

Þjóðhagur

Economic Forecast for 2018-2021

October 2018



Moderate growth ahead

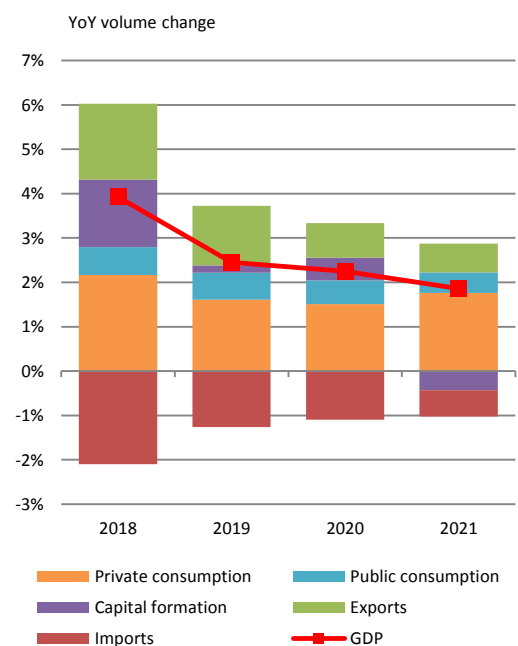
Following a long period of robust growth alongside low and stable inflation, the outlook is for a sharp cooling of economic growth in coming years and rising inflation. The economic outlook is nevertheless positive as moderate yet continuous growth is expected throughout the forecast period. The inflation outlook on the other hand has deteriorated sharply as the ISK exchange rate has weakened and import prices have risen alongside growing domestic cost pressure.

The current growth period is in its eighth year and the outlook is for continued positive economic growth throughout the forecast period to year-end 2021. We expect to see economic growth of around 3.9% this year, driven by growth in private consumption, export and investment. We forecast moderate, continuous growth in private consumption throughout the entire forecast period. The contribution from industrial investment will on the other hand be neutral this year and negative the following three years. We expect to see quite powerful investment in residential housing and public investment throughout the forecast period. We also expect around 3% annual growth in public consumption during the forecast period and its contribution to economic growth will as a result be positive the entire forecast period. All in all, annual economic growth as of next year will be around 2% throughout the forecast period. This is comparable to the average growth expected in developed countries in coming years.

Deteriorating inflation outlook

The inflation outlook has deteriorated somewhat since we published our updated macroeconomic and inflation forecast for the period to 2020 in May. We now forecast more inflation and expect it to stay above the Central Bank's target throughout the forecast period.

Contribution to economic growth



Source: Landsbankinn Economic Research

The key drivers of a bleaker inflation outlook are the sharp depreciation of the ISK and rising import prices. Fuel prices weigh heavily in this equation. There is rather more uncertainty in the inflation forecast than often before. This is due to the fact that it is neigh on impossible to accurately predict the ISK exchange rate and oil prices. Increased fluctuations in the ISK exchange rate and oil prices certainly do not simplify matters. There is also a great deal of uncertainty about the outcome of looming collective bargaining talks. A general outcome raising wages far in excess of productivity growth will, all other things remaining equal, lead to an even worse inflation outlook than we assume here.

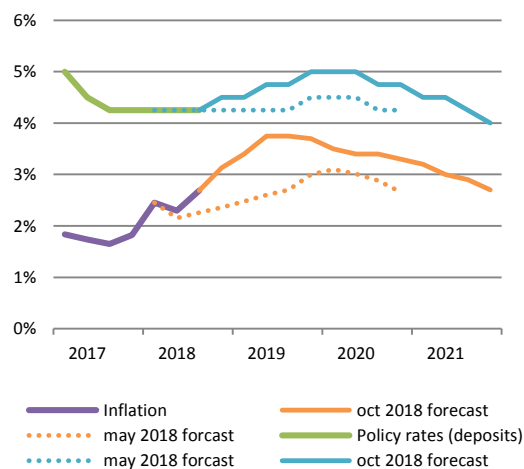
Having regard for all of the above, we expect inflation to rise somewhat next year and to peak at 3.75% around mid-2019.

