the decline recorded in 2023 (-3.2%). Consumer loans, which were already in growth in 2023 (2.1%), accelerated year on year to 7.3% in 2024. Other lending to households, which accounts for little more than 6% of the segment as a whole, declined by 3.7% in 2024.

⁴ Since this guarantee facility is now closed to new lending, the stock of such loans will decrease as the performing loans are repaid.

In business abroad, in 2024 Spanish banks' consolidated lending to households and firms grew at a similar rate to that in 2023. Banks' lending to foreign counterparties (in euro terms) grew by 6% in 2024 (in line with 2023), with standout growth in the United States and Türkiye. In the United States, which accounts for more than 13% of Spanish banks' business abroad, that growth was 11.6%, partly driven by the dollar's appreciation against the euro. In Türkiye, lending grew by 30% despite the sharp depreciation of the lira. In the case of other material countries for Spanish banks, lending increased very moderately in the United Kingdom, but decreased in Mexico and Brazil, partly due to the depreciation of their currencies (see Chart 3.1.1, panel 2).

The NPL and stage 2 ratios⁵ for the resident private sector in Spain declined in 2024. This owed to both a drop in loans classified as non-performing or stage 2 and an increase in the total stock of credit (the denominator of the ratios). As a result, at end-2024 the NPL ratio for the resident private sector was 3.2%, down by 0.2 percentage points (pp) on 2023. The NPL ratio for loans to NFCs and the self-employed stood at 4.3% in December 2024, falling 0.3 pp over the year as a whole. In loans to households, the ratio declined by 0.2 pp to 2.7% in the same period, due to developments both in loans for house purchase (down -0.2 pp to 2.2%) and in other lending (down -0.5 pp to 4.6%). The stage 2 ratio stood at 6.4% in December 2024 (1.2 pp lower than in 2023). This drop owed to the lower stage 2 ratio both in loans to firms and the self-employed (-1.7 pp to 8.4%) and in loans to households (-0.9 pp to 5.2%) (see Chart 3.1.2, panel 1).

In business in Spain, refinancing and restructuring transactions, along with foreclosed assets, continued the declining trend of previous years. Refinanced and restructured loans⁶ fell by 20.1% year-on-year, a drop 3.3 pp more pronounced than in 2023. The decline was especially marked for NFCs and the self-employed (-21.2%). In the households segment, such loans were down by 18.2%, a drop that was 8.6 pp more pronounced than in 2023. Foreclosed assets⁷ stood at €13.3 billion in December 2024, having declined by 16.1% in the year.

In business abroad, the NPL ratio decreased slightly compared with the previous year, with cross-country differences. NPL ratios were down notably in Türkiye (to 3.8% in December 2024) and Brazil (to 7.6%). In the United Kingdom,

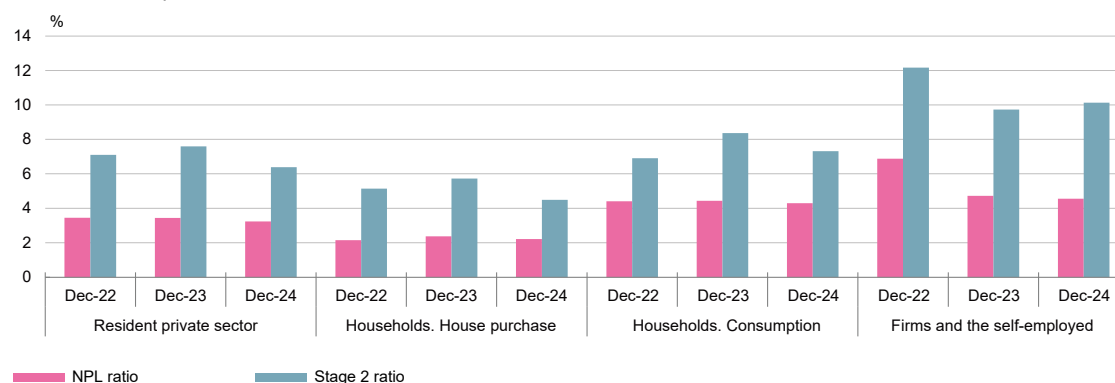
⁵ As per Banco de España Circular 4/2017, a loan is classified as non-performing when there are indications of credit impairment, i.e. after a default event. Meanwhile, a loan is classified as stage 2 when credit risk has increased significantly since initial recognition but no event of default has yet occurred.

⁶ As per Banco de España Circular 4/2017, loans are deemed refinanced when they are brought wholly or partially up to date in payment as a result of a refinancing transaction granted by the entity or by others in its group. Restructured transactions are loans whose financial terms and conditions are changed in order to facilitate the payment of the debt (principal and interest), because the borrower is or will foreseeably become unable to comply with those terms and conditions on time and in due form, even if that change was envisaged in the contract.

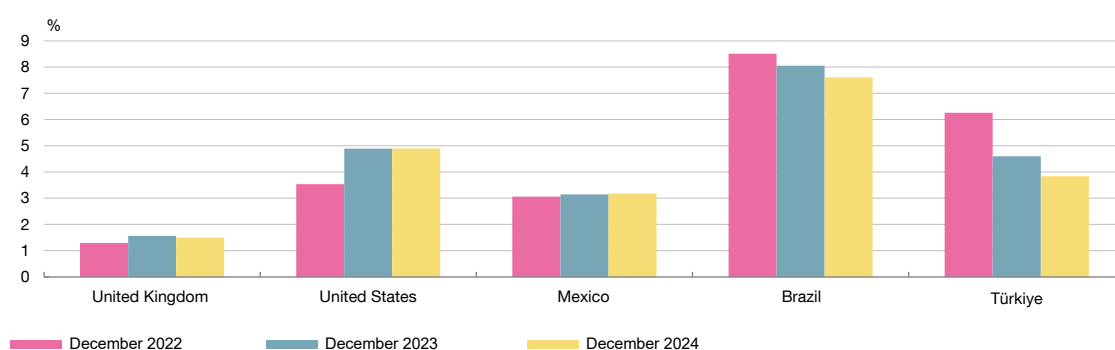
⁷ A foreclosed asset is an asset received by a banking institution as a result of a debtor's failure to meet repayment obligations. They are generally assets that were pledged to secure a loan and transferred to the bank's assets following legal proceedings or settlements with the debtor.

Chart 3.1.2 Troubled assets in Spain and abroad

1 NPL and stage 2 loan ratios.
Business in Spain, individual data



2 NPL ratio in the main countries of interest for the Spanish banking sector.
Consolidated data (a)



SOURCE: Banco de España.

a Data for lending to the resident private sector by Spanish deposit institutions in material foreign countries.

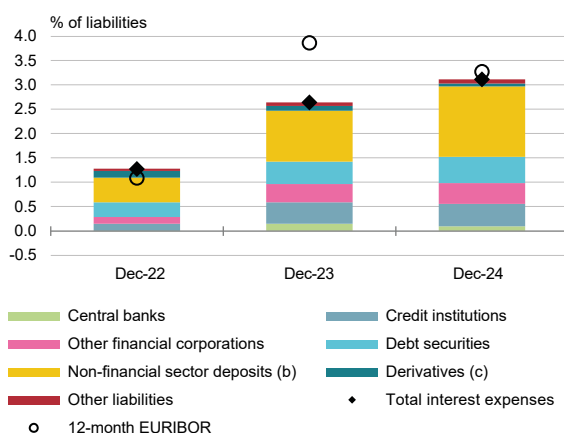
the ratio fell slightly (to 1.5%), while remaining largely unchanged in the United States (4.9%) and Mexico (3.2%) (see Chart 3.1.2, panel 2).

Funding conditions and liquidity

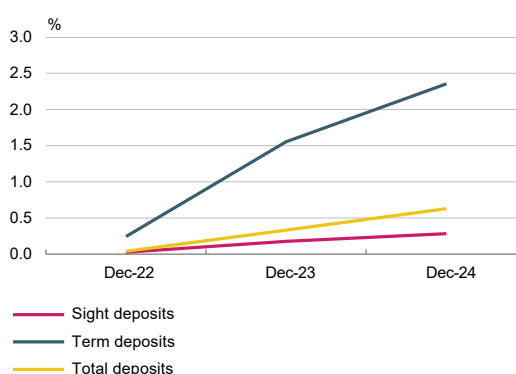
Despite lower monetary policy rates, the average cost of bank liabilities grew moderately in 2024, albeit stabilising in the second half of the year. Specifically, in 2024 the average cost of liabilities stood at 3.1%, up from 2.6% in 2023 (see Chart 3.1.3, panel 1). These rising costs were mainly driven by the remuneration of private sector deposits (held by households, NFCs and general government), due to the slow pass-through of changes in reference rates to such deposits, as well as their predominant share in Spanish banks' funding structure. This sluggish pass-through, which during the tightening cycle caused interest rate hikes to be transmitted to deposits only moderately, is similarly delaying the pass-through of rate cuts in the current monetary easing phase.

Chart 3.1.3 Cost of funding and liquidity ratios

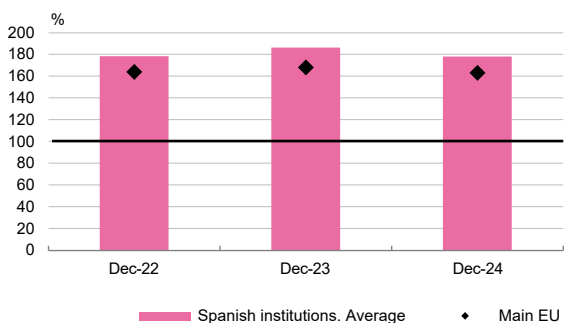
1 Interest expenses on funding.
Consolidated data (a)



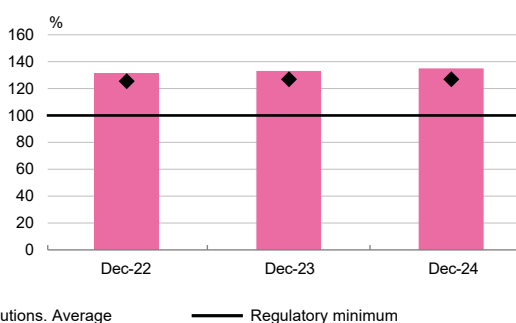
2 Average cost of deposits by households and firms.
Business in Spain



3 Liquidity coverage ratio.
Consolidated data (d)



4 Net stable funding ratio.
Consolidated data (e)



SOURCE: Banco de España.

- a Interest expenses include net expenses associated with deposits (disaggregated by counterparty), debt securities issued, other bank liabilities and trading derivatives and interest rate hedge derivatives.
- b Includes deposits by households, non-profit institutions serving households, NFCs, sole proprietors and general government.
- c Interest expenses associated with derivatives include expenses less income from trading derivatives and interest rate hedge derivatives.
- d The liquidity coverage ratio (LCR) is defined as the ratio between a bank's unencumbered assets and the potential net liquidity outflows during a stress period of 30 calendar days. The black line denotes a level of 100%, above which banks hold sufficient liquid assets to cover potential liquidity outflows under a stress scenario.
- e The net stable funding ratio (NSFR) is defined as the ratio of a bank's available stable funding to its required stable funding for a period of one year. The black line denotes a level of 100%, above which banks hold sufficient stable funding to meet their funding requirements over a period of one year under both normal and stressed conditions.

At consolidated level, the average cost of deposits from households and firms stood at 2.2% in 2024, up by 58 basis points (bp) on 2023. Despite the growth (partly underpinned by a shift from sight deposits to longer maturities), the average cost of these deposits remains significantly lower than that of alternative sources of funding, which helped keep the average cost of liabilities contained in 2024.

In business in Spain, the average remuneration of deposits by households and firms remained low in 2024 due to the high volume of sight deposits. In December 2024 sight deposits continued to make up the bulk of such funding, accounting for 83.1% of the total, 10.2 pp less than at the start of the monetary tightening

cycle but still well short of the levels observed in previous hiking cycles. As a result, and despite the average remuneration of term deposits reaching 2.4% in 2024, the average cost of deposits as a whole stood at 0.6% (see Chart 3.1.3, panel 2).

The average cost of banks' debt securities increased in 2024 due to low-rate instruments maturing and a high volume of new debt issuance at higher rates. In 2024 the average cost of Spanish banks' debt securities stood at 4.3%, 42 bp higher than in 2023. This increase is attributable to the significant issuance volume in 2024 (€80.7 billion, up by 25.9% on 2023), amid still-high interest rates relative to previous years.

Spanish banks' cost of equity decreased to around 9.4% in December 2024, down from the estimated 10.5% at end-2023.⁸ This decline allowed banks to partially offset their higher cost of liabilities.

In 2024 banks maintained sound levels of liquidity despite the higher funding costs and the reduction in the Eurosystem's balance sheet. In December 2024 the aggregate liquidity coverage ratio (LCR) for Spanish banks stood at 178.1%, down by 8.2 pp on a year earlier. Nevertheless, the LCR remains well above the regulatory minimum (100%) and above the average for the main European banking systems (163.4%) (see Chart 3.1.3, panel 3). Meanwhile, the net stable funding ratio (NSFR) increased slightly to 135.1%, up by 2.1 pp on end-2023 and likewise above the average for the main European banks (127.1%) (see Chart 3.1.3, panel 4).

Profitability

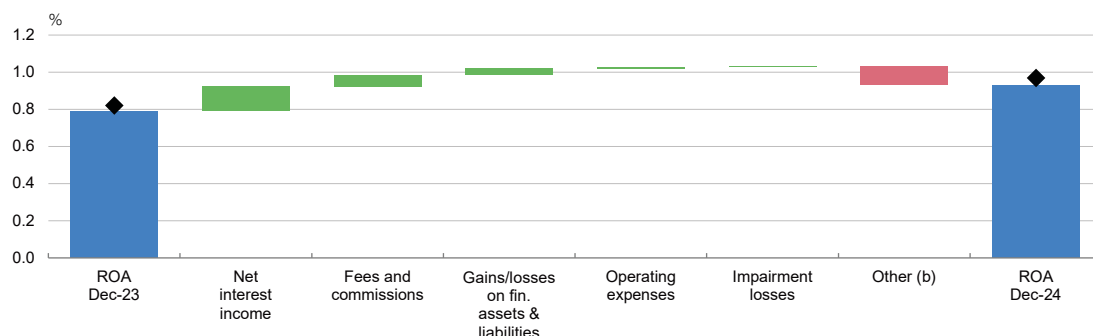
Profitability in the Spanish banking sector continued to strengthen in 2024, largely thanks to the improvement in net interest income. In 2024 the sector's consolidated net profit exceeded €39 billion, an increase of nearly 21% on the previous year, with the return on assets (ROA) standing at 0.93% (up from 0.79% in 2023). Despite lower policy rates, net interest income rose by almost 9% year-on-year in 2024, driving much of the profitability improvement. This increase in net interest income owed to favourable developments both in prices (higher net interest margins) and in quantities (credit recovery).

Fees and commissions and trading income also increased in 2024, while operating expenses and impairment losses remained relatively stable. In 2024 higher net interest income was coupled with growth in net fee and commission income (11%) and trading income (31%). Operating expenses and impairment

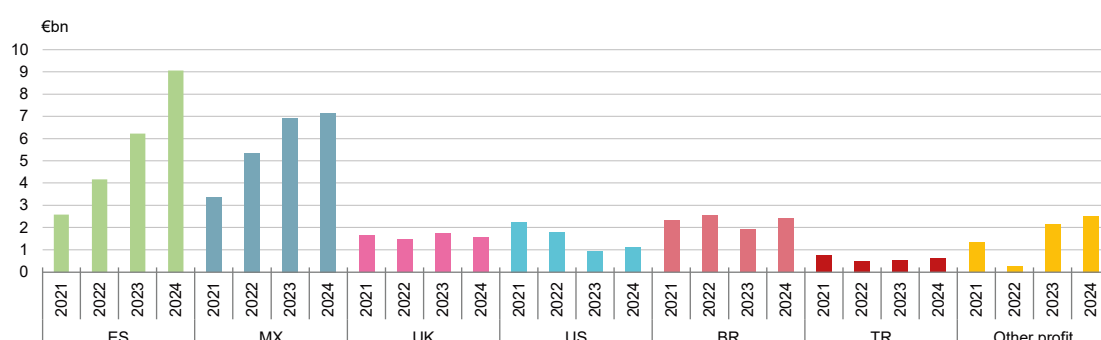
⁸ Cost of equity is unobservable and its estimation is subject to significant uncertainty; see Luis Fernández Lafuerza and Mariya Melnychuk. (2024). "Revisiting the estimation of the cost of equity of euro area banks". *Financial Stability Review - Banco de España*, 46, pp. 25-46

Chart 3.1.4 Bank profitability

1 Breakdown of change in profit. Net profit as a percentage of ATAs. Consolidated data (a)



2 Geographical distribution of ordinary profit attributable to the controlling entities of the three banks with the most business abroad (c). Consolidated data



SOURCE: Banco de España.

- a The red (green) bars denote a negative (positive) contribution by the corresponding item to the change in consolidated profit at December 2024 compared with December 2023. The black diamonds denote the ROA excluding the impact of the temporary bank levy.
- b Includes, among other items, the temporary bank levy.
- c The three banks with the most significant and longest-standing business abroad. Non-recurring items in the period under review are excluded. "Other profit" includes profit generated by the banks' corporate centres.

losses increased slightly, but less so than average total assets, leading to a small but positive contribution to ROA (see Chart 3.1.4, panel 1).

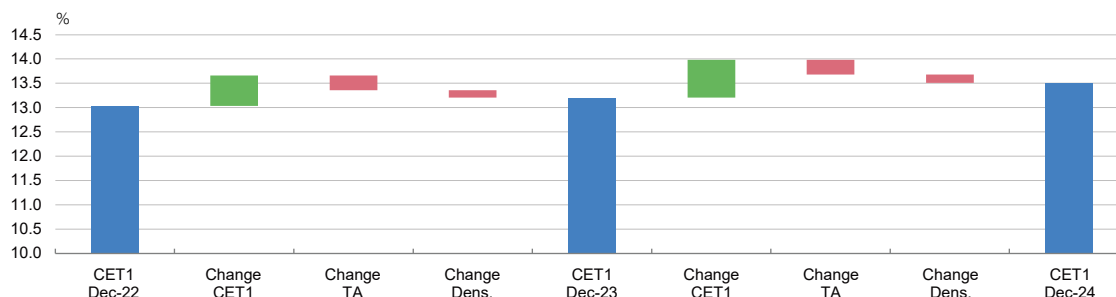
Profits improved in both business in Spain and business abroad. The banks with the most significant business abroad saw their profits increase across the main geographical areas where they operate, except the United Kingdom (see Chart 3.1.4, panel 2). The most pronounced rise came in Brazil (26% year-on-year), followed by the United States (19%). Despite posting more subdued growth in 2024 (3%), Mexico remained the top contributing country to these banks' profits (almost 30% of the total).

Solvency

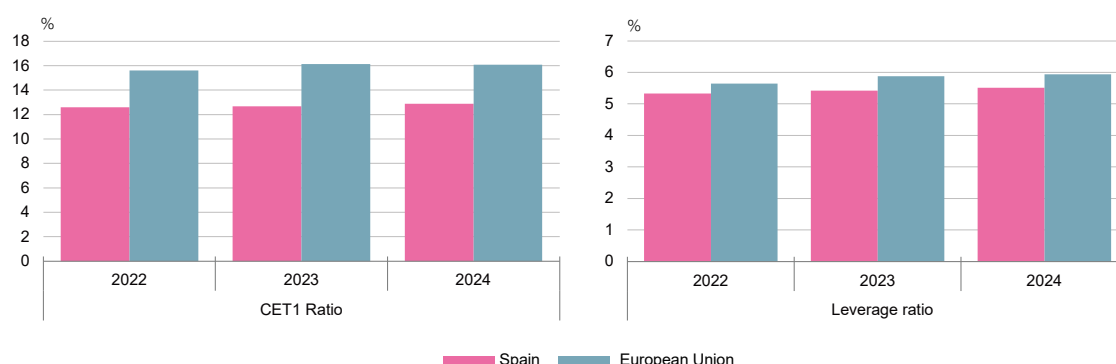
The common equity tier 1 (CET1) ratio rose by 30 bp in 2024, to 13.5%. This increase was due to the 6% growth in CET1 capital (the numerator of the ratio), which outstripped the 3.6% increase in risk-weighted assets (RWAs, the denominator of the ratio). In turn, this negative contribution from RWAs owed mainly to the growth

Chart 3.1.5 Bank solvency

1 Breakdown of change in the CET1 ratio (a). Consolidated data. 2022-24



2 European comparison of CET1 and leverage ratios. Consolidated data. 2022-24



SOURCE: Banco de España.

a The CET1 ratio is broken down into the change in CET1, total assets (TA) and density (Dens.), where density is calculated as the ratio of RWAs to TA. Therefore, the CET1 ratio is calculated as the ratio of CET1 to TA x Dens. The green (red) bars denote positive (negative) contributions by components.

in total assets and, to a lesser extent, to the slight increase in their risk profile (see Chart 3.1.5, panel 1).

This helped the gap between the CET1 ratio of Spanish banks and the European average to narrow slightly in 2024. According to European Banking Authority (EBA) data,⁹ the CET1 ratio gap between the main Spanish banks and their European peers shrank from 3.5 pp at end-2023 to 3.2 pp at end-2024 (see Chart 3.1.5, panel 2). However, the Spanish banking system's leverage ratio held at a level comparable to that of Europe's main banking sectors and just 0.4 pp below the EU average. The difference between the CET1 ratio gap and the leverage ratio gap owes to the Spanish banking system's higher RWA density.¹⁰

⁹ Chart 3.1.5 shows differing CET1 ratio figures for Spain in panels 1 and 2. This is because panel 1 covers all deposit institutions, while panel 2 is limited to the sample of main banks used by the EBA (which covers more than 90% of the system's total consolidated assets).

