Office for
Budget Responsibility

Economic and fiscal outlook

March 2016

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Foreword

The Office for Budget Responsibility (OBR) was established in 2010 to provide independent and authoritative analysis of the UK's public finances.

In this *Economic and fiscal outlook* (*EFO*) we set out forecasts to 2020-21. We also assess whether the Government is on course to meet the medium-term fiscal objectives that it has set itself, which were approved by Parliament in the October 2015 update to the *Charter for Budget Responsibility*. The forecasts presented in this document represent the collective view of the three independent members of the OBR's Budget Responsibility Committee (BRC). We take full responsibility for the judgements that underpin them and for the conclusions we have reached.

We have, of course, been hugely supported in this by the staff of the OBR. We are enormously grateful for the hard work, expertise and professionalism that they have brought to the task. Given the highly disaggregated nature of the fiscal forecasts we produce, we have also drawn heavily on the work and expertise of officials across government, including in HM Revenue and Customs, the Department for Work and Pensions, HM Treasury, the Department for Communities and Local Government, the Department for Business, Innovation and Skills, the Department of Energy and Climate Change, the Oil and Gas Authority, the Office for National Statistics, the UK Debt Management Office, the Scottish Government and Scottish Fiscal Commission, the Welsh Government, the Northern Ireland Social Security Agency, Transport for London and the various public sector pension schemes. We are very grateful for their time and patience. We have also had useful exchanges with staff at the Bank of England regarding their latest forecasts, for which we are very grateful.

The forecast process for this *EFO* has been as follows:

- In January, the Treasury requested that we finalise the Budget 2016 forecast on a 'pre-scorecard' basis (i.e. before incorporating the effect of new policy announcements that are listed in the Treasury's 'scorecard' table of policy decisions) around two weeks ahead of the Chancellor's statement in order to provide him with a stable base for his final policy decisions.

- We began the forecast process with the preparation by OBR staff of a revised economy forecast, drawing on new data and revisions to past data released since the last published forecast in November 2015 and with our preliminary judgements on the outlook for the economy in light of the volatility in global financial markets and other developments.

- Using the economic determinants from this forecast (such as the components of nominal income and spending, unemployment, inflation and interest rates) we then commissioned new forecasts from the relevant government departments for the various tax and spending streams that in aggregate determine the state of the public finances. We discussed these in detail with

the officials producing them, which allowed us to investigate proposed changes in forecasting methodology and to assess the significance of recent tax and spending outturns. In many cases, the BRC requested changes to methodology and/or the interpretation of recent data.

- We sent our first economic forecast to the Chancellor on 1 February and our first fiscal forecast (including a provisional judgement on progress towards meeting the fiscal targets) on 11 February. We provided the Chancellor with these early forecasts in order to inform his policy choices for the Budget.

- As the forecasting process continued, we identified the key judgements that we would have to make in order to generate our full economy forecast. Where we thought it would be helpful, we commissioned analysis from the relevant experts in the Treasury to help inform our views. The BRC then agreed the key judgements, allowing the production by OBR staff of a second full economy forecast.

- This provided the basis for a further round of fiscal forecasts. Discussion of these forecasts with HMRC, DWP and the other departments gave us the opportunity to follow up the various requests for further analysis, methodological changes and alternative judgements that we made during the previous round. We provided the second round economy and fiscal forecast to the Chancellor on 25 February.

- We then produced a third economy and fiscal forecast, which allowed us to take on latest data and to ensure that our judgements on the fiscal forecast had been incorporated. We finalised this forecast and sent it to the Chancellor on 4 March, and we met with him and Treasury officials to discuss it on 7 March.

- Meanwhile, we were also scrutinising the costing of tax and spending measures that were being considered for announcement in the Budget. The BRC requested a number of changes to the draft costings prepared by HMRC, DWP and other departments. We have endorsed all the tax and annually managed expenditure costings in the scorecard as reasonable and central estimates of the measures themselves. We discussed with the Treasury the process by which it would cut departmental spending in 2019-20 relative to the firm plans that were set in November's Spending Review, given the role that those cuts would play in the Government achieving its desired budget surplus in that year. We have continued our fuller discussion and calibration of the uncertainties that surround these policy costings, which is presented in Annex A of this *EFO* and in our annex to the Treasury's *Budget 2016 policy costings document*.

- During the week before publication we produced our final forecast, incorporating the final package of policy measures. We were provided with final details of major policy decisions with a potential impact on the economy forecast on 8 March. These were incorporated into our final economy forecast.

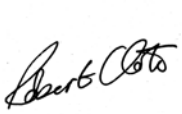
- At the Treasury's written request, and in line with pre-release access arrangements for data releases from the ONS, we provided the Chancellor and an agreed list of his special advisors and officials with a near-final draft of the *EFO* on 11 March. This allowed the Treasury to

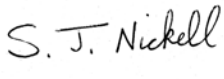
prepare the Chancellor's statement and documentation. We also provided a full and final copy 24 hours in advance of publication.

During the forecasting period, the BRC held around 60 scrutiny and challenge meetings with officials from other departments, in addition to numerous further meetings at staff level. We have been provided with all the information and analysis that we requested. We have come under no pressure from Ministers, advisers or officials to change any of our conclusions as the forecast has progressed. A full log of our substantive contact with Ministers, their offices and special advisors can be found on our website. This includes the list of special advisors and officials that received the near-final draft of the *EFO* on 11 March.

Since November 2015, our non-executive members Lord Burns and Dame Kate Barker have provided additional assurance over how we engage with the Treasury and other departments by reviewing any correspondence that OBR staff feel either breaches the Memorandum of Understanding requirement that it be confined to factual comments only or could be construed as doing so. That review will take place over the next two weeks and any concerns our non-executive members have will be raised with the Treasury's Permanent Secretary or the Treasury Select Committee, if they deem that to be appropriate. The Memorandum of Understanding itself will be reviewed by all signatory departments following this Budget, consistent with the recommendations of the Ramsden Review of the OBR and the Treasury Select Committee's report on that review.

We would be pleased to receive feedback on any aspect of our analysis or the presentation of the analysis. This can be sent to feedback@obr.gsi.gov.uk.





Robert Chote Sir Stephen Nickell Graham Parker CBE

The Budget Responsibility Committee

1 Executive summary

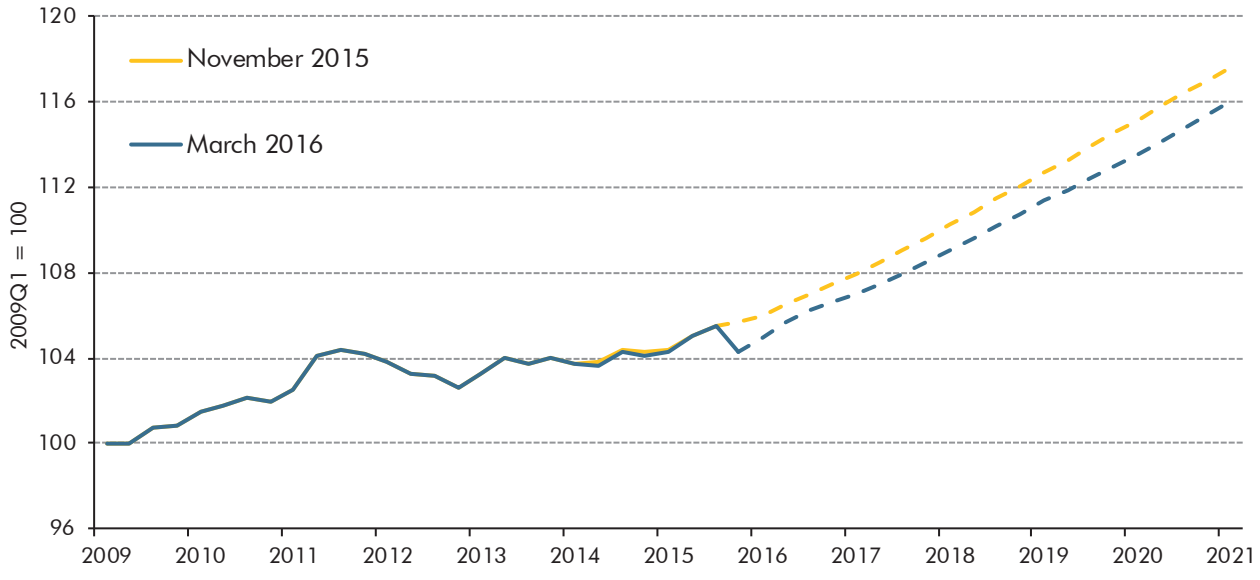
Overview

1.1 In the short time since our November forecast, economic developments have disappointed and the outlook for the economy and the public finances looks materially weaker.

1.2 Global stock markets and commodity prices have fallen, while GDP growth has slowed – especially in value terms. A promising pick-up in productivity through most of last year was almost entirely reversed in the fourth quarter, while growth in average earnings has slowed again. Outside forecasters – including the Bank of England and the OECD – have lowered their growth projections significantly. And financial markets have pushed their forecast of the first rise in interest rates out to 2019 and see a cut as more likely in the near term.

1.3 The most significant forecast change we have made since November has been to revise down potential productivity growth. This is the amount of output the economy can produce sustainably per hour worked and is a key driver of its potential size. The data available in November showed a pick-up in productivity growth in mid-2015, consistent with our assumption that the receding financial crisis would exert less of a drag and that trend productivity growth would return to its pre-crisis average rate by the end of the forecast. But more recent data suggest that this was another false dawn. With the period of weak productivity growth post-crisis continuing to lengthen, we have placed more weight on that as a guide to future prospects – although this judgement remains highly uncertain. This in turn has prompted us to revise down our GDP growth forecasts by around 0.3 percentage points a year to an average of 2.1 per cent a year over the rest of the decade.

Chart 1.1: Whole economy productivity: output per hour worked



Source: ONS, OBR. Note: Output-per-hour defined as real non-oil gross value added divided by total weekly hours worked.

1.4 Lower productivity growth means lower forecasts for labour income and company profits, and thus also for consumer spending and business investment. In aggregate, this reduces tax receipts significantly. We have also revised up our disability benefits spending forecast, as the introduction of the personal independence payment (PIP) is generating much smaller savings than the Government was aiming for. Partly offsetting this upward pressure on borrowing, lower market interest rate expectations once again generate large debt interest savings. But, overall, we have revised up our pre-measures forecasts for the budget deficit by 0.5 per cent of GDP or £11.3 billion a year on average over the forecast period.

1.5 The story in the current fiscal year is somewhat different. We have revised our forecast for the deficit in 2015-16 slightly *lower* since November to £72.2 billion. Receipts look slightly weaker than we expected, but we also expect smaller net contributions to the EU, lower borrowing by housing associations and lower tax credits spending. We continue to expect borrowing to fall faster in February and March than over the year to date, although this may not be reflected fully in the initial outturn data due in April.

1.6 On the basis of our new pre-Budget-measures forecasts, the Government would have been on course to miss both its legislated fiscal targets – for the budget to be in surplus from 2019-20 and for debt to fall in relation to GDP every year until then. As regards the surplus target, we would have forecast small deficits in both 2019-20 (£3.2 billion) and 2020-21 (£2.0 billion). Given our GDP forecast, these would occur in 'normal times' on the Government's definition and the 'fiscal mandate' would therefore be breached. As regards the debt target, we have revised down the cash level of public sector net debt in 2015-16, but the weakness of recent nominal GDP growth – largely reflecting a much wider trade deficit and weaker private sector investment – means that it is now expected to rise as a percentage of GDP, having been expected to fall in November. We expect the ratio of debt to GDP to fall each year thereafter, as the deficit shrinks, just as we did in November.

1.7 The Government's Budget policy measures raise £13.7 billion in 2019-20 and £13.1 billion in 2020-21, broadly offsetting the deterioration in the underlying forecast and putting it back on course to meet the surplus target by £10.4 billion and £11.0 billion respectively in those years – little changed from November. But, given the size and distribution of past forecasting errors, that still puts the probability of meeting the surplus target in 2019-20 only slightly above 50 per cent. The Budget measures make little difference to net debt in 2015-16, so we expect that target still to be missed.

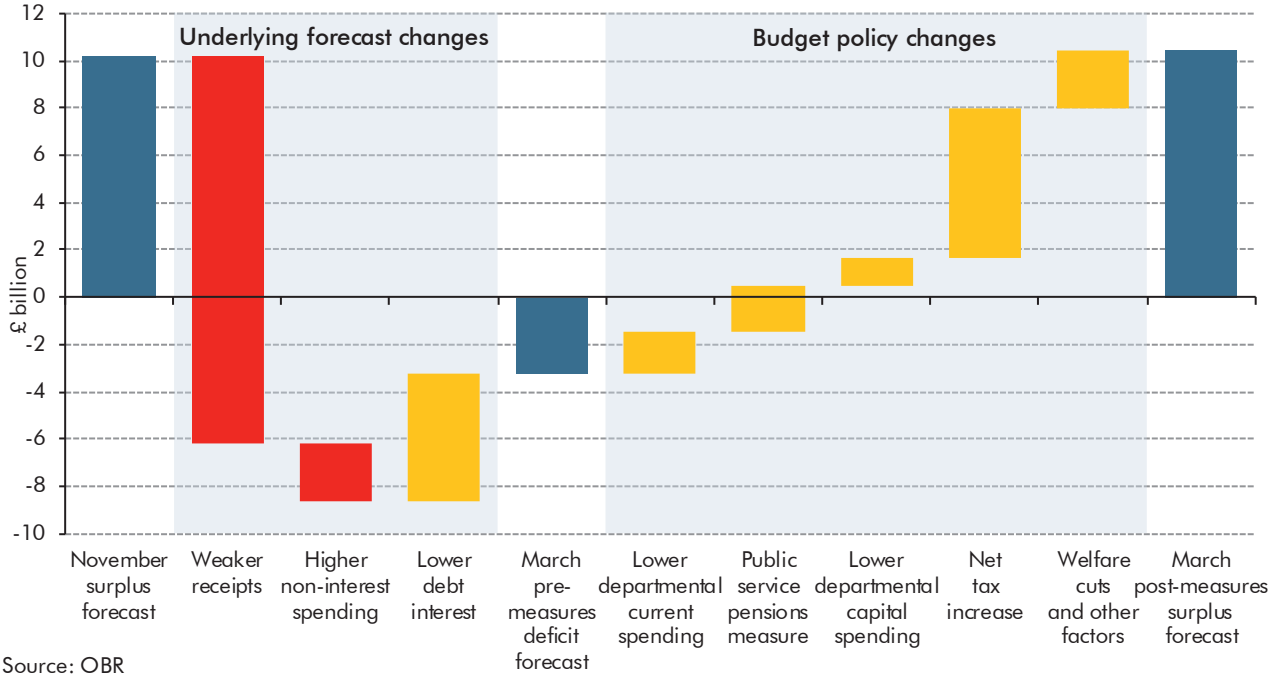
1.8 Focusing on the first year of the surplus target in 2019-20, Chart 1.2 shows that our pre-measures forecast for the budget balance has deteriorated by £13.4 billion in that year, with a £5.4 billion fall in debt interest spending more than offset by a £2.4 billion increase in other spending and a £16.3 billion revenue loss. So how has the Government offset this to maintain the £10 billion surplus it was looking for in November? The chart shows it has:

- cut its limit on **departmental current spending** by £2.3 billion (which we estimate would translate into an actual spending cut of £1.8 billion as departments underspend their budgets by less). The Government says that this £2.3 billion gross cut – together with £1.9 billion of new spending commitments in areas such as lengthening the school day, full 'academisation' of state schools and improving flood defences – will be funded from a £0.7 billion cut in overseas aid and £3.5 billion of as-yet unidentified cuts to be generated by an 'efficiency review' that will report in 2018;

- the Government has also placed an additional £2.0 billion a year squeeze on departments in that year by raising planned **public service pension contributions**, in line with a lower discount rate, but not compensating them for the additional costs they will face. This reduces borrowing by displacing other departmental spending within existing expenditure limits, while reducing net spending on public service pensions;

- cut its limit on **departmental capital spending** by £1.2 billion, largely by bringing £1.6 billion forward from the 2019-20 target year to 2017-18 and 2018-19, which it describes as "accelerating investment plans". We assume that £0.2 billion of the spending brought forward to 2018-19 will in reality slip back into 2019-20. There are also £0.2 billion of new spending commitments, for example to ease congestion on the M62. With capital spending plans little changed in 2020-21, the very large 17 per cent real terms increase pencilled in for that year in November has now increased to 20 per cent. That had been sufficient in November to ensure that total public spending would remain above its 1990s lows as a share of GDP, but this is the case anyway in this forecast because of lower expected nominal GDP;

Chart 1.2: Changes to public sector net borrowing in 2019-20



Source: OBR

- announced a net **tax increase** of £6.3 billion in 2019-20, although across the forecast as a whole Budget tax measures *reduce* receipts by £0.7 billion a year on average. All but £300 million of this increase reflects the Government's decision to delay the July Budget measure that brings forward the timing of large firms' quarterly corporation tax payments "to give businesses more time to prepare". This also boosts receipts by £3.6 billion in 2020-21 (but not at all thereafter). However, combined with an additional net cut in other (mostly business) taxes taking effect in 2020-21, this gives a much more modest overall net tax increase in that year of £0.8 billion. So the Government needs a much bigger cut in current departmental spending in 2020-21 – £8.1 billion compared to £1.8 billion in 2019-20 – to achieve the surplus it wants. Other tax measures include giveaways (raising the income tax personal allowance and higher rate threshold, cutting capital gains tax rates and freezing fuel duty) and takeaways (more measures to tackle avoidance and increase tax paid by multinational firms). The new soft drinks industry levy raises around £500 million a year over the last three years of the forecast, but by pushing up the retail prices index it has a one-off cost of £1 billion in 2018-19 by increasing the accrued interest on index-linked gilts; and

- cut **welfare spending** by £1.4 billion in 2019-20, largely through a further tightening of the disability benefits system. **Other factors** include a small boost to receipts from easing fiscal tightening over the next two years.

1.9 Taking the changes to the pre-measures forecast and the Budget measures into account, our final forecast continues to shows borrowing falling each year. In our November forecast the overall pace of fiscal tightening was relatively smooth and diminishing beyond 2017-18. But the uneven path of the giveaways and takeaways in this Budget means that the pace of tightening is now set to pick up slightly over the next three years, then much more sharply in the mandate year of 2019-20, before slowing abruptly again in 2020-21.

1.10 Net debt is expected to rise in cash terms every year, but to start falling as a percentage of GDP from 2016-17 onwards. It reaches 74.7 per cent of GDP in 2020-21, which is 3.4 per cent higher than our November forecast. Financial asset sales – which reduce public sector net debt, but generally have little effect on the public sector's net worth – continue to play a significant role in our debt forecast. Proceeds from Lloyds share sales have been pushed back and those from RBS share sales have been revised down significantly due to a lower share price. But the Government is accelerating the sale of mortgage assets that it holds in UK Asset Resolution (mainly those once owned by Bradford and Bingley).

1.11 In addition to its fiscal targets, the Government has a 'welfare cap' limiting forecast spending on a subset of social security benefits and tax credits. The cap was set most recently last July, but had already been breached when we made our annual formal assessment at the Autumn Statement. A fresh upward revision to the cost of disability benefits (only partly offset by tighter eligibility criteria announced shortly prior to the Budget) means that our forecast of spending subject to the welfare cap continues to exceed the permitted amount in every year, and by a larger margin than in November. So our Autumn Statement assessment that the welfare cap has been breached still stands.

Economic developments since our previous forecast

1.12 Commodity prices, stock markets and bond yields have fallen sharply. The oil price assumption underpinning this forecast is 36 per cent lower in dollar terms than November's and equity prices are almost 8 per cent lower. The interest rate on 10-year government bonds has fallen in many advanced economies. During February it fell to 1.30 per cent in the UK, 1.66 per cent in the US and 0.11 per cent in Germany. In Japan it fell briefly into negative territory, reaching -0.07 per cent on 25 February.

1.13 Expectations of tighter monetary policy have also receded further into the future. Based on interest rate swap rates over the 10-day period used in this forecast, the market now believes that Bank Rate is more likely to fall than to rise over the next two years and that it will only reach 1.1 per cent by the end of the forecast period. Bank Rate does not top 0.75 per cent until more than a decade after it was first cut to 0.5 per cent in March 2009.

1.14 The path of real GDP growth through 2015 has been revised, with the economy now shown to have lost momentum through the year – despite the boost to onshore activity from the fall in the oil price since late 2014. GDP growth in 2015 as a whole is now estimated at 2.2 per cent, slightly lower than the 2.4 per cent we expected in November. Whole economy prices – as measured by growth in the GDP deflator – have also been much weaker than expected, with the terms of trade and the implied price of the change in inventories falling sharply. As a result, nominal GDP growth in the third and fourth quarters was significantly lower than expected: just 0.4 per cent, against our forecast of 1.8 per cent. Net trade was the main contributing factor, although private investment was also weaker than expected.

1.15 With real GDP only growing modestly at the end of the year, but employment and total hours growing strongly, productivity fell sharply. Output per hour fell by 1.2 per cent in the fourth quarter, compared to our November forecast of a 0.2 per cent increase. That fall has reversed almost all the productivity growth seen in the first three quarters of 2015, leaving output per hour in the fourth quarter only 0.2 per cent up on a year earlier. Earnings growth has also weakened. On an annual basis, headline average weekly earnings growth slowed from a recent peak of 3.0 per cent in September to just 1.9 per cent in the latest data.

The economic outlook

1.16 Real economy indicators around the world have not been as weak as financial markets, so we have made only relatively small downward revisions to our forecasts for world GDP and world trade growth, with knock-on implications for the UK's export markets. But risks to the global outlook remain significant, with slower growth in China, shifting prospects for oil supply and the outlook for US monetary policy among the sources of uncertainty.