Monetary Policy Committee in a bind

Following a rather uneventful and peaceful period in monetary policy management in recent years, for the most part in the shelter of capital controls, the Monetary Policy Committee of the Central Bank of Iceland now faces a certain challenge. Inflation has risen above the CBI's target, following a four-year term of stable inflation just at or under target. Rising inflation in the past few months can first and foremost be traced to price increases on imported goods, caused by a weakening ISK and significant increases in oil prices. High confidence in the CBI would be evidenced by a stable 5-10 year inflation outlook near target, despite temporary inflation spikes caused by factors outside the CBI's control. If this were the case, the CBI could disregard temporary inflation increases and maintain unchanged policy rates. If inflation expectations remain high, or even increase further, the MPC will need to respond by raising policy rates to counteract so-called second-round effects from a weaker ISK and rising oil prices.

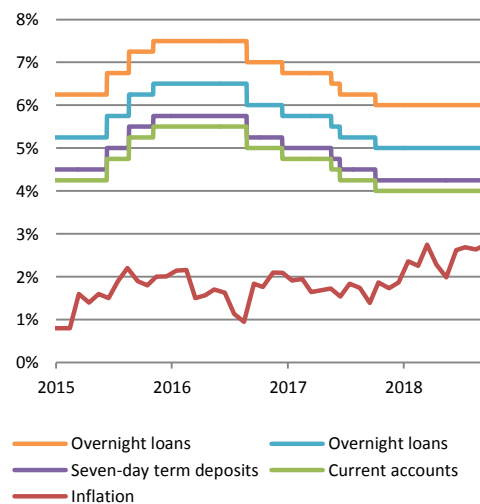
Rate hikes would be rather inopportune at the moment, due to these developments. The economy is just moving out of a period of great growth and a considerable output gap into a new period of moderate growth and closing output gap. Under

Inflation and policy rate



Heimild: Hagstofa Íslands, Seðlabanki Íslands,

CBI interest rates



Source: CBI

normal circumstances, i.e. with inflation securely anchored to the 2.5% target, the MPC would most likely be readying to lower rates to counteract declining economic tension.

There are two scheduled rate-decision meetings left this year, in November and December. We deem it likely that the MPC will raise the CBI's rates by 0.25 percentage points at one of these meetings and that the CBI's key rate, i.e. the seven-day term deposit rate, will be 4.5%. We consider it unlikely that a 0.25 point hike will suffice to pressure inflation expectations down toward the target and, as a result, that further rate hikes, by 0.5 percentage points, can be expected next year.

The effect of these rate hikes alongside increased slack in the economy should materialise fully in the latter half of the forecast period. Inflation can be expected to slow moving farther into the forecast period and to trend back down to target as we near its horizon.

Future indeterminate as always

Economic forecasts are always subject to a high degree of uncertainty about numerous domestic and foreign factors. Uncertainty in the current forecast is high, not least as regards the inflation outlook. This is due among other things to uncertainty about the ISK exchange rate, questions about the security of inflation outlook foundations and outcome of pending collective bargaining talks. As regards the outlook for the economy, uncertainty is tied to developments in the travel industry in coming years. It is also unclear to what extent the government will utilise the window of opportunity now opening to launch public investments that have been on hold in recent years due to the high economic tension.

Finally, a number of international factors, outside of the influence of the Icelandic economy, such as economic developments in main trading partner countries, and fluctuations in oil prices and other commodities, could have a considerable influence on both the inflation and economic outlook in Iceland.

Overview of macroeconomic forecast of Landsbankinn Economic Research.

GDP and key components	ISK bn	Volume change from previous year			
	2017	2018	2019	2020	2021
Gross Domestic Product	2.615	3.9 (4.1)	2.4 (2.4)	2.2 (2.4)	1.9
Private consumption	1.316	4.3 (5.5)	3.2 (3.5)	3.0 (3.5)	3.5
Public consumption	610	2.7 (2.5)	2.6 (2.0)	2.3 (2.0)	2.0
Capital formation	582	6.9 (7.4)	0.8 (5.1)	2.3 (2.3)	-1.9
Industrial investment	401	0.1 (1.8)	-2.8 (0.9)	-2.4 (-2.5)	-6.7
Investment in residential housing	98	25.0 (20.0)	5.0 (15.0)	10.0 (10.0)	5.0
Public sector investment	83	18.0 (19.0)	10.0 (10.0)	10.0 (10.0)	5.0
Total national expenditure	2.508	4.5 (5.2)	2.5 (3.5)	2.7 (2.9)	1.9
Exports of goods and services	1.206	3.7 (4.9)	2.9 (2.6)	1.7 (2.9)	1.4
Imports of goods and services	1.099	5.0 (7.4)	3.0 (5.0)	2.6 (4.0)	1.4

