Built to last

Towards a sustainable macroeconomic policy framework for the UK

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The Economy 2030 Inquiry

The Economy 2030 Inquiry is a collaboration between the Resolution Foundation and the Centre for Economic Performance at the London School of Economics, funded by the Nuffield Foundation. The Inquiry’s subject matter is the nature, scale, and context for the economic change facing the UK during the 2020s. Its goal is not just to describe the change that Covid-19, Brexit, the Net Zero transition and technology will bring, but to help the country and its policy makers better understand and navigate it against a backdrop of low productivity and high inequality. To achieve these aims the Inquiry is leading a two-year national conversation on the future of the UK economy, bridging rigorous research, public involvement and concrete proposals. The work of the Inquiry will be brought together in a final report in 2023 that will set out a renewed economic strategy for the UK to enable the country to successfully navigate the decade ahead, with proposals to drive strong, sustainable and equitable growth, and significant improvements to people’s living standards and well-being.

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Executive summary

In this paper, we tackle the key question of how to futureproof the UK’s macroeconomic policy framework, recognising the lessons from our recent economically turbulent past and the uncertainty about what our future holds. Our focus is on whether the current framework – largely set during the calmer economic times of the 1990s – is still fit for purpose.

High inflation is the immediate policy challenge. Although the fight is far from won, progress has been made on this front after the largest tightening cycle since the late-1980s. The highest inflation in four decades has been followed by the sharpest fall in inflation in over three. As a result, debates about ‘how high’ interest rates need to rise have been replaced by the question of ‘how long’ rates remain at new, higher levels. What the future holds is very uncertain, but the ending of the ultra-low interest-rate chapter of the 2010s – at least for now – means the time is right for us assess the trajectory we are on.

Government debt has ratcheted up

The journey of the past 15 years from financial crisis to global pandemic and cost of living crisis has left us with a weaker economy and far higher government debt. When combined with higher interest rates, that means, ultimately, harsher policy trade-offs.

Since the financial crisis, public sector net debt has nearly trebled, rising from just 36 per cent of GDP to around 100 per
cent, an unprecedented peace-time rise. A key driver has been the important role (rightly) played by fiscal policy in supporting the economy in general, and hard-hit households in particular, from the impact of several ‘once-in-a lifetime’ economic shocks. The inability of monetary policy to provide as much support to the economy as it has in previous downturns – given that interest rates cannot fall below zero – means that fiscal policy has done more of the heavy lifting. The result is that debt has ‘ratcheted’ up, with big rises in each crisis, but small or no debt falls in between.

This has important implications for debates about the sustainability of the public finances. Such debates tend to be dominated by discussions of the Office for Budget Responsibility’s (OBR’s) long-term fiscal projections. These point to existing tax and spending policies setting debt trending alarmingly upwards in the coming decades – to more than three times the size of the economy over the next half century. Critics of those projections dismiss them as partial exercises, noting that the Government is committed to debt falling as a share of the economy, and that we can expect it to take decisions consistent with that at future fiscal events.

These debates are sideshows once we consider a key lesson of recent years – that commitments to debt being flat, or falling slightly, in normal times will not prevent debt rising considerably over time as shocks hit. If we are committed to debt not trending upward in the long run, the need to provide fiscal support during bad times means we must take seriously the task of rebuilding fiscal space in good times. But the scale of that task is highly uncertain: it depends not just on the nature and regularity of shocks to the economy, but also the future level of interest rates.

Future economic shocks are inevitable, but their impact will depend on the (uncertain) level of interest rates

Market pricing suggests that, after today’s battle with inflation is done, longer-term interest rates will settle well above the 1 to 3 per cent range that has been the norm between the financial crisis and the pandemic. In contrast, many economists argue the forces which kept rates at low levels in recent years have not disappeared. And published estimates remain at rock bottom for the longer-term real interest rates consistent with the global
economy growing at sustainable rates (to which short-term interest rates tend towards).

If markets are right, a higher baseline for interest rates will mean that the Bank of England can play a bigger part in stabilising the economy when future shocks hit, taking some pressure off fiscal policy and reducing the size of the ‘debt ratchet’. If, though, economists are right, then a reasonable central case is that debt will continue to ratchet up at an alarming rate, as it has since the turn of the century with fiscal policy required to do the heavy lifting in downturns.

In particular, in the higher rates world, the current Government’s (or the Labour opposition’s) fiscal framework which focuses on holding debt stable or slightly falling during good times, would not be enough to stop debt rising to 140 per cent of GDP over the next 50 years. Likewise, the debt interest bill would rise to a level we have not sustained for more than 70 years (around 5 per cent of GDP). This is based on debt ratchets roughly in line with those seen during the second half of the 20th century (of around 10 per cent of GDP once every 11 years) and with interest rates broadly in line with GDP growth.

But if we find ourselves in a world in which low interest rates mean monetary policy is once again marooned at the lower bound, and fiscal policy has to do the heavy lifting in supporting the economy in a downturn, then we face a much bigger public debt problem. If fiscal policy provides support roughly equivalent to the average post-war recessionary interest-rate cut when those downturns hit, that would mean a debt ratchet of 20 per cent of GDP in each downturn, putting debt on track to nearly double over the coming half century (reaching around 190 per cent of GDP). Preventing debt being on an ever-rising path in this world would require a major change to fiscal policy: governments would need to shift from targeting stable debt in good times to running a primary surplus of around 3 per cent. This means 3 per cent primary surpluses in three out of every four years, something that has been done in only three years in total out of the past 50.

To be clear, in the short term, higher interest rates are bad news for the public finances: each 1 percentage point rise in interest rates currently adds more than £15 billion to government borrowing in
five years’ time – and the impact of the rise in interest rates on government borrowing is one of the key reasons that the current Chancellor will find it so hard to find space for tax cuts. But higher interest rates also create the space for monetary policy to respond in downturns, which reduces the size of the debt ratchet.

Of course, zooming out even further, what matters for long-term debt sustainability is the difference between the average interest rate on government debt and the nominal growth rate of the economy. It is tempting to hope that growth in the decades ahead would exceed the interest rates on government debt in a low interest-rate world – as we saw before the pandemic. But counting on that happening is risky given that the difference between growth and interest rates has historically tended to zero. Growth exceeded the interest rate on government debt in just one year between 1990 and the financial crisis putting upward pressure on debt, despite rates falling by more than 4 percentage points over that period. And, in any case, such developments would not remove the need for a tighter approach to fiscal policy if debt is to be stabilised: if we optimistically assume that we could return to the pre-pandemic growth-interest rate differential, then preventing exploding debt would still require a 2 per cent primary surplus outside of recessions.

Given this uncertainty, and the scale of the fiscal sustainability challenge implied by simply continuing with the status quo, we now turn to what changes to our macroeconomic framework – that is, the rules and targets we set for fiscal and monetary policy – that might ease the task facing our macroeconomic policy makers. The challenge is to identify a framework that leaves us confident that it can put the public finances on a sustainable path, is able to provide enough policy space to allow for sufficient support to the economy in downturns, while avoiding infeasibly large fiscal adjustments.

Within this overall challenge, we focus on two key elements. First, creating more space for monetary policy, so that it can be used actively in future downturns, thereby reducing the pressure on fiscal policy and the size of debt ratchets. And second, a renewed focus on having the right fiscal policy tools so that we get more bang for our buck in a downturn, again reducing the upward pressure on debt in each crisis.
Negative rates and a higher inflation target can build space for monetary policy space for the future

Making sure we have space for monetary policy to operate is essential if we are to reduce our reliance on fiscal policy during downturns. An obvious approach would be to make more use of quantitative easing (QE) policies. But the UK’s experience suggests that QE has been unreliable: it worked well during times of extreme financial market distress, but was ineffective in calmer times.

More promising is developing our ability to cut rates into negative territory, easing the ‘zero lower bound’ constraint facing monetary policy makers. To date, the Bank of England’s main policy rate has gone as low as 0.1 per cent, but it is likely that it could be cut below zero. This would ease the constraint on monetary policy allowing more space to cut rates in a downturn. In other countries, rates went as low as –0.75 per cent in the aftermath of the financial crisis, providing a boost to the economy with little adverse impact on the financial system. Regulators should pave the way for the Bank to follow suit, exploring ways to mitigate the adverse effects of negative rates on banks. However, as things stand, it would be unwise to rely on being able to cut rates much below –1 per cent, given the risk that further cuts will weigh on bank profits, which could restrict rather than encourage lending, making the policy contractionary.

However, even being able to reduce interest rates to –1 per cent would not provide enough space for monetary policy to act in a low interest rate world. The only other way to take the pressure off fiscal policy in that world is to recognise the case for raising the inflation target. Raising the inflation target to 3 per cent, and allowing rates to be cut to –1 per cent, would reduce the chance of hitting the lower bound to more like 1 per cent – turning a once-a-decade event into a once-a-century one.

Raising the inflation target will come with costs, but our view is they are small compared to the costs to the economy and future taxpayers of hitting the lower bound as frequently as we have done recently. Businesses that need to adjusting prices more frequently will incur costs if inflation is higher. But we already accept such ‘menu’ costs in targeting an inflation rate above zero, and the UK data shows only a weak relationship between inflation and...
the frequency of price changes. In addition, evidence from price microdata suggests we should not expect to see an increase in price dispersion at moderately higher levels of inflation which could otherwise lead firms to mistakenly produce the wrong level of output to meet demand.

Most importantly, there also appears to be a low risk of suddenly flipping to a world where people must spend a lot more of their time thinking about inflation. Google search activity suggests that inflation needs to rise above 5.5 per cent before there is a step change in the extent to which people focus on the issue. The distributional impacts of higher trend inflation should also be small. Unexpected inflation shocks are usually bad for savers and good for borrowers, but higher expected inflation will be reflected in higher interest rates, which has an offsetting effect.

More so than the economic costs of higher inflation, the biggest risk of raising the inflation target would be a loss of confidence in the UK’s inflation targeting regime, which could lead to costly period of asset-price volatility. Mitigating this risk would require careful handling of the move to a higher target. In particular, a switch to the inflation target should not be done today, given the uncertainty about the future level of interest rates and whether this major step will be needed, as well as the risk that raising the target now is seen as a way to of avoiding today’s task of bringing inflation back to 2 per cent.

Instead, once inflation has fallen back to 2 per cent, the Government should review the UK monetary framework. This should consider the right level for the inflation target in light of evidence that emerges on the level of interest rates after the current turbulence. Ideally, both the review and any possible change to the target should be done in coordination with other advanced economies: doing so would reinforce the credibility of the change and avoid currencies being set on a path of trend devaluation. But, if international cooperation is not feasible, there would still be a strong case for the UK going it alone, even if it means that the nominal exchange rate drifts lower: unilaterally raising the UK’s inflation target would still deliver much-needed monetary policy space in a low-rate world.
Raising the inflation target may seem like a big step, and the experience of recent high levels of inflation reminds us of the impact it can have and the importance of macroeconomic stability. But clinging on to a 2 per cent target in a low-rate environment would be a costly mistake, and would eventually undermine the UK’s macroeconomic framework, putting it on an unsustainable cycle for public debt. Combining a higher target with negative rates could give us the monetary firepower we need to relieve the mounting pressure on fiscal policy if we find ourselves back in a low interest rate world.

**Smarter and more-targeted policy means we can get more ‘bang for our buck’**

The scale of fiscal pressure that has come from responding to economic shocks has not just been driven by the lack of space for monetary policy. It has been compounded by the fact that the ramping up of fiscal support measures has come without us developing the tools to do it well: we have not maximised the level of economic support bought for each pound borrowed. This is one of the reasons why discretionary fiscal spending has increased in recent recessions – more than tripling from the 1990s recession, when we estimate that support was worth around 5 per cent of GDP, to Covid-19, when measures of more than 15 per cent of GDP were put in place. Perhaps the most obvious example of a poorly-targeted intervention is the Energy Price Guarantee (EPG), which provided large amounts of unnecessary support to high-income households simply because no more targeted policy option was available. We estimate that a better-targeted EPG could have saved the Exchequer around £20 billion. Combined with other policy improvements during the pandemic, we estimate that savings of around £35 billion could have been realistically achieved with better-designed policy interventions. This would have saved the Government around £1 in every £5 spent on support during that period, reducing the rise in debt by nearly one-tenth.

Part of the answer is to make existing tools more effective. Public investment is particularly effective in a downturn, having a large ‘multiplier’ impact. But, as we have discussed in previous work, weak long-term commitment to investment plans has meant it is too volatile, leaving us unprepared for using it effectively in downturns. A higher sustained level of public investment,
implemented through multi-year settlements for departments’ capital budgets and long-term plans for major projects, should come with the benefit that public investment can be accelerated during downturns. A pipeline of projects cannot be wished into being when a crisis hits.

Existing unemployment benefit policy could also be more powerful in a downturn. In this context, our previous research has proposed putting in place a system of unemployment insurance that would replace two-thirds of lost earnings for the first three months of unemployment (rather than the current two-fifths for a single person without children). As well as such a system reducing individuals’ income risk in the event of job loss, it would also provide greater support to the economy in downturns, with the duration of entitlement able to flex in response to the macroeconomic environment.

But we also need to be able to respond to different sorts of crises, and not just react to ones of differing durations. What the UK needs is a flexible mechanism for targeting support to different types of families, that can be used in different ways depending on the circumstances. At its core, this requires far better data sharing between different parts of central government, and between central, devolved and local governments so that we can put in place – before, rather than during, the next crisis – both a database which can help target support and mechanisms through which to pay it. This could be a very cost-effective policy – to give a broad sense of the possible price tag, the Government spent less than £100 million developing and administering the employment support schemes during the pandemic – and the response to the pandemic demonstrates the savings are likely to run into the billions. In designing a system to deliver this, governments would want to combine data on individuals’ income, including earnings and benefits, along with household characteristics, such as where people live and the number of people in their household. This information, which exists across HMRC, DWP and other parts of the public sector, could allow for a range of targeted direct payments to be made in response to shocks, be they focused on particular groups or sectors of the economy, or more generalised. Taking steps to allow data held by government to be combined
with that held by the private sector is also desirable – most obviously to help in designing a ‘social tariff’ for future energy shocks.

Smarter policy should do more to identify and mitigate future risks, addressing failings of risk management in central government. Past reviews have repeatedly made recommendations in this area and, although decisions often look worse with the benefit of hindsight, egregious failings have made recent crises worse – including a lack of gas storage or insufficient preparation for non-influenza-based pandemics. It is clear more could be done.