¹⁰ The CET1 ratio can be approximated by dividing the leverage ratio by RWA density. However, this calculation is not entirely accurate, as capital (the numerator of the leverage ratio) also includes AT1 capital instruments and, in addition, the leverage exposure (the denominator) may differ from total assets.

Macroprudential analysis and measures

In 2024 the Banco de España approved the new methodological framework for setting the countercyclical capital buffer (CCyB)¹¹ and activated it at 0.5%. This rate will be applicable from 1 October 2025. The Bank also indicated that if cyclical systemic risk remained at an intermediate level, the buffer rate would be raised to 1% on that date, with binding effect from 1 October 2026. Under the previous framework, the CCyB was only activated when a high level of cyclical systemic risk was detected. The new framework allows the buffer to be activated at an intermediate level of risk, meaning banks will build up capital to cover a broader range of cyclical systemic risks, for subsequent release if those risks materialise.

The new methodological framework consists of an initial evaluation phase focused on key indicators, followed by a second phase involving quantitative and qualitative analysis of complementary information.¹² Specifically, the first phase analyses the cyclical position of 16 key indicators that reflect Spain's macroeconomic, financial and banking landscape. Each individual indicator is assigned a risk level based on its position within the historical distribution, indicating whether its value is consistent with one of three cyclical systemic risk levels: low (a scenario of risk materialisation), intermediate and high. Once standardised, this set of indicators is aggregated into a single composite indicator.

The key indicators (grouped into four dimensions)¹³ and the composite indicator stood at an intermediate level during 2024 (see Chart 3.1.6, panel 1). By component, the most notable change from 2023 was a certain correction in the market indicators, although they remained at an intermediate level in 2024. Of the remaining indicators, those related to the banking sector recorded the highest levels, followed by the macroeconomic indicators. Among the latter, the output gap – the difference between actual GDP growth and the highest level it could reach without causing inflation – remained in positive values throughout 2024 (see Chart 3.1.6, panel 2). The credit-to-GDP gap – one of the macro-financial indicators under the current framework that measures the gap between the economy's aggregate debt (the credit-to-GDP ratio) and its long-run trend – increased in 2024 (see Chart 3.1.6, panel 2).

In 2024 the Banco de España conducted the annual review of the list of Spain's systemically important credit institutions. The Banco de España identifies "global systemically important institutions" (G-SIIs) and domestic systemically important institutions, dubbed "other systemically important institutions" (O-SIIs),

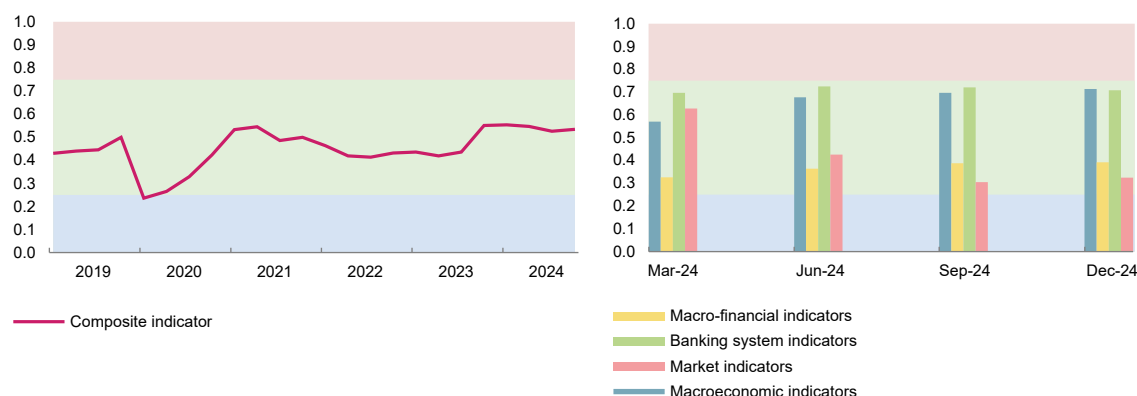
¹¹ See the macroprudential section of the Banco de España website for details of the new methodological framework and the CCyB public consultation and public information procedures.

¹² For more details on the new framework for setting the CCyB in Spain, see Banco de España. (2024). *Revision of the framework for setting the countercyclical capital buffer in Spain*, and Ángel Estrada et al. (2024). "Analysis of cyclical systemic risks in Spain and of their mitigation through countercyclical bank capital requirements". Documentos Ocasionales, 2414, Banco de España.

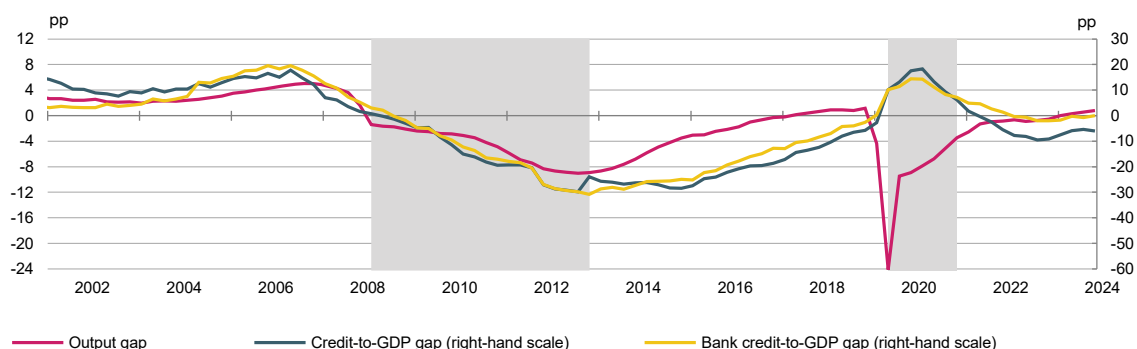
¹³ Macroeconomic, macro-financial, financial market and banking system indicators.

Chart 3.1.6. Cyclical systemic risks stood at a standard level. The output gap widened and the credit-to-GDP gap narrowed slightly in December

1 Composite indicators (a)



2 Credit-to-GDP gap and output gap (b)



SOURCES: Banco de España, INE, Datastream and own calculations.

- a Data updated as at December 2024. The indicators are defined on a scale of 0 to 1 based on the percentile at which they stand within their historical distribution. The blue (green) [red] range indicates a low (standard) [high] level signal of cyclical systemic risks.
- b The output gap represents the percentage difference between observed GDP and its quarterly potential level. Values calculated at constant 2010 prices. See Pilar Cuadrado and Enrique Moral-Benito. (2016). "Potential growth of the Spanish economy". Documentos Ocasionales, 1603, Banco de España. The credit-to-GDP gap is calculated as the difference, in percentage points, between the observed ratio and the long-term trend calculated using a statistical one-sided Hodrick-Prescott filter with a smoothing parameter equal to 25,000. This parameter is calibrated to the financial cycles historically observed in Spain. See Jorge E. Galán. (2019). "Measuring credit-to-GDP gaps. The Hodrick-Prescott filter revisited". Documentos Ocasionales, 1906, Banco de España. The bank credit-to-GDP gap is calculated identically to the credit-to-GDP gap, but only taking into account bank lending. Data available up to December 2024. The grey vertical bands denote two periods of economic crisis in Spain since 2009: the systemic banking crisis (2009 Q1 to 2013 Q4) and the economic crisis triggered by the COVID-19 pandemic (2020 Q1 to 2021 Q4).

drawing on objective criteria that take into account institutions' size and business model.¹⁴ Each institution identified as a G-SII or O-SII must meet an additional capital requirement to strengthen its resilience, mitigate the potential negative effects it might have on the global or domestic financial system and encourage more prudent risk-taking.

¹⁴ Specifically, indicators are used that relate to balance sheet size, interconnectedness with the banking sector and the non-banking financial system, substitutability of the services provided by the institution, the complexity of its activities and the volume of cross-border activity. Similar indicators are used in the methodologies for identifying G-SIIs and O-SIIs.

Table 3.1.1 2024 capital buffer requirements for systemically important institutions

LEI (a)	Institution	Designation (b)	2024 capital buffer requirement (%)	2025 capital buffer requirement (%)
5493006QMFDDMYWIAM13	Banco Santander, S.A.	G-SII and O-SII	1.25	1.25 (c)
K8MS7FD7N5Z2WQ51AZ71	Banco Bilbao Vizcaya Argentaria, S.A.	O-SII	1.00	1.00
7CUNS533WID6K7DGF187	CaixaBank, S.A.	O-SII	0.50	0.50
SI5RG2M0WQQLZCXKRM20	Banco de Sabadell, S.A.	O-SII	0.25	0.25

SOURCE: Banco de España.

a Legal Entity Identifier.

b G-SII refers to global systemically important institutions; O-SII to other systemically important institutions.

c Where an institution is designated as both G-SII and O-SII, the higher of the two buffer requirements applies. Accordingly, for Banco Santander, S.A., in 2024 the O-SII buffer rate (1.25%) prevails over the G-SII rate (1%).

In 2024 the Banco de España again identified one G-SII and four O-SIIs. The buffers were unchanged relative to the previous year. In November 2024 the Banco de España announced¹⁵ that four institutions previously designated as O-SIIs in 2023 would retain this status. Their macroprudential capital buffers for 2025 were set at levels similar to those in 2024. Subsequently, in December 2024 it was announced that Banco Santander would remain a G-SII,¹⁶ with its corresponding requirement for 2026 set at the same level as for 2025. The buffers applicable to systemic institutions in 2024 (see Table 3.1.1) had already been announced in 2022 (G-SIIs) and 2023 (O-SIIs).

3.2 Securities, commodities and foreign exchange markets

Securities markets

In 2024 equity market developments in Spain and internationally were shaped by changes in the stance of monetary policy and the prospect of ECB rate cuts. Equity markets posted gains for the second year running, with Spain's IBEX 35 index (which rose by 14.8%) reaching its highest level since 2010. For the second consecutive year the Spanish index recorded the second-largest gain among the main euro area indices, many of which once again approached or even ended the year at all-time highs. The Spanish index again benefited from the significant weight and strong performance of the financial sector, along with the gains made

¹⁵ See *Banco de España updates the list of other systemically important institutions and sets their macroprudential capital buffer rates for 2025* (press release of 22 November 2024).

¹⁶ See the Banco de España press release of 5 December 2024.

by the consumer goods and services sectors, helping to narrow the performance gap with other major European indices since the start of the pandemic.

Volatility levels remained low and even decreased compared to 2023.¹⁷

August saw a brief uptick in volatility, amid an interest rate hike in Japan, worse than expected US economic data and a drop in major US tech stocks. Similarly, liquidity conditions¹⁸ remained at satisfactory levels throughout the year, supported by low volatility.

Spanish equity trading recovered in 2024 (up by 14.4% to over €717 billion), but remains below the average for the last decade. This improvement was observed in both the regulated market and other competing markets and venues, but was more pronounced in the latter. Indeed, the shift in trading from regulated markets to those rival venues has taken hold, reaching levels comparable to those in other large European securities markets. Trading on the Spanish regulated market grew by 3.8% (to nearly €301 billion), compared with an increase on other competing venues and markets of 23.5% (to over €416.5 billion). Issuance activity began to recover¹⁹ and three new firms joined Spanish stock markets²⁰ (Puig Brands, Cox Energy and Inmocement).

The ECB's monetary policy easing, which included four rate cuts as inflation levels moderated, drove down yields on government and corporate bonds along the entire yield curve. The decline was most pronounced in the second half of the year (when three of the four rate cuts were made) and in the short and middle segments of the yield curve. Thus, despite the gradual reduction in support from the ECB's purchase programmes,²¹ in 2024 Q4 most assets recorded their lowest yields in recent years. Nevertheless, some of these declines in yields were partly reversed at year-end, in view of the prospect of smaller and later rate cuts in 2025.

Interest rates on ten-year government bonds stood slightly above 3% at end-2024, similar to their level at the start of the year, while the declines in yields (ranging from 10 bp to 120 bp) were concentrated in the short and – to a progressively lesser extent – the middle segments of the curve. In addition, the sovereign risk premium narrowed again in the year, from 97 bp to 69 bp, its lowest level since 2022 Q1. Risk premia in the private sub-sectors performed unevenly: in the financial sector, thanks to its strong earnings performance and outlook, risk premia narrowed, in line with the narrowing in the sovereign segment, while

¹⁷ In 2024 the IBEX 35's volatility indicator averaged 12.8%, slightly lower than the 13.1% recorded in 2023.

¹⁸ Liquidity (estimated based on the bid-ask spread) averaged 0.06% in 2024, below both the 2023 level (0.063%) and the historical average (0.087%).

¹⁹ Capital market-based corporate financing grew to €8,063 million but remains short of the average levels for the last decade.

²⁰ Five new companies joined the alternative market BME Growth. Also noteworthy was the launch of the BME Scaleup segment for early-stage companies looking to access securities market financing.

²¹ Reinvestment of the maturing assets of the ECB's purchase programmes ended in July 2023 (the APP) and December 2024 (the PEPP).

in the non-financial sectors they were steady and remained broadly unchanged throughout the year.

Debt issuance by Spanish firms' fell by 14.3% in 2024, with a somewhat larger drop in debt issuances made or admitted to trading in Spain than in those recorded abroad. The issues of debt securities registered or admitted to trading on the Spanish markets – AIAF (the benchmark fixed-income market for government and corporate bonds) and MARF (the alternative fixed-income market) – amounted to €67.86 billion, 25.1% less than in 2023. Of this total, €18.79 billion corresponded to issues registered with the CNMV,²² while the remainder were registered with other market authorities.²³ Meanwhile, issuance abroad decreased by 7% to €124,789 million, although long-term debt issuance continued to grow, amounting to more than €80 billion. These figures reflect a significant decline in short-term debt issuance, both in Spain and abroad, in a market setting in which issuers could have taken advantage of access to longer maturities at an attractive cost compared with the most recent period. Issues of environmental, social and governance (ESG) debt securities by the private sector rose again, reaching over €16.6 billion²⁴ (an increase of 28.9%), of which more than €14 billion were green bonds.

Equity market risk perception remains high. This is especially true for certain sectors and markets (particularly tech sectors and the US stock markets), against a backdrop of growing geopolitical risks, while debt market risk²⁵ remains moderate, benefiting from the prospect of possible further rate cuts by central banks. Investors may therefore be underestimating the potential consequences of a possible trade war scenario – at a time of heightened geopolitical risks – that could have a significant negative impact on growth and corporate earnings and, in consequence, on firms' valuations, which could correct significantly.

Credit risk²⁶ also remains moderate, benefiting from lower interest rates and a degree of easing of financing conditions, although certain circumstances could drive up credit risk should growth remain low. High government debt levels in some European economies, plans to increase public defence spending and political unrest in parts of Europe – conducive to fiscal orthodoxy being abandoned – could lead to bouts of volatility in risk premia and even contagion effects in the more highly indebted and financially vulnerable economies and firms.

²² The volume of issues registered with the CNMV fell significantly in the year following the entry into force, on 18 September 2024, of Article 63 of Securities Markets and Investment Services Law 6/2023 of 17 March 2023 whereby the CNMV transferred its powers to register and verify non-equity securities to the debt securities market (AIAF and MARF) authorities. Accordingly, the volume of issues registered with the CNMV is no longer representative of total debt issuance in Spain and the volume of issues admitted to trading by other market authorities must also be included.

²³ Debt securities amounting to €16,468 million were admitted to trading on the MARF, an increase of 7.8%, mostly commercial paper issues.

²⁴ This is almost 14% of all long-term debt issuance by Spanish issuers. General government ESG debt issuance amounted to €3,944 million in 2024, similar to the 2023 figure.

²⁵ Associated with the possibility of fresh increases in bond yields.

²⁶ Estimated based on the average cost of credit default swaps across sectors.

This could prompt a certain degree of fragmentation among issuers according to their credit ratings and repricing of higher risk assets (such as subordinated and high yield debt).

The financial trading and post-trade infrastructures for securities domiciled in Spain operated without incident in 2024. As it does every year, the CNMV conducted its annual review of compliance with EU legal requirements by the BME Group's two systemic infrastructures, BME Clearing and Iberclear. Moreover, following the entry into force of Regulation (EU) 2022/2554 of the European Parliament and of the Council of 14 December 2022 on digital operational resilience for the financial sector (DORA), the CNMV also reviewed the process of adapting and tailoring the market infrastructures to the new cybersecurity and technology risk requirements.

The CNMV conducted its regular ongoing supervision of the central counterparty (CCP), which includes monitoring its activity and its market, credit, liquidity and operational risks. It reviewed the CCP's models and procedures to ensure that they complied with regulatory requirements, especially those related to the framework defined by the European Market Infrastructure Regulation (EMIR). Lastly, the CNMV carried out a rigorous review of various initiatives and methodologies proposed or being introduced by the CCP, including a new framework for assessing the solvency of clearing members and an improved collateral management process for certain scenarios characterised by sudden surges in activity.

As regards BME Clearing's risks, the initial collateral requirements in 2024 were 3.9% lower than the 2023 average. Although this is partly due to the continued downward trend in the energy segment (both in open interest and prices), the principal reason is the decline in fixed-income activity (-73.7%). This is explained by the increase in over-the-counter (OTC) transactions and the Treasury's liquidity auctions,²⁷ which diverted volume from the CCP throughout the year, although it gradually recovered in subsequent months. Part of the decrease in collateral was offset by the growth of collateral in the financial derivatives segment (+25%), driven by the climb in the IBEX 35, Spain's main stock market index.

In the area of securities settlement, Iberclear, the central securities depository, and its participating entities conducted the necessary tests to ensure that the obligation to notify transactions under the Post-trade Interface (PTI) was removed in an orderly and secure manner. The elimination of the PTI, required under Law 6/2023 of 17 March 2023 on Securities Markets and

²⁷ Similarly to other euro area Treasury departments, over the course of 2024 the Spanish Treasury conducted various liquidity auctions to place its cash surpluses in the market and obtain a financial return. These transactions were implemented through either repo (sell and buy-back) or term deposit transactions.

Investment Services, sought chiefly to align Spanish post-trade processes with European standards and thus make the Spanish securities market more attractive.

On 18 November 2024 the European Securities and Markets Authority (ESMA)²⁸ published its assessment of the possible shortening of the settlement cycle and its suitability, costs and benefits, risks and schedule.

The date for transition to this new settlement cycle (T+1) has been set (11 October 2027), working groups have been established at both the European and the national level for governance of the project and the first phases have been launched. Thus, by late September 2025, changes or challenges of a more technical nature must be identified and defined by the industry, and progress must be made on the regulatory amendments to EU legislation (including the Central Securities Depositories Regulation (CSDR) and the Settlement Discipline Regime). Meanwhile, on Iberclear data, 2024 saw a fresh decline (of around 17%) in the number of cash penalties and a decrease (of almost 10%) in their total amount.

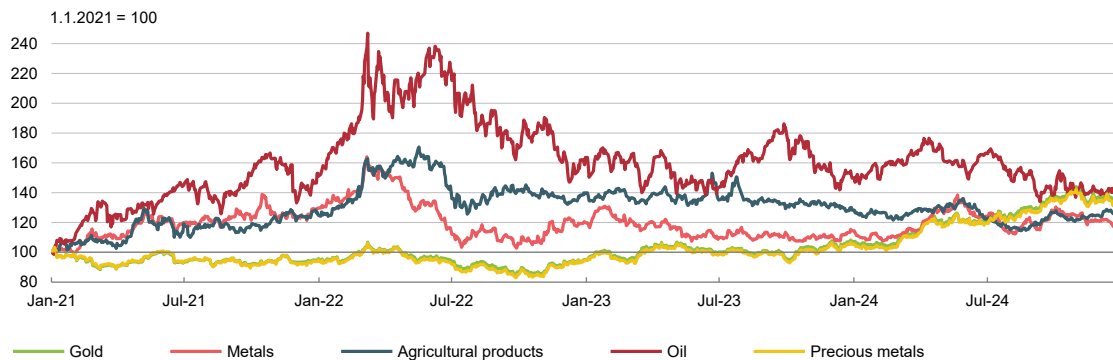
Commodity and foreign exchange markets

Commodity prices – except for precious metal prices – held relatively steady in 2024, against a backdrop of economic slowdown among advanced economies and China and the disappearance of the supply problems seen in recent years. Commodity price behaviour was uneven, but with very subdued aggregate price dynamics. Energy commodities followed divergent paths: oil prices fell slightly owing to abundant supply and lower global demand, while gas and electricity prices recovered sharply in the latter part of the year thanks to the arrival of the winter and certain supply constraints owing to the war in Ukraine. Meanwhile, agricultural commodity prices overall remained broadly unchanged, as falls in cereal, soybean and cotton prices were offset by the surge in coffee and cocoa prices following poor harvests. Industrial commodity prices increased minimally, reflecting the economic slowdown and continued weakness both in Asia and in certain industrial sectors. Lastly, precious metal prices rose sharply, with gold reaching all-time highs in 2024 Q4 owing to its status as a safe-haven asset amid growing geopolitical tensions.

After appreciating in 2023, both the euro and other main currencies depreciated against the dollar in 2024. The euro depreciated by 6.19% against the US dollar, down from EUR/USD 1.1036 at the start of the year to EUR/USD 1.0353 at year-end. The exchange rate peaked in August (at EUR/USD 1.1190) and hit bottom in December (at EUR/USD 1.0352), when the euro was at its weakest, although it remained above parity throughout the year. The pound

²⁸ Considering the provisions of the CSDR Refit (Regulation (EU) 2023/2845 of the European Parliament and of the Council, amending Regulation (EU) No 909/2014 as regards settlement discipline, cross-border provision of services, supervisory cooperation, provision of banking-type ancillary services and requirements for third-country central securities depositories and amending Regulation (EU) No 236/2012).

Chart 3.2.1 Main commodity prices



SOURCE: Refinitiv Datastream.

