

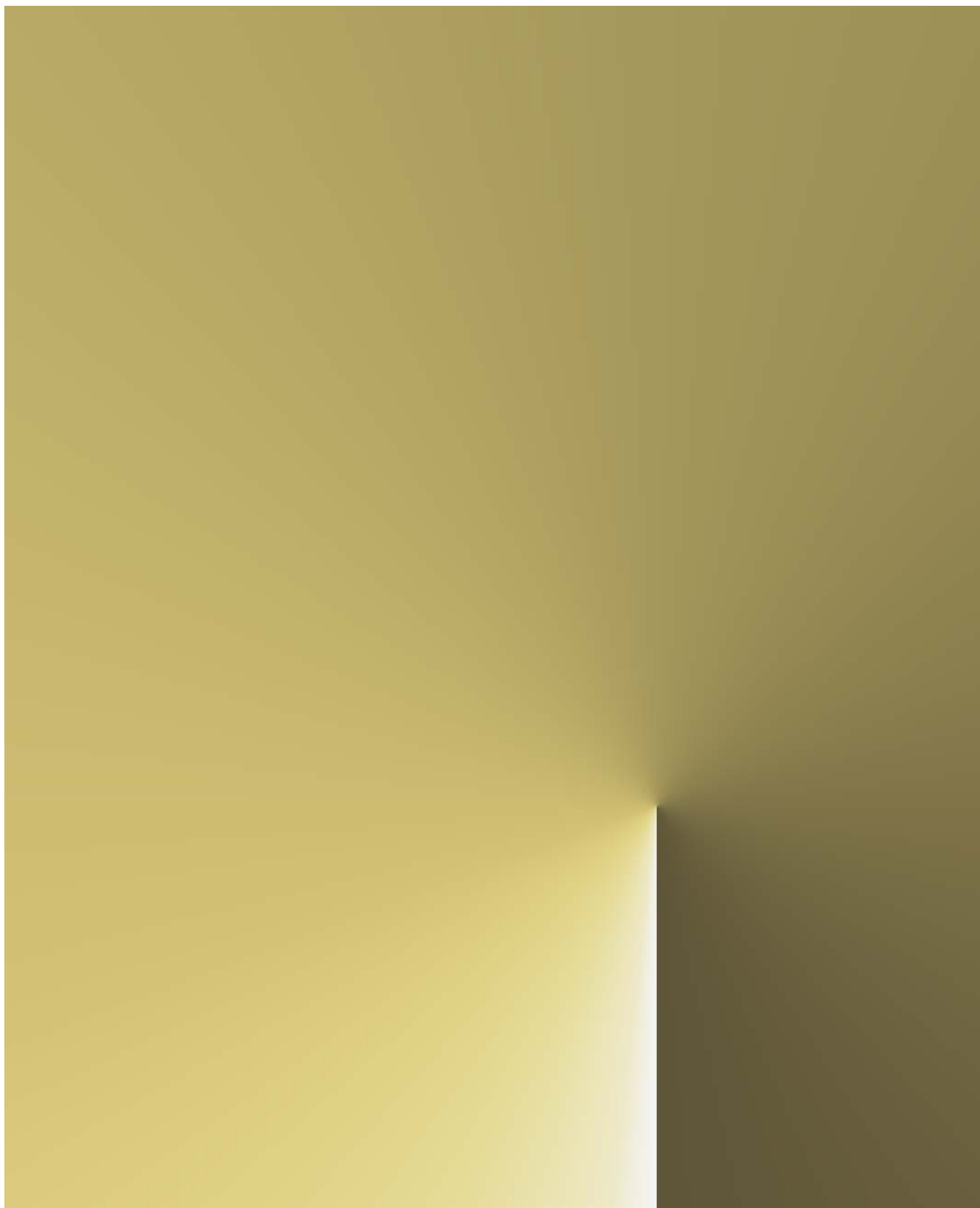


FINANSTILSYNET

THE FINANCIAL SUPERVISORY
AUTHORITY OF NORWAY

RISK OUTLOOK

DECEMBER 2023



Risk Outlook

Financial stability and well-functioning markets are vital in ensuring confidence in the financial system, efficient use of society's resources and protection of consumers and other market participants. The financial system should be able to cope with disruptions and unexpected negative events while carrying out its functions, thus preventing an economic downturn from becoming self-reinforcing. This requires sound and liquid financial institutions with good internal management and control.

The Risk Outlook report summarises Finanstilsynet's analyses and assessments of the stability of the Norwegian financial system. The report builds on Finanstilsynet's ongoing supervision of institutions and markets and provides an important basis for its work. The report is published twice a year, in June and December.

Developments in financial institutions and financial markets are discussed in more detail in the following reports from Finanstilsynet:

- [Residential mortgage lending survey](#) (in Norwegian only)
- [Financial institutions' use of flexibility quotas in the lending regulations](#) (in Norwegian only)
- [Report on financial institutions' performance](#) (in Norwegian only)
- [Solvency reports for financial institutions](#) (in Norwegian only)
- [Report on bank' losses and non-performing loans](#) (in Norwegian only)
- [Report on developments in consumer loans](#) (in Norwegian only)
- [Report on alternative investment funds](#) (in Norwegian only)
- [Risk and vulnerability analysis for ICT security in the financial sector](#)

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Cut-off date: 6 December 2023

Data in the charts updated as of 1 December 2023

SUMMARY

In Norway and several other countries, economic activity has remained relatively high through 2023, and unemployment is still low. This is reflected in low loan losses in the banks. Combined with an increase in net interest income, the low losses have contributed to high profits for the banks. The higher interest rate level has also improved life insurers' solvency position.

Key forecasters expect a gradual slowdown in economic activity, a further decline in inflation and moderately higher unemployment in the period ahead. The interest rate level is expected to remain higher than the very low level prior to the interest rate hikes. Such developments will probably result in a slight increase in loan losses and lower net interest income for Norwegian banks, but no serious disruptions to the financial system. A higher interest rate level will also reduce the risk of a further build-up of financial imbalances. If developments turn out to be in line with the forecasts, the Norwegian economy will have fared well through the serious disruptions of recent years.

Future developments are highly uncertain. Owing to many years of low interest rates and ample access to credit, the debt burden of households and non-financial corporations has increased both in Norway and internationally, as has the debt burden of central and local government in a number of countries. This has resulted in vulnerabilities in the economies and a greater risk of financial instability. Even if inflation declines and approaches the central banks' inflation targets, interest rates may remain at the current level for a long period or may have to be raised further. There is a risk of an economic downturn combined with persistently high inflation, so-called stagflation. The uncertainty is exacerbated by geopolitical tensions.

Experience from Norway and other countries shows that crises in the financial system can occur suddenly and spread rapidly among market participants, both nationally and internationally. An international downturn could lead to financial market turbulence and increase the risk of financial instability, also in Norway. Norwegian banks and insurers could thus be severely affected.

In September 2023, the three European Supervisory Authorities [EBA, EIOPA and ESMA](#) warned of continued high economic uncertainty and advised financial institutions and national financial supervisory authorities to be vigilant to the risk of financial instability. In autumn 2022, [the European Systemic Risk Board \(ESRB\)](#) also warned of increased vulnerabilities in the financial system and urged public authorities to preserve or enhance the resilience of the financial sector. [This message](#) was repeated in November 2023.

High debt in Norwegian households and elevated residential and commercial property prices are the key vulnerabilities in the Norwegian financial system.

Norwegian households have high debt relative to income. Lower credit growth and higher nominal income growth have contributed to a certain reduction in the debt burden over the past year. Finanstilsynet's residential mortgage lending survey from autumn 2023 also shows a decline in the average debt-to-income (DTI) ratio of borrowers who took out new debt and a reduction in the share of loans granted to borrowers with high DTI ratios. Norwegian households nevertheless have the highest debt burden in the OECD area, and many borrowers have high total debt. Households' interest burden has increased significantly. Many households with high debt are vulnerable to a further rise in interest rates, loss of income or declining house prices.

The banks assess that household credit risk has risen. So far, there are few signs of serious debt servicing problems among households. Household saving was high during the Covid-19 pandemic, and the labour market has so far held up well. Higher policy rates also feed through to households' borrowing rates, subject to a lag. A number of households have scaled down consumption. Households' demand may

decline, and their debt servicing capacity may be further impaired in the coming period, especially if economic developments prove to be weaker or interest rates higher than expected.

There has been strong growth in **house prices in Norway** over a protracted period. Although the rate of growth has slowed, prices are at a high level relative to households' disposable income. Experience from Norway and other countries shows that periods of rapid house price growth may be succeeded by a sharp drop in prices which amplifies and prolongs an economic downturn. The risk of such a development is greater if interest rates have to be kept high for longer than expected or be further increased. Lower house prices reduce banks' collateral values.

Non-financial corporations in a number of main industries showed a weaker performance in 2022. For most non-financial corporations, interest expenses increased considerably parallel to a rise in prices of important input factors. Reduced demand and asset write-downs were other factors behind the weaker profits in some industries. Thus far in 2023, the number of corporate bankruptcies has been far higher than during the same period last year, although the level is still not higher than in the years prior to the Covid-19 pandemic. Some industries, such as the construction industry, are particularly hard hit. Lower household demand may amplify the challenges facing non-financial corporations and contribute to higher loan losses among banks.

Higher interest rates have led to a fall in the value of commercial properties and reduced earnings in commercial real estate (CRE) companies. A number of these companies have high debt, and a substantial share of their debt matures and must be refinanced in the coming years. The share of debt in CRE companies with weak interest servicing capacity has increased markedly, measured as a share of the industry's total debt. If interest rates remain high, the share of high-risk debt may increase further and elevate banks' credit risk.

Several of the largest CRE companies have written down the value of their real estate portfolios over the past year. The pricing of CRE companies in the stock market may indicate that market participants expect further write-downs.

Equity capital is crucial for **banks'** risk-bearing capacity and their ability to extend new loans to creditworthy customers during economic downturns. During severe downturns, banks in Norway and internationally have recorded substantial losses on loans, including loans secured on commercial real estate. If large losses were to occur and it becomes necessary to draw on capital buffers, experience shows that banks can rapidly lose market confidence and experience liquidity problems. Norwegian banks should therefore meet regulatory requirements by an ample margin.

Due to their high level of profitability, Norwegian banks are in a good position to increase their capital adequacy ratios. This will improve the banks' capacity to provide loans to creditworthy customers in periods of higher loan losses. Finanstilsynet expects Norwegian banks to thoroughly assess the risk in their loan portfolios and the need for impairment losses, and to apply caution with respect to dividend payments and share buybacks. [The European Supervisory Authorities](#) have expressed a similar expectation with respect to banks in the EEA.

Sound competition between providers of banking services in Norway is a prerequisite for a well-functioning market and efficient capital allocation. In light of the interest rates increases and the banks' level of profitability, Finanstilsynet has been commissioned by the Ministry of Finance to assess the competitive situation in the Norwegian banking market.

Norwegian insurers and pension funds meet prevailing solvency capital requirements. The fall in CRE prices and weaker earnings in CRE companies have a particularly negative impact on Norwegian life insurers. Overall, life insurers have a higher exposure to real estate than corresponding undertakings in

most other European countries. A number of undertakings recorded losses on their real estate portfolios in the third quarter, and a further decline in real estate values will reduce their capital buffers. For non-life insurers, more extreme weather coupled with a more challenging reinsurance market entail weaker earnings prospects and heightened risk in the coming period.

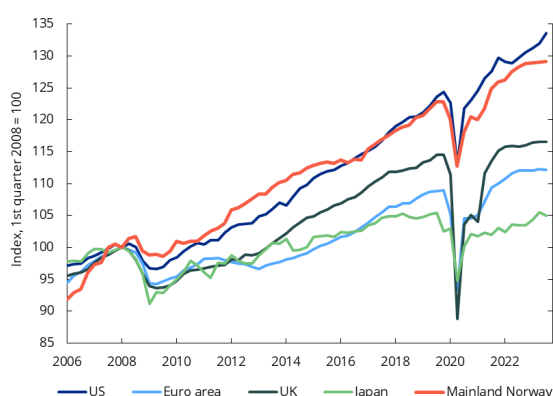
ECONOMIC DEVELOPMENTS

ECONOMIC GROWTH SOMEWHAT SUBDUED, INFLATION STILL HIGH

Globally, economic growth has slowed somewhat in 2023 compared with last year, but the slowdown has been less pronounced than assumed by key forecasters when the Risk Outlook report was published in June 2023. Most noticeably, growth has remained higher than expected in the US, while it has clearly levelled off in several European countries (chart 1). Economic growth in China has been weaker than expected, with a particularly sharp slowdown in the property sector.

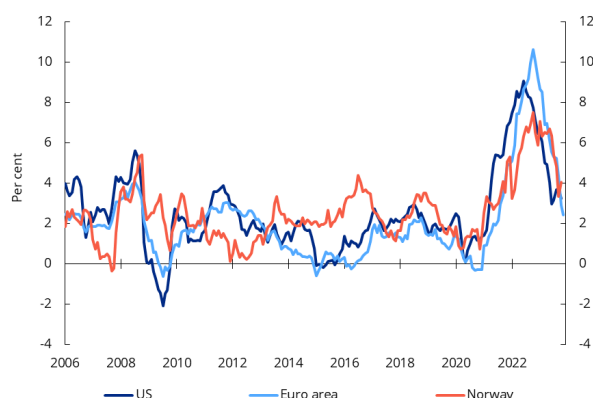
Annual consumer price inflation has fallen to a level well below its peak, but inflation is still above central banks' inflation targets (chart 2). Underlying consumer price inflation has remained high in many countries.

Chart 1 Gross domestic product



Indices. Last observation: third quarter 2023. Source: Refinitiv

Chart 2 Inflation



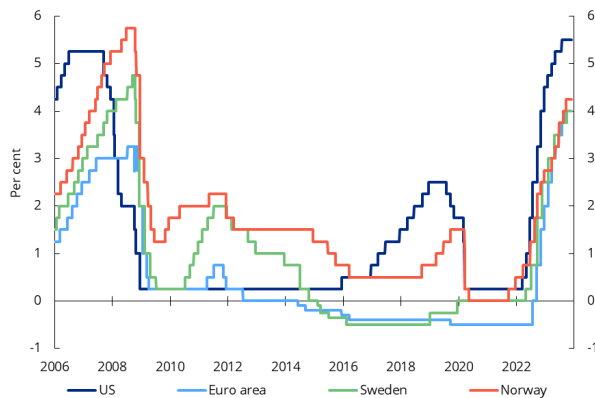
Last observation: October 2023 for the US and Norway and November 2023 for the euro area. Source: Refinitiv

In order to curb inflationary pressures, central banks in several countries have raised their policy rates (chart 3). In a number of countries, interest rate expectations have been revised upward several times over the past year, and overall, yields on bonds with long maturities have risen considerably in 2023 (chart 4).