1.17 The most significant change we have made to our domestic forecast since November has been to revise down our estimate of potential productivity growth, which in turn reduces the sustainable level of GDP and our forecast for GDP growth over the next five years. As we have stressed for some time, the outlook for productivity growth is both the most important and the most uncertain judgement in most economic forecasts. In November, the pick-up in

productivity growth in mid-2015 seemed consistent with our long-held assumption that the post-crisis drag on productivity growth would ease as the financial system returned to full health and that it would be back at its pre-crisis historic average rate of 2.2 per cent by the end of the forecast period. That pick-up appears to have been another false dawn. As a result, we have revised down our estimate of potential productivity growth so that it remains somewhat below its pre-crisis average at the end of the forecast at 2.0 per cent.

1.18 In reaching a view on the outlook for productivity growth over the medium and longer term, all forecasters – whatever methodology they use – in effect have to decide how much weight to place on the recent period of very weak productivity performance and how much on the earlier period of stronger performance. As the period of weak performance lengthens, it seems sensible to place slightly more weight on that as a guide to the future, although this judgement is of course highly uncertain and has to be revisited in each forecast we make.

1.19 The downward revisions we have made to our potential productivity growth forecasts over the last five years are not unique to the UK. Since 2010 we have reduced our forecast for potential productivity growth between 2010 and 2020 from 22 to 14½ per cent. Over the same period the Congressional Budget Office has reduced its forecast for potential productivity growth in the US from 24½ to 15½ per cent. But the hit to potential GDP growth has been smaller in the UK, largely because the participation rate has held up, despite an ageing population. In the US, it has fallen significantly.

1.20 We estimate that the UK economy was running about 0.3 per cent below potential in the final quarter of 2015, narrower than the 0.7 per cent we expected in November. Taken together with lower potential output growth, that has led us to revise down real GDP growth across the forecast period. We now expect growth to average 2.1 per cent a year over the next five years, down from 2.4 per cent in November. The Bank of England and the OECD have also significantly revised down their growth forecasts since November. This is consistent with the receding market expectations of a Bank Rate increase.

1.21 We have made smaller changes to our pre-measures inflation forecast, with the effect of lower oil prices on petrol prices and weaker sterling on import-intensive items working in opposite directions. The new soft drinks industry levy announced in the Budget is expected to push CPI inflation above the Bank's 2 per cent target briefly when introduced in 2018-19.

1.22 With nominal GDP growth having disappointed expectations much more than real GDP growth in the second half of 2015, we have made more substantial revisions to that forecast. Nominal GDP matters more than real GDP when forecasting the public finances. Tax receipts in particular are sensitive to the cash value of labour income, corporate profits and consumer spending. We have revised cumulative growth in nominal GDP between 2015-16 and 2020-21 down to 21.7 per cent from 23.8 per cent in November.

1.23 In terms of the individual sectors of the economy:

- **household sector**: real consumption growth has been revised down in 2016. But with nominal consumption growing more strongly than household income in the final

quarter of 2015, our saving ratio forecast has been revised down significantly. Early estimates of the saving ratio are often subject to considerable revisions, but this appears consistent with the further pick-up in consumer credit growth reported in the latest Bank of England data. The household financial deficit is close to 3 per cent of GDP across the forecast. This is unprecedented in available historical data, although arguably consistent with the latest market expectations of Bank Rate barely topping 1 per cent by 2020 and significant fiscal tightening continuing over that period;

- **corporate sector**: real business investment fell in the final quarter of 2015. This gives a lower start to the current year and has therefore prompted a significant downward revision to annual business investment growth in 2016. At 2.6 per cent, it is 4.9 percentage points weaker than our November forecast. Business investment data are also prone to revision, so it is not clear how much should be read into the weakness of the latest data. It predates the bout of global market volatility since January and any additional uncertainty associated with the EU referendum campaigns; and

- **external sector**: the net trade contribution to GDP growth was weaker than expected in 2015 and we have revised it down in 2016 too. Combined with the sharp fall in the terms of trade, this has led to a substantial revision to the trade deficit, which is wider by around £24 billion a year on average. As a result we expect the current account deficit to average 3.7 per cent of GDP over the next five years rather than the 2.4 per cent we forecast in November. This is the counterpart to the wider household deficit.

1.24 Employment has grown strongly, rising 0.5 million in the year to the final quarter of 2015. We expect employment growth to slow over the coming year, as the unemployment rate falls slightly further from its current 5.1 per cent and then rises towards our estimate of its sustainable rate, and as productivity growth is assumed to pick up.

1.25 We have made relatively small revisions to our housing market forecasts. House price inflation was higher than expected in late 2015, pushing up our near-term forecast. But a lower household income forecast – reflecting weaker productivity growth – has lowered our medium-term forecast. Property transactions have been close to forecast, so we have not made significant revisions. Some uncertainty remains over the effects of the pre-announced April 2016 increase in stamp duty charged on purchases of second homes.

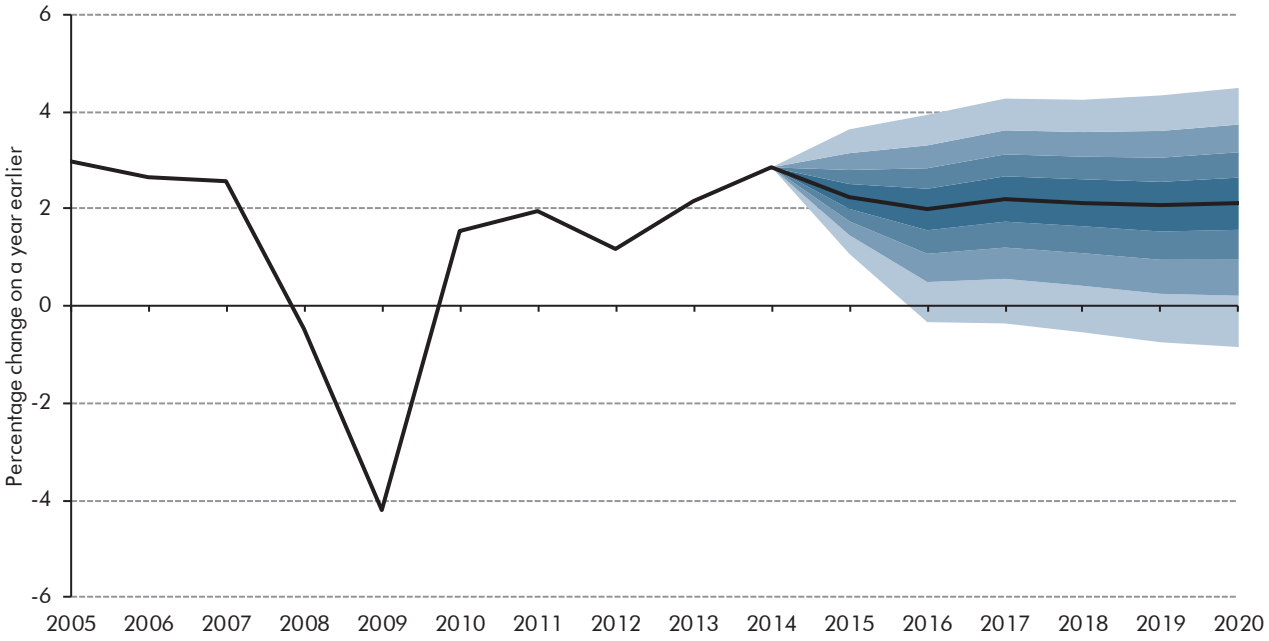
Table 1.1: Overview of the economy forecast

	Percentage change on a year earlier, unless otherwise stated						
	Outturn		Forecast				
	2014	2015	2016	2017	2018	2019	2020
Output at constant market prices							
Gross domestic product (GDP)	2.9	2.2	2.0	2.2	2.1	2.1	2.1
GDP levels (2014=100)	100.0	102.2	104.3	106.6	108.9	111.1	113.5
Output gap	-1.0	-0.3	-0.2	0.0	0.0	0.0	0.0
Expenditure components of real GDP							
Household consumption	2.5	2.9	2.4	2.2	2.1	2.0	1.9
General government consumption	2.5	1.7	0.2	0.6	0.5	0.2	0.7
Business investment	4.7	4.7	2.6	6.1	5.8	5.5	4.4
General government investment	5.8	2.2	0.2	1.9	-0.3	-0.2	6.5
Net trade[1]	-0.4	-0.5	-0.4	-0.1	-0.1	-0.1	-0.1
Inflation							
CPI	1.5	0.0	0.7	1.6	2.0	2.1	2.0
Labour market							
Employment (millions)	30.7	31.2	31.6	31.7	31.9	32.0	32.1
Average earnings	1.4	2.3	2.6	3.6	3.5	3.4	3.6
LFS unemployment (rate, per cent)	6.2	5.4	5.0	5.0	5.2	5.3	5.3
Claimant count (millions)	1.04	0.80	0.75	0.78	0.84	0.86	0.87
	Changes since November forecast						
Output at constant market prices							
Gross domestic product (GDP)	-0.1	-0.1	-0.4	-0.3	-0.3	-0.3	-0.2
GDP levels (2014=100)	0.0	-0.1	-0.5	-0.8	-1.0	-1.3	-1.5
Output gap	0.0	0.4	0.2	0.2	0.0	0.0	0.0
Expenditure components of real GDP							
Household consumption	-0.2	0.0	-0.2	-0.1	-0.2	0.0	0.1
General government consumption	0.6	0.0	-0.3	0.0	0.1	-0.3	-0.4
Business investment	0.1	-1.3	-4.9	-1.0	-1.2	-1.1	-0.1
General government investment	-1.8	-0.8	-0.6	1.3	1.3	-1.9	-2.7
Net trade[1]	-0.1	-0.6	-0.2	-0.1	0.0	0.0	0.0
Inflation							
CPI	0.0	0.0	-0.3	-0.2	0.1	0.1	0.0
Labour market							
Employment (millions)	0.0	0.1	0.1	0.0	0.0	0.0	0.0
Average earnings	-0.1	-0.3	-0.7	-0.1	-0.1	-0.3	-0.3
LFS unemployment (rate, per cent)	0.0	-0.1	-0.2	-0.2	-0.1	-0.1	-0.1
Claimant count (millions)	0.00	0.00	-0.03	-0.03	-0.02	-0.01	-0.01

[1] Contribution to GDP growth.

1.26 There is considerable uncertainty around any economic forecast. Chart 1.3 presents our central growth forecast with a fan showing the probability of different outcomes based on past official forecast errors. The solid black line shows our median forecast, with successive pairs of lighter shaded areas around it representing 20 per cent probability bands.

Chart 1.3: Real GDP growth fan chart



Source: ONS, OBR

1.27 Risks to our central forecast include greater volatility in financial and commodity markets, slower growth in China, the possibility of a significant fall in the exchange rate and the impact of the upcoming EU referendum on business and consumer confidence and the behaviour of asset and financial markets. We have made no assessment of the potential long-term impact of 'Brexit' on the economy and the public finances, as Parliament requires us to base our forecasts on current Government policy and not to consider alternatives.

The fiscal outlook

1.28 Public sector net borrowing peaked at 10.3 per cent of GDP (£154.7 billion) in 2009-10 as the late 2000s recession and financial crisis dealt the public finances a significant blow.[1] Fiscal consolidation and economic recovery then reduced the deficit to 5.0 per cent of GDP (£91.9 billion) by 2014-15. We estimate that the deficit will fall by a further £19.7 billion in 2015-16 to £72.2 billion – a similar fall to the one we predicted in November.

1.29 Table 1.2 shows that on current policy – including the decisions announced in this Budget – we expect the deficit to continue falling, and the budget to move into surplus in 2019-20, as we did in November.

[1] In our November forecast, we anticipated the effect of the ONS announcement that private registered providers of social housing in England – including most housing associations and some for-profit housing bodies – would be reclassified to the public sector. The ONS has now implemented that decision in the official statistics, so all figures presented here are on a consistent basis, including the latest estimate of housing associations' effect on public sector borrowing and debt and our updated forecasts.

Table 1.2: Fiscal forecast overview

	Per cent of GDP						
	Outturn	Forecast					
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Revenue and spending							
Public sector current receipts	35.7	36.3	36.9	36.9	37.0	37.5	37.4
Total managed expenditure	40.8	40.2	39.7	38.8	38.0	37.0	36.9
Deficit: Fiscal mandate (current and previous)							
Public sector net borrowing	5.0	3.8	2.9	1.9	1.0	-0.5	-0.5
Cyclically adjusted current budget deficit	2.4	1.8	0.9	0.2	-0.5	-2.0	-2.4
Debt: Supplementary target							
Public sector net debt	83.3	83.7	82.6	81.3	79.9	77.2	74.7
	Changes since November forecast						
Revenue and spending							
Public sector current receipts	0.0	0.5	0.3	0.0	0.1	0.6	0.3
Total managed expenditure	-0.2	0.5	0.7	0.7	0.9	0.5	0.4
Deficit: Fiscal mandate (current and previous)							
Public sector net borrowing	-0.2	0.0	0.3	0.7	0.8	0.0	0.1
Cyclically adjusted current budget deficit	0.0	0.2	0.4	0.7	0.7	-0.1	0.0
Debt: Supplementary target							
Public sector net debt	0.2	1.3	0.9	1.4	2.6	2.9	3.4

Changes in public sector net borrowing and net debt

Expected borrowing in 2015-16

1.30 We expect borrowing to fall to £72.2 billion this year, down £19.7 billion or 21.4 per cent from 2014-15. That is a bigger drop than would be implied by the data for the first 10 months of the year, which showed borrowing down £10.6 billion or 13.7 per cent on 2014-15. So it is not surprising that outside analysts tend to have higher forecasts.

1.31 We have revised down our receipts forecast since November (although it still implies stronger year-on-year growth in the final two months of the year than in the first ten). But this has been more than offset by downward revisions to spending.

1.32 As ever, it is important to stress the uncertainty that remains around in-year borrowing, even at this late stage in the year. It is also important to remember that we are forecasting the level at which the budget deficit will settle when all the relevant data have been gathered over the coming months. History suggests that this will not be the level initially reported by the ONS when it publishes its first estimate next month. This will necessarily be based on provisional data that will be revised as final outturn data become available.

1.33 The main factors that are likely to explain the difference between our latest forecast for borrowing in 2015-16 and the gloomier outside expectations include:

- we expect stronger growth in **income tax and NICs receipts**, reflecting indications from HMRC administrative data for February. The Government's **marriage tax allowance** is also costing less than expected, thanks to IT problems for many people trying to claim

it, and a combination of lack of awareness and possibly a reluctance among other potential recipients to attract the attention of HMRC. That more than offsets the lower yield from the introduction of **Class 3A voluntary NICs**, where lack of awareness has also led to much lower take-up than expected;

- we expect **stamp duty land tax** to rise by 16.5 per cent in the year to February and March combined, up from 0.3 per cent year-to-date, due largely to the timing of the 2014 reform. That pick-up remains despite a £0.5 billion downward revision to our forecast since November. We also expect **stamp duty on shares** to be boosted by a large payment made in February as a result of a recent corporate takeover;

- **VAT** is also expected to be stronger over the remaining two months, reflecting February administrative data. We also forecast stronger receipts from **environmental levies** (where we are investigating differences between DECC and ONS estimates) and **alcohol duties** (where we expect timing effects associated with cuts in duty rates last year not to be repeated);

- a £0.7 billion downward revision to **housing associations**' net borrowing, informed by the £1.0 billion lower-than-expected ONS estimate for their borrowing in 2014-15. The latest public finances data for 2015-16 are based on our November 2015 housing associations forecast, so our new forecast will be reflected in the official data until the ONS can replace it with firm data from housing associations; and

- we have revised down spending on **EU contributions** in 2015-16 by £1.2 billion, largely due to a lower-than-expected demand from the European Commission for a contribution in March.

Forecast for borrowing from 2016-17 onwards

1.34 Table 1.3 shows how changes to our underlying forecast judgements and the Government's policy decisions (shown in Chart 1.4) have affected our forecast for borrowing:

- we have revised down our **pre-measures receipts forecast** significantly (which increases borrowing and therefore shows up as positive figures in the table). Weaker productivity growth implies weaker nominal GDP growth and this reduces growth in all the main tax bases (wages and salaries, consumer spending and corporate profits). Lower share prices have also reduced receipts from capital taxes, while lower market expectations of interest rates have reduced interest and dividend receipts. Updated modelling of stamp duty land tax has also contributed to the downward revision;

- lower market expectations of Bank Rate and gilt yields, plus downward revisions to our RPI inflation forecast, have prompted a further large downward revision to **debt interest spending**, net of the saving associated with financing part of the debt at Bank Rate through the Asset Purchase Facility (APF). This is the third time in our last four forecasts that changes in market expectations have led to a large downward revision to debt interest spending (as set out in Box 4.4 in Chapter 4). Higher interest rates clearly pose

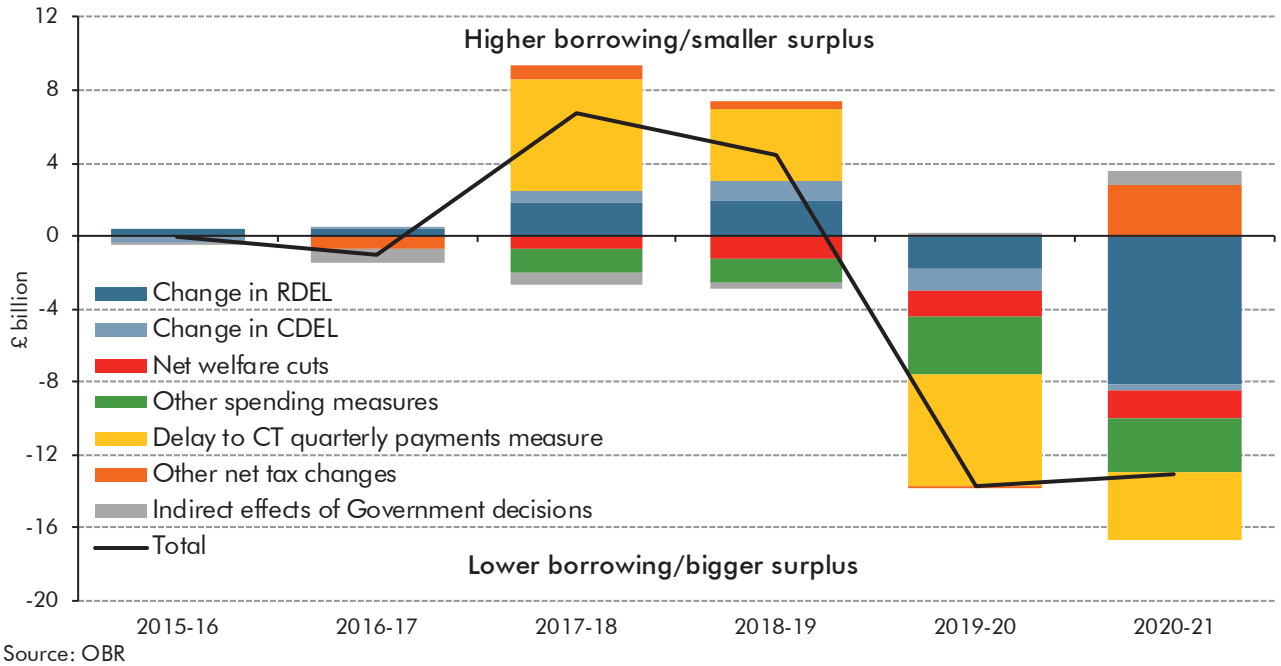
an upside risk to our spending forecast, although recent experience shows that even at very low interest rates it is possible for them to fall further;

- our **pre-measures forecast for other AME spending** is higher every year. Welfare spending has been revised up, thanks largely to higher-than-expected caseloads and average awards as disabled people are migrated from disability living allowance to the new personal independence payment. Spending by local authorities and public corporations has also been revised up. We have made smaller downward revisions to spending on state pensions, tax credits and public service pensions;

- the **direct effect of the Government's policy decisions** has been to increase the deficit in 2017-18 and 2018-19 by £6 billion a year on average, but then to improve the budget balance by an average of £14 billion in 2019-20 and 2020-21. The contrast is dominated by the Government's decision to delay the July Budget measure that brings forward the timing of large firms' quarterly corporation tax payments. This shifts roughly £10 billion of receipts from 2017-18 and 2018-19 back to the surplus target years of 2019-20 and 2020-21; and

- the net **indirect effects** on the public finances of the Government's decisions have been relatively small. In most years, they reflect the knock-on effects of how the Government has altered the pace of fiscal tightening. In 2018-19, the effect on RPI inflation of introducing the new soft drinks industry levy has added around £1 billion to accrued interest payments on index-linked gilts.

