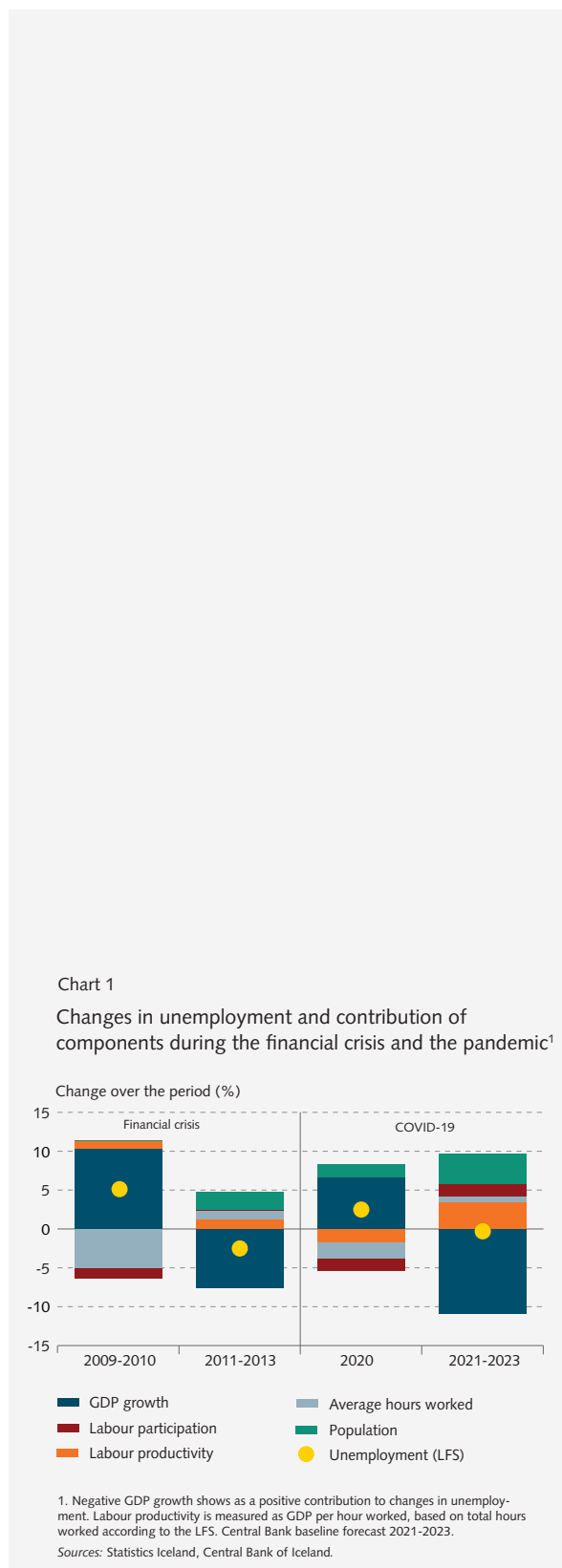


How rapidly will unemployment decline as the economy recovers?

The global COVID-19 pandemic struck Iceland early in 2020, causing severe economic turmoil. It brought on a sharp contraction in tourism, the country's largest export sector, where nearly half of jobs were lost by the year-end. Registered unemployment (excluding recipients of part-time unemployment benefits) more than doubled in less than a year. It reached an all-time high of 11.5% in January 2021, adjusted for seasonality. Since then, the jobless rate has eased marginally, a trend that the Bank's baseline forecast assumes will continue throughout the forecast horizon (see Chapter IV). However, if tourism picks up strongly and the damage to potential output is not too severe, the recovery could be a rapid one. In that case, unemployment could fall swiftly, although other factors could pull in the opposite direction. This Box attempts to shed light on underlying factors and key uncertainties in the Bank's unemployment forecast.

Different developments in unemployment now and in the wake of the financial crisis

The results of the Statistics Iceland labour force survey (LFS) and the national accounts make it possible to split changes in unemployment into the contributions from GDP growth, labour productivity, average hours worked, the labour participation rate, and the population.¹ Chart 1 shows this breakdown for 2020, together with the recovery in 2021 and the two years thereafter, as presented in the baseline forecast. It also gives a comparison with the post-crisis contraction just over a decade ago, when GDP contracted for two years in a row (2009 and 2010), and the recovery over the ensuing three years (2011-2013). It can be seen that the causes of the post-pandemic and post-crisis surges in unemployment differed in some respects. Job-seeking was more difficult in the wake of the pandemic than in a conventional recession, and fear of contagion further discouraged people from looking for work. As a result, the labour participation rate declined more in 2020 than in the wake of the financial crisis, even though GDP contracted far more in the earlier crisis. Notably, labour productivity rose by nearly 1% during the post-crisis contraction, whereas during the current downturn it has fallen by nearly twice that amount. This is partly because, in relative terms, average hours worked declined by roughly half as much in 2020 as in the post-crisis