Policy rates and inflation	2017	2018	2019	2020
Policy rates (year-end, %) - lending rates	5.25 (5.00)	5.75 (5.25)	5.50 (5.00)	4.75
- interest rate on deposits	4.50 (4.25)	5.00 (4.50)	4.75 (4.25)	4.00
Inflation (annual average, %)	2.6 (2.3)	3.7 (2.7)	3.4 (2.9)	2.9
EUR exchange rate (annual average)	127 (122)	137 (120)	139 (121)	139
Real estate prices (change in annual average, %)	4.3 (5.2)	4.0 (6.0)	6.0 (6.0)	8.0

Labour market	Annual average			
	2018	2019	2020	2021
Purchasing power of wages (change from previous year, %)	3.6 (4.9)	1.1 (3.1)	0.9 (1.9)	1.3
Unemployment (% of labour force)	2.2 (2.1)	2.7 (2.1)	3.0 (2.2)	3.0

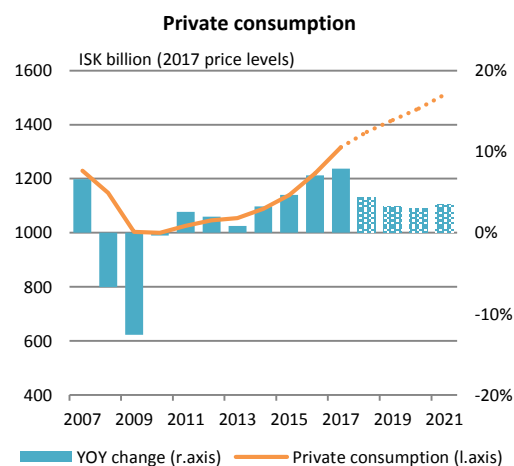
Trade balance	% of GDP			
	2018	2019	2020	2020
Goods and services balance	1.7 (3.1)	1.2 (2.8)	0.8 (2.3)	0.8
Trade balance	1.2 (2.7)	0.7 (2.4)	0.3 (2.0)	0.3

Numbers in brackets are from Economic Research's May 2018 forecast

Private consumption slowing down

Private consumption received a significant boost last year, growing by 7.9%. This growth slowed down somewhat in H1 2018 yet remains 5.3%, according to figures from Statistics Iceland. The outlook is for an even sharper slow-down in H2 and we expect private consumption growth for the entire year 2018 to be around 4.3%.

All signs point to a levelling out of the growth rate of private consumption. Growth will nevertheless remain robust this year, then cool down considerably in coming years. This is due first and foremost to economic expansion slowing down and slightly rising unemployment levels. The influx of



2018-2020 is the forecast of Landsbankinn Economic Research
Source: Statistics Iceland, Landsbankinn Economic Research

foreign nationals will as a result decrease and the purchasing power of wages decline in the coming three years as compared to the previous, and unprecedented, three years. The favourable asset position of households and low indebtedness on the other hand will continue to support growth.

Our forecast assumes 3.2% growth in private consumption next year, 3.0% in 2020 and 3.5% in 2021.