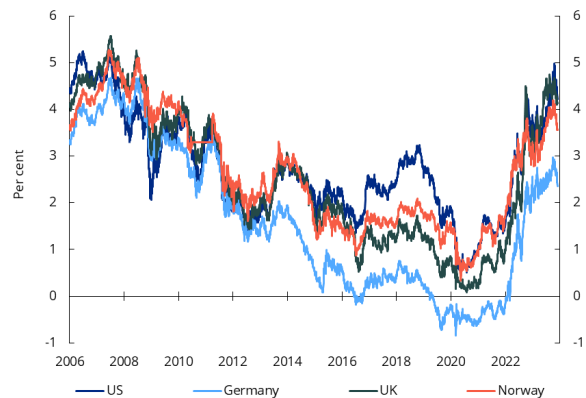
According to its October forecast, the IMF expects the high interest rate level to put a damper on economic growth this year and the next. The IMF considers the likelihood of a 'soft landing', where inflation gradually declines without a substantial reduction in economic activity or an increase in unemployment, to be greater than when its previous forecast was published in July. Global GDP growth is projected to slow from 3.5 per cent in 2022 to around 3.0 per cent in 2023 and 2024.

Global inflation is forecast to decline from 8.7 per cent in 2022 to 6.9 per cent in 2023 and further to 5.8 per cent in 2024. The inflation projections for 2024 have been revised up from previous forecasts, partly as a result of still-tight labour markets and persistently high service inflation. The IMF assesses that inflation in most countries will probably not approach the inflation targets until 2025. Several central banks and forecasters have indicated that inflation and interest rates may remain high for yet some time.

If underlying inflation, which is still high in a number of countries, remains elevated, interest rates may be maintained at the current level for a long period or have to be raised further. In such a scenario, there will be considerable risk associated with how players in the financial system, including borrowers, will be able to cope with the high interest rate level. If unemployment were to rise, it will affect households' ability to keep up consumption as well as their debt-servicing capacity. An international downturn could lead to financial market turbulence and a fall in the value of equities, bonds and real estate. This will also affect the Norwegian economy and the Norwegian financial system.

Chart 3 Policy rates

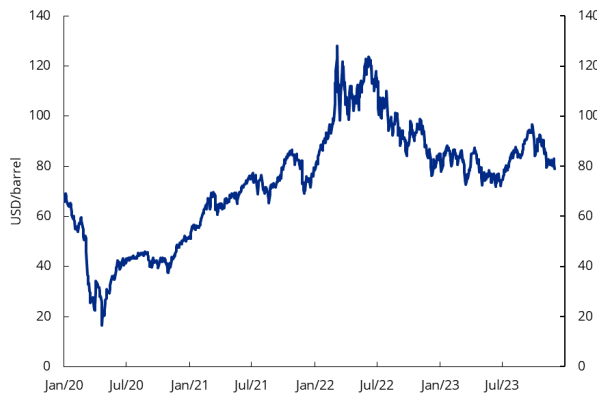
For the US, the upper limit in the target interval is shown. For the euro area, the deposit rate is shown, which is the lowest of the three official policy rates. Source: Refinitiv

Chart 4 10-year government bond yields

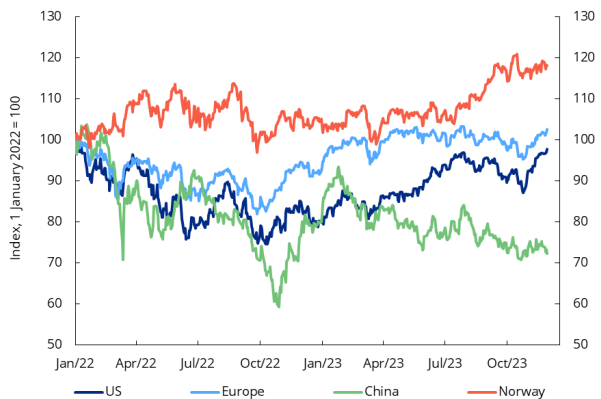
Source: Refinitiv

Growth projections for mainland Norway GDP from [Norges Bank](#), [Statistics Norway](#) and the [Ministry of Finance](#) range between 0.6 and 1.3 per cent for 2023, which is a significant reduction from the 3.8 per cent growth rate in 2022. Growth estimates for 2024 range between 0.3 and 1.7 per cent. Consumer prices are expected to rise by between 5.8 and 6.0 per cent in 2023, while consumer price inflation is expected to range between 3.8 and 4.8 per cent in 2024. Through 2023, there has been a major upward revision of inflation projections for 2024.

Oil prices rose considerably throughout the summer and early autumn but have since fallen back somewhat (chart 5). The war in the Middle East and the extension of production cuts by Russia and Saudi Arabia contribute to tightening the supply side in the oil market. European gas prices have also risen sharply, and market participants are concerned about the vulnerability of the European energy infrastructure following suspected sabotage against a gas pipeline between Finland and Estonia this autumn.

Chart 5 Oil price, USD/barrel, Brent spot

Source: Refinitiv

Chart 6 Equities, total return

MSCI indices. Source: Refinitiv

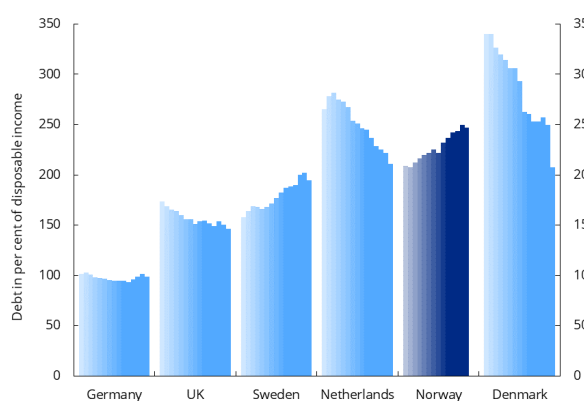
Important international stock indices showed a weak trend in late summer and much of autumn but rose again in November (chart 6). For the year as a whole, several stock indices have performed well, including in the US markets. Oslo Børs has shown a relatively strong trend, which is mainly attributable to a sharp rise in prices of equities issued by companies in the energy and shipping industries.

HOUSEHOLDS

NORWEGIAN HOUSEHOLDS ARE VULNERABLE TO HIGHER INTEREST RATES

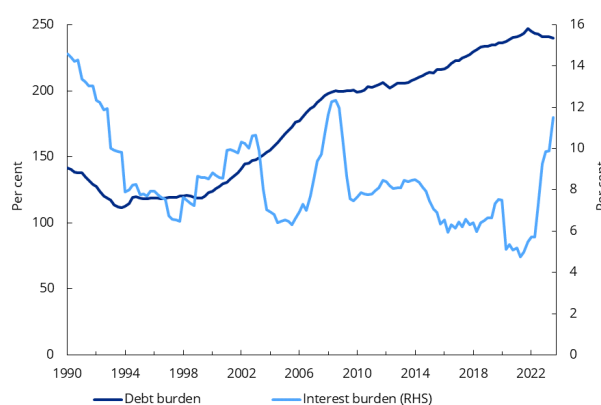
The debt burden¹ of Norwegian households is high, both in historical terms and compared with other OECD countries. While households in some countries reduced their debt burden in the wake of the international financial crisis in 2008–2009, the household debt burden in Norway continued to rise (chart 7). Since the late 1990s, the debt burden of Norwegian households has risen markedly but has declined somewhat since year-end 2021 (chart 8). The reduction is due to somewhat lower credit growth and a strong increase in households' nominal income during a period of high inflation. At end-September 2023, households' average debt burden was approximately 240 per cent.

Chart 7 Household debt burden in selected countries 2008–2022



The last observation for Norway is 2021. Source: OECD

Chart 8 Household debt burden and interest burden



Last observation: third quarter 2023. Sources: Statistics Norway and Finanstilsynet

While credit growth has slowed and the debt burden has stabilised, households' interest burden² has increased. From the second quarter of 2021 to the third quarter of 2023, households' average interest burden rose from a historically low level of 4.8 per cent to 11.5 per cent. According to Statistics Norway, banks' and mortgage companies' average lending rates to households rose by close to 0.2 percentage points from September to October, which will add to the interest burden.

Only a small proportion of Norwegian household debt carries fixed interest rates. At the end of the third quarter of 2023, 95.7 per cent of households' loans from banks, mortgage companies, finance companies and state lending institutions (excluding the Norwegian Public Service Pension Fund) had no or short fixed-rate periods (up to three months). Rising interest rates thus quickly lead to higher interest expenses for households.

In [Risk Outlook June 2023](#), the effect of higher interest rates on the interest burden of different household groups was illustrated by an example based on this year's stress test of banks' capital adequacy. If interest rates follow the path outlined in the baseline scenario, the average interest burden for households combined will increase from 5 per cent in 2021 to 11 per cent in 2024, while it will rise to 16 per cent in the stress scenario. For households with debt greater than five times after-tax income, the average interest burden is estimated to have increased from 12 per cent in 2021 to 17 per cent in 2022. In the baseline scenario, the interest burden for this group increases further to 26 per cent in 2023 and 2024, while in

¹ Measured as debt in per cent of disposable income.

² Measured as interest expenses in per cent of disposable income before deducting interest expenses.

the stress scenario, it increases to 35 per cent in 2024, i.e. 9 percentage points higher than in the baseline scenario. In 2021, the group of households with debt exceeding five times after-tax income encompassed 12 per cent of Norwegian households and accounted for 33 per cent of total household debt.

The share of households with a high debt burden and the share of total household debt held by households with high debt-to-income (DTI) ratios increased markedly from 2000 to 2020. There are signs that this trend has now been reversed. [Finanstilsynet's residential mortgage lending survey](#) (in Norwegian only) shows a clear reduction in the average DTI ratio (total debt in per cent of gross annual income) for borrowers who take out new residential mortgages. The share of new residential mortgages taken out by borrowers with a DTI ratio above 4 was also down in this year's survey.

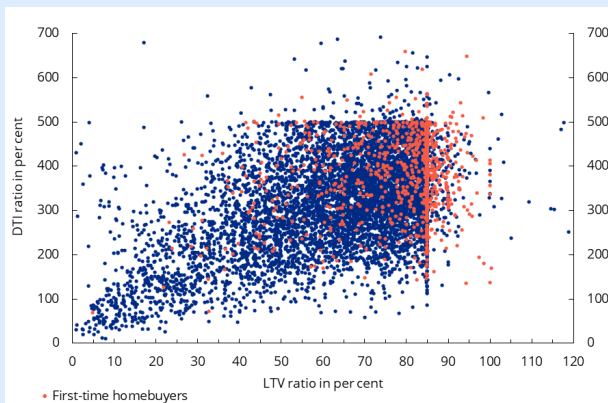
Lending Regulations

The Lending Regulations set requirements for financial institutions' lending practices for residential mortgages and consumer loans and, from 1 July 2023, also for loans to consumers secured on assets other than residential property, e.g. cars and boats. The purpose is to prevent financial vulnerabilities among households and financial institutions.

Financial institutions shall not grant a loan if the borrower's total debt will exceed five times annual income, nor grant instalment loans secured on residential property if the borrower's loan-to-value (LTV) ratio will exceed 85 per cent. The banks must also ensure that borrowers have sufficient debt servicing capacity to meet normal living expenses after a 3 percentage point interest rate increase (and an interest rate of minimum 7 per cent). The regulations also require borrowers to pay instalments on residential mortgages with an LTV ratio above 60 per cent and on all consumer loans. Moreover, the regulations allow banks to deviate from the requirements for a certain share of lending volume (flexibility quota).

Experience gained after the introduction of the Lending Regulations indicates that it has contributed to reducing borrowing among highly indebted households. Among other things, there is an accumulation of borrowers taking out new residential mortgages with an LTV ratio and/or a DTI ratio just below the regulatory requirements (chart 9). The chart also shows that banks make use of the flexibility quota by allowing some loans to exceed the limits in the regulations.

Chart 9 New instalment loans secured on residential property by DTI ratio and LTV ratio



Figures from the residential mortgage lending survey, conducted in the period 1 August to 8 September 2023. Source: Finanstilsynet

The recent sharp rise in interest rates has resulted in a substantial increase in borrowing costs, particularly for those with high DTI ratios. However, the interest rate hikes are within the interval for the interest rate stress test that banks must perform before granting new loans. Finanstilsynet's residential mortgage lending survey from autumn 2023 showed an increase in the share of borrowers with a small liquidity buffer after subtracting increased borrowing costs calculated according to the stress test.

The Lending Regulations' repayment requirement for loans with an LTV ratio above 60 per cent contributes to gradually reducing the vulnerability of individual borrowers. For one thing, the risk that their debt will exceed the value of their property in the event of a fall in house prices is mitigated.

The provisions regarding the flexibility quota in the Lending Regulations allow banks to grant exemptions from the instalment payment requirement for new loans. The banks may also approve deferred payment of instalments on existing loans if events occur that temporarily impair the customer's ability to pay instalments. However, deferred payment of instalments entails higher total borrowing costs for the customer over the term of the loan.

Earlier this autumn, Finanstilsynet obtained information from 14 banks on their practices for approving interest-only periods from 2019 to end-August this year. Overall, the banks stated that they had not received more requests than normal for deferred payment of instalments. Media entries show that some banks are now experiencing a higher number of such enquiries from customers.

The Lending Regulations will be evaluated before expiring at year-end 2024.

SOMEWHAT HIGHER HOUSEHOLD CREDIT RISK

There is a considerable lag from interest rates are increased until loan defaults materialise. The challenges facing Norwegian households as a result of relatively strong inflation and high interest rates are expected to persist for some time. Statistics Norway and Norges Bank estimate that inflation will fall towards a level close to the central bank's target of 2.0 per cent towards the end of the projection period in 2026, while the interest rate level is expected to rise between 0.5 and 1.0 percentage points from 2023 to 2024 and then decline to approximate the 2023 level.