1 This factorisation of unemployment is discussed in greater detail in Box VI-1 in *Monetary Bulletin* 2012/4.

recession. The number of employed persons developed in a similar manner, partly because of the Government's part-time unemployment benefits programme, which maintained employment levels at the beginning of the pandemic.

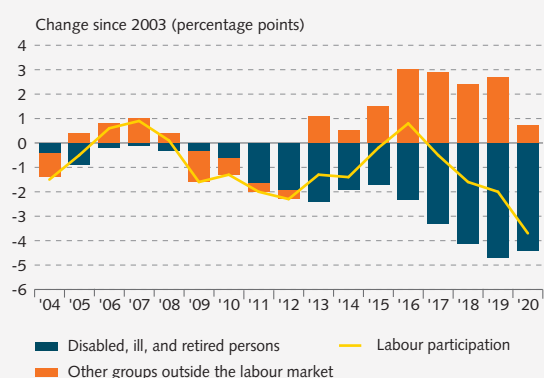
There is scope to improve factor utilisation as the economic recovery gains steam ...

According to the Bank's baseline forecast, GDP will grow by roughly 3% this year, but firms will probably try to improve factor utilisation before taking on new employees in large numbers. Better resource utilisation would therefore show in improved labour productivity and/or an increase in average hours worked. The Bank's forecast assumes that labour productivity will rise this year after falling sharply in 2020, but that productivity growth will be sluggish and somewhat below its historical average over the forecast horizon (see Chapter IV and Box 3). It is difficult to interpret recent developments in average hours worked, but usual weekly working hours declined somewhat less in 2020 than other measures of average hours did. Furthermore, there is some uncertainty about the impact of the contractually agreed shortening of the work week and how it will show in LFS measurements. The baseline forecast assumes that the average work week will grow marginally longer both this year and over the forecast horizon, but will still be somewhat shorter than before the pandemic at the end of the forecast period.

... and labour supply increases ...

As the economy recovers, the supply of labour can be expected to increase again. Statistics Iceland's population forecast assumes that the working-age population will grow markedly in the years 2021 through 2023, and much more than over an equally long period following the financial crisis. Furthermore, the labour participation rate fell significantly in the wake of the pandemic, reaching a historical low in Q2/2020 and then rising again slightly. Long-term developments in groups outside the labour market indicate, however, that the recovery could prove weaker during the forecast horizon. The number of ill, disabled, and retired persons has risen significantly over the period covered by LFS measurements, but labour participation among these groups is probably less sensitive to the business cycle (Chart 2). The baseline forecast assumes that the working-age population will develop broadly as in Statistics Iceland's population projection and that the labour participation rate will be higher this year and increase throughout the forecast horizon, although it will still be slightly below its historical average at the end of the period.

Chart 2
Labour participation and contribution of groups outside the labour market 2004-2020¹



1. An increase in groups outside the labour market shows as a negative contribution to changes in labour participation.

Sources: Statistics Iceland, Central Bank of Iceland.

... but the recovery of GDP will not bring about a commensurate decline in unemployment

The recovery of output is expected to be much faster than in the wake of the financial crisis. The decline in unemployment according to the LFS will be broadly similar to that in the post-crisis period, however. A breakdown over the forecast horizon shows that increased labour supply, population growth, and a higher labour participation rate are the main factors offsetting the positive impact of GDP growth on unemployment, with improved resource utilisation pulling in the same direction. Unemployment is projected to measure around 6% in the last year of the forecast horizon, therefore declining by only 0.3 percentage points from the 2020 average but 1½ percentage points from its Q1/2021 level.

