Eurosystem staff macroeconomic projections for the euro area
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Overview

The ongoing coronavirus (COVID-19) pandemic continued to affect economic activity in the first quarter of 2021 as stringent containment measures were prolonged and supply bottlenecks emerged. Nevertheless, the decline in output has been contained by learning effects – with economic agents adjusting better to the pandemic – and policy support, as well as the ongoing recovery in foreign demand and a resilient manufacturing sector.¹

Recent progress on tackling the pandemic should lead to a significant rebound from the second quarter of the year onwards. In particular, a faster roll-out of vaccinations and accompanying declines in infection rates should allow a rapid unwinding of the containment measures in the second half of 2021, which have been more stringent than expected in the first half of the year. However, it is assumed that these measures will only be fully relaxed in early 2022, in line with the previous projections. Conditional on these assumptions, euro area activity is projected to return to growth in the second quarter of 2021 and to pick up strongly in the second half of the year, driven by a sharp rebound in private consumption and an easing of supply bottlenecks. This should allow real GDP to exceed its pre-crisis level from the first quarter of 2022 onwards, one quarter earlier than previously projected.

Compared with the March 2021 projections, the growth outlook is stronger in 2021 and 2022. This reflects the assumption that the pandemic will have a smaller economic impact, given the progress on the vaccination campaign, substantial additional fiscal policy measures – in part, funded by the Next Generation EU programme – and an upgrade to the outlook for foreign demand supported by the recent fiscal policy packages in the United States. Monetary, fiscal and macroprudential policy measures are expected to be successful in averting large financial amplification effects and limiting the economic scars caused by the crisis. As a result, by the end of 2022 real GDP is expected to stand only 1.3% below the level expected in the projections published before the start of the pandemic.²

Inflation is expected to spike at 1.9% in 2021, driven by temporary upward factors, before returning to rates of 1.5% and 1.4% in 2022 and 2023, as demand pressures remain muted and as oil prices are assumed to decline. The hump in headline inflation in 2021 reflects the reversal of the German VAT rate cut, the rebound in the energy inflation rate amid strong base effects, and an increase in input costs related to supply disruptions. As these temporary factors should fade at the beginning of 2022, HICP inflation is expected to show a broadly flat profile in 2022 and 2023. HICP inflation

¹ The cut-off date for technical assumptions, such as those for oil prices and exchange rates, was 18 May 2021 (Box 1). The macroeconomic projections for the euro area were finalised on 26 May 2021. The current macroeconomic projection exercise covers the period 2021-23. Projections over such a long horizon are subject to very high uncertainty, and this should be borne in mind when interpreting them. See the article entitled “An assessment of Eurosystem staff macroeconomic projections” in the May 2013 issue of the ECB’s Monthly Bulletin. See http://www.ecb.europa.eu/pub/projections/html/index.en.html for an accessible version of the data underlying selected tables and charts.

excluding energy and food is expected to strengthen – and by more than foreseen in the March 2021 projections – as the economic recovery progresses and slack declines. HICP food inflation is also projected to increase. These upward effects on headline inflation are broadly counterbalanced over the projection horizon by declines in projected HICP energy inflation, as determined by the downward-sloping oil price futures curve. Compared with the March 2021 ECB staff projections, headline inflation has been revised up for 2021 and 2022 due to more positive developments in slack and upward effects from commodity prices.

Growth and inflation projections for the euro area

<table>
<thead>
<tr>
<th>(annual percentage changes)</th>
<th>June 2021</th>
<th>March 2021</th>
</tr>
</thead>
<tbody>
<tr>
<td>Real GDP</td>
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</tr>
<tr>
<td>HICP</td>
<td>1.2</td>
<td>0.3</td>
</tr>
</tbody>
</table>

Notes: Real GDP figures refer to seasonally and working day-adjusted data. Historical data may differ from the latest Eurostat publications due to data releases after the cut-off date for the projections.

In view of the continued uncertainty about the evolution of the pandemic and the degree of economic scarring, two alternative scenarios have again been prepared: a mild scenario assuming a faster resolution of the health crisis, and a severe scenario envisaging a protracted pandemic. These alternative scenarios are presented in Section 5.
1 Key assumptions underlying the projections

The baseline of the June 2021 projections rests on the assumption of a fast relaxation of containment measures and a resolution of the health crisis by early 2022. The baseline assumes that the vaccination campaigns will proceed in line with the EU strategy for the supply of vaccines. However, some containment measures are assumed to be needed until early 2022 for several reasons: demand constraints (such as the willingness of the population to be vaccinated), the emergence of new variants of COVID-19 outside the euro area, and remaining uncertainties regarding the effectiveness of vaccines against them. Compared to the March 2021 projections, containment measures have been significantly tighter in the first half of 2021, but are assumed to approach the lower levels foreseen in the previous projections exercise by the end of the year. This implies a faster relaxation of measures in the second half of 2021. Similar assumptions regarding the evolution of the pandemic are, on average, made for the international environment (albeit with clear differences between countries). Scenarios using alternative assumptions regarding the progression of the pandemic and the degree of economic scarring are presented in Section 5.

Significant monetary and fiscal policy measures, including the Next Generation EU (NGEU), will help support incomes and aggregate demand, avoid large-scale job losses and bankruptcies, and contain adverse real economy-financial sector feedback loops. In addition to the monetary policy measures taken by the ECB up until the cut-off date for these projections, discretionary fiscal policy stimulus related to the COVID-19 crisis and recovery, including NGEU-funded measures, are embedded in the baseline. This discretionary stimulus amounts to about 4½% of GDP in 2021, 1½% of GDP in 2022 and 1¼% in 2023 (Section 3). Government loan guarantees and capital injections should continue to help alleviate liquidity constraints. Furthermore, supervisory and macroprudential policies have freed up more bank capital to absorb losses and to support the flow of credit to the real economy. Capital buffers have been released, guidance issued to reduce procyclical provisioning, and measures taken to preserve banks’ loss-absorbing capacity. The monetary, fiscal and prudential policy measures are assumed to be broadly successful in avoiding severe real economy-financial sector feedback loops over the projection horizon.