NOTE: Precious metals: gold, silver and platinum; Metals: aluminium, copper, zinc, nickel and lead.

sterling depreciated by 1.71%, down from GBP/USD 1.2729 to GBP/USD 1.2511 at year-end, while the Japanese yen depreciated by more than 11%. In addition, the main Latin American currencies – the Brazilian real and the Mexican peso – also fell in value against the US dollar.

3.3 Non-bank financial intermediation

Non-bank financial intermediation²⁹ (NBFi) posted strong growth again in Spain in 2024, elevating its share of the financial system overall to levels which, while still low compared with those of other European countries, had not been seen since before the global financial crisis. The assets of the first non-bank aggregate analysed – the broadest measure, covering all financial institutions except banks – totalled €1.63 trillion at end-2024 (4.5% more than in 2023). This is slightly higher than Spanish GDP, which stood at €1.59 trillion in 2024. The assets of the second NBFi aggregate considered – the narrow measure, which uses a stricter criterion – amounted to around €395 billion at year-end, a strong increase of 13.7% on 2023. Consequently, on the narrow measure, the NBFi sector as a proportion of the financial system overall rose to 7.2%. Although not high compared with other European jurisdictions,³⁰ this is its highest level since 2007, before the global financial crisis (see Chart 3.3.1).

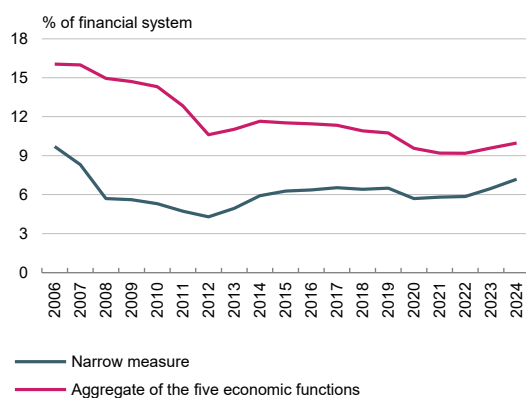
The narrow measure of the NBFi sector is the sum of the financial assets of the entities that fall within each of the five economic functions (EFs)

²⁹ The CNMV publishes a detailed annual monitoring report on *Non-bank financial intermediation in Spain*.

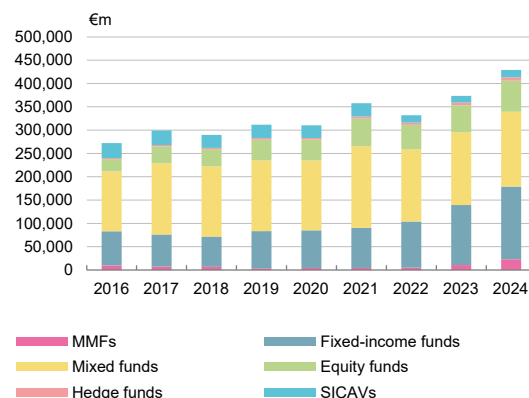
³⁰ According to the latest FSB report with 2023 data, on aggregate, using the narrow measure, the NBFi sector accounted for 15.2% of the total financial system for the advanced economies and for 12.7% for the emerging economies. See Financial Stability Board (FSB). (2024). *Global Monitoring Report on Non-Bank Financial Intermediation 2024*. 16 December. Also European Systemic Risk Board (ESRB). (2024). *EU Non-bank Financial Intermediation Risk Monitor 2024*. June.

Chart 3.3.1 Non-bank financial intermediation (2024)

1 NBFI share of the financial system



2 CIU assets



SOURCES: CNMV and Banco de España.

NOTE: All the types of CIUs depicted in the chart are part of the NBFI sector except equity funds.

defined by the FSB³¹ whose activity may generate risks similar to those faced by banks. The measure also excludes the assets of entities that meet these conditions but are consolidated in banking groups. The functions cover, for example, investment funds (with some exceptions), securitisation vehicles, specialised lending institutions and some financial intermediaries, such as securities dealers. In Spain, the first of the five economic functions (EF1) – which essentially comprises various types of collective investment undertakings (CIUs)³² – accounts for most NBFI assets. This function is also predominant, albeit less so, in other European jurisdictions.

The assets included in the narrow measure amounted to €395 billion in Spain in 2024.³³ Of this total, 92% corresponded to EF1 entities (certain CIUs), which gives an idea of their significance in the NBFI sector overall. Moreover, this proportion has gradually risen since 2010, when it stood at around 60%. At that time, asset securitisations – included in EF5 and which currently account for

³¹ These functions are: management of collective investment vehicles with features that make them susceptible to runs (EF1); loan provision dependent on short-term funding (EF2); intermediation of market activities dependent on short-term funding (EF3); facilitation of credit creation (EF4); and securitisation-based credit intermediation for the funding of financial entities (EF5). For further details, see FSB. (2013). *Policy Framework for Strengthening Oversight and Regulation of Shadow Banking Entities*. 29 August.

³² The NBFI sector includes all financial CIUs, except equity funds. At end-2024, 92% of the CIUs included (in net asset value terms) were harmonised (UCITS-compliant), while the remaining 8% were not (alternative investment funds).

³³ The narrow measure does not include the assets of entities that are consolidated in banking groups, even if they meet the definition of one of the five economic functions. If these were included, total NBFI assets would amount to €548 billion.

barely 5.5% of NBFIs assets – represented a much larger share. At end-2024 the remaining 2.7% was shared among the other three economic functions.³⁴

Risk assessment of investment funds reveals no vulnerabilities of concern from a financial stability standpoint. The risk analyses conducted within the NBFIs sector – focused mainly on investment funds, considering their weight in this aggregate – assess different pockets of risk (see below), notably including estimation of funds’ liquid assets (using the high-quality liquid assets (HQLA) methodology). This is essential to assess their resilience in the face of high liquidity needs, whether due to an increase in redemptions by unitholders or in collateral or margin calls stemming from derivatives positions. It is also important to monitor investment funds’ leverage and other sources of risk related to their fixed-income portfolios, such as credit or duration risk, insofar as they reflect their sensitivity to interest rate movements. Risk assessment is complemented by stress tests and specific analyses to assess the degree of interconnectedness between investment funds.³⁵

Estimation of the leverage³⁶ of EF1 CIUs shows that their exposure to market risk remains well below the ceilings set by law. Their synthetic leverage (via derivatives) is assessed, as financial leverage (via debt) is severely limited by regulation.³⁷ Thus, the analysis of CIUs belonging to the NBFIs sector shows that their gross exposure³⁸ to market risk amounted to 14.4% of net asset value (NAV) at end-2024, less than in 2023 (19%), while their net exposure³⁹ amounted to just 7.8% of NAV⁴⁰. Accordingly, based on the information available to the CNMV, there are no significant vulnerabilities in any of the possible risks generated by this leverage, which is well below the maximum permitted (100% of NAV).

³⁴ If the entities consolidated in a banking group were not excluded the proportions would be markedly different: EF1 would account for 66% of the total and EF5 for 23%.

³⁵ For an example of specific analysis of interconnectedness between investment funds, see the CNMV’s latest NBFIs monitoring report, which presents a network analysis that assesses funds’ common positions in fixed-income assets. The exercise identifies three groups of funds with a high common position vis-à-vis Spanish sovereign debt, Italian sovereign debt and corporate debt issued by the financial sector, such that a shock in any of these assets could have a negative impact on these groups of funds and could potentially amplify adverse feedback loops.

³⁶ Leverage is assessed for investment funds and open-end investment companies (SICAVs) belonging to the NBFIs sector. Hedge funds, which account for 2% of EF1 funds, are therefore excluded.

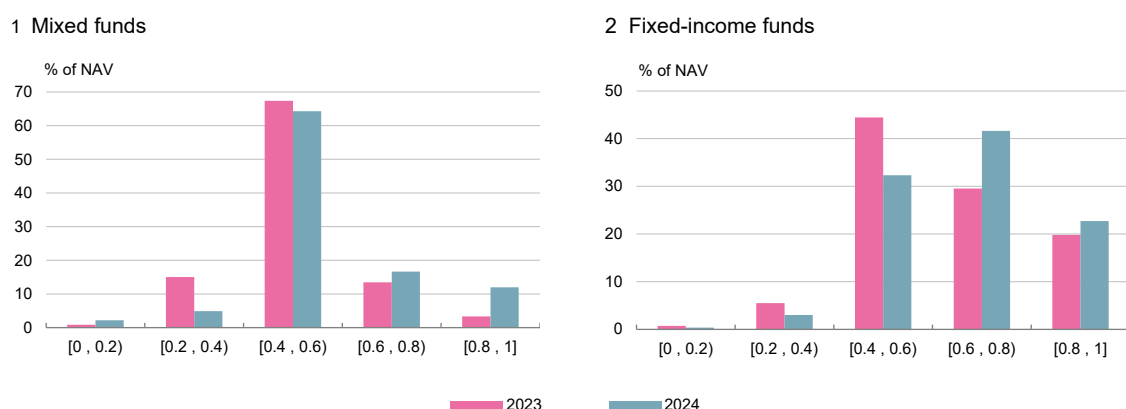
³⁷ Directive 2009/65/EC, the UCITS Directive, limits borrowing to no more than 10% of NAV to resolve temporary cash flow difficulties.

³⁸ Gross exposure is calculated using the methodology proposed by IOSCO (*Final Report on Recommendations for a Framework Assessing Leverage in Investment Funds*, December 2019), whereby gross exposure is measured by the sum of the notional amounts of derivative contracts, making delta adjustments possible in the case of options.

³⁹ Net exposure is calculated by taking gross exposure and netting between long and short positions, thus neutralising all operations made to hedge spot portfolio risks.

⁴⁰ This figure has been calculated for all the funds that perform their calculations using the commitment approach, which calculates exposure based on the conversion of all derivative contracts into their equivalent underlying asset positions and whose technical specifications are detailed in the ESMA Guidelines (*CESR’s Guidelines on Risk Measurement and the Calculation of Global Exposure and Counterparty Risk for UCITS*) (CESR/10-788)). These funds accounted for almost 95% of the total. Net exposure would increase to 17.1% if indirect exposure through investment in other CIUs were included in the estimation of leverage.

Chart 3.3.2 Liquidity positions of mixed and fixed-income funds (2024) (a)



SOURCE: CNMV.

a Distribution of funds according to their HQLA ratio.

Spanish investment funds' liquidity positions⁴¹ were satisfactory in 2024 compared with previous years. The liquidity risk assessment is particularly relevant for these vehicles, most of which allow daily redemptions. The HQLA ratio⁴² stood at 61.3% for total NBFi funds (compared with 55.5% in 2023) and at 55.9% for mixed funds, 65.8% for fixed-income funds and 68.8% for money market funds (MMFs). Considering the different vehicles on a case-by-case basis, it is observed that HQLAs at most investment funds exceeded 40%: only 7.1% of mixed funds and 3.3% of fixed-income funds (in NAV terms) were below this threshold (see Chart 3.3.2).⁴³ There are some investment funds whose liquid assets account for less than 20%, but this is a very small proportion, specifically (also in NAV terms) 0.3% of fixed-income funds and 2.2% of mixed funds.⁴⁴

A deeper dive into the fixed-income portfolio assets of the investment funds belonging to the NBFi sector shows that, at end-2024, credit quality was high and the modified duration⁴⁵ was moderate and that both had improved

⁴¹ Liquidity is assessed only for NBFi investment funds, excluding SICAVs and hedge funds. Investment funds are divided into mixed, fixed-income and money market funds (MMFs), which account for 44.3%, 43% and 6.3%, respectively, of EF1.

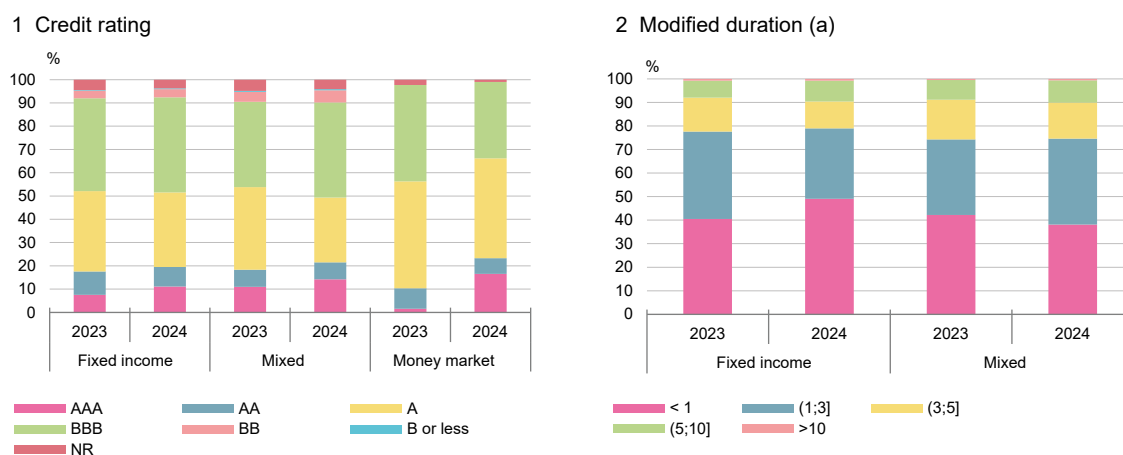
⁴² To determine a portfolio's liquid assets, this ratio factors in both asset class and credit ratings. Thus, all cash and deposits are HQLAs, along with 50% of the value of equity securities and variable percentages of government debt, corporate bonds and securitisations depending on their credit rating. The percentage of government debt deemed liquid ranges between 0% and 100%, the percentage of corporate bonds between 0% and 85% and the percentage of securitisations between 0% and 65%. For more details see Javier Ojea Ferreiro. (2020). "Quantifying uncertainty in adverse liquidity scenarios for investment funds". *CNMV Bulletin*, Quarter II. Moreover, to obtain a metric that is as precise as possible, the HQLAs of CIUs in which Spanish funds invest have also been quantified, instead of considering this investment as zero liquidity.

⁴³ In the case of MMFs, which are not included in Chart 3.3.2, all had a share of liquid assets over 60%.

⁴⁴ For more than 90% of mixed funds (in NAV terms), HQLAs were close to zero, as almost all assets were invested in one or two CIUs for which no portfolio information is available. Accordingly, the funds in which they invest are deemed to have zero liquidity.

⁴⁵ Modified duration measures the percentage change in the price of an asset in the event of a 100 bp increase in interest rates.

Chart 3.3.3 Analysis of investment funds' fixed-income portfolio (2024)



SOURCE: CNMV.

a MMFs are not included because the entirety of their fixed-income portfolio has a duration of less than one year.

relative to 2023. Thus, at end-2024, 92.3% of the value of the fixed-income portfolio (91.7% in 2023) had a credit rating of BBB or higher (investment grade), of which some 22% was rated AA or AAA. The value of investment grade assets amounted to between 90.2% of mixed funds and 99% of MMFs (see Chart 3.3.3, panel 1). Meanwhile, the modified duration for EF1 investment funds at end-2024 was 1.8, representing a decline over the year of just over 0.1 pp, after a much more considerable decrease between 2021 and 2023 as a result of the widespread increase in interest rates, particularly in shorter-term maturities.⁴⁶ In the case of mixed and fixed-income funds, around 75% (in NAV terms) had a modified duration of less than three years. These percentages are very similar to those of 2023 (see Chart 3.3.3, panel 2).

With regard to liquidity risk management, the CNMV subjects investment funds to half-yearly stress tests, a tool used by supervisors to check the resilience of institutions to very adverse scenarios. These tests, which assess liquidity mismatch risk, are performed on UCITS and quasi-UCITS and follow the methodology proposed by ESMA (STRESI framework)⁴⁷ and subsequently broadened by the CNMV.⁴⁸ The latest results, with data at December 2024, continue to indicate that the investment fund sector is broadly resilient to the scenarios considered, and only under the most extreme shock scenario⁴⁹ are some funds identified that could experience liquidity problems. Thus, a total of 18 funds would encounter problems meeting estimated redemptions (2.1% of the total sample's

⁴⁶ In 2021 the modified duration was 2.7, compared with 2.3 in 2022.

⁴⁷ ESMA. (2019). "Stress simulation for investment funds", 5 September.

⁴⁸ Javier Ojea Ferreiro. (2020). "Quantifying uncertainty in adverse liquidity scenarios for investment funds". *CNMV Bulletin*, Quarter II.

⁴⁹ This scenario is, depending on the category, up to 16 times more severe than that recorded in the worst week of March 2020.

NAV), most of which (17) were in the high-yield corporate bond category (45.6% of this category's NAV).

On the international front, work continued to assess and reduce the risks stemming from investment fund activity. IOSCO continued to work on initiatives geared to mitigating liquidity risk in open-ended funds (OEFs). In this respect, IOSCO's 2018 liquidity risk management recommendations for CIUs were revised. The aim of updating the recommendations, whose consultation report was published⁵⁰ in November 2024, was to align them with the amendments made in the recent revision (December 2023) of the FSB's recommendations on liquidity mismatch and to specify the following matters: (i) categorising investment funds based on the liquidity of their assets; and (ii) encouraging the use of liquidity management – particularly anti-dilution – tools.

Meanwhile, the FSB prioritised assessing the availability of data to measure possible liquidity mismatch in investment funds. To this end, the CNMV participated in a data pilot programme as part of the open-ended funds working group (OEFWG) in order to identify the data availability challenges involved in measuring liquidity mismatch risk. The result was a report identifying a series of metrics for quantifying liquidity mismatch risk, based on the liquidity of OEFs' asset holdings and the redemption terms. These metrics will be used to inform the assessment, set for 2026, of the effectiveness of the FSB's 2023 recommendations on liquidity mismatch in OEFs.

Lastly, in the international arena, two extraordinary NBFi-related events stand out: (i) the European Commission's consultation on macroprudential policies for NBFi; and (ii) the IMF's Financial Sector Assessment Program (FSAP) in Spain.

With respect to the European Commission's consultation, the CNMV responded jointly with other supervisory authorities and also individually. Prior to the launch of the Europe-wide consultation, the CNMV, together with its counterparts in France (*Autorité des marchés financiers*, AMF), Italy (*Commissione Nazionale per le Società e la Borsa*, CONSOB) and Austria (*Finanzmarktaufsicht*, FMA), published a joint stance⁵¹ identifying the four priorities to strengthen the macroprudential approach to asset management: (i) ensure a wide availability and greater use of liquidity management tools in all kinds of OEFs; (ii) ban amortised cost accounting for MMFs; (iii) introduce a truly consolidated supervisory approach for large cross-border asset management groups; and (iv) create an integrated data hub shared by market supervisors and central banks.

⁵⁰ IOSCO. (2024). "IOSCO Publishes Consultation Report on Updated Liquidity Risk Management Recommendations for Collective Investment Schemes" (Media release), 11 November.

⁵¹ AMF, CNMV, CONSOB and FMA. (n.d.). "A macro-prudential approach to asset management".

Subsequently, the CNMV's individual comments to the European Commission stressed some of the aspects mentioned in the joint stance and others considered important for designing an effective macroprudential policy for CIUs. They are (i) having constant, complete information on investment funds' activity; (ii) incorporating into EU law the criteria included in the (recently revised) FSB recommendations on liquidity mismatch risk; (iii) promoting harmonised legislation on CIU asset valuation; and (iv) driving the use of standardised leverage metrics in all CIUs.

Turning to the IMF's assessment, it viewed very favourably the CNMV's activities related to the NBFIs it supervises. In the area of investment funds, it highlighted the ongoing risk monitoring based on the extensive information received, the wide availability of liquidity management tools and the encouragement of their active use.

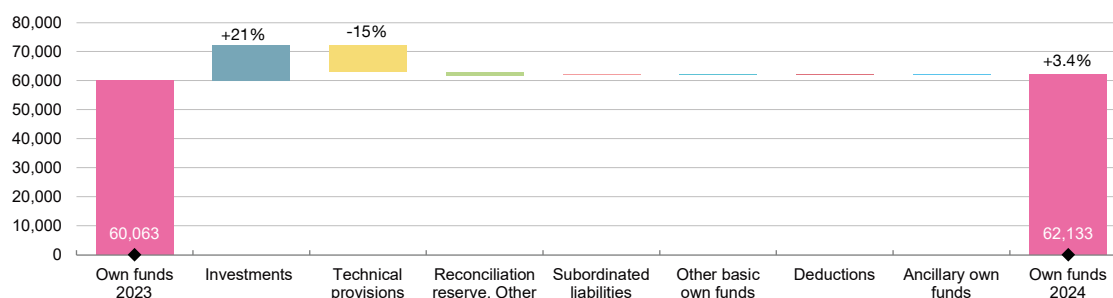
The positive assessment was accompanied by some recommendations to improve information on investment funds in two specific areas: funds domiciled in other EU Member States and marketed in Spain under EU passporting rights, and the reporting on the activation of liquidity management tools in Spanish funds. With regard to the former, the CNMV can only access information that is accessible via its information providers, since there is currently no harmonised information reporting system that is shared across the EU. In relation to the latter, the IMF welcomed the CNMV's encouragement of the use of liquidity management tools but recommended that the reporting on their activation be bolstered in all cases. The CNMV could thus have a fuller picture of funds' liquidity risk.

3.4 Insurance undertakings and pension funds

Economic growth, interest rates and inflation, which are all vulnerable to geopolitical tensions, are among the main macroeconomic factors with influence over the Spanish insurance sector. Noteworthy among these variables are the sound performance of the economy, the decline in the swap curve at end-2024, with a slope that remains inverted albeit less so, and the shift towards a new moderate inflation level after inflationary pressures grew considerably in 2023. Credit (mainly spread) risk is the main market risk, given the Spanish insurance market's significant exposure to fixed income (71% of total investments in 2024). The corporate bond spread performed positively, narrowing steadily, and is currently stabilising. Meanwhile, Spanish sovereign bonds, which account for a significant portion of the insurance portfolio (36% of total investments in 2024) fared well. All these variables are determinants of the insurance sector's turnover, profitability and solvency, as described below.

