The Macroeconomic Policy Outlook

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This is the second *Macro Policy Outlook*, providing a policy-focused take on the economy. In this edition, we bring together the insights from new research into the impact of coronavirus on the economy with the latest data on its effects, in order to draw out the lessons for policy makers.

There are three key takeaways. First, while the Government-imposed lockdown has clearly had an unprecedented effect on economic activity, evidence of concern amongst workers about catching the virus means that even a full relaxation of the lockdown would not lead to a rapid return to business as usual. Second, while much attention has been paid to the effects on the supply and demand sides of the economy, the reality is that both will be affected, and that policy makers need to respond to those shocks in different ways as the crisis unfolds. Moreover, it is not just the size of the hit to demand and supply that is important in informing policy, but also its distribution. In that context, it is worrying that workers in the worst-affected sectors are disproportionately those on lower pay. And third, while there are a number of ways the economic crisis could be amplified, the good news is that, for the most part, those risks do not appear to be crystallising so far. That said, there is already evidence of an unprecedented increase in saving, and the extent to which that continues will be a key factor in determining the strength of the recovery. This means that it is crucial that policy makers remain focussed on the risks.

Understanding the ways in which the outbreak is affecting the economy is crucial to designing a macroeconomic policy response. So below we set out a framework for thinking about the economic impact of the pandemic, addressing some common misconceptions.

**IT IS HELPFUL TO THINK ABOUT THE IMPACT OF THE PANDEMIC IN THREE PHASES: LOCK-DOWN, REOPENING AND NORMALISING**

To understand how the economic impact of the virus interacts with measures to stop its spread, economists (see this, for example, from Ricardo Reis) tend to think of three distinct phases of the crisis (Figure 1). First, the initial lockdown. In this phase, shutting down large swathes of the economy leads to sharp falls in economic activity. Second, the reopening phase when the lockdown measures are eased. At this point the economy starts to rebound, but GDP remains depressed relative to its previous path as some parts of the economy continue to operate at below pre-pandemic levels of activity. At this point, the Government is trying to facilitate a return to economic activity, but, crucially, without pushing the reproduction rate of the virus – the often-mentioned $R$ rate – above one. And third, a normalising phase in which the health emergency has passed, and the economy is returning to its long-run path.
FIGURE 1: It is helpful to think about three phases of the coronavirus impact

Economic activity (or level of GDP) and policy objectives during the three phases of the impact of coronavirus

In each of these phases, the impact on the economy will reflect the interaction of the effects of the virus with Government policy. Moreover, the aims of policy will change in each phase (Figure 1). During the lockdown phase, for example, there is a huge hit to economic activity and people’s livelihoods. Policy makers aim to ‘make good’ the unanticipated loss of earnings faced by families and firms, providing insurance for an un-anticipatable and catastrophic economic hit. During the reopening phase, the economic impact will be determined by the measures necessary to keep some headroom of R below 1. As Figure 2 shows, tightening social distancing restrictions is estimated to have reduced R; loosening them will raise it. The big unknown, is by how much – raising the risk that the Government may have to reverse course. In the normalisation phase, the key for policy makers is to return the economy to its pre-crisis path as quickly as possible, subject to avoiding a second peak of the virus and the huge economic costs that would bring. Policy can make a significant difference to how much economic activity can take place without R rising above one: having an effective ‘test and trace’ infrastructure in place will lead to better economic outcomes (this is sometimes referred to as the pandemic possibility frontier).

DESPITE THE IMPORTANCE OF LOCKDOWN MEASURES, THINKING OF THIS AS A POLICY-DRIVEN RECESSION MISUNDERSTANDS THE EFFECT OF THE VIRUS

When the Government announced a full lockdown on 23rd March the R rate was very high, with some estimates putting it at well over 3 (Figure 2), risking a devastating epidemic. The only option at that point was lockdown. Since then, a range of indicators point to an unprecedented collapse in economic activity: for example, the 2 per cent fall in GDP in 2020 Q1 – which covers just one week of the lockdown – is already the weakest quarter since the financial crisis. The Bank of England and OBR – like RF – agree that much worse is to come.
But it is wrong to think of this as entirely a consequence of Government policy. Some have argued that the lockdown needs to be eased to ‘get the economy moving’ (see, for example, recent comments by former Chancellor Philip Hammond). What such arguments miss is that even if all social distancing restrictions were lifted tomorrow, the economy would not return to its previous path. This is because people would still take steps to reduce their risk of becoming infected or passing the disease onto others. This phenomenon is referred to as *equilibrium social distancing* by social scientists incorporating economic behaviour into epidemiological models. Absent the virus being clearly under control, people will socially distance with or without government instructions (although they probably wouldn’t do enough to keep cases to a low level), leading to similar amounts of economic damage.