3 The EU vaccination strategy calls on Member States to speed up the roll out of vaccines and “by summer 2021, Member States should have vaccinated a minimum of 70% of the entire adult population”, corresponding to around 55%-60% of the total population. This strategy is broadly consistent with current confirmed orders of doses.
Box 1
Technical assumptions about interest rates, commodity prices and exchange rates

Compared with the March 2021 projections, the current technical assumptions include higher long-term interest rates, significantly higher oil prices and a slightly stronger effective exchange rate of the euro. The technical assumptions about interest rates and commodity prices are based on market expectations with a cut-off date of 18 May 2021. Short-term interest rates refer to the three-month EURIBOR, with market expectations derived from futures rates. The methodology gives an average level for these short-term interest rates of -0.5% in 2021 and 2022, and of -0.3% in 2023. The market expectations for euro area ten-year nominal government bond yields imply an average annual level of 0.2% for 2021, 0.5% for 2022 and 0.7% for 2023.\(^4\) Compared with the March 2021 projections, market expectations for short-term interest rates have marginally increased for 2023, while market expectations for euro area ten-year nominal government bond yields have increased by around 20 to 40 basis points for 2021-23.

As regards commodity prices, the projections consider the path implied by futures markets by taking the average for the two-week period ending on the cut-off date of 18 May 2021. On this basis, the price of a barrel of Brent crude oil is assumed to rise from USD 42.3 in 2020 to USD 65.8 in 2021, before declining to USD 61.9 by 2023. This path implies that, in comparison with the March 2021 projections, oil prices in US dollars are around 11% higher in 2021 and 15% higher in 2023. The prices of non-energy commodities in US dollars are assumed to rebound strongly in 2021 (20 percentage points more than assumed in the previous projections), then stabilise in 2022 and decrease in 2023.

Bilateral exchange rates are assumed to remain unchanged over the projection horizon at the average levels prevailing in the two-week period ending on the cut-off date of 18 May 2021. This implies an average exchange rate of USD 1.21 per euro over the period 2021-23, which is unchanged compared with the assumptions in the March 2021 projections. The assumption for the effective exchange rate of the euro implies an appreciation of 0.7% since the March 2021 projections.

Technical assumptions

<table>
<thead>
<tr>
<th></th>
<th>June 2021</th>
<th>March 2021</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>2020</td>
<td>2021</td>
</tr>
<tr>
<td>Three-month EURIBOR (percentage per annum)</td>
<td>-0.4</td>
<td>-0.5</td>
</tr>
<tr>
<td>Ten-year government bond yields (percentage per annum)</td>
<td>0.0</td>
<td>0.2</td>
</tr>
<tr>
<td>Oil price (in USD/barrel)</td>
<td>42.3</td>
<td>65.8</td>
</tr>
<tr>
<td>Non-energy commodity prices, in USD (annual percentage change)</td>
<td>3.2</td>
<td>39.0</td>
</tr>
<tr>
<td>USD/EUR exchange rate</td>
<td>1.14</td>
<td>1.21</td>
</tr>
<tr>
<td>Euro nominal effective exchange rate (EER42) (Q1 1999 = 100)</td>
<td>119.4</td>
<td>122.0</td>
</tr>
</tbody>
</table>

\(^4\) The assumption for euro area ten-year nominal government bond yields is based on the weighted average of countries’ ten-year benchmark bond yields, weighted by annual GDP figures and extended by the forward path derived from the ECB’s euro area all-bonds ten-year par yield, with the initial discrepancy between the two series kept constant over the projection horizon. The spreads between country-specific government bond yields and the corresponding euro area average are assumed to be constant over the projection horizon.
Real GDP declined again in the first quarter of 2021. According to Eurostat, real GDP declined by 0.3% in the first quarter.\(^5\) This was broadly similar to the decline expected in the March 2021 baseline. Although some supply bottlenecks emerged and containment measures were more stringent than had been assumed, the impact of the latter on economic activity was offset by learning effects as economic agents continue to adapt to the measures. Overall, real GDP in the first quarter of 2021 was 5.1% below its level in the fourth quarter of 2019.

**Chart 1**

*Euro area real GDP growth*  

(quarter-on-quarter percentage changes, seasonally and working day-adjusted quarterly data)

![Chart 1](image)

Notes: Data are seasonally and working day adjusted. Historical data may differ from the latest Eurostat publications due to data releases after the cut-off date for the projections. In view of the unprecedented volatility in real GDP in the course of 2020, the chart shows a different scale from early 2020 onwards. The vertical line indicates the start of the projection horizon. This chart does not show ranges around the projections. Instead, to better illustrate the current uncertainty, alternative scenarios, based on different assumptions regarding the future evolution of the COVID-19 pandemic, the associated containment measures and the degree of economic scarring, are provided in Section 5.

Real GDP is expected to rebound in the second quarter of 2021, consistent with significantly improving sentiment indicators (Chart 1). Many euro area countries extended and further tightened lockdown measures in April, however some relaxation already occurred in May and this is likely to continue in June. Similarly to previous quarters, such containment measures seem to result in less of a disturbance to manufacturing activities (e.g. the euro area manufacturing Purchasing Managers’ Index (PMI) rose to 63.1 in May) and weigh more on activity in the services sector. The latter has nonetheless shown signs of recovery (with the euro area services business activity PMI at 55.2 in May). Targeted fiscal measures will also support the rebound in activity. Overall, real GDP is expected to increase by 1.4% in the second quarter (compared with an increase of 1.3% in the March 2021 projections).