In terms of solvency, the insurance sector remains resilient, with its solvency ratio declining very slightly at end-2024 (238%, versus 239% in 2023). The main

Chart 3.4.1 Insurance undertakings' own funds



SOURCE: DGSFP.

variables that determine solvency developments are own funds and the solvency capital requirements (SCR), with changes of 3.8% in the latter and of 3.4% in own funds. Own funds developments are mainly marked by the performance of investments and technical provisions. Investments grew by 4.1% as a result of changes in interest rates and credit spreads. This growth offset the decrease in own funds due to the 4.2% increase in technical provisions, stemming from the fall in interest rates, while business growth and profitability, combined with a higher return on investments, contributed to own funds growth.

The main figures that define insurance undertakings' profitability performed favourably. In 2024 return on equity (ROE) stood at 13.9% and return on assets (ROA) at 1.9%, up 1 pp and 0.2 pp, respectively, on their 2023 figures. The profitability of the life and non-life insurance businesses is discussed separately below due to the distinct characteristics of the two insurance activities.

With regard to the non-life insurance business, against the backdrop of interest rate cuts, the sound economic performance, underpinned by private consumption, a strong labour market and the recovery in lending to the private sector, passed through to the volume of premiums, which performed robustly in 2024, with above-inflation growth (of 6.8% in the case of gross premiums written). Underwriting income resumed a growth path in 2024, after decreasing slightly in 2023 due to inflationary pressures. Thus, the combined ratio, which indicates premiums' ability to cover claim-related losses and handling expenses, performed favourably (decrease of 1.3 pp), after worsening markedly in 2023 (increase of 1.7 pp) as a result of the high inflation in that year. Meanwhile, financial earnings fared positively (growth of 0.6 pp), boosted by business growth and the prevailing interest rate environment.

Turning to life insurance, turnover decreased (growth in gross premiums written down 13% in 2024), following the spectacular increase in 2023 (36%) stemming mainly from the notable rise in interest rates that boosted the arrangement of saving plans and from some banks' decisions not to remunerate deposits.

However, turnover continued on an upward path, growing considerably when compared with 2022 (18% relative to 2022). In terms of savings managed, the figures for provisions at year-end show slight growth for life insurance activity in Spain of 3.1%, to €213,738 million.

The technical account result as a percentage of technical provisions performed positively (growth of 0.1 pp), driven by an increase in the return on investments that offset the growth in technical provisions stemming from the interest rate cuts in 2024.

Insurance undertakings' investment structure remains stable. Investments continue to be concentrated in government bonds (49.2%) because of their liquidity, security and fixed-income structure, providing stable and predictable cash flows to meet payouts to policy holders. The credit quality of the investments is steady, with a virtually insignificant share of investments rated below investment grade (1.1%).

The wealth built up in pension funds (one of the instruments designed specifically for channelling retirement savings) grew in 2024. Following the decline observed in 2022, 2024 saw a continuation of the positive trend that began in 2023. The increase was greater in individual and associated pension schemes (8.4%) than in occupational ones (5.2%). This growth was due to the positive yields obtained on pension fund investments. In the case of occupational pension schemes, in 2024 the number of participant accounts increased by 717,853, of which 639,193 related to the new simplified occupational pension schemes.

The high presence of the bancassurance business model and the importance of interconnection risk for financial stability warrant special attention. The bancassurance segment dominates the life insurance branch, contributing some 65% of its business. Notably, with a contribution to overall (life and non-life) insurance business of around 38%, bancassurance contributes 47% of the sector's total earnings. Although investments in the banking sector (addressed in more detail in the section on interconnections) remain stable, there are other important sources of interconnection: the most significant are the business model (for instance, loan protection insurance, bancassurance companies' marketing decisions) and the contribution to bank earnings through fees and dividends. While the bancassurance sector's high solvency does not raise significant prudential questions, supervising these institutions' market practices is a strategic priority for the DGSFP.

Reinsurance is another of the DGSFP's strategic priorities. Reinsurance is an important risk and capital management tool that is also used to diversify risk, increase underwriting capacity and reduce gaps in insurance protection. Its important role from a financial stability standpoint is because of its risk mitigation. A clear example is the coverage provided in relation to natural disasters and in longevity risk, which is exerting increasing pressure on governments, pension funds and life insurance undertakings. Nonetheless, the current situation in Europe

shows that complex reinsurance structures are increasingly coming to the fore, which has driven supervisory actions in this area.

The main reinsurance focal points are as follows: the appropriate assessment of the actual risk mitigation that reinsurance provides and the risks stemming from the activities of insurance undertakings located in third countries under legal frameworks that the European Commission does not consider to be equivalent. With regard to the former, the DGSFP's actions are focused on: (i) assessing whether insurance undertakings' consider appropriate the balance between reinsurance premiums and the coverage provided; and (ii) assessing the additional risks caused and whether the mitigation provided in the calculation of the SCR is considered appropriate. In addition, while complex structures are admittedly immaterial in the Spanish insurance sector, they should be monitored by supervisors. Further, ongoing innovation in this market segment should be looked at constantly in order to ensure that the resilience it offers to the insurance sector is real and effective and that the system's sustainability is not compromised. In relation to third countries, 15% of reinsurance is in non-equivalent markets, with 12% corresponding to the United Kingdom and the United States. Accordingly, the risk stemming from third countries' regulatory framework is deemed "insignificant".

Climate change poses systemic physical and transition risks with direct implications for the insurance sector. Protecting against and preventing these risks is crucial and entails a wide range of actions by insurance undertakings. These include properly understanding the risks, having pertinent databases, designing accurate tools and methodologies for measuring risk, creating new climate-related products and collaborating with other social partners in mitigating the risks. The insurance sector is aware of the key role that it plays in this field due to both it being a long-term institutional investor and its important role in managing physical risks.

The DGSFP is assessing the main physical and transition risks affecting the Spanish economy and its insurance sector, both at individual insurance undertaking level and for the sector as a whole. Narrowing the gap in insurance protection is particularly important for this supervisory authority, given the significance of extreme weather events and the need to better protect the population against both ordinary and extraordinary events.

The DGSFP included within its supervisory priorities for the period 2023-25 the analysis of the inclusion of ESG sustainability in insurance undertakings, examining how they encourage and introduce these sustainability principles, rules and objectives in their policies and products and in their risk management and identification, and how they measure their impact and contribution in this area. For instance, it conducted an analysis of insurance undertakings' degree of adaptation to the amendments introduced by Delegated Regulation (EU) 2021/1256, mainly with regard to risk management, the actuarial function and remuneration policy, and the alignment of insurance undertakings with the opinion of the European

Insurance and Occupational Pensions Authority (EIOPA) on the supervision of the use of climate change risk scenarios in own risk and solvency assessment, and an analysis of the changes to be made as a consequence of the 2020 review of Solvency II. The DGSFP is analysing the European Commission's "Omnibus" package with regard to the Corporate Sustainability Reporting Directive (CSRD) (Directive (EU) 2022/2464), taxonomy and the Corporate Sustainability Due Diligence Directive (CSDDD) (Directive (EU) 2024/1760), and is collaborating with the EIOPA in the drafting of the Regulatory Technical Standards (RTS) on sustainability risk plans.

Cyber risks are one of the main global risks to the insurance and pension sector. Ever more sophisticated cyber attacks and the ongoing digital transformation render insurance undertakings increasingly susceptible to cyber threats. In this respect, sound data governance is key to ensuring the accuracy, availability and security of data in general, and in the use of artificial intelligence in particular. The sector is heavily reliant on the services rendered by ICT providers, especially those that provide cloud services. This is in addition to the shortage in the market of technology profiles with the necessary ability to manage these new technologies. In this setting it is important to guarantee the sector's ability to ensure the continuity of its services, even in the event of shocks, by identifying, protecting against, detecting, responding to and recovering from these risks. Bolstering this capacity prompted sizeable efforts by the insurance sector in 2024 to ensure early and correct alignment with the Digital Operational Resilience Act (DORA), which entered into force on 17 January 2025.

EIOPA's 2024 Insurance Stress Test assessed the resilience of the European insurance sector's capital and liquidity position to the economic consequences of a re-intensification or prolongation of geopolitical tensions. The scenario, developed in cooperation with the ESRB, envisages a widespread resurgence of supply chain disruptions, leading to lower growth and higher inflation. Second-round effects stemming from a wage-price spiral would further exacerbate inflationary pressures, ultimately leading to a re-appraisal of market expectations of interest rates across tenors and currencies. Despite expectations of decreasing inflationary pressures over time, growth will continue to be adversely affected. The resulting tightening of financing conditions would heterogeneously increase government bond rates and would weigh on corporate profitability, widen credit spreads and have a negative impact across other asset classes.

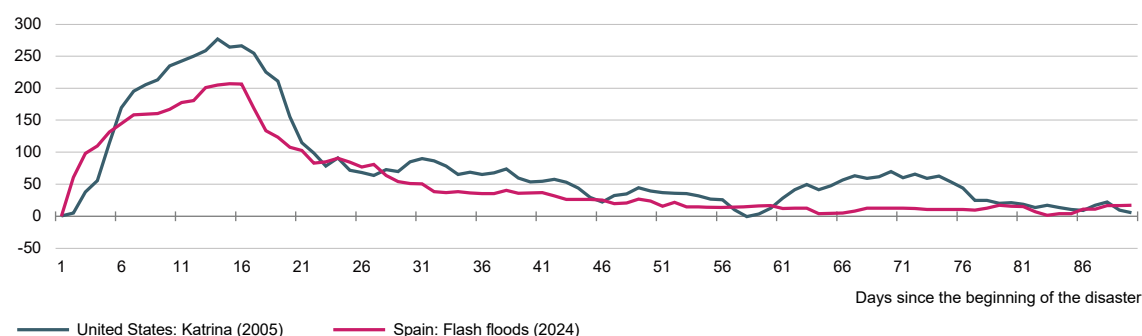
The results show that the Spanish insurance industry included in the scope of the stress test (specifically two large insurance groups) is well capitalised. This strong initial capital position provides sufficient resilience to withstand the materialisation of the events envisaged under the stress test scenario. Meanwhile, comparing liquidity needs against liquid assets showed that the Spanish participants' liquid assets were adequate to steadily sustain the liquidity needs caused by the stressed scenario.

The amendments to the Solvency II Directive were an important milestone for the insurance sector. The main objectives were: to make the framework more efficient by promoting long-term investment; to improve the supervision of (re)insurers with cross-border activities; to integrate macroprudential tools to prevent systemic risk; to simplify the regulation for smaller (re)insurers through the proportionality principle; and to address new risks, such as climate-related financial risks. The new directive introduces a macroprudential dimension in Solvency II, which seeks to equip supervisors with the tools to preserve the financial stability of the insurance market overall. The tools notably include the requirement to draw up and keep up to date liquidity risk management plans and the attribution of powers in exceptional circumstances, such as the restriction or suspension of dividend distributions or of bonuses or other variable remuneration and, as a measure of last resort, the temporary suspension of redemption rights of life insurance policy holders.

In the macroprudential and crisis management realm, the Insurance Recovery and Resolution Directive (IRR) stands out. The IRR is designed to better prepare EU insurers and authorities for situations of severe financial stress so that they can act timely and swiftly in a crisis situation. This will protect policy holders while minimising the impact on the economy and the financial system and any recourse to taxpayer money. The IRR essentially establishes two main blocks of measures: first, crisis prevention measures, namely preventive recovery planning and resolution planning; second, a crisis management (resolution) framework, distinct from and parallel to the existing national framework for treating the failure of (re)insurance undertakings, which requires designating a national resolution authority on which a series of resolution powers and tools must be conferred. There are two main reasons behind the new requirements and procedures established in the IRR: the pre-existing (and scarcely harmonised) normal insolvency proceedings to manage the market exit of failing undertakings had proven insufficient to contend with crises at large (cross-border) groups; and it was necessary to establish a framework that minimised the recourse to public financing (i.e. that protected taxpayers) and ensured the transfer of the insurance business of the failing undertaking to others, to minimise the impact of its failure on policy holders and on the real economy and financial stability.

Box 3.A The effect of the autumn 2024 flash floods in Spain from a financial stability standpoint

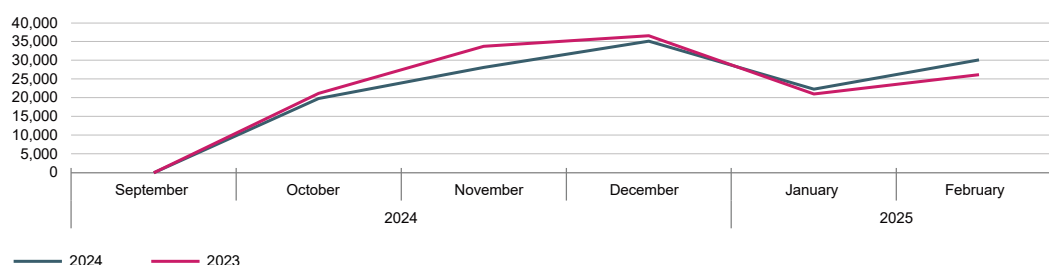
Chart 3.A.1 Change in the bottlenecks index in the United States after Hurricane Katrina (2005) and in Spain after the flash floods (2024)



SOURCE: Banco de España.

NOTE: Adapted from Pablo Burriel, Iván Kataryniuk, Carlos Moreno Pérez and Francesca Viani. (2024). "A New Supply Bottlenecks Index Based on Newspaper Data". *International Journal of Central Banking*, 20(2), pp. 17-67. <https://www.ijcb.org/journal/ijcb24q2a2.pdf>

Chart 3.A.2 Change in average social security registrations in the Valencia province since September



SOURCE: Ministerio de Inclusión, Seguridad Social y Migraciones.

Climate change is intensifying the frequency and severity of extreme weather events. In 2024 Spain suffered one of the worst natural disasters of recent decades: a “cut-off low” – a meteorological phenomenon that caused flash floods in several areas of the

country on 29 October. The Valencia province was particularly hard hit.¹ This was an exceptionally rare meteorological event, with a recurrence interval of over 200 years, and was considerably more severe than other recent episodes. In addition to the tragic consequences

¹ The areas affected were initially established in the annex to Royal Decree-Law 6/2024 of 5 November 2024, which included 78 municipalities, most of which belonged to the Valencia province.

Box 3.A The effect of the autumn 2024 flash floods in Spain from a financial stability standpoint (cont'd)

in terms of lives lost (235), it also had significant repercussions for the economy and the financial sector.²

A swift and effective response from the Government and financial institutions is key to mitigating the negative economic impact and supporting the recovery. The historical evidence available suggests that the negative impact of floods is essentially temporary, as it is subsequently offset by the fiscal impulse from the various support measures deployed and the increased spending by firms and households on replenishing capital and durable goods. However, for these potential offsetting effects to materialise, it is essential that there be no financial friction and that aid for reconstruction be effective.

The flash floods have had a significant impact on the economy of the municipalities concerned, which account for around 2% of the national total.³ Given the relative extent of the affected area, the Banco de España has been monitoring a range of high-frequency indicators to measure the economic effects of the flooding in real time, such as the supply bottlenecks index and employment developments. The supply bottlenecks index pointed to a severe initial negative impact of the flash floods (like that observed in the United States after Hurricane Katrina in August 2005) that diminished relatively sharply after a fortnight. Meanwhile, the impact on employment has been limited, given that recent social security registrations in Valencia show a pattern similar to

that observed twelve months earlier, following the small gap that appeared in November 2024 as a result of the floods. At 11 February 2025 some 32,000 workers had been placed on furlough under job retention schemes (known in Spanish as ERTes), representing around 1.5% of employment in the Valencia region. Tourism was one of the sectors most affected by the floods, as it suffered from constraints on travel in certain areas on account of damaged infrastructure.

The Insurance Compensation Consortium (CCS), as the direct underwriter of extraordinary risks, has played a key role in managing the fallout from the flash floods. The flash floods have prompted the highest number of claims in the CCS's history – over 240,000, for an amount that is expected to exceed €4.8 billion. In light of these exceptional circumstances, the CCS has taken various steps with the ultimate aim of expediting the handling and adjusting of the claims, thereby ensuring that compensation reaches insured claimants as swiftly as possible.

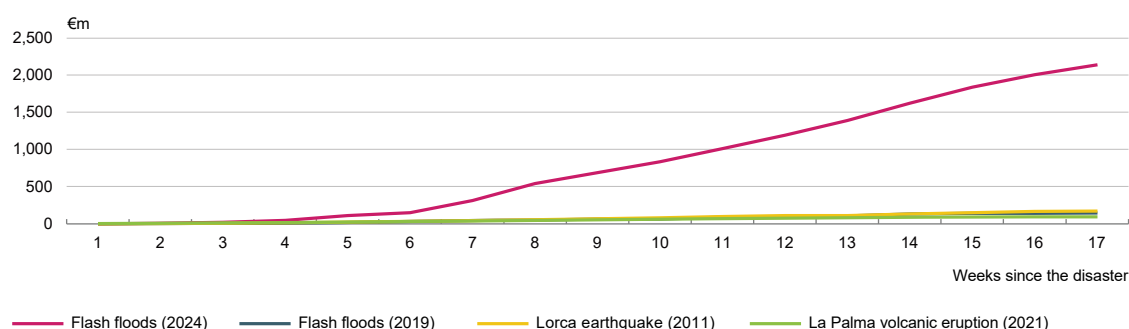
Comparing this with other extraordinary catastrophes managed by the CCS illustrates the exceptional nature and magnitude of this disaster. The cumulative amount of the payouts at 28 February is eight times greater than the total stemming from the La Palma volcanic eruption in 2021 (see Chart 3.A.3). Meanwhile, the cumulative number of payouts is 2.5 times that of the earthquake in Lorca (2011) and the La Palma volcanic eruption.

² See the section on the flash floods on the La Moncloa website.

³ On various metrics (e.g. population, employment and business activity).

Box 3.A The effect of the autumn 2024 flash floods in Spain from a financial stability standpoint (cont'd)

Chart 3.A.3 Cumulative value of payouts. Comparison with other natural disasters



SOURCE: CCS.

The CCS, together with the combined agricultural insurance system,⁴ helps mitigate the impact of climate risk, by contributing to maintaining the financial stability of the Spanish insurance sector, in particular, and that of the financial sector, in general. The

CCS is funded out of private contributions through surcharges paid by individuals and firms in their policies.⁵ Pooling risk among insureds, events, regions and over time allows the CCS to pay out compensation for risks characterised by their extraordinary volatility and infrequency.

⁴ According to Agroseuro, the flash floods prompted losses on more than 50,000 insured plots of land, with compensation that will amount to around €60 million. See Agroseuro. (2025). "Agroseuro destaca la respuesta ofrecida por el seguro agrario en la gestión de los siniestros provocados por la DANA" [Press release], 20 February.

⁵ Mainly car, home, multi-risk and life insurance.

4 Interconnectedness in the financial system

Interconnections between financial institutions are indispensable for efficient management of their resources, but also generate risk transmission channels that should be analysed. Interconnections are a mechanism by which banks can modify their risk profile and diversify their exposures, as well as channel excess liquidity (or their financing needs) by investing in assets issued by other financial institutions (or by obtaining funding from them). However, these exposures between financial institutions may also facilitate the transmission of systemic shocks originating at one or more financial institutions. Therefore, analysis from a financial stability perspective is crucial. This section analyses direct interconnections⁵² (mainly holdings of financial assets issued by other financial institutions) and indirect interconnections. The latter stem from both common holdings of financial assets issued by the same issuers and exposures to different, but highly correlated, assets.

Direct interconnections between different financial sectors increased more than the total assets of these sectors over the course of 2024. As in 2023, this trend is related to the decline in the share of ECB financing, due to its increased cost compared with the period prior to mid-2022. This decline appears to have been offset by a rise in interbank financing. Specifically, direct interconnections between financial sectors increased by nearly 15% over 2024, while their total assets only rose by 4.7%.

The structure of direct interconnections shows that banks' main exposures are mostly to other banks. In contrast to previous reports, this edition includes Sankey diagrams for the first time to visually represent direct exposures between financial institutions more clearly. As can be seen, the banking sector remains the largest sector⁵³ and one of the most interconnected (see Figure 4.1, panel 1). Particularly noteworthy is funding through the interbank market and, to a much lesser extent, insurance company funding by banks identified as systemic by the Banco de España.

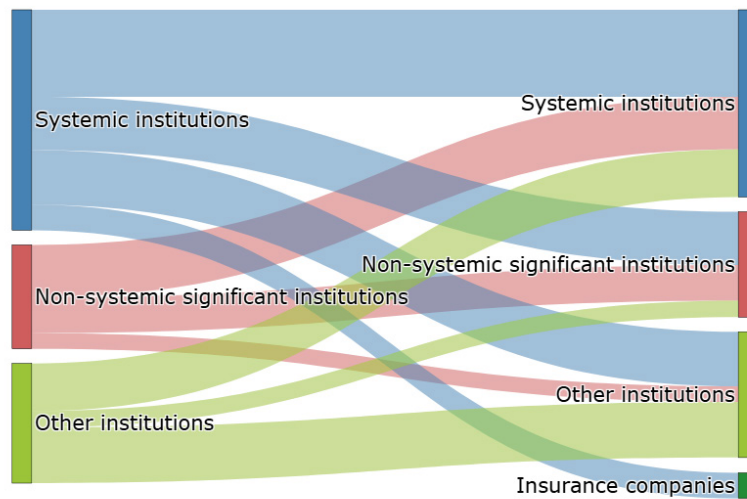
Likewise, the main interconnections of CIUs, insurance companies and pension funds are exposures to banks, but they also have considerable interconnections with other insurance companies and CIUs. Among non-bank financial institutions, in 2024 insurance companies had the highest exposures to other financial institutions, followed by fixed-income funds and pension funds (see

⁵² Direct exposures include various types of holdings of other financial institutions, such as loans, debt securities, equity holdings (shares), investment fund shares or units, deposits and cash accounts.

