

## Central Bank stress test 2024 — scenarios

The Central Bank of Iceland's annual stress test is intended to evaluate financial institutions' resilience to a scenario based on a simulated economic shock. The test is a systemic one — i.e., a macroprudential stress test — with a cyclical stress scenario spanning a three-year period. It provides information useful in the formulation of macroprudential policy and in overall financial market risk assessment and supervision, including the supervisory review and evaluation process (SREP). The Bank publishes the main results of the stress test conducted on systemically important banks in the autumn issue of its Financial Stability report.

The scenarios used for the stress test are published as well, giving other parties the opportunity to use them in their own stress testing. Parties wishing to do so are advised to conduct an independent appraisal of the scenarios' suitability for their internal stress tests. The design of the stress scenario centres primarily on the risks involved in banking operations. Furthermore, the time horizon of the scenario is selected with an eye to evaluating risk in banking operations, while longer- or shorter-term scenarios may be better suited to other types of risk.

### Baseline scenario 2024

The baseline scenario is built on assumptions about economic developments in coming years as described in the Central Bank's baseline forecast in Monetary Bulletin 2023/4, with the exception of interest rates. Developments in short-term interest rates are based on the average of forecasts prepared by the three large commercial banks in late 2023, and developments in five-year interest rates are derived from the Treasury yield curve as of 29 December 2023.

### The stress scenario for 2024

The stress scenario is based on an analysis and assessment of the current state of the financial system and current risks to financial stability in Iceland (for further information, see Financial Stability 2023/2). It should be noted that the stress scenario does not represent the Central Bank's forecast of expected developments in economic variables. The time series for the stress scenario are obtained by simulation using the Bank's quarterly macroeconomic model (QMM).

The 2024 stress scenario assumes that two separate events occur during the year. The first, which is assumed to take place at the beginning of the year, is the signing of wage agreements providing for significant pay rises, resulting in more persistent inflation and calling for a steep increase in interest rates as soon as Q1/2024. The second, assumed to take place in H2/2024, involves a volcanic eruption in the ocean off Reykjanes peninsula, with volcanic ash disrupting transport to and from Iceland. Flight offerings are erratic during the eruption, which is assumed to last until January 2025. During this period, airline seat availability declines by half relative to previous expectations, and tourist arrivals in 2024 total 1,650,000 instead of the projected 2,300,000. Thereafter, it takes some time for tourist numbers to return to forecasted levels, and the summer 2025 season is well below previous expectations. The export shock hitting the tourism industry causes the positive output gap to close and a slack to open up, with inflation

falling relatively quickly in the latter years of the period and interest rates falling as well. Inflation is therefore 7% in Year 1 instead of the 5.7% provided for in the baseline forecast, but it will be back to target in 2026. Short-term interest rates rise above 10% in Q1/2024 but then decline again within the year, so that the yearly average is only 0.4% above the baseline forecast in 2024 and falls considerably below the baseline projection in the years to follow.

All of this has a detrimental effect on key asset markets. Chief among them is the commercial real estate market, where prices fall by 32% in real terms between end-2023 and 2025. Furthermore, it is assumed that hotel construction declines by an additional 10%, as the tourism sector is hit hardest by the shock. Residential property prices fall much less sharply (a 12.7% real decline from end-2023 through 2024), although stagnating residential investment supports the market to a degree. It is assumed as well that the price gap between new and older properties closes, so that homes still on contractors' and construction companies' books fall more in price than the index indicates. Share prices fall by over 29% in the first two years combined, owing to higher interest rates, a poorer economic outlook, and capital flight.

The króna depreciates by nearly 11% in trade-weighted terms in Year 1 of the scenario, as export revenues contract and capital moves from Iceland to lower-risk economies. The króna depreciates further in Year 2 but then rebounds in Year 3.

Higher financing costs and a poorer economic outlook cause business investment to contract by over 12% in Year 1, while residential investment holds broadly flat (0.3% contraction in Year 1). Public investment is unchanged relative to the baseline scenario, however, as the Government must deal with unemployment and high inflation. As a result, all discretionary measures are offset by consolidation elsewhere.

Unemployment peaks at 5.7% in 2024, but part of the labour force leaves the country, as the employment situation is not as difficult abroad. Other aspects of living standards – air quality, for example – deteriorate as well because of the volcanic eruption. Real disposable income contracts by 1.9% in 2024 despite a 10% nominal pay rise, owing to a weaker króna, high inflation, and the effects of unemployment. Real disposable income picks up strongly in Years 2 and 3, however, when economic conditions improve again.

In some cases, individual events in the stress scenario offset one another; for instance, reduced tourist numbers bring about a slack in the economy, which mitigates the inflation triggered by the wage agreements. Furthermore, the shock hits different sectors to varying degrees, so the contraction in GDP is relatively mild in Year 1, at 3.4%. The shock also passes fairly quickly, as the depreciation of the króna boosts the competitive position of the tourism sector, which can be expected to recover quickly once flight availability has normalised and job vacancies in the sector have been filled. The economic recovery is therefore relatively swift, at 5.9% in Year 2 and 5.6% in Year 3.

The contribution of net trade to GDP is negative in 2024, primarily because of a 13% contraction in services exports (which includes a 26% contraction in tourism). Goods exports contract marginally at the same time, due to generally unfavourable developments in foreign commodity market prices. The price of Iceland's key export products tumbles – in Year 1, aluminium prices fall by 15% and marine product prices by over a fifth. Total goods exports therefore contract by

3.3% in 2024 instead of growing by 2.6%. Imports contract as well, but by less than exports do during the first year. However, the drop in imports is more persistent than the contraction in exports and continues into Year 2 of the stress scenario, while exports start to grow, with the associated positive impact on GDP growth.

Access to financing is not assumed to decline, but spreads on corporate bond issues and bank funding are expected to widen, to 150 basis points on CPI-indexed domestic market funding and 200 basis points on non-indexed funding. Premia on the banks' foreign funding are 550 basis points above reference interest rates, while the spread on Icelandic Treasury bonds issued in foreign currency is 100 points above the general interest rate level.