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\(^5\) This figure was revised up from the flash estimate of -0.6% initially published by Eurostat and which was included in the Eurosystem staff projections which are shown in Charts 1 and 2.
Activity is projected to rebound strongly during the second half of 2021, as containment measures are expected to be relaxed. The expected rebound is based on several assumptions: a fast relaxation of containment measures, a further decline in uncertainty, a boost to confidence from further increases in vaccination rates, supportive fiscal and monetary policies and the unwinding of some pent-up demand. Although supported by a continued strong recovery in foreign demand, the rebound will mainly be driven by a robust recovery in domestic demand, in particular in the third quarter, as a progressive and widespread re-opening of economic sectors is anticipated. Moreover, other factors that have curtailed activity in the first half of the year are expected to ease, including the shortage of microchips, which is assessed as having affected the car and technology sectors. In addition, the NGEU is expected to boost investment in some countries. Real GDP is expected to exceed its pre-crisis level in the first quarter of 2022 (one quarter earlier than expected in the March 2021 projections). In the final quarter of 2022 it should stand 1.3% below the level expected in the projections published before the start of the pandemic (Chart 2).6

Chart 2
Euro area real GDP

Notes: Data are seasonally and working day adjusted. Historical data may differ from the latest Eurostat publications due to data releases after the cut-off date for the projections. The vertical line indicates the start of the June 2021 projection horizon.

6 See footnote 2.
### Table 1
Macroeconomic projections for the euro area

(annual percentage changes)

<table>
<thead>
<tr>
<th></th>
<th>June 2021</th>
<th>March 2021</th>
</tr>
</thead>
<tbody>
<tr>
<td>Real GDP</td>
<td>1.3</td>
<td>-6.8</td>
</tr>
<tr>
<td>Private consumption</td>
<td>1.3</td>
<td>-8.0</td>
</tr>
<tr>
<td>Government consumption</td>
<td>1.8</td>
<td>1.4</td>
</tr>
<tr>
<td>Gross fixed capital formation</td>
<td>5.8</td>
<td>-8.2</td>
</tr>
<tr>
<td>Exports(^1)</td>
<td>2.5</td>
<td>-9.8</td>
</tr>
<tr>
<td>Imports(^1)</td>
<td>3.8</td>
<td>-9.3</td>
</tr>
<tr>
<td>Employment</td>
<td>1.2</td>
<td>-1.6</td>
</tr>
<tr>
<td>Unemployment rate</td>
<td></td>
<td></td>
</tr>
<tr>
<td>(percentage of labour force)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>HICP</td>
<td>1.2</td>
<td>0.3</td>
</tr>
<tr>
<td>HICP excluding energy</td>
<td>1.2</td>
<td>1.0</td>
</tr>
<tr>
<td>HICP excluding energy and food</td>
<td>1.0</td>
<td>0.7</td>
</tr>
<tr>
<td>HICP excluding energy, food and changes in indirect taxes(^2)</td>
<td>1.0</td>
<td>0.8</td>
</tr>
<tr>
<td>Unit labour costs</td>
<td>1.8</td>
<td>5.0</td>
</tr>
<tr>
<td>Compensation per employee</td>
<td>1.9</td>
<td>-0.5</td>
</tr>
<tr>
<td>Labour productivity</td>
<td>0.1</td>
<td>-5.2</td>
</tr>
<tr>
<td>General government budget balance (percentage of GDP)</td>
<td>-0.6</td>
<td>-7.3</td>
</tr>
<tr>
<td>Structural budget balance (percentage of GDP)(^3)</td>
<td>-1.0</td>
<td>-5.0</td>
</tr>
<tr>
<td>General government gross debt (percentage of GDP)</td>
<td>83.9</td>
<td>98.0</td>
</tr>
<tr>
<td>Fiscal stance (adjusted for NGEU grants)(^4)</td>
<td>-0.4</td>
<td>-4.2</td>
</tr>
<tr>
<td>Current account balance (percentage of GDP)</td>
<td>2.4</td>
<td>2.1</td>
</tr>
</tbody>
</table>

Notes: Real GDP and components, unit labour costs, compensation per employee and labour productivity refer to seasonally and working day-adjusted data. Historical data may differ from the latest Eurostat publications due to data releases after the cut-off date for the projections. This table does not show ranges around the projections. This reflects the fact that the standard computation of the ranges (based on historical projection errors) would not, in the present circumstances, provide a reliable indication of the elevated uncertainty surrounding the current projections. Instead, to better illustrate the current uncertainty, alternative scenarios based on different assumptions regarding the future evolution of the COVID-19 pandemic, the associated containment measures and the degree of economic scarring are provided in Section 5.

1) This includes intra-euro area trade.
2) The sub-index is based on estimates of actual impacts of indirect taxes. This may differ from Eurostat data, which assume a full and immediate pass-through of indirect tax impacts to the HICP.
3) Calculated as the government balance net of transitory effects of the economic cycle and measures classified under the European System of Central Banks (ESCB) definition as temporary.
4) The fiscal policy stance is measured as the change in the cyclically adjusted primary balance net of government support to the financial sector. The figures shown are also adjusted for expected NGEU grants on the revenue side.

**Private consumption is expected to be the key driver of the recovery.** Following the tightening and prolongation of containment measures since autumn 2020, private consumption decreased again significantly in the first quarter of 2021, contributing strongly to the downturn in activity. The weaker short-term momentum in household expenditures, especially in high-contact services, results in a level of consumption below that foreseen in the March 2021 projections for the first half of 2021.

Consumption continues to be more volatile than developments in real disposable income, which are stabilised by government support, leading to further sharp changes...
in the saving ratio. Private consumption is expected to resume its recovery in the second quarter, then accelerate strongly in the second half of 2021 as containment measures are progressively eased, before reaching its pre-crisis level in the second quarter of 2022. This rebound is also supported by gradually declining uncertainty and a recovery in disposable income, notwithstanding the unwinding of net fiscal transfers, in particular in 2022. Although private consumption is expected to be the key driver of the recovery, the baseline does not envisage a strong contribution from unleashed pent-up demand, as the large stock of accumulated excess savings will remain largely unspent (see Box 2 below).