Indications of a more balanced labour market

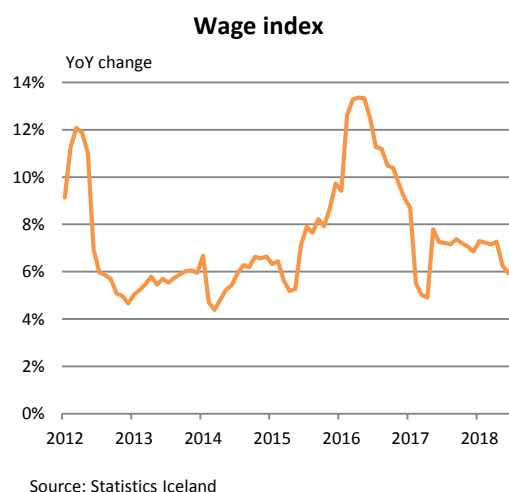
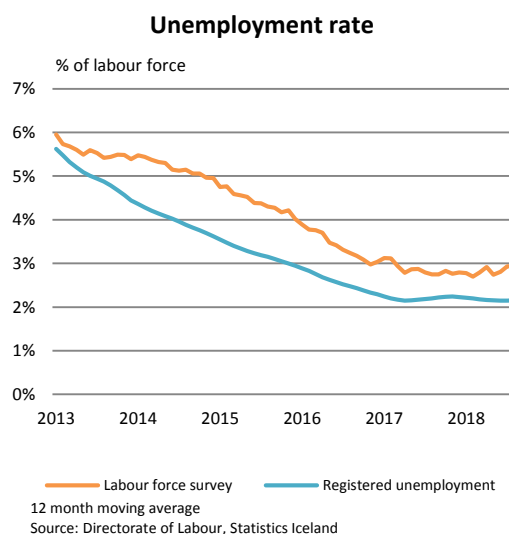
Unemployment levels have fallen steadily in recent years. This development is now slowing down, as unemployment levels have become extremely low. According to figures from the Directorate of Labour, the average 12M unemployment rate was 2.2% in August of this year, which is the same as last year. Unemployment appears to have bottomed out and is unlikely to decrease further.

Working hours increased slightly in August as compared to the same period last year. The 12M average shows that working hours have held very steady in recent months at around 39 hours.

A comparison of figures for Q2 2017 and 2018 shows that working hours have shortened by 0.7% while the number of employed persons increased by 1.3%. This means that total working hours increased by 0.6% during the period. In Q1, total working hours increased by 2.3%. While the labour market has quietened down in recent years it still appears robust.

Wages continue to rise, though at a reduced tempo

The wage index decreased by 0.1% between July and August; the first decrease since December 2013. In August, the wage index had risen 6% in total over the past 12 months. The annualised wage increase has been fairly steady at just over 7% for a year but dropped to and has remained around 6% since May. The main reason for a lower annualised change of the index is that wage changes in May of this year were less pronounced than last year, which saw incremental wage increases as provided for by collective bargaining agreements both years.



There has been a significant slow-down in purchasing power growth and purchasing power has remained fairly steady since mid-year 2017. Prices rose by a meagre 0.5% in May and June combined and, as a result, purchasing power jumped by 2.4% between April and June. Purchasing power was 3.3% higher in August than last year. Since the beginning of 2015, the purchasing power of the wage index has grown by over 25%, or by 7% annually. This is a remarkable increase, both historically and compared to other countries.

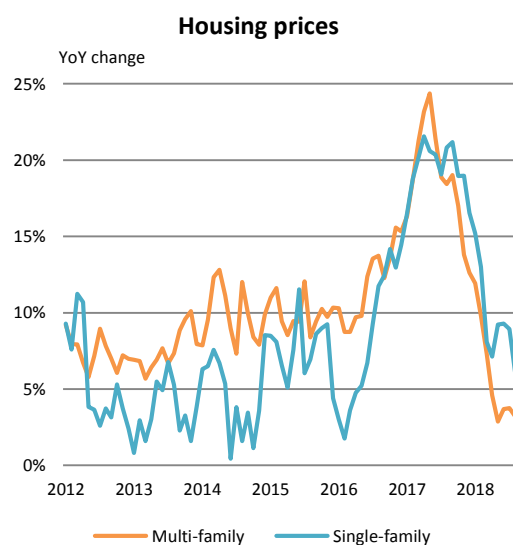
Most domestic bargaining agreements expire between year-end 2018 and March 2019. The collective bargaining agreement of the Icelandic Federation of Labour and the Confederation of Icelandic Employers expires at the end of the year. The contract period that is coming to a close has been unusual in that all aims of the agreements for purchasing power growth and stability have been achieved; the growth of purchasing power during the period has been singular.