**Better designed fiscal and monetary policy would mean the Government would need to run a 1 per cent primary surplus**

These policies, combined with an approach that guarantees that monetary policy has the space to support the economy during downturns, would reduce the extent to which future governments will need to run surpluses. Our long-term debt sustainability analysis suggests that avoiding the lower bound, and slightly reducing the average size and frequency of debt ratchets through better-targeted fiscal policies and improved risk management, would mean that a 1 per cent surplus, rather than 3 per cent, would be sufficient to put debt on a gently downward path in the long-run. That remains a challenging fiscal adjustment, but would be much more in line with the experience towards the end of the 20th century, when we ran a surplus of 1 per cent or more in three out of every five years.

The lessons of the difficult economic times we have recently lived through and uncertainty about what the future holds should prompt us to reconsider our macroeconomic policy framework. Building better fiscal tools, improving risk management and preparing for negative rates are clearly worth doing, and will significantly ease the adjustment required to put us on a sustainable path for public debt. But bigger changes – including a higher inflation target - are needed if the forces that pushed interest rates to ultra-low levels re- emerge. And in any world, fiscal policy is likely to need to be tighter in good times than either of the two main political parties is currently contemplating. But doing so would ensure macroeconomic policy can support the economy in bad times, whatever the future might bring.
Macroeconomic policy is on an unsustainable path

The policy challenge of taming the highest inflation in more than 40 years has rightly been the macroeconomic policy challenge of recent times. And, although it is too early to declare victory in that fight, progress is being made with the sharpest fall in inflation in over 30 years, meaning that the key question has become ‘how long’ will rates remain at high levels, rather than ‘how high’ do they need to go.

What the future holds is very uncertain, the ending – at least for now – of the era of ultra-low interest rates means the time is right for us assess the trajectory we’re on. Since the financial crisis, economic shocks have left us with a near-tripling of government debt. An important reason for this is that fiscal policy has had to play a larger role in supporting the economy with monetary policy boxed in by the zero lower bound for interest rates.

Crucially, the Government’s commitment to put debt on a downward trajectory in normal times will not prevent debt rising unsustainably over time as shocks hit. What it would take to correct that, and put debt on a sustainable trajectory, is highly uncertain: it depends not just on the shocks we will face but also the future level of interest rates. In particular, if rates remain at the new, higher levels suggested by market pricing, then the Bank of England will be able to play a bigger part in stabilising the economy when shocks hit; if not, then fiscal policy will have to continue to bear more of the load, meaning that debt will continue to ratchet up at an alarming rate.

A continuation of the sort of path we have been on would mean that infeasible fiscal adjustment would be required to stop debt on its upward march.

The task, then, is to put in place a framework for macroeconomic policy that provides us with the confidence that it will be fiscally sustainable and able to provide sufficient support to the economy in downturns, while avoiding infeasibly large fiscal adjustments. There are two key elements to achieving this: creating more space for...
monetary policy, to ensure it can be used actively in future downturns; and second, improving our fiscal policy tools so that we get more bang for our buck. Both of these steps would reduce the upward pressure on debt in each crisis.

The policy challenge of the here and now is to tame inflation

With inflation rising to its highest level since the early 1980s (Figure 1), the clear focus of macroeconomic policy makers has rightly been on bringing inflation down. The Bank of England has launched its largest tightening cycle since the late 1980s, raising rates at an unprecedented 14 fourteen consecutive meetings. For its part, the Government has announced its own target of halving inflation during the course of 2023. So the macroeconomic policy debate since the pandemic has been consumed by the question of whether enough is being done to tame inflation.

**FIGURE 1: High inflation has been the macroeconomic challenge of recent times**

Headline 12-month CPI inflation rate (left chart) and core inflation (right chart): US, UK, euro area and range for G7

![Graph showing headline inflation and core inflation for US, UK, and euro area with ranges for G7.](image)

NOTES: Core inflation data for Japan is not available from August 2021.
SOURCE: ONS, Consumer Price Inflation; BLS, Consumer Price Index for All Urban Consumers: All Items in U.S. City Average; Eurostat, Euro area (changing composition) - HICP - Overall index; and OECD, Consumer price indices (CPIs) - Complete database; Bank of Japan.

Although it is too early to declare victory in the fight against inflation, the debate has shifted decisively. The Bank of England’s decision to hold rates at 5.25 per cent in September came against the backdrop of the sharpest six-month fall in inflation for more
than three decades (Figure 1), amidst signs that the economy is slowing.\textsuperscript{1} The debate has shifted from ‘how high’ do rates need to go bring inflation down to ‘how long’ will they remain at these new high levels.\textsuperscript{2}

This rise in interest rates is bad news for the public finances. The OBR’s standard debt interest ‘ready reckoner’ suggests each 1 percentage point rise in (short- and long-term) interest rates currently adds more than £15 billion to government borrowing in five years’ time.\textsuperscript{3} This rise in interest rates on government borrowing is one of the key reasons that the current Chancellor is finding it so hard to find space for tax cuts.

A more positive implication is that, for the first time since the financial crisis, it is monetary policy – set by the Bank of England – that is now setting our macroeconomic destiny. Although it comes in very difficult circumstances – with the cost of living crisis leading to significant hardship – this is at least a welcome and significant development. It ends a period during which the Bank of England has been ‘boxed in’ by an inability to reduce interest rates further, meaning that fiscal policy has had to bear almost all of the load of stabilising the economy in the face of tumultuous economic times. As that chapter ends, at least for now, it is the right time to think about the path that we are now on.

It is clear that we cannot continue down the path we are on

But if we zoom out from the current challenge of inflation, it is clear that the journey we have been on in recent years from the financial crisis to global pandemic and cost of living crisis has left us with a weaker economy and far higher government debt. When combined with the new world of higher interest rates that means, ultimately, tougher policy trade-offs.

Growth has slowed alarmingly since the financial crisis.\textsuperscript{4} As shown in Figure 2, per capita GDP growth has fallen from an estimated trend of around 2.3 per cent prior to the financial crisis, to an average growth rate of just 1.2 per cent since 2010. This translates into a GDP-per-capita hit of nearly 30 per cent relative to a continuation of the pre-financial-crisis path. Part of the problem appears to be weak recoveries: in the second half of last century, GDP-per-capita tended to regain its estimated pre-recession

\textsuperscript{1} For more on this shift in the debate, see: S Pittaway, J Smith & G Thwaites, Macroeconomic Policy Outlook: Q3 2023, 5 October 2023.
\textsuperscript{2} Bank of England, Monetary Policy Summary and minutes of the Monetary Policy Committee meeting ending on 20 September 2023, 21 September 2023.
\textsuperscript{3} OBR, Fiscal risks and sustainability, July 2023.
\textsuperscript{4} For more on the UK’s struggles with weak growth, see: Resolution Foundation & Centre for Economic Performance, LSE, Stagnation nation: Navigating a route to a fairer and more prosperous Britain, Resolution Foundation, July 2022.
path (see Figure 2). But the slow recoveries from the financial crisis and the Covid-19 pandemic have clearly bucked that trend with the level of GDP, and, more worryingly, even the growth rate deteriorating in the aftermath of those downturns.

**FIGURE 2: GDP has not fully recovered from recent shocks**
Quarterly Gross Domestic Product per capita: chained volume measures, outturn and pre-recession trends: UK

NOTES: Trends are estimated using a standard unobserved components model in which growth is a function of short-term shocks, cyclical variation and a persistent (or trend) component. The dotted lines on the chart show the estimated trend component estimated on the full sample.

SOURCE: Analysis of ONS, National Accounts.

Perhaps the clearest way to see the problematic path we are on is to look at what has happened to government debt. As shown in Figure 3, public sector net debt has almost tripled as a share of GDP since the financial crisis, to its highest level since the 1960s, increasing from just 36 per cent of national income in 2007-08 to more than 100 per cent in 2022-23, an unprecedented peace-time rise in more than 300 years of fiscal data.\(^5\)

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\(^5\) OBR, Historical public finances database and public finances databank.

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A key reason for the rise in debt has been the need for fiscal policy to play a greater role in responding to shocks in recent years. The size and nature of the shocks this century, as well as the weak growth in their aftermath, have clearly contributed too. But fiscal policy has rightly played a key role in supporting the economy in general, and hard-hit households in particular, from the impact of several 'once-in-a-lifetime' shocks. This is at least partly because monetary policy has been constrained by the zero lower bound for interest rates, and so has been unable to support the economy as it has in previous downturns.

The debate about where debt goes from here has generally ignored the implications of these developments for the sustainability of the public finances. Such debates tend to be framed by discussion of the Office for Budget Responsibility’s (OBR’s) long-term fiscal projections. The latest incarnation of those projections is shown in Figure 4. As explained in Box 1, underpinning this is a standard approach to assessing fiscal sustainability that projects forward assumptions about how current tax and spending policies will affect the fiscal position under assumptions about the sustainable growth
path for the economy. Based on this, the projections show debt trending upwards alarmingly in the coming decades – to more than three times the size of the economy over the next half century.⁷

**FIGURE 4:** Public sector debt is on an unsustainable path

Long-term projections for public sector net debt as share of GDP under different assumptions: UK

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NOTES: The analysis in this chart builds on the OBR’s long-run debt sustainability analysis (OBR, Fiscal risks and sustainability, July 2023). Projections are constructed over a 50-year horizon taking the OBR’s most recent medium-term forecasts as the starting point (OBR, Economic and fiscal outlook, March 2023). The headline debt measure is public-sector net debt which includes the Bank of England. In all scenarios we take the OBR’s long-term economic determinants as given and we do not deviate from the OBR’s extrapolation of current government policy (OBR, Fiscal risks and sustainability, July 2022). In implementing a debt rule we simply calculate the primary balance change required to deliver small (0.25 percentage point) fall in the debt-to-GDP ratio in every year.


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**BOX 1:** Long-term debt sustainability analysis

In this report we build on the debt-sustainability analysis produced by the OBR in its Fiscal Risks and Sustainability report.⁶ This box briefly describes the key elements of that analysis and the key assumptions we

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⁷ Although we focus on public debt in this report, the same arguments would apply to broader measures of the health of the government balance sheet. Given we have previously made the case that public sector net worth is a better target for fiscal policy makers, it is worth stressing that rising public debt would mean falling public sector net worth. For a discussion of the properties of net worth as a fiscal target, see: R Hughes et al., *Totally (net) worth it: The next generation of UK fiscal rules*, Resolution Foundation, October 2019.

⁸ OBR, Fiscal risks and sustainability, July 2023.
have made in extending it. We also put this methodology in the context of other frameworks for thinking about the interaction between the fiscal and economic outlooks.

The OBR’s long-term debt sustainability analysis provides an illustration of the trajectory that fiscal policy is on over a 50-year horizon. The approach is to produce long-term forecasts for receipts and spending on the basis of the OBR’s best guess at what existing government policies imply for future policy decisions, and its long-term assessment of the macroeconomic determinants for the public finances. The baseline takes the most recent OBR forecast as its starting point, and projects forward based on its view of demographics and sustainable economic growth, along with its policy assumptions and an assessment of likely future financial transactions. In this way the OBR can build up a path for borrowing and debt.

On the economy, the OBR assumes that growth can be sustained at rates that are higher than those since the financial crisis but well below pre-financial-crisis averages. Specifically, the projections embody the assumption that real GDP growth hovers around 1.5-2 per cent (with nominal growth of around 3.5-4 per cent). This compares to a pre-financial crisis average of around 2.6 per cent, and growth between the financial crisis and the pandemic of around 1.4 per cent. These growth rates are constructed using a ‘production function’ approach – that is, they are based on assumptions about the evolution of the amount of labour and capital available for producing output, along with the level of total-factor productivity. The projections for the growth in labour is underpinned by demographic assumptions taken from the ONS population projections. Beyond growth and demographics, the OBR assumes inflation is consistent with the Bank of England’s target of 2 per cent and that interest rates are assumed to follow current market pricing.

In terms of assumptions about policy, the OBR extrapolates current government policy but updates it for evolving economic circumstances. For example, it assumes that future UK governments will continue to raise the pension age in line with past policy decisions and the on-going ageing of the population, and that the state pension will continue to be uprated using the ‘triple lock’. On taxes, the uprating of allowances and thresholds is assumed to be in line with earnings from 2027-28 onwards (that is, not only do the current threshold freezes come to an end, but the working assumption...
is that they track the level of earnings in the long-run). On spending, the big-ticket item is healthcare. Here, the assumption is that healthcare spending increases in line with its assessment of demographic and cost pressures. This means health spending rises from around 8 per cent of national income to around 15 per cent over the 50 years. Finally, spending on net-zero investment continues until 2050 in line with current policy.

Our main extension of the OBR’s approach is to model what the fiscal framework implies for how the public finances evolve. The Government’s current fiscal framework includes a commitment to achieve debt falls by the fifth year of the forecast. In the latest forecast, this achieved with a margin of just 0.2 per cent of GDP. In our policy simulations we model this as a change in the primary balance – that is, it is achieved through lower spending and higher taxes. Likewise, when modelling the required primary balance to put debt on a downward trajectory, we simply make top down adjustments to the primary balance. We make no assumptions about what changes to tax and spending policy would be necessary to achieve this, and we do not allow such policies to have any impact on the path of the economy. When modelling shocks to the economy, we follow the OBR’s approach of simply adding these to the stock of debt. We assume that policy is not able to return to its stated aim in the two years following a shock and, in the meantime, the primary balance is assumed to deteriorate in line with the OBR baseline.

In interpreting such debt-sustainability analysis, it is important to keep in mind how the projections are constructed. The framework is essentially one of accounting, with no feedback from policy to the state of the economy. As such, there is no allowance for an unsustainable fiscal position to affect current economic outcomes, particularly inflation, as some would argue is important.

Future economic shocks are inevitable, but their impact will depend on the level of interest rates, which is very uncertain.