Box 2
Household saving ratio dynamics and implications for the euro area economic outlook

The household saving ratio has undergone major fluctuations since the start of the pandemic, and continues to stand at an elevated level, leading to an accumulation of excess savings. The COVID-19 pandemic led to a sharp increase in the euro area household saving ratio to above the level prevailing before the pandemic. The increase largely reflected forced savings, as lockdowns constrained consumption, in particular in high-contact services. By contrast disposable income remained more resilient, having been stabilised by government support. This was further amplified by precautionary motives for saving more than in normal situations, related to extreme uncertainty especially about jobs and the future income of households. Since the saving ratio is a flow concept, as long as the flow of savings remains above its pre-crisis path – for which the path of the December 2019 staff projections has been chosen as a benchmark – a stock of savings continues to accumulate in excess of pre-crisis norms.7

The June 2021 projections assume that the saving ratio will return to around its pre-pandemic level by mid-2022, as drivers of both forced and precautionary saving lose importance, and slightly undershoot that level thereafter. This path reflects a normalisation of the saving flows, following on from the successful conclusion of the health crisis and relaxation of containment measures, assumed to be completed by early 2022, which should also instil confidence. Compared to historical regularities which would imply a rather protracted decline of the saving ratio back to normal levels, the very distinctive nature of the pandemic, including the adoption of containment measures, should underpin a relatively quick normalisation as envisaged in the June 2021 projections. In addition, the projections assume only a modest absorption through consumption of the previously accumulated excess stock of savings, as indicated by a slight undershooting of the saving ratio relative to the pre-pandemic path in the chart below.

7 The persistently high saving flows during the COVID-19 pandemic have resulted in the accumulation of a large stock of excess savings estimated at €540 billion in the first quarter of 2021, or 7.4% of annual disposable income in 2019. As the health crisis is not yet over, some additional excess savings may be expected to build up going forward.
Household saving ratio in deviation from the path expected before the COVID-19 pandemic

(percentage point deviations from path projected in the December 2019 Eurosystem staff projections)

Sources: ECB-BASIR simulations, Eurosystem staff projections and ECB calculations.
Note: Both lines show the deviation of the predicted saving ratio from the December 2019 staff projections, which were chosen as the pre-pandemic benchmark path. The December 2019 projections are extended to 2023 using the average growth rates for nominal disposable income and private consumption from 2022. For the ECB-BASIR model the June 2021 projections are imposed up to the first quarter of 2021.

The adjustment in the stock of accumulated excess savings will be a balancing act between several opposing forces. On the one hand, the increase in the saving ratio during lockdowns has largely reflected involuntary savings, which are expected to decline and be partly used for consumption once containment measures are relaxed. This might be underpinned by the fact that most additional savings seem to have been kept mainly in the form of bank deposits, which are highly liquid and therefore could be easily tapped for consumption. As uncertainty decreases, some precautionary savings may also be spent. On the other hand, a more significant unwinding of the stock of excess savings for consumption purposes appears unlikely due to the concentration of savings in high-income households, which have a lower marginal propensity to spend out of income or wealth compared to low-income households. In addition, some of the increase associated with precautionary motives may be hard to reverse, as households might anticipate higher taxes in future to address the significantly increased public debt burden due to the pandemic. Such effects may be more prevalent in countries with less fiscal space, higher public indebtedness and corporate sector vulnerabilities, which are associated with less favourable income and employment prospects. Rather than spending the excess stock of savings, households could also continue to keep them in the form of deposits, or alternatively invest them in other assets, both financial and non-financial (such as real estate), or repay debt. Finally, as the current crisis has been mostly driven by declines in services consumption, the scope for pent-up demand might be less pronounced, although this could be counterbalanced to some extent by substitution in favour of durable goods consumption.

Overall, the balance of factors suggests limited scope for unwinding of the stock of accumulated excess savings for consumption purposes once social distancing measures are relaxed. Nevertheless, the speed and extent of the assumed normalisation in the saving ratio is

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subject to considerable uncertainty. Such uncertainty stems from the fact that there is no historical precedent for the massive amount of savings accumulated and the potential change in consumer spending habits that this crisis could generate. A cross-check using the ECB-BASIR model,\(^\text{11}\) which is able to reflect the current conditions as it explicitly captures the feedback mechanisms between pandemic and macroeconomic developments, suggests a faster reduction of the saving ratio in the short term. However, the model does not point to a large unwinding of excess savings, rather it suggests the level of the saving ratio remaining above the pre-crisis path in 2022 and 2023 and only converging to the projection baseline at the end of 2023.

Housing investment is expected to return to its pre-pandemic level already in the second quarter of 2021. Housing investment increased moderately in the first quarter of 2021 and stood just below its pre-pandemic level. Looking ahead, an expected house price inflation outperforming housing costs inducing positive Tobin’s Q effects, a rebound in disposable income and consumer confidence should support housing investment. In addition, some of the excess savings accumulated are expected to be used for housing investment. After a robust start, housing investment is expected to continue to recover strongly throughout the rest of 2021 before gradually returning to more moderate growth rates over the remainder of the projection horizon.

Business investment is expected to remain resilient and to recover substantially in 2021, reaching its pre-crisis level by the end of the year.

Business investment rebounded significantly in the second half of 2020, partially recovering from its weakness in the first half of the year. Dynamics are likely to have been somewhat muted in the first half of 2021, in the context of weak overall activity and spare capacity. A more solid rebound is expected to develop in the second half of 2021, as global and domestic demand recover and profit growth improves, also supported by favourable financing conditions and the positive impact of the NGEU on business investment. However, the rise in the gross indebtedness of non-financial corporations during the pandemic is expected to limit business investment growth over the projection horizon, notwithstanding strong cash holdings, as firms need to restore their balance sheet health.

**Box 3**

The international environment

Global economic activity continued its recovery after the turn of the year despite an intensification of the pandemic. While global real GDP growth (excluding the euro area) in the fourth quarter of 2020 turned out to be slightly stronger than expected in the March 2021 projections, the global economy entered this year on a weaker footing, as a resurgence of new infections led governments in advanced economies to tighten containment measures in early 2021. The pandemic has intensified much more in emerging market economies. By contrast, the rapid pace of vaccination in the United Kingdom and the United States helped to push down COVID-19-related fatalities in these countries, paving the way for a greater relaxation of containment measures. Survey data for

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April signalled that the recovery was picking up significant momentum in advanced economies, with output in the services sector outperforming the solid expansion in manufacturing. This pointed to the recovery becoming broader based and therefore more robust.