One would be forgiven for assuming that the parties were content with the status of wages and work conditions, yet this is not the case. The demands made at the outset of negotiations are the highest in decades and are directed at both employers and the National Treasury. Recent decisions by the Senior Civil Servants Salary Board have caused significant upheaval.

Public debate and declarations on wage affairs has been rather harsh lately and the parties clearly have their work cut out for them. We may see some labour disputes in the connection with the coming collective bargaining process.

More peaceful real estate market

The rise of real estate prices has cooled considerably in recent months. The total increase in housing prices in the capital area was 3.9% in the 12M period ending in September 2018 and the increase hasn't been slower since spring 2011. In September, the price of multi-family dwellings had risen by 3.4% in the past 12 months and single-family dwellings by 4.4%. This market has cooled down significantly following much commotion lasting until mid-2017.



Source: Registers Iceland, Statistics Iceland

No great change is foreseeable here. Increased supply and the sale of new apartments can be expected to maintain current price levels and uncertainty about collective bargaining agreements in coming months is likely to keep the market calm. Once that uncertainty is resolved, the real estate market can be expected to trend back to long-term conditions.

Economic Research forecasts a 4.3% increase in real estate prices this year, 4% next year and an increase of 6% in 2018 and 8% 2021.

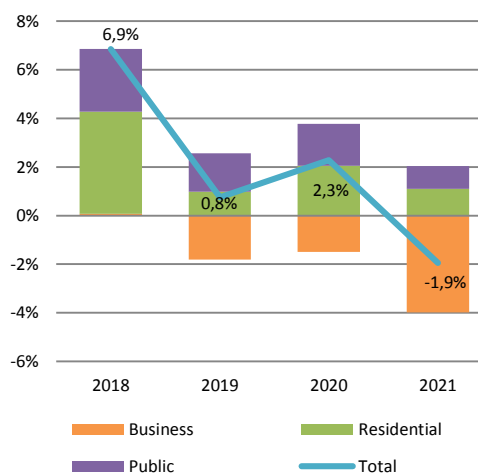
Slow capital formation growth in coming years

Investment has increased appreciably over the past years parallel to economic recovery. Investment is the most volatile item in the national accounts, growing proportionally fast in growth periods and contracting as fast during downswings.

Last year, total capital formation in the economy increased by 9.5% which is rather less than in the previous three years, when growth ranged between 16-22%. Decreased capital formation growth is due largely to slower growth in industrial investment. Industrial investment growth was just over 4.8% as compared to 17-31% in the previous three years. In the first half of 2018, industrial investment growth was 5.6%, which corresponds nicely to last year's growth. This indicates that the main thrust of investment growth during this upswing is over.

The drivers of capital formation in Iceland in coming years will be housing investment and public sector investment with a negative contribution from industrial investment in the coming three years. We expect total capital formation in the economy to be 6.9% this year, carried almost entirely by growth in public investment and housing investment. In the next two years, capital formation will lie between 0.8-2.3%, strongly affected by a negative contribution from industrial investment. In the final year of the forecast period, we expect capital formation to contract by 1.9% with the negative contribution from industrial investment outweighing both housing investment and public investment.

Capital formation and contribution of main components



Source: Landsbankinn Economic Research

Slower export growth

Total exports increased by 5.5% last year. This is rather less growth than in the previous two years, when it ranged between 9.1-10.9%.

We expect exports to increase by 3.7% this year and for growth to be driven by passenger transport in the travel industry.

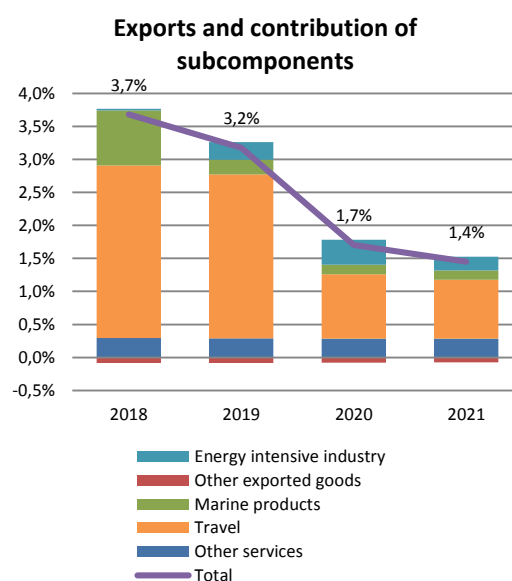
Growth in tourist arrivals slows significantly

We expect tourist arrivals in Iceland to increase by 6% this year and by 2% in 2019-2021. This growth is rather less pronounced than the historic average of 10%.