**FIGURE 2: The estimated reproduction rate for coronavirus remains close to 1**

Imperial College London’s estimate of the time-varying reproduction rate, R: UK

![Diagram showing the estimated reproduction rate for coronavirus remaining close to 1](image)

**NOTES: Estimation of the time-varying reproduction number R; the shaded area provides a 95% confidence interval.**


**FOCUSSING ON THE IMPACT ON DEMAND AND SUPPLY EFFECTS IS TOO SIMPLISTIC IN THIS CRISIS**

Much of the commentary has focussed narrowly on the effects of the crisis on the supply or the demand side of the economy. This is important because, to the extent that the damage to the economy is confined to the supply side, this reduces the effectiveness of macroeconomic policy tools, which generally act to boost demand (see, for example, arguments made in this [recent LSE blog](https://example.com)). Indeed, in a normal recession, designing a policy response boils down to assessing the hit to demand and using policy (normally monetary policy) to provide a boost.

Instead, the pandemic will affect both the supply side and the demand side of the economy. It is easy to see an obvious impact on supply: most obviously, with many sectors of the economy still forced to remain shut, large numbers of workers are not able to go back to work. Even as the economy opens up, many sectors will be able to produce less than they did previously – for example, restaurants and
bars will not be able to serve as many customers because of social distancing rules. But there are also obvious effects on demand. There will, for example, be a reduction in demand coming from those who are furloughed, or have lost their jobs, given reduced incomes and greater uncertainty around their employment in the future.

In designing a response to this crisis, then, policy makers need to vary their interventions on the supply and demand sides of the economy depending on the stage of the crisis. In lockdown phase, for example, while there is a need to provide some general demand support, because much of the economy is shut down, support must be targeted. This is because of the distributional effects of the crisis (see: Guerrieri et al and Kaplan et al). To the extent that the impact of the pandemic is larger for those on lower incomes, the greater the extent to which the aggregate income losses will exceed those caused by closing down sub-sectors of the economy. A key reason for this is that those on lower incomes tend to spend a higher proportion of their income on consumption, meaning that income falls for this group will have a larger impact on aggregate spending. Targeted support, then, reduces the hardship of the lockdown and stops other sectors seeing demand falls as workers in lockdown sectors stop spending. Moving into the reopening phase, there is a case for more general stimulus to boost the recovery in demand. But reducing supply constraints, as far as is feasible – for example, through the use of test and trace technology to avoid an increase in coronavirus cases – will be essential in allowing that stimulus to take effect without a second wave of infections.

THE IMPACT OF CORONAVIRUS WILL BE MUCH WORSE IF IT EXACERBATES OUR EXISTING VULNERABILITIES

Economists have highlighted a number of ways in which the hit to the economy from coronavirus might be made worse by existing vulnerabilities. Policy should take these risks into account. A recent survey by researchers at the Bank for International Settlements highlighted three concerns: disruption to world trade; significant disruption to the financial system; and a lasting increase in the amount of savings that households want to hold.

In the next section, we look at the what the data has to say about the impacts on the economy described above.

THERE IS EVIDENCE THAT ECONOMIC ACTIVITY WOULD STILL BE MUCH LOWER EVEN WITHOUT A LOCKDOWN

If the risk of infection changes people’s behaviour, it is likely that there would still have been large falls in GDP even without shutting the economy. Here survey evidence suggests a high level of concern about the risk of contracting coronavirus and the impact that has on working patterns. For example, nearly half (44 per cent) of UK workers said they were anxious about the prospect of going back to work because of the health risks posed by coronavirus, according to a recent CIPD survey. It is hard to know how this would translate into behavioural changes. But some evidence is shown in Figure 3 which compares workplace mobility (a timely measure of economic activity) across a number of European countries. It is striking that mobility has fallen nearly as much in Sweden, where there has not been a complete lockdown, as it did in Denmark, where there has.
FIGURE 3: Falls in workplace movement have been evident in Sweden despite the absence of a lockdown

Change in Google mobility trends to places of work: selected countries, since 17 February 2020 (per cent deviation from normal, seven-day moving average): selected countries

NOTES: The chart displays aggregated, anonymised data to chart movement trends over time by geography, across different high-level categories of places such as retail and recreation, groceries and pharmacies, parks, transit stations, workplaces, and residential. Location accuracy and the understanding of categorized places varies from region to region. Google recommends not using the data to compare places with different characteristics. The baseline is the median value, for the corresponding day of the week, during the 5-week period 3 January – 6 February 2020.
SOURCE: RF analysis of Google, Community Mobility Reports.