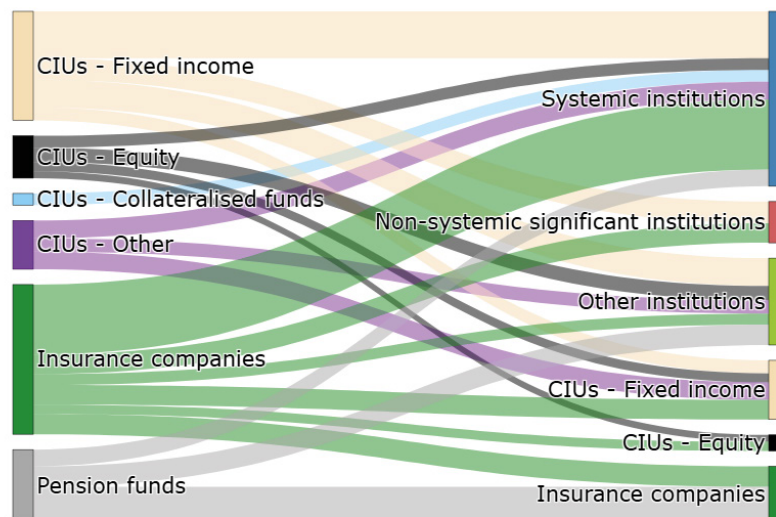
⁵³ In Spain, the total financial assets of the resident private financial system exceeded €4 trillion in December 2023, of which more than 65% were accounted for by the banking sector.

Figure 4.1 Direct interconnections of the Spanish financial system. December 2024

1 Exposures of the banking sector (left-hand side) to all financial sectors (right-hand side)



2 Exposures of the non-bank financial sector (left-hand side) to all financial sectors (right-hand side)



SOURCES: Banco de España, CNMV and DGSFP.

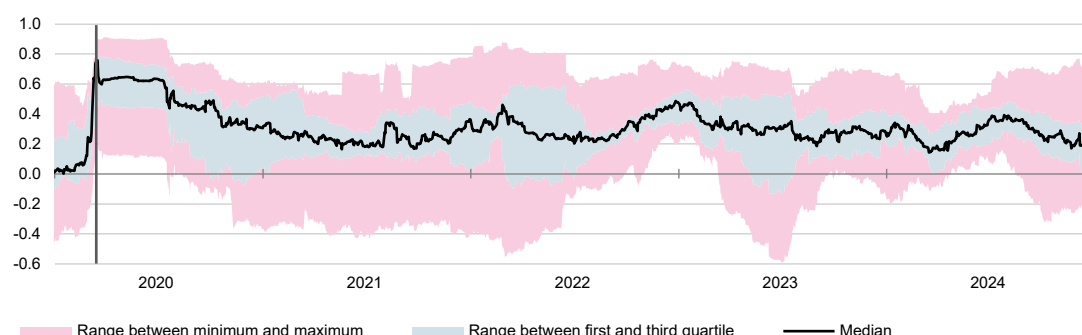
NOTE: Direct exposures include various types of holdings of other financial institutions, such as loans, debt securities, equity holdings (shares), investment fund shares or units, deposits and cash accounts. CIUs: collective investment undertakings. Direct interconnections are calculated taking no account of consolidations between the different financial sectors. The size of the flows is represented by the width of the lines. For greater clarity, exposures accounting for less than 1% of the total exposure in the financial system are not included. In cumulative terms, these exposures account for 8.5% of the total exposure.

Figure 4.1, panel 2). Once again, the funding received by systemically important institutions (SIIs) had the greatest share in these interconnections.⁵⁴

⁵⁴ The banking sector is broken down into three categories: (i) systemic institutions, i.e. those identified by the Banco de España as global systemically important institutions (G-SIIs) or other systemically important institutions (O-SIIs); (ii) non-systemic but significant institutions from the standpoint of the Single Supervisory Mechanism; and (iii) less significant institutions (LSIs). For further details, see Chapter 4 of the *AMCESFI Annual Report 2020*.

Chart 4.1 Analysis of indirect interconnections through correlations between prices of listed financial assets

1 Indicator of correlation between asset classes (a)



2 Indicators of correlation between the financial and the non-financial sector (b)

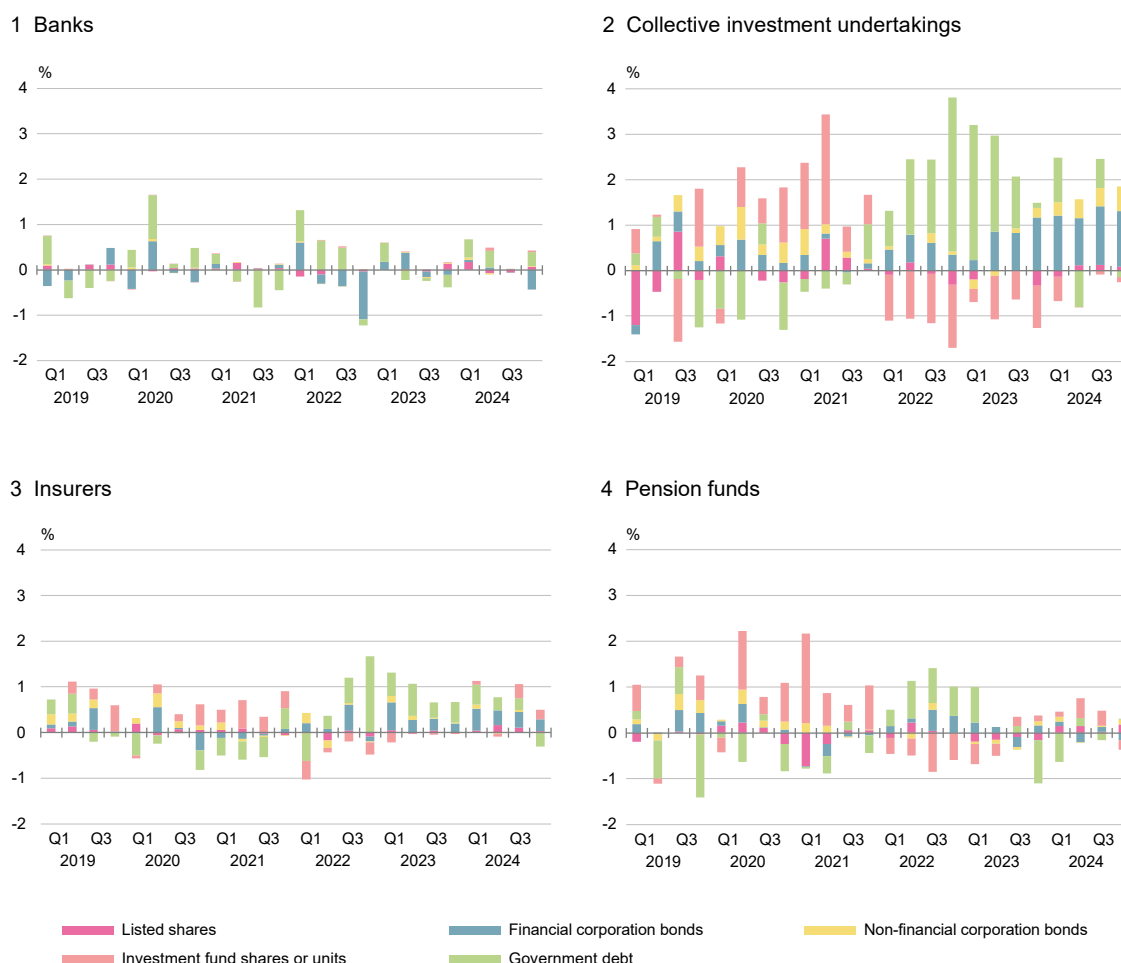


SOURCE: CNMV.

- a** The indicator of correlation between asset classes takes correlation pairs calculated by drawing on daily data in 3-month windows. The asset classes are sovereign debt, corporate bonds of financial and non-financial institutions and equity securities of financial institutions, utilities and all other sectors. The vertical line marks the start of the market turmoil owing to the health crisis, in early March.
- b** The indicators of correlation between the financial and the non-financial sector take correlation pairs calculated by drawing on daily data in 3-month windows. The assets considered for the calculation are listed equity securities of the financial and the non-financial sectors. In addition, the latter has been split into two groups: i) the sectors most vulnerable to the effects of the COVID-19 pandemic, and ii) all other non-financial sectors. The vertical line marks the start of the market turmoil owing to the health crisis, in early March.

In 2024 the correlations between financial assets remained stable on average, albeit with fluctuations over the year as a whole. This analysis is performed by studying the price correlation between the equities and debt securities issued by Spanish issuers, which offers an estimation of the changes in indirect interconnections between financial institutions. In 2024, this indicator showed three distinct phases. In Q1 it declined, only to increase significantly in Q2. In the second half of the year, the median again decreased notably, albeit with a rising variability between the minimum and maximum correlations. The changes in monetary policy expectations and the presence of geopolitical uncertainties, such as Russia's war against Ukraine and Israel's conflicts with its Middle Eastern neighbours, in addition to the US elections at end-2024, may have contributed to these variations. The most dominant factor influencing the downward trend in the final stretch of 2024 could have been the reduction in interest rates on the back of the moderation of inflation and inflation expectations in an environment of asset revaluation (see Chart 4.1, panel 1). When the correlations between

Chart 4.2 Net transactions by type of instrument as a % of the sector's total assets

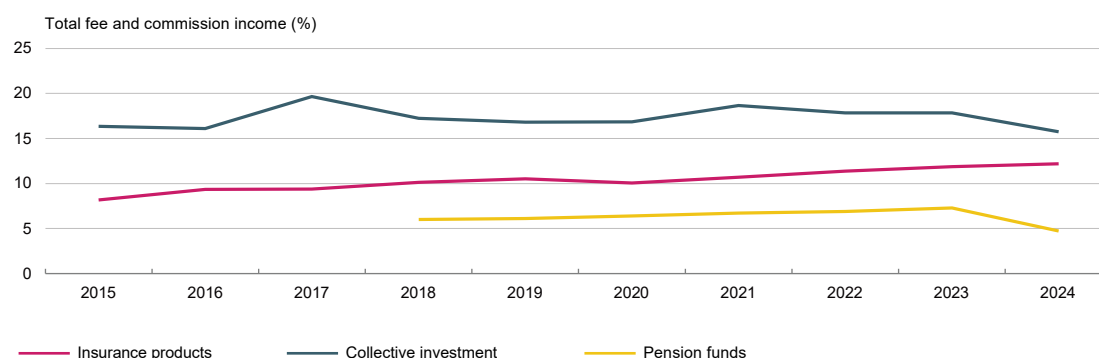


SOURCES: Banco de España (Financial Accounts of the Spanish Economy) and ECB (Securities Holdings Statistics by Sector).

financial and non-financial sector assets are analysed (calculated based only on equity securities), their averages can be seen to have risen from the start of the year to Q3 (see Chart 4.1, panel 2). The situation reversed notably thereafter, when the correlations trended downwards, falling to around their lowest levels in recent years. The drop in correlations was due to the increase in profitability in the financial sector and decreased profitability in the non-financial sector.

Common holdings of government debt represent a common component of indirect interconnections between financial institutions, but activity was slow in 2024. As regards government debt, 2024 saw a sharp slowdown in purchases by CIUs, while such purchases also declined among insurance companies and pension funds (see Chart 4.2). Banks maintained a positive, albeit moderate, level of government debt purchases. The decrease in government debt purchases by insurance companies and CIUs in 2024 was accompanied by increased purchases of bank debt, especially by CIUs. Additionally, in 2024 CIUs

Chart 4.3 Income from fees and commissions linked to insurance and collective investment products marketed by the banking sector



SOURCES: Banco de España and CNMV.

NOTE: For fees and commissions relating to the marketing of pension funds no data are available before 2018.

reduced the pace at which they sold investment fund shares or units. All of this appears to indicate a shift in non-bank financial sector investments in government debt towards investments in private debt, which is possibly related to the context of more moderate interest rates. This would increase direct interconnections between financial institutions, as part of these would be exposures to Spanish financial institutions, as well as indirect interconnections via the exposures to foreign financial institutions.

The business models of some financial institutions represent another important interconnection channel. In addition to the above-mentioned asset-side interconnections, there are interconnections between the banking sector and other financial sectors arising from banks' role in distributing products from these other sectors. For instance, insurance companies with ties to banking groups (the bancassurance business) comprise a sizeable share of the Spanish insurance sector, while these institutions' make a significant contribution to earnings in the banking sector through the payment of fees, commissions and dividends. Life insurance in particular is commonly distributed through the banking network. The key drivers of the bancassurance business are: (i) the reach of the Spanish physical bank network; (ii) the similarity between retirement savings products and financial products; and (iii) insurance policies linked to loans (both consumer credit and mortgages) making up a significant share of the overall life insurance market.

Bancassurance turnover has decreased following the extraordinary growth of life-savings insurance in 2023. Nonetheless, the contribution of insurance products and pensions funds to banks' fee and commission income again rose slightly in 2024, in relative terms as a percentage of total fee and commission income, while that of collective investment products declined (see Chart 4.3). From a banking conduct perspective, the high returns on credit protection

insurance entail risks owing to potentially unsound practices regarding their underwriting and sale.

Other channels of interconnectedness take various forms. Notable examples include operations on derivatives markets and their central counterparty clearing houses, cyber risks and AI risks.

Box 4.A An initial analysis of the bilateral exposures between Spanish financial institutions

In 2024 AMCESFI's Interconnections Subcommittee worked on developing a bilateral exposures database. To date the analysis of interconnections conducted in Chapter 4 of this *Annual Report* is restricted to exposures between segments of the financial system. To delve deeper into these exposures, in 2024 the Interconnections Subcommittee started developing a database containing bilateral exposures between all the institutions comprising the Spanish financial system.¹ The analysis in this box is based on the exposures at end-2023 reported to Spain's sectoral supervisors. There are some limitations to this analysis. For instance, some institutions in the Spanish market are not required to report data at year-end. There are also other institutions, such as various types of venture capital funds and companies registered with the CNMV, whose obligations are deferred and are not required to report information until June of the following year.

Constructing the bilateral exposures database required consistently integrating heterogeneous information from each sectoral supervisor. Initially, each supervisor provides to the others a list with the employer or tax identification numbers and legal entity identifiers of the institutions in its sector. Each supervisor then uses this list to select in its internal databases all the exposures of the institutions in its sector to the

institutions on the list. For example, the Banco de España uses the Central Credit Register to obtain this granular information. Lastly, the institutions belonging to a single group within each sector are consolidated. Both for CIUs and pension funds, this process involves consolidating all funds managed by the same management company.

Analysing the network of bilateral exposures shows a greater concentration of activity among a few banks, while it is more widely dispersed among investment funds, insurance undertakings and pension funds. In particular, on analysing the number of counterparties of each financial institution, a higher level of activity was observed among banks, in line with them accounting for a greater share of the Spanish financial system. In addition, the top five banks account for most of the counterparties, with exposures to other banks, investment funds, insurance undertakings and, to a lesser extent, pension funds (see Chart 4.A.1). For example, the leading bank has exposures to around 150 counterparties. However, counterparties are less concentrated among the other financial sectors, likely because of their smaller size. Lastly, banks and investment funds account for most of the counterparties for all segments, while insurance undertakings and pension funds mainly tend to be the banking sector's counterparties.

¹ Specifically, this database includes banks, savings banks, credit cooperatives, branches of foreign EU and non-EU credit institutions, capital market funds, open-end investment companies, venture capital funds, European venture capital funds, SME venture capital funds, European social entrepreneurship funds, closed-end collective investment funds, venture capital companies, SME venture capital companies, closed-end collective investment companies, hedge funds, real estate investment funds, hedge fund companies, real estate investment trusts, investment fund management companies, public limited insurance companies, mutual insurance companies, non-profit insurance institutions, reinsurance undertakings, pension funds and pension fund management companies.

Box 4.A An initial analysis of the bilateral exposures between Spanish financial institutions (cont'd)

Chart 4.A.1 Distribution of the number of exposures among the 15 institutions with the highest level of activity in each sector



SOURCES: Banco de España, CNMV and DGSFP.

NOTE: Each panel depicts the total exposures of the 15 institutions with the highest number of exposures of each sector. Each colour denotes the total number of exposures to each of the different sectors.

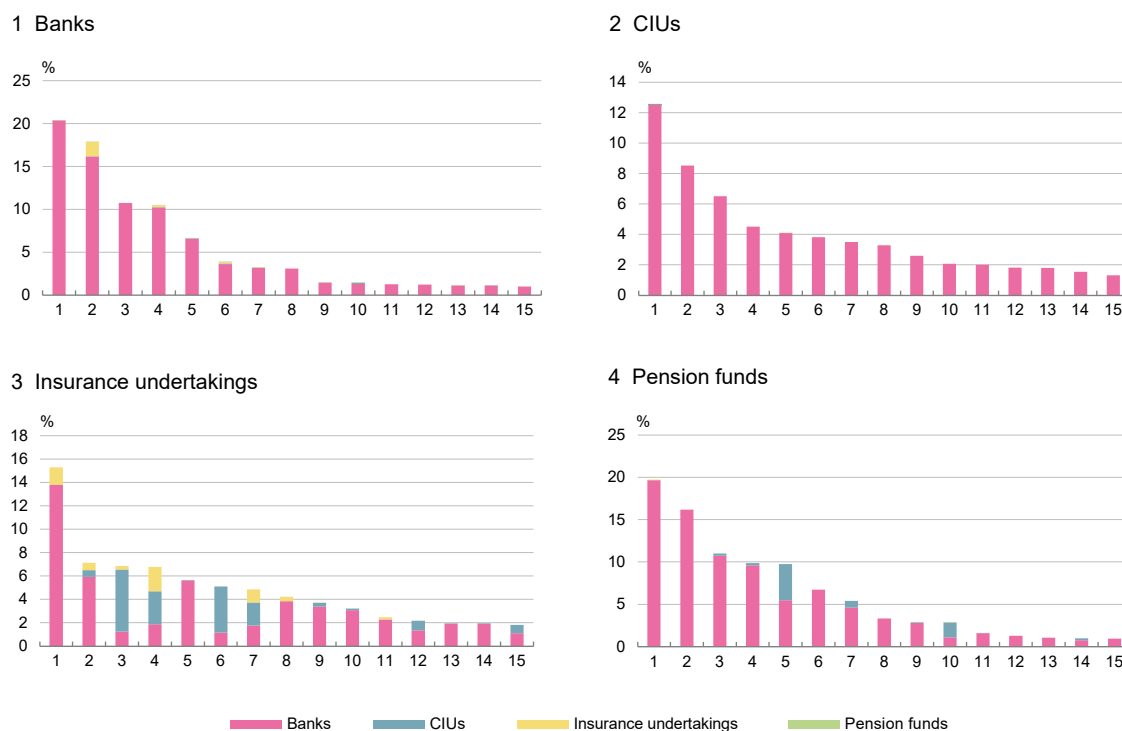
In terms of volume, exposures to banks are the largest. The most exposed bank accounts for over 20% of bank operations (see Chart 4.A.2). The degree of concentration is similar for pension funds (20% for the institution with the most activity), while it is somewhat lower for CIUs and insurance undertakings (13% and 15%, respectively, for those with the most activity). In addition, the share of operations with non-bank counterparties is very low in general, except for some insurance undertakings

and pension funds, which have sizeable exposures to CIUs and other insurance undertakings.

Looking ahead to future reports, the aim is to continue analysing this granular information to assess its financial stability implications. In particular, it will be interesting to add granular information in successive years in order to evaluate the changes in the direct interconnections between financial institutions. Possible network models

Box 4.A An initial analysis of the bilateral exposures between Spanish financial institutions (cont'd)

Chart 4.A.2 Distribution of the value of the exposures among the 15 institutions with the highest level of activity in each sector



SOURCES: Banco de España, CNMV and DGSFP.

NOTE: Each panel depicts the total exposures of the 15 institutions with the highest volume of exposures of each sector as a percentage of the total exposures of all institutions in the corresponding sector. Each colour denotes the total volume of exposures to each of the different sectors.

that enable the analysis of how shocks in one institution are transmitted to the

rest of the financial system through these exposures will also be studied.

5 European Systemic Risk Board recommendations and warnings relevant to AMCESFI

AMCESFI, in its capacity as the Spanish macroprudential authority, receives recommendations from the European Systemic Risk Board (ESRB), the European macroprudential authority. These recommendations aim to prevent or mitigate systemic risks and vulnerabilities and to promote policy interventions by the relevant EU authorities, including national macroprudential authorities, designated supervisory and resolution authorities and even Member States themselves. The ESRB also addresses recommendations to the European Commission, ECB Banking Supervision, the three European banking supervisory authorities (EBA, EIOPA and ESMA) and the Single Resolution Board.

In 2024 the ESRB issued four recommendations relevant to the Banco de España on voluntary reciprocity for certain macroprudential policy measures implemented in Belgium, Denmark, Italy and Norway. Such recommendations seek to encourage Member States to reciprocally adopt measures activated in other Member States, thereby ensuring the effectiveness and consistency of national macroprudential policy measures.⁵⁵ Belgium (ESRB/2024/5) and Denmark (ESRB/2024/3) amended the design of their sectoral systemic risk buffer (SyRB) measures to protect their banks against potential adverse developments in the residential housing market (Belgium) and in construction and real estate development activity (Denmark). The Banco de España took no reciprocal measures in either case, after verifying that Spanish banks had no material exposure to the real estate market of either country.

Likewise, in 2024 and for the first time ever, the Banco de España adopted macroprudential measures to comply with two ESRB reciprocity recommendations.⁵⁶ These were ESRB/2023/13 (Portugal) and ESRB/2024/2 (Italy), for which the Banco de España – following AMCESFI's positive opinion (see Section 1) – agreed to introduce an SyRB on internal ratings-based retail exposures to natural persons secured by residential real estate located in Portugal, from October 2024, and to introduce an SyRB (similar in design to a countercyclical capital buffer (CCyB)) on all credit and counterparty credit risk exposures in Italy, from 31 December 2024.