Registered unemployment rose higher but is set to fall faster

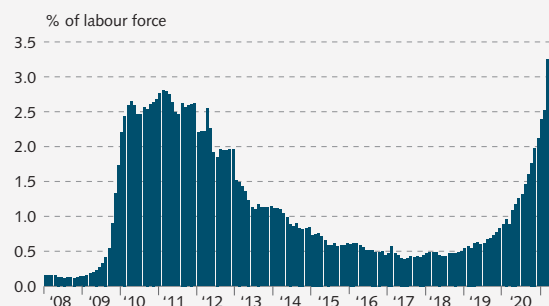
While registered unemployment cannot be broken down effectively in the way that LFS unemployment can, it is clear that the factors affecting its development are broadly similar, albeit with some exceptions. A recent study by Statistics Iceland revealed, for instance, that roughly one-fourth of those who received conventional unemployment benefits were classified as employed, not unemployed, in the LFS. Another fifth were classified as outside the labour market. Registered unemployment therefore rose more than the survey-based rate in the wake of the pandemic, as some individuals on the unemployment register did not meet the survey definition of unemployed persons.² As the economic recovery advances, this trend will probably turn around, with registered unemployment rate falling faster than the survey-based rate.

Higher long-term unemployment could slow the decline in the unemployment rate ...

This surge in unemployment in the wake of the pandemic does not fully reflect the increased slack in the labour market because there are indications that the supply side of the labour market suffered shocks as well. For example, long-term unemployment has risen steeply, as the pandemic struck Iceland just over a year ago and airline WOW Air failed just over two years ago. As of April, nearly 6,500 people, or 3.4% of the labour force, had been on the unemployment register for more than a year, and long-term unemployment by this measure was therefore somewhat above the post-financial crisis peak (Chart 3). Long-term unemployment erodes work-

2 In order to be classified as unemployed for the purposes of the LFS, the person must be out of work, seeking work, and able to start work within two weeks.

Chart 3
Long-term unemployment¹
January 2008 – April 2021



1. Number of persons on the unemployment register longer than 12 months.
Source: Directorate of Labour.

ers' skills, determination to look for work, and likelihood of being hired, indicating that equilibrium unemployment has risen and a relatively slow decline in the jobless rate lies ahead.

... and so could a growing mismatch between labour supply and demand

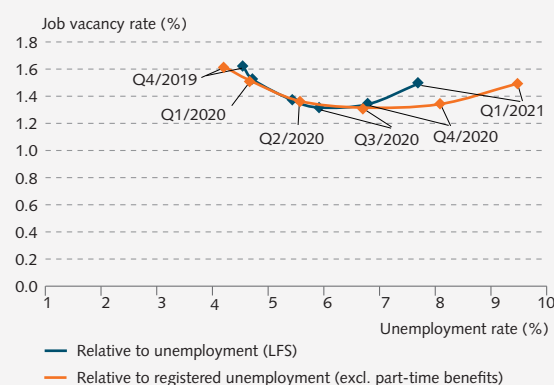
The Beveridge curve, which measures labour market efficiency and shows the relationship between job vacancies and unemployment, appears to have shifted to the right (Chart 4). This could mean that matching jobs and job-seekers has become more difficult than it was before the pandemic but it is unclear whether this mismatch is long-lasting or only temporary.

As is discussed in Chapter IV, productivity declined sharply in the tourism industry in 2020. The International Monetary Fund (2021a, 2021b) found that negative productivity shocks in a given sector tend to persistently reduce the share of that sector in GDP, and that workers are more likely to switch sectors and/or occupations following a period of long-term unemployment. As a result, some of those previously employed in the tourism industry could be forced to switch to a different line of work. The number of unskilled workers is high in tourism-related sectors, which could become a drag on the post-pandemic adjustment of the labour market (Chart 5). If tourism does not recover its previous strength, this group could have greater difficulty finding suitable jobs, and the mismatch in the labour market could prove a lasting one.

Real wages have risen since the onset of the pandemic, which could also slow the decline in unemployment ...

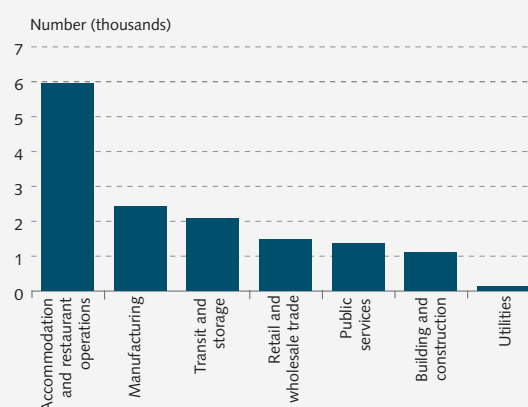
Two contractual wage rises have taken effect since the pandemic reached Iceland: in April 2020 and January 2021. Both nominal and real wages have risen and diverged from productivity (Chart 6). Because the wage rises were unit-based and not percentage-based, lower wages rose proportionally more than higher wages; therefore, cost pressures are even stronger in sectors with a high percentage of low-paid jobs. For example, the wage index for the accommodation and restaurant sector, which has seen the sharpest decline in worker numbers, was up by 11.1% year-on-year in January 2021, as compared with 8.5% for the private sector as a whole. However, in the same sector, the rise in the total wage index was only half the rise in the general wage index in 2020, although the steep decline in job numbers makes this more difficult to interpret. This trend in wages is compounded by reduced labour productivity, as is discussed in Chapter IV and Box 3. As a consequence, there is some uncertainty