THE IMPACT OF THE CRISIS IS SKEWED TOWARDS THOSE ON LOWER INCOMES

If people on lower incomes are disproportionately affected by the crisis, the economic impact will be larger and there is a stronger case for a large-scale policy response. Detailed data on the distributional impact of the virus will not be available for some time, however. So, instead, recent RF analysis looks at pay in the sectors identified by the OBR as most likely to be affected. The results are shown in Figure 4 which maps the OBR’s coronavirus reference scenario into falls in employment, and numbers of workers furloughed across key sectors. Hospitality and retail are the worst affected sectors – with four million workers either losing their jobs or being furloughed. These are two of the lowest-paying parts of the economy, with typical employee pay in 2019 just £231 a week in hospitality, and £323 in retail. This compares to typical pay of £455 a week across the economy.
FIGURE 4: Some of the hardest-hit industries employ the lowest-paid people

Forecast change in active employment and level of median gross weekly pay (2019), by industry: UK

<table>
<thead>
<tr>
<th>Industry</th>
<th>Increase in employment</th>
<th>Reduction in employment</th>
<th>Moves onto Job Retention Scheme</th>
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<td>Human health and social activities</td>
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<td>Other services</td>
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<td>Administrative and support activities</td>
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<td>Professional, scientific and technical</td>
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<td>Hospitality</td>
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<td>Retail, wholesale and motor trades</td>
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NOTES: Changes in output by sector published in the OBR's 'Coronavirus reference scenario' are used to estimate changes in employment and moves onto the JRS. This involves the simplifying assumptions that output maps onto employment in the same way across sectors, and that the propensity to make use of the JRS is also uniform across sectors. Implied changes in Workforce Jobs from OBR output changes are scaled to match the OBR's totals for JRS take-up and the unemployment increase in Q2 2020. Alternative output reductions are used for the education and health sectors, where output changes are very unlikely to reflect employment changes. In education, rather than a 90 per cent fall in output, a 20 per cent fall is assumed. In health, rather than a 50 per cent increase in output a 20 per cent increase is assumed. JRS assumptions in health are predicated on a 5 per cent fall in output among non-public sector health employees.

SOURCE: RF analysis of OBR, Coronavirus reference scenario, April 2020; ONS, Workforce Jobs (JOBS02); ONS, Public sector employment by industry (EMP03).

SOME OF THE WAYS THE CRISIS COULD BE AMPLIFIED DO NOT APPEAR TO BE A PROBLEM SO FAR...

Timely indicators do not point to a sharp deterioration in trade or a big rise in financial stress. Instead, weekly data on shipping volumes are continuing to show steady falls in the number of visits to UK ports. But this data is likely to lag the underlying economic effects. And the World Trade Organisation has estimated that global trade could fall by as much as a third. If this happened, it could lead to larger and more prolonged weakness in economic activity. Meanwhile, after spiking very sharply, financial market measures of uncertainty have fallen back to levels below those seen during the financial crisis (consistent with the Bank of England’s relatively upbeat assessment of the risks to the financial system). While it is again too early to say that the financial risks have passed, it is encouraging that the financial system has proved resilient through a very volatile period in financial markets.
Measures of financial market uncertainty have fallen back since the start of the crisis (but remain at high levels)

Measures of financial market uncertainty (standard deviations from long-run average): UK

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NOTES: Series shown are: six-month option-implied volatility for the FTSE 100 (for equity volatility); and the 6-month option-implied volatility of short sterling (for interest rate volatility).


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THERE APPEARS TO HAVE BEEN A BIG INCREASE IN SAVING ALREADY, BUT THERE IS A RISK THAT MUCH MORE COULD FOLLOW, LEADING TO A MUCH WEAKER RECOVERY

Uncertainty has undoubtedly increased. Families and businesses are likely to respond to that by trying to increase their buffers. While comprehensive data on saving will only be available after a long lag, Figure 6 provides some evidence. It shows that the monthly change in broad money holdings – which include balances in bank accounts and other liquid assets, as well as cash itself – increased sharply to nearly £60 billion in March. This is by far the largest increase in the history of this series, nearly double the highest monthly increase during the financial crisis. Much of this rise in saving will reflect forced saving, as people are unable to continue their usual spending. But it will also reflect precautionary saving. Going forward, the key question is whether the increase in financial buffers is enough, or whether there will be further increases in savings in the coming months. If so, we will see a much less rapid recovery as the lockdown recedes.
FIGURE 6: Saving appears to have increased sharply

Broad money holdings by sector, excluding intermediate financial corporations, monthly change (£ billion)


COMBINING NEW INSIGHTS INTO THE EFFECTS OF CORONAVIRUS WITH AVAILABLE DATA SHOULD INFORM POLICY

While there is limited data covering the crisis period, a clear pattern is emerging. The scale of the hit to the economy and labour market is unprecedented. But that hit is not confined to the supply side. And, crucially, the disproportionate impact on those on lower incomes reinforces the need to provide large-scale support. Moreover, the insights from equilibrium social distancing suggest caution in withdrawing those measures, despite the fiscal and economic costs of such support. Finally, it is crucial that policy makers remain focussed on the risks. Here some comfort can be taken from the data so far, but a key area to watch will be the savings behaviour of families and firms.