The OBR’s projections are often dismissed as partial exercises, because they do not attempt model the policy framework that is designed to ensure sustainability of the

13 Resolution Foundation, Britain’s record tax rise on incomes is set to raise £40 billion a year by the middle of the next Parliament, 6 October 2023.
14 OBR, Economic and fiscal outlook, March 2023.
15 For a discussion of the type of trade-offs that might be involved, see: K Shah, J Smith & D Tomlinson, Under pressure: Managing fiscal pressures in the 2020s, Resolution Foundation, February 2022.
public finances. This means that the Government can argue that its fiscal rules require it to get debt falling over time (as illustrated very simply in the orange line in Figure 4) and that it will, in time, announce new policies consistent with that objective.\footnote{HM Treasury, Charter for Budget Responsibility, Autumn 2022 update, November 2022.}

Such arguments fail to recognise the key lesson of recent years, however: economic shocks mean that a fiscal framework that simply stabilises debt in normal times will not prevent debt from ratcheting up. The ‘once-in-a-lifetime’ shocks of recent years – the financial crisis, Brexit, Covid-19 and the cost-of-living crisis – have collectively wrought havoc with the public finances through a combination of economic damage and the fiscally-dominated policy response. But the OBR’s baseline debt sustainability analysis does not account for future economic hits. The run of ‘bad luck’ in recent years certainly doesn’t justify ignoring the possibility of more bad times to come. Instead, the fact that future shocks will occur should be central to the choice of fiscal rules that are so important to ensuring fiscal sustainability: if we are serious about getting debt to actually fall (or equivalently, to get the public sector net worth to rise) over time, we need to rebuild fiscal space in good times.

As discussed in more detail in Section 2, because low interest rates mean that monetary policy is likely to be marooned at its effective lower bound, fiscal policy is needed to carry more of the burden of stabilising the economy in the face of shocks.\footnote{As money effectively pays an interest rate of zero, it is difficult for central banks to set a substantially negative interest rate before there is a mass switch to cash. This constraint is referred to as the zero (or effective) lower bound constraint.} So if shocks hit when interest rates are low, then they are likely to lead to larger increases in debt.

Unfortunately, uncertainty about the future level of interest rates is very high. This uncertainty is illustrated by the difference between the consensus in financial markets and among economists about where interest rates might be headed in the longer run. As shown in Figure 5, the response of central banks across the world to the return of high inflation has pushed longer-term interest rates to well above the 1 to 3 per cent range that has become the norm in recent years. So, according to financial markets at least, the era of low rates is over. But many economists would argue that the underlying drivers of low interest rates remain.\footnote{See for example, M Del Negro et al, Global trends in interest rates, Journal of International Economics, 118, 2019.} And estimates of the long-run inflation-adjusted global real interest rate, to which shorter-term interest rates around the world are thought to be attracted, remain at rock bottom (one example is shown in Figure 6).
FIGURE 5: According to financial markets, the era of low interest rates is over…

Instantaneous forward rates derived from UK gilts


FIGURE 6: ...but economists’ estimates of the long-run inflation-adjusted global real interest rate remains at rock bottom

Estimate of the long-run inflation-adjusted global real interest rate (global R*)

NOTES: Estimates are GDP-weighted average of estimates for the US, euro area and Canada.

To a large degree, uncertainty about the future interest rate maps directly into uncertainty about the impact of future shocks on public debt. If we’ve returned to the
higher global interest rates of late last century, that means that monetary policy can play a larger role when shocks hit, and we should expect the ratcheting up of debt to slow. We are not saying higher interest rates are good for the public finances. As already mentioned, in the short-term, higher rates make servicing our existing large debts more expensive. But, looking ahead, higher interest rates also create the space for monetary policy to respond in downturns, reducing our reliance on fiscal policy.

In the long term, a key driver of the sustainability of our public finances is the difference between the average interest rate on government debt and the growth rate of the economy. So, in the long term at least, it is not as simple as saying lower rates make higher debts more manageable. As discussed in Box 2, the difference between interest rates and the growth rate has tended towards zero (roughly where the OBR’s projections assume it is headed). So it is, at best, risky to assume that a return to low rates also means interest rates remain below the growth rate into the long term – we need to think about both sides of the equation. All this means that low interest rates may not be as beneficial for longer-term debt sustainability as might be expected.

**BOX 2: Prospects for growth-adjusted interest rates**

The most important determinant of the stability of the public finances is the difference between the cost of servicing debt and growth, referred to as ‘r – g’. The reason both elements matter is because faster growth erodes the debt-to-GDP ratio, whereas the interest rate acts to push up on debt because a given level of debt is costlier to finance. So both elements are important. A common misconception is that it is only the interest rate that matters. But growth rates are also important and tend to be more variable over time, with a standard deviation that is more than double that for interest rates. So in this Box we look at the historical context and discuss what that implies for risks around the path of r – g.

The growth-adjusted interest rate tends to revert towards zero over time. Figure 7 shows a long time series of annual data on the history of r – g. On average, in nearly 150 years of data, growth rate has exceeded interest rates. But this average is dominated by the post-war period during which high inflation and financial repression (which kept interest rates artificially low) led to a long period of negative r – g. Looking just at the past 40 years (and certainly since the advent of inflation targeting in the UK), interest rates have typically exceeded...
growth rates. But while there has been a long period of positive and negative differentials, a common finding is that this difference tends to zero.\textsuperscript{21} In previous work we found this applied to the UK too, but with very slow adjustment – with half of the deviation from zero eroding every seven years on average.\textsuperscript{22}

Looking ahead, then, it would be – at best – risky to assume that $r - g$ is very negative over the long run. While that was the case in the run up to the pandemic, interest rates have since risen significantly. In the OBR’s most recent long-term debt sustainability analysis, $r - g$ is very close to zero in the long term (albeit slightly positive).\textsuperscript{23} This makes debt sustainability more difficult than the case where interest rates are below growth rates. But it is a much more realistic assumption than made in recent incarnations of those projections, in which the public finances were assumed to benefit

\begin{figure}
\centering
\includegraphics[width=\textwidth]{figure7.png}
\caption{The growth-adjusted interest rate seems to tend to zero but can be positive or negative for long periods}
\end{figure}

\begin{itemize}
\item [\textbullet] N R Mehrotra, Debt sustainability in a low interest rate world, Journal of Monetary Economics, 124(S), 2021.
\item [\textbullet] OBR, Fiscal risks and sustainability, July 2023.
\end{itemize}
from big tailwinds from growth being significantly above interest costs. So while we discuss the sensitivity of our long-term fiscal modelling to different assumptions about the growth adjusted interest rate, assuming it is close to zero in the long term seems like a sensible starting point.

To illustrate the importance of these issues, we again build on the OBR’s debt sustainability analysis but factor in the impact of economic shocks. Specifically, in the ‘standard recessions’ scenario, debt shocks occur every 11 years and add 10 percentage points to the debt-to-GDP ratio, roughly in line with the frequency and size of shocks during the second half of the last century.\(^{24}\) This scenario captures an environment in which debt ratchets are more in line with the experience of the second half of the 20th century when monetary policy was not constrained by the zero lower bound. As shown in Figure 8, achieving debt sustainability in a world where economic shocks happen is much harder than under the OBR’s baseline, with our projections showing that public sector net debt (PSND) could rise to around three-and-a-half times GDP by the end of the 50-year scenario.

Crucially, even in this relatively sanguine scenario, the current Government’s (and the Labour opposition’s) commitment to stabilising debt (outside of shocks and their immediate aftermath) is far from sufficient to put debt on a downward path.\(^{25}\) Even with action to put debt on a gradually declining path, debt would continue to rise to around 140 per cent of GDP, and the debt interest bill would rise to around 5 per cent of GDP, the highest sustained level in more than 70 years.

\(^{24}\) We assume that in the year of the shock hits and in the two subsequent years the primary balance continues to deteriorate in line with the OBR’s baseline assumptions. This is consistent with the experience of past recessions in which it takes time for the government to stabilise the public finances.

FIGURE 8: Shocks that are roughly the size of those observed in the second half of last century would push debt up to 360 per cent of GDP

Long-term projections for public sector net debt as share of GDP under different assumptions: UK

NOTES: The analysis in this chart builds on the OBR’s long-run debt sustainability analysis (OBR, Fiscal risks and sustainability, July 2023). Projections are constructed over a 50-year horizon taking the OBR’s most recent medium-term forecasts as the starting point (OBR, Economic and fiscal outlook, March 2023). The headline debt measure is public-sector net debt which includes the Bank of England. In all scenarios we take the OBR’s long-term economic determinants as given and we do not deviate from the OBR’s extrapolation of current government policy (OBR, Fiscal risks and sustainability, July 2022). In implementing a debt rule we simply calculate the primary balance change required to deliver small (0.25 percentage point) falls in the debt-to-GDP ratio in every year.


But if we find ourselves in a low interest rates and growth world, where we continue to need fiscal policy to do the heavy lifting in supporting the economy in a downturn, then we face a much bigger problem. If monetary policy is constrained, debt ratchets will be larger given that fiscal policy will have to do more to support the economy. So, in Figure 9, we introduce a second scenario in which debt ratchets up by 20 per cent of GDP every 11 years (‘standard recessions with lower bound’). This would put debt on track to nearly double over the coming half century, reaching around 190 per cent of GDP, even with a debt-falling rule. And, as discussed in Box 3, although there is no concrete link between

26 The scale of the debt rise here is similar to the ‘21st century shocks’ scenario used in the OBR’s most recent long-term modelling exercise (OBR, Fiscal risks and sustainability, July 2023). But unlike that scenario we choose 20 per cent to allow for around 10 percentage points of stabilisation policy, rather than basing the scenario on historical experience which includes a variety of reasons for the rise in debt. We choose 10 percentage points because it equates roughly the amount of fiscal policy that would be required to deliver the equivalent boost to GDP as the average interest rate cut implemented during recessions since the Second World War (of nearly 6 per cent – see Figure 18 in J Smith et al., Recession ready?: Assessing the UK’s macroeconomic framework, Resolution Foundation, September 2019). We convert that into a GDP impact by scaling the impact of a 5.25 percentage point cut in rates published by the Bank of England (P Bunn, A Pugh & C Yeates, The distributional impact of monetary policy easing in the UK between 2008 and 2014, Bank of England Working Paper, Bank of England, March 2018). We then back out the fiscal stimulus that would be needed to have the same peak impact on GDP using the OBR’s average spending and tax multiplier – i.e. we are agnostic about the policy levers the Government might pull to achieve that. This analysis suggests 10.2 per cent of GDP of fiscal measures would be required to equate for a rate cut of 5.6 percentage points.

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the level of debt and the triggering of a fiscal crisis, such levels would be unprecedented among advanced economies, and certainly would very substantially increase the risk of a crisis-driven loss in confidence.

**FIGURE 9:** Relying on fiscal policy for stabilisation would mean bigger shocks putting debt on track to nearly double even with a debt-falling rule

Long-term projections for public sector net debt as share of GDP under different assumptions: UK

NOTES: The analysis in this chart builds on the OBR’s long-run debt sustainability analysis (OBR, Fiscal risks and sustainability, July 2023). Projections are constructed over a 50-year horizon taking the OBR’s most recent medium-term forecasts as the starting point (OBR, Economic and fiscal outlook, March 2023). The headline debt measure is public-sector net debt which includes the Bank of England. In all scenarios we take the OBR’s long-term economic determinants as given and we do not deviate from the OBR’s extrapolation of current government policy (OBR, Fiscal risks and sustainability, July 2022). In implementing a debt rule we simply calculate the primary balance change required to deliver small (0.25 percentage point) falls in the debt-to-GDP ratio in every year. SOURCE: Analysis of OBR, Public finances databank – February 2023 (EFO edition), Economic and fiscal outlook - March 2023 & Fiscal risks and sustainability – July 2023.

**BOX 3:** The limits to fiscal policy – what does the 2022 mini-budget experience tell us?

There are those that would say there are few limits to government borrowing in major advanced economies, particularly in their own currency.27 In this Box, we discuss evidence on the limits to fiscal policy and the factors that are important in reaching them.

Despite much work on the subject, research has failed to arrive at a


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consensus, one-size-fits-all limit, as to how much rich-country governments can borrow in their own currency.\textsuperscript{28} Looking at past crises, and the determinants of public finances, suggests that a range of factors affect a country’s ability to borrow.\textsuperscript{29} In addition to the level of debt, these include: maturity structure of debt; holdings of liquid assets; extent of additional ‘off balance sheet’ liabilities, such as those associated with unfunded pension schemes; the scope for fiscal adjustment; and of course the credibility of the fiscal framework.\textsuperscript{30,31}

In practice, the limits to borrowing depend on the willingness of forward-looking financial markets to finance debt. Because the perceived risks of holding UK government debt depend on its cost, and the cost depends on the risks, worries about policy measures can feed back on themselves.\textsuperscript{32} This means fiscal crises can emerge ‘gradually, then suddenly’ – with risks building for months, or even years, and then leading to sharp changes to markets’ willingness to borrow. This is a particularly important consideration for the UK which is reliant on foreign buyers of gilts: foreign, private ownership of UK debt has doubled to around 25 per cent of total debt since 2004, well above the advanced economy average of 18 per cent.\textsuperscript{33}

This puts the onus on the fiscal frameworks – with their checks and balances – to hardwire a feedback from decisions about spending and tax policies and targets for fiscal sustainability (falling debt a share of the economy in the UK’s case).

In this context, what are the lessons from last year’s disastrous mini-budget which prompted a sharp rise in borrowing costs on UK Government debt?

Because gilt markets largely continued to function during that period, albeit with intervention from the Bank of England, we do not view that episode as being one in which the UK hit the limits to borrowing. That said, there was a clear increase in the risk premium associated with UK Government assets. As shown in Figure 10, gilt yields increased sharply in the immediate aftermath (and rose further in the following days), and sterling depreciated decisively against the dollar. This is different from the response in other episodes: historically, large tax cuts have often come with an appreciation in sterling. But the response of the exchange rate following the mini-budget is consistent with a repricing

\textsuperscript{28} For more on this question, see: OBR, Assessing ‘fiscal space’, Box 13, Fiscal risks report, July 2021.
\textsuperscript{29} J D Ostry et al., Fiscal Space, IMF Staff Position Note, September 2010.
\textsuperscript{31} F Caselli et al., The Return to Fiscal Rules, IMF Staff Discussion Notes, 2022.
\textsuperscript{33} Box 4.2 in OBR, Fiscal risks and sustainability, July 2023.
of risk for the UK. The fact that other
tax cutting episodes seem to have
been met with a more sanguine market
reaction has been attributed to process
failure – for example, the absence of
accompanying OBR forecasts. But
many of the other episodes in Figure
10 pre-date the advent of the OBR,
suggesting this can’t be whole story.
Here our view is that the combination
of large unfunded tax cuts, a lack of
clarity about how fiscal sustainability
would be maintained, and a lack of due
process all conspired to contribute to
the financial market response, but that
also high levels of pre-existing debt
increased the risks of such an outcome.
If that’s right, a clear plan for delivering
sustainable public finances should help
reduce the risks of such an episode
being repeated.