The experience gained over the past decade with the implementation of the macroprudential reciprocity regime in the EU has led the ESRB to

⁵⁵ For this purpose, Recommendation ESRB/2015/2 on the assessment of cross-border effects of and voluntary reciprocity for macroprudential policy measures is amended on a case-by-case basis.

⁵⁶ A third (Recommendation ESRB/2024/7, Norway) was also adopted by the Banco de España, with a reciprocal measure, in 2025.

make changes that encourage Member States to adopt reciprocal national measures. Specifically, to facilitate and standardise, insofar as possible, the EU-wide implementation of national macroprudential measures, the ESRB encourages the corresponding national authorities to assess the materiality of these measures, using increasingly granular criteria. These currently take the form of indicative materiality thresholds at the consolidated level which, if exceeded, result in the expectation that reciprocal measures will be applied at different consolidation levels (individual, sub-consolidated and consolidated).

The ESRB's recommendations are not binding, but they are subject to a general “comply or explain” principle. For this reason, the ESRB conducts regular assessment exercises to determine the degree of compliance with each of its recommendations by the authorities addressed. In 2024 the ESRB published its assessment on the degree of compliance with [Recommendation ESRB/2022/9](#) on vulnerabilities in the commercial real estate sector in the European Economic Area. The progress made by the Banco de España – and the other Spanish authorities addressed (AMCESFI, the CNMV and the DGSFP) – to implement

Table 5.1 ESRB Recommendations in force addressed to AMCESFI

ESRB Recommendation	AMCESFI	Banco de España	CNMV	DGSFP	FROB	Government
Recommendation ESRB/2022/9 of 1 December 2022 on vulnerabilities in the commercial real estate sector in the European Economic Area		FC (b)				
Recommendation ESRB/2020/12 of 24 September 2020 on identifying legal entities	FC	FC	LC	LC	FC	
Recommendation ESRB/2019/18 of 26 September 2019 on exchange and collection of information for macroprudential purposes on branches of credit institutions having their head office in another Member State or in a third country	FC	FC				
Recommendation ESRB/2016/14 of 31 October 2016 on closing real estate data gaps	FC (a)					
Recommendation ESRB/2015/2 of 15 December 2015 on the assessment of cross-border effects of and voluntary reciprocity for macroprudential policy measures		FC (b)				
Recommendation ESRB/2013/1 of 4 April 2013 on intermediate objectives and instruments of macroprudential policy	LC (a)					LC

SOURCES: ESRB and AMCESFI.

NOTE: The shaded cells denote the authorities to which each Recommendation is addressed. The degree of compliance is indicated where an ESRB compliance assessment report is available, as follows: Fully Compliant (FC); Largely Compliant (LC); Partially Compliant (PC); Materially Non-Compliant (MN); Sufficiently Explained (SE); and Insufficiently Explained (IE).

- a** Before AMCESFI was established in 2019, the Banco de España, as the designated authority for the banking sector, assumed responsibility for complying with the ESRB Recommendations addressed to the macroprudential authority.
b Recommendations ESRB/2015/2 and ESRB/2022/9 were assessed jointly for all the authorities addressed.

Recommendation A (on improving the monitoring of systemic risks stemming from the commercial real estate market) warranted the highest rating (fully compliant) (see Table 5.1). In parallel, another ESRB team of independent assessors analysed the degree of compliance with part of [Recommendation ESRB/2021/17](#) on a pan-European systemic cyber incident coordination framework (EU-SCICF) and also considered highly positively that in Spain the appointment of a key institutional contact point for establishment of the EU-SCICF had been notified in due time and form (see Annex 2).

Table 5.1 lists the ESRB recommendations in force addressed to AMCESFI, indicating the degree of compliance, based on the ESRB's assessment, where available. Annex 2 lists other ESRB recommendations addressed to at least one Spanish authority (but not specifically to AMCESFI).

Lastly, the ESRB is also empowered to issue warnings on vulnerabilities in the EU if systemic risk to financial stability is identified. These warnings can be addressed to the EU as a whole or to individual Member States, the European supervisory authorities or national authorities. The ESRB and the Council of the European Union decide, on a case-by-case basis, whether a warning should be made public, bearing in mind that disclosure can be key to its effectiveness and to compliance. Subsequently, the ESRB assesses whether systemic risk has been adequately addressed and may, where appropriate, return to the matter, this time issuing a recommendation. The latest ESRB warning – on vulnerabilities in the EU financial system ([Warning ESRB/2022/7](#)) – was issued in 2022, highlighting the need to preserve and enhance the resilience of the financial sector to ensure its continued capacity to support the real economy should financial stability risks materialise. The relative exceptionality of this mechanism at the ESRB's disposal explains why no further warnings have been issued since.

Box 5.A International Monetary Fund recommendations to AMCESFI in Spain's FSAP 2024

In June 2024 the IMF concluded an assessment of the Spanish financial system under its Financial Sector Assessment Program (FSAP). The FSAP is a regular macro-financial surveillance exercise of IMF member countries that has two aims: to enhance the IMF's knowledge of the regulatory and supervisory architecture of each jurisdiction and, at the same time, to offer advice to national authorities on possible reforms (legislative or organisational) and actions (specific measures) to strengthen the resilience of the financial system, the adequacy of the institutional framework and risk analysis culture and the oversight of banks and financial infrastructures. The IMF publishes extensive documentation on the findings of each FSAP. In the case of Spain, which in the view of the IMF has a "systemically important financial sector", FSAPs are carried out roughly every five years. Since the introduction of the programme, Spain has undergone four assessments (in 2006, 2012, 2017 and 2024).¹

AMCESFI was one of the authorities that participated in the latest FSAP in Spain. The FSAP intermittently covered a two-year period of intense work, between 2023 and 2024. As per standard IMF practice, it took the form of several missions (visits) of experts who, both in situ in Madrid and online, held numerous meetings with staff and senior officials

from the Spanish (and European)² authorities responsible for regulation and supervision of financial institutions, as well as with various private sector representatives in Spain. Coordinated by the General Secretariat of the Treasury and International Financing (SGTFI by its Spanish acronym), which belongs to the Ministry of Economy, Trade and Business (MINECO by its Spanish acronym), and with the logistical support of the Banco de España, numerous requests by the IMF for information on the state of the Spanish financial system were handled and dialogue with other key authorities – notably including the CNMV and the DGSFP, the FROB, the CCS, the Deposit Guarantee Scheme and Sepblac – was facilitated. AMCESFI, as a collegiate body attached to MINECO, with a mandate to oversee the financial system and coordinate macroprudential policies, was naturally also included in the scope of the IMF's work.³

The IMF staff were extremely interested in learning about AMCESFI's first four-five years of operation. Following discussions with representatives of the SGTFI, the Banco de España, the CNMV and the DGSFP involved in AMCESFI's regular activity, the IMF concluded that the macroprudential policy framework has been significantly strengthened in recent years with the creation of AMCESFI. Nevertheless, it

¹ For an additional summary of the FSAP, see Box 3.2 of the Banco de España's *Financial Stability Report*. Autumn 2024. For a more extensive commentary on the purpose, development and execution of the FSAP in Spain, and a comparison with those conducted in other European countries, see María Díez Alcoba, Fátima Estacio and Luis Gutiérrez de Rozas. (2024). "The IMF's Financial Sector Assessment Program in Spain: an overview from a financial stability standpoint". *Financial Stability Review* – Banco de España, 47, Autumn, pp. 45-69.

² The ECB and the ESRB.

³ AMCESFI was established in March 2019, in part to comply, as is recognised in its founding legal text (Royal Decree 102/2019), with a recommendation issued by the IMF in its previous FSAP (2017).

Box 5.A International Monetary Fund recommendations to AMCESFI in Spain's FSAP 2024 (cont'd)

issued 11 recommendations, some jointly for other agencies also (see Table 5.A.1 which draws on the IMF's report "Spain: Financial Sector Assessment Program-Technical Note on Macroprudential Policy Framework and Tools", of 1 August 2024). These 11 recommendations – all of which are included under Macroprudential Policy Framework and Tools, one of the FSAP's seven thematic areas – make up a sizeable proportion of the 78 recommendations issued by the IMF in total.

The recommendations addressed to AMCESFI share one common link, which is the aim to strengthen and consolidate its role. The IMF seeks to consolidate the role of AMCESFI, first by strengthening its activity and second by enhancing its transparency and raising its communication profile with the general public, based on the experience gained with other (relatively) new comparable European institutions⁴ that the IMF has monitored equally closely in the course of other national FSAPs. Each recommendation has a priority rating; roughly half are expected to be met immediately or within one year (from publication of the IMF report in August 2024) and the other half within three years (by mid-2027). Moreover, six of these recommendations were selected by the IMF to be included in its list of 20 FSAP Key Recommendations set out in its executive report "Spain. Financial System Stability Assessment".

The IMF's recommendations to AMCESFI are at different stages of implementation. Some of the recommendations require legislative

changes. This is the case for those relating to frequency of meetings and composition of the Council (established in Royal Decree 102/2019), simplification of administrative processes to expedite macroprudential measures, or review and consolidation of notification and permissioning requirements on investment funds and other non-bank providers, to inform the CNMV of the activation of instruments. Ultimately, therefore, it falls to MINECO to address these recommendations, under its legislative powers.

The other recommendations can be adopted independently by AMCESFI by agreement between its members. Some, such as those inviting it to engage in global fora on the further deepening and development of a framework and policy toolkit for addressing system-wide risks from the non-bank financial sector, or to address data and information gaps for analytical purposes, can be considered ongoing, insofar as these IMF recommendations coincide with similar ESRB recommendations.

In general terms, some of the IMF's recommendations – such as that which seeks to enhance the coordination of cross-agency work around AMCESFI – are aligned with how AMCESFI's activity is expected to develop. Indeed, the creation in 2024 of the Artificial Intelligence Subcommittee and the conversion of the Interconnections Subcommittee into a standing committee respond to the desire to give AMCESFI an increasing role in areas of work of common interest to its member institutions.

⁴ For instance, the High Council for Financial Stability (*Haut Conseil de Stabilité Financière*) in France or the Financial Stability Committee (*Ausschuss für Finanzstabilität*) in Germany.

Box 5.A International Monetary Fund recommendations to AMCESFI in Spain's FSAP 2024 (cont'd)

Table 5.A.1 IMF recommendations to AMCESFI

Recommendations	Agency	Priority
Macroprudential policy framework and instruments		
Increase the frequency of AMCESFI Council meetings to at least quarterly	AMCESFI, MINECO	Immediate
Raise the transparency of AMCESFI by publishing minutes/summaries of Council meetings and timely Annual Reports	AMCESFI, MINECO	Immediate
Strengthen the communication of AMCESFI's assessment of the major systemic risks and vulnerabilities, building on the expertise of the member authorities and detailed analysis of interconnections, interrelationships and spillover risks across the domestic financial system, as well as across borders	AMCESFI	Short term
Review the case for appointing two or three high calibre external macroprudential policy experts to the AMCESFI Council to strengthen the diversity of perspectives and expertise	AMCESFI, MINECO	Short term
Consider the case for AMCESFI to take on a broader high-level coordination role on financial stability topics and cross-cutting risk issues (such as cyber risk and crisis management planning), inviting other key public sector stakeholders to participate as appropriate	AMCESFI	Short term
Continue to address data and information gaps to enhance financial stability analysis and the development and application of macroprudential instruments	Banco de España, CNMV, DGSFP, AMCESFI	Short term
Introduce measures such as the positive neutral countercyclical capital buffer, to increase banks' loss-absorbing capacity in the face of adverse risk events	Banco de España, AMCESFI	Immediate
Review possible options for simplifying and streamlining the domestic consultation and administrative processes entailed in the deployment of certain macroprudential policy instruments, in order to shorten the lengthy implementation lag	AMCESFI	Short term
Review and strengthen notification (and in some cases, permissioning) requirements on funds and, where warranted, other NBFIs providers, to inform the supervisor of the activation of all policy instruments	CNMV, AMCESFI	Immediate
Continue to engage actively in European and global fora on the further deepening and development of the framework and policy toolkit for addressing system-wide risks from NBFIs and implement the main conclusions and recommendations when available	MINECO, Banco de España, CNMV, DGSFP, AMCESFI	Short term
Other key recommendations for AMCESFI		
Complete the first internal performance review of AMCESFI as mandated in the Royal Decree establishing the macroprudential authority	MINECO	Immediate

SOURCES: IMF and AMCESFI.

NOTES: The shaded recommendations are the IMF's Key Recommendations that appear in the report *Spain: Financial System Stability Assessment*. The others figure only in the Technical Note on Macroprudential Policy Framework and Tools (IMF Country Report No. 24/260). Priority is "immediate" where compliance is expected within one year and "short term" where it is expected between one and three years.

One IMF recommendation that can be considered already implemented is the introduction of a positive neutral countercyclical capital buffer (CCyB). This would give Spanish banks greater

loss-absorbing capacity in the face of adverse risk events. In October 2024, following the favourable opinion issued by AMCESFI, the Banco de España announced the activation of the CCyB

Box 5.A International Monetary Fund recommendations to AMCESFI in Spain's FSAP 2024 (cont'd)

with a buffer rate of 0.5% (effective from October 2025).

The IMF will assess compliance with these recommendations over the coming years. Some will be reviewed in the context of its annual Article IV (macroeconomic surveillance) exercises in Spain. The next FSAP will foreseeably be carried out in 2029 and

it will be then that the IMF will take stock of the degree of compliance with each of the recommendations listed above, both by AMCESFI itself and by the other agencies. AMCESFI's efforts in the coming years will be aimed at maintaining and, where possible, improving on the IMF's positive assessment in the 2024 FSAP of its first years of operation.

Annex 1 Dashboard of risk indicators

A1.1

Macroeconomic risk

- 1 Real GDP, seasonally adjusted quarter-on-quarter rate of change
- 2 Unemployment rate according to the Spanish Labour Force Survey
- 3 Inflation according to headline HICP
- 4 Government debt and deficit
- 5 Resident private sector debt, consolidated
- 6 Current account balance
- 7 Negative net international investment position
- 8 Unit labour costs

Chart A1.2

Market risk

- 1 Equity markets
- 2 Spanish 10-year government bond yield
- 3 12M EURIBOR
- 4 International market volatility
- 5 IBEX 35 volatility

Chart A1.3

Credit risk

- 1 NPL ratio, deposit institutions
- 2 Coverage ratio, deposit institutions
- 3 Spanish 10-year government bond yield spread over 10-year German Bund
- 4 CDS indicators
- 5 Stock of credit to resident private sector
- 6 New credit to resident private sector

Chart A1.4

Real estate risk

- 1 Real estate market developments
- 2 House price overvaluation estimates
- 3 Housing and construction loans
- 4 New housing loans

Chart A1.5**Liquidity risk and financing**

- 1 3-month LIBOR-OIS spread
- 2 Eurosystem monetary policy interest rates
- 3 Spain's average interest rate spread against the euro area on new loans of up to €1 million extended to firms
- 4 Debt security issuances
- 5 Equity issuances by Spanish firms
- 6 Loan-to-deposit ratio, other resident sectors
- 7 Trading of Spanish equities
- 8 Bid-ask spreads

Chart A1.6**Solvency risk and profitability. Banks. Consolidated data**

- 1 ROE
- 2 Cost/income ratio
- 3 Capital ratios
- 4 Leverage ratio (phased-in)

Solvency risk and profitability. Insurance undertakings

- 5 ROE
- 6 Non-life gross combined ratio
- 7 Solvency ratio

Chart A1.7**Structural risks and interconnectedness**

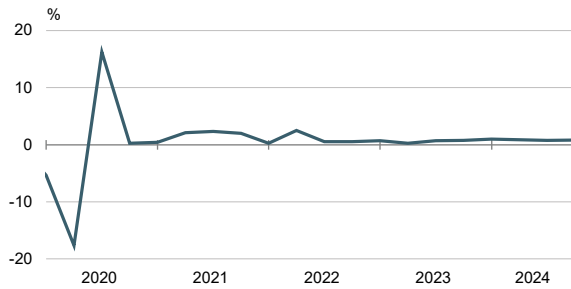
- 1 Financial sector assets
- 2 Assets of other financial intermediaries
- 3 Investment funds
- 4 Assets of insurance undertakings and pension funds
- 5 Banking sector liabilities, by sector
- 6 Systemic risk indicator

Chart A1.8**Other risks**

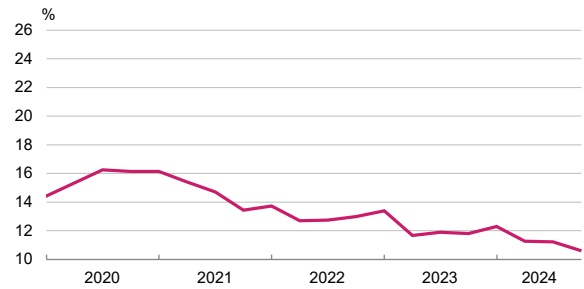
- 1 Greenhouse gas emission intensity
- 2 Global crypto-asset market capitalisation
- 3 Global market capitalisation of the main stablecoins

Chart A1.1 Macroeconomic risk

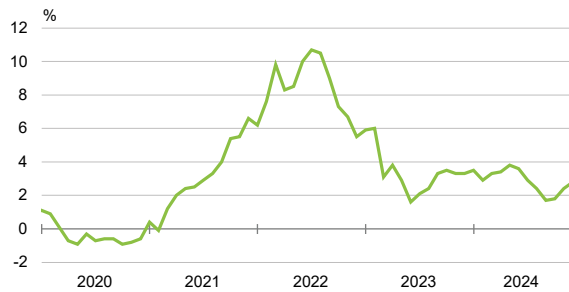
1 Real GDP, seasonally adjusted quarter-on-quarter rate of change (a)



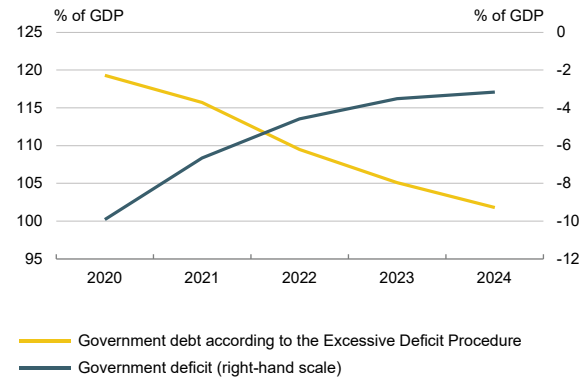
2 Unemployment rate according to the Spanish Labour Force Survey



3 Inflation according to headline HICP (b)



4 Government debt and deficit

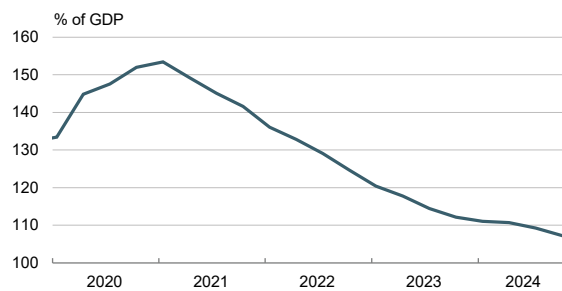


SOURCE: Ministry of Economy, Trade and Business.

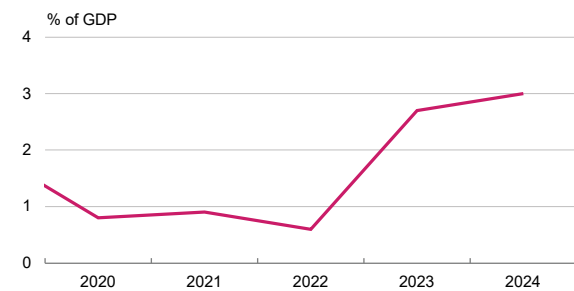
- a Quarterly rate of change.
- b Annual rate of change.

Chart A1.1 Macroeconomic risk (cont'd)

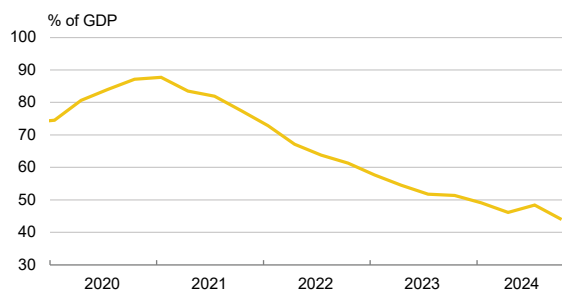
5 Resident private sector debt, consolidated (a)



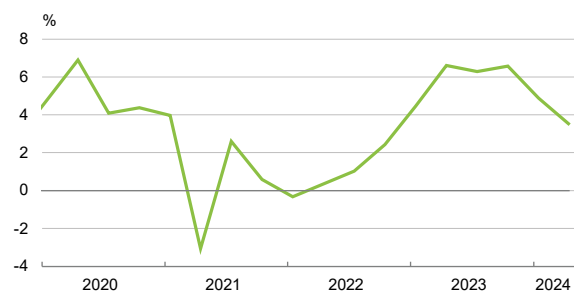
6 Current account balance



7 Negative net international investment position



8 Unit labour costs (b)



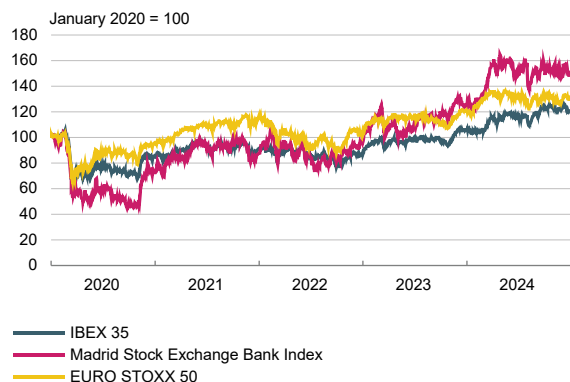
SOURCE: Ministry of Economy, Trade and Business.

a NFCs and households and NPISHs.