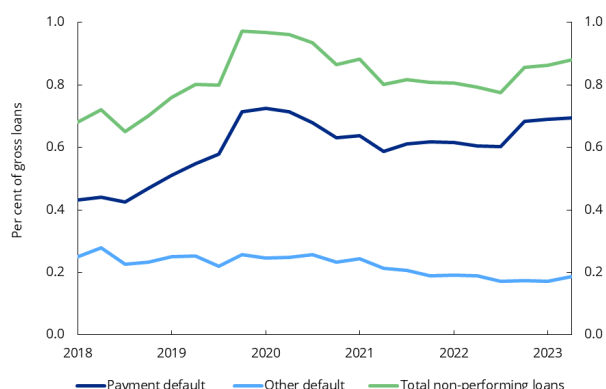
So far, there are few signs of debt servicing problems for the household sector overall. Banks' losses on loans to households remain low. The share of non-performing loans³ to households was up from 0.8 per cent in the fourth quarter of 2022 to 0.9 per cent in the third quarter of 2023 (chart 10). There have been small movements in the volume of households' overdue claims collected by debt collection agencies. Twelve-month growth in the total principal in debt collection cases where the debtor is a private individual was close to 4 per cent at end-June 2023. Nevertheless, the total amount under collection is still lower than in certain periods during the Covid-19 pandemic.

The share of banks' loans to the personal customer market classified as loans with a significant increase in credit risk⁴ (stage 2 or stage 3 loans according to IFRS 9) rose from 4.6 per cent in the second quarter of 2021 to 7.0 per cent in the third quarter of 2023 (chart 11).

³ Loans shall be deemed to be non-performing if the obligor is past due more than 90 days on any material credit obligation (payment default), or if it is unlikely that the counterparty will be able to meet its obligations (other default).

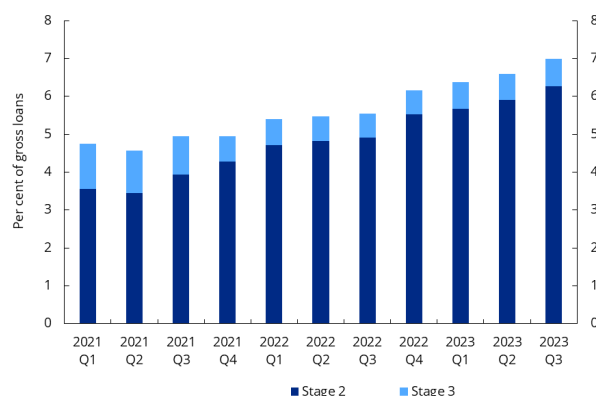
⁴ Loans with a significant increase in credit risk are classified in stage 3 if the loan is credit-impaired, i.e. when one or more events that have a negative effect on the loan's estimated future cash flows have taken place, and are classified in stage 2 if they are not credit-impaired.

Chart 10 Non-performing loans. Households



Last observation: third quarter 2023. Source: Finanstilsynet

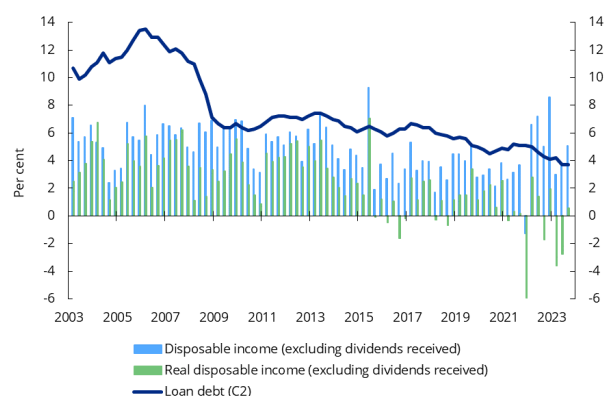
Chart 11 Share of loans in the personal customer market with a significant increase in credit risk



Gross lending is classified according to IFRS 9. Source: Finanstilsynet

The high price inflation and interest rate increases over the past couple of years have reduced households' total purchasing power. This is reflected in a decline in real disposable income (chart 12). Households' real disposable income (excluding dividends received) was approximately 1.8 per cent lower in the first three quarters of this year compared with the corresponding period in 2022.

Chart 12 Growth in households' domestic loan debt and disposable income from the same quarter of the previous year



The chart shows combined figures for households and non-profit organisations. Last observation: third quarter 2023. Sources: Statistics Norway and Finanstilsynet

There are wide differences in the financial resilience of Norwegian households. Some households can draw on liquidity buffers or raise new debt. The most vulnerable households have narrow margins between income and expenses and limited buffers to draw on. Vulnerable households that face higher interest expenses over time and whose income growth does not compensate for high price inflation will have to tighten their demand for goods and services. This reduces the risk of default on household debt but causes greater challenges in the business sector.

Some households have already scaled back on purchases of goods and services. Total household consumption was approximately unchanged in the first three quarters of this year compared with the first three quarters of 2022, while goods consumption fell 3.9 per cent during this period. There has been a more pronounced effect on housing investment, which was 13.6 per cent lower in the first three quarters of this year compared with the corresponding period in 2022.

Consequences of reduced household demand for various industries

Reduced household demand may trigger and amplify a downturn in the Norwegian economy.⁵ Since 1970, there has been a decline in Norwegian households' total consumption in the years 1978, 1987–1989, 2009 and 2020. During these four periods, household consumption (volume) fell by 1.8, 3.8, 0.2 and 6.4 per cent, respectively (table 1). Consumption of goods declined and consumption of services rose in the first three periods. During the Covid-19 pandemic in 2020, however, it was the other way around. Both housing investment and GDP for mainland Norway decreased in the last three periods but increased in 1978. The decline in 2020 differs from the other three periods, as the lockdown of parts of society to combat the Covid-19 pandemic had a direct impact on households' opportunities to request various goods and services. This period has therefore not been included in the review below.

Table 1 Development in real economic variables in the national accounts. Per cent

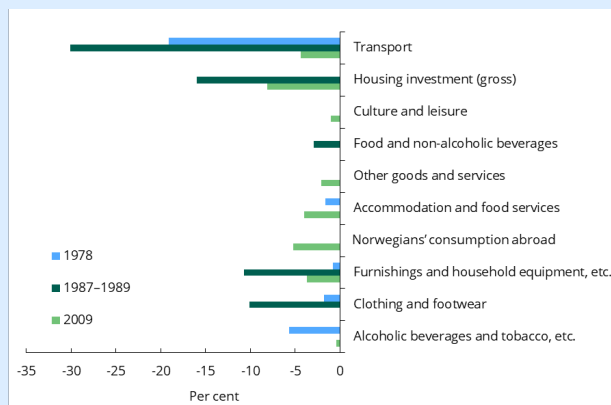
	1978	1987–1989	2009	2020
Household consumption	-1.8	-3.8	-0.2	-6.4
Consumption of goods	-4.7	-10.9	-0.8	7.2
Consumption of services	2.5	7.3	0.9	-11.6
Housing investment	8.8	-16.0	-8.1	-1.6
GDP for mainland Norway	1.4	-1.4	-1.7	-2.8

Source: Statistics Norway

Among the main items concerning household demand for goods and services, the decline in consumption during the three periods (measured by changes in the annual average) was greatest for the goods and services groups 'Transport' and 'Housing investment' (chart 13). For the 'Transport' group, household consumption declined by 19 per cent in 1978, by 30 per cent in 1987–1989 and by 4 per cent in 2009.

Among the sub-items under 'Transport' there was a particularly strong decline in 'Purchase of vehicles' (mainly purchases of cars). Housing investment fell by 16 per cent in 1987–1989 and 8 per cent in 2009. There was also a sharp drop for both 'Furnishings and household equipment etc.' (11 per cent) and 'Clothing and footwear' (10 per cent) in 1987–1989.

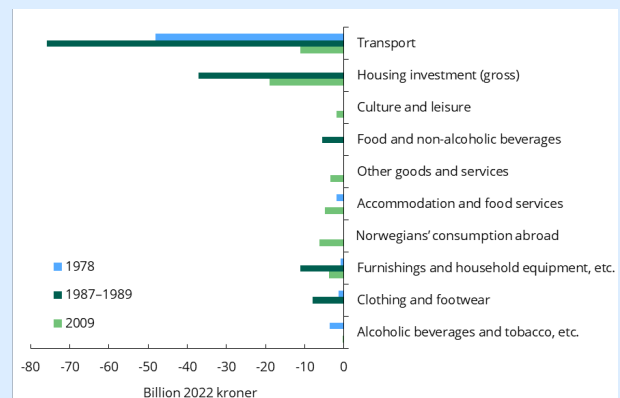
Chart 13 Decline in household purchases of goods and services (volume) during selected periods



Observations with increasing consumption are excluded.

Source: Statistics Norway

Chart 14 Decline in household purchases of goods and services during selected periods. Estimated effect if a similar decline had occurred in 2023



The bars show the amount of each item in the national accounts in 2022 multiplied by the growth rates in chart 13. Source: Statistics Norway

⁵ In 2022, household consumption and housing investment accounted for 47.7 and 6.5 per cent, respectively, of GDP for mainland Norway.

During all three periods, the decline in the main items 'Transport' and 'Housing investment' had the greatest negative effect on total household demand (chart 14). Overall, the decline in 'Transport', 'Furnishings and household equipment etc.', 'Clothing and footwear' and 'Housing investment' would have corresponded to a reduction in household purchases of goods and services of 131 billion 2022 kroner if the decline in 1987-1989 had occurred in 2023. This reduction, which represents only the first-round effect on overall activity in the economy, equals 3.6 per cent of GDP for mainland Norway in 2022.

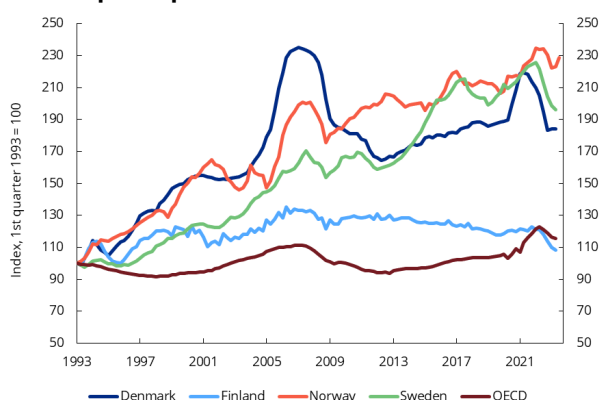
Of the three periods of declining household consumption, 2009 is the closest to the current situation in Norwegian society in terms of time, technology and preferences. The decline in 2009 was broad-based. Excluding the item 'Norwegians' consumption abroad', the overall decline shown in chart 14 would amount to approximately 44 billion 2022 kroner. This corresponds to 1.2 per cent of GDP for mainland Norway in 2022.

WEAK TREND IN HOUSE PRICES

Developments in household debt and in the housing market are closely interconnected. When house prices rise, many households will have to take out larger loans to finance home purchases. At the same time, households that already own a home find that the value of their collateral rises, thus enabling them to increase their debt to finance the purchase of a more expensive property or consumer goods. There is a mutually reinforcing effect between developments in house prices and household debt during both upturns and downturns.

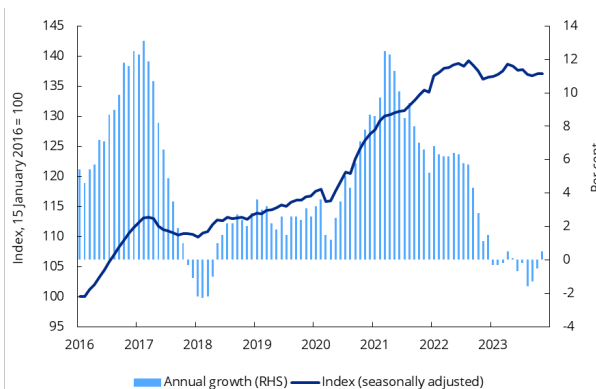
For a long period, house prices in Norway have risen at a faster pace than households' disposable income (chart 15). In spite of the interest rate hikes, house prices continued to rise at the start of 2023 but have slowed somewhat since May. In November, the twelve-month growth in house prices was 0.5 per cent on a national basis (chart 16).

Chart 15 House prices as a share of disposable income per capita



Last observation: second quarter 2023. Source: OECD

Chart 16 House prices in Norway



Last observation: November 2023. Sources: Real Estate Norway, Eiendomsverdi and Finn.no

So far in 2023, sales of existing dwellings have been roughly on a level with last year, but the number of unsold homes has increased considerably. Both Statistics Norway and Norges Bank expect high interest rates and living expenses, as well as a large number of unsold homes in the market, to contribute to a weak house price trend next year. Statistics Norway estimates that nominal house prices will be down 0.6 per cent in 2024, and Norges Bank expects an increase of 0.8 per cent.

While sales of existing dwellings have kept up speed, both sales of new homes and housing starts have fallen steeply over the past year. In the longer term, a lower housing supply may contribute to pushing up house prices, particularly if immigration remains high. Statistics Norway and Norges Bank consider this and somewhat lower lending rates to be key drivers in their projections of nominal house price growth in 2025 and 2026. Statistics Norway estimates that house prices will increase by 0.4 per cent in 2025 and 2.9 per cent in 2026, while Norges Bank expects a larger house price increase of 4.3 per cent in 2025 and 6.0 per cent in 2026.

Future developments in house prices are uncertain. House prices are at a historically high level measured as a share of income. If interest rates remain high for longer than expected or rise further, house prices may fall sharply. This may lead to lower economic activity and higher bank losses.

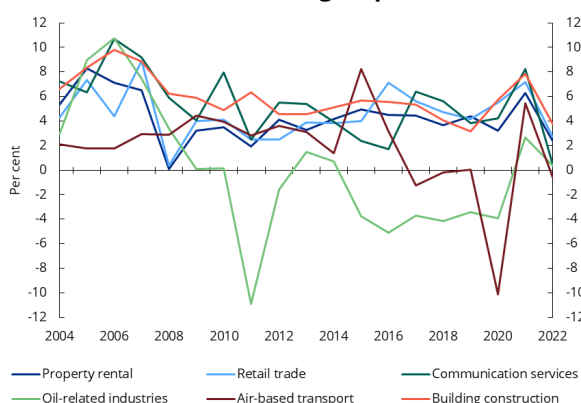
NON-FINANCIAL CORPORATIONS

WEAKER RESULTS IN THE BUSINESS SECTOR

Losses on loans to non-financial corporations represent the single greatest risk for most Norwegian banks. Developments in the financial performance and debt-servicing capacity of these corporations are therefore important.