FIGURE 10: Unlike after other large tax cuts, sterling depreciated in the
aftermath of the Truss-Kwarteng mini-budget, suggesting a rise in UK risk
premia

Percentage changes in US dollar-sterling exchange rate (left panel) and percentage
point change in 10-year gilt yields (right panel) around the time of large tax-cut
announcements: UK

NOTES: The size of announced tax cuts is based on forecasts from the time of each fiscal event (actual
impacts on tax revenue may have differed) and are 2026-27 nominal GDP terms. For the dots labelled
just with years they are the Budget announcement for that year. Where daily data is available (after 1975
for exchange rates and after 1979 for gilt yields) the dots capture high-frequency changes – that is, the
change in the two days after the announcement relative to the day before; for earlier dates we use monthly
changes. Positive values for changes in the US dollar-sterling exchange rate signify an appreciation.
SOURCE: Analysis of Bank of England, Yield curves, exchange rate database & A millennium of
macroeconomic data and OBR, Policy measures database.
Preventing debt being on an ever-rising path in this world would require a massive change to the framework for fiscal policy. Governments would need to shift from targeting stable debt in good times to running a primary surplus of around 3 per cent. This is unlikely to be feasible: it would require governments to run 3 per cent primary surpluses in 3 out of every 4 years, having done it in only 3 years in total out of the past 50. It also requires a fiscal adjustment of the order of 3 per cent of GDP per decade, relative to the deteriorating OBR baseline – about the same as the fall during the peak years of austerity between 2013-14 and 2018-19.

Hoping that low rates will ride to the rescue is too optimistic

Given the scale of this challenge, it’s tempting to think that we should put adjustment off and hope lower interest rates turn up. As explained in Box 2, what matters for long-term debt sustainability is the difference between the average interest rate on government debt and the nominal growth rate of the economy. So, in order to model a more benign interest-rate environment, we assume that the interest rate-growth differential returns to its pre-pandemic average of around –1.5 per cent. As shown in Figure 9, it is true that such an environment is one in which the challenge is smaller. But a 2 per cent primary surplus would still be required to stop debt rising – still a massive fiscal adjustment.

But counting on growth being larger than interest rates would be risky given that the different between the two has averaged zero in the past (see Box 2). In addition, as discussed in Box 3, the key lesson from the disastrous mini-budget in 2022 is that allowing the public finances to continue to deteriorate increases the risk of a costly fiscal crisis. And that risk is heightened by the absence of a clear framework for addressing the sustainability issues. So while we might hope that a return to ultra-low interest rates will ride to the rescue, the reality is that this is unlikely to help much and that postponing the adjustment itself comes with risks.
FIGURE 11: **A more favourable growth-adjusted interest rate would reduce the need for adjustment somewhat**

Long-term projections for public sector net debt as share of GDP under different assumptions: UK

NOTES: The analysis in this chart builds on the OBR's long-run debt sustainability analysis (OBR, Fiscal risks and sustainability, July 2023). Projections are constructed over a 50-year horizon taking the OBR's most recent medium-term forecasts as the starting point (OBR, Economic and fiscal outlook, March 2023). The headline debt measure is public-sector net debt which includes the Bank of England. In all scenarios we take the OBR's long-term economic determinants as given and we do not deviate from the OBR's extrapolation of current government policy (OBR, Fiscal risks and sustainability, July 2022). In assessing alternative frameworks' performance against one-off debt shocks we allow a period of two years to elapse after the shock before returning to the rule. In implementing a debt rule we simply calculate the primary balance change required to deliver small (0.25 percentage point) falls in the debt-to-GDP ratio in every year.


So, given interest rate uncertainty and the risk of future shocks, the question posed by this report is: how do we put macroeconomic policy on a sustainable footing? The task is to devise a framework that provides us with sufficient confidence that it will be fiscally sustainable, but also means that governments can provide sufficient support to the economy in downturns, while avoiding infeasibly large fiscal adjustments. To achieve this, we focus on two approaches that would reduce the size of the required fiscal policy response in the event of a crisis. First, we consider how we could create more space for monetary policy, to ensure it can be used actively in future downturns, thereby reducing the pressure on fiscal policy and the size of debt ratchets. Second, we focus on having the right fiscal policy tools so that the Government gets more bang for our buck in a downturn, again reducing the upward pressure on debt in each crisis. In the subsequent sections we discuss each of these approaches. To this end, this report is structured as follows:
• In Section 2 we discuss how we might build monetary policy space allowing the Bank of England to avoid the lower bound in the years ahead;

• Section 3 then turns to the issue of how fiscal policy can be reformed to make it smarter by improving our fiscal tools in order to reduce the inefficiency and waste and to manage the risks that will come back to the government more effectively; and,

• Section 4 concludes, by drawing together our proposals for putting and drawing out the implications for the future fiscal framework.
Section 2

Avoiding the lower bound is a key part of putting policy on a sustainable path

For most of past 15 years, the Bank of England has found itself boxed in by the lower bound on interest rates. Making sure we have enough monetary policy space to avoid this situation in future is key to reducing our reliance on fiscal policy in downturns. Greater use of quantitative easing (QE) policies isn’t the answer: QE worked well in times of distressed and dysfunctional markets, but isn’t a reliable substitute for cutting rates. We can, however, follow other countries by cutting rates into negative territory. Regulators should pave the way for negative rates by exploring ways to mitigate their adverse impacts on banks.

However, negative rates alone will not give us sufficient monetary policy space if we emerge from the current inflationary shock back into a world of low interest rates. In that world, there is a strong case for raising the inflation target. A combination of marginally negative interest rates and raising the UK’s inflation target to 3 per cent would significantly reduce our chances of hitting the lower bound once again: turning it from a once-a-decade event to something that occurs once in a century. Raising the target will come with costs, but they are smaller than the costs of inaction.

Raising the inflation target would be a bold step, and it must be handled carefully in order to underscore, rather than undermine, confidence in the UK’s macroeconomic framework. That means not raising the target today, given there is still huge uncertainty about the long-run level of interest rates and inflation is well above its current 2 per cent target. Instead, we should wait until inflation returns to 2 per cent. At that point we should start a review of the UK monetary framework, ideally in concert with other advanced economies, to consider the right inflation target in light of evidence that emerges on the economic environment. If we are back in a world of low interest rates, raising the target will be a crucial step towards more sustainable macroeconomic policy.
As set out in Section 1, constrained monetary policy has been a key part of the UK’s unsustainable macroeconomic framework. The low rate world of the 2010s has made us over-reliant on fiscal policy, leading to weak recoveries from economic downturns and levering up the government’s debt ratchet. Avoiding the lower bound on interest rates is crucial to putting macroeconomic policy on a sustainable path.

We must address the risk of a low rate world, even though the present outlook for interest rates is unusually uncertain. As discussed in Section 1, there is no consensus among financial markets and economists over where interest rates will settle after the current period of high inflation. But there is a high chance that rates will be lower than they were before the financial crisis, and this would materially increase our chances of hitting the lower bound again.

What are the chances of Bank Rate hitting the lower bound in a low rate world? If the forces that drove down interest rates before the pandemic reassert themselves in the coming years, then the natural real interest rate (the real interest rate that the central bank needs to set to achieve full employment) could remain at around 1 per cent, as implied by Figure 6. With a 1 per cent natural real interest rate and a 2 per cent inflation target, the average level of Bank Rate (where monetary policy is neither stimulating or contractionary) would be 3 per cent. As a simple thought experiment, we have taken the observed variation in Bank Rate between January 1980 and March 2009, and re-centred the implied distribution on a neutral rate of 3 per cent. Based on this re-centred distribution, we would expect Bank Rate to fall below zero around 11 per cent of the time – or for around one year per decade on average – as shown by Figure 12.

In reality, the problem posed by the lower bound is likely to be worse than this calculation suggests. This simple exercise does not account for the fact that the lower bound on interest rates is inherently sticky. If a downturn hits and Bank Rate is moored at zero when the optimal policy rate is in fact significantly negative, then the Bank of England is not providing the stimulus that the economy needs. This lack of stimulus slows down the subsequent recovery, increasing the amount of time that rates need to be held at zero. Research from the US that incorporates this channel finds that nominal interest rates would need to be below zero for up to two fifths of the time in a world where the natural real interest rate is 1 per cent.

34 For a discussion of the link between constrained monetary policy and weak economic growth, see: J Smith, As good as it gets?: The forces driving economic stagnation and what they mean for the decade ahead, The Resolution Foundation, July 2022.
35 This follows from the Fisher equation, which says that, as a close approximation for values close to zero, the nominal interest rate is the sum of the real interest rate and the inflation rate.
FIGURE 12: Based on historic variation in Bank Rate, being back in a low-rate world could mean the lower bound binding at least 11 per cent of the time

Estimated distribution of Bank Rate with a 1 per cent natural real interest rate and a 2 per cent inflation target

NOTES: Distribution is based on deviations of the monthly average of Bank Rate from a fitted linear trendline between January 1980 and March 2009, when Bank Rate was cut to 0.5 per cent. The linear trend line removes variation that is due to a secular fall in interest rates over the sample period. It is estimated using an Epanechnikov kernel function and is re-centred such that the high point of the distribution is at 3 per cent.


A world where the Bank of England spends a significant amount of time stuck at the lower bound is a threat to the sustainability of the UK’s public finances. More time at the lower bound means there is even more pressure on fiscal policy to boost economic activity in a downturn. In order to open the door towards a sustainable macroeconomic framework, we must relieve some of that pressure. But how do we go about doing so?

Quantitative easing should be part of the UK’s macroeconomic framework, but is not a reliable substitute for rate cuts

An obvious response to facing the lower bound on interest rates would be to make more use of quantitative easing (QE). QE has become a prominent part of central banks’ toolkit since the financial crisis, and it saw widespread use in the Covid-19 shock: 11 central banks (including the ECB, Federal Reserve, Bank of Japan and Bank of England) undertook asset purchases in pursuit of their monetary policy objectives during the pandemic.37

But QE is not a silver bullet. There is an emerging consensus among central bankers that the effects of QE are limited outside of times of extreme market turbulence.\(^3^8\) For example, Figure 13 shows the impact of various Bank of England QE announcements on ten-year gilt yields. Two instances stand out for their impact on yields: February-March 2009 and March 2020. Both these periods were characterised by a spike in measures of market illiquidity, circumstances where QE is expected to be more potent.\(^3^9\) In other instances – i.e. where QE announcements were made in the context of better market functioning – there was a limited impact on yields. Based on the relationship between QE surprises and yields from these quieter times, it would take an asset purchase of £120 billion – equal to around one fifth of Bank of England’s pre-pandemic balance sheet – in order to reduce long-term yields by just a quarter of a percentage point.

QE certainly has a role to play in the UK’s macroeconomic framework. The evidence of the financial crisis and the early stages of the Covid-19 shock points to powerful effects in times of market turbulence. In such times, QE should be deployed to shore up financial stability and aid the functioning of monetary policy. Temporary asset purchases, such as those carried out by the Bank of England in September 2022, should also be used to protect financial stability at times when looser monetary policy is unwarranted.\(^4^0\) But, given the broader experience of QE, it cannot be relied upon to substitute for interest rate cuts at all times.

In the aftermath of the financial crisis, another unconventional monetary policy tool that came to prominence alongside QE was the setting of negative policy rates. Here, there is greater promise of easing the lower bound on interest rates. In the rest of this Section, we set out how negative policy rates, combined with a higher inflation target, would deliver the extra monetary policy space that we’d sorely need in a low-rate world.

\(^3^8\) For example, see: A Bailey, *The central bank balance sheet as a policy tool: past, present and future*, speech given at the Jackson Hole Economic Policy Symposium, August 2020.

\(^3^9\) G Vlieghe, *Running out of room: revisiting the 3D perspective on low interest rates*, speech given at the London School of Economics, July 2021.

\(^4^0\) In September 2023, the Bank of England announced plans to develop a facility for lending to non-bank financial institutions in a stress, set out in: A Hauser, *A journey of 1000 miles begins with a single step: filling gaps in the central bank liquidity toolkit*, speech given at a Market News International Connect Event. Once operational, this could alleviate the need to use QE on financial stability grounds. economy2030.resolutionfoundation.org
Negative rates can help but will not shift the dial materially without a fundamental change in our financial system

As shown in Figure 14, five major central banks deployed negative rates during the 2010s – with rates going as low as -0.75 per cent in Switzerland and Denmark.\(^\text{41}\) A similar policy in the UK, where the Bank of England’s policy rate has only gone as low as 0.1 per cent, could in principle give the Bank of England more firepower and reduce our reliance on fiscal policy to stimulate the economy.

\(^{41}\) In addition to those shown in Figure 14, the central banks of Bosnia and Herzegovina, Bulgaria and Hungary also set negative policy rates during the 2010s.
FIGURE 14: A number of major central banks set negative policy rates in the 2010s

Headline central bank policy rates in jurisdictions that set negative interest rates:
January 2007-August 2023

NOTES: Between April 2013 and December 2015, the Bank of Japan replaced its primary interest rate target with a quantity target for money market operations. Its pre-existing target is shown for this period.
SOURCE: Analysis of Bank for International Settlements, Central bank policy rates; European Central Bank; Bank of Japan, Minutes of the Monetary Policy Meeting.

International evidence suggests that negative interest rates would provide additional monetary stimulus in the UK. A major concern over the effectiveness of cutting rates below zero is that it erodes banks’ profit margins, which in turn could be contractionary if banks cut back on lending to households and businesses as a result.\(^{42}\) Cutting rates from well above zero does not carry this risk: banks can simply offset lower rates earned on their assets (including central bank reserves) by cutting the rates paid on their liabilities. But when rates turn negative, banks are constrained in their ability to pass on lower rates to depositors, who make up a large share of bank liabilities. This is because depositors can, in principle, avoid negative rates by holding cash instead, draining the banking system of deposits. However, empirical evidence suggests that negative rates at the levels seen to date have not had large adverse impacts on bank profitability,\(^{43}\) and that the pass through to corporate deposit accounts (where the costs of holding deposit balances as cash are significant) has had an important stimulating impact.\(^{44}\) Box 4 explores these issues in more detail, but our view is that we would expect to see similar effects in the UK.