The large fiscal stimulus approved by the Biden administration, not included in the March 2021 projections, will boost the recovery already under way in the United States, with some positive spillovers to the global economy. The American Rescue Plan (ARP) totalling USD 1.9 trillion (8.9% of GDP) includes a renewal of unemployment benefits, additional one-off payments to households, and an increase in both local and state spending to finance public health efforts and education. The income-supporting measures are projected to stimulate private consumption over the coming quarters. Meanwhile the Biden administration announced two further plans, which are also included in the projections, though their impact on economic activity is more limited than that of the ARP.

Despite the upward revision in the United States, the growth outlook for the global economy has changed little compared to the March 2021 projections, while world trade projections have improved somewhat. Global GDP (excluding the euro area) is projected to increase by 6.2% this year, before decelerating to 4.2% and 3.7% in 2022 and 2023, respectively. This reflects an interplay of factors, including a worsening of the pandemic in advanced economies at the beginning of this year and in emerging market economies more recently, as well as the macroeconomic impact of the large fiscal stimulus in the United States and an improving outlook in other advanced economies due to the fast vaccine roll-out. While late 2020 saw global activity exceeding its pre-pandemic level, it is projected to remain below the path expected in the December 2019 staff projections over the projection horizon.

An improved outlook for key trading partners led to stronger euro area foreign demand. This is projected to increase by 8.6% this year and by 5.2% and 3.4% over the 2022-23 period – an upgrade for all three years compared with the March 2021 projections. These revisions reflect above all the stronger than previously projected demand from the United States and the United Kingdom.

The projected global recovery from the pandemic crisis remains uneven. In advanced economies outside the euro area, the recovery is expected to proceed unabated and activity should reach the path projected before the pandemic in the course of next year, largely on account of the United States. In China, which was hit by the pandemic first, but recovered fastest amid strong policy support, real GDP returned to its pre-crisis trajectory already late last year. In contrast, the recovery in other emerging markets is projected to be sluggish. The recent rise in infections as well as any delays in vaccination rollouts could increase this divergence further.

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12 This year’s outlook for emerging market economies in Asia has worsened significantly compared to the March 2021 projections, mainly due to a weaker outlook for India, Indonesia, Malaysia and the Philippines, while real GDP projections for China remained broadly unchanged and those for South Korea were revised upwards.
The international environment

(annual percentage changes)

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<thead>
<tr>
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<th>June 2021</th>
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<tbody>
<tr>
<td></td>
<td>2020</td>
<td>2021</td>
</tr>
<tr>
<td>World (excluding euro area) real GDP</td>
<td>-2.4</td>
<td>6.2</td>
</tr>
<tr>
<td>Global (excluding euro area) trade1)</td>
<td>-8.5</td>
<td>10.8</td>
</tr>
<tr>
<td>Euro area foreign demand2)</td>
<td>-10.0</td>
<td>8.6</td>
</tr>
</tbody>
</table>

1) Calculated as a weighted average of imports.
2) Calculated as a weighted average of imports of euro area trading partners.

A large positive net trade contribution is expected for 2021, thanks to strong export growth, while the acceleration of imports will imply a broadly neutral contribution afterwards. So far in 2021 pandemic dynamics have weighed on internal demand conditions, dragging on imports, which are predicted to grow less than exports this year. Euro area trade was weighed down in the first quarter of 2021 by uncertainty surrounding the persistence of temporary setbacks related to new trade terms with the United Kingdom, bottlenecks in the global logistics sector, and supply constraints – especially in the semi-conductor industry. The positive gap between manufacturing and services trade is expected to narrow this year and early indicators point to a gradual revival of travel services in the second quarter. Export market shares are expected to complete their recovery at the end of 2022 and stabilise around pre-pandemic values in the medium term, while remaining somewhat subdued in countries more dependent on travel exports. Finally, import growth is anticipated to be stronger than domestic demand would predict. This is due to the high import content of exports, and solid imports of tourism-related services in some northern euro area countries.

The unemployment rate is expected to remain broadly unchanged during 2021 before returning to its pre-crisis level by the end of 2023. A contraction in employment growth in the first quarter of 2021, related to the extended lockdown measures and the associated decline in activity, led to an increase in unemployment. It is assumed that a large proportion of workers on job retention schemes will return to regular employment, benefiting from the strong post-pandemic recovery. Therefore, the unemployment rate is expected to be rather stable for the remainder of 2021, before gradually declining over the course of the next two years to reach 7.3% by end-2023.

Labour productivity growth per person employed is projected to recover as of the second quarter of 2021. Labour productivity per person declined again in the first quarter of 2021, due to tighter containment measures and the related recourse to job retention schemes. Growth in labour productivity per person is projected to recover in the second quarter of 2021, to peak in the third quarter of 2021 and to gradually moderate thereafter.

Compared with the March 2021 projections, real GDP growth has been revised up for 2021 and 2022. Growth for the second half of 2021 was revised up, notably in the third quarter. This reflects anticipation of a faster easing of containment measures, linked to accelerating progress in vaccinations, additional fiscal support, and a
reassessment of the impact of the release of pent-up domestic demand upon the re-opening of economic sectors. This explains most of the revisions to annual growth for 2021 and in particular for 2022, the latter being entirely due to carry-over effects. The impact of assumptions is broadly neutral as the positive effects on growth, supported by stronger foreign demand assumptions, are largely offset by the negative impact of both higher oil prices and the reversal in additional but temporary fiscal support measures beyond the current year.
Fiscal policy continues to mitigate the macroeconomic impact of the COVID-19 pandemic in 2021 and underpin the recovery. In 2020, the extraordinary fiscal stimulus in response to the pandemic is assessed to have amounted to slightly above 4% of GDP. As lockdown restrictions have continued into 2021, governments have prolonged emergency measures, gradually scaled them up, and/or adopted new support measures. The discretionary stimulus related to the crisis is estimated at close to 4½% of GDP for 2021 (about 1¼ percentage point more than in the March 2021 projections). Most of the additional measures are temporary and are expected to be reversed in 2022. Some have been prolonged further and together with other recovery measures, including the NGEU-funded spending, should entail an annual stimulus of about 1½% of GDP in 2022 and 1¼% in 2023. Most of the emergency support in 2021 is additional spending in the form of subsidies and transfers to firms, including under job retention schemes. Measures classified under “government consumption” mostly reflect higher health expenditure, including wages, related to the vaccination campaign. On the revenue side, measures relate to cuts in direct and indirect taxes. Additional government investment, while limited in 2020, has a higher share in the stimulus packages as of 2021, mainly due to expected NGEU-financed measures. Adjusting for the impact of the NGEU grants on the revenue side, amounting to about 0.6% of GDP per year, the fiscal stance is projected to be expansionary in 2021, to tighten in 2022 and to remain broadly neutral in 2023.