Chart 1.4: The effect of Government decisions on public sector net borrowing



Source: OBR

Table 1.3: Changes to public sector net borrowing since November

	£ billion						
	Outturn	Forecast					
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
November forecast	**94.7**	**73.5**	**49.9**	**24.8**	**4.6**	**-10.1**	**-14.7**
Total forecast changes	**-2.8**	**-1.3**	**6.6**	**7.2**	**12.3**	**13.4**	**16.7**
of which:							
Receipts	-0.5	0.4	8.2	10.5	14.0	16.3	19.5
Debt interest spending	0.0	-0.6	-3.9	-4.9	-4.8	-5.4	-5.2
Non-interest AME spending	-2.3	-1.5	1.8	1.1	2.7	2.0	2.0
Revisions to DEL spending	0.0	0.5	0.5	0.5	0.5	0.5	0.5
March forecast pre-policy decisions	**91.9**	**72.2**	**56.5**	**32.0**	**17.0**	**3.2**	**2.0**
Total effect of Government decisions		**-0.1**	**-1.0**	**6.7**	**4.5**	**-13.7**	**-13.1**
of which:							
Scorecard receipts measures		0.0	-0.6	7.0	4.3	-6.3	-0.8
Scorecard AME spending measures		0.0	-0.1	-2.1	-2.6	-4.6	-4.5
Changes to RDEL spending		0.4	0.3	1.8	1.9	-1.8	-8.1
Changes to CDEL spending		-0.4	0.1	0.7	1.1	-1.2	-0.4
Indirect effect of Government decisions		-0.1	-0.7	-0.6	-0.3	0.2	0.7
March forecast post-policy decisions	**91.9**	**72.2**	**55.5**	**38.8**	**21.4**	**-10.4**	**-11.0**
Overall change since November	**-2.8**	**-1.3**	**5.5**	**14.0**	**16.8**	**-0.3**	**3.7**

Note: This table uses the convention that a negative figure means a reduction in PSNB, i.e. an increase in receipts or a reduction in spending will have a negative effect on PSNB.

1.35 In November we forecast that public sector net debt (PSND) would fall as a share of GDP in 2015-16 and in each subsequent year of the forecast. But despite revising down the cash level of net debt this year, we now expect it to rise as a share of GDP in 2015-16 before declining from 2016-17 onwards. This reflects revisions to our nominal GDP forecast.

1.36 PSND is now forecast to come in at 83.7 per cent of GDP this year, falling to 74.7 per cent of GDP in 2020-21. Table 1.4 shows that we have revised up the debt-to-GDP ratio by increasing amounts across the forecast period since November. That is because:

- lower **nominal GDP growth** in the near term has raised the debt-to-GDP ratio significantly. In particular, the sharp slowdown in the year to the final quarter of 2015 – up just 1.9 per cent, compared with the 3.9 per cent we forecast in November – has fed through to the denominator for the 2015-16 debt-to-GDP ratio calculation. This has pushed the ratio up significantly compared to 2014-15. From 2016-17 onwards, smaller downward revisions to our nominal GDP growth forecast, due to a lower estimate of underlying productivity growth, push the ratio up a little further;

- **cumulative borrowing** across the forecast has been revised up significantly. As described above, that reflects a large upward revision to our pre-policy-measures forecast, partly offset by the impact of the Government's policy decisions;

- the depreciation of the pound has increased the sterling value of the UK's **foreign currency reserves**, as measured in the PSND calculation.[2] In reality, the reserves are largely hedged against currency movements to reduce the Exchequer's exposure to currency risk, but Eurostat's *Manual on government deficit and debt* stipulates that derivative instruments must not be counted in EDP measures of debt (even though they are counted in the full National Accounts). The ONS follows this Eurostat guidance for its PSND calculations. The result is that the sharp drop in the pound this year has raised the sterling value of the official reserves, which net off PSND. The effect was worth £6.3 billion in January alone and we estimate it will subtract £10 billion from PSND by the end of the year. This is a feature of the PSND calculation rather than a true reflection of the public sector's net worth;

- the pace at which **UK Asset Resolution's assets** are sold or rundown has increased, reducing PSND. UKAR's mortgage book has been running down slightly faster than expected as its customers take advantage of lower mortgage rates currently offered by other lenders. UKAR is then planning a further large sale of mortgage assets – following last year's £13 billion sale of the Granite securitisation and other assets. That brings forward around £17½ billion of sales into 2016-17 and 2017-18, while reducing the amount of mortgages that would otherwise have run down naturally later in the forecast period. Taken together, the reduction in PSND relative to our last forecast peaks in 2017-18 then declines in subsequent years;

- lower proceeds from **other financial asset sales** across the forecast period. Sales of the Government's remaining stake in Lloyds have been pushed back from 2015-16 to 2016-17, with proceeds also lower due to the fall in the share price since November. (The Government still plans to give some shares away to retail investors, so while this sale reduces PSND it would worsen a broader measure of public sector net worth.) More significantly, the expected proceeds from RBS share sales between 2016-17 and 2020-21 have fallen by 26 per cent to £21.5 billion, more than explained by the sharp fall in the share price;

- **APF balance sheet effects** have been revised up slightly, due to the difference between the amount the Bank pays for the gilts held in the APF and their nominal value at redemption. Lower market expectations of gilt yields mean that when the APF replaces gilts that reach their redemption date the new gilts will be purchased at a greater premium to the nominal values at which they are valued for PSND. As a result, over the coming five years we expect that the APF will need to purchase gilts with a market value of £138½ billion to replace gilts of the same value that are redeemed, but that the nominal value of those gilts will be £115½ billion compared with the redeemed gilts' nominal value of £124½ billion. That £9 billion difference by 2020-21 is around £4 billion higher than assumed in November; and

[2] The ONS has introduced a new table in its public sector finances bulletin that details how to reconcile changes in the central government net cash requirement and changes in central government net debt, of which these effects on the foreign exchange reserves are one element. Thanks to this greater transparency, we will be able to forecast its elements directly rather than treating it as an unexplained residual in the PSND calculation.

- movements in expected **gilt premia** push PSND down in every year of the forecast, while **other factors** are generally smaller and partly offsetting.

Table 1.4: Changes to public sector net debt since November

	Per cent of GDP						
	Outturn	Forecast					
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
November forecast	83.1	82.5	81.7	79.9	77.3	74.3	71.3
March forecast	83.3	83.7	82.6	81.3	79.9	77.2	74.7
Change	**0.2**	**1.3**	**0.9**	**1.4**	**2.6**	**2.9**	**3.4**
of which:							
Change in nominal GDP[1]	0.2	1.7	1.6	1.8	2.0	2.2	2.3
Change in cash level of net debt	0.1	-0.5	-0.7	-0.4	0.6	0.7	1.1
	£ billion						
November forecast	1546	1599	1652	1685	1702	1708	1715
March forecast	1547	1591	1638	1677	1715	1725	1740
Change in cash level of net debt	**1**	**-9**	**-14**	**-8**	**14**	**16**	**25**
of which:							
Pre-measures borrowing	0	-1	5	13	25	38	55
Policy effects on borrowing	0	0	-1	6	10	-4	-17
Foreign currency reserves	0	-10	-10	-10	-10	-11	-11
UKAR asset sales and rundown	0	-1	-9	-18	-14	-11	-10
Other financial asset sales	0	4	2	2	3	3	9
Gilt premia	0	-2	-4	-4	-6	-6	-7
APF balance sheet effects	0	0	1	1	2	3	4
Other factors	1	1	3	3	4	3	2

[1] Non-seasonally-adjusted GDP centred end-March.

The pace of fiscal consolidation

1.37 Our estimate of the margin of spare capacity in the economy is small in 2015-16 at just 0.3 per cent of potential output – slightly narrower than we estimated in November – and we expect the output gap to be very close to zero from 2016-17 onwards. This means that more of the deficit in 2015-16 is considered structural than was the case in November, but the path of structural borrowing is similar to that of headline borrowing described above.

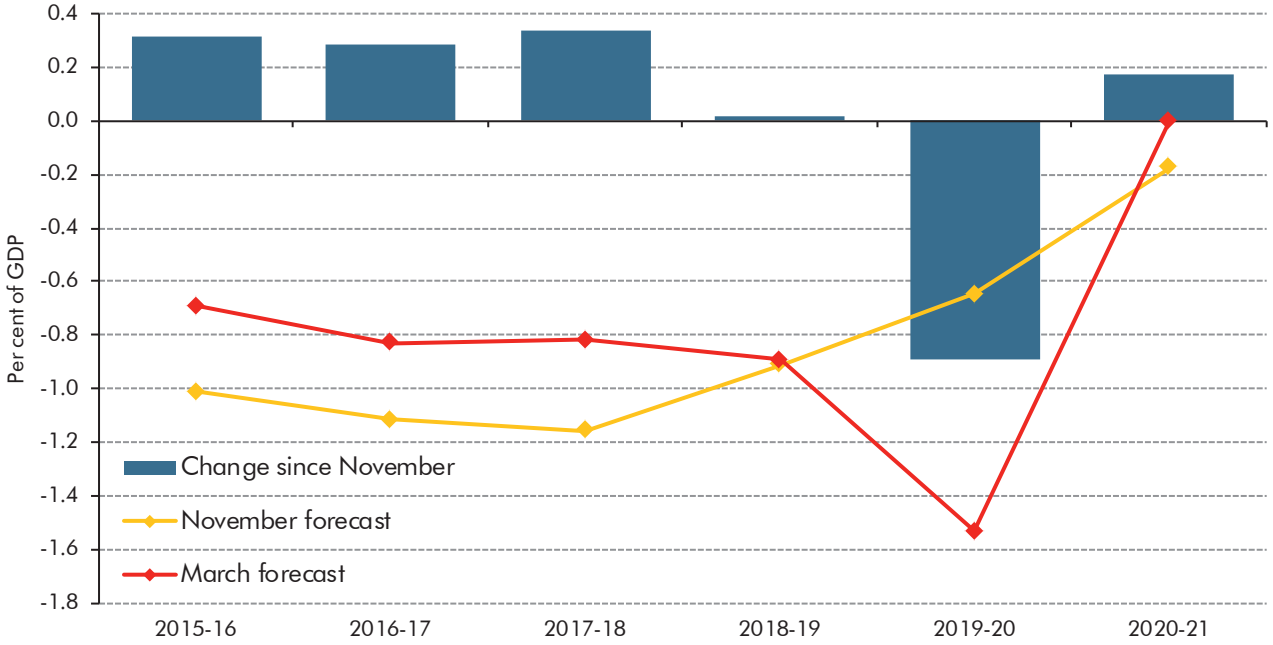
1.38 The year-on-year change in the structural budget deficit – public sector net borrowing adjusted for the size of the output gap – is a common measure of the pace of fiscal consolidation. It has drawbacks when estimates of potential output change significantly, but is more useful when potential output growth is more stable. Chart 1.5 shows that:

- **in November's Spending Review and Autumn Statement**, the Government set a path for the structural deficit that saw the pace of tightening pick up slightly in 2016-17 and 2017-18 and then diminish year by year as the budget moved into surplus; but

- **in this Budget**, thanks to tax and spending policy changes that have uneven effects on borrowing across the forecast, the Government has charted a course that sees the pace of tightening pick up gradually up to 2018-19, then dramatically in 2019-20 (the

year in which its surplus target first applies), before slowing abruptly in 2020-21. The 1.5 per cent of GDP tightening of the structural fiscal position in 2019-20 would be the sharpest since 2010-11.

Chart 1.5: Year-on-year changes in cyclically adjusted net borrowing



Source: OBR

Fiscal forecast revisions over the past six years

1.39 Following our last forecast in November, much attention focused on the fact that we had reduced our pre-measures forecast for the budget deficit by an aggregate £27 billion over five years, or about £5.4 billion a year or ¼ per cent of GDP on average. In this *EFO* we have increased our pre-measures forecast by £11.3 billion a year or 0.5 per cent of GDP, giving an aggregate increase of £56 billion over the five years. Table 1.5 shows the main sources of those revisions. In both cases, there were factors pushing in both directions. On the spending side, debt interest spending was revised down in both while welfare cap spending was revised up in both. The main difference between them is the receipts forecast. In November it was revised up, thanks largely to various changes to modelling judgements – which are still in place in this forecast. But our latest forecast has been hit by the productivity-driven downward revision to the major tax bases.

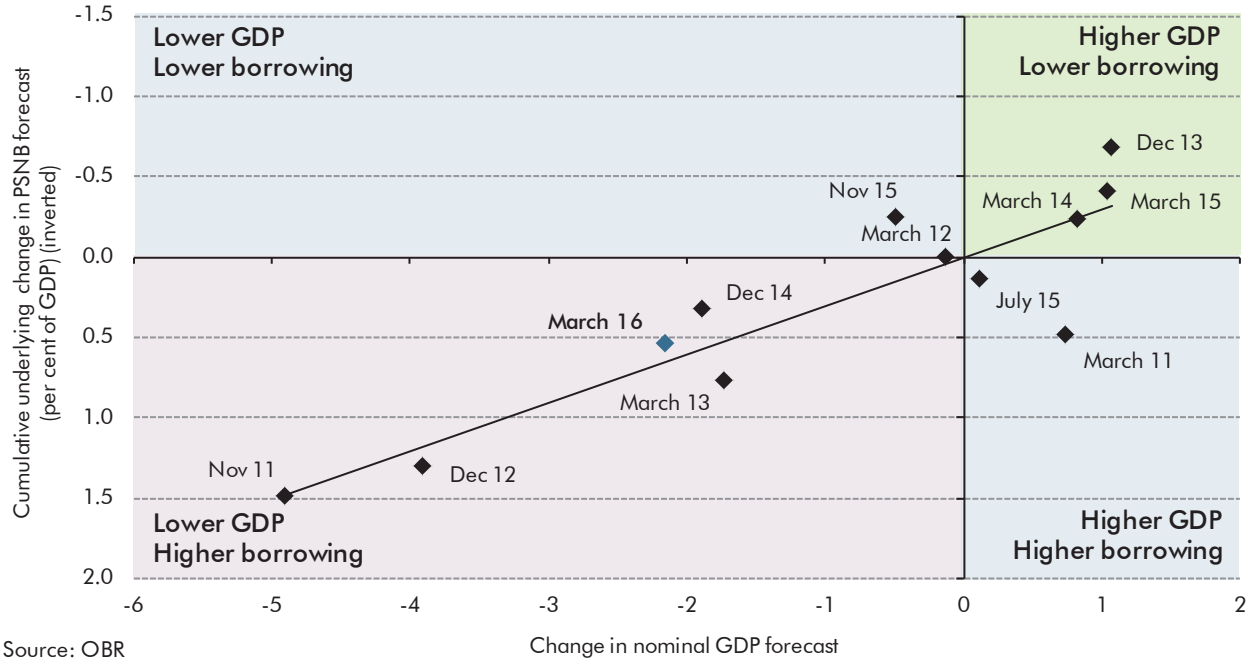
Table 1.5: Underlying fiscal forecast revisions in November 2015 and March 2016

	Forecast						
	£ billion						Per cent of GDP
	2016-17	2017-18	2018-19	2019-20	2020-21	Total	
Change in PSNB forecast: November 2015	**-2.9**	**-7.9**	**-8.0**	**-3.8**	**-4.4**	**-27.0**	**-0.2**
of which:							
Debt interest spending and updated APF redemption profile	-1.7	-4.1	-5.0	-5.0	-6.0	**-21.8**	**-0.2**
VAT deductions modelling	-1.0	-1.6	-2.3	-2.9	-3.3	**-11.1**	**-0.1**
Company profits and CT receipts	-1.8	-2.3	-2.1	-1.7	-1.8	**-9.7**	**-0.1**
Other receipts judgements and modelling	-1.2	-2.0	-1.4	-1.4	-1.8	**-7.9**	**-0.1**
New NICs model	-0.4	-0.6	-1.1	-1.7	-2.8	**-6.6**	**-0.1**
Lower interest rates effect on receipts	0.2	0.3	0.3	0.3	0.2	**1.3**	**0.0**
Other forecast changes	-0.3	-1.8	-1.2	2.6	4.3	**3.6**	**0.0**
Welfare cap spending	1.0	1.2	1.2	1.9	2.4	**7.7**	**0.1**
SDLT related judgements	0.7	1.1	1.7	2.2	2.4	**8.1**	**0.1**
Lower equity prices effect on receipts	1.6	1.8	1.9	2.0	2.1	**9.4**	**0.1**
Change in PSNB forecast: March 2016	**6.6**	**7.2**	**12.3**	**13.4**	**16.7**	**56.3**	**0.5**
of which:							
Debt interest spending	-3.9	-4.9	-4.8	-5.4	-5.2	**-24.2**	**-0.2**
Other forecast changes	2.3	-1.1	1.0	0.2	1.2	**3.6**	**0.0**
Lower interest rates effect on receipts	0.3	0.6	0.9	1.1	1.1	**4.1**	**0.0**
Local authorities and public corporations spending	0.8	1.3	1.2	1.1	1.1	**5.5**	**0.1**
Welfare cap spending	-0.5	0.6	1.1	2.0	2.4	**5.7**	**0.1**
Lower equity prices effect on receipts	0.8	1.8	1.9	2.1	2.3	**8.8**	**0.1**
Lower nominal GDP reduces tax base growth	6.8	8.8	11.0	12.3	13.8	**52.8**	**0.5**

1.40 How do these compare with revisions at past *EFOs*? In Annex B we review all the revisions we have made since the first full OBR forecast was published in June 2010. This shows that the revision in this forecast is in line with the average in absolute size, although it is relatively large for a March forecast (when revisions are typically smaller because less time has passed since the previous forecast). Notwithstanding the attention it received at the time, the November revision was only the ninth largest of thirteen. Since 2010, we have revised borrowing up on nine occasions and down on four, with the biggest revisions upward in November 2011, December 2012 and March 2013.

1.41 The analysis also confirms how important changes in nominal GDP are for our fiscal forecast, whether they reflect revised assumptions about potential output (as in November 2011 and this forecast), the output gap (in December 2012 and December 2013) or whole economy inflation (in December 2012 and December 2014). As Chart 1.6 shows, there is a close correlation between our economy and fiscal forecast revisions – when we revise down prospective GDP growth, we tend to revise up our borrowing forecast, and vice versa. But we have produced three forecasts in which the revisions to borrowing and nominal GDP have moved in the same direction rather than in opposite directions.

Chart 1.6: Underlying fiscal forecast and overall nominal GDP revisions since 2010



Source: OBR

1.42 Classification changes and our underlying forecast revisions provide the Government with the baseline fiscal forecasts against which it takes its policy decisions. On some occasions, the Government has chosen to offset the underlying revisions – e.g. in November 2011, when it announced additional public spending cuts to offset an upward revision to our underlying deficit forecast and thereby ensure that one of its fiscal targets would not be missed. On other occasions it has accommodated the revisions – e.g. in December 2012, when we forecast that the Government was on course to miss its target for net debt, but it chose not to take policy measures that would have been sufficient to get back on track.

1.43 Chart 1.7 illustrates the effect of all factors contributing to revisions in our fiscal forecasts since 2010. It shows that:

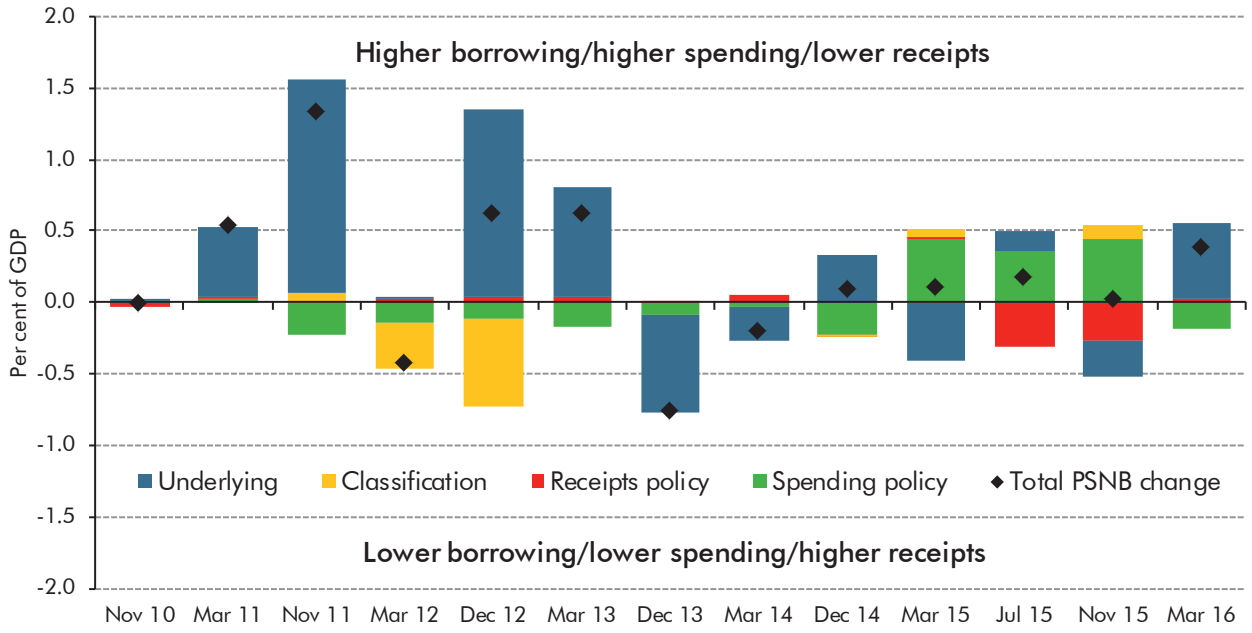
- **when our underlying forecast revisions have worsened the outlook** for the public finances, the Government has tended to respond by using policy to offset part of those changes over the forecast period. When presented with our largest upward revisions to expected borrowing in November 2011 and December 2012, the Coalition decided to add more years to the fiscal consolidation, with the policy tightening assumed to be borne almost entirely by lower departmental spending;

- **when our underlying forecast revisions have improved the outlook** for the public finances, the Government has responded either by banking the improvement (as in December 2013) or by reducing the squeeze on spending that had been pencilled in at previous fiscal events (as in March and November 2015); and

- **spending cuts pencilled in during the last Parliament were later reversed.** In the seven forecasts between November 2011 and December 2014, the Coalition's policy

decisions involved cutting spending every time and a net tax giveaway in all but two. At the next three forecasts, the Coalition and then the new Conservative Government reversed much of that planned squeeze on spending in the run-up to setting detailed plans in last November's Spending Review.