In this Box we summarise the key findings of the research into the impact of negative rates and discuss the implications for the UK.

Cutting rates into negative territory has a different impact on the economy than cutting rates well above zero.\textsuperscript{45} When central banks cut rates above zero, part of the way this has an effect on the economy is through commercial banks’ cutting their deposit and loan rates. This stimulates economic activity by incentivising borrowing over saving, and redistributing income from savers to borrowers, who tend to be more likely to spend. But when rates are cut below zero, this channel is impeded by the lower bound on deposit rates. Banks are reluctant to charge negative deposit rates to households due to concerns that depositors will withdraw their funds and hold cash instead.\textsuperscript{46} As well as shutting down the transmission of monetary policy via deposit rates, cutting rates into negative territory also erodes banks profit margins, leading to banks withdrawing from lending activity.\textsuperscript{47}

The overall impact of negative rates on the economy depends on the combined impact of various channels of monetary transmission. While transmission via deposit rates and bank lending might be weaker, transmission to money market rates and other liquid financial assets is likely to be stronger.\textsuperscript{48} Although there are instances where negative rates have had adverse impacts for banks, particularly those that rely heavily on household deposits, evidence suggests that the corporates play a key role in the transmission of negative rates.\textsuperscript{49} Corporate depositors are less likely than households to withdraw funds when faced with negative rates, largely due to the high cost of storing large balances in cash. By the end of 2020, around one third of corporate deposits in the euro area were charged a negative rate. Businesses facing negative deposit rates appeared to respond by reducing liquid asset holdings and increasing longer-term investment.\textsuperscript{50}

Looking at the overall economic impact of negative rates, while it is difficult to estimate precisely given this is still a relatively

\textsuperscript{45} Strictly speaking, the mechanisms that impede the transmission of negative rates can start to occur for rate cuts in positive territory but still above zero. This will depend on how much lower deposit rates are priced relative to the central bank’s policy rate. Nonetheless, in this Box we follow much of the literature in focusing on negative rates, where the mechanisms described will be most material.


\textsuperscript{48} G Eggertsson et al., Negative Nominal Interest Rates and the Bank Lending Channel, NBER Working Paper, September 2020.

\textsuperscript{49} F Heider, F Saidi & G Schepens, Banks and negative interest rates, ECB Working Paper, May 2021.

new innovation, macroeconomic modelling suggests that the impact of rate cuts below zero could be 60 to 90 per cent as effective as cutting rates above zero.  

FIGURE 15: The UK’s banking system as a whole is less reliant on household deposits than in a number of countries that have experienced negative rates

Banking sector liabilities to households and non-profit institutions serving households (NPISH) as a proportion of total external liabilities: selected countries, December 2014-June 2018 average, unless specified

<table>
<thead>
<tr>
<th>Country</th>
<th>Proportion</th>
</tr>
</thead>
<tbody>
<tr>
<td>Spain</td>
<td>39%</td>
</tr>
<tr>
<td>Switzerland</td>
<td>38%</td>
</tr>
<tr>
<td>Italy</td>
<td>31%</td>
</tr>
<tr>
<td>France</td>
<td>28%</td>
</tr>
<tr>
<td>UK</td>
<td>21%</td>
</tr>
<tr>
<td>Netherlands</td>
<td>20%</td>
</tr>
<tr>
<td>Sweden</td>
<td>14%</td>
</tr>
</tbody>
</table>

NOTES: Data covers internationally active banks in each jurisdiction that report BIS Locational Banking Statistics. Total external liabilities are calculated as total liabilities minus intragroup liabilities. Data is shown for countries that experienced negative rates and where there is data available between December 2014 and June 2018 period, the period where data is also available for the UK. For Netherlands and Spain, data is not available for the whole time period. For these countries, we show averages over the following time periods: Spain, March 2017-June 2018; Netherlands, December 2014-December 2016.


When thinking about implications for the UK, it is important to keep in mind two key features of the UK financial sector: our reliance on deposits, particularly from households; and the pre-existing health of the banking system as a whole. Figure 15 shows banks’ household liabilities (the vast majority of which are likely to be deposits) as a share of total liabilities for the UK and countries that experienced negative rates in the 2010s. The UK banking sector as a whole is among the least-reliant on deposits, suggesting that it should be well-equipped to deal with negative rates. The UK

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52 This average figure masks a variation across lenders in the UK. Building societies, who are much more reliant on deposit funding than commercial banks, would be more adversely affected by negative rates.
banking system also appears to be in good health, with aggregate capital buffers comfortably above typical levels seen in the euro area during the mid-2010s.\(^{53}\) Well-capitalised banks should allow rates to go further into negative territory by softening the impact of any hit to bank profitability.\(^{54}\)

But the additional amount of monetary stimulus provided by negative rates is likely to be modest. The evidence to date suggests that rate cuts have been stimulating up to around -0.75 per cent. But it does not tell us how much further rates could go. Based on the available evidence, it would be unwise to presume that rates in the UK could go much further than -0.5 to -1 per cent without hitting their effective lower bound (ELB).\(^{55}\) And even if the UK doesn’t hit the ELB outright, rate cuts would become ever less stimulating as the UK moves closer to the ELB.\(^{56}\) For example, if lenders try to protect their profit margins by not passing on Bank Rate cuts to mortgage rates, this would shut down a channel that is thought to account for up to a quarter of the total impact of monetary policy.\(^{57}\)

Over a longer horizon, a radical option to significantly relax the ELB constraint would involve the introduction of a central bank digital currency (CBDC). The CBDC’s value could be gradually reduced in a way that replicates the impact of negative rates, allowing greater pass through to deposit rates. But introducing a CBDC would not, in and of itself, be enough to enable significantly negative rates. It would also require a fundamental reduction in the role of cash, to make it extremely costly and inconvenient to hold. Such a change would likely be deeply unpopular and would pose significant challenges to large parts of the UK population today.\(^{58}\) We therefore do not see this as a feasible way to loosen the UK’s lower bound constraint, at least in the medium term.

Even without a radical change to the UK’s financial system, Bank Rate can go lower than we’ve seen to date – and indeed should go lower if required. In order to maximise the potency of rate cuts below zero, regulators should encourage lenders to ensure their

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\(^{53}\) IMF, Financial Soundness Indicators.

\(^{54}\) M Darracq Pariès, C Kok & M Rottner, Reversal interest rate and macroprudential policy, European Economic Review, October 2023.

\(^{55}\) We use the term ‘effective lower bound’ (ELB) to refer to the level of interest rates below which further interest rate cuts are no longer stimulatory.

\(^{56}\) The ELB is not a binary cut-off. The contractionary effects of negative rates via bank profitability build until, at the ELB, they are large enough that the net effect of further rate cuts is zero. At rates close to, but a little above, the ELB the net effect will be stimulatory but small in magnitude.


operational readiness for negative rates, building on the engagement undertaken by the Bank of England and the Prudential Regulatory Authority in late 2020. To further ameliorate the impact of negative rates on banks, the Bank of England could also follow most other central banks by implementing negative rates via a tiered structure – where negative rates only apply to central bank reserves above a certain threshold. Under this approach, negative rates would apply to banks’ reserves at the margin (which is most relevant for the pricing of short-term market interest rates) while limiting the overall impact on bank profit margins.

But negative rates won’t be enough on their own. We must turn to raising the Bank of England’s inflation target as an additional source of monetary policy firepower.

**In a low interest rate world, there is a strong case for raising the inflation target to 3 per cent**

There is nothing magic about a 2 per cent inflation target. The widespread adoption of 2 per cent targets by central banks across the world can, to a large extent, be traced back to the 0-2 per cent target adopted by the Reserve Bank of New Zealand in 1989 and the 2 per cent target set by the Bank of Canada in 1991. A lot has changed since then – and a lot has also changed since the UK adopted its own 2 per cent target in 2003 – that makes it worth revisiting the suitability of a 2 per cent target.

In a low interest rate world, raising the inflation target and enabling moderately negative rates would substantially reduce the probability of hitting the ELB. In Figure 16, we take the distribution for Bank Rate from Figure 12 and layer on a second distribution – this time centred at a neutral rate of 4 per cent (based on a 3 per cent inflation target and a 1 per cent natural real interest rate). We also illustrate the impact of negative rates by looking at the likelihood of rates falling below -1 per cent, which we judge to be an optimistic but reasonable estimate for how low rates could go in UK in future.

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59 S Woods, *Information request: Operational readiness for a zero or negative Bank Rate, Letter to chief executive officers to request information about firms’ operational readiness to implement a zero or negative Bank Rate*, October 2020.


61 T Lockyer, *The optimal level of the inflation target*, Reserve Bank of New Zealand, November 2022.
FIGURE 16: Raising the inflation target to 3 per cent and paving the way for slightly negative interest rates would mean a 1-in-100 chance of hitting the lower bound

Estimated distribution of Bank Rate with a 1 per cent natural real interest rate and varying inflation targets

NOTES: Distributions are based on deviations of the monthly average of Bank Rate from a fitted linear trendline between January 1980 and March 2009, when Bank Rate was cut to 0.5 per cent. The linear trend line removes variation that is due to a secular fall in interest rates over the sample period. They are estimated using an Epanechnikov kernel function and are re-centred such that the high point of the distribution is at 3 per cent and 4 per cent.

Under a 3 per cent inflation target, Bank Rate would be expected to fall below -1 per cent just 1 per cent of the time. This is around a tenth of the time spent below zero under a 2 per cent inflation target, turning a once-a-decade event into something that would be expected to happen just once a century.\(^{62}\)

As well as reducing the probability of hitting the ELB, another benefit of higher trend inflation is that it allows for easier downward adjustment of relative prices for individual products. The relative price of a given product tends to decline over its lifecycle: new products are typically expensive, and become cheaper as they age. Higher trend inflation makes this adjustment less burdensome, as the relative price can fall substantially simply by leaving the nominal price untouched. Recent research suggests that this channel could justify a higher inflation target of 2.6 per cent in the UK – even without any benefit from avoiding the ELB.\(^{63}\)

\(^{62}\) Reducing the ELB to -1 per cent under a 2 per cent inflation target implies a 4 per cent probability of hitting the lower bound


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The economic costs of a moderately higher inflation target are likely to be small

There are clear benefits of moving to a higher inflation target, not least being less reliant on fiscal policy during downturns and providing better macroeconomic stabilisation more broadly. However, there are several counterarguments to raising the inflation target that are worth considering. Some of these relate to the impact of changing the target on the credibility of the UK’s macroeconomic institutions, which we return to below. But first we consider the economic costs of higher trend inflation.

A much-discussed cost of inflation is that it requires businesses to adjust their prices more frequently, incurring higher ‘menu costs’ as a result. This tends to be the case in the UK. Based on analysis of aggregate inflation and individual price quotes collected by the ONS between 1996 and 2023, a 1 percentage point increase in annual CPI inflation is associated with nearly half a percentage point (0.4 percentage points) increase in the share of prices changing each month. Assuming this relationship were to hold if we moved to a higher inflation target, we would expect more frequent price adjustments as a result.

But an increase in price adjustments of half a percentage point would be small. The frequency of price changes has varied significantly over time for reasons other than inflation, as shown in Figure 17. Economic shocks and tax changes, for example, have been important drivers over the past 25 years. And we should remember that we already accept the existence of menu costs in targeting 2 per cent inflation.

Pricing distortions are another potential cost of higher trend inflation. In a world where prices change infrequently, higher trend inflation would be expected to lead to greater price dispersion, as any prices that don’t change will become ‘out of date’ more quickly. As discussed above, this might be beneficial in the narrow sense of allowing the price of new products to decline more easily, but distortion in relative prices can be costly if it leads to an inefficient allocation of resources, as businesses and consumers face incorrect price incentives, and this is one of the main costs of inflation in many standard macroeconomic models. Empirical evidence on the relationship between inflation and price dispersion in the US is mixed.

64 A model calibrated on US data suggests that a 1 percentage point rise in inflation increases the share of prices changing each month by around 0.8 percentage points. See M Golosov & R E Lucas, Menu Costs and Phillips Curves, Journal of Political Economy Vol. 115 No. 2, April 2007.
65 R Davies, Prices and inflation in the UK - A new dataset, Centre for Economic Performance, February 2021.
66 For a discussion of these costs in different macroeconomic models, see: V Hahn, Price Dispersion and the Costs of Inflation, Journal of Money, Credit and Banking Volume 54, Issue 2-3, November 2021.
FIGURE 17: The frequency of price changes has varied significantly over time
Proportion of prices changing between months, 12-month rolling average: UK

But what does the UK data say? The left panel of Figure 18 shows a measure of the average level of price dispersion in the UK, based on around 30 million individual price quotes collected by the ONS. Over time, observed price dispersion has increased. This long-term trend is likely to be driven by greater product variety over time. Nonetheless, if inflation were an important determinant of price dispersion, we would expect it to be strongly correlated with deviations of price dispersion from its long-term trend. But this is not the case, as the right panel of Figure 18 shows.

Moreover, panel regression analysis of the relationship between inflation and dispersion for individual products suggests there is no meaningful relationship between the two. If inflation were an important determinant of price dispersion, we would expect it to be strongly correlated with deviations of price dispersion from its long-term trend. But this is not the case, as the right panel of Figure 18 shows.

And the typical size of monthly price changes, which has been suggested as a better indicator of inefficient price dispersion, does not vary systematically with inflation in the UK – and has in fact fallen during the current inflationary episode.

68 We estimate a panel regression with time and product fixed effects, in which the dependent variable is the coefficient of variation for an individual item in a given month and the independent variable is the absolute value of the item-specific annual inflation rate (derived from ONS item indices). The estimated coefficient for on inflation suggests that a 1 percentage point in an item’s absolute inflation rate increases its coefficient of variation by 0.0003. For context, the median coefficient of variation in the regression sample is 0.37.