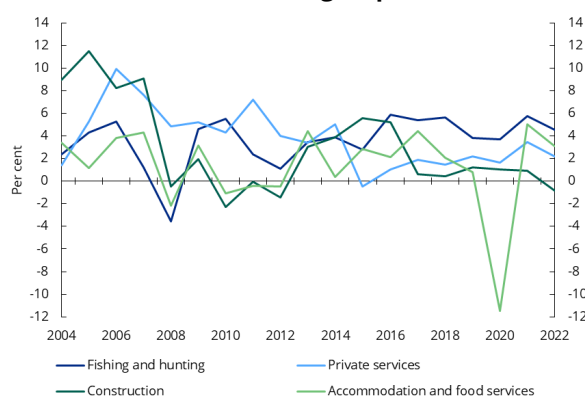
In 2022, there was a decline in profits in a number of main industries (charts 17 and 18). The interest expenses of most non-financial corporations increased considerably. In addition, many of them experienced higher costs due to rising prices of important input factors, wage increases and a weaker krone exchange rate. Reduced demand and asset write-downs were other factors behind the weaker profits in some corporations. Some industries, including the manufacturing industry, nevertheless showed strong profit performance in 2022 (chart 19). Most of the largest listed manufacturing companies recorded a significant decline in profits in the first three quarters of 2023 compared with the corresponding period in 2022 (chart 20). Several large listed companies in other industries also had weaker results in the first three quarters of the year than a year earlier.

Chart 17 Annual profits in per cent of total book assets. Selected industries (groups)



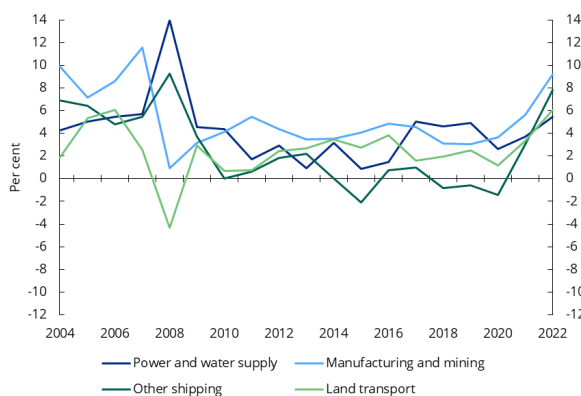
Source: Finanstilsynet

Chart 18 Annual profits in per cent of total book assets. Selected industries (groups)



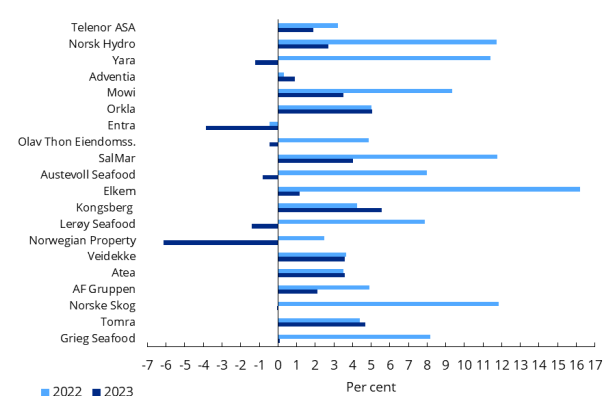
Source: Finanstilsynet

Chart 19 Annual profits in per cent of total book assets. Selected industries (groups)



Source: Finanstilsynet

Chart 20 Profits in per cent of total book assets. Large listed non-financial corporations (groups). First three quarters of 2022 and 2023



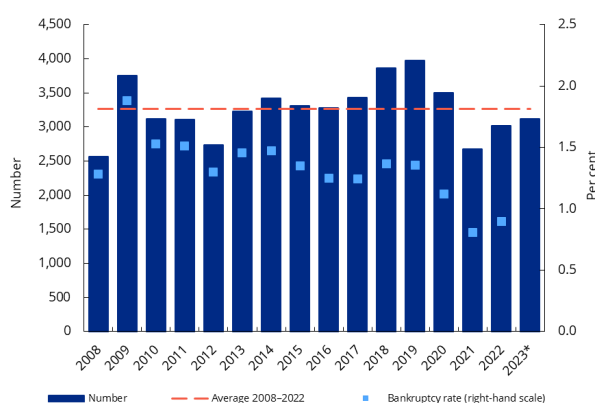
Large listed non-financial corporations in mainland Norway excluding energy and oil services. Sources: The listed corporations' interim reports and Finanstilsynet

THE NUMBER OF BANKRUPTCIES HAS INCREASED

Creditors may initiate bankruptcy proceedings against corporations that fail to meet their obligations as they fall due. The number of initiated bankruptcy proceedings is an indicator of the state of the Norwegian business sector. If the number of bankruptcy proceedings increases, or if bankruptcy rates rise in industries that normally have low such rates, this may be an indication of heightened credit risk and a higher probability of loan losses for the banks.

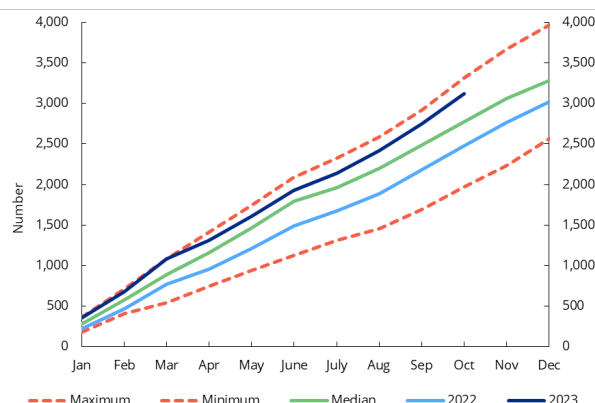
During the period 2008 to 2022, the number of initiated corporate bankruptcy proceedings ranged between 2 566 and 4 000, with an annual average of 3 265 (chart 21). Thus far in 2023, the number of corporate bankruptcies is 25 per cent higher than a year earlier and above the median level over the past 16 years (chart 22). Some industries are far more prone to bankruptcy than others. In recent years, the industries 'Retail trade', 'Services'⁶ and 'Construction' have accounted for about 80 per cent of all corporate bankruptcies in Norway.

Chart 21 Number of corporate bankruptcy proceedings initiated during the period 2008–2023



* At end-October 2023. The bankruptcy rate shows the number of initiated bankruptcy proceedings divided by the number of non-financial corporations. Source: Statistics Norway

Chart 22 Number of initiated corporate bankruptcy proceedings – accumulated bankruptcies during the year from 2008 to October 2023



Last observation: October 2023. Source: Statistics Norway.

The construction sector's share of the total number of bankruptcies⁷ increased significantly from 2020 to 2021 and is now at a historically high level (chart 23). On the other hand, the retail trade's share of total bankruptcies has fallen markedly over time. Retail trade and some service sectors are also particularly sensitive to changes in household consumption. Over the past two years, there has been a larger increase, in relative terms, in the number of bankruptcies in these industries than in other industries. This may indicate that credit risk in these industries is higher than in several of the other industries.

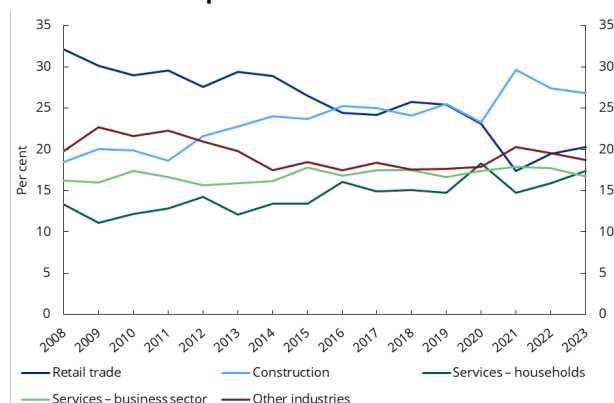
At year-end 2022, the average exposure to retail trade, construction and services was 33 per cent for the banks combined, while in volume-weighted terms, it was 28 per cent of the banks' total corporate exposures. This is roughly on a level with the industries' share of mainland Norway's gross output and employment. This indicates that the banks have a balanced exposure to these industries. There are significant divergences between the banks, which means that some banks have a far higher exposure.

⁶ Household services – accommodation and food services (I), culture, entertainment and leisure (R), other services (S). Business services – professional, scientific and technical services (M), business services (N), information and communication (J).

⁷ The bankruptcy rate shows an industry's share of total annual accumulated bankruptcies.

The banks are exposed to about half of the corporations that have filed for bankruptcy so far in 2023⁸. At year-end 2022, the banks had outstanding loans of NOK 5 billion to corporations declared bankrupt in 2023, which corresponds to 0.3 per cent of non-financial corporations' debt to credit institutions as at 31 December 2022. Here, there is also considerable variation among individual banks.

Chart 23 Bankruptcies in selected industries as a share of the total number of bankruptcies



Last observation: October 2023. Source: Statistics Norway

UNCERTAINTY AND CHALLENGES IN THE COMMERCIAL REAL ESTATE MARKET

Several of the largest Norwegian commercial real estate (CRE) companies have written down the value of their real estate portfolios over the past year. The number of properties sold has fallen markedly, probably due to increased uncertainty surrounding actual property values and more expensive financing. The sharp rise in interest rates has contributed to a significant increase in debt in CRE companies with weak debt-servicing capacity as a share of the industry's total debt (share of high-risk debt). If interest rates remain high, the share of high-risk debt may increase further and stay high for a longer period. Rising risk premiums and a considerably higher future interest rate level than over the past decade may trigger a substantial fall in commercial property prices and elevated credit risk for the banks.

Commercial property prices have fallen over the past year. Assuming that the properties are valued annually on the basis of the 'Oslo prime yield' index, and that rental income is adjusted by the annual rise in inflation up till end-November, the decline in prices of prime office space in central Oslo is estimated at 16.5 per cent this year (chart 24). There is a 22 per cent decline in prices from year-end 2021. At the same time, there is low turnover in the market, and the valuations are highly uncertain (chart 25). CRE companies have large volumes of debt falling due over the coming years. Refinancing problems in the CRE companies may amplify downward price spirals.

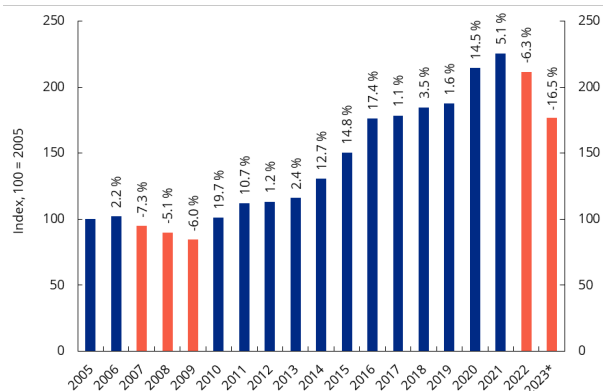
The financial crisis in 2008–2009 had an impact on the Norwegian CRE sector (see chart 47 in the special topic chapter). Transaction volume fell to a very low level. Thanks to generally sound profitability and low loan-to-value (LTV) ratios prior to the crisis, as well as a sharp fall in interest rates and a rapid recovery in the Norwegian economy, most CRE companies avoided serious problems. Up till autumn 2021, low and falling interest rates, a significant rise in values and search for yield contributed to pushing up prices and elevating the debt of CRE companies.

Partly owing to the rapid and sharp increase in interest rates since autumn 2021, the net rental income of several CRE companies now does not cover their interest expenses. In addition to weaker debt-servicing

⁸ In this connection, these are defined as Norwegian banks and Norwegian branches of foreign enterprises (NUF).

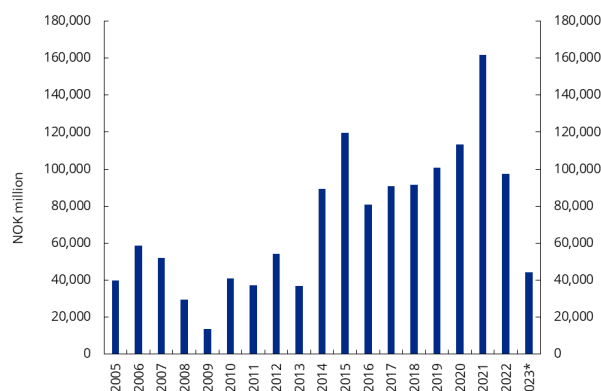
capacity, they have seen a reduction in the value of commercial properties. There is considerable uncertainty associated with the value of commercial properties, which is reflected in a low transaction volume so far in 2023.

Chart 24 Indexed CRE price indicator with annual inflation adjustment of rental income – prime office space in Oslo



* Year to date (as at 1 December 2023). Source: Akershus Eiendom.

Chart 25 Transaction volume – commercial real estate in Norway



* Year to date (as at 1 December 2023). Source: Akershus Eiendom.

The yield on commercial real estate has risen far less than the interest rate level and is now at approximately the same level as Norwegian swap and government bond yields. Fixed-income market participants and forecasters do not expect interest rates to fall appreciably over the coming years. If risk premiums are normalised, the yield will increase.

On average, Norwegian banks are strongly exposed to the commercial real estate sector. In the past, both Norwegian and international banks have suffered substantial losses on commercial property exposures during crises in the financial and property markets. For pension institutions, which are heavily exposed to the real estate sector, a fall in commercial property prices could result in weaker profitability and solvency.

International developments in commercial real estate

Higher interest rates result in higher yields on real estate investments. The share prices of the largest European CRE companies have fallen by about 20 per cent on average since August 2022. Prices of high-quality commercial properties owned by real estate investment trusts (REITs) have declined by more than 26 per cent in Europe and 18 per cent in the US over the past year.

In the US, prices of office space in many of the largest cities have fallen significantly as a result of higher interest rates, but also due to reduced demand during and after the pandemic. Office vacancy rates are at a historically high level. The IMF notes that refinancing of commercial real estate debt will be more challenging in the period ahead as US banks have tightened lending standards for this sector.