Chart 1.7: Changes in our post-measures fiscal forecasts since 2010



Source: OBR

Performance against the Government's fiscal targets

1.44 The *Charter for Budget Responsibility* requires the OBR to judge whether the Government has a greater than 50 per cent chance of hitting its fiscal targets under existing policy. The Charter has been updated a number of times in recent years, with the latest version approved by Parliament in October 2015 (and available on our website). It sets out the targets for borrowing, debt and welfare spending that are assessed in this forecast:

- the **fiscal mandate**, which requires a surplus on public sector net borrowing by the end of 2019-20 and in each subsequent year;
- the **supplementary target**, which requires public sector net debt to fall as a percentage of GDP in each year to 2019-20; and
- the **welfare cap**, a limit on a subset of welfare spending, at cash levels set out by the Treasury for each year to 2020-21 in the July 2015 Budget.

1.45 In the absence of any policy measures in this Budget, the Government would have been on course for small deficits in 2019-20 (£3.2 billion) and 2020-21 (£2.0 billion), breaching the fiscal mandate. But the Government's Budget policy decisions raise £13.7 billion in 2019-20 and £13.1 billion in 2020-21, offsetting the deterioration in the underlying forecast and

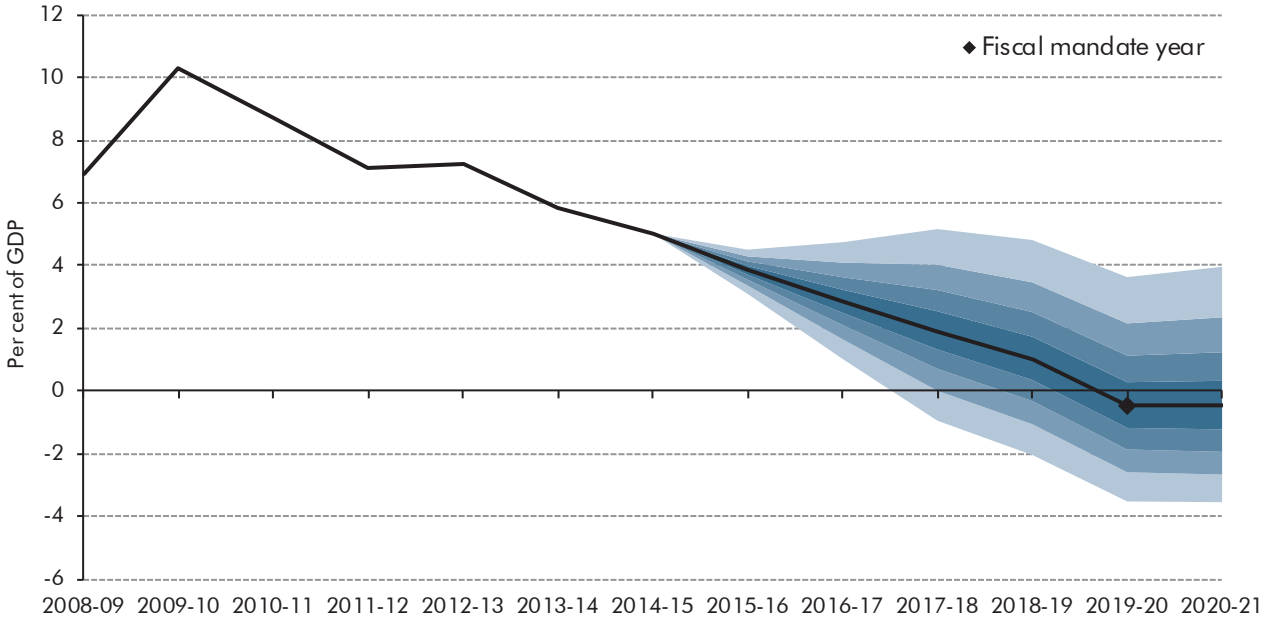
putting it back on course to meet the surplus target by £10.4 billion and £11.0 billion respectively. We therefore judge that the Government is more likely than not to meet its target on existing policy, but with a margin that is small in comparison with the uncertainty that surrounds our fiscal forecast at that horizon.

1.46 In November, we expected debt to fall as a share of GDP in every year of the forecast, so that in our central forecast the Government was on course to meet its supplementary target. We now expect the debt-to-GDP ratio to rise between 2014-15 and 2015-16, thereby missing the target. But we still expect it to fall in each year thereafter.

1.47 In our central forecast spending subject to the welfare cap remains above the cap in all years. It is also above the 2 per cent forecast margin in all years. On this basis, our Autumn Statement assessment that the cap has been breached still holds.

1.48 All forecasts are subject to significant uncertainty. Chart 1.8 shows our median forecast for public sector net borrowing with successive pairs of shaded areas around that median forecast representing 20 per cent probability bands. As in Chart 1.3 for our GDP growth forecast, the bands show the probability of different outcomes if past official errors were a reasonable guide to future forecast errors.

Chart 1.8: Public sector net borrowing fan chart



Source: ONS, OBR

1.49 In judging adherence to the fiscal mandate, the Government now asks us to assess whether the economy will be in 'normal times' after 2019-20, which it has defined as growing by more than 1 per cent on a 4-quarter-on-4-quarter basis. On our central forecast, growth will be above 1 per cent. But the probability distribution used to generate Chart 1.3 suggests there is a 35 per cent probability of growth falling below the threshold in 2020.

1.50 The uncertainties around our central forecast reflect those regarding the outlook for the economy and those regarding the performance of revenues and spending in any given state of the economy. So we test the robustness of our judgement in three ways:

- first, by looking at **past forecast errors**, if our central forecasts are as accurate as official forecasts were in the past, then there is a roughly 55 per cent chance that PSNB will be in balance or surplus in 2019-20 (as the fiscal mandate requires);

- second, by looking at its **sensitivity to varying key features of the economy forecast**. The surplus in 2019-20 could fall to zero due to relatively small differences in the output gap (if it were -0.7 per cent in that year, not zero), potential output (if it were 1.0 per cent lower), whole economy prices (1.2 per cent lower), debt interest spending (due to interest rates 1.2 percentage points higher than market expectations or a 2.2 percentage point upside surprise in RPI inflation), effective tax rates (a 0.5 percentage point lower tax-to-GDP ratio, due to the composition of GDP, distribution of incomes or movements in asset prices), or the delivery of public spending cuts (a quarter less than planned); and

- third, by looking at **alternative economic scenarios**. We have considered the implications of higher or lower net inward migration, using a similar framework to that which underpins our demographically driven long-term fiscal projections. In these scenarios, higher/lower migration leads to a higher/lower population and employment rate (because net inward migration is concentrated among people of working age). We do not assume any change in average productivity per worker. The effect on the public finances is driven by population size (e.g. higher numbers of taxpayers or benefit recipients) and age structure (e.g. those of working-age pay more tax and do not receive child benefit or state pensions). Since the Government has set departmental spending plans in cash terms, we do not assume that changes in population size lead to changes in departmental spending. We use the ONS 'high' and 'low' migration population projection variants, where net migration is assumed to fall from over 320,000 over the past year to 265,000 by 2021 in the high scenario and 105,000 in the low scenario, and also its 'natural change' variant where net migration is zero. In these scenarios, the surplus in 2019-20 would be higher under the high migration scenario and lower, but still positive, in the low migration scenario. In the natural change scenario the budget would be close to balance in 2019-20 and 2020-21.

2 Developments since the last forecast

2.1 This chapter summarises:

- the main **economic and fiscal data** developments since our last forecast in November 2015 (from paragraph 2.2); and
- recent **external forecasts** for the UK economy (from paragraph 2.19).

Economic developments

Data revisions

2.2 Since our November forecast, the ONS has published the Quarterly National Accounts for the third quarter of 2015, which included revisions back to the beginning of 2014. Further revisions for the whole of 2015 were released in last month's second estimate of GDP for the fourth quarter. The net effect of these changes has been to reduce cumulative GDP growth from the beginning of 2014 to mid-2015 from 3.4 to 3.2 per cent. As Table 2.1 shows, the largest component of that change was the less positive contribution from net trade, largely offset by a less negative stockbuilding contribution.

Table 2.1: Contributions to real GDP growth from 2014Q2 to 2015Q2

	Percentage points						
	Private consumption	Government consumption	Government investment	Private investment	Net trade	Stocks	GDP growth, per cent
November data	2.4	0.6	0.0	1.1	1.7	-2.3	3.4
Latest data	2.3	0.4	-0.1	1.3	0.7	-1.5	3.2
Difference[1]	-0.1	-0.2	-0.1	0.3	-1.0	0.8	-0.2

[1] Difference in unrounded numbers, rounded to one decimal place.

Note: Components may not sum to total due to rounding and the statistical discrepancy. The statistical discrepancy is composed of the difference between the estimate of GDP led by the output approach and the expenditure estimate. The statistical discrepancy is -0.1 percentage points in both November and the latest data.

2.3 Over the same period GDP deflator growth has been revised down by 0.4 percentage points. The largest contribution came from the implied deflator for the change in stocks. There was a partly offsetting effect from the terms of trade, with growth in the import deflator being revised down by more than the exports deflator.

Table 2.2: Contributions to GDP deflator growth from 2014Q2 to 2015Q2

	Percentage points						
	Private consumption	Government consumption	Total investment	Exports	Imports	Stocks	Deflator growth, per cent
November data	0.5	-0.3	0.4	-0.5	0.3	1.4	1.5
Latest data	0.5	0.0	0.0	-1.5	1.8	0.6	1.2
Difference[1]	0.0	0.3	-0.4	-0.9	1.4	-0.8	-0.4

[1] Difference in unrounded numbers, rounded to one decimal place.
Note: Components may not sum to total due to rounding, the statistical discrepancy, and changing weights. The error resulting from the statistical discrepancy and changing weights is -0.2 percentage points for both November and latest data. Contributions are calculated on a fixed weight basis, except the stocks contribution which includes the effects of price and volume changes.

2.4 Nominal GDP growth has been revised down by 0.6 percentage points over the period, reflecting the changes to real GDP and GDP deflator growth. Net trade was the largest contributor to this downward revision, with growth in the value of exports revised down and growth in the value of imports revised up.

Table 2.3: Contributions to nominal GDP growth from 2014Q2 to 2015Q2

	Percentage points						
	Private consumption	Government consumption	Government investment	Private investment	Net trade	Stocks	GDP growth, per cent
November data	2.9	0.3	0.0	1.4	1.5	-0.9	5.0
Latest data	2.8	0.4	-0.1	1.2	1.0	-0.9	4.4
Difference[1]	-0.1	0.2	-0.1	-0.2	-0.4	0.0	-0.6

[1] Difference in unrounded numbers, rounded to one decimal place.
Note: Components may not sum to total due to rounding and the statistical discrepancy. The statistical discrepancy is 0.1 and -0.1 percentage points for November and latest data respectively.

GDP growth since our November 2015 forecast

2.5 The ONS released the second estimate of GDP for the third quarter of 2015 soon after our November forecast had been published. That included its first estimate of nominal GDP for the third quarter. The ONS has since published full National Accounts data for the third quarter of 2015 and its first and second estimates of GDP for the fourth quarter.

2.6 Real GDP growth over the final two quarters of 2015 was 0.1 percentage points weaker than we expected in November. While headline GDP growth was close to forecast, there were some differences in its composition. As Table 2.4 shows, government consumption and stockbuilding were stronger than forecast, but these were more than offset by weaker growth in private investment and an even bigger than expected drag from net trade.

Table 2.4: Contributions to real GDP growth from 2015Q3 to 2015Q4

	Percentage points						
	Private consumption	Government consumption	Government investment	Private investment	Net trade	Stocks	GDP growth, per cent
November forecast	0.8	0.0	0.0	0.5	-1.1	0.8	1.0
Latest data	0.9	0.2	0.0	0.1	-1.5	1.2	0.9
Difference[1]	0.0	0.2	0.0	-0.4	-0.3	0.3	-0.1

[1] Difference in unrounded numbers, rounded to one decimal place.

Note: Components may not sum to total due to rounding and the statistical discrepancy.The statistical discrepancy is 0.1 percentage points for the latest data.

2.7 The GDP deflator fell over the second half of 2015, in contrast to our forecast of a moderate rise. This mainly reflected weakness in the terms of trade and the implied deflator for the change in stocks. This surprise has fed through to our forecast for the next year, discussed in Chapter 3.

Table 2.5: Contributions to GDP deflator growth from 2015Q3 to 2015Q4

	Percentage points						
	Private consumption	Government consumption	Total investment	Exports	Imports	Stocks	Deflator growth, per cent
November forecast	0.5	-0.1	0.1	-0.8	1.2	-0.5	0.8
Latest data	0.7	-0.4	0.1	-0.9	0.6	-1.0	-0.5
Difference[1]	0.2	-0.3	0.0	-0.1	-0.6	-0.5	-1.3

[1] Difference in unrounded numbers, rounded to one decimal place.

Note: Components may not sum to total due to rounding, the statistical discrepancy, and changing weights. The error resulting from the statistical discrepancy and changing weights is 0.3 and 0.4 percentage points for November and latest data respectively. Contributions are calculated on a fixed weight basis, except the stocks contribution which includes the effects of price and volume changes.

2.8 With growth in both real GDP and the GDP deflator falling short of forecast, nominal GDP growth in the third and fourth quarters was significantly lower than expected: just 0.4 per cent, against our forecast of 1.8 per cent. Net trade was the main factor contributing to the shortfall. Private investment made a smaller, though still significant, negative contribution.

2.9 The weakness of nominal GDP growth in the second half of the year has had knock-on implications for the denominator used in our fiscal forecast and for the Government's performance against its fiscal targets. These are described in Box 4.1 and Chapter 5 respectively.

Table 2.6: Contributions to nominal GDP growth from 2015Q3 to 2015Q4

	Percentage points						
	Private consumption	Government consumption	Government investment	Private investment	Net trade	Stocks	GDP growth, per cent
November forecast	1.4	-0.1	0.0	0.7	-0.6	0.3	1.8
Latest data	1.6	-0.2	0.0	0.3	-1.6	0.1	0.4
Difference[1]	0.2	-0.1	0.0	-0.4	-1.0	-0.2	-1.4

[1] Difference in unrounded numbers, rounded to one decimal place.

Note: Components may not sum to total due to rounding and the statistical discrepancy. The statistical discrepancy is 0.1 percentage points for the latest data.

Conditioning assumptions

2.10 Since we finalised our November forecast oil prices have fallen considerably, to well below the level implied by futures prices at the time. Recent outturns and the futures curve suggest that in the first quarter of 2016 dollar oil prices will be 36.3 per cent below our November assumption (Table 2.7). Our current conditioning assumption for the sterling effective exchange rate is also lower than in November, reflecting depreciation against both the US dollar and the euro. Sterling reached a 7-year low against the US dollar during February, while the sterling effective exchange rate reached a 2-year low. Equity prices have also fallen, with our latest assumption for the first quarter 7.7 per cent lower than in November. Our mortgage interest rates assumption is unchanged from November.

Table 2.7: Conditioning assumptions in 2016Q1

	Oil price ($ per barrel)	US$/£ exchange rate	€/£ exchange rate	ERI exchange rate (index)	Equity prices (FTSE all-share index)	Mortgage interest rates (%)[1]
November forecast	51.2	1.54	1.38	92.1	3519	2.9
Latest assumption	32.7	1.43	1.30	87.0	3247	2.9
Per cent difference	-36.3	-7.3	-5.7	-5.5	-7.7	0.0

[1] Difference is in percentage points.

Labour market

2.11 Labour market quantities were stronger than expected in the fourth quarter of 2015. Lower unemployment and higher participation than expected led to employment 150,000 higher than we forecast in November. Average hours also surprised on the upside, leaving total hours growth over the year 1.2 percentage points above our expectations. The claimant count was in line with our forecast.

2.12 With GDP only growing modestly at the end of the year, but employment and total hours growing strongly, productivity fell sharply. Non-oil output per hour fell by 1.2 per cent in the fourth quarter, compared to our November forecast of a 0.2 per cent increase. That fall has reversed almost all the productivity growth seen in the first three quarters of 2015, leaving output per hour in the fourth quarter only 0.2 per cent up on a year earlier.

2.13 Whole economy average earnings growth was 0.7 per cent in the third quarter of 2015, a little stronger than our November forecast. Data on wages in the fourth quarter, however, appear to have followed productivity in a substantial slowdown: although the National Accounts measure of wages is not yet available, the average weekly earnings (AWE) series implies a 0.2 per cent quarterly rise – 0.5 percentage points weaker than we expected. On an annual basis, headline AWE growth has slowed from a recent peak of 3.0 per cent in September to just 1.9 per cent in the latest data.

Inflation

2.14 CPI inflation for the fourth quarter of 2015 was in line with our November forecast at 0.1 per cent on a year earlier. Prices for petrol and low import intensity goods and services came in weaker than expected. This was offset by the price of high import intensity goods remaining unchanged on the year, against our expectations for a fall. That may have reflected the unexpected sterling depreciation beginning to feed through to consumer prices.

2.15 CPI inflation was 0.3 per cent in January, so inflation has now been below the Bank of England's 2 per cent target for more than two years.

The housing market

2.16 Annual house price inflation on the ONS measure was 7.1 per cent in the fourth quarter, 1.4 percentage points higher than our November forecast. The major lenders' house price indices have continued to diverge, with the Halifax index reporting prices up by 9.7 per cent in the year to February while the Nationwide index is up just 4.8 per cent over the same period. Property transactions picked up in line with our forecast, rising to 320,000 in the final quarter of 2015.

The global economy

2.17 GDP growth in advanced economies in the third and fourth quarters of 2015 was below our November forecast. This disappointment was broad-based, with the US, euro area and Japan all seeing weak growth in the second half of the year. The Canadian economy performed better, rebounding somewhat after two consecutive quarters of contraction at the beginning of 2015. Inflation in the euro area and Japan remains very weak, but it has strengthened in the US and Canada. Emerging market economies have generally continued to weaken. China's GDP growth has slowed, while Russia and Brazil have both seen sharp falls in GDP. India's economy has been more robust, growing at an annual rate of 7.3 per cent in the final quarter.

Fiscal developments

2.18 Public sector net borrowing (PSNB) in the first ten months of 2015-16 was £10.6 billion lower than the same period last year. On the current data, meeting our November forecast would require a fall of £18.4 billion for 2015-16 as a whole. Overall receipts growth has been a little below our November forecast, with income tax and stamp duty land tax receipts

in particular falling short of expectation. Local authority borrowing is also higher in the latest data than was implied by our November forecast, although it is important to note that data on local authority borrowing are often subject to substantial revisions over subsequent months. Our latest fiscal forecast is discussed in Chapter 4.

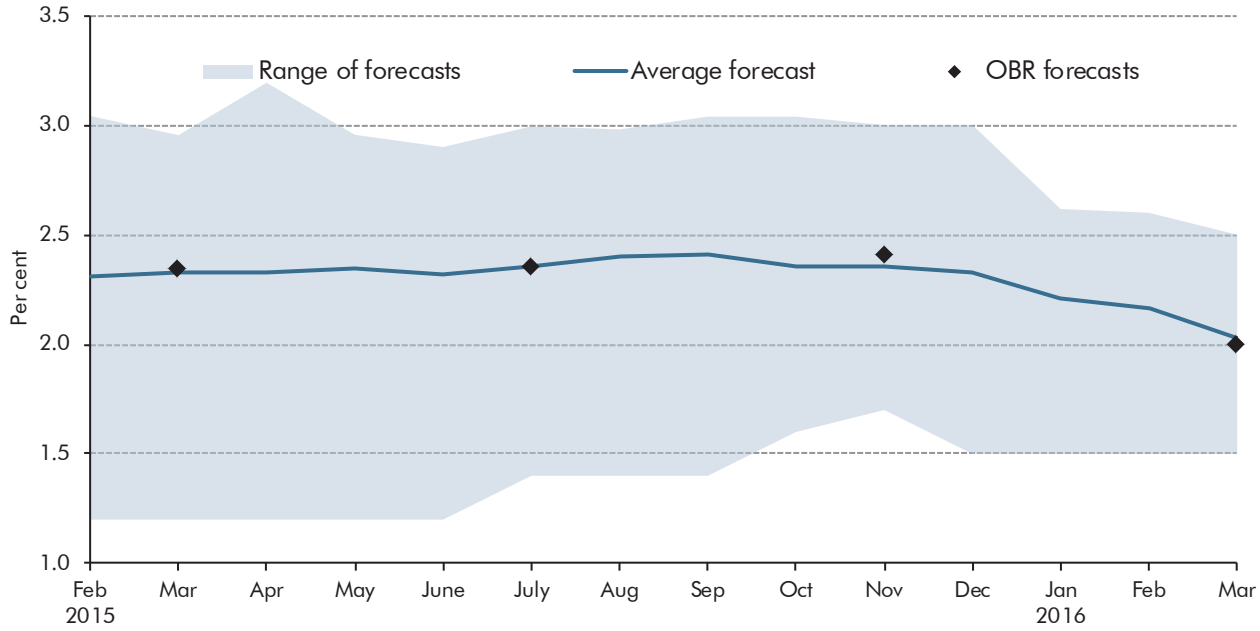
Developments in outside forecasts

2.19 Many private sector, academic and other outside organisations produce forecasts for the UK economy.[1] This section sets out some of the movements in these forecasts since our November *Economic and fiscal outlook (EFO)*. When interpreting the average of outside forecasts, it is important to bear in mind that different analysts forecast different variables and the average forecast is not constrained to paint an internally consistent picture.