69 Using the size of price changes as a measure of inefficient price dispersion is proposed in: E Nakamura et al., The Elusive Costs of Inflation: Price Dispersion during the U.S. Great Inflation, The Quarterly Journal of Economics Vol. 133 Issue 4, November 2018. Their logic is that, if prices are adjusted by larger amounts, it suggests that their pre-adjustment level was further away from the optimal price.
Observed price dispersion in the UK has increased over time, but isn’t related to the level of inflation

**Average coefficient of variation of prices within item-region pairs and CPI inflation (left panel) and de-trended coefficient of variation versus CPI inflation (right panel): UK, February 1996-June 2023**

**NOTES:** Price dispersion is calculated for each item in each region in each month of the ONS price quotes data. For each item-region group, the measure of price dispersion is the coefficient of variation, defined as the standard deviation of prices divided by the mean. The aggregate measure is the weighted mean of item-region coefficients of variation in each month, weighted by ONS COICOP weights. **SOURCE:** Analysis of ONS price quotes, as compiled in the LRPD by Richard Davies; ONS, Consumer prices.

A major cost of higher trend inflation would be if it leads to costly over-attention on changes in prices. A key benefit of low inflation is that households and businesses do not have to pay much attention to it. This is useful for those individuals and firms, but is also especially important for central banks.\(^70\) If the prevailing inflation rate becomes embedded in economic decision making, it becomes increasingly difficult to keep inflation under control – with the era of widespread inflation-indexing in the 1970s providing a notable cautionary tale.\(^71\) Therefore, a risk of a higher inflation target is that we flip from a world of low inflation attention to one of over-attention.

The point at which such a flip would occur is highly uncertain. But, to give us a sense of when it might be, Figure 19 shows the relationship between CPI inflation and Google search activity for the term “inflation” in the UK.\(^72\) There is a clear shift in search activity between periods of lower inflation, where search activity is hardly affected by the

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\(^72\) This exercise is based on the methodology used in: O Korenok, D Munro & J Chen, *Inflation and Attention Thresholds*, GLO Discussion Paper, September 2022.

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inflation rate, and the current high inflation episode. Threshold regression analysis suggests there is a discontinuous jump when CPI inflation reaches around 5.5 per cent.

FIGURE 19: Up to inflation rates of around 5.5 per cent, Google search activity for “inflation” remains relatively low

Google Trends index for “inflation” versus CPI inflation: UK, January 2004-July 2023

NOTES: The threshold regression is a ‘stegmented’ model with four parameters: a traditional intercept, an intercept representing the threshold discontinuity, and two trend parameters that vary either side of the threshold. For details, see: Y Fong et al., chngpt: threshold regression model estimation and inference, BMC Bioinformatics 18:454, October 2017. Google Trends index is a monthly index of the relative volume of search activity and has been seasonally adjusted.

SOURCE: Analysis of Google Trends; ONS, Consumer prices.

While this is only one measure of inflation attention, it does suggest that the inflation target could be raised to 3 per cent (well below the 5.5 per cent threshold) without leading to over-attention.

There would be some small distributional consequences of a higher inflation target, which we discuss in Box 5.

BOX 5: Distributional impacts of a higher inflation target

As with any unexpected increase in inflation, the transition to a higher target would benefit debtors at the expense of savers. For individual households, the precise impact would depend on the nature of the underlying debts and assets. The value of long-term debt with interest payments fixed in nominal terms would be particularly sensitive to a higher inflation target.
Whereas debt and assets whose nominal returns adjust more rapidly to higher inflation would see their values less impacted. This group includes equities and indexed-linked bonds as well as short-term household debt, including mortgages with short fixed-rate periods. Once all nominal returns have adjusted, it is likely that there would be no lasting impact on savers and borrowers.

However, in the longer term there would be some distributional impact via the mortgage market. A world of higher inflation and nominal interest rates changes the profile of mortgage repayments: in real terms, mortgage payments would be higher at the beginning of the mortgage (due to higher interest rates) but lower by the end (due to higher inflation).73 Despite not changing the total cost of buying a home, the increase in repayments at the start of the mortgage is likely to limit the amount that some prospective mortgagors can borrow.74 The implications of this change for homeownership are difficult to assess, but they are likely to be most relevant to young people and those living in areas of the country with more expensive housing, who are most likely to be bound by affordability constraints when applying for a mortgage.

A higher inflation target could have undesirable interactions with certain features of the tax and benefit systems. In the UK, most working-age benefits are uprated annually and linked to inflation. After being uprated, the real value of benefits gradually falls until the next time they are uprated the following year. This fall would be larger in a world of higher trend inflation, although it could be offset by modernising the benefit system to allow more frequent uprating.75 In the tax system, higher inflation would exacerbate existing distortions in capital gains tax and corporation tax.76 But the right response is to fix these issues, which already distort households’ and businesses’ incentives today, regardless of the level of the inflation target.

Overall, we judge that the economic costs of raising the inflation target would be small compared to the risk posed by insufficient monetary policy space to the UK’s macroeconomic framework. However, the biggest potential cost of changing the target is the risk of undermining confidence in the UK’s inflation targeting regime. We must take this risk seriously when thinking about how and when to move to a higher target.

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74 In the UK, FCA rules on responsible mortgage lending specify that lenders must assess affordability based on an applicant’s verified income at the time of application and the level of interest rates over the first five years of the mortgage.
76 For discussion of the issues with inflation and capital gains tax, and options for reform, see: M Broome, A Corlett & G Thwaites, Tax planning: How to match higher taxes with better taxes, Resolution Foundation, June 2023. On corporation tax, see: S Adam, I Delestre & Y Nair, Corporation tax and investment, Institute for Fiscal Studies, October 2022.
Now is not the time to raise the inflation target

The long-run outlook for the UK economy is unusually uncertain right now. The UK, along with major economies across the world, is still adjusting to structural shifts brought about by the Covid-19 pandemic, while navigating a once-in-a-generation inflation shock and facing a more fragmented global trading system. This is reflected in uncertainty over the outlook for interest rates, as set out in Section 1. Given this uncertainty, it would be premature to declare that we are back in a low rate world where a higher inflation target would be needed. It would be better to wait for a clearer picture to emerge.

Furthermore, with inflation today running well above 2 per cent, raising the target could be seen as a way to avoid the difficult task of bringing inflation back target. If it was seen in that way, it would risk undermining the credibility of the new target and losing control of inflation expectations – which have been remarkably stable since the Bank of England was granted independence in 1997, as shown in Figure 20.

FIGURE 20: Medium-term inflation expectations have been stable since the UK introduced a point inflation target

Financial market compensation for RPI inflation over a five-year period starting in five years’ time, derived from nominal and index-linked gilts: UK

NOTES: From 2020 onwards, the five-year, five-year measure of RPI inflation expectations is affected by RPI reform in 2030. Comparison of the unadjusted five-year, five-year measure with the Bank of England’s RPI-reform adjusted measure (see, for example, Chart 2.26 in: Bank of England, Monetary Policy Report, August 2023) suggests that the five-year, five-year measure would be around 0.5 percentage points higher in August 2023 without the impact of RPI reform. Last data point refers to August 2023. SOURCE: Analysis of Bank of England, Yield curves.
Once inflation is back under control, we should evaluate the case for a higher target

Given the need to draw a clear distinction between any change to our monetary framework and the current inflation shock, we must wait until inflation returns to 2 per cent before taking steps towards a change. But, once inflation does fall back to 2 per cent, we propose that there should be a review of the UK monetary framework, with a particular focus on where long-term interest rates settle after the current turbulence, and what this means about the right level of the inflation target. The review should be run by the Government – who rightly hold the power to set the Bank of England’s remit – with well-defined review criteria. In this way, the framework for the reviews would mirror the ‘Five Tests’ model used by the Treasury when assessing the UK’s readiness to join the euro. Reflecting the fact that most of the public sector’s monetary expertise resides at the Bank of England, Bank officials should be seconded in for the review.77

There is a risk here, namely that by the time inflation has fallen to 2 per cent and a review has been completed, the UK might find itself back at the ELB once again. In this case, there would be a strong case to raise the inflation target, but the Bank of England might not have the firepower to bring inflation up to the new target. This risk was illustrated by the experience of the Bank of Japan, who raised their inflation target in 2013 but were unable to achieve a sustained rise in either the inflation rate or long-run inflation expectations.78 In a situation like this, the Government should be prepared to undertake short-term fiscal stimulus in order to reach the new target.

In an ideal world, we would review our monetary framework – and implement any subsequent changes – alongside other advanced economies. Many of the arguments for a higher inflation target in the UK also apply to other advanced economies, which could justify international coordination. A coordinated approach would reinforce the credibility of any change to the UK monetary framework, and would avoid a situation where a higher inflation target leads to a weaker currency over time (Box 6 explains why we would expect this to happen over a long horizon).

Inflation, interest rates and exchange rates all vary for a variety of reasons, and can be highly volatile over the short term. But, over longer-time horizons, economic theory suggests that they should move together in a somewhat predictable way. These co-movements imply that if the UK (or any economy) increased its inflation target while other economies kept theirs unchanged, it would expect to see its currency depreciate in nominal terms over time.

Two exchange rate concepts are relevant here: purchasing power parity (PPP) and uncovered interest parity (UIP). The two are related but distinct, and importantly both suggest that a country with a higher inflation target than others should see its exchange rate depreciate over time.

Put simply, PPP says that a given amount of money (say £100) should be able to purchase the same quantity of goods and services at home or abroad, after converting it into foreign currency at the prevailing exchange rate. The logic behind PPP stems from the existence of goods that can be traded internationally. If a tradeable good is cheaper at home than abroad, there is a risk-free profit to be made by buying the good at home and selling it abroad. Of course, not all goods and services are tradable in this way, and the transaction costs prevent the full exploitation of profit opportunities for those that are. As a result, exchange rates often deviate from the levels implied by PPP, but PPP is generally found to hold in the long run.79

If the UK’s price level were to increase by an average of 3 per cent per year, compared to 2 per cent in other advanced economies, PPP implies that the UK’s exchange rate would depreciate by 1 per cent per year as a result. If prices rise faster in the UK than elsewhere, UK exports will become less competitive. Less demand for UK exports will put downward pressure on the pound. PPP says that this will result in a 1 per cent depreciation per year, ensuring that the relative price of UK goods and services remains constant over time.

UIP implies the same depreciating trend, but its logic is different to PPP. UIP states that, in equilibrium, international investors must get the same returns on assets at home and abroad. If nominal interest rates are higher at home, that must be offset by an expected depreciation in order to make investing abroad a viable alternative. If interest rates rise unexpectedly, this future depreciation results from an ‘overshooting’ of the exchange rate response: exchange


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rates appreciate a lot today, but less in the future. UIP generally doesn’t hold in the short run, due to the influence of other factors associated with a positive interest rate differential, such as currency-specific liquidity premia. But UIP does hold when looking at advanced economies over long time periods.

Raising the inflation target to 3 per cent would increase the average level of UK nominal interest rates by 1 percentage point. Nominal interest rates can be expressed as the sum of the inflation rate and the real interest rate. An increase in the inflation target implies a one-for-one increase in the long-run average level of nominal interest rates, as the average level of the real interest rates is pinned down by structural factors in the economy, such as demographics and productivity growth. UIP dictates that this should be reflected in a trend depreciation in the pound of 1 per cent per year on average.

Even if international coordination is not feasible, there would still be strong case for the UK to go it alone in moving to a higher inflation target. Unilaterally moving to a 3 per cent target while other major economies remain at 2 per cent would put sterling on a depreciating path over time – with its nominal value falling by 1 per cent per year on average. But it is worth noting two things about this fall in the exchange rate. First, it would be purely nominal. Prices would rise quicker in the UK than elsewhere, meaning real exchange rates would be unchanged despite a weaker nominal exchange rate. Purchasing power parity would continue to hold. Second, it would be tiny. In any given year, a 1 per cent move in exchange rates would be hardly perceptible in the context of observed exchange rate volatility. As Figure 21 shows, we regularly see much larger swings in the sterling-dollar exchange rate. And over a longer horizon, a depreciation in sterling would merely be a continuation of a pre-existing trend, with the pound falling from nearly $5 in 1900 to around $1.20 today. Indeed, if sterling had depreciated by only 1 per cent per year against the dollar since 1900, it would be worth around $1.40 today.

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Politically, raising the inflation target would be challenging. Recent experience has reminded us that higher inflation is widely unpopular, and macroeconomic stability is invaluable. But clinging on to a 2 per cent target in a low-rate world would be a mistake that would ultimately threaten the sustainability of the UK macroeconomic framework. Many advanced economies, including the UK itself, have successfully changed their inflation targets over the past 30 years.\textsuperscript{84} While these changes have tended to move targets closer to 2 per cent, we shouldn’t be tied to this number if we emerge into a low rate world where there are clear benefits to a higher target. A higher target, combined with negative interest rates, would give us the monetary policy firepower we would need in a low rate world to reduce our reliance on fiscal policy in downturns and move towards a more sustainable macroeconomic framework for the UK.

But adapting our monetary framework and removing our overreliance on fiscal policy is not the only way to reduce the ratcheting up in public sector debt. In the next section we discuss how fiscal policy itself can be made more efficient.

\textsuperscript{84} In 2003, the UK changed its inflation target from 2.5 per cent RPIX inflation to 2 per cent CPI inflation. At the time, this was seen as a modest loosening in the UK’s inflation target of around 0.3 percentage points, for example in: S Nickell, \textit{Practical Issues in the UK Monetary Policy, 2000-2005}, speech at the British Academy Keynes Lecture, September 2005. As shown in Figure 20, this loosening was reflected in inflation expectations, with a rise in the average level of expected RPI inflation after the UK transitioned to its new target.
Section 3

Making fiscal policy smarter will help make it more sustainable

A common argument during the period of ultra-low interest rates was that the answer to a lack of monetary policy space was to use fiscal policy more actively. But, as shown in Section 1, after 15 years of that approach, we now look like we are on an unsustainable path. But it isn’t just a lack of space for monetary policy, as discussed in the previous Section, that has led to shocks driving up debt. A further problem has been that the increasing use of discretionary fiscal policy has not been matched by the development of tools to provide targeted support. A clear example is the Energy Price Guarantee (EPG), which provided large amounts of unnecessary support to high-income households because no more targeted policy option was available.

There are two ways we can make fiscal policy more effective. First, we can improve existing fiscal tools. In particular, public investment has a particularly large impact on the economy, but poor long-term planning has meant it is too volatile, leaving us unprepared for using it effectively in downturns. Implementing a sustained rise in public investment through multi-year departmental capital budgets should come with the benefit that public investment can be accelerated during downturns. Reforming unemployment benefit so that it has more generous replacement rates would also provide greater support to the economy in downturns, particularly if the duration of entitlement is able to change in response to the macroeconomic environment.