The euro area budget deficit is projected to reduce slightly in 2021 and more substantially as of 2022, while euro area debt is projected to peak in 2021. The slight decline in the budget deficit in 2021 reflects the somewhat better cyclical component and lower interest payments, which more than offset the additional stimulus measures not covered by NGEU grants on the revenue side. The sizeable budget balance improvement in 2022 is mainly due to the unwinding of most of the emergency stimulus measures related to the crisis and a much more favourable cyclical component. In 2023, with a broadly neutral fiscal stance and better cyclical conditions, the aggregate budget balance is projected to improve further to -2.6% of GDP. Interest payments are projected to decline further over the projection horizon and reach 1.1% of GDP in 2023. Euro area debt is projected to peak in 2021 at 99% of GDP, declining slightly thereafter. The decline over 2022-23 is due mainly to favourable interest-growth differentials, which more than offset the continuing, albeit

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13 The NGEU programme is assumed to finance slightly more than 1.5% of GDP of additive stimulus over the projection horizon (and 0.3% of GDP of substitutive spending, i.e. financing of existing plans). This is about 0.2 percentage points of GDP more than considered in the March 2021 projections, and is based on updated information from the available Recovery and Resilience Plans submitted by governments in spring this year.

14 In terms of measures with direct impact on inflation, in Germany, the temporary general VAT rate cut from mid-2020 was reversed in January 2021. No additional significant tax measures with a direct impact on inflation have been adopted since the March 2021 projections.

15 The fiscal policy stance is measured as the change in the cyclically-adjusted primary balance net of government support to the financial sector. Given that the higher budget revenues related to the NGEU grants do not have a (contractionary) impact on demand, they are also adjusted from the fiscal stance.

16 These developments do not include the European supranational deficit and debt related to NGEU-transfers.
decreasing, primary deficits. Compared with the March 2021 projections, the euro area budget deficit and debt have been revised upwards, especially for 2021, on account of the additional stimulus measures. The larger revision of government debt in 2021 is explained by base effects from 2020, related to a higher deficit-debt adjustment than previously projected. This reflects among other things, the reclassification of some support to the private sector into government accounts in some countries.
HICP inflation is projected to rise significantly in the course of 2021, to slump back at the beginning of 2022, and to remain broadly flat over the remainder of the projection horizon (Chart 3). Headline inflation is projected to average 1.9% in 2021, peaking at 2.6% in the fourth quarter, and to decline to rates of 1.5% and 1.4% in 2022 and 2023 respectively. The hump in headline inflation in 2021 reflects upward effects on inflation from temporary factors such as the reversal of the German VAT rate cut, the rebound in the energy inflation rate amid strong base effects, and an increase in input costs related to supply disruptions. Changes in weights imply some volatility in the inflation profile in 2021 but, on average over the year, they are expected to have only a small downward impact on HICP inflation. While these temporary factors fade at the beginning of 2022, offsetting developments across the main HICP components over the projection horizon imply a broadly flat profile of HICP inflation, with a slight increase in the course of 2023. The projected economic recovery and decreases in slack are expected to lead to a gradual increase in HICP inflation excluding energy and food from 1.1% in 2021 to 1.4% in 2023. Upward price pressures from the increase in demand, though remaining muted overall, should outweigh diminishing price pressures from adverse supply effects related to the pandemic and containment measures over the projection horizon. Increases in domestic cost pressures are envisaged to be the main driver of stronger underlying consumer price developments, while developments in external price pressures are expected to moderate over the horizon. HICP food inflation is also expected to rise somewhat over the projection horizon. The moderately increasing upward price pressures on headline inflation from these two HICP components are broadly offset in 2022 and 2023 by the envisaged declines in HICP energy inflation related to the downward-sloping profile of the oil price futures curve.

Unit labour costs are expected to contribute to the rise in domestic cost pressures over the projection horizon. Following the strong increases in unit labour costs in 2020 due to the sharp fall in labour productivity, unit labour costs are expected to be depressed by the rebound in labour productivity in 2021, but gradually recover and increase by 2023. While the sharp movements in labour productivity dominate the developments in unit labour costs in the crisis period, growth in compensation per employee has also been subject to large swings driven by the impact of job retention schemes. These schemes have safeguarded employment, however employees face pay cuts when enrolling in them. This pushed down the annual growth rate of compensation per employee in 2020 and is expected to cause a subsequent rebound in 2021. As labour markets gradually recover over the projection horizon and the impact of these schemes wanes, developments in compensation per employee are expected to normalise, with annual growth expected to stand at 2.4% in 2023.

Profit margins are expected to buffer the swings in unit labour costs to a large extent. Profit margins weakened in 2020 in line with their procyclical nature but remained much more resilient than the decline in activity would normally imply, having been stabilised by job retention schemes. Firms in the euro area generally strive to
retain workers in the early stages of a downturn, even if this comes at the cost of lower profit margins. This downward pressure on profit margins has been alleviated by government wage support schemes. Overall, profit margins are expected to cushion the developments in unit labour costs and to have a slightly positive impact on inflationary pressures in 2023.

Chart 3
Euro area HICP

Notes: The vertical line indicates the start of the projection horizon. This chart does not show ranges around the projections. This reflects the fact that the standard computation of the ranges (based on historical projection errors) would not, in the present circumstances, provide a reliable indication of the elevated uncertainty surrounding the current projections. Instead, in order to better illustrate the current uncertainty, alternative scenarios based on different assumptions regarding the future evolution of the COVID-19 pandemic, the associated containment measures and the degree of economic scarring are provided in Section 5.