Real GDP growth

2.20 Outside forecasts for GDP growth in 2016 were steady in the months preceding our November forecast (Chart 2.1). Since then, both our and outside forecasters' expectations have fallen: the average outside forecast for GDP growth in 2016 is now 2.0 per cent, down from 2.4 per cent in November and in line with our current forecast. The average forecast for GDP growth in 2017 has fallen by 0.2 percentage points since November to 2.1 per cent, 0.1 percentage points below our current forecast.

Chart 2.1: Forecasts for real GDP growth in 2016



Source: HM Treasury, OBR

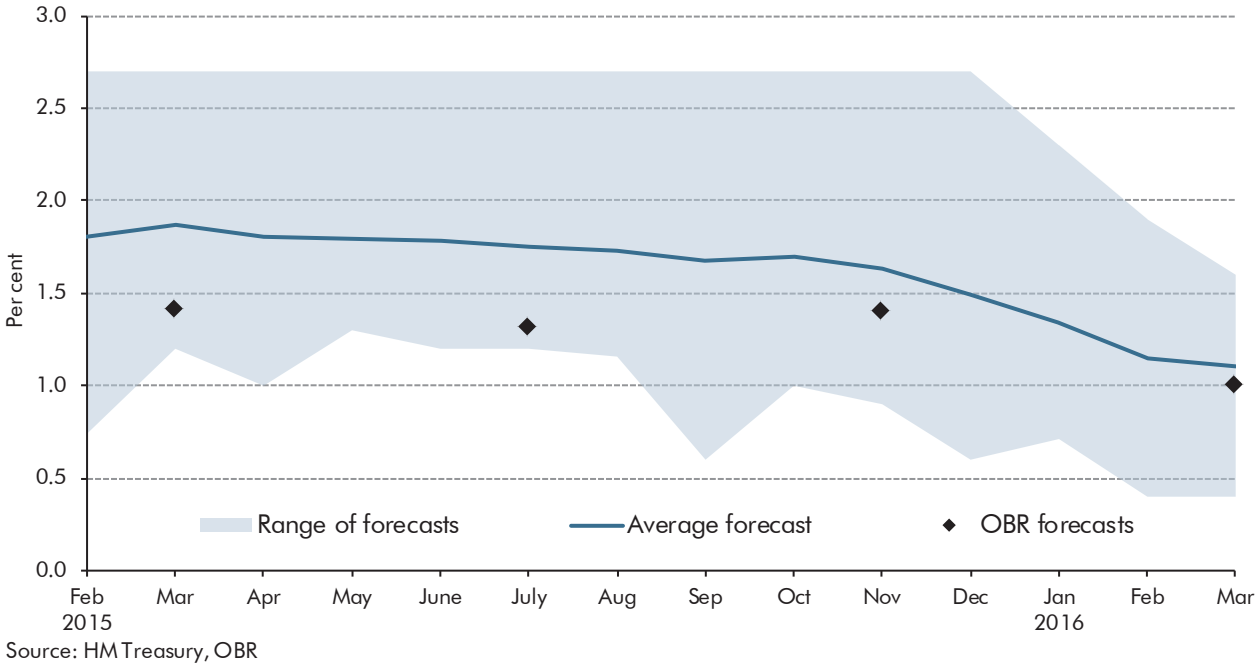
[1] See HM Treasury, February 2016 and March 2016, *Forecasts for the UK economy: a comparison of independent forecasts*. A full list of contributors is available at the back of the Treasury publication. A number of financial reporting services also monitor average or consensus figures.

2.21 Looking at the smaller sample of medium-term forecasts, the average forecasts for GDP in 2018 and 2019 have both risen by 0.1 percentage points since November. They now stand at 2.3 per cent, and 0.2 percentage points higher than our forecast, in both years.

Inflation

2.22 The average forecast for CPI inflation in the fourth quarter of 2016 has fallen in recent months, reflecting continued falls in commodity prices. The latest average is 1.1 per cent, fractionally above our 1.0 per cent forecast in this *EFO* (Chart 2.2). All forecasters expect inflation to remain below the Bank of England's 2 per cent target at the end of this year. The average forecast for CPI inflation in the fourth quarter of 2017 is 1.9 per cent, 0.2 percentage points higher than our forecast.

Chart 2.2: Forecasts for CPI inflation in 2016Q4

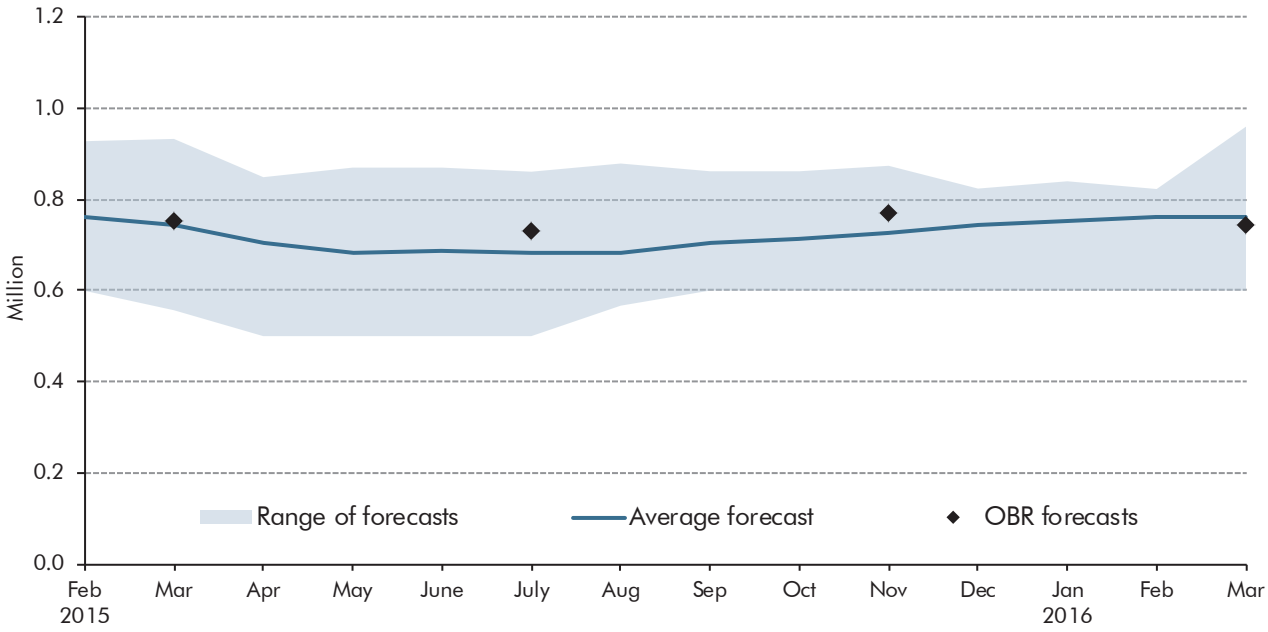


Source: HM Treasury, OBR

Labour market

2.23 The average forecast for claimant count unemployment in the final quarter of 2016 is slightly up from November. It now stands at 0.76 million, fractionally higher than our current forecast (Chart 2.3). The average forecast for employment growth in 2016 is 1.0 per cent, 0.2 percentage points below our current forecast. Average earnings growth in 2016 is now expected to be 2.7 per cent, down 0.7 percentage points since November.

Chart 2.3: Forecasts for the claimant count in 2016Q4



Source: HM Treasury, OBR

Public finances

2.24 The average forecasts for PSNB in 2016-17 and 2017-18 have both risen since our November forecast to £60 billion and £41 billion respectively. Medium-term forecasts now suggest PSNB will fall to £18 billion by 2018-19, down from the expectation in November. Some forecasters expect PSNB to be significantly higher in the medium term than we forecast. As well as reflecting differences in views about prospects for the economy, external forecasters may base their judgements on what they consider to be the most likely path of fiscal policy. We are required by Parliament to base our forecasts on the Government's current policies and not to consider alternatives.

3 Economic outlook

Introduction

3.1 This chapter:

- sets out our estimates of the amount of **spare capacity** in the economy and the likely growth in its productive potential (from paragraph 3.2);
- describes the key **conditioning assumptions** for the forecast, including monetary policy, fiscal policy and the world economy (from paragraph 3.25);
- sets out our short- and medium-term real GDP **growth forecasts** (from paragraph 3.49) and the associated outlook for inflation (from paragraph 3.56) and nominal GDP (from paragraph 3.70);
- discusses recent developments and prospects for the household, corporate, government and external **sectors of the economy** (from paragraph 3.73); and
- outlines **risks and uncertainties** (from paragraph 3.118) and compares our central forecast to those of selected external organisations (from paragraph 3.120).

Potential output and the output gap

3.2 Judgements about the amount of spare capacity in the economy (the 'output gap') and the growth rate of potential output provide the foundations of our forecast. Together they determine the scope for growth in GDP in the next five years as activity returns to a level consistent with maintaining stable inflation in the long term. GDP growth is an important driver of trends in the overall budget deficit and the path of public sector debt, the measures on which the Government's new fiscal targets are based.

3.3 Estimating the size of the output gap also allows us to judge how much of the budget deficit at any given time is cyclical and how much is structural.[1] In other words, how much will disappear automatically, as the recovery boosts revenues and reduces spending, and how much will be left when economic activity has returned to its full potential. This was particularly pertinent to the previous Government's fiscal target, which was based on a cyclically adjusted measure of borrowing.

3.4 In this section, we first assess how far from potential the economy is currently operating before considering the pace at which potential output will grow in the future. Our estimates

[1] The methodology we use to do so is described in Helgadottir et al (2012): *Working Paper No.3: Cyclically adjusting the public finances*.

of potential output and the output gap are based on estimates of national output excluding the small and volatile oil and gas sector. We then add on a forecast for oil and gas production to complete our GDP forecast.

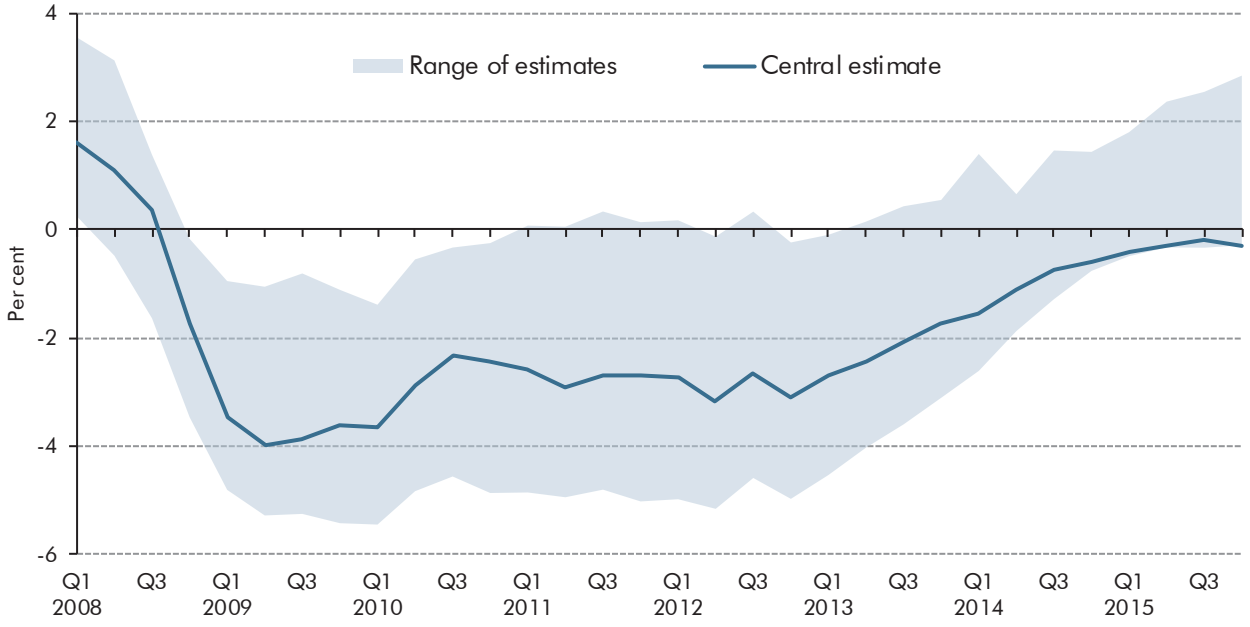
The latest estimates of the output gap

3.5 The first step in our forecast process is to assess how the current level of activity in the economy compares with the potential level consistent with stable inflation in the long term. We cannot measure the supply potential of the economy directly, but various techniques can be used to estimate it indirectly, including cyclical indicators, statistical filters and production functions. In practice, every method has its limitations and no approach avoids the application of judgement. We therefore consider a broad range of evidence when reaching a judgement on spare capacity and the level of potential output that implies.

3.6 Since our December 2014 forecast, we have used estimates of the output gap implied by nine different techniques to inform our judgement. These produce a range, as shown in Chart 3.1 along with our own latest central estimate.[2] Our central estimate is currently close to the bottom of the range, as it has been for the past year. We explain the rationale for this judgement in paragraph 3.13. All these model estimates showed spare capacity increasing during the course of the late 2000s recession, and their dispersion increased. The swathe remained relatively stable, but widely dispersed, until early 2013 when actual growth picked up. Most estimates subsequently tightened and the range narrowed. But it has widened again recently, with estimates varying from -0.3 to +2.8 per cent in the fourth quarter of 2015. Even this may understate the true degree of uncertainty, as such estimates are likely to change as new data become available and past data are revised.

[2] The individual output gap estimates are included in the supplementary economy tables available on our website. The approaches – and the uncertainties associated with them – are discussed in Murray (2014): *Working Paper No.5: Output gap measurement: judgement and uncertainty*.

Chart 3.1: Range of output gap model estimates



Source: OBR

3.7 The cyclical indicator approaches on which we initially placed greatest weight implied that the output gap began to narrow in 2012, even though growth remained relatively weak – although less weak according to recent data than was reported at the time:

- **'Aggregate composite' (AC)** estimates imply that spare capacity continued to be used up at pace, and that output moved above its sustainable level towards the end of 2013; and
- **'Principal components analysis' (PCA)** estimates also suggest a significant narrowing of the gap through 2013, but it then remained stable through 2014 before turning positive and rising through 2015.[3]

3.8 The two statistical filters we use that consider output data alone imply that the economy is currently operating close to its potential level, where both had implied a small positive output gap a year ago, as shown in Chart 3.2.

3.9 Chart 3.3 augments the output data with other information. In the latest quarter, these four measures tell an unusually consistent story of the economy operating close to, but just below, its potential level. Taking each in turn:

- **capacity utilisation** indicators suggest firms are operating at levels slightly below their potential level, having been operating above that level for the previous two years;

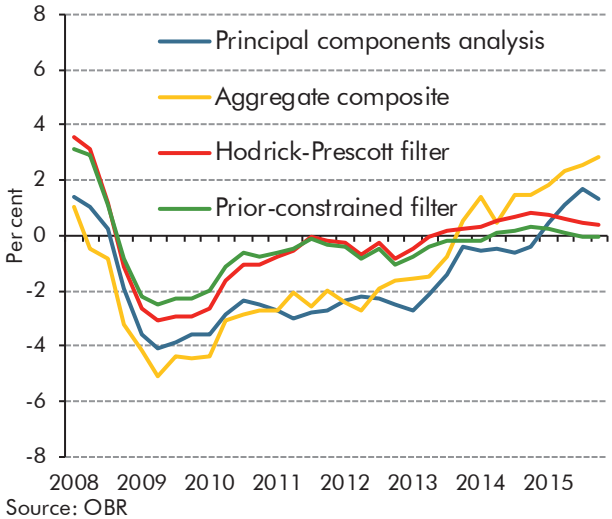
[3] More details on these methodologies are set out in our *Briefing Paper No.2: Estimating the output gap* and in Pybus (2011): *Working Paper No.1: Estimating the UK's historical output gap*.

- **CPI inflation** remains low, which in principle could suggest more slack in the economy. We do not consider that likely, since the weakness in recent months largely reflects lower food and petrol prices, and the lagged effects of past sterling appreciation. The inflation measure that underpins our filters is adjusted for the direct influence of food and oil costs, but in reality only partially so, as changes in these costs also have indirect effects on other prices. This may explain why this measure gives a slightly more negative measure of the output gap;

- the **unemployment** rate has fallen further in the fourth quarter of 2015. Complementing output data with a filter-based structural unemployment estimate (informed by changes in real wages and productivity) would suggest that the output gap has been closing since the end of 2012 and has been very close to zero in the second half of 2015. In recent forecasts, we have placed more weight on measures that capture labour market slack; and

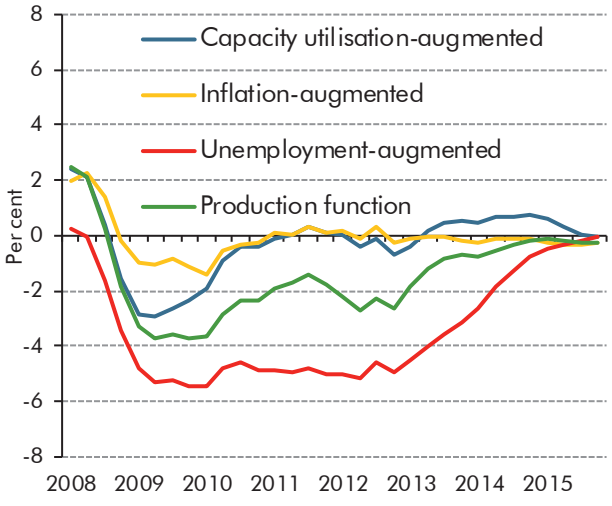
- a **production function** approach, which applies filters to the individual components of production, suggests that output was very close to potential at the end of 2014 but since then the economy has been operating slightly below its potential level. This model suggests the small amount of slack at the end of 2015 was concentrated within total factor productivity in particular.

Chart 3.2: Cyclical indicator and filter-based estimates of the output gap



Source: OBR

Chart 3.3: Multivariate filter-based estimates of the output gap



3.10 Output growth (on a non-oil basis) was slightly weaker than we expected in the fourth quarter, at 0.5 per cent compared to the previous quarter and 1.8 per cent compared to the same quarter a year earlier. By contrast, employment growth has remained strong (with the employment level up 0.7 per cent on the quarter and 1.5 per cent over the year). Unemployment and inactivity rates both fell further in the fourth quarter, and average hours worked increased. As a result, hourly productivity – output produced per hour worked in the economy – fell by 1.2 per cent in the fourth quarter, having risen by 0.7 and 0.5 per cent in the second and third quarters. Growth in hourly productivity was therefore close to zero in

the year to the fourth quarter, falling far short of the healthy 1.4 per cent rise assumed in our November forecast.

3.11 Whole-economy productivity growth is influenced by different productivity growth rates in individual sectors and the weight of those sectors in the economy. Table 3.1 shows: a breakdown of the hours worked in different industries; how productivity per hour in those industries related to the whole economy at the beginning of 2008; and how annual productivity growth since then compares with the pre-crisis period. Annual rates of productivity growth have been lower in most industries since 2008 than previously, with the most pronounced falls in financial services and the supply of gas and electricity – both industries with relatively high levels of productivity but a relatively low weight in total hours worked in the economy. Whole economy productivity growth has been affected more by the smaller falls seen in bigger sectors, including manufacturing. In total, productivity has risen at an average annual rate of just 0.1 per cent between 2008Q1 and 2015Q3. Of that 0.9 per cent cumulative rise, almost all is explained by 'within industry' effects, with very little explained by 'between industry' effects as the composition of the economy has changed.[4] The table updates analysis carried out by the Institute for Fiscal Studies (IFS) in its 2013 *Green budget*, with similar results.[5]

Table 3.1: Productivity growth by industry

	Per cent				
	Hours		Productivity (Output per hour)		
	Hours share in 2008Q1	Percentage change: 2008Q1 to 2015Q3	2008Q1 relative to whole economy	Annual change: 1994Q1 to 2008Q1	Annual change: 2008Q1 to 2015Q3
Whole economy excl. real estate	**100.0**	**4.1**	**100.0**	**1.9**	**0.1**
Government services	22.7	1.9	89.2	0.2	-0.2
Wholesale and retail trade; repair of motor vehicles and motor cycles	15.3	-0.2	81.6	1.6	1.6
Manufacturing	10.9	-1.0	112.2	3.1	0.4
Construction	8.6	-0.1	87.2	0.5	-0.4
Administrative and support service activities	7.6	0.9	61.3	1.3	2.5
Professional, scientific and technical activities	7.8	1.4	98.9	3.5	0.5
Transportation and storage	5.5	-0.3	99.1	2.8	0.3
Accommodation and food service activities	5.4	0.7	55.2	1.0	-0.8
Arts, entertainment, recreation and other services	4.8	0.3	97.5	0.5	0.3
Information and communication	4.5	0.5	138.3	4.3	1.3
Financial and insurance activities	4.2	-0.1	217.1	4.0	-1.0
Agriculture, forestry and fishing	1.6	0.0	51.2	3.6	0.7
Water supply, sewage etc.	0.5	0.1	253.5	1.7	-1.8
Electricity supply, gas supply etc.	0.4	0.1	412.1	5.0	-5.2
Mining and quarrying	0.3	0.0	1201.1	-2.4	-5.9

[4] The within-industry contribution (0.8 percentage points) is calculated using the 2008Q1 hours share and the change in productivity between the two periods, whereas the between-industry contribution (0.1 percentage points) is calculated using the change in hours share between the two periods and the 2008Q1 level of productivity.
[5] Institute for Fiscal Studies, *Green budget*, February 2013.

3.12 The latest evidence provides a mixed picture for the output gap. Strong employment growth and falling unemployment implies little remaining spare capacity in the labour market. By contrast, the sharp drop in hourly productivity in the final quarter of 2015 suggests some spare capacity opening up within firms, although it is hard to explain why firms would be hiring at such a rapid pace if that hiring was generating spare capacity.