But these tweaks will not be enough: what the UK also needs is smarter fiscal policy. This should include a flexible mechanism for providing targeting support to households. At its core, that comes down to better data sharing between different parts of the public sector to build a database through which to support can be targeted, including data on household income, including earnings and benefits, along with household characteristics such as where people live and the number of people...
in their household. This information exists across HMRC, DWP and other parts of the public sector, and uniting it would facilitate a range of policies that could vary in response to different economic shocks. Smarter policy also means doing more to identify and mitigate future risks. Recent failings have made recent crises worse – including via a lack of gas storage or preparation for non-influenza-based pandemics – and it is clear that more could be done to improve how prepared we are for shocks.

We have become reliant on fiscal policy

During the period of extremely low interest rates that followed the financial crisis, the received wisdom was that more active fiscal policy was a big part of the answer to having monetary policy marooned at the lower bound. But, as discussed in Section 1, after pursuing that approach since the financial crisis, we’re left with an unsustainable fiscal position (see Figure 3).

To set the scene for our evaluation of fiscal policy, Figure 22 gives a sense of how our reliance on fiscal policy has changed during recent recessions. It provides a simple estimate of how the deterioration in government borrowing through recessions has been split between discretionary measures and automatic stabilisers (that is, the systematic component of fiscal policy that varies over the economic cycle, most obviously in the form of unemployment benefits). These estimates make it clear that we have been using more discretionary fiscal policy in recent recessions. Indeed, spending on such policies has tripled from the 1990s recession, when we estimate that it was worth around 5 per cent of GDP, to Covid-19 when support measures of more than 15 per cent of GDP were put in place. This chimes with our previous work that has shown automatic stabilisers have played a smaller role in stabilising the economy in recent years – reflecting a less generous welfare system.

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85 This was, for example, part of the argument made in J Smith et al., Recession ready?: Assessing the UK’s macroeconomic framework, Resolution Foundation, September 2019.

86 For recessions before the Covid-19 pandemic, discretionary measures are estimated top down using the change in the cyclically-adjusted primary balance in the three years after the onset of the recession, and the impact of automatic stabilisers is then inferred from the overall change in the primary balance. For the Covid-19 pandemic, we are able to provide a more precise decomposition, as we have detailed pre-recession spending plans, and detailed scorecard estimates of the discretionary items. That more detailed estimate is shown on the right and suggests our simple estimate for past recessions at least capture the broad patterns of policy.

FIGURE 22: We have been reliant on discretionary fiscal policy in recent years

Estimates of fiscal response during recessions as share of pre-recession nominal GDP: UK

NOTES: Estimate of discretionary spending is the cumulative change in the cyclically-adjusted primary balance from pre-recession level in the three subsequent years. Spending on automatic stabilisers is the cumulative difference between the change in the primary balance from pre-recession level and the change in the cyclically-adjusted primary balance from pre-recession level in the three subsequent years. For the Covid-19 pandemic, we provide a more precise decomposition based on detailed pre-recession spending plans and detailed scorecard estimates of the discretionary policy.

SOURCE: Analysis of OBR, Public finances databank – June 2023; and OBR, Economic and fiscal outlook, various & Policy measures database.

Some policies used during recent crises have proved expensive

But the problem is not just an overreliance on discretionary policies; it is also that the development of fiscal tools has not kept pace with our need for using them. This has meant some of the policies used during previous downturns have been ended up being proved to be poorly targeted, and therefore have increased the costs to taxpayers.

To illustrate this, below we focus on some of the policies put in place during the pandemic and the cost of living crisis. In doing this, it is of course important to recognise that imperfect policy is preferable to allowing recessions to cause lasting hardship. We also do not wish to detract from some notable policy success during this period. The Job Retention Scheme (JRS) was generally well targeted and played a key role in limiting the damage in labour market during the pandemic; it should become a permanent feature of our toolkit for fighting downturns. It did, however, need to be developed from scratch during the pandemic, and some other policies that were implemented at pace around the same time were not as well designed.
There were a number of policies during this period that proved to be wasteful. Below we focus on two examples: the EPG (along with the associated Energy Bill Support Scheme) and the Self-Employment Income Support Scheme (SEISS). The former capped the energy price for a typical household though a per unit limit following a spike in the price of energy after Russia’s invasion of Ukraine (with the Energy Bill Support Scheme providing an additional £400 off every electricity bill in winter 2022). In doing so the scheme supported many high-income households. Indeed, as shown in Figure 23, support was fairly evenly spread across the distribution, meaning that much of the support from scheme went to higher-income households who had less need for it and were more likely to have the ability to invest in energy-saving technologies if they had been exposed to increases in prices.

FIGURE 23: Much of the EPG support went to high-income households
Total value of EPG and Energy Bill Support Scheme in 2022-23 and 2023-24 by income vigintile, in nominal prices: UK

NOTES: Energy support in 2022-23 includes the £2,500 Energy Price Guarantee and £400 Energy Bills Support Scheme. Energy support in 2023-24 includes the £2,500 Energy Price Guarantee until June 2023 which rose to £3,000 from July 2023 to March 2024.
SOURCE: Analysis of DWP, Family Resources Survey using the IPPR tax-benefit model; DWP, Households Below Average Income; ONS, Living Costs and Food Survey; Ofgem; Cornwall Insight.

89 For an analysis of the scheme, see: A Corlett et al., A blank cheque: An analysis of the new cap on energy prices, Resolution Foundation, September 2022.
90 See Box 2 in M Brewer et al, A chilling crisis: Policy options to deal with soaring energy prices, Resolution Foundation, August 2022 for a discussion of the distribution of support.

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Meanwhile, the SEISS was designed to support those in self-employment during the pandemic by providing a series of up to five grants based on past tax returns. The design of the scheme meant that those with a track record of self-employment income could claim the grant almost irrespective of need. And as shown in Figure 24, much of the support from the initial grants went to those that had suffered no loss in income.\(^91\),\(^92\) This chimes with HMRC’s evaluation of the scheme which found that some self-employed people likely received more money than their pre-pandemic income, and that the scheme disincentivised economic activity for some recipients.\(^93\)

**FIGURE 24:** The SEISS provided wasteful support to those who did not suffer a loss of income during the pandemic

Reported change in pay for self-employed workers compared to February 2020, by month and whether claimed a grant under the Self-Employed Income Support Scheme at any point between March and September: UK, data collected 17-22 September 2020

NOTES: Base = all UK adults aged 18-65 who were self-employed prior to the coronavirus outbreak, including those who also had an employee job (n=504). Base by categories (consistent across all months): claimed SEISS n=209; did not claim SEISS n=295. Question wording: ‘Thinking about the months after the Coronavirus (COVID-19) outbreak started in the UK... Did your weekly/monthly pay increase or decrease compared to your usual pay before the Coronavirus (COVID-19) started, or was it the same?’ These figures have been analysed independently by the Resolution Foundation.

SOURCE: Analysis of YouGov, Adults Age 18 to 65 and The Coronavirus (COVID-19) - September wave.

\(^91\) Figure 24 is taken from: M Brewer et al., Evaluating the effects of the current economic crisis on the UK labour market, Resolution Foundation, October 2020.

\(^92\) This chimes with the conclusions from a National Audit Office investigation that found ‘on average [SEISS] increased claimants’ incomes above pre-pandemic levels’, see: National Audit Office, Delivery of employment support schemes in response to the COVID-19 pandemic, October 2022.

So, what is the scale of savings from doing policy in better ways?

To answer that question, Figure 25 collects estimates for the size of the savings that could have been made during this period. In doing so, we add in estimates of fraud from the Government’s Bounce Back Loan Scheme (BBLS) where it is clear that the absence of a mechanism to target funds towards companies left the Government with little choice but to prioritise speed and scale over avoiding waste.94 Savings on the SEISS are estimated by equalising the per-person month support provided by the JRS. And the roughly £23 billion we estimate could be saved on the EPG is estimated by building on our previous work on how to design a social tariff for energy.95

FIGURE 25: There are tangible savings from making measures more targeted
Estimated cumulative policy savings from improving the targeting of schemes during the pandemic and cost of living crisis: UK

- £8.4bn
- £11.4bn
- £11.4bn
- £3.8bn
- £3.8bn
- £3.8bn
- £20.0bn

2020-21 2021-22 2022-23

Energy Price Guarantee
Loan guarantees
Self-Employment Income Support Scheme

NOTES: SEISS estimate is calculated by equalising the cost of supporting those in self-employment with those in employment on the JRS. Loan guarantee estimate is taken as the NAO’s estimate of fraud costs on the Government’s Bounce Back Loan Scheme. EPG estimate is an estimate of the amount of savings if the Government had a social tariff in place as proposed in: M Brewer et al., A chilling crisis: Policy options to deal with soaring energy prices, Resolution Foundation, August 2022.
SOURCE: Analysis of OBR, Economic and fiscal outlook, various; HMRC, Coronavirus Job Retention Scheme statistics & Self-Employment Income Support Scheme statistics; NAO, Tackling fraud and corruption against government.

94 This is likely to be an underestimate of the amount the Government could save through better targeting as it does not attempt to capture the amount spent supporting legal but unnecessary claims.
95 M Brewer et al, A chilling crisis: Policy options to deal with soaring energy prices, Resolution Foundation, August 2022. The costing here assumes that the lowest-income households (income deciles 1-3) received full support equivalent to the EPG and associated Energy Bill Support Scheme (a universal payment of £400). Middle-income households (deciles 4-6) are assumed to receive half that support, with no support for those on high incomes.
These estimates suggest that better-targeted policy could have saved the Government around £35 billion over this period. This is around £1 in every £5 spent on pandemic-related support schemes (i.e. excluding the rise in spending on public services caused by the pandemic) over this period and would have reduced the overall rise in debt since the pandemic by 8 per cent. One caveat to this analysis is that we have not attempted to estimate the impact of poorly targeted policies on the size of the economy. But because the estimates come from analysis of the ‘dead weight’ of these policies, our view is that their absence would not have made a big difference to overall economic outcomes. For example, providing energy support to those on high incomes probably did not lead to much higher spending, at least in the short term. And as we set out below, such savings dwarf the likely costs of developing the capability to deliver targeted policies.

In one sense none of this should come as a surprise: with policy put in place very quickly during the pandemic it was always going to be likely that some of it proved to be poorly targeted. But the key point we make in this section is that a combination of lack of tools, poor data sharing across government, and an absence of risk management and mitigation meant that policy had to be put in place with a haste that meant only second-best options were available.

**Part of making fiscal policy more effective is to improve existing tools...**

As well as developing new temporary and targeted fiscal policies, it is also important to improve existing tools so that they can be more impactful in downturns.  

One tool that can be used is public investment. Although this will never be the main tool used to provide more support to the economy in downturns, broader improvements to how we plan and execute public investment will allow them to be used more effectively in downturns. This is important because public investment is generally thought of as having a relatively large multiplier effect, allowing the government to get more ‘bang for its buck’ in supporting the economy. But it is also well known that public investment projects have notoriously long lead times, requiring extensive planning and implementation. In the UK, this is made worse by poor long-term commitment to investment plans which has meant it is too volatile, leaving us unprepared for using it effectively in downturns. As proposed in our previous work, a higher sustained level of public investment should be implemented through multi-year settlements for departments’ capital budgets and even

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96 Effective policies here are ones which have a relatively large impact on the economy (they have a higher ‘fiscal multiplier’); and ones which work ‘automatically’ as the economy slows. See: J Smith et al., Recession ready?: Assessing the UK’s macroeconomic framework, Resolution Foundation, September 2019.

97 For a discussion of the OBR’s fiscal multipliers, see: Fiscal multipliers, Box 3.2 of Office for Budget Responsibility, Economic and Fiscal Outlook, July 2015.
longer-term plans for major projects.\textsuperscript{98} This would give finance managers the certainty they need to plan projects ahead, reducing the chronic volatility in our public investment, but it would also allow central and local government to build a pipeline of projects that can be accelerated in the event of a downturn.

A second approach to improve the effectiveness of fiscal policy in downturns is to strengthen our automatic stabilisers.\textsuperscript{99} Here, our previous work has argued that there is a strong case for modernising unemployment benefits. Specifically, we have proposed putting in place a system of unemployment insurance that would replace 65 per cent of lost earnings for a three-month period, with the duration of entitlement able to adjust in response to the macroeconomic environment.\textsuperscript{100} This compares to a replacement rate of just 40 per cent for a single person without children under the current system, and an OECD average of 59 per cent. As well as reducing individuals’ income risk in the event of job loss, enabling more effective job search, this reform would also provide a more effective cushion in the face of shocks hitting the economy, strengthening the system of automatic stabilisers that has weakened in recent years.\textsuperscript{101} However, this alone won’t do much to stabilise the economy – even under a recession like the financial crisis, our proposed reforms would have increased spending by just £1.1 billion – a tiny fraction of the overall spending discussed above.\textsuperscript{102} So, while such an approach would help, it would not be desirable to try and make such a system central to our efforts to cushion the economy in face of downturn. The scale of unemployment insurance that would be needed to deliver significant portion of the macroeconomic stabilisation required during a downturn would be highly distortionary outside of a recession.\textsuperscript{103}

In addition, a simple tweak would make the existing benefit system more responsive to crises. When benefits such as Universal Credit are (by default) increased in April each year, it is currently the annual rate of inflation from the previous September that is used. But, as has been highlighted in the past couple of years, this inflation rate has been very outdated when prices are rising rapidly. (Indeed, the fact the benefits are increased with a lagged measure of inflation means that the real value of most benefits won’t return to pre-pandemic levels until April 2025.\textsuperscript{104}) There is, therefore, a strong case for reducing

\textsuperscript{98} F Odamten & J Smith, Cutting the cuts: How the public sector can play its part in ending the UK’s low-investment rut, Resolution Foundation, March 2023.

\textsuperscript{99} Automatic stabilisers are particularly effective because people know even before a shock hits that they will receive support in the event of downturn, reducing the extent to which they retrench as the economy slows.

\textsuperscript{100} M Brewer & L Murphy, From safety net to springboard: Designing an unemployment insurance scheme to protect living standards and boost economic dynamism, Resolution Foundation, September 2023.


\textsuperscript{102} M Brewer & L Murphy, From safety net to springboard: Designing an unemployment insurance scheme to protect living standards and boost economic dynamism, Resolution Foundation, September 2023.