The contribution from travel will presumably be lower this year and in coming years, as compared to previous years. Export growth will continue to slow down in 2019, with passenger transport remaining the key driver. The contribution from travel will decrease somewhat. Export growth will continue to slow down in 2020 and 2021. We expect 1.7% growth in 2020 and 1.4% growth in 2021. Limited growth is expected in the travel industry the last two years, both in travel and passenger transport.

The greatest uncertainty factor in the export growth forecast for coming years lies in the growth of the travel industry. While certain new areas of growth have emerged in other sectors, such as in aquaculture, they are relatively insignificant and will not manage to have a material impact on total export growth in the period. The only factors significant enough to affect the forecast are the other two export pillars; heavy industry, and fisheries and seafood. Growth potential in these two sectors is rather limited. Boosting the contribution of heavy industry to export growth would necessitate considerable investment. We do expect the contribution of heavy industry to export growth to remain positive throughout the forecast period. This is achieved through recent construction and expected development in coming years.

The contribution from fisheries and seafood will be considerable this year due to improved cod catches, as compared to last year. Moderate growth in the export of marine products is also expected in 2019-2021.



Source: Landsbankinn Economic Research

Public consumption increases in coming years

The 2019 fiscal budget provides for a 6.9% increase in total public expenditure as compared to the previous year and a 6.1% net increase in Treasury revenues. As a result, the overall balance will be only 1% of GDP, lower than the 1.2% objective of previous years. The outlay growth is at the upper reaches of what is possible, as the Financial Stability Council has repeatedly pointed out.

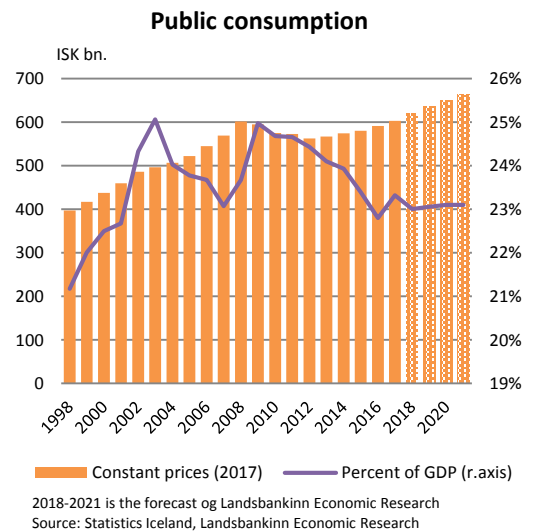
The operating outcome of Group A municipal operations is estimated to have been positive by 1.2bn in 2017. The fiscal budget assumes a positive operating outcome of 0.1% of GDP this year and 0.2% of GDP in 2019. In the years to come, a steady surplus of around 0.2% is expected.

Public consumption increased by 3.1% in 2017 and its weight in GDP increased for the first time since 2009. Public consumption has increased steadily in recent quarters from both state, municipalities and social security, with a stable increase at municipality level.

Economic Research considers it unlikely that public consumption expenses can be controlled to the proposed extent. As mentioned above, public consumption is estimated to have increased by 3.1% in 2017, despite aims for rather less. We consider public consumption likely to grow at similar rates, or just shy of GDP growth. As a result, we expect public consumption to increase by 2.9% this year, with increased outlay to health services, social security, insurance and housing weighing heavily. Public consumption will then increase by 2.6% in 2019, driven among other factors by continued expenditure increases to the aforementioned sectors and the National Treasury's part in collective bargaining agreements. We expect the pressure on Treasury expenditure to lessen in 2020 and 2021 with an increase in public consumption by 2.3% and 2.0% those years.

Economic outlook in main trading partner countries unchanged since May

The International Monetary Fund's October forecast assumes rather slower economic growth in Iceland's main trading partner countries this year than what the IMF expected in April. The IMF now assumes an



average economic growth in main trading partners of 2.3%, down from 2.6%. The forecast for 2019 has also been downgraded from 2.3% to 2.2%.