In China, the property market crisis has taken its toll on financial markets. For many years, economic growth in China has been driven by infrastructure and real estate investments, and growth in the real estate sector has long accounted for 25 to 30 per cent of the country's total value generation. Substantial debt has been accumulated by both companies and local authorities, and there are large volumes of leveraged real estate investments. There has been a sharp drop in the share prices of several of the largest listed Chinese real estate companies, which has ripple effects both nationally and globally.

Many real estate companies have high debt. Elevated financing costs and reduced property values have a negative effect on the companies' profitability and creditworthiness. Credit rating agencies have downgraded a number of real estate companies over the past year. The bond debt of many of the companies is at risk of being classified as 'high yield', which will entail considerably higher financing costs. There is a risk that refinancing problems in the CRE companies may amplify downward price spirals.

In January 2023, [the ESRB recommended](#) that the EU and national authorities improve their monitoring of risks in the commercial real estate sector and implement both microprudential and macroprudential measures to address identified vulnerabilities.

Finanstilsynet has monitored the commercial real estate market closely for a long time and published a report in June following an inspection of [seven banks' financing of office buildings](#) (in Norwegian only). In October, the Systemic Risk Council in Denmark recommended the introduction of [a sector-specific systemic risk buffer](#) (in Danish only) of 7 per cent for exposures to real estate companies. The reason for the proposal is that heightened systemic risk in the commercial real estate market may require banks to increase their capital buffers.

NORWEGIAN BANKS

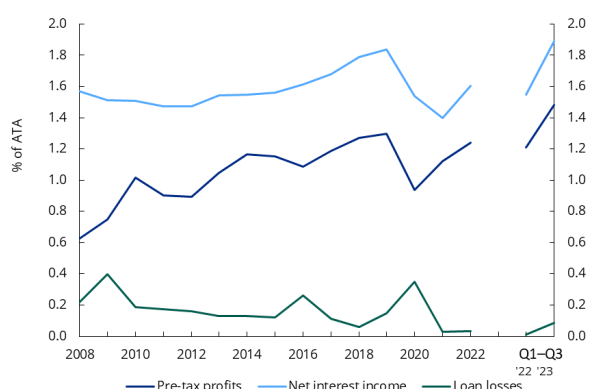
BANKS RECORD STRONG PROFITS AND COMPLY WITH REGULATORY REQUIREMENTS

Following a drop in profits during the Covid-19 pandemic, the profitability of Norwegian banks has improved considerably. This is due in particular to higher net interest income (chart 26), primarily driven by the increase in the Norwegian policy rate. In addition, banks' loan losses have been low after 2020, partly as a result of reversals of previous impairment losses. The banks' low operating expenses are another factor behind the strong results. Figures from the European Banking Authority (EBA) show that the profitability of the large Norwegian banks is on a par with that of banks in the other Nordic countries.

Norwegian banks meet the regulatory capital requirements. CET1 capital ratios have increased considerably over the past 15 years (chart 27). However, much of the increase in the CET1 capital ratio since 2018 is attributable to regulatory changes. The easing of the requirements has given a rise in Norwegian banks' measured capital adequacy ratios, although there has been no real improvement in the banks' solvency levels. Measured by the leverage ratio, banks' solvency ratios have been approximately unchanged since 2015 but are somewhat higher than during the global financial crisis in 2008–2009.

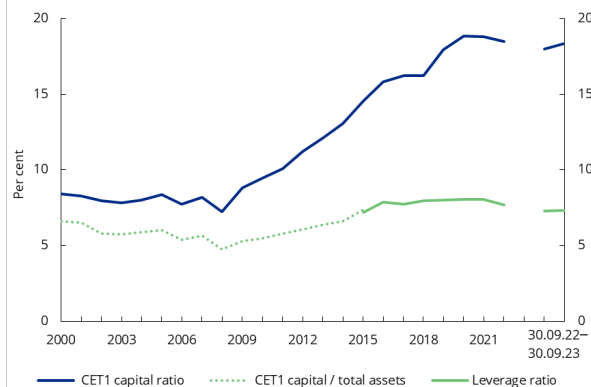
Strong profitability and improved solvency have strengthened the banks' ability to absorb losses and to offer credit in the event of an economic downturn.

Chart 26 Profitability of Norwegian banks



Source: Finanstilsynet

Chart 27 Capital adequacy of Norwegian banks



The chart shows CET1 capital / total assets up to and including 31 December 2015 and the leverage ratio as from 31 December 2015. Both are measures of non-risk-weighted capital adequacy. Source: Finanstilsynet

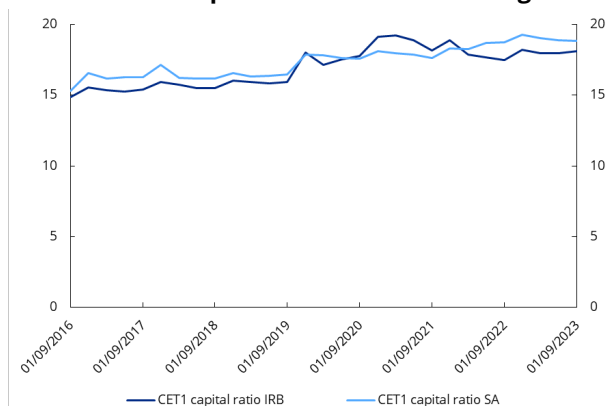
LOWER RISK WEIGHTS IN BANKS USING THE INTERNAL RATINGS BASED APPROACH

Calculations of CET1 capital ratios are sensitive to the underlying assumptions. The CET1 capital ratio measures common equity Tier 1 capital relative to the bank's risk-weighted assets. The individual bank's basis for calculation depends both on the composition of the bank's loan portfolio and on the risk weights used for the various exposures. The risk weights are either based on fixed rates for different types of loans (the standardised approach) or on the bank's own estimates of probability of default (PD) and loss given default (LGD) (internal ratings-based approach, IRB). The IRB approach sets requirements for banks' risk models, and use of the approach is subject to approval by Finanstilsynet.

Chart 28 shows developments in CET1 capital ratios for banks using the IRB and the standardised approach, respectively. Regulatory easing from 2019 has strengthened the CET1 capital ratios of all banks using either the IRB or the standardised approach, with the greatest effect for IRB banks.

Both banks and the authorities must ensure that risk weights reflect the actual risk of lending.

Chart 28 CET1 capital ratios for banks using the IRB and the standardised approach

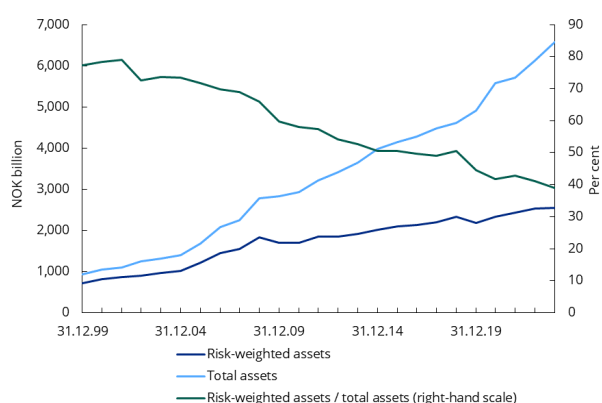


Source: Finanstilsynet

In simplified terms, the ratio between risk-weighted assets and total assets shows the average level of banks' risk weights. This level has declined considerably over the past 15 years (chart 29). Chart 30 shows that the differences in average risk weights between banks using the standardised approach and banks using the IRB approach, respectively, have increased in recent years. IRB banks have experienced a substantial decline in average risk weights, which have been more stable for banks using the standardised approach. The reduction for the IRB banks mainly reflects the removal of the Basel 1 floor from year-end 2019.

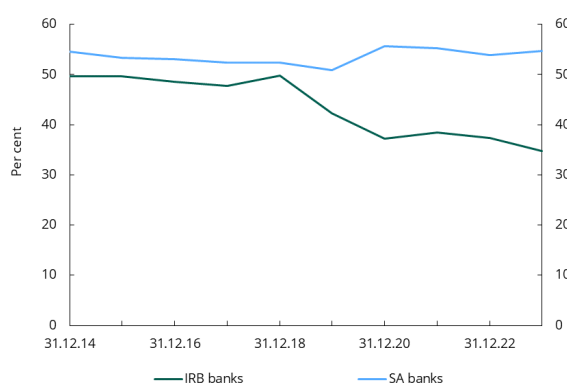
The decline in average risk weights contrasts with both persistent and increased vulnerabilities in the Norwegian economy, in addition to considerable uncertainty surrounding future economic developments.

Chart 29 Risk-weighted assets and total assets of Norwegian banks



Source: Finanstilsynet

Chart 30 Banks' risk-weighted assets as a share of total assets, standardised and IRB approach



Source: Finanstilsynet

HEIGHTENED RISK IN BANKS' LOAN PORTFOLIOS

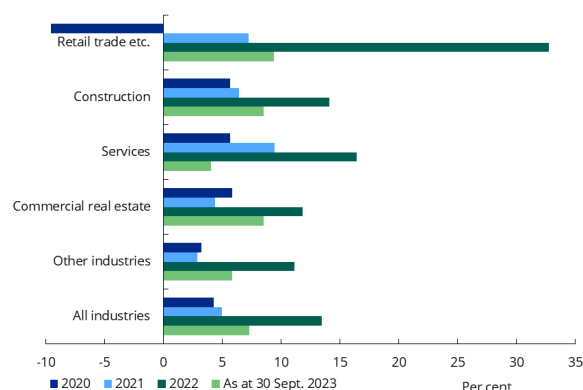
Declining lending growth

The growth in Norwegian banks' lending to customers has slowed in recent quarters. At end-September, twelve-month growth was 4.8 per cent, while the annual inflation rate was 3.3 per cent. Growth in lending to personal customers, which constitutes the greater part of banks' loan portfolios, was 4.1 per cent. Branches of foreign banks in Norway have reduced the growth in lending to both personal and corporate customers by more than Norwegian banks and are now experiencing considerably lower lending growth than Norwegian banks.

The banks' lending to domestic firms increased appreciably in 2022, and twelve-month growth was close to 13 per cent. Lending growth has slowed significantly so far in 2023 but was nevertheless 7 per cent at end-September. Loans to commercial real estate (CRE) companies account for the clearly largest share of most banks' corporate portfolios. At end-September 2023, commercial real estate accounted for 44 per cent of total lending to domestic firms, while lending to construction activity constituted a further 13 per cent.

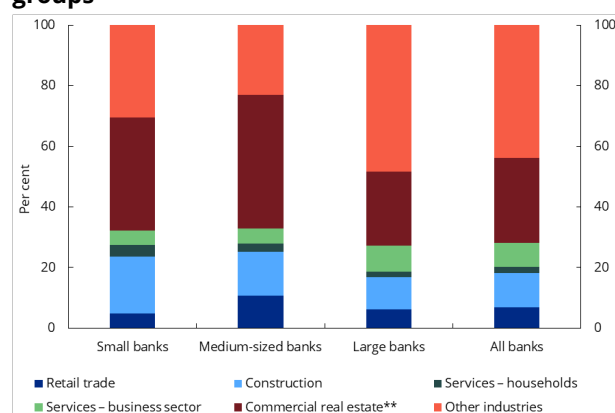
In recent years, retail trade and parts of the services and construction industries have accounted for a significant share of all corporate bankruptcies in Norway. These industries may also be more vulnerable in the event of a turnaround in household demand. Loans to these industries and loans to commercial real estate represent a substantial share of banks' total lending and are still on the rise (chart 31).

Chart 31 Growth in Norwegian banks' lending to selected industries



Source: Finanstilsynet

Chart 32 Exposures to selected industries as a share of banks' corporate portfolios as at 31 December 2022*. Broken down on banking groups



*Loans granted to non-financial corporations **Real estate activities. Source: Finanstilsynet

Banks are exposed to vulnerable industries

Norwegian banks' exposures, i.e. both utilised and unutilised credit facilities to domestic and foreign customers, to the retail trade, construction and services industries⁹ accounted for 28 per cent of the banks' total corporate exposures at year-end 2022 (chart 32). This share varies between banks and was somewhat larger for the groups of small and medium-sized banks than for the group of large banks. This is partly due to the fact that the construction sector on average constitutes a larger share of small and medium-sized banks' corporate exposures.

⁹ For more information about these industries, see the account under non-financial corporations.

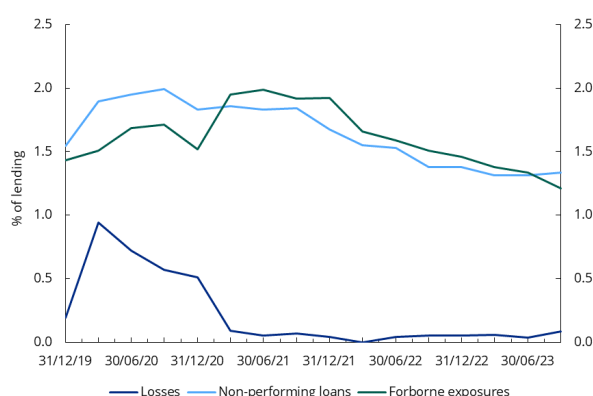
The banks are also heavily exposed to commercial real estate. Owing to the increased interest rate level, a number of real estate companies have weaker debt-servicing capacity. In addition, commercial property prices have fallen. For the banks combined, commercial real estate represented 28 per cent of total corporate exposures at year-end 2022.¹⁰ The share varies between banks and is clearly larger for the groups of small and medium-sized banks than in the large banks.

The total exposure to industries with increased credit risk and to commercial real estate is greatest for the group of medium-sized banks, representing as much as 77 per cent of their total corporate exposure. The share is somewhat lower for the group of small banks (70 per cent) and considerably lower for the group of large banks (52 per cent). For some banks, exposures, and thereby risk, are even higher.

Losses and non-performing loans remain low for the banks

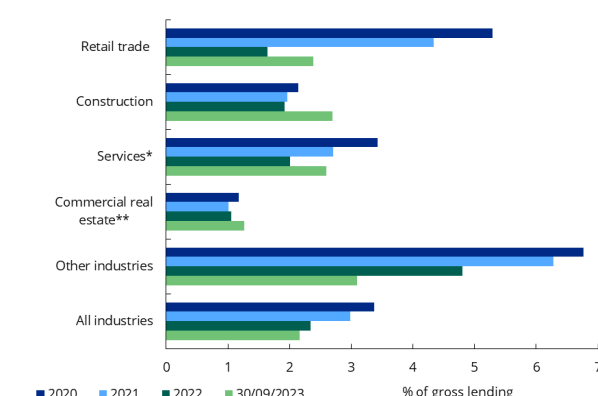
Banks' losses and non-performing loans remain at low levels.¹¹ So far, inflation and higher interest rates have not resulted in any increase in forbore exposures¹² (chart 33). For the year to date, the share of non-performing loans has increased somewhat in retail trade, construction, services and commercial real estate, albeit from very low levels (chart 34). For other industries, the level of non-performing loans has declined further so far in 2023.