3.13 Considering the balance of evidence, we have judged that the output gap was -0.3 per cent of potential output in the fourth quarter of last year, narrower than the -0.7 per cent we expected in November. This is towards the lower end of the broad range of estimates illustrated in Chart 3.1, but closer to those to which we attach more weight. We do not believe it would be central to assume the output gap is currently positive since – despite the working-age employment rate having risen to its highest level since at least 1971 – broader inflationary pressures remain subdued. We have attributed most of the -0.3 per cent gap to productivity lying below its potential and some to average hours lying below potential, with offsetting effects from the employment rate being above its assumed sustainable rate.

3.14 A smaller estimate of the output gap – coupled with weaker actual growth – implies that potential output has grown slightly more slowly over recent quarters than we thought in November. But actual output – and therefore also potential output – is subject to revision. If actual output growth is revised up, as has been the case on average over the recovery to date, then potential output would be correspondingly higher, and vice versa.

3.15 Charts 3.4 and 3.5 compare our central output gap estimates for 2015 and 2016 to those produced by other forecasters, as set out in the Treasury's March *Comparison of independent forecasts*. The average estimate is -0.5 per cent in 2015 and -0.3 per cent in 2016, slightly wider than our estimates of -0.3 and -0.2 per cent for those years.

Chart 3.4: Estimates of the output gap in 2015

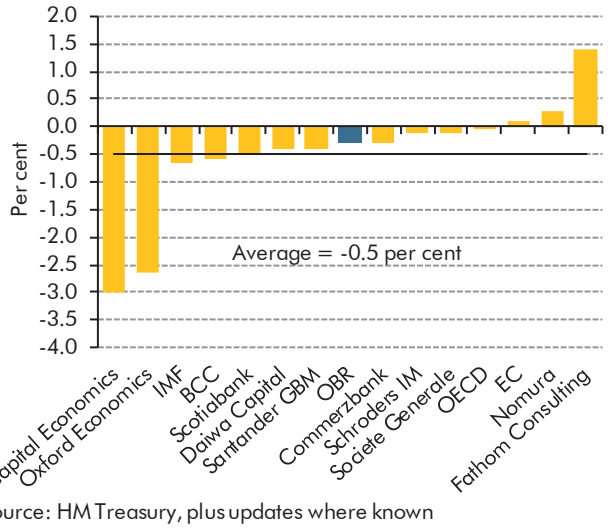
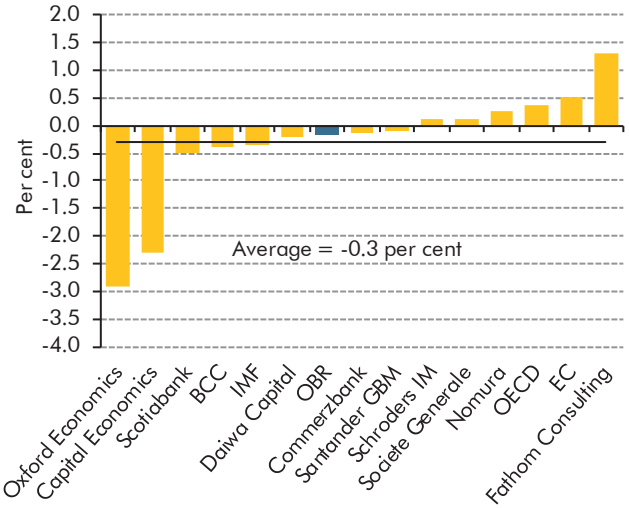


Chart 3.5: Estimates of the output gap in 2016

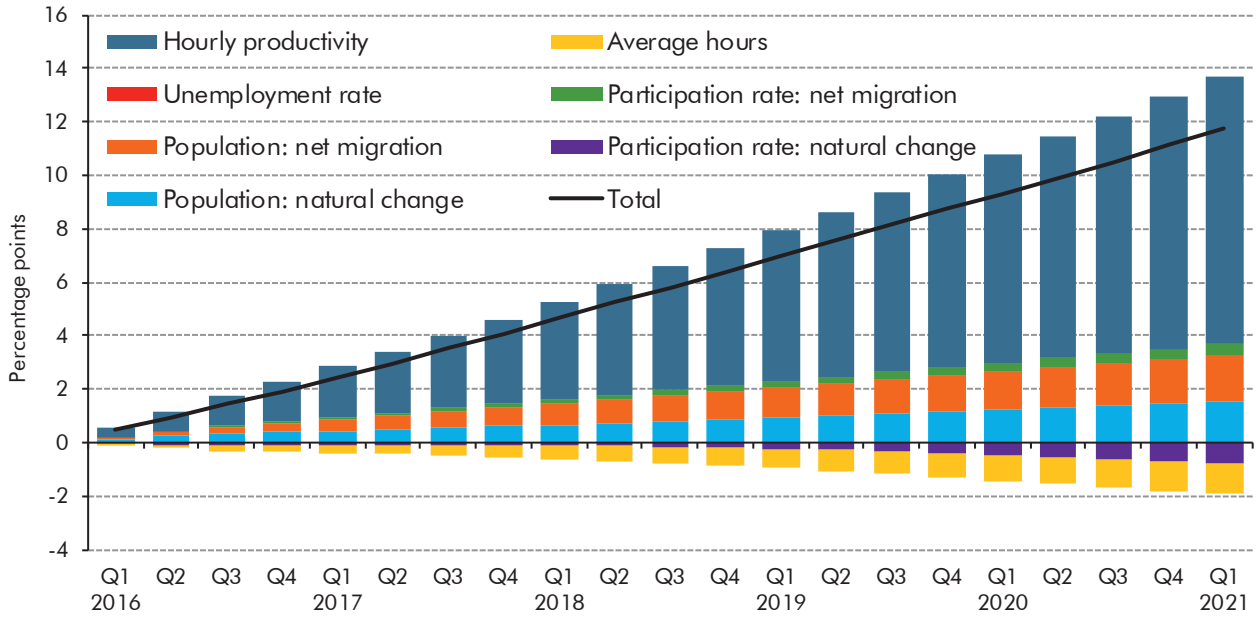


Source: HM Treasury, plus updates where known

The path of potential output

3.16 A small negative output gap implies that actual output can grow slightly faster than potential output over the coming quarters without generating inflationary pressure. But of far greater importance is the path of potential output itself. In November, we forecast a gradual strengthening of potential output growth over the forecast period and that remains our central judgement. But as Chart 3.6 shows, that outcome depends on the most important uncertainty in our (and most people's) economic forecast: the timing and strength of the long-awaited return to sustained productivity growth, where the latest evidence on actual productivity growth has again been disappointing, particularly in contrast to the buoyant productivity growth seen in the middle of last year. We also expect smaller positive contributions to potential output growth over the next five years from population growth, while average hours worked are expected to trend down over time.

Chart 3.6: Contributions to potential output growth from 2015Q4



Note: We implicitly assume that, conditioned on age and gender, migrants are as likely to be employed as the broader population.
Source: OBR

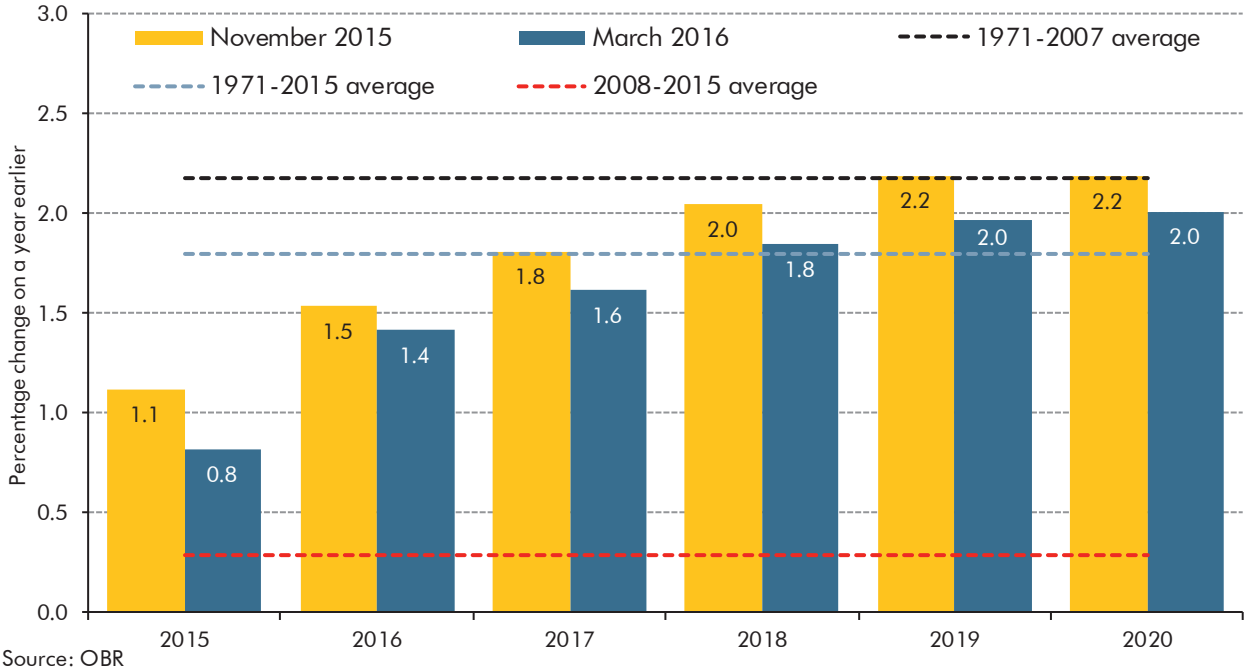
3.17 Following two quarters of productivity growth picking up, the previously familiar pattern of the labour market outperforming and productivity underperforming our forecast has strongly reasserted itself. With the mid-2015 pick-up in productivity growth having faltered, the most significant change to our forecast for potential output growth since November has been to revise down our assumption for trend hourly productivity growth – the rate at which output per hour worked could grow sustainably – over the coming five years by an average of 0.2 percentage points a year. Cumulated over five years, that represents a material downward revision to the level of potential output by 2020, but it is relatively small in the context of the downward revisions that we and most forecasters have felt it necessary to make during the post-crisis period. As Box 3.1 describes, the downward revisions we have made to our estimates of trend productivity growth in the UK over the last five years are very similar to those made by the Congressional Budget Office for the US over the same period.

3.18 Chart 3.7 presents our assumptions for trend hourly productivity growth from November and this forecast. In November, as in all our recent forecasts, we based our assumption on trend productivity growth rising from current rates back to the pre-crisis historical average of 2.2 per cent by the end of the forecast period. This judgement was consistent with assuming that whatever has been holding back productivity growth in the post-crisis period – particularly the slow healing of the financial system – will fade over the coming five years. As it has proved difficult to quantify the sources of recent weakness in trend productivity, it has been equally difficult to judge when and by how much productivity growth will pick up.

3.19 Given the latest disappointment in productivity growth, we now assume that trend productivity growth rises steadily to 2.0 per cent by 2020 rather than to 2.2 per cent. In doing so, we are no longer assuming that the pre-crisis historical norms will fully reassert themselves within the forecast horizon. That said, at 1.8 per cent a year on average from 2016 to 2020, this is still well above the 0.8 per cent a year average we estimate for trend productivity over the past three years in which the recovery has taken hold.

3.20 In reaching a view on the outlook for productivity growth over the medium and longer term, all forecasters – whatever methodology they use – in effect have to decide how much weight to place on the recent period of weak productivity performance and how much on the earlier period of stronger performance. As the period of weak performance lengthens, it seems sensible to put slightly more weight on that as a guide to the future, although this judgement is of course highly uncertain and has to be revisited in each forecast we make.

Chart 3.7: Trend productivity growth forecasts and historic averages for actual productivity growth

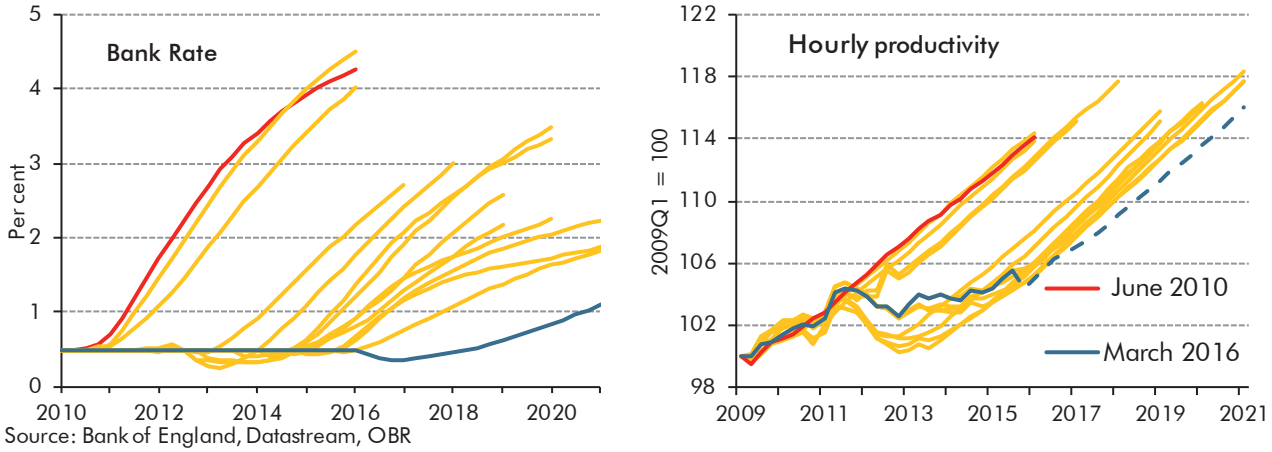


Source: OBR

3.21 Chart 3.8 illustrates how the successive downward revisions to our productivity growth forecasts have been mirrored by successive outward shifts in market expectations for Bank

Rate rises. While there will have been many factors influencing each of these trends, to some extent both will have been driven by repeated disappointment in actual productivity growth and the consequent downward revisions to growth expectations.

Chart 3.8: Successive market expectations for Bank Rate and OBR forecasts for hourly productivity growth



Source: Bank of England, Datastream, OBR

3.22 Turning to other components of potential output, we expect that the long-term decline in average hours will reassert itself as productivity recovers. We also assume that population growth will slow in line with the ONS's current principal population projections.

3.23 In November, we refined our methodology for modelling the trend participation rate to include the implications of an ageing population and state pension age increases from year to year using the cohort model that informs our long-term projections.[6] This change in methodology and updated outturn data implies that the participation is stable until 2019 before declining in the final year of the forecast as the proportion of older people with lower-than-average participation rates increases.

[6] Annex A of our July 2014 *Fiscal sustainability report* discusses our longer-term approach to labour market modelling in more detail.

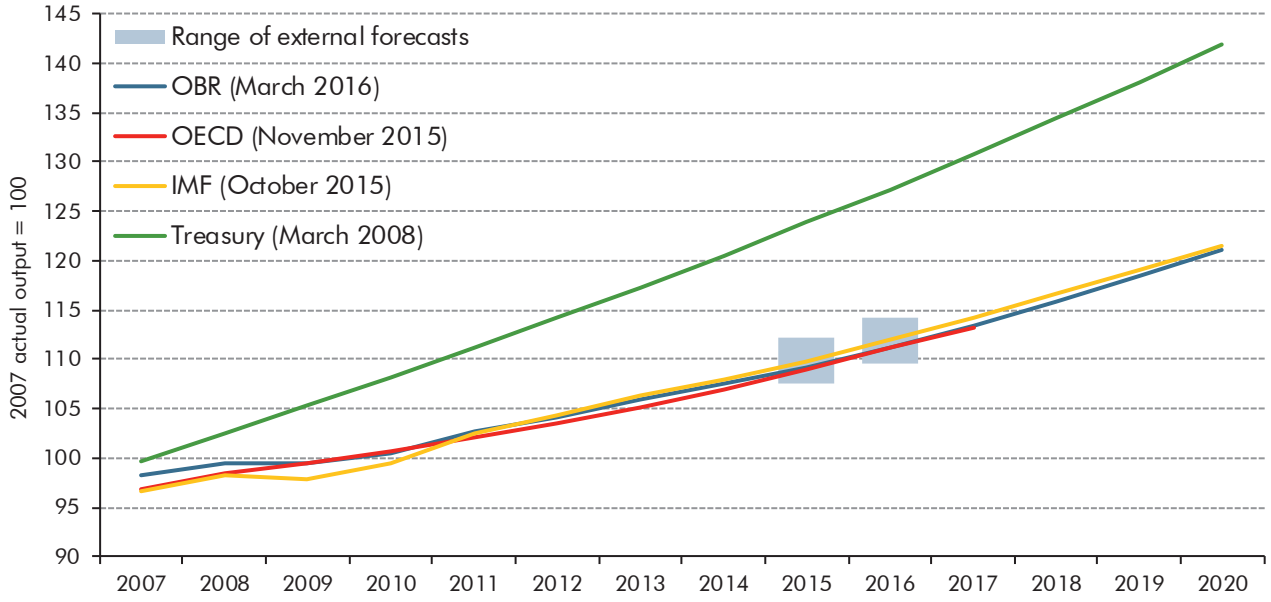
Table 3.2: Potential output growth forecast

	Percentage change on a year earlier, unless otherwise stated				
	Potential productivity[1]	Potential average hours	Potential employment rate[2]	Potential population[2]	**Potential output[3]**
2015	0.8	0.0	0.0	0.6	1.5
2016	1.4	-0.1	-0.1	0.7	1.9
2017	1.6	-0.2	0.0	0.6	2.0
2018	1.8	-0.2	0.0	0.6	2.2
2019	2.0	-0.2	-0.1	0.6	2.2
2020	2.0	-0.2	-0.2	0.6	2.2
Cumulative growth (per cent) from 2014 to 2020					
November forecast	11.4	-1.0	-0.1	3.7	14.2
March forecast	10.1	-1.0	-0.4	3.8	12.6
Change	**-1.3**	**0.0**	**-0.2**	**0.0**	**-1.6**
of which: 2015	-0.3	0.0	0.0	0.0	-0.3
of which: 2016 to 2020	-1.0	0.0	-0.2	0.0	-1.3

[1] Output per hour.
[2] Corresponding to those aged 16 and over.
[3] Components may not sum to total due to rounding.

3.24 Our latest forecast assumes that potential output in 2015 was around 11.9 per cent lower than an extrapolation of the Budget 2008 forecast and that it will be 14.6 per cent below that extrapolation by 2020. Even the most optimistic external assessments of potential output continue to lie well below the pre-crisis trend implied by Budget 2008.

Chart 3.9: Potential output forecasts



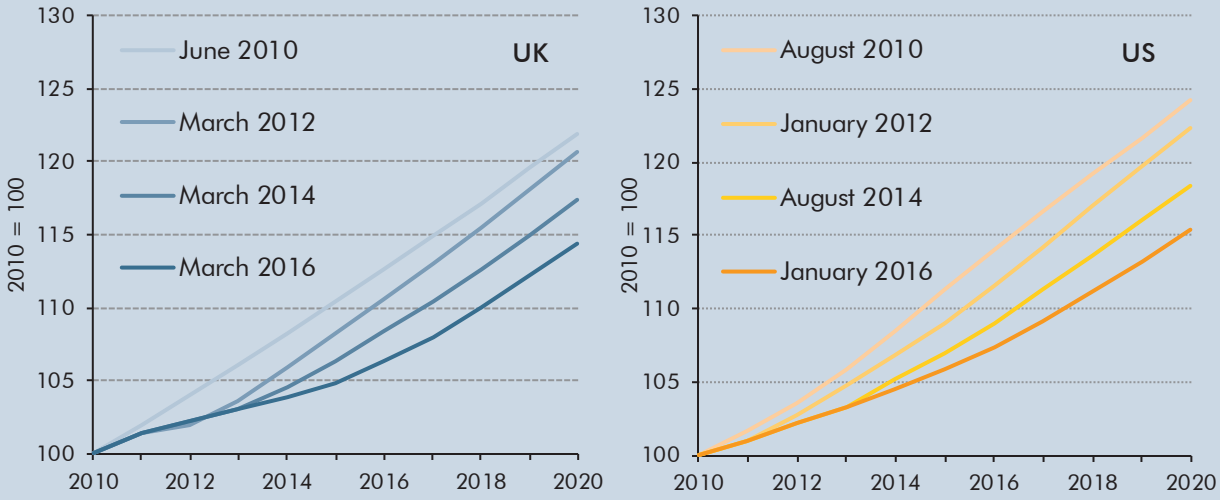
Note: IMF forecasts for potential output are inferred by combining GDP and output gap forecasts.
Source: HM Treasury, IMF, OECD, OBR

Box 3.1: Post-crisis revisions to potential output and productivity in the UK and US

Over the long run the vast majority of output growth is driven by productivity growth, and so the judgement we take on productivity is critical in assessing the likely path of output. That judgement is subject to considerable uncertainty. As discussed in paragraphs 3.17 to 3.19, we have revised down our forecast for trend or potential productivity – the amount of output that the economy could produce sustainably per hour worked – materially since November, just as we did in November 2011. But productivity has also disappointed in many other major advanced economies in recent years, leading other forecasters to revise down their expectations.

Chart A compares different vintages of our five-year forecasts for trend productivity in the UK (extrapolated for the earlier forecasts) to the Congressional Budget Office's (CBO) 10-year forecasts for the US. Since our first forecast in June 2010 – and taking into account the judgement we have made in this forecast – we have revised down our forecast for cumulative trend productivity growth between 2010 and 2020 by 7½ percentage points, from 22 to 14½ per cent. Much the same has happened in the US, where the CBO has reduced its forecast over the same period by 9 percentage points, from 24½ to 15½ per cent.