\textsuperscript{103} See Figure 8 in M Brewer & L Murphy, From safety net to springboard: Designing an unemployment insurance scheme to protect living standards and boost economic dynamism, Resolution Foundation, September 2023.

this lag, or to increasing the nominal value of benefits more than once every 12 months.\textsuperscript{105} For some older parts of the benefit system it is unclear whether this is technically feasible, but the example of changes in 2020 shows that Universal Credit rates can be adjusted at short notice. By making very targeted, automatic support more timely, the need for broader, more expensive policy interventions would be reduced.

... but what the UK needs is a flexible mechanism for targeting support to different types of families

The high cost of the EPG and SEISS illustrates the problem that policy makers have during recessions in targeting support to the intersection between those adversely affected by shocks and those most vulnerable to them. This is not a new problem: in the aftermath of the financial crisis, a similar policy shortcoming was obvious as policy was unable to find ways to provide direct economic support in the face of collapsing demand.\textsuperscript{106}

This is not for the want of trying, though. As discussed in Box 7, a number of policy tools for supporting families are available and have been used in a variety of circumstances. There seem to be two core problems. One is that the two key systems that identify families with a low income, given their needs – Universal Credit (UC), for working-age families and Pension Credit, for those over the state pension age – are paid to a relatively small fraction of the population, meaning that, in crises, policy makers have not wanted to rely solely on these programmes. Second, it is very difficult for policy makers to target support on those who are both in a low-income family and have some other characteristic that they wish to use when determining who should get support.

\textbf{BOX 7: Existing fiscal tools for targeted support to lower-income families}

A range of tools have been used to help families cope with the hardship caused by recent recessions. In this Box we provide a brief assessment of the main examples. The common thread that runs between all these policies is that they exploit features of the tax and benefit system designed for purposes other than supporting families through hard times, but which have been adapted – often at pace – to the circumstances of a particular downturn.

\textsuperscript{105} There is a separate argument for introducing a long-term earnings link for working-age benefit uprating while retaining inflationary uprating when necessary, as set out in M Brewer et al., \textit{Sharing the benefits: Can Britain secure broadly shared prosperity?}, Resolution Foundation, July 2023.

\textsuperscript{106} House of Commons Treasury Committee, \textit{Budget Measures and Low-Income Households, Thirteenth Report of Session 2007-08}, June 2008, makes reference to the Government’s desire to put direct payment policy in place but were not able to do so given a lack of a mechanism to deliver such policy. For a discussion of the constraints on policy in this context, see: House of Commons Treasury Committee, First Special Report, Appendix: Government Response, December 2008.

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Following the UC rollout, the system was used to provide a significant uplift (£20 per week) during the pandemic. A key advantage of the system is that the basic level of benefits can be varied quickly in response to a shock. Crucially, the system only allows governments to directly target benefit recipients. This was a key reason for the development of the JRS and SEISS during the pandemic. However, a substantial lead time is needed to change the rates of benefits other than UC, compounding the problem of trying to quickly target families through the benefits system.

The Government has had to be particularly creative in response to the huge rise in energy prices following Russia’s invasion of Ukraine. Both the EPG and the universal payments made through the EBSS were made through energy bills directly. As discussed above, this universal approach produced a lot of deadweight, but there were also difficulties in paying the EBSS to those on pre-payment meters, and neither policy was any direct help to those who are off the energy grid or have communal heating systems. In addition, Winter Fuel Payments were used to target support to those of pension age, and this has the familiar poor targeting associated with Winter Fuel Payments in general.

The Government also provided Council Tax rebates during the cost of living crisis. The CT system, at least in principle, allows targeting lump-sum payments to a broad range of households, given that all addresses are registered, without payment to the very richest (by directing payments to certain CT bands). But there is a not a perfect match between a household’s need or income and its Council Tax band, meaning that low-income households who live in high-band properties could well be missed. The regional variation in house prices means that the support is not even across regions, and support provided by way of a CT rebate missed those who don’t pay CT for various reasons (including full-time students, and those private renters who pay a CT-inclusive rent to their landlord, and whose landlord pays the CT bill).

By and large the progressivity of the tax system means that tax cuts are a poor way to target support to those on low incomes. One exception to this is VAT which has been used in a variety of different guises in recent recessions. It can be targeted to particular sectors – as it was during the recovery from Covid for the hospitality sector. It does, however, not target low-income households directly (cutting VAT tends to have a proportional impact across the income distribution), and because of complex system of VAT reliefs, can end up providing uneven support for those on low incomes.

It is important to stress that poorly-targeted support is preferable to no
support and we are by no means saying that policies discussed above were not pragmatic choices given the available policy levers. But the key takeaway from this eclectic mix of policies is that they have all been an inevitable compromise and suffer from gaps in support, poor targeting or both.

At the very least, the Government should be learning the lessons of the past few years. But it is far from clear this is happening: reviewing the SEISS (and even JRS) so that they could made more effective for future downturns – such as by allowing for sectoral or regional variation – seems like an obvious step; and the lack of a promised consultation on a ‘social tariff’ to replace the EPG suggests that little progress has been made on this either.¹⁰⁷

But a more ambitious approach would be to address the absence of a specific, targeted policy for temporary household support. This boils down to a problem of improving data sharing across the public sector, and doing so in advance of the next crisis, so we are not designing policy on the hoof. Although not the most high-profile area of government policy, it is likely that relatively small amounts of spending – to give a sense of the order of magnitude here, the JRS and SEISS schemes cost around £98 million to develop and administer – could deliver very substantial savings by allowing much more precise targeting of policy.

To allow for more targeted policy, we imagine that it would require combining household data on earnings, receipt of benefits, age, geography and, ideally, the sector that people work in. This information would allow for a range of targeted direct payments which could be made in response to sector-specific, or more generalised shocks.¹⁰⁸

Taking steps to allow data held by the public sector to be combined with that held by the private sector is also desirable. This is most obvious in the context of policy to address the hardship caused by rising energy prices, as it would help in designing a ‘social tariff’. Combining the information on income and other characteristics with detailed information on energy spending would allow the Government to provide targeted support in the face of future energy price spikes (although we should also aim to avoid such volatility through decarbonisation and energy efficiency policies). The challenges

¹⁰⁷ In both the 2022 Autumn Statement and the 2023 March Budget the Government set out its intention to make energy support more targeted, later stating that it was “developing a new approach” to protecting poorer households from high energy costs from April 2024, including assessing the feasibility of a social tariff. However, the Government failed to issue the promised consultation on this before the summer 2023 recess, suggesting limited progress has been made.

¹⁰⁸ In terms of where this data resides: HMRC Real Time Information data from the PAYE system, along with self-assessment data, can be used to gauge earnings from paid work, as well as the sector of an individual’s employer; DWP’s benefits data, including receipt of core benefits like Universal Credit, Local Housing Allowance and disability benefits, as well eligibility for energy-related schemes such as the Warm Homes Discount and Cold Weather payments; and HMRC data on age, geography and size of household.

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to this are substantial, but the precedent of DWP benefit data being used to allow broadband companies to target social tariffs suggests that we should not think of the obstacles here as insurmountable, even in more complex settings.\textsuperscript{109}

**Smarter policy should do more to identify and mitigate future risks**

Finally, there is a strong case for expanding significantly the UK Government’s risk management capability, at least with reference to the economic and wider impact of economic shocks. Just as the financial crisis exposed fault lines in the risk mitigation in the financial sector (i.e. prudential regulation) for financial firms, the pandemic has made clear a lack of health capacity and resilience, and the cost of living crisis showed an over dependence on a small number of energy suppliers and a lack of gas storage. It is, of course, easy to make decisions in these areas look worse with the benefit of hindsight, but the inability of the UK government to address risks systematically has been a repeated finding from NAO and other watchdogs.\textsuperscript{110} Detailed proposals are beyond the scope of this report, but an approach which strengthens the UK’s risk management framework as part of the National Resilience Strategy, with a stronger and better resourced Cabinet Office coordination with ministerial buy-in, along with stronger oversight from the National Audit Office and other relevant bodies, seems sensible.\textsuperscript{111}

In this section we have set out a series of reforms that would allow future governments to fight downturns more effectively, and, more ambitiously, could also contribute to reducing the frequency and severity of major economic shocks. As discussed in Section 1, this should help to reduce the debt ratchet effect, easing the pressure on fiscal policy to adjust in order to put us on a sustainable path going forward. The next section concludes by illustrating the size of the adjustment needed to achieve that.

\textsuperscript{109} HM Government, Cheaper broadband for struggling families, 14 August 2022.

\textsuperscript{110} For a comprehensive discussion of how to address failures in risk management and mitigation, see: R Hodgkin & T Sasse, Managing extreme risks How the new government can learn from Covid to be better prepared for the next crisis, July 2022. A number of reports have identified shortcomings in the government risk-identification and mitigation, these include: National Audit Office, The government’s preparedness for the COVID-19 pandemic: lessons for government on risk management, November 2021; House of Lords Select Committee on Risk Assessment and Risk Planning, Preparing for Extreme Risks: Building a Resilient Society, December 2021; and House of Commons Committee of Public Accounts, Government preparedness for the COVID-19 pandemic: lessons for government on risk: Forty-Sixth Report of Session 2021-22, March 2022.

\textsuperscript{111} This is in line with other proposals in this area. For a summary, see: R Hodgkin & T Sasse, Managing extreme risks How the new government can learn from Covid to be better prepared for the next crisis, July 2022.
Section 4

Running tighter policy in good times should be hardwired into our fiscal framework

As we have shown in Section 3, there are a tangible set of policies that should help to mitigate the problem whereby successive economic shocks ratchet debt upwards in the decades ahead. In this concluding section we set out how those policies, combined with making sure that monetary policy has the capacity to fully play its role in supporting the economy in harder economic times, reduce the extent to which future surpluses will be needed. Overall, although smaller and more manageable changes to our macroeconomic policy framework will help put us on a sustainable path, the reality is that more substantial changes will be needed to futureproof macroeconomic policy.

Better fiscal policy and avoiding the lower bound should reduce the need to run large surpluses

As set out in Section 1, we cannot continue down the path we are on. Based on the current settings of our macroeconomic policy framework, public debt is on an unsustainable path once we take account of the inevitable shocks that will arrive in the coming years. That suggests we need tighter fiscal policy in order to actually put debt on a downward path in the longer term, but the key question is, by how much?

To answer that, we return to the debt sustainability analysis in Section 1, building in estimates of the gains from improved policy. First, we assume that the extra 10 percentage points of debt ratchet coming from fiscal policy needing to take the place of constrained monetary policy is avoided. Second, we incorporate our estimate for the impact of improving fiscal tools. As discussed in Section 3, better policy during the pandemic and cost of living crisis would have reduced the size of the debt ratchet by
around 10 per cent. So we model that improved policy as a slightly smaller rise in the
debt-to-GDP ratio of 9 per cent, rather than 10 per cent. And we also build in a small
effect for improving government risk management, which we model by extending the
period between recession from 11 to 12 years.

The conclusions are shown in Figure 26. If we start from the standard recessions
scenario but also assume that the UK will have slightly smaller, as well as less frequent,
debt ratchets, then putting debt on a downward path requires a primary surplus of just 1
per cent of GDP outside of periods when shocks hit. Although this remains a substantial
surplus, and would require substantial changes to tax and spending policies to deliver, it
would be much less punishing than a scenario in which the UK continues to experience
large debt ratchets continue as the have since the turn of the century: stopping debt
exploding in that scenario would require a 3 per cent surplus (see Figure 9). Running a
1 per cent primary surplus would be much closer to what we have been able to achieve
historically: towards the end of the 20th century – when monetary policy was the main
tool of macroeconomic policy – we ran a surplus of 1 per cent or more in 3 out of 5 years.

How can we turn a requirement for a 1 per cent primary surplus into a set of fiscal rules
for future governments? Based on current market pricing for interest rates, that equates
to a public sector net borrowing target of around 2 per cent of GDP each year, tighter
than the Government’s existing target which is to borrow no more than 3 per cent of
GDP (although, higher interest payments in the long-term projections mean that it is not
possible to compare these numbers). As discussed in our previous work, however, our
view is that the appropriate flow target is the cyclically-adjusted current deficit, which
excludes public investment.112 In this space, if public sector investment ran at around
the 3 per cent of GDP level that we have set out in previous work, then the Government
would need to run a current surplus of around 1 per cent of GDP.113

112 R Hughes et al., Totally (net) worth it: The next generation of UK fiscal rules, Resolution
Foundation, October 2019.
113 F Odamten & J Smith, Cutting the cuts: How the public sector can play its part in ending the UK’s low-investment rut, Resolution
economy2030.resolutionfoundation.org
We need to grasp the nettle and put macro policy on a sustainable footing

Overall, then, the lesson of the difficult economic times we have recently lived through and uncertainty about what the future holds should prompt us to reconsider our macroeconomic policy frameworks. As we grapple with the challenge of high inflation and the rising cost of living, what is clear is that we cannot continue down the path we have been on since the start of the century. Simply burying our head in the sand and carrying on in the same way and hoping something turns up is not a strategy.

Although there are a number of small changes that we can – and should – make in order to ease the future path of fiscal adjustment, putting the public finances, and indeed the country, on a sustainable path requires bold decisions that break with the approach of the past to both fiscal and monetary policy. Building better fiscal tools, improving risk management and preparing for negative rates are clearly worth doing, and will ease the...
adjustment required to put us on a sustainable path for public debt. But more substantial changes – including a higher inflation target – are needed if the forces that pushed interest rates to ultra-low levels re-emerge. And in almost any conceivable future world, fiscal policy is likely to need to be tighter in good times than either main party currently intends, meaning that a combination of new tax rises or spending cuts will be needed. But taking these tough decisions is the way to make sure macroeconomic policy can support the economy in bad times, whatever the future brings.
The UK is on the brink of a decade of huge economic change – from the Covid-19 recovery, to exiting the EU and transitioning towards a Net Zero future. The Economy 2030 Inquiry will examine this decisive decade for Britain, and set out a plan for how we can successfully navigate it.

The Inquiry is a collaboration between the Resolution Foundation and the Centre for Economic Performance at the London School of Economics. It is funded by the Nuffield Foundation.

For more information on The Economy 2030 Inquiry, visit economy2030.resolutionfoundation.org.

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