Chart 33 Losses and non-performing and forbore exposures in Norwegian banks



Losses in the chart are recognised losses (accumulated and annualised) on loans, unutilised credit facilities and guarantees and are shown as a percentage of average loans. Source: Finanstilsynet

Chart 34 Non-performing loans in individual industries



*Accommodation and food services, information and communication and professional, business and other services
 **Real estate activities. Source: Finanstilsynet

In the short term, rising interest rates will give an improvement in banks' net interest income. At the same time, a sharp rise in interest rates and weaker economic developments may add to credit risk in the banks' portfolios and require higher impairment losses.

The share of loans to the personal customer market with a significant increase in credit risk that are not credit-impaired (stage 2 according to IFRS 9) and the share of loans that are credit-impaired (stage 3 according to IFRS 9) have risen over the past year (chart 35). In the corporate market, the share of stage 2

¹⁰ As mentioned above, the drawn amount of CRE loans granted to domestic corporate customers only amounts to 44 per cent as at 30 September 2023.

¹¹ The increase in losses in 2020 stems from the shutdown measures implemented during the pandemic. Since then, the banks have recorded substantial reversals of previous impairment losses on loans to oil and offshore activities.

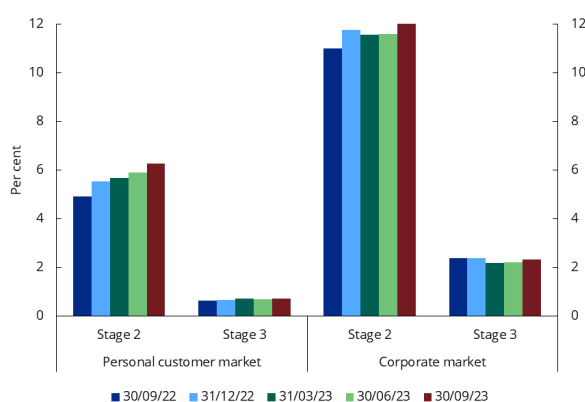
¹² Forbearance refers to amendments to a contract's previous terms and conditions and includes, among other things, the granting of interest-only periods, instalment reductions, interest-free periods and maturity extensions. This is relevant only for loans where the borrower has financial problems and where the bank would not have provided payment relief if the borrower *did not* have financial problems.

loans has increased, while the share of stage 3 loans has decreased, partly due to write-offs on loans to the oil, gas and offshore industries.

The banks' total impairment losses in industries with heightened credit risk have risen somewhat over the past year, particularly in the construction industry (chart 36). Impairment losses on commercial real estate loans are low compared with these industries. The level has risen slightly over the past year, but the banks expect losses on CRE loans to remain low.

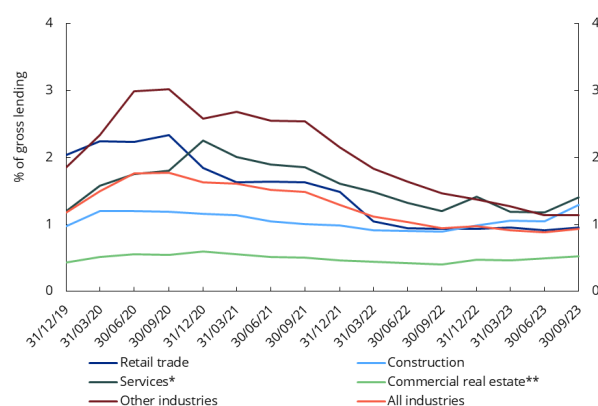
Developments in impairment losses indicate that the banks expect loan losses to increase somewhat in some industries in the coming period, but from a still-low level. It is important that banks thoroughly assess the need for impairment losses. As a result of the considerable uncertainty surrounding developments in credit risk in the banks' portfolios, the banks should be transparent about the assumptions underlying their assessments and about how changes in assumptions may affect impairment losses.

Chart 35 Share of loans with heightened credit risk



Source: Finanstilsynet

Chart 36 Impairment losses for selected industries



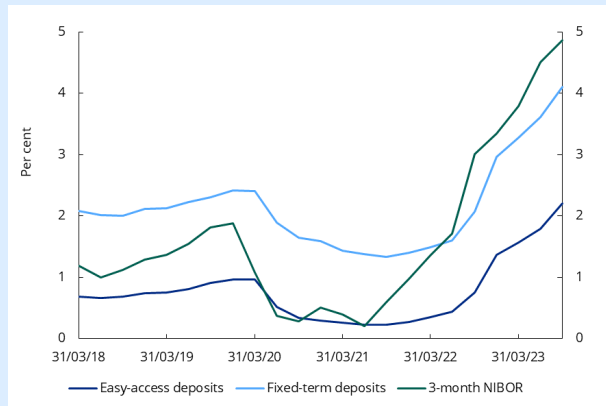
*Accommodation and food services, information and communication and professional, business and other services
 **Real estate activities. Source: Finanstilsynet

Deposit rates have not been increased in step with lending rates

Norwegian banks' main activity is to extend loans to and accept deposits from customers. The difference between interest income on loans and interest expenses on funding (net interest income) is the banks' key source of income. For the banks combined, net interest income now exceeds pre-pandemic levels as a share of total assets (chart 26). The main reason for the high net interest income is that banks have increased their lending rates faster and higher than deposit rates.

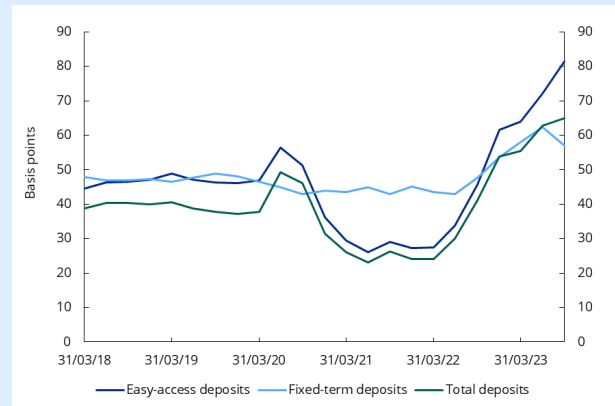
While the banks have raised lending rates broadly in pace with the policy rate hikes over the past couple of years, deposit rates have lagged behind. This applies in particular to current accounts and easy-access deposits, which together account for about 85 per cent of personal customers' bank deposits (chart 37). For other account types, including the BSU home savings scheme for young people and other fixed-term accounts, deposit rates have increased considerably more than for current accounts, although not as much as money market rates.

Chart 37 Average deposit rates – personal customers



Source: Finanstilsynet

Chart 38 Variation in banks' deposit rates – personal customers



Source: Finanstilsynet

There are large differences in deposit rates between banks. As shown in chart 38, the differences in the various banks' deposit rates, here measured as the standard deviation at given points in time to the various banks' deposit rates, have also widened substantially since interest rates started to rise in the third quarter of 2021. The differences in banks' deposit rates are now also wider than before the rapid decline in interest rates in 2020.

The pandemic led to a significant increase in customers' bank deposits. Total deposits for all Norwegian banks combined are up more than 30 per cent since before the pandemic. This increase has resulted in a shift in bank funding, whereby deposits have replaced wholesale funding as the largest source of funding. Deposits are a cheaper form of financing than wholesale funding. More sluggish lending growth and an ample supply of deposits as a result of increased financial savings in bank deposits probably make banks less willing to pay for deposits. At the aggregate level, there are still no signs of a reduction in bank deposits. This may be one of the reasons why the banks choose not to increase their deposit rates further.

Banks' average lending spread has narrowed during the period after the first policy rate increases were implemented in 2021. The reduction can partly be explained by the notification period for interest rate increases. According to the new Financial Contracts Act, with effect from 1 July 2023, interest rate increases on loans to consumers will not come into effect until eight weeks after being notified, whereas the previous notification period was six weeks. The banks often change their deposit rates at the same time as lending rates. Although there is no notification requirement for increases in deposit rates, the change to eight weeks for lending rates may also result in deposit rates being adjusted somewhat later than previously.

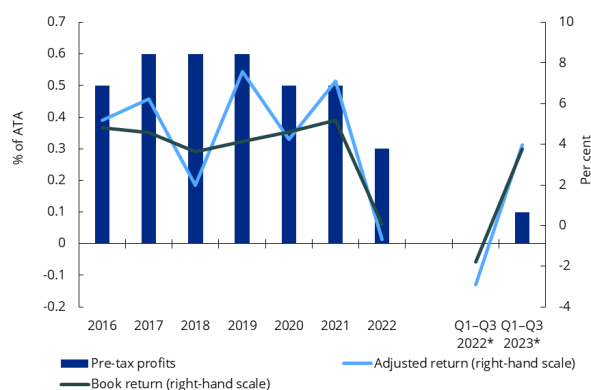
INSURERS AND PENSION FUNDS

LIFE INSURERS ENJOY RISE IN PROFITS AND STRONG SOLVENCY

The positive stock market trend has been reflected in life insurers' overall return thus far in 2023, while property write-downs have contributed to net losses for some insurers. For life insurers combined, pre-tax profits and returns increased in the first three quarters of 2023 compared with the year-earlier period (chart 39). In 2022, negative developments in international stock markets and a significant rise in interest rates were the main factors behind the negative returns and decline in profits compared with the preceding years.

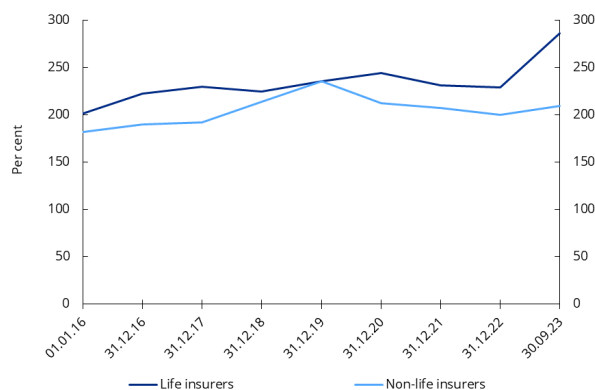
Overall, Norwegian insurers and pension funds enjoy a strong solvency position. Life insurers' solvency ratio widened from 202 per cent when the Solvency II framework was introduced on 1 January 2016 to 286 per cent as at 30 September 2023 (chart 40). The sharp rise in the solvency ratio so far in 2023 is mainly attributable to higher interest rates and contributed to reducing both the solvency capital requirement and insurance obligations and gave an increase in solvency capital.

Chart 39 Life insurers' profits and returns



*Annualised return. Source: Finanstilsynet

Chart 40 Insurers' solvency position



Source: Finanstilsynet

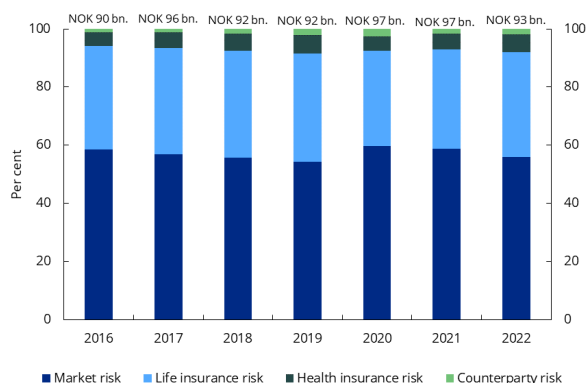
HIGH EXPOSURE TO COMMERCIAL REAL ESTATE

The solvency ratio is a measure of total solvency capital in per cent of a risk-based solvency capital requirement. The solvency capital requirements for insurers depend on the risk associated with individual insurers' investments and insurance obligations (charts 41 and 42).¹³ Property risk has represented an increasing risk factor in recent years but has not surpassed interest rate, equity and credit spread risk.

Property risk accounts for a substantial share of total market risk for Norwegian life insurers. Norwegian insurers have a far larger share of real estate-related investments than insurers in most other European countries (chart 43). Norwegian pension funds also have a significant share of investments in real estate (15 per cent of investments as at 30 June 2023).

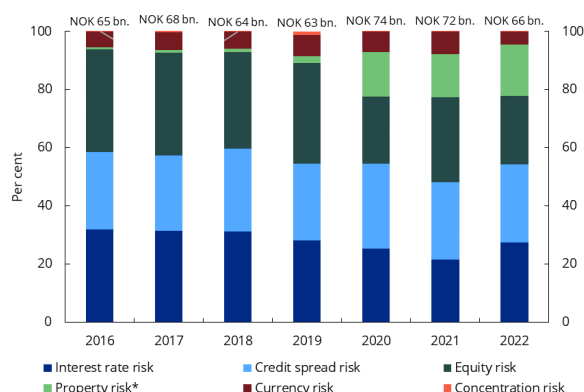
¹³ For a more detailed description of the solvency capital requirements and the Solvency II framework, see [Finanstilsynet's report on insurers' solvency position based on the annual Solvency II reporting](#) (in Norwegian only).