Chart A: Vintages of UK and US trend hourly productivity forecasts



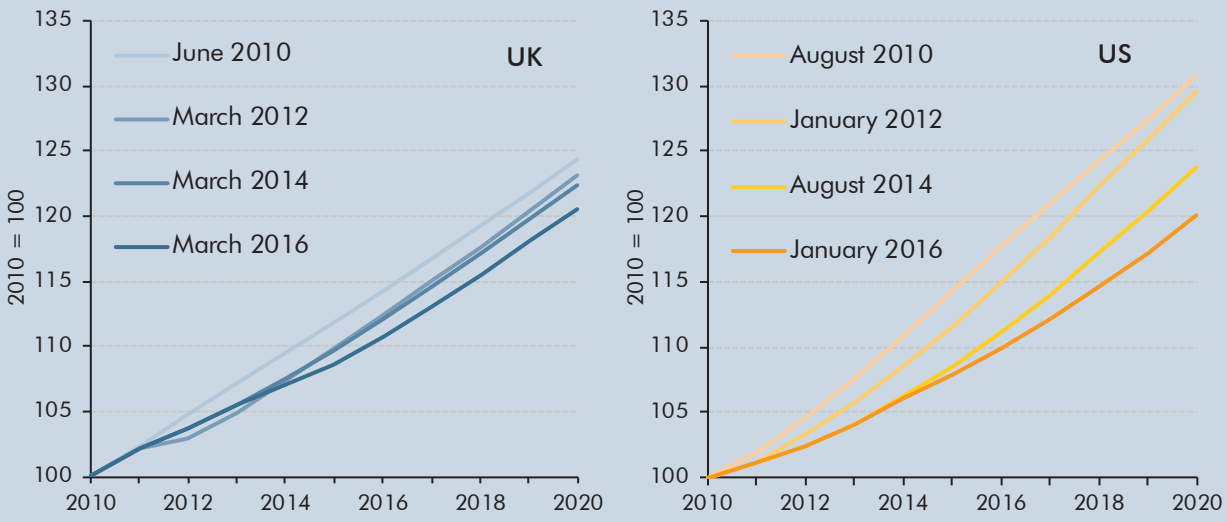
Source: OBR

Source: CBO, OBR calculations

Note: UK trend productivity is defined as potential non-oil GVA divided by potential hours worked, while US trend productivity is defined as potential non-farm business output divided by potential hours worked in the non-farm business sector.

As productivity is the key driver of output growth, these downward revisions feed through to lower forecasts for potential output growth. Recent vintages of these forecasts are shown in Chart B. Our potential output growth forecasts for the UK have been revised down by 4 percentage points, rather less than the revision to trend productivity. The CBO's potential output forecasts for the US have been revised down by 11 percentage points, slightly more than the revision to trend productivity. Looking at the output data in per capita terms (per adult, aged 16+) tells a similar story, with the UK and US having seen downward revisions over the period of 5 and 11 percentage points respectively.

Chart B: Vintages of UK and US potential output forecasts



Source: OBR

Source: CBO, OBR calculations

Note: UK trend output is defined as potential non-oil GVA, while US trend output is defined as potential non-farm business output.

Table A decomposes the changes in our and the CBO's potential output assumptions over the decade to 2020. It shows that the reason for potential output growth being revised down less than trend productivity in the UK but more than trend productivity in the US is largely due to developments in the labour market. In particular, we estimate the trend participation rate will have been flat across the decade, despite an ageing population. In the US, the CBO expects it to have fallen significantly. Population growth has boosted potential output by more than expected in both countries, with net migration being the main factor in the UK.

Table A: Contributions to potential output growth between 2010 and 2020

	Percentage growth between 2010 and 2020, unless otherwise stated					
	Potential productivity[1]	Potential average hours	Potential participation rate[2]	Structural unemployment rate[2,3]	Potential population[2]	Potential output growth[4]
OBR estimates for the UK						
June 2010	21.9	-2.0	-1.8	0.0	5.8	24.1
March 2016	14.4	-1.0	0.0	-0.2	6.7	20.6
Change	**-7.5**	**0.9**	**1.8**	**-0.2**	**0.9**	**-3.5**
OBR calculations based on CBO estimates for the US						
August 2010	24.3	-0.8	-3.0	0.0	9.5	30.8
January 2016	15.4	-0.6	-5.6	0.3	10.6	20.0
Change	**-8.9**	**0.2**	**-2.6**	**0.3**	**1.1**	**-10.8**

[1] Output per hour.

[2] Corresponding to those aged 16 and over.

[3] Percentage point growth between 2010 and 2020.

[4] Changes may not sum due to rounding and interaction effects.

Note: UK and US trend output is defined as in Chart B. Non-farm business employment forecasts are not available for the US, and so we have assumed that non-farm business employment grows at the same rate as whole economy employment.

Key economy forecast assumptions

3.25 Our economic forecasts are conditioned on a number of assumptions. Among them, we assume that domestic and international interest rates, the exchange rate, equity prices and oil prices move in line with market expectations, taking the 10-day average to 25 February 2016. We also base our forecasts on the Government's current stated policies for taxes, public spending and financial transactions, as Parliament requires of us. This is in contrast to some external forecasts, in which the forecasters may assume that these policies will change. The risks to our forecasts are discussed later in the chapter.

Monetary policy and credit conditions

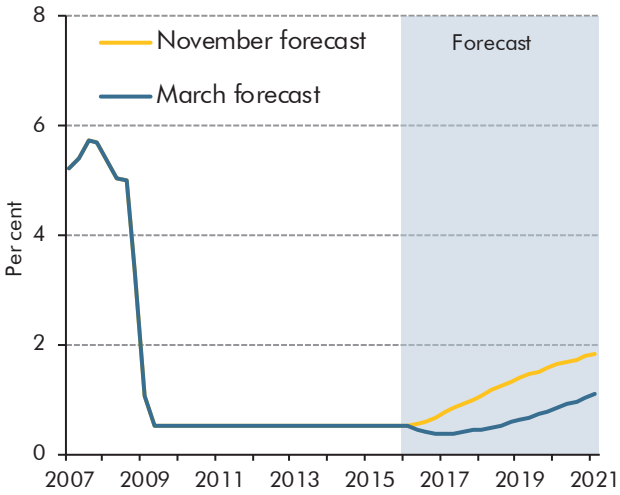
3.26 Our forecast assumes that the Bank of England will try to bring inflation back to target over its forecast horizon, consistent with the remit the Chancellor has set the Monetary Policy Committee (MPC). In its February 2016 *Inflation Report*, the MPC forecast – on the basis of market interest rate expectations at the time – that CPI inflation would reach 2.05 per cent by the beginning of 2018 and 2.25 per cent by early 2019. In its latest *Monetary Policy Summary* the Bank of England has said that "*the MPC judges it more likely than not that Bank Rate will need to increase over the forecast period to ensure inflation remains likely to return to the target in a sustainable fashion*".

3.27 Market expectations of Bank Rate have fallen significantly since November. They are below the current rate of 0.5 per cent for the next two years, do not reach 0.75 per cent until 2019 (a full decade after Bank Rate was initially cut to 0.5 per cent) and only reach 1.1 per cent by the end of our 5-year forecast period. As we have used market expectations throughout the forecast period, our forecast is consistent with Bank Rate being reduced below 0.5 per cent for some of the next two years. We consider that to be consistent with the Bank of England's published guidance on the possibility of Bank Rate cuts if the Monetary Policy Committee considered that necessary in setting policy to meet its inflation target.[7] (Chart 3.8 above shows a number of previous occasions when Bank Rate expectations fell materially below 0.5 per cent for a period, but all preceded the guidance on which we have based our latest assumption.)

3.28 Gilt rate expectations have also fallen and global bond yields are lower (Chart 3.11). These developments are all consistent with market participants downgrading their expectations of future growth prospects.

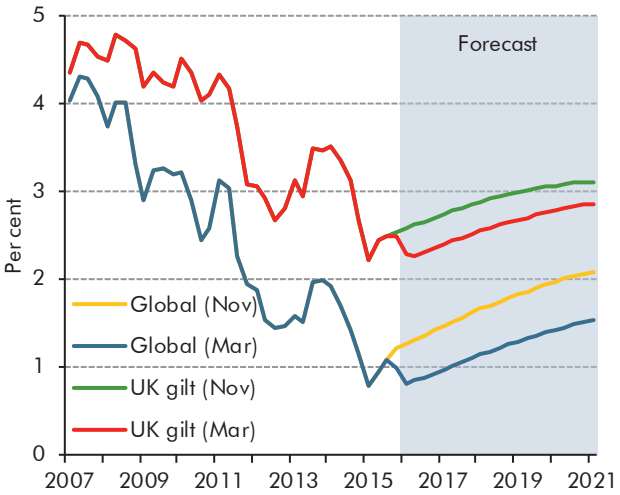
[7] For example, the February 2015 *Inflation Report* stated that *"…there are risks to the inflation outlook in both directions. Were downside risks to materialise, market expectations of the future path of interest rates could adjust to reflect an even more gradual and limited path for Bank Rate increases than is currently priced. The Committee could also decide to expand the Asset Purchase Facility or to cut Bank Rate further towards zero from its current level of 0.5%. The scope for prospective downward adjustments in Bank Rate reflects, in part, the fact that the United Kingdom's banking sector is operating with substantially more capital now than it did in the immediate aftermath of the crisis. Reductions in Bank Rate are therefore less likely to have undesirable effects on the supply of credit to the UK economy than previously judged by the MPC. Were upside risks to materialise, it would be appropriate for Bank Rate to increase more quickly than embodied in current market yields but the likelihood is that those increases would still be more gradual and limited than in previous tightening cycles. The MPC stands ready to take whatever action is needed, as events unfold, to ensure inflation remains likely to return to target in a timely fashion."*

Chart 3.10: Bank Rate



Source: Bank of England, Datastream, OBR

Chart 3.11: Global bond yields



Note: 20-year gilts for UK, trade weighted bond rates for global.

Macroprudential policy

3.29 Since 2013, the Bank of England's Financial Policy Committee (FPC) has held responsibility for "*the identification of, monitoring of, and taking of action to remove or reduce systemic risks with a view to protecting and enhancing the resilience of the UK financial system*". In its latest *Financial Stability Report*, the FPC judged that the risks to financial stability had increased since July, but did not believe the risk level to be 'elevated'.

3.30 Buy-to-let lending has been driving the growth in the UK mortgage market, having risen more strongly than owner-occupier lending since 2008. The FPC has said it will remain vigilant to competition pressures leading to a fall in underwriting standards in the buy-to-let market and has recommended that it be granted powers of direction over loan-to-value and interest coverage ratio limits. The consultation period on these tools closed on 11 March 2016. The Government has recently announced some policies that are likely to affect the buy-to-let market. For example, in November's Autumn Statement, it announced a 3 per cent stamp duty land tax surcharge on purchases of second properties worth over £40,000, which we assume will reduce the incentive to purchase second homes, including buy-to-let.

3.31 The FPC has previously implemented recommendations including that mortgage lenders should not extend more than 15 per cent of new owner-occupier mortgages at loan-to-income multiples at or greater than 4.5, and that lenders should apply an interest rate stress test of 3 percentage points above the rate at origination. The FPC has also introduced a framework that assigns a minimum leverage ratio of 3 per cent for UK financial institutions, supplemented by an additional component that is set in relation to the economic and financial climate at the time and a further buffer for firms that are considered to be of systemic importance. At its most recent meetings, the FPC made no new recommendations with regard to macroprudential policy.

Credit conditions

3.32 Having narrowed steadily up to the end of 2014, bank funding spreads widened over the course of 2015, although they remain much narrower than between 2010 and 2013. Despite this, average mortgage rates fell steadily through the course of 2015, largely reflecting falls in average fixed rates as maturing contracts moved on to lower rates. We expect the effective mortgage rate to continue falling in the near term as maturing contracts are re-set. Mortgage rates are expected to begin rising from the end of 2017, as the gradual increase in Bank Rate offsets a narrowing in margins. Our assumptions about the evolution of margins and funding spreads are little changed from November, so a lower expected path for Bank Rate means that effective mortgage rates are also expected to be lower than we assumed in November.

3.33 Net mortgage lending to households picked up steadily through 2015 and we expect mortgage debt to continue to rise over the forecast period as house prices grow more quickly than incomes and the share of cash transactions falls back towards its historical level. Unsecured lending grew strongly in 2013 and 2014 – supported by lending for car purchases – and recent Bank of England data suggest that consumer credit continued to grow strongly through 2015 and at the start of 2016, with unsecured net lending to individuals increasing by 9.1 per cent in the year to January. We expect the ratio of unsecured debt to income to continue to rise steadily over the forecast period as consumption growth outpaces the growth of household disposable income. Further discussion of our household debt forecast can be found in paragraphs 3.88 to 3.90.

3.34 Bank lending to both large businesses and small and medium-sized enterprises (SMEs) has generally contracted, on an annual basis, over the past few years. The effect of restricted credit availability has been more severe for SMEs, as they are unable to raise funding though non-bank sources, such as the issuance of bonds or equity. While net lending to large businesses continued to contract on an annual basis in 2015, there was some evidence of an easing in credit conditions for SMEs towards the end of the year, with annual net lending growth turning positive from September.

Fiscal policy and Budget measures

3.35 The uneven path of Budget giveaways and takeaways over the next five years has meant that the overall pace of fiscal tightening – which in November was relatively smooth and diminishing over time – is set to pick up slightly over the next three years, then dramatically in 2019-20 before slowing abruptly in 2020-21. The fiscal multiplier framework that we use to estimate the overall effect of changes in fiscal policy on the economy was explained in Box 3.2 of our July *EFO*. In Box 3.2 below, we describe how our current forecast has been affected by the fiscal and other policy changes announced in this Budget that we consider sufficiently material to warrant an explicit adjustment to our economy forecast.

3.36 The Government has announced that a referendum will be held on 23 June to determine whether the UK should remain a member of the European Union (EU) – and the Government is arguing that it should. Parliament has told us to prepare our forecasts on the

basis of the current policy of the current Government and not to consider alternatives, so our central forecast is conditioned on that assumption. Box 3.4 discusses external views of some of the risks and uncertainties associated with the referendum and possible outcomes.

Box 3.2: The economic effects of policy measures

This box considers the possible effects on the economy of the policy measures announced in this Budget. More details of each measure are set out in the Treasury's documents. Our assessment of their fiscal implications can be found in Chapter 4 and Annex A.

The Government has loosened **fiscal policy** in the short term, reflecting net tax reductions and increases in Departmental Expenditure Limits (DELs), both current and capital. The Government has then increased the pace of fiscal tightening significantly in 2019-20, accounted for by net tax increases and lower spending on welfare, public services and capital investment. To reflect these changes in our economy forecast we have applied the same 'multipliers' we have used in previous forecasts. These are larger the shorter the period between a policy being announced and implemented. They imply a 0.1 percentage point boost to real GDP growth in 2017-18 and 0.1 percentage point reductions in both 2018-19 and 2019-20. These effects are sufficient to push the economy slightly above its potential level in 2017 and 2018 and slightly below in 2019, with the output gap closing by the end of 2020. The Government adjusted its plans for capital investment in 2020-21 after we closed our economic forecast. At this horizon we would assume that the multiplier has tapered to zero, so incorporating this adjustment would have no effect on our forecast for real GDP, although it would have had a small effect on the composition of expenditure.

The Budget includes two measures that are expected to affect the cost of capital faced by firms and therefore **business investment** – a reduction in the corporation tax rate to 17 per cent in 2020-21 and restrictions on corporate interest deductibility. We also adjusted our forecast to reflect one additional measure, but the Government informed us that it would not be going ahead after our final economy forecast had been closed. As a result, our business investment forecast is around 0.5 per cent higher in 2020-21 than would be consistent with the final policy package announced in the Budget. The net effect of the other two measures was small.

The Government has announced that **termination payments** over £30,000 will be subject to employer National Insurance Contributions. In the near term we expect the additional cost to employers to be reflected in lower wages and profit margins, with the majority of the cost passed through to wages by the end of the forecast period. This implies a reduction in total wages and salaries of 0.1 per cent by 2020-21.

The Budget includes a number of policies that are likely to affect **housing associations'** finances. They include changes to 'pay to stay' (which is to be made voluntary rather than mandatory for housing associations, while rents above income thresholds are to be subject to a taper rather than a cliff edge); a one-year deferral of the capping of social sector rents in line with local housing allowance eligible rents; and a one-year deferral of the 1 per cent reduction in social rents for supported housing. We expect these measures to affect housing associations' future housebuilding decisions, reducing total residential investment by 0.7 per cent by 2020-21.

The Government has announced the introduction of a **'lifetime ISA'** for the under-40s. Contributions into the lifetime ISA will be made out of taxed income, then matched and not subject to tax when accessed, with an annual contribution limit of £4,000. Holders of lifetime ISAs will be allowed to make 100 per cent withdrawals for first-time house purchases up to £450,000. We think this is more likely than not to lead to higher demand for the relatively fixed supply of housing in the UK, and so to higher prices. We have therefore added 0.3 per cent to the level of house prices by the end of the forecast, although the effect of this policy is highly uncertain.

The Government has announced a number of policies that we expect to have an impact on **inflation**. The implementation of a soft drinks industry levy has the largest effect, and is expected to add around a quarter of a percentage point to CPI growth in 2018-19. We have also made small adjustments for several other policies announced in this Budget. The effects of these measures are small and broadly offsetting, and taken together imply almost no change to our CPI forecast. Measures which are expected to slightly increase CPI inflation across the forecast period include increases in tobacco duty and insurance premium tax, and measures to combat VAT fraud. Other policies are expected to reduce CPI inflation slightly, including the freezes to fuel and most alcohol duties. The replacement of the carbon reduction commitment with a higher climate change levy is also expected to lower inflation: while the net effect of these energy policies is to increase costs for medium sized companies, they reduce costs for large companies that make up a higher proportion of turnover. We expect this fall in costs to be passed through to consumers.

World economy

3.37 Global financial markets have been volatile over the past few months, with stock markets and commodity prices falling sharply and market expectations of future monetary tightening pushed back considerably. Market indicators of volatility also increased at the start of 2016. Real economy indicators have not been as weak as financial markets, but there have been downward revisions since our November forecast.

3.38 World GDP is estimated to have increased by 3.1 per cent in 2015, in line with our November forecast. We now expect world GDP to grow by 3.3 per cent in 2016, down from 3.5 per cent expected in November. We have also revised down our forecast for world GDP growth in 2017 and 2018. Thereafter, it is unchanged from November.

3.39 In the fourth quarter of 2015, euro area GDP was up 1.6 per cent on a year earlier, the same rate as the previous two quarters. It was up 1.3 per cent in Germany, 1.4 per cent in France and 1.0 per cent in Italy, while Spain saw much stronger growth of 3.5 per cent. Euro area GDP is estimated to have increased by 1.6 per cent in 2015 as a whole, slightly higher than our November forecast. The latest data were released after we had closed our forecast for the global economy. From 2016 onwards, our forecast for GDP growth in the euro area is little changed since November.

3.40 Deflation in the euro area remains a risk to the global and UK outlook. Euro area inflation fell to -0.2 per cent in February, having been just above zero since September. Core inflation was also lower in February, falling to 0.7 per cent. Unemployment fell to 10.3 per cent in January, continuing a path of steady decline from a high level. The European Central Bank announced a loosening of monetary policy after we closed the forecast, in order to support the euro area economy in a manner that it deems consistent with its inflation target. This included interest rate cuts, taking the interest rate on the deposit facility to -0.4 per cent, as well as an expansion to its quantitative easing programme, increasing the quantity and types of bonds that can be bought.

3.41 US GDP is estimated to have increased by 2.4 per cent in 2015 as a whole, the same rate as estimated for 2014. US GDP grew by 1.0 per cent in the second quarter of 2015, then by 0.5 per cent in the third quarter and 0.3 per cent in the final quarter. The slowing GDP growth in the final quarter was a result of lower contributions from private consumption and government spending. Private investment, private inventories and net trade also acted as a drag on GDP growth in the final quarter. Unusually adverse weather conditions at the start of 2016 may also reduce GDP growth in the first quarter of 2016, as in 2015.

3.42 China's GDP is estimated to have grown by 6.9 per cent in 2015 as a whole, down from 7.3 per cent in 2014. Real economy indicators and external forecasts suggest that real GDP growth will slow further in 2016 and 2017. In its January 2016 *WEO Update*, the IMF identified a "*sharper-than-expected slowdown along China's needed transition to more balanced growth*" as a potential downside risk to global growth.