Import price dynamics are expected to be strongly influenced by oil and non-energy commodity price movements, and to reflect moderate external price pressures towards the end of the projection horizon. Following a strongly negative rate of change in 2020, import prices are expected to show a high positive rate in 2021 – reflecting mainly increases in oil and non-energy commodity prices but also increases in input costs related to supply shortages – before the rate moderates markedly up to 2023. In addition to the declines in oil prices and non-energy commodity prices, global price dynamics in general are expected to remain moderate over the projection horizon and contribute to the moderate outlook for external price pressures.

Compared with the March 2021 projections, the projection for HICP inflation has been revised upward by 0.4 percentage points and 0.3 percentage points for 2021 and 2022, and is unchanged for 2023. All three main HICP components contribute to the upward revisions in headline inflation in the first two years of the projection horizon. HICP inflation excluding energy and food has been revised upward throughout the horizon on account of more positive developments in measures of slack than envisaged in the March 2021 projections, as well as some upward effects from rising global inflationary pressures and assumptions – most notably from oil prices. These oil price assumptions also account for the recent upward surprises in, and visible upward revision of, HICP energy inflation – particularly in the first two years of the projection horizon. Meanwhile a slight upward surprise, likely related to
temporary weather effects, and stronger than previously assumed food commodity price developments explain the somewhat higher outlook for HICP food inflation compared with the March 2021 projections.

Box 4
Forecasts by other institutions

A number of forecasts for the euro area are available from both international organisations and private sector institutions. However, these forecasts are not strictly comparable with one another or with the Eurosystem staff macroeconomic projections, as they were finalised at different points in time. They were also likely based on different assumptions about the future evolution of the COVID-19 pandemic. Additionally, these projections use different methods to derive assumptions for fiscal, financial and external variables, including oil and other commodity prices. Finally, there are differences in working day adjustment methods across different forecasts (see the table).

Comparison of recent forecasts for euro area real GDP growth and HICP inflation

<table>
<thead>
<tr>
<th>Date of release</th>
<th>Real GDP growth</th>
<th>HICP inflation</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>2020</td>
<td>2021</td>
</tr>
<tr>
<td>Eurosystem staff projections</td>
<td>June 2021</td>
<td>-6.8</td>
</tr>
<tr>
<td>OECD</td>
<td>May 2021</td>
<td>-6.7</td>
</tr>
<tr>
<td>Euro Zone Barometer</td>
<td>May 2021</td>
<td>-6.6</td>
</tr>
<tr>
<td>Consensus Economics</td>
<td>May 2021</td>
<td>-</td>
</tr>
<tr>
<td>European Commission</td>
<td>May 2021</td>
<td>-6.6</td>
</tr>
<tr>
<td>Survey of Professional Forecasters</td>
<td>April 2021</td>
<td>-</td>
</tr>
<tr>
<td>IMF</td>
<td>April 2021</td>
<td>-6.6</td>
</tr>
</tbody>
</table>

Sources: OECD May 2021 Economic Outlook 109; MJEconomics for the Euro Zone Barometer, 20 May 2021; data for 2023 are taken from the April 2011 survey; Consensus Economics Forecasts, 13 May 2021, data for 2023 are taken from the April 2021 survey; European Commission Spring 2021 Economic Forecast; ECB Survey of Professional Forecasters, for the second quarter of 2021, conducted between 31 March and 12 April; IMF World Economic Outlook, 6 April 2021. 1) The Eurosystem staff macroeconomic projections report working day-adjusted annual growth rates, whereas the European Commission and the IMF report annual growth rates that are not adjusted for the number of working days per annum. Other forecasts do not specify whether they report working day-adjusted or non-working day-adjusted data. Historical data may differ from the latest Eurostat publications due to data releases after the cut-off date for the projections. This table does not show ranges around the staff projections. This reflects the fact that the standard computation of the ranges (based on historical projection errors) would not, in the present circumstances, provide a reliable indication of the elevated uncertainty surrounding the current projections. Instead, to better illustrate the current uncertainty, alternative scenarios based on different assumptions regarding the future evolution of the COVID-19 pandemic and the associated containment measures are provided in Section 5.

The June 2021 projections are more optimistic than other forecasts of growth and inflation for 2021 and 2022 and are broadly in line with them for 2023. Across other institutions and private sector forecasters, the change in real GDP in 2022 compared to 2019 varies between 1.2% in the IMF projections and 1.7% in those of the European Commission, while the June 2021 Eurosystem staff projections are notably above that range at 2.1%. As regards inflation, the June projections are higher for both 2021 and 2022, mainly due to higher expected inflation in the more volatile components, while for 2023 they are expected to be in line with the IMF projections and slightly below other forecasts.
5 Alternative scenarios for the euro area economic outlook

As significant uncertainty about the future evolution of the COVID-19 pandemic and its economic effects persists, two scenarios, representing alternatives to the June 2021 Eurosystem staff baseline projections, illustrate a range of plausible impacts of the COVID-19 pandemic on the euro area economy.

A mild scenario foresees a resolution of the health crisis by late 2021 and only temporary economic losses, while a severe scenario assumes a protracted health crisis and permanent losses in potential output. Compared with the baseline, the mild scenario envisages a faster roll-out, higher public acceptance and greater efficacy of vaccines, also against new virus variants. This would allow for a swifter relaxation of containment measures and their phasing-out by late 2021.\(^{17}\) More effective actions taken by authorities and economic agents would further limit the economic costs of containment measures, inducing more positive confidence effects and a sooner-than-expected pick-up in travel and tourism. In contrast, the severe scenario envisages a possible resurgence of the pandemic in the coming months with the emergence of more infectious variants of the virus, which would also imply a reduction in the efficacy of vaccines and maintenance of some containment measures until mid-2023, dampening activity.\(^{18}\) Compared with the baseline, the severe scenario features more economic scarring, amplified by increased insolvencies and deteriorating borrower creditworthiness, which adversely affect banks’ expected losses and capital charges and consequently the supply of credit to the private sector. At the same time even in the severe scenario, monetary, fiscal and prudential policies are assumed to contain very severe financial amplification effects. Broadly similar narratives underlie the scenarios for the global economy with euro area foreign demand at the end of 2023 standing about 12% above its pre-crisis level in the mild scenario, and around 2% above it in the severe one, compared with 9% in the baseline.