Chart 41 Breakdown of life insurers' solvency capital requirement*



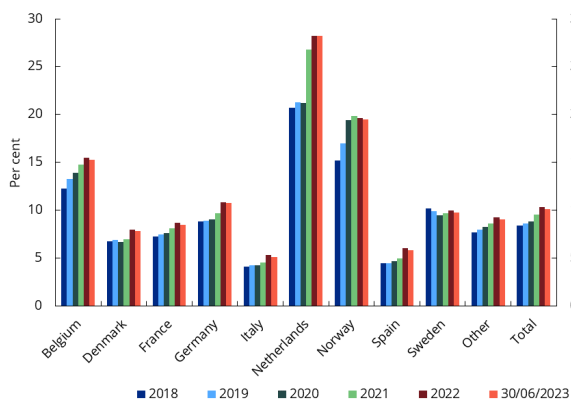
* Before deducting diversification gains. Source: Finanstilsynet

Chart 42 Breakdown of life insurers' solvency capital requirement for market risk*



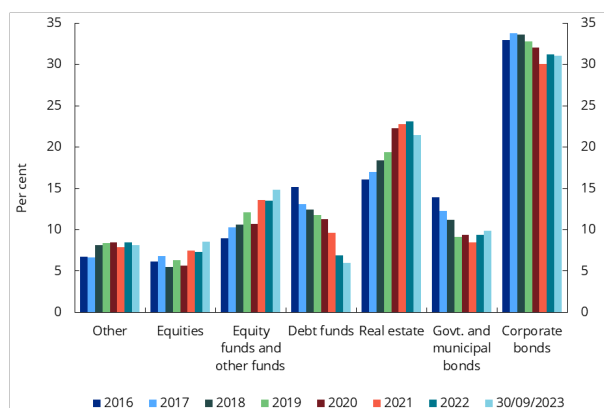
* Before deducting diversification gains. The increase in property risk and the reduction in equity risk from 2019 to 2021 are mainly a consequence of regulatory changes effective as of 1 January 2021, whereby investments in related real estate companies are no longer treated as equity risk when calculating insurers' solvency capital requirement but as property risk. Source: Finanstilsynet

Chart 43 European insurers' real estate investments as a share of total investments (excl. unit linked)



Source: ELOPA statistics as at 30 June 2023

Chart 44 Life insurers' investments (excl. unit linked)



Source: Finanstilsynet

Norwegian life insurers' real estate investments have risen appreciably over time and now account for 21 per cent of investments in the collective and corporate portfolios (chart 44). Real estate investments in life insurers' collective and corporate portfolios mainly comprise equities in subsidiaries (real estate subsidiaries) that own and operate properties but also include property bonds, real estate-related loans and real estate funds. The share invested in real estate-related equities has increased over time but has subsided somewhat since the beginning of the year.

The rise in interest rates has resulted in higher required rates of return on real estate and prompted a number of life insurers to write down property values in the recent period. In the third quarter of 2023, life insurers reported an overall reduction of NOK 7.6 billion in the value of real estate in their collective portfolios. During the same period last year, the value of the real estate portfolios was written up by just under NOK 0.5 billion.

Both the accounting regulations and the solvency capital regulations set certain requirements for all assets valued at market price. If the market value is considered to have changed at some point during the year, the value shall be changed in the accounts and in the calculation of the solvency capital requirements. Where there is no liquid market, the market value must be estimated. It is important that insurers regularly assess values in their real estate portfolios.

LARGE SHARE OF FIXED-INCOME SECURITIES AT AMORTISED COST

Seen in isolation, the substantial rise in interest rate levels in 2022 and into 2023 results in a negative return on life insurers' fixed-income securities. A number of life insurers have recently increased their share of fixed-income securities at amortised cost, primarily by reducing other fixed-income investments.

Risk in the management of the collective portfolio

Rules for a combined and customer-distributed buffer fund will be introduced for private guaranteed pension products effective from 1 January 2024. The buffer fund will replace the current supplementary provisions and fluctuation reserves and can be used to cover negative returns. Corresponding changes were introduced for municipal pension schemes with effect from 2022. The introduction of a buffer fund is beneficial for pension providers as it provides increased protection of equity. In order to be of benefit to customers, in line with the intentions behind the regulatory amendment, greater risk must be taken in the management of the collective portfolios to achieve a higher expected return over time.

The fact that pension providers largely invest in fixed-income securities at amortised cost or loans and receivables in their collective portfolios means that the yield / interest rate on the bonds/loans at the time of purchase is locked in as a fixed annual return until the investment reaches maturity. This reduces the undertakings' risk associated with the annual guaranteed rate of return. For pension customers, this means that the prospects of a return on pension funds in excess of the guaranteed rate of return are reduced considerably. For contracts with a high guaranteed rate of return, the return will in reality be locked in, which means that there will be no prospects of excess returns. Finanstilsynet cannot see that such an allocation of policyholders' funds can be in the customer's interest.

The work on the regulations for guaranteed pension products was based on the premise that the changes should be clearly to the customers' benefit. The introduction of buffer funds was a result of this work. Finanstilsynet emphasises that higher risk taking in the management of collective portfolios is a prerequisite for ensuring that the regulatory changes relating to buffer funds will benefit customers over time.

Life insurers' bond portfolios are generally of good credit quality.

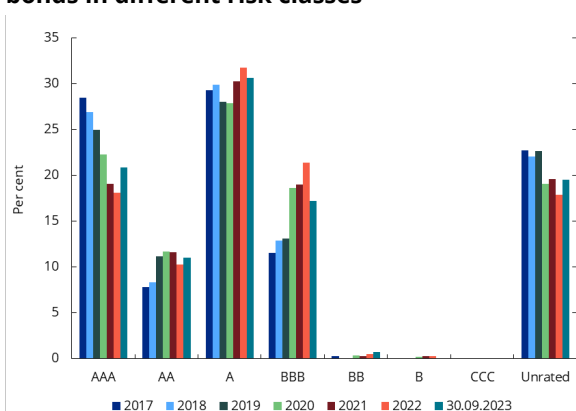
Norwegian life insurers have largely invested in corporate bonds of good credit quality. At end-September 2023, just over 80 per cent of these investments were in corporate bonds rated by a credit rating agency. This proportion has remained relatively stable over time. From 2017 and up to 2022, there was a quite significant decline in the share of investments in bonds with an AAA rating (chart 45), while the share of bonds with a BBB rating increased. This may be a reflection of the low interest rate level and the search for yield. So far in 2023, the decline appears to have slowed and to be partly reversed.

Limited liquidity risk for Norwegian life insurers

In principle, life insurers' liquidity risk is limited. Norwegian life insurers generally have long-term pension obligations without redemption rights for policyholders, and their liquidity needs are normally largely covered by current premium payments. Liquidity risk may be higher for non-premium-paying schemes such as paid-up policies. Following the substantial decline in the krone exchange rate after the outbreak of the Covid-19 pandemic, liquidity risk arose among life insurers and mutual funds linked to the furnishing of collateral for derivative contracts.¹⁴

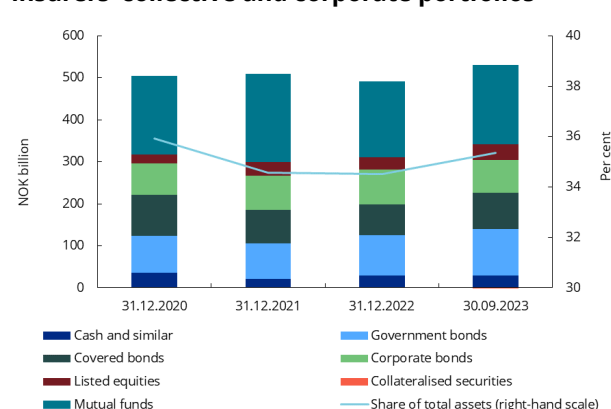
As pension obligations are generally of a long-term nature, a substantial portion of life insurers' investments are less liquid securities and assets. In the current market situation with rising interest rates, the value of liquid fixed-income investments has decreased, which also affects liquidity. Overall, Norwegian life insurers' liquidity ratio¹⁵ weakened slightly through 2021 and 2022 but has improved somewhat in 2023 (chart 46).

Chart 45 Life insurers' investments in corporate bonds in different risk classes



Source: Finanstilsynet

Chart 46 Investments in liquid assets in life insurers' collective and corporate portfolios



Source: Finanstilsynet

EXTREME WEATHER POSES CHALLENGES FOR NON-LIFE INSURERS

Figures from the Norwegian Natural Perils Pool show extensive natural damage in 2023. Partly owing to the extreme weather 'Hans' in August and appreciable damage following a landslide in Halden in April, 2023 will be the most expensive year for the natural disaster insurance scheme¹⁶ since it was established in 1980. Calculations from the Norwegian Natural Perils Pool show that the extreme weather 'Hans' has resulted in claims payments of approximately NOK 1.4 billion. Other water damage is covered by the insurers' ordinary schemes and is estimated to represent some NOK 600 million.¹⁷ In addition, 'Hans' caused significant damage to infrastructure, which is covered by the central government. The subsequent torrential rain in Eastern Norway also contributed to pushing up claims payments for non-life insurers. Non-life insurers' insurance result totalled NOK 3.9 billion in the first three quarters of 2023, down from NOK 7.8 billion in the year-earlier period.

¹⁴ For a more detailed description of liquidity risk in the derivatives markets, see chapter 4 in [Risk Outlook December 2020](#).

¹⁵ Measured by the share of liquid assets in the collective and corporate portfolios in per cent of total assets in these portfolios. See [EIOPA's Financial Stability Report, June 2023](#) for a more detailed description of the method applied.

¹⁶ See a further account of the natural disaster insurance scheme in the theme chapter 'Climate risk and financial institutions' in [Risk Outlook June 2019](#).

¹⁷ [Weather and water damage record in August \(finansnorge.no\)](#) (in Norwegian only)

A more challenging reinsurance market results in higher claims for own account

In the recent period, the global reinsurance market has been changing, and the renewal of reinsurance contracts for 2023 was far more demanding for Norwegian non-life insurers than in previous years. Rising losses from natural damage, heightened geopolitical uncertainty and weaker profitability in the reinsurance industry are cited as reasons for increased risk aversion among reinsurers. As a result, non-life insurers are now generally offered less favourable terms and conditions and/or reduced protection compared with previous years. Non-life insurers use reinsurance to varying degrees as a risk-mitigating measure, but for a number of these, claims for own account have increased so far in 2023. Some undertakings have also had to accept the use of reinsurers with lower ratings.

SPECIAL TOPIC: COMMERCIAL REAL ESTATE

On average, Norwegian banks are heavily exposed to the commercial real estate (CRE) sector, and a number of banks have far higher exposures than the average bank. Losses on CRE loans have been low since the banking crisis more than 30 years ago. The Norwegian commercial real estate market also fared well through the global financial crisis in 2008–2009. In the years after the financial crisis, low and declining interest rates and the search for yield contributed to pushing up CRE prices and elevating the debt of CRE companies.

Partly owing to the rapid and sharp increase in interest rates since the summer of 2021, the net rental income of several CRE companies now does not cover their interest expenses. In addition to weaker debt-servicing capacity, they experience a decrease in value of a number of commercial properties. In the current situation, however, there is considerable uncertainty surrounding commercial property valuations, partly as a result of the low transaction volume so far this year.

The yield on commercial real estate has increased far less than the interest rate level, which means that there is currently no risk premium in the market. Fixed-income market participants and forecasters do not expect interest rates to fall appreciably over the coming years, which may indicate that the yield could increase. All else equal, this may result in further property write-downs.

Sharp deterioration in CRE companies' profits

Higher rental income and very low borrowing rates were key factors behind the generally good results for 'Renting own or leased real estate' (commercial real estate) in the years after the financial crisis and up to 2021 (chart 47). In listed CRE companies, property revaluations also helped generate sound profits.¹⁸ The positive trend continued into 2022, but then suddenly reversed in consequence of the sharp rise in borrowing rates. This increase, and expectations that interest rates will not fall appreciably for several years, contributed to considerable uncertainty about property values.

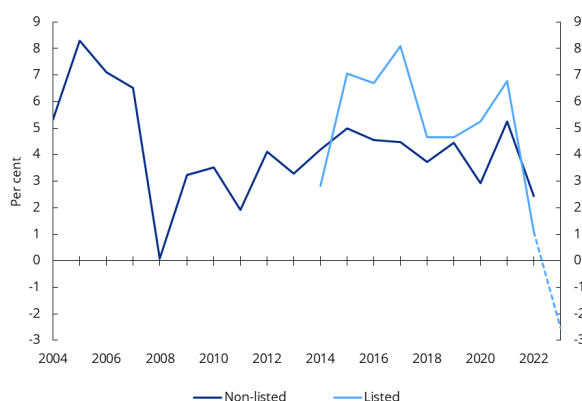
Listed companies wrote down property values towards the end of 2022 and made further downward adjustments during the first three quarters of 2023. This has had a negatively impact on profits. A similar development is also likely for non-listed CRE companies, although write-downs of property values will probably not have the same impact on their accounts.¹⁹

Interest expenses are usually the clearly largest cost element for CRE companies. Net rental income as a share of net interest expenses (interest coverage ratio – ICR) is therefore a key figure which inter alia is used by credit rating agencies. If the ICR is lower than 1, it means that rental income does not cover net interest expenses. Over time, net rental income must cover interest expenses, instalment payments, self-financing of investments, taxes and dividends. There is no set answer to how high this ratio should be, but credit rating agencies (such as Moody's, S&P and Fitch) often set a minimum ICR requirement which must be met by the company in order to be categorised as investment grade.

¹⁸ Listed companies keep accounts in accordance with the international accounting standard IFRS, which entails that the assets must be recorded at 'fair value'.

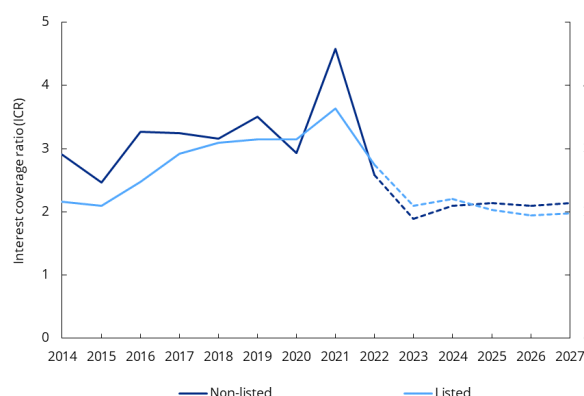
¹⁹ Most non-listed companies keep accounts in accordance with Norwegian accounting standards. This means, among other things, that if the property is assumed to be subject to a *permanent* decline in value, it must be written down by the estimated decline in value.

Chart 47 Profit after tax in per cent of total book assets (total return). 2004–2023. 'Renting of own or leased real estate'



Listed CRE groups are assumed to show the same development in the fourth quarter of 2023 as in the fourth quarter of 2022. Sources: Finanstilsynet and the listed groups' annual and interim reports

Chart 48 Interest coverage ratio (ICR) 2014–2022 and projections for 2023–2027. 'Renting of own or leased real estate'



Sources: Finanstilsynet and the listed groups' annual and interim reports

For some CRE companies that have issued bonds, the minimum requirement appears to range between approximately 1.5 and 2.5).²⁰ In addition, a loan-to-value (LTV) ratio requirement is often set (debt as a share of the property's estimated value). In order to obtain an investment grade rating, CRE companies must often have an LTV ratio of maximum 55 to 60 per cent. Banks' lending terms generally include requirements concerning profitability and financial strength, but these are normally not publicly known.