The key contributing factor lowering the forecast since April is developments in the Eurozone, which accounts for around half of Iceland's total international trade. Economic growth in the Eurozone is now expected to be 2% this year as compared to the 2.4% forecast in April. The economic forecast for next year has also been downgraded from 2% to 1.9%.

Inflation picked up in Iceland's main trading partner countries last year following a period of low inflation in 2014-2016. Inflation reached 1.7% last year after having ranged between 0.5-1% in 2014-2016.

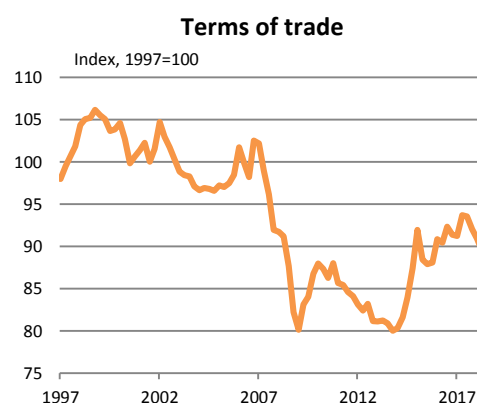
The IMF has made negligible changes to its inflation forecast for Iceland's trading partner countries, assuming around 1.9% inflation this year and next.

Trading terms continue to weaken

Following exponential improvement in 2014 and 2015, Iceland's trading terms have declined in the most recent years. They continued to grow less favourable in H1 of 2018 as compared with averages for the year 2017. The main reason for the erosion of trading terms this year and last is the great increase in world oil prices; conversely, a decrease in oil prices accounted for improved trading terms in 2015. Counteracting the negative impact of oil price increases on trading terms are rising aluminium prices. Last year, aluminium prices increased by 23% between years and this year to date, the average aluminium price has been 9.3% higher than last year.

Forecasts unanimous for continuing economic growth and increasing inflation

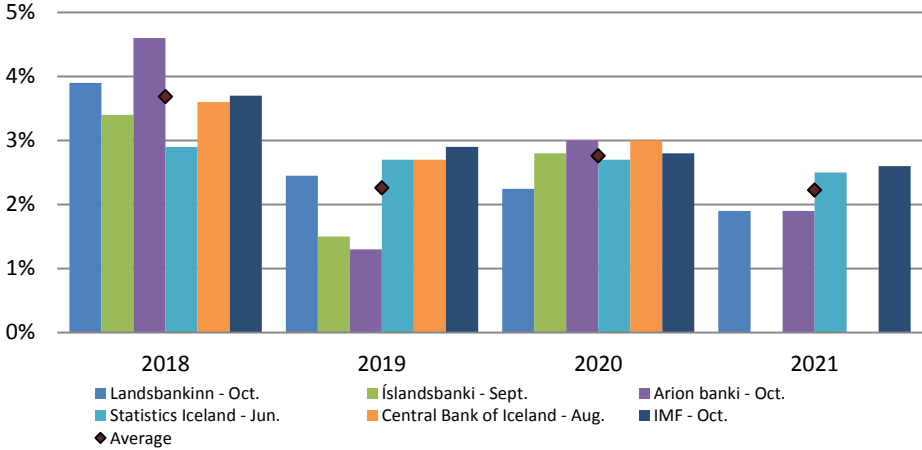
Economic Research's forecast for the next three years assumes 2.2% average economic growth during the forecast period, which is rather less than what the CBI has predicted for the next two years. The CBI's August forecast expects 2.9% average economic growth in 2019 and 2020. The most recent forecast from Statistics Iceland is for a three-year period and assumes 2.6% average economic



Terms of trade from national accounts, quarterly numbers
Source: Statistics Iceland, Economic research

growth for the years until 2021. Arion Bank forecast 2.7% average economic growth for the next two years while Íslandsbanki's September forecast assumes 2.2% average growth for the same period.