\(^{17}\) In the baseline, a full relaxation of containment measures is assumed to occur in early 2022.

\(^{18}\) Given the difficulties involved in predicting the timing of a further intensification of the pandemic, the projections take the possibility of a resurgence of the virus into account by distributing the economic impact over the period until the health crisis is resolved.
Table 2
Alternative macroeconomic scenarios for the euro area

(annual percentage changes, percentage of labour force)

<table>
<thead>
<tr>
<th></th>
<th>June 2021 projections</th>
<th>March 2021 projections</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Mild scenario Baseline</td>
<td>Severe scenario</td>
</tr>
<tr>
<td></td>
<td>2020 2021 2022 2023</td>
<td>2020 2021 2022 2023</td>
</tr>
<tr>
<td>Real GDP</td>
<td>-6.8 6.2 5.5 2.2</td>
<td>-6.8 2.9 2.3 2.2</td>
</tr>
<tr>
<td>HICP inflation</td>
<td>0.3 1.9 1.7 1.7</td>
<td>0.3 1.5 2.1 2.3</td>
</tr>
<tr>
<td>Unemployment rate</td>
<td>7.8 7.9 7.1 6.6</td>
<td>7.8 8.4 9.0 8.7</td>
</tr>
<tr>
<td></td>
<td>2020 2021 2022 2023</td>
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</tr>
<tr>
<td>HICP inflation</td>
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<td>0.3 1.5 1.0 1.1</td>
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<td>Unemployment rate</td>
<td>7.8 8.2 7.2 6.6</td>
<td>7.8 9.0 9.3 8.7</td>
</tr>
</tbody>
</table>

Notes: Historical data may differ from the latest Eurostat publications due to data releases after the cut-off date for the projections.

Real GDP would rebound strongly in the mild scenario, returning to its pre-crisis level as early as the third quarter of 2021, while in the severe scenario it would reach this level only in late 2023 (Chart 4). The mild scenario suggests a notably stronger rebound in the second and third quarters of 2021 (2.5% and 4.1%, respectively)\(^{19}\) and a further strengthening of economic activity throughout the rest of the year, triggered by the assumed swift roll-out of vaccines, which leads to additional confidence effects. As a result, economic activity would return to its pre-pandemic level already in the third quarter of 2021 and it would be above the path envisaged in the pre-crisis December 2019 projections by mid-2022. In the severe scenario, economic activity would expand more modestly in the second and the third quarters (0.6% and 1.3%, respectively), before continuing its moderate recovery thereafter. Economic growth remains subdued until early 2022, owing to an only gradual relaxation of containment measures, compounded by limited learning effects going forward, continued uncertainty and financial amplification mechanisms, only partly mitigated by policy support measures. In the severe scenario, growth slightly higher than the baseline is projected as of the second half of 2022, given the stronger catch-up potential and successful adaptation to the new environment. This helps to make up all losses in real GDP, compared with the pre-crisis level, by the end of the projection horizon.

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\(^{19}\) This compares with growth at 1.4% in the second quarter of 2021 and 2.8% in the third quarter in the baseline projections.
HICP inflation would rebound in the short term in both scenarios, with more variation thereafter due to differences in the balance of supply and demand. This reflects the fact that the key drivers of the pick-up in inflation in the baseline in the short term (namely the oil price assumptions, base effects in the energy component, supply bottlenecks and the impact of the reversal of the temporary VAT reduction in Germany) apply equally to the alternative scenarios. In the medium term, economic slack is envisaged to be higher in the severe scenario than in the mild scenario. As a result, inflation would stand in 2023 at 1.7% in the mild scenario compared with 1.1% in the severe scenario.

Labour markets would recover quickly in the mild scenario, as policies are assumed to be largely successful in preventing hysteresis effects, while these are only partially contained in the severe scenario. In the mild scenario, the unemployment rate peaks in 2021 and reverts to its pre-crisis level by mid-2022. Conversely, in the severe scenario the unemployment rate does not return to the pre-crisis level within the projection horizon and remains significantly elevated, reflecting higher reallocation needs across sectors. This highlights the upside risks to unemployment related to possible bankruptcies and corporate vulnerabilities, as well as potential hysteresis effects.

Box 5
Sensitivity analysis

Projections rely heavily on technical assumptions regarding the evolution of certain key variables. Given that some of these variables can have a large impact on the projections for the euro area, examining the sensitivity of the latter to alternative paths of these underlying assumptions can help in the analysis of risks around the projections.
This sensitivity analysis aims to assess the implications of alternative oil price paths. The technical assumptions for oil price developments underlying the baseline, based on oil futures, predict a notably declining profile for oil prices, with the price per barrel of Brent crude oil falling by around 5.9% over the projection horizon. Two alternative paths of the oil price are analysed. The first is based on the 25th percentile of the distribution provided by the option-implied densities for the oil price on 18 May 2021, which is the cut-off date for the technical assumptions. This path implies a gradual decrease in the oil price to USD 44.7 per barrel in 2023, which is 27.8% below the baseline assumption for that year. Using the average of the results from a number of staff macroeconomic models, this path would have a small upward impact on real GDP growth (around 0.1 percentage points in 2022 and 2023), while HICP inflation would be 0.2 percentage points lower in 2021, 0.6 percentage points lower in 2022 and 0.3 percentage points lower in 2023. The second path is based on the 75th percentile of the same distribution and implies an increase in the oil price to USD 80.4 per barrel in 2023, which is 29.8% above the baseline assumption for that year. This path would entail HICP inflation being 0.1 percentage points higher in 2021, 0.5 percentage points higher in 2022 and 0.4 percentage points higher in 2023, while real GDP growth would be slightly lower (by 0.1 percentage points in 2022 and in 2023).