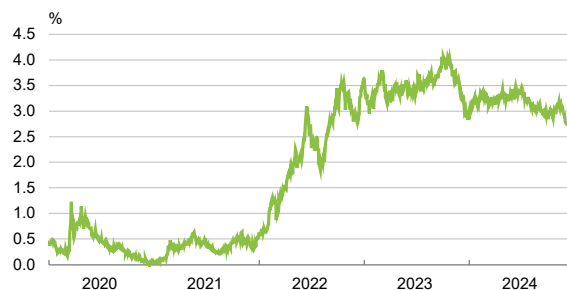
b Annual rate of change.

Chart A1.2 Market risk

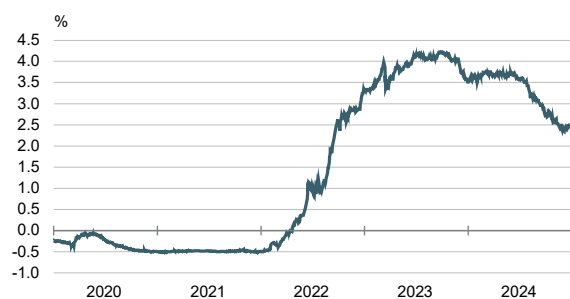
1 Equity markets



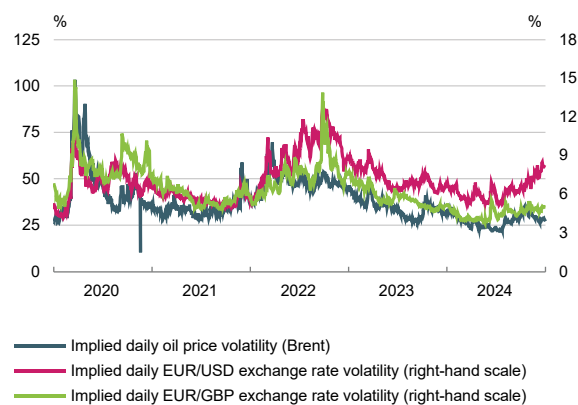
2 Spanish 10-year government bond yield



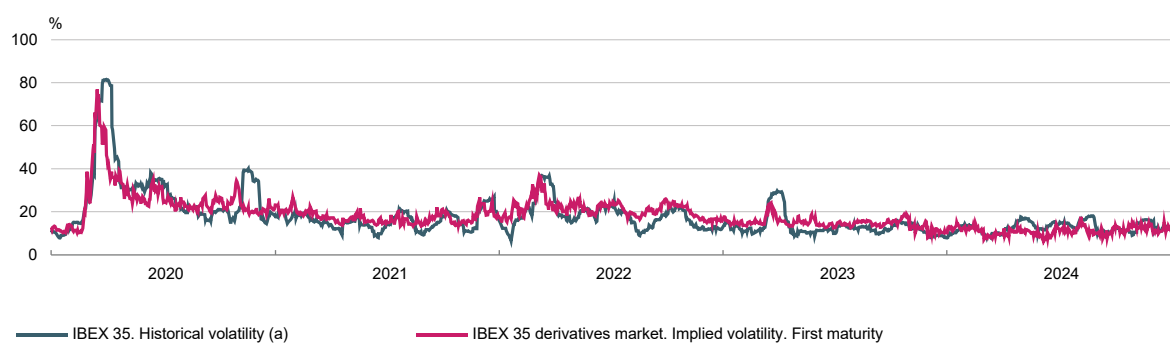
3 12M EURIBOR



4 International market volatility



5 IBEX 35 volatility

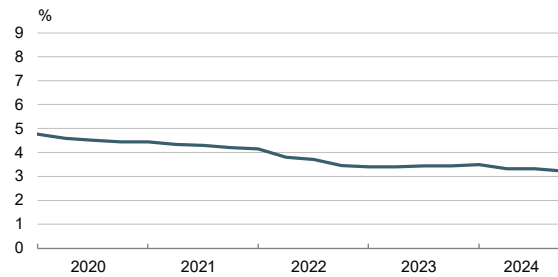


SOURCE: Datastream.

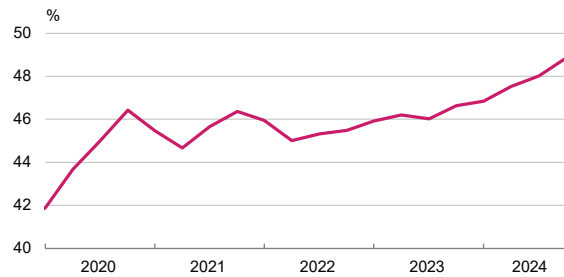
a The historical volatility indicator is calculated as the annualised standard deviation of daily IBEX 35 price changes over 21 days.

Chart A1.3 Credit risk

1 NPL ratio, deposit institutions (a)



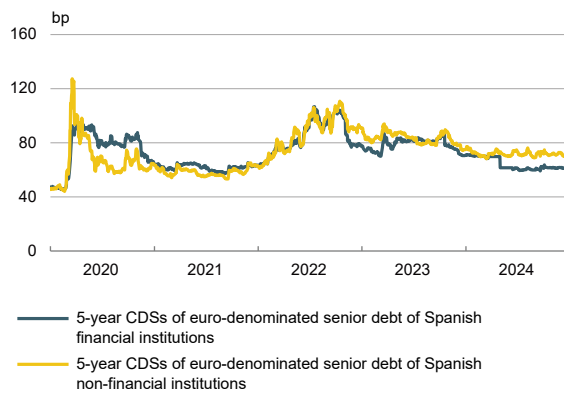
2 Coverage ratio, deposit institutions (a)



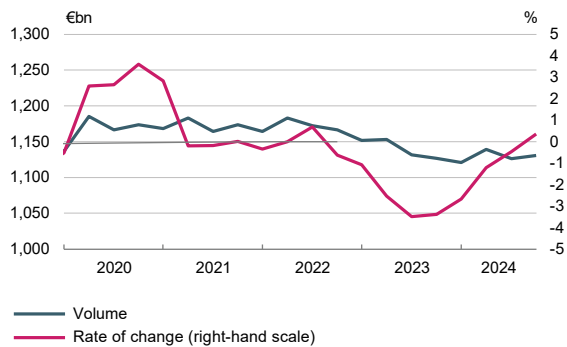
3 Spanish 10-year government bond yield spread over 10-year German Bund



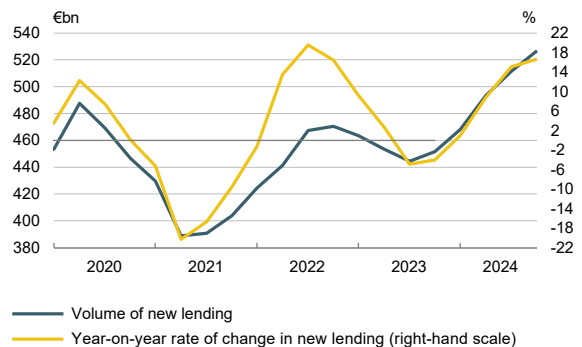
4 CDS indicators (b)



5 Stock of credit to resident private sector (c)



6 New credit to resident private sector (c) (d)

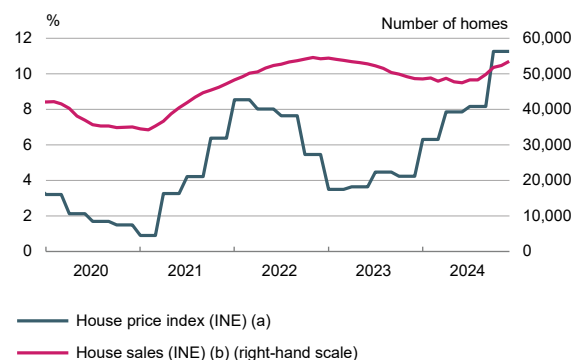


SOURCE: Banco de España.

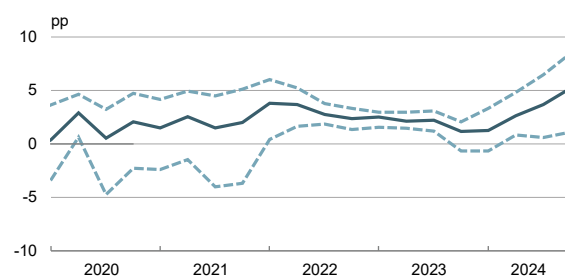
- a Bank-level data, business in Spain.
- b Simple average of a sample of IBEX 35 members.
- c Households and NFCs.
- d Cumulative 12-month flow.

Chart A1.4 Real estate risk

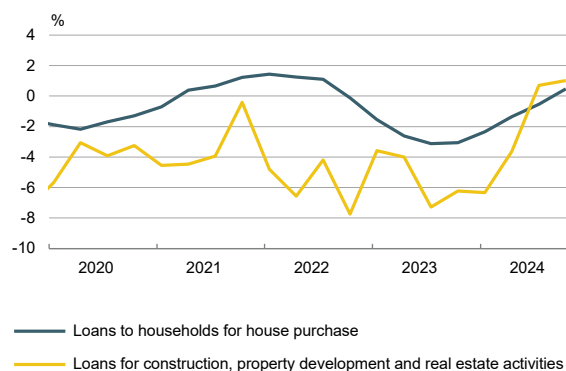
1 Real estate market developments



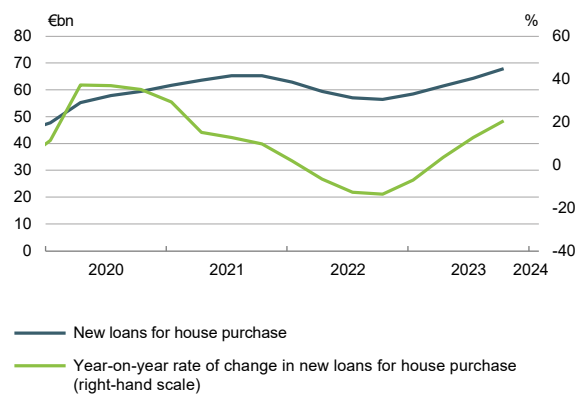
2 House price overvaluation estimates (c)



3 Housing and construction loans (d)



4 New housing loans (e)



SOURCE: Banco de España.

a Annual rate of change.

b 12-month moving average.

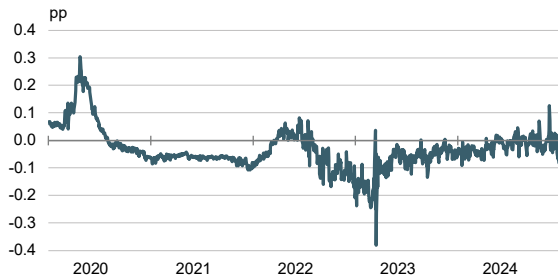
c The solid and broken lines denote, respectively, the average, minimum and maximum values of a set of four indicators for changes in real estate sector prices vis-à-vis their long-term trends: (i) house price gap with respect to the long-term trend calculated using a Hodrick-Prescott filter with a smoothing parameter of 400,000; (ii) house-price-to-disposable income ratio gap with respect to the long-term trend calculated using a Hodrick-Prescott filter with a smoothing parameter of 400,000; (iii) econometric model for house price imbalances explained by long-term trends in disposable income and mortgage rates; and (iv) econometric model for long-term house price imbalances explained by prices in preceding periods, disposable income, new mortgage rates and fiscal variables.

d Year-on-year rate of change.

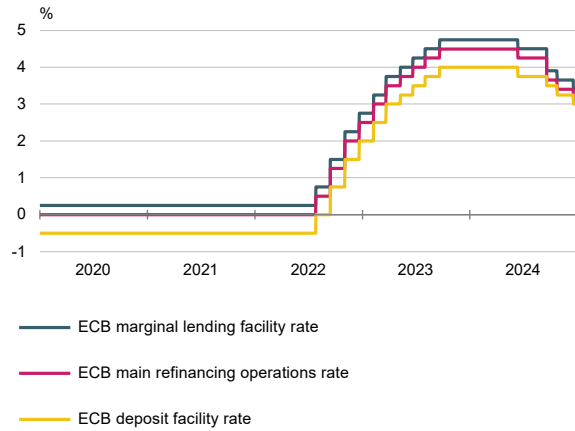
e Cumulative 12-month flow. Including credit to households and NPIs.

Chart A1.5 Liquidity risk and financing

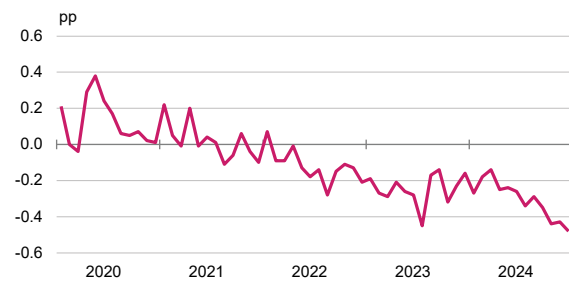
1 3-month LIBOR-OIS spread



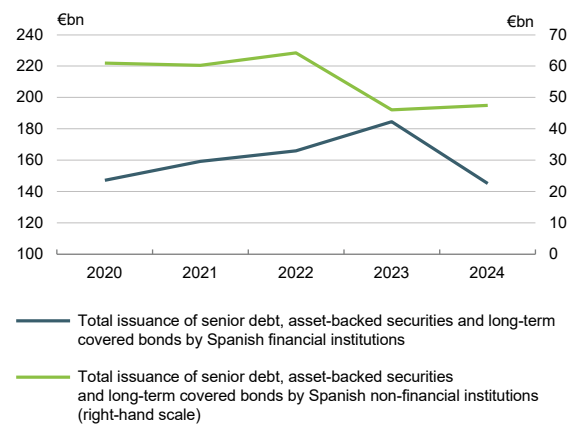
2 Eurosystem monetary policy interest rates



3 Spain's average interest rate spread against the euro area on new loans of up to €1 million extended to firms



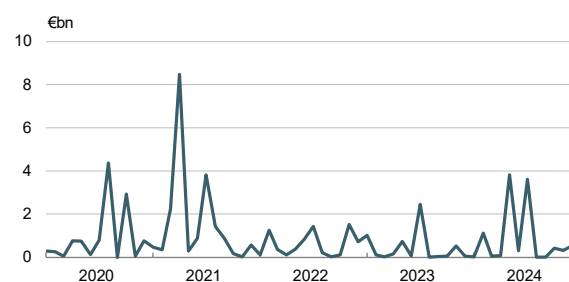
4 Debt security issuances



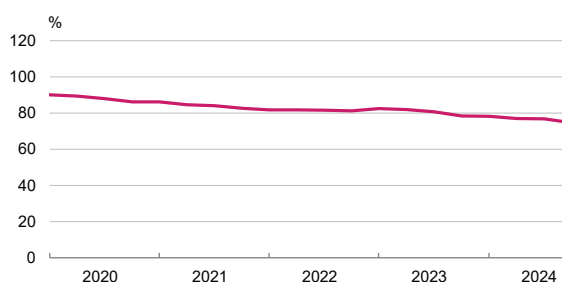
SOURCES: Banco de España, ECB and CNMV.

Chart A1.5 Liquidity risk and financing (cont'd)

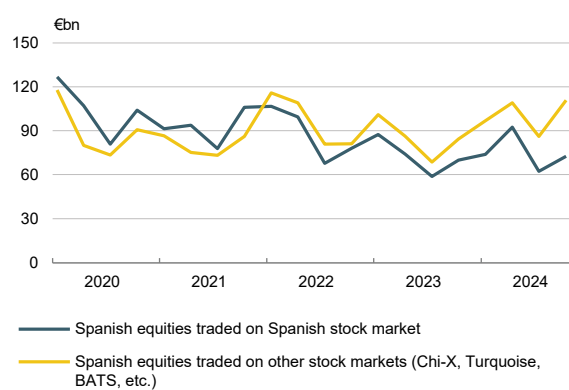
5 Equity issuances by Spanish firms



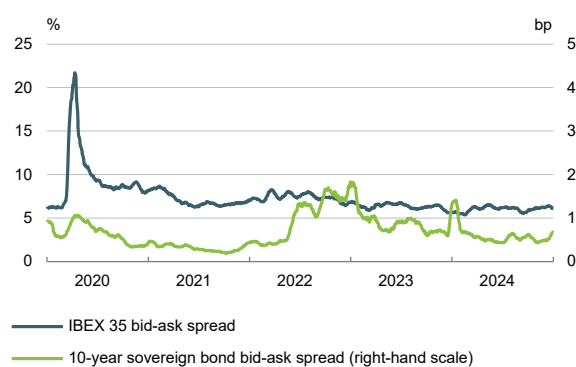
6 Loan-to-deposit ratio, other resident sectors (a)



7 Trading of Spanish equities



8 Bid-ask spreads

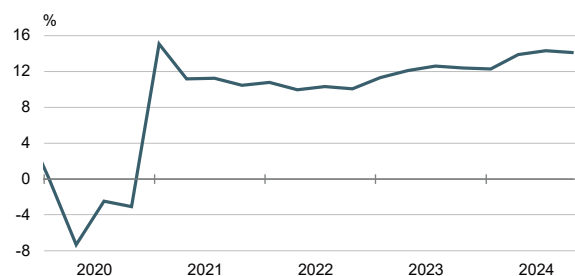


SOURCES: CNMV and Banco de España.

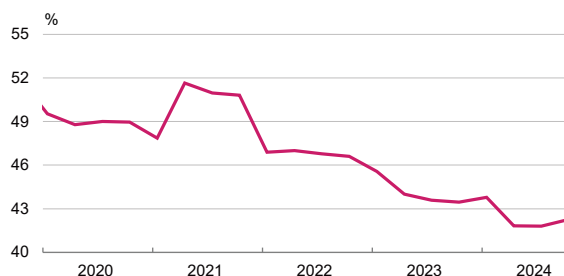
a Households and NFCs.

Chart A1.6 Solvency risk and profitability. Banks. Consolidated data

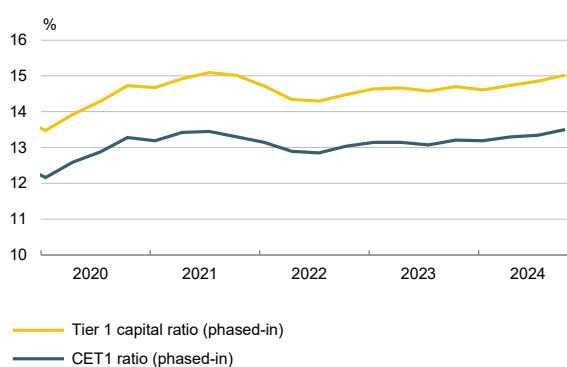
1 ROE (a)



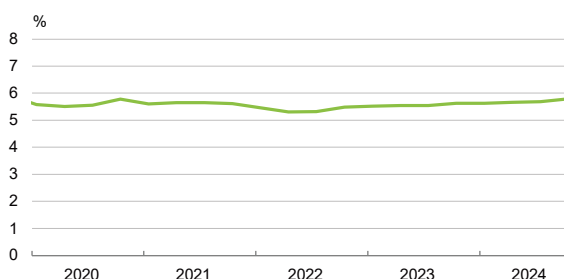
2 Cost/income ratio (b)



3 Capital ratios



4 Leverage ratio (phased-in)



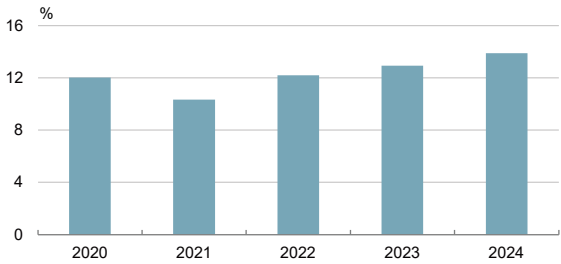
SOURCE: Banco de España.

a Net profit as a percentage of average equity.

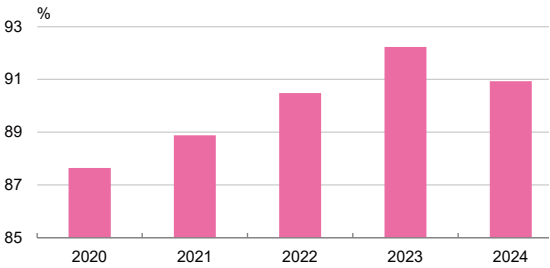
b Operating costs as a percentage of gross income.

Chart A1.6 Solvency risk and profitability. Insurance undertakings (cont'd)

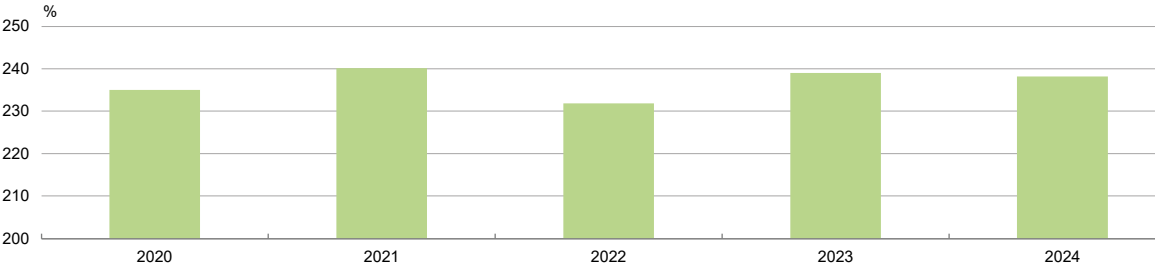
5 ROE



6 Non-life gross combined ratio



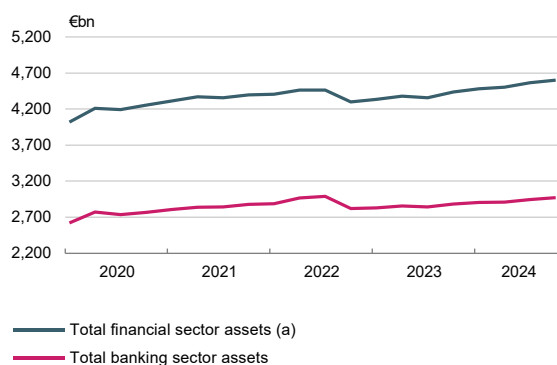
7 Solvency ratio



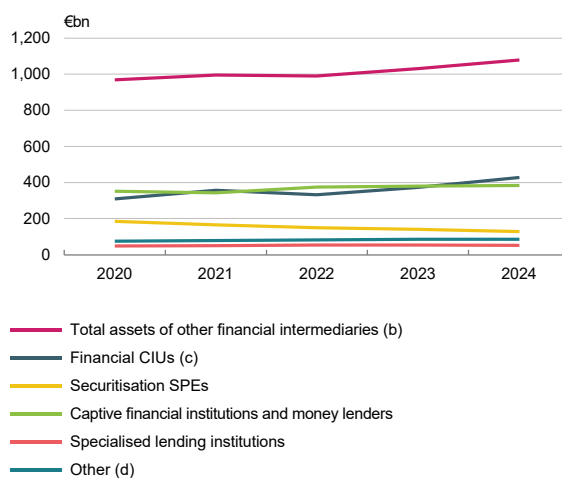
SOURCE: DGSFP.