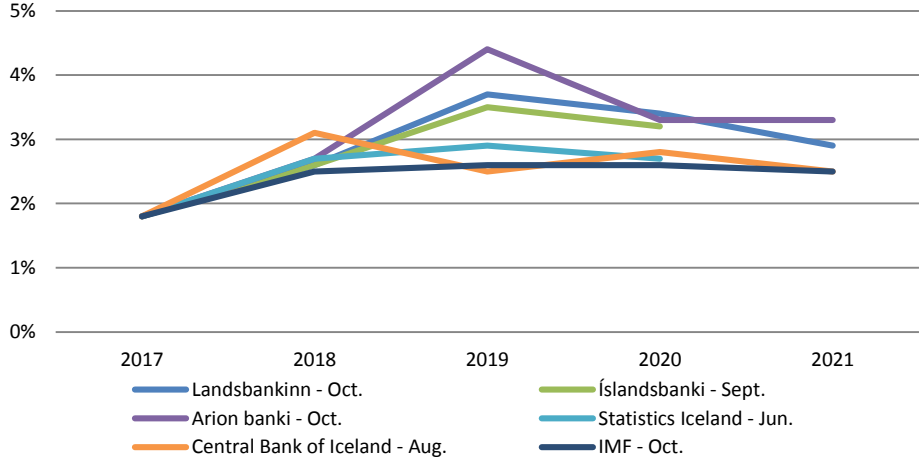
Economic growth forecast - Comparison



Source: Landsbankinn, Íslandsbanki, Arion banki, Statistics Iceland, Central Bank of Iceland, International Monetary Fund

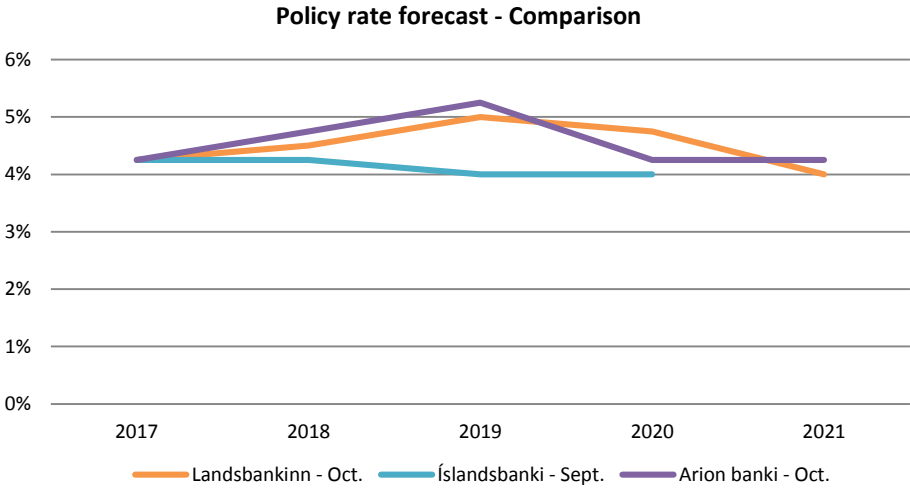
Inflation forecasts from all key analysts are also more or less attuned. All forecasts, with the exception of the CBI's August forecast and the IMF's forecast, expect inflation to hover above the CBI's target throughout the forecast period. The forecasts are also alike in that none expect inflation to rise above 4.0% on average for any year. If inflation averages more than 4.0% per annum, the CBI is legally bound to notify the government publicly, set out the grounds for inflation and suggest remedies.

Inflation forecast - Comparison



Source: Landsbankinn, Íslandsbankinn, Arion banki, Statistics Iceland, Central Bank of Iceland, International Monetary Fund

Neither the CBI nor Statistics Iceland publish their inflation forecasts publicly like the commercial banks. In August, Arion Bank assumed unchanged policy rates this year, a 0.5 percentage point increase in 2019 and a return to 4.25% rates in 2020. Íslandsbanki forecast in September that rates would remain unchanged this year and a 0.25 point decrease next year followed by unchanged rates for the remainder of the forecast period. Landsbankinn Economic Research on the other hand expects policy rates to increase by 0.25 percentage points before the end of the year and another 0.5 points next year. We forecast a lowering of policy rates in the latter half of the forecast period and for rates to be 4.0% at the forecast horizon.



Source: Landsbankinn, Íslandsbankinn, Arion banki.