Chart 4
The Beveridge curve¹
Q4/2019 – Q1/2021



1. Four-quarter moving average of unemployment and the job vacancy rate.
Sources: Directorate of Labour, Statistics Iceland, Central Bank of Iceland.

Chart 5
Estimated number of workers in elementary occupations in selected sectors 2019¹



1. The estimate is based on weights in the Statistics Iceland wage study and the number of wage-earners according to the Iceland Revenue and Customs PAYE register. Public services includes jobs in public administration, education, healthcare, and social services.
Sources: Statistics Iceland, Central Bank of Iceland.

Chart 6
Real wages and productivity 1997-2020¹



1. Real wages are the wages portion of "wages and related expenses" from the production accounts per total hours worked according to the LFS. Labour productivity is measured as GDP per hour worked, based on total hours worked according to the LFS.
Sources: Statistics Iceland, Central Bank of Iceland.

about how firms, particularly those in tourism, will address these cost increases when they need to hire workers. It could prove difficult to pass costs through to prices, as international competition places constraints on the tourism sector. Significant wage cost increases in tourism could therefore prompt firms either to streamline in order to boost productivity or to negotiate cuts in wages or differentials.

... and accelerate automation

The ongoing economic headwinds and the rise in wage costs could also lead to reallocation of jobs by further accelerating the shift towards automation. The share of jobs vulnerable to automation has fallen in the past three decades, and the trend accelerated last year (Chart 7). Therefore, some of those who were laid off in these industries may need to switch sectors and may even need reskilling, slowing the job recovery even further.³

But unemployment could fall faster than is forecast if tourism recovers strongly

Unemployment could also fall faster than is assumed in the baseline forecast. There are few indications that tourists' interest in Iceland as a destination has diminished, and the number of flights to and from the country could well increase even further, in part due to entry of a new domestic airline. As a result, tourism could recover relatively quickly if there are no major setbacks in the fight against the pandemic. If the recovery is swift, the imbalance that has developed in matching jobs and job-seekers could reverse in full, and relatively rapidly. Furthermore, the adverse effects of long-term unemployment could turn out less pronounced than often before, particularly if employers attribute long-term unemployment less to poorer applicant quality than to external circumstances.

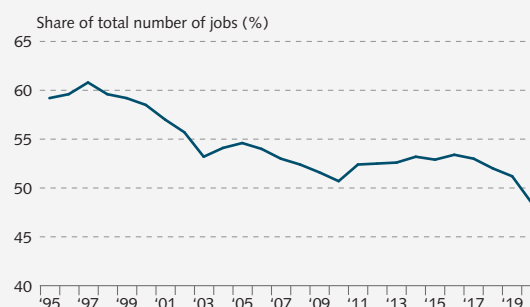
Summary

There are signs that the labour market has begun to recover and that unemployment will fall in coming years. But the decline could prove sluggish if the tourism industry and the supply side of the labour market have been scarred by the pandemic. Furthermore, wages have risen out of line with productivity, and jobs could change in coming years because of increased automation. This is all highly uncertain, however. As is discussed in Box 1, economic developments, including developments in unemployment, will depend to a large degree on how successful efforts to control the pan-

³ A similar trend can be seen in other advanced economies (International Monetary Fund, 2021b).

Chart 7

Jobs vulnerable to automation 1995-2020¹



1. Jobs considered vulnerable to automation according to IMF sectoral classification (see Appendix table 3.1.3 in Chapter 3 of the April 2021 issue of World Economic Outlook). The calculation is based on the number of persons employed (main and second job) according to the LFS.

Sources: IMF, Statistics Iceland, Central Bank of Iceland.

demic prove to be. Developments in unemployment will also depend on how quickly the tourism industry recovers. If comparable jobs become available again, unemployment could fall more rapidly than is assumed in the baseline forecast. If not, the imbalance between supply and demand in the labour market could persist and unemployment could become more firmly entrenched. This could be offset, however, either by a decline in the labour participation rate because people give up looking for work and leave the labour market, or by emigration of workers from Iceland. ■

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