In 2022, there was a sharp decline in the ICR for both listed and non-listed CRE companies (chart 48). Finanstilsynet has made a technical projection of the CRE companies' ICR based on the assumption that rental income is inflation-adjusted and that interest expenses follow the path in the baseline scenario in Finanstilsynet's stress test from June 2023.²¹ According to the projections, the ICR will decline further in 2023 and thereafter remain stable at around 2 until the end of 2027.

Short periods with a low ICR may not necessarily be critical for the company. However, if the ICR remains low for a longer period, the company may have to raise new equity. An ICR below the minimum requirement for an investment grade rating may present immediate and significant challenges for the company, since many investment funds, pension funds and the like have internal guidelines according to which they cannot invest in bonds with a credit rating below investment grade. Refinancing of the debt may thus be difficult, and where refinancing is possible, the lending rate will be high.

CRE companies with a low ICR accounted for a substantial share of the industry's total interest-bearing debt in 2022 (chart 49). In the technical projections (see above), this share increases further and remains at a high level until year-end 2027. The share of interest-bearing debt in CRE companies whose net rental income does not cover net interest expenses increased from approximately 7 to 14 per cent from 2021 to 2022. In the projections, this share will increase to about 23 per cent in 2023 before declining somewhat and remaining at just over 20 per cent during the remainder of the projection period.

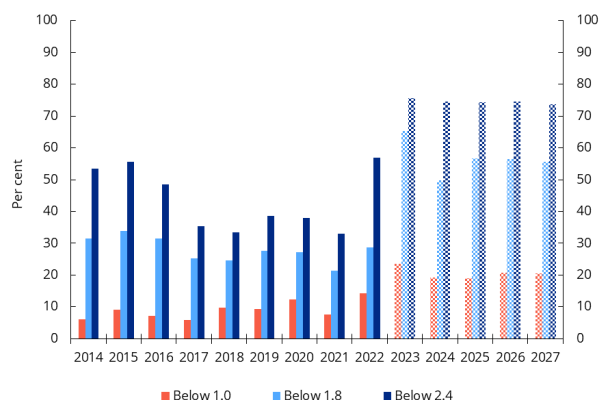
If a company has an ICR below 1, it does not necessarily mean that it *actually* does not meet its payment obligations. Default can be avoided if the company, for example, has sufficient liquid funds, raises new debt

²⁰ A 'non-investment grade' rating often entails a higher risk premium on the bonds or restrictions on the size of the bond issue, as many investment funds and the like are not permitted to invest in non-investment grade bonds.

²¹ Please note that this is only a technical projection based on the above-mentioned assumptions and *does not* represent Finanstilsynet's forecasts or expectations concerning developments in CRE companies.

and/or is supplied with new equity. If the ICR does not reach an acceptable level, the company will eventually probably fail to meet its debt obligations.

Chart 49 Interest-bearing debt of groups with an ICR below 1.0, 1.8 and 2.4, respectively, in per cent of the sector's total interest-bearing debt. 2014–2022 and projections for 2023–2027. 'Renting of own or leased real estate'



Sources: Finanstilsynet and the listed groups' annual and interim reports

The figures for the years prior to 2014 are uncertain. However, available figures indicate that the interest-bearing debt of CRE companies with a low ICR in per cent of the sector's total interest-bearing debt increased sharply prior to the financial crisis in 2008–2009. This share fell relatively rapidly in the wake of the financial crisis due to factors such as reduced interest rates and increased demand and greater willingness to pay among tenants in general.

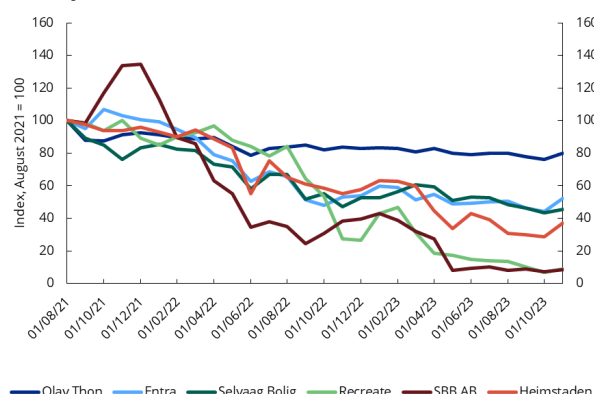
Key forecasters do not expect interest rates to fall appreciably over the coming years. It therefore cannot be ruled out that some of the current tenants will have problems servicing their rental costs, or that new or renegotiated leases replacing contracts that expire over the next few years will be less favourable for lessors than existing leases. If there is a reduction in CRE companies' rental income *parallel to* an increase in interest expenses, developments will be far more negative than shown in charts 48 and 49.

Commercial real estate also includes 'Buying and selling of own real estate' and 'Development of construction projects'. The two sub-sectors, as defined herein and based on the current sample, account for approximately 13 and 10 per cent, respectively, of the total interest-bearing debt of CRE companies. In the past, the total return (net annual profits in per cent of total book assets) for 'Buying and selling of own real estate' and 'Development of construction projects' has been somewhat more volatile than the total return on 'Renting of own or leased real estate' (chart 47). Over time, however, the total return of the three sub-sectors has followed roughly the same path (not shown in the chart). As an example, the total return of the two above-mentioned sub-sectors also fell sharply during the financial crisis and in 2022.

The stock market's valuation of real estate

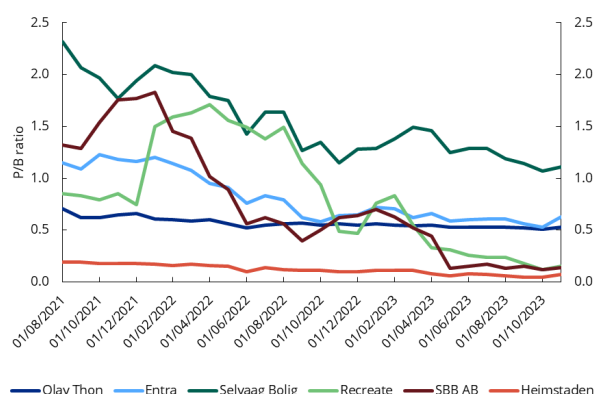
The share prices of many real estate companies in Norway and Sweden rose sharply in the years before the central banks started to raise their policy rates. Since the first policy rate increases in September 2021, the share prices of several real estate companies have fallen dramatically (chart 50). On average, the share prices of real estate companies included in the chart fell by 61 per cent from August 2021 to November 2023.

Chart 50 Developments in listed CRE companies' share prices



Last observation: November 2023. Source: Refinitiv

Chart 51 Listed CRE companies' price/book ratio



Last observation: November 2023. Source: Refinitiv

The price/book ratio (P/B ratio) is defined as the market value of a company's shares relative to the book value of its equity. A ratio of less than 1 implies that stock market participants consider the company's equity to be worth less than book value. Several CRE companies have experienced a marked decline in their P/B ratios since the policy rate hikes started, and their shares are now trading at an appreciable discount to book value (chart 51).

Valuation of commercial real estate

In Norway, commercial properties are valued by a few major market players. The valuations are often based on the rental income generated by the property. Gross rental income is adjusted for the total cost of ownership, such as insurance, maintenance and upgrades. Leases usually include an annual inflation adjustment clause. Valuations are frequently based on the assumption that net rental income is a perpetual cash flow, and property values are estimated on the basis of expected rental income and the yield on the property.

The fact that neither the market price nor investors' yield are directly observable variables represents a challenge. Based on estimated rental income and yield, market participants can prepare a valuation. Given an observed price (market transaction) and an estimate of expected rental income, market participants can calculate a yield.

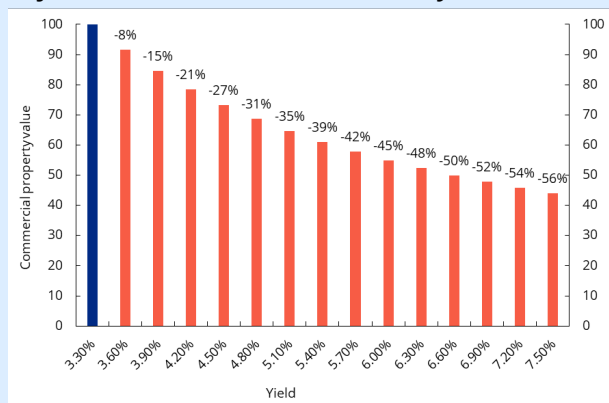
For the best properties, the yield is referred to as 'prime yield'. If the yield is based on completed transactions, it will take time, during periods with few or no transactions, before changes in investors' required rate of return (yield) is reflected in the yield.

There has been a high degree of uncertainty about the level of inflation and future interest rates since spring 2022. As leases are usually inflation-adjusted, higher inflation will generally result in rising rental income. When renegotiating leases, a new rent is agreed between the lessor and the tenant. Higher inflation also leads to rising interest rates and greater uncertainty about future rental income and yields. There is also considerable uncertainty in the valuation process. The assumption of a perpetual cash flow makes the valuation sensitive to changes in both the yield and rental income.

Charts 52 and 53 illustrate, through a stylised example, how sensitive and vulnerable the commercial real estate market is to changes in the yield. The example shows a property purchased at a yield of 3.3 per cent, with net rental income of 3.3, which gives a value of 100. If the yield increases by 1 percentage point, the value of the property will be reduced by 23 per cent, all else equal. In practice, recorded property values

probably do not fully reflect higher interest rates and elevated risk premiums due to an inherent slowness in market participants' value adjustments.

Chart 52 Valuation of commercial real estate – stylised example without rental income adjustment. Decline in value as the yield rises



Source: Finanstilsynet

Chart 53 Valuation of commercial real estate – stylised example with rental income adjustment. Changes in value as the yield rises

	Percentage increase in net rental income				
	5%	10%	15%	20%	25%
Yield					
3.6 %	-4%	1%	5%	10%	15%
3.9 %	-11%	-7%	-3%	2%	6%
4.2 %	-18%	-14%	-10%	-6%	-2%
4.5 %	-23%	-19%	-16%	-12%	-8%
4.8 %	-28%	-24%	-21%	-18%	-14%
5.1 %	-32%	-29%	-26%	-22%	-19%
5.4 %	-36%	-33%	-30%	-27%	-24%
5.7 %	-39%	-36%	-33%	-31%	-28%
6.0 %	-42%	-40%	-37%	-34%	-31%
6.3 %	-45%	-42%	-40%	-37%	-35%
6.6 %	-48%	-45%	-43%	-40%	-38%
6.9 %	-50%	-47%	-45%	-43%	-40%
7.2 %	-52%	-50%	-47%	-45%	-43%
7.5 %	-54%	-52%	-49%	-47%	-45%

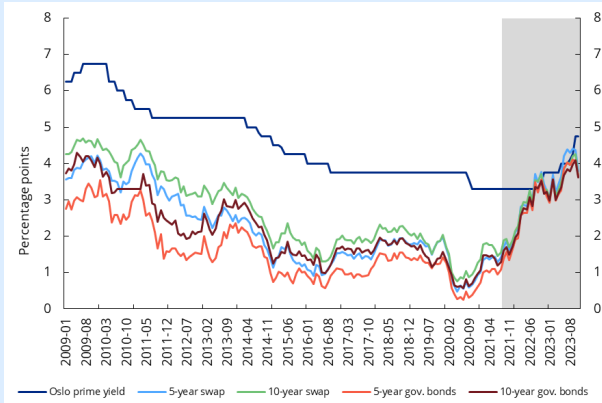
Source: Finanstilsynet

The yield on commercial property is often compared with the return on alternative investments, such as long-term government bonds. The difference between this yield and the government bond yield is a measure of the risk premium associated with CRE investments. During periods with few or no real estate transactions and in geographical areas where commercial properties are rarely traded, it is difficult to determine a yield, which makes property valuations particularly uncertain.

‘Oslo prime yield’ is the expected direct yield on the best office properties in Oslo. The index serves as a reference point in the valuation of commercial real estate. In the period after the financial crisis, the ‘Oslo prime yield’ declined from 6.75 to 3.30 per cent, mainly driven by lower interest rates (chart 54). All else equal, a halving of the yield results in roughly a doubling of the model-based property value estimate.

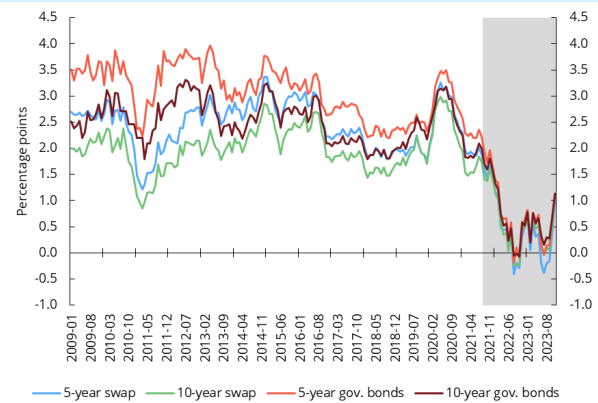
In the period after the financial crisis and up to the time the policy rate hikes started in September 2021, the average risk premium ranged between 2 and 3 per cent, depending on the interest rate used as a comparison for the direct yield (chart 55). The ‘Oslo prime yield’ has not quite mirrored interest rate developments over the past two years, and the risk premium is now at a historically low level. The yield did not begin to rise from its historically low level of 3.3 per cent until September 2022. Since then, the yield has increased by approximately 1.5 percentage points, which implies a fall in value of 31 per cent, all else equal. Inflation adjustment of rental income provides less protection against a fall in value when the yield increases from low levels (chart 53).

Chart 54 Norwegian interest rates and Oslo prime yield



The grey area shows the most recent period of policy rate hikes from Norges Bank. Last observation: November 2023. Sources: Refinitiv and Akershus Eiendom.

Chart 55 Difference between Oslo prime yield and Norwegian interest rates



The grey area shows the most recent period of policy rate hikes from Norges Bank. Last observation: November 2023. Sources: Refinitiv and Akershus Eiendom.

If the risk premium is to return to the historical average from 2009 to August 2021, the yield must increase by between 1 and 2 percentage points from the current level. All else equal, this means a further decline in value of 16 to 30 per cent for the best office properties in Oslo.

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