Chart A1.7 Structural risks and interconnectedness

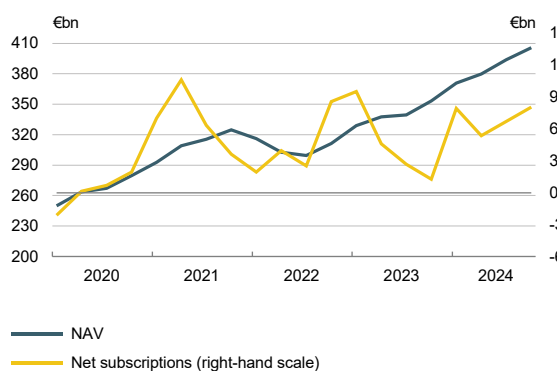
1 Financial sector assets



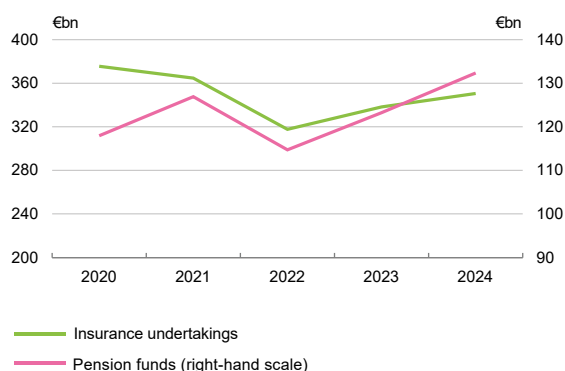
2 Assets of other financial intermediaries



3 Investment funds



4 Assets of insurance undertakings and pension funds



SOURCES: CNMV, DGSFP and Banco de España.

a Including all financial sectors, except for the Banco de España and the ICO.

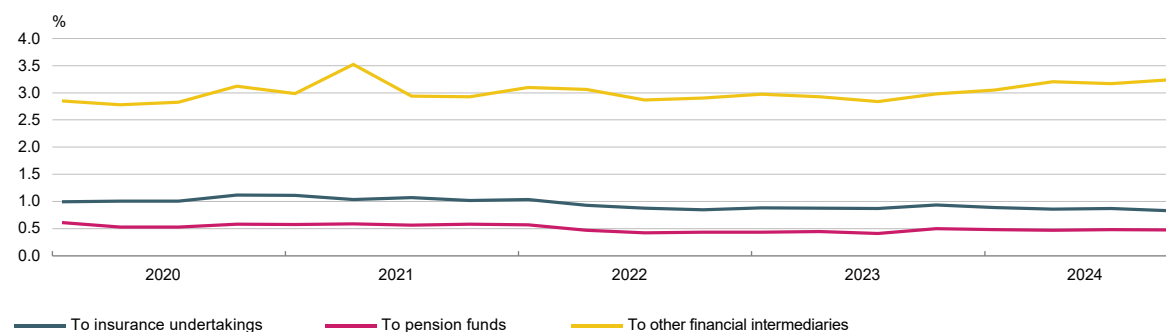
b The 2021 data are provisional.

c Including investment funds (including MMFs), SICAVs and hedge funds.

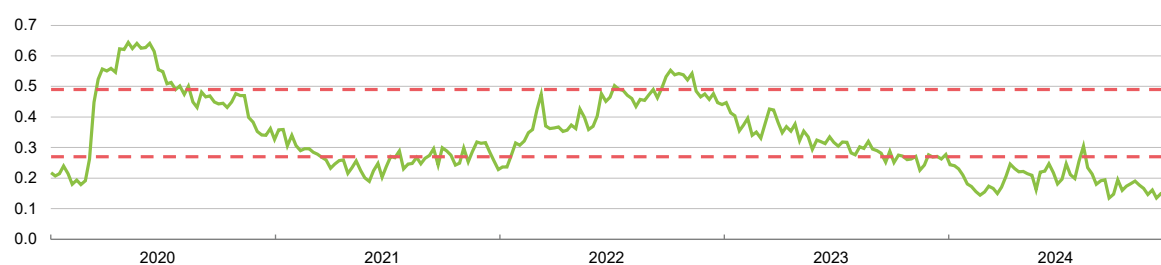
d Sareb's assets are not included here from 2020 due to this institution being reclassified as general government.

Chart A1.7 Structural risks and interconnectedness (cont'd)

5 Banking sector liabilities, by sector (a)



6 Systemic risk indicator (b)



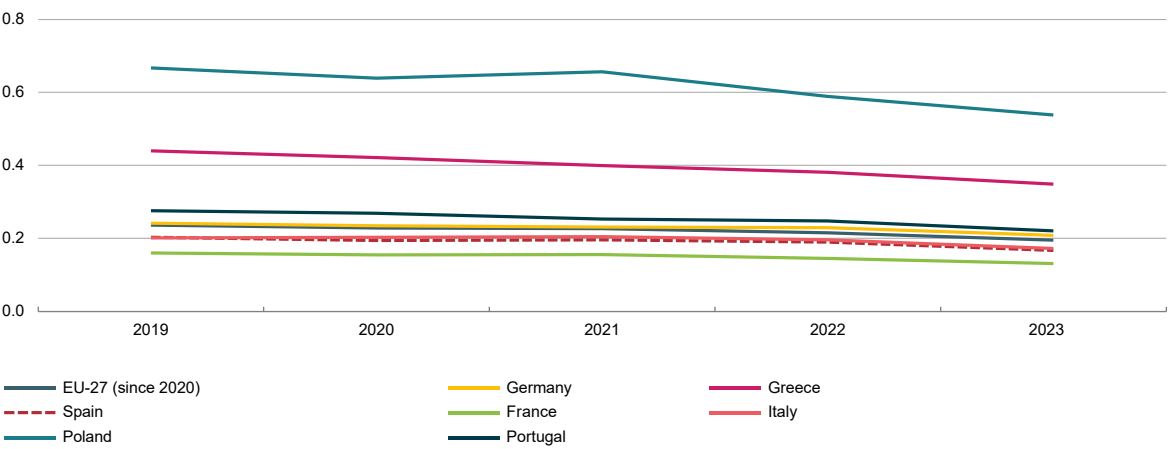
SOURCES: Banco de España and CNMV.

a As a percentage of total banking sector liabilities.

b Stress is measured in six segments of the financial system and is aggregated, to obtain a single figure that factors in the correlation between the segments. The econometric estimates suggest that indicator values below 0.27 denote periods of low stress, values between 0.27 and 0.49 denote periods of medium stress, and values over 0.49 denote periods of high stress. The broken red lines mark the boundaries between the different stress levels (high, medium and low).

Chart A1.8 Other risks

1 Greenhouse gas emission intensity

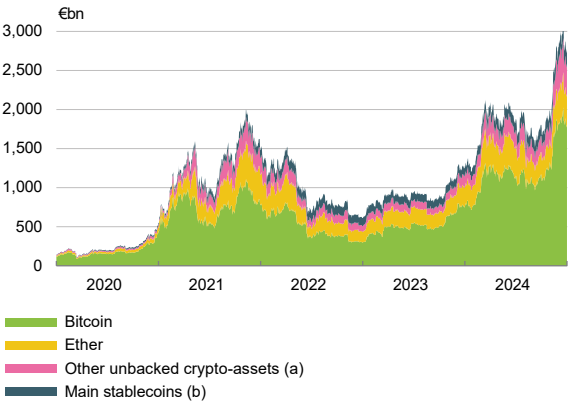


SOURCE: Eurostat.

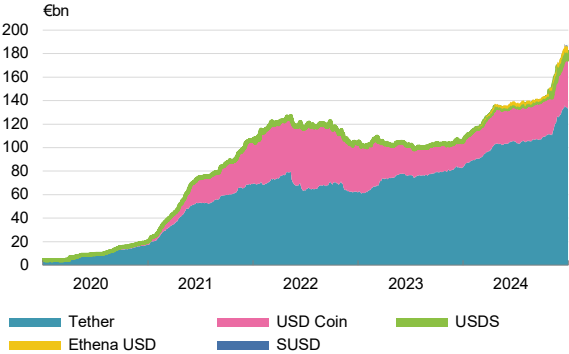
NOTE: Intensity is calculated as greenhouse gas emissions (in thousands of tonnes) as a proportion of real GDP (in € millions).

Chart A1.8 Other risks (cont'd)

2 Global crypto-asset market capitalisation



3 Global market capitalisation of the main stablecoins



SOURCE: CoinGecko.

NOTE: CoinGecko, like other similar websites, is not an official, comparable data source.

a These include the market capitalisation of the top five cryptocurrencies, excluding stablecoins, bitcoin and ether.

b These include the market capitalisation of the top five stablecoins.

Annex 2 Recommendations issued by the ESRB relevant to AMCESFI member institutions and other authorities in Spain

Table A2.1 ESRB recommendations, by authority

ESRB recommendation	Banco de España	CNMV	DGSFP	Government
Recommendation ESRB/2021/17 of 2 December 2021 on a pan-European systemic cyber incident coordination framework for relevant authorities				FC
Recommendation ESRB/2020/6 of 25 May 2020 on liquidity risks arising from margin calls	SE	FC/LC	SE	
Recommendation ESRB/2015/1 of 11 December 2015 on recognising and setting countercyclical buffer rates for exposures to third countries	FC			
Recommendation ESRB/2014/1 of 18 June 2014 on guidance for setting countercyclical buffer rates	FC			
Recommendation ESRB/2012/2 of 20 December 2012 on funding of credit institutions	FC			
Recommendation ESRB/2011/3 of 22 December 2011 on the macro-prudential mandate of national authorities				PC (a)
Recommendation ESRB/2011/2 of 22 December 2011 on US dollar denominated funding of credit institutions	FC			
Recommendation ESRB/2011/1 of 21 September 2011 on lending in foreign currencies	FC			

SOURCES: ESRB and AMCESFI.

NOTE: The shaded cells denote the authorities to which each recommendation is addressed. The recommendations addressed to AMCESFI included in Table 5.1 and recommendations amending previous recommendations have been excluded. The degree of compliance is indicated where an ESRB compliance assessment report is available, as follows: Fully Compliant (FC); Largely Compliant (LC); Partially Compliant (PC); Materially Non-Compliant (MN); Sufficiently Explained (SE); and Insufficiently Explained (IE).

^a When this recommendation was assessed, AMCESFI had not yet been created in Spain and the legislative implementation in this field remained incomplete. Therefore, this classification does not reflect the current degree of compliance with the recommendation.

Annex 3 Key publications by AMCESFI institutions

This annex compiles periodic papers and occasional articles on topics related to the analysis of financial stability and macroprudential policy published by AMCESFI member institutions between July 2024 and June 2025. For publications issued in 2024 H1, see Annex 3 of AMCESFI's *Annual Report 2023*.

Banco de España

Financial Stability Report. Spring 2025

Financial Stability Report. Autumn 2024

Supervision Report 2024

Annual Report 2024

[“Hacia un diccionario panhispánico de sentimiento de la estabilidad financiera”](#)

José Manuel Carbó, Claudia Toledo and Ángel Iván Moreno

Documentos Ocasionales, 2514 (2025)

[“Banks vs. firms: Who benefits from credit guarantees?”](#)

Alberto Martín, Sergio Mayordomo and Victoria Vanasco

Documentos de Trabajo, 2523 (2025)

[“The interaction of liquidity risk and bank solvency via asset monetisation mechanisms”](#)

Alejandro Ferrer and Ana Molina

Documentos Ocasionales, 2509 (2025)

[“¿Influye la eficiencia energética en el precio de la vivienda en España?”](#)

Pana Alves and Olivier Hubert

Documentos Ocasionales, 2508 (2025)

[“Indicadores de desequilibrios de precios del mercado inmobiliario comercial”](#)

Luis Fernández Lafuerza, Irene Roibás and Raquel Vegas Sánchez

Documentos Ocasionales, 2507 (2025)

[“The transmission of macroprudential policy in the tails: Evidence from a narrative approach”](#)

Álvaro Fernández-Gallardo, Simon Lloyd and Ed Manuel

Documentos de Trabajo, 2519 (2025)

“Monetary policy, bank leverage and systemic risk-taking”

Kosuke Aoki, Enric Martorell and Kalin Nikolov

Documentos de Trabajo, 2517 (2025)

“Desertification in Spain: Is there any impact on credit to firms?”

Carmen Broto and Olivier Hubert

Documentos de Trabajo, 2513 (2025)

“Macroprudential policy and the tail risk of credit growth”

Jorge E. Galán

Documentos de Trabajo, 2509 (2025)

“Bank capital requirements and risk-taking: evidence from Basel III”

Rebeca Anguren, Gabriel Jiménez and José-Luis Peydró

Documentos de Trabajo, 2508 (2025)

“A macroeconomic model of banks’ systemic risk taking”

Jorge Abad, David Martínez-Miera and Javier Suárez

Documentos de Trabajo, 2441 (2024)

“Local lending specialization and monetary policy”

Alejandro Casado and David Martínez-Miera

Documentos de Trabajo, 2440 (2024)

“How do changes in financial reporting standards affect relationship lending?”

Daniel Dejuan-Bitria, Wayne R. Landsman, Sergio Mayordomo and Irene Roibás

Documentos de Trabajo, 2437 (2024)

“Bank supervision and non-performing loan cleansing”

Soner Baskaya, José E. Gutiérrez, José María Serena and Serafeim Tsoukas

Documentos de Trabajo, 2428 (2024)

“Bridging the gap? A theoretical analysis of the net effect of FinTech entry on access to credit”

Josep Gisbert and José E. Gutiérrez

Finance Research Letters, Vol. 69, Part A (2024)

“A taxonomy of macro-financial risks and policies to address them”

Mariya Melnychuk and Javier Mencía

Documentos Ocasionales, 2431 (2024)

“Artificial intelligence in the financial system: implications and progress from a central bank perspective”

Iván Balsategui, Sergio Gorjón and José Manuel Marqués

Financial Stability Review, Issue 47, Autumn (2024)

“Asset encumbrance in secured funding operations in the Spanish banking sector”

Esther Cáceres and Jorge San Vicente

Financial Stability Review, Issue 47, Autumn (2024)

“The International Monetary Fund’s Financial Sector Assessment Program in Spain: an overview from a financial stability standpoint”

María Díez Alcoba, Fátima Estacio and Luis Gutiérrez de Rozas

Financial Stability Review, Issue 47, Autumn (2024)

“The impact of the autumn 2024 flash floods in Spain from a financial stability standpoint”

Carlos Pérez Montes (coord.), Javier García Villasur, Luis Gutiérrez de Rozas, Gabriel Jiménez, Nadia Lavín, Alexandra Matyunina and Raquel Vegas

Financial Stability Review, Issue 48, Spring (2025)

“Corporate credit quality during the health crisis and the recent monetary tightening cycle”

Javier Delgado and Eduardo Pérez Asenjo

Financial Stability Review, Issue 48, Spring (2025)

“A map of the Spanish financial system: A tool for analysing interconnectedness and stress transmission channels”

Antonio Sánchez Serrano

Financial Stability Review, Issue 48, Spring (2025)

National Securities Market Commission (CNMV)

Financial Stability Note No 26. June 2024

Financial Stability Note No 27. December 2024

Informe anual sobre los mercados de valores y su actuación 2024

Non-bank financial intermediation in Spain. Financial year 2023

“Private finance markets”

Francisco Javier González Pueyo and María José Pérez-Santamarina Atiénzar
Working Paper No 88 (2025)

“Fragmentation, price formation and liquidity of Spanish equities in a European context”

Queremón Riba Meseguer and María Isabel Cambón Murcia
Working Paper No 87 (2024)

“Insider Trading in Connected Firms during Trading Bans”

Marc Goergen, Luc Renneboog and Yang Zhao

Working Paper No 86 (2024)

“The role of stock markets in Mario Draghi’s new European industrial strategy”

Víctor Rodríguez Quejido and Helena Huerta de Fernando

CNMV Bulletin. November 2024

“Derivative contracts in Spain and their contribution to systemic risk: Risk indicators based on the EMIR database”

Ramiro Losada and Guillermo Cambroneró

CNMV Bulletin. November 2024

Ministry of Economy, Trade and Business

Directorate General of Insurance and Pension Funds (DGSFP)

Seguros y Fondos de Pensiones. Informe 2023

Glossary

€STR	Euro short-term rate
AI	Artificial intelligence
AIAF	Spanish benchmark fixed income market for government and corporate bonds (<i>Mercado de referencia de renta fija en España para valor de deuda pública y corporativa</i>)
AMCESFI	Spanish macroprudential authority
APP	Asset Purchase Programme
AT1	Additional Tier 1
ATA	Average total assets
bn	Billion
bp	Basis points
CCP	Central counterparty
CCS	Insurance Compensation Consortium (<i>Consortio de Compensación de Seguros</i>)
CCyB	Countercyclical capital buffer
CDS	Credit default swap
CET1	Common Equity Tier 1
CIU	Collective investment undertaking
CNMV	Spanish National Securities Market Commission (<i>Comisión Nacional del Mercado de Valores</i>)
COVID-19	Coronavirus disease 2019
CPI	Consumer price index
CSDDD	Corporate Sustainability Due Diligence Directive
CSDR	Central Securities Depositories Regulation
CSRD	Corporate Sustainability Reporting Directive
DGSFP	Directorate General of Insurance and Pension Funds (<i>Dirección General de Seguros y Fondos de Pensiones</i>)
DORA	Digital Operational Resilience Act
EBA	European Banking Authority
ECB	European Central Bank
EIOPA	European Insurance and Occupational Pensions Authority
EMIR	European Market Infrastructure Regulation
ES	Spain
ESG	Environmental, social and governance
ESMA	European Securities and Markets Authority
ESRB	European Systemic Risk Board
EU	European Union
EUR	Euro
EURO STOXX 50	Stock market index that represents the performance of the 50 largest euro area firms by capitalisation
EU-SCICF	Pan-European Systemic Cyber Incident Coordination Framework

FROB	Spanish executive resolution authority (<i>Fondo de Reestructuración Ordenada Bancaria</i>)
FSAP	Financial Sector Assessment Program
FSB	Financial Stability Board
FSTC	Financial Stability Technical Committee (AMCESFI)
GBP	Pound sterling
GDP	Gross domestic product
G-SII	Global systemically important institution
H	Half
HICP	Harmonised index of consumer prices
HQLA	High-quality liquid assets
IBEX 35	Main benchmark index of the Spanish stock market
ICO	Official Credit Institute (<i>Instituto de Crédito Oficial</i>)
IMF	International Monetary Fund
INE	National Statistics Institute (<i>Instituto Nacional de Estadística</i>)
IOSCO	International Organization of Securities Commissions
IRB	Internal ratings-based
IRRD	Insurance Recovery and Resolution Directive
LCR	Liquidity coverage ratio
LEI	Legal Entity Identifier
MARF	Spanish alternative fixed income market (<i>Mercado Alternativo de Renta Fija</i>)
MINECO	Ministry of Economy, Trade and Business (<i>Ministerio de Economía, Comercio y Empresa</i>)
MMF	Money market fund
NAV	Net asset value
NBFI	Non-bank financial intermediation
NBFIs	Non-bank financial intermediaries
NFCs	Non-financial corporations
NPIs	Non-profit institutions
NPISHs	Non-profit institutions serving households
NR	Not rated
NSFR	Net stable funding ratio
OEF	Open-ended fund
OIS	Overnight index swap
O-SII	Other systemically important institution
PEPP	Pandemic Emergency Purchase Programme
pp	Percentage points
PTI	Post-trade Interface
Q	Quarter
Repo	Repurchase agreement
ROA	Return on assets
ROE	Return on equity
RTS	Regulatory Technical Standards
RWA	Risk-weighted assets

Sareb	Asset management company for assets arising from bank restructuring (<i>Sociedad de Gestión de Activos Procedentes de la Reestructuración Bancaria</i>)
SCR	Solvency Capital Requirements
Sepblac	Executive Service of the Commission for the Prevention of Money Laundering and Monetary Offences (<i>Servicio Ejecutivo de la Comisión de Prevención del Blanqueo de Capitales e Infracciones Monetarias</i>)
SGTFI	General Secretariat of the Treasury and International Financing (<i>Secretaría General del Tesoro y Financiación Internacional</i>)
SICAV	Open-end investment company (<i>Sociedad de inversión de capital variable</i>)
SME	Small and medium-sized enterprise
SPE	Special purpose entity
SSM	Single Supervisory Mechanism
SyRB	Systemic risk buffer
TLTRO	Targeted longer-term refinancing operations
UCITS	Undertakings for Collective Investment in Transferable Securities
USD	US dollar

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