World trade and UK export market growth

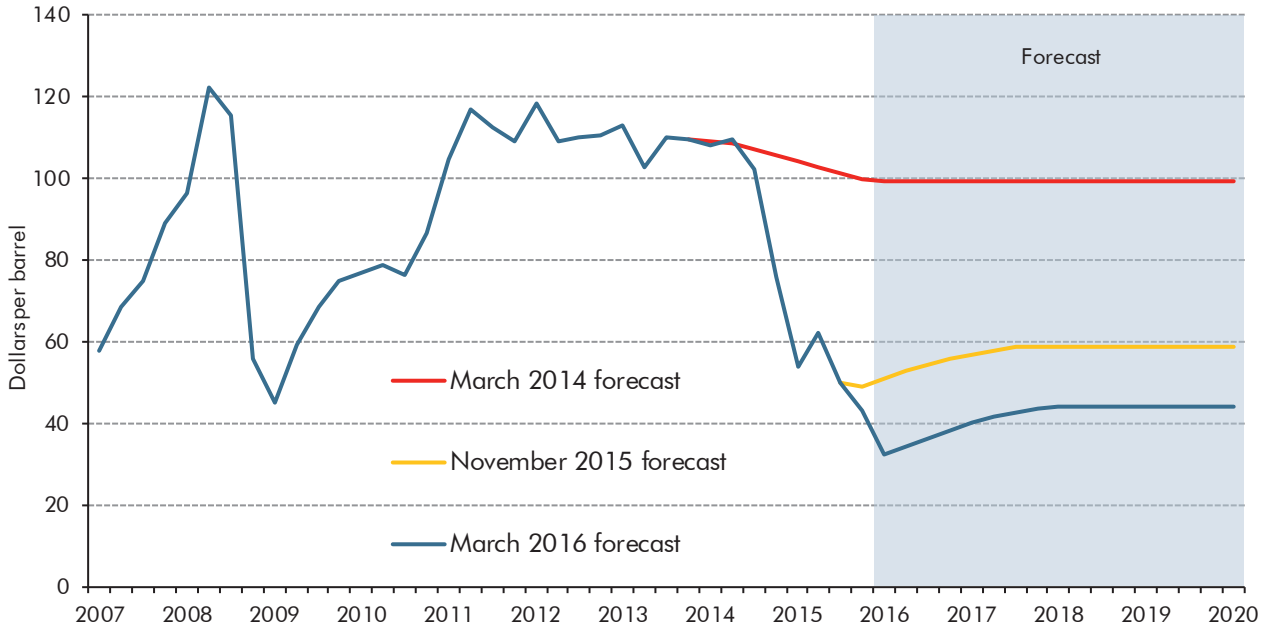
3.43 The latest global trade data have been weaker than we expected in November. We now estimate that world trade in goods and services grew by 2.4 per cent in 2015, lower than we forecast in November. In our November *EFO*, we forecast that trade growth would be lower over the forecast period than the latest IMF forecast available at the time. That was based on a judgement that the trade intensity of world GDP growth (i.e. the ratio of world trade growth to world GDP growth) would increase at a slower rate than was implied by the IMF forecast. We have not altered that judgement, which means that lower expected world GDP growth between 2016 and 2018 has led to a downward revision to world trade growth in those years. Since November, the IMF has revised down its forecast for world trade growth in 2016 and 2017. These changes were driven by downward revisions to trade in emerging markets, with a smaller downward revision to trade in advanced economies.

3.44 UK export markets are estimated to have grown by 4.1 per cent in 2015, in line with our November forecast. We have revised down UK export markets growth between 2016 and 2018, reflecting the downward revision to world trade. The downward revision to world trade growth in our forecast – informed by the IMF's revisions – is concentrated in emerging markets, which have a lower weight in UK export markets. That means that while UK export markets growth has been revised down since November, the cumulative change is smaller than the downward revision to world trade. We expect UK export markets to grow by 4.5 per cent a year in 2019 and 2020, unchanged from November.

Oil prices

3.45 One of the biggest changes to the market-derived assumptions we use in our forecasts since November relates to oil prices. In the 10 days to 25 February, oil prices averaged $33.7 per barrel, 29 per cent lower than in our November forecast (Chart 3.12). The fall since we closed our March 2014 forecast has been 69 per cent. By the beginning of 2020, the differences are slightly smaller at 25 per cent lower than the November assumption and 56 per cent lower than the March 2014 assumption. This reflects the change from a downward sloping futures curve in March 2014 to moderately upward sloping curves in November and now. We use the first two years of the curve in our forecast, holding prices flat thereafter.

Chart 3.12: Oil price assumption

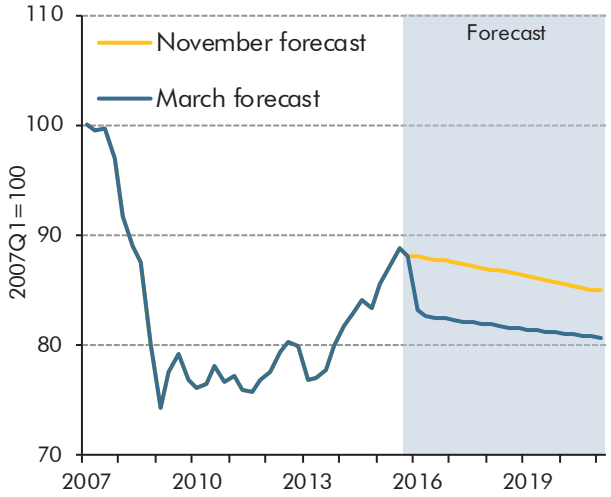


Source: Datastream, IMF, OBR

Other conditioning assumptions

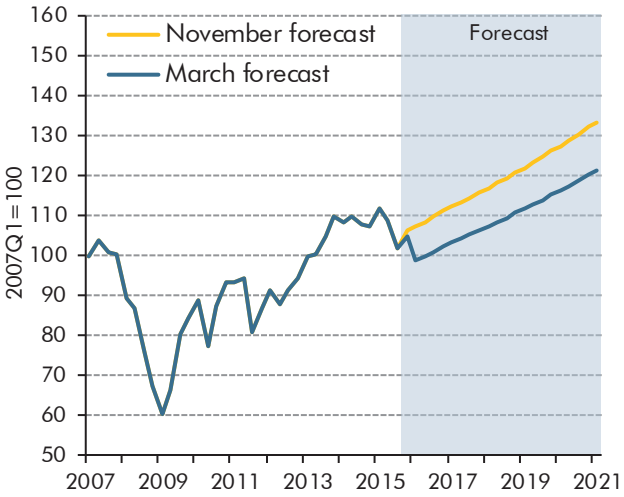
3.46 We also use market-derived conditioning assumptions for our exchange rate and equity price forecasts. We assume that the exchange rate follows the path implied by the uncovered interest parity condition: so that the exchange rate will move to reflect the differential between UK and overseas interest rates so as to equalise the expected return to investing at home and abroad. In the first quarter of 2016 we expect the sterling effective exchange rate to be 5.5 per cent lower than our November assumption. That reflects the recent depreciation of sterling against both the US dollar and the euro. The exchange rate is expected to depreciate over the forecast period as the forward UK interest rate curve is above the average of the UK's major trading partners (Chart 3.13). We assume equity prices rise in line with nominal GDP from their current level. The FTSE all-share index has fallen almost 8 per cent since November (Chart 3.14).

Chart 3.13: Sterling effective exchange rate assumption



Source: Bank of England, Bloomberg, Datastream, OBR

Chart 3.14: Equity prices assumption



Summary

3.47 To summarise, the key assumptions underpinning our central forecast are that:

- **monetary policy** remains very loose – even more so than assumed in November. It does not begin to tighten until the final quarter of 2019;
- **fiscal consolidation** continues to depress the level of GDP. The effects of the Government's decisions in this Budget are uneven across the forecast period. The pace of fiscal tightening has eased next year, but it is now set to intensify in 2019-20 as the Government tightens policy significantly to meet its surplus target;
- the **UK remains a member of the European Union**, in line with current Government policy;
- **credit conditions and the financial system** continue to normalise gradually; and
- **global activity and demand for UK exports** pick up steadily over the forecast period, albeit slightly more slowly than expected in November.

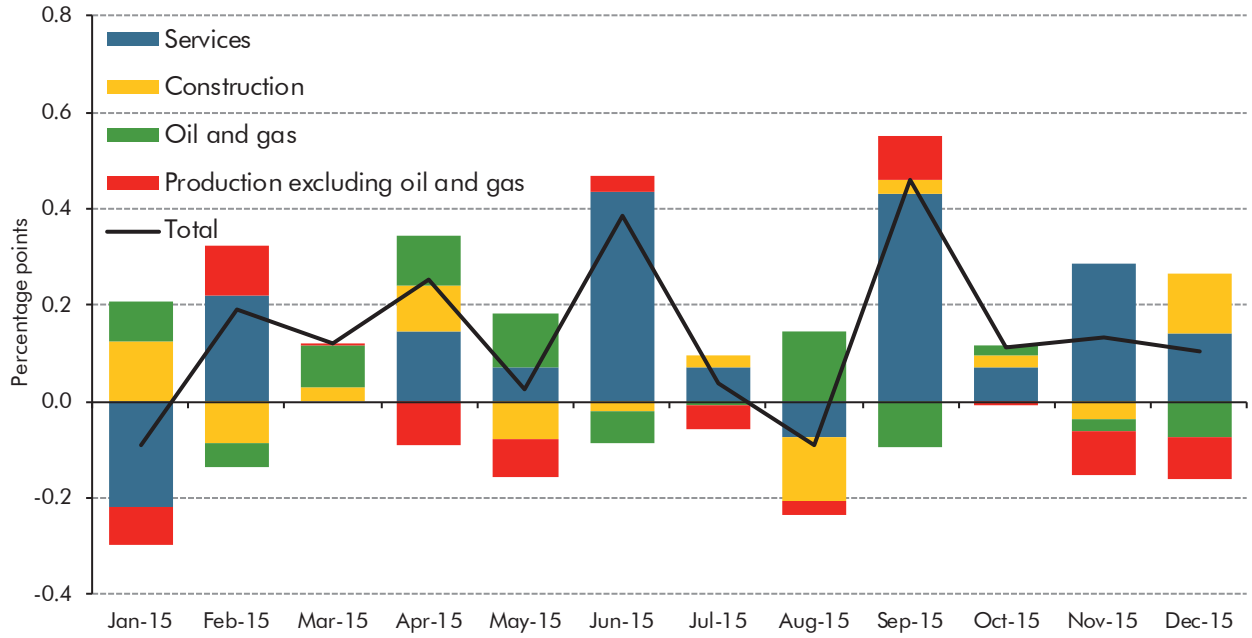
3.48 Risks and uncertainties associated with these assumptions and other facets of the forecast are discussed later in the chapter.

Prospects for real GDP growth

The short-term outlook for GDP

3.49 On a monthly basis, Chart 3.15 shows that the services sector made positive contributions to GDP growth in nine months during 2015, although these contributions were lower on average than in 2014 and also slightly more volatile. Manufacturing growth declined in each of the last three months of 2015 and fell over 2015 as a whole. Contributions from the North Sea and construction sectors have continued to be volatile.

Chart 3.15: Contributions to monthly output growth



Source: ONS

3.50 The economy grew by 0.5 per cent in the final quarter of 2015, in line with our November forecast. But quarterly GDP growth rates earlier in the year have been revised down since November, and they have been lower on average than in 2014. That has happened despite the fall in the oil price since the second half of 2014, which was expected to support real incomes and consumption. But that boost will have been partly offset by the in-year public spending cuts announced in June.

Table 3.3: The quarterly GDP profile

	Percentage change on previous quarter											
	2014				2015				2016			
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4
March forecast[1]	0.6	0.8	0.7	0.7	0.4	0.6	0.4	0.5	0.5	0.5	0.5	0.5
November forecast[2]	0.6	0.9	0.6	0.8	0.4	0.7	0.5	0.5	0.5	0.7	0.7	0.6
Change[3]	**0.0**	**-0.1**	**0.0**	**-0.1**	**0.1**	**-0.1**	**-0.1**	**0.0**	**-0.1**	**-0.2**	**-0.2**	**-0.1**

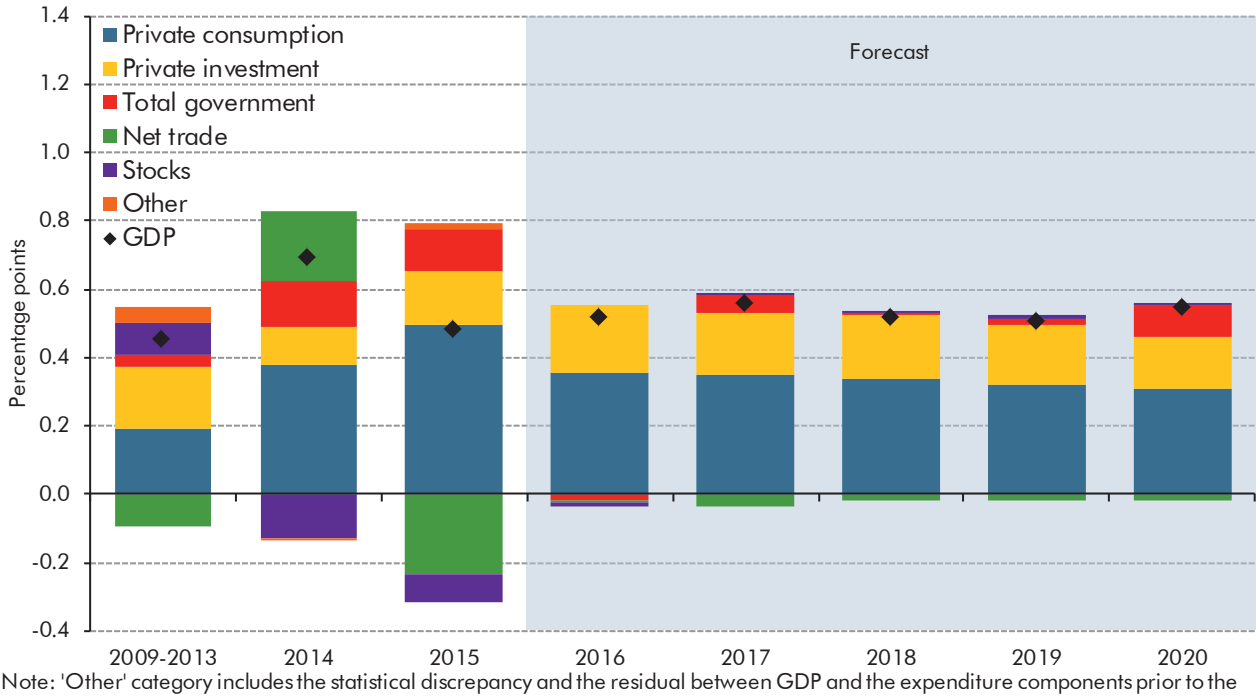
[1] Forecast from first quarter of 2016.
[2] Forecast from fourth quarter of 2015.
[3] Changes may not sum due to rounding.

The medium-term outlook

3.51 Our forecasts for growth in the medium term are determined by the amount of spare capacity in the economy, and the speed with which we expect it to return to productive use. The conditioning assumptions discussed in the previous section all inform that judgement.

3.52 Our latest estimates of the output gap indicate relatively little spare capacity at the end of 2015. The downward revision to our forecast of potential output growth means that we expect weaker GDP growth in the medium term, with quarterly GDP growth expected to average around 0.5 per cent. While this is slightly below the rates of growth in 2013 and 2014, it is similar to the average rate seen in 2015. Relative to the recent past, we expect the balance of growth to shift away from employment growth, with GDP growth supported by a gradual increase in productivity and average earnings growth. On the expenditure side, we expect private consumption and investment to account for nearly all GDP growth as the fiscal consolidation continues, with little contribution from net trade.

Chart 3.16: Contributions to average quarterly GDP growth

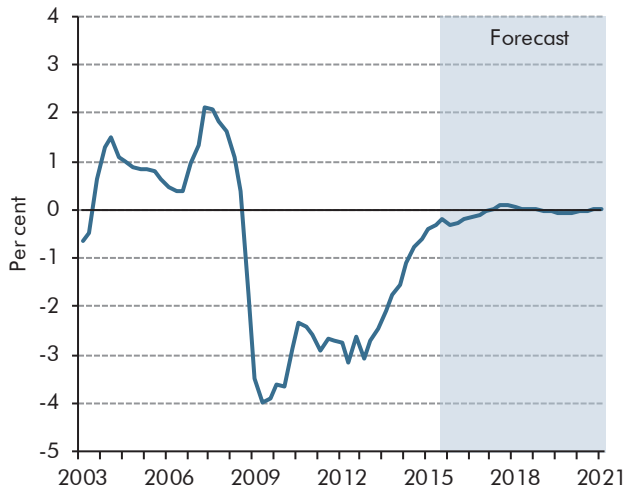


Note: 'Other' category includes the statistical discrepancy and the residual between GDP and the expenditure components prior to the base year (2012).
Source: ONS, OBR

3.53 Our forecast implies a cumulative increase in real GDP of 12.2 per cent between the third quarter of 2015 and the start of 2021 – a downward revision of 1.5 percentage points from the 13.7 per cent we expected in November. Of this downward revision, around 0.4 percentage points is accounted for by a narrower output gap at the start of the forecast, with the remainder accounted for by a downward revision to cumulative potential output growth. Charts 3.17 and 3.18 show our latest medium-term forecasts in terms of the output gap and the levels of actual and potential output. The slightly uneven path of the output gap

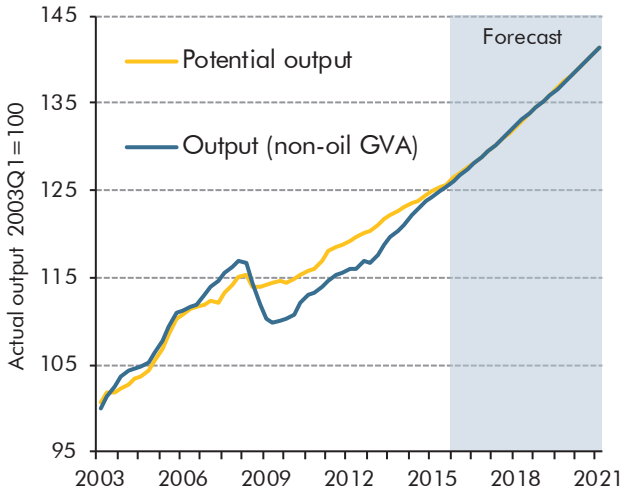
over the forecast period reflects the uneven year-on-year profile in the overall effect of policy decisions announced in the Budget (as explained in Box 3.2).

Chart 3.17: The output gap



Note: Output gap estimates on a quarterly basis, based on the latest National Accounts data and expressed as actual output less trend output as a percentage of trend output (non-oil basis).
Source: OBR

Chart 3.18: Projections of actual and potential output



Source: ONS, OBR

3.54 Table 3.4 summarises the expenditure composition of our real GDP forecast. Growth in 2015 is estimated to have been lower than we forecast in November, with net trade acting as a drag rather than providing the small positive contribution we expected. This is partly offset by changes in inventories, which acted as less of a drag than we expected in November. Thereafter we have also revised down our forecast for GDP growth, with lower contributions from consumption and business investment. Later sections of this chapter discuss our forecasts for the expenditure components of GDP in more detail.

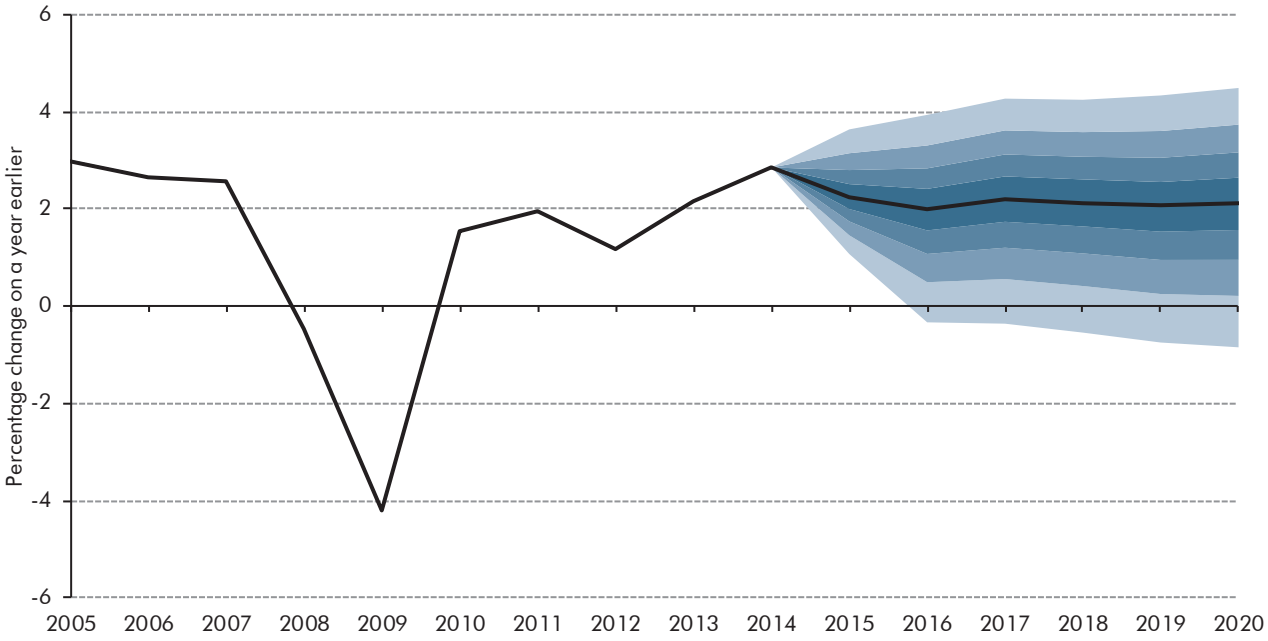
Table 3.4: Expenditure contributions to real GDP growth

	Percentage points, unless otherwise stated						
	Outturn	Forecast					
	2014	2015	2016	2017	2018	2019	2020
GDP growth (per cent)	**2.9**	**2.2**	**2.0**	**2.2**	**2.1**	**2.1**	**2.1**
Main contributions							
Private consumption	1.6	1.9	1.6	1.4	1.4	1.3	1.3
Business investment	0.4	0.5	0.2	0.6	0.6	0.6	0.5
Dwellings investment[1]	0.6	0.2	0.3	0.1	0.1	0.2	0.1
Government[2]	0.7	0.4	0.0	0.2	0.1	0.0	0.3
Change in inventories	0.2	-0.4	0.2	0.0	0.0	0.0	0.0
Net trade	-0.4	-0.5	-0.4	-0.1	-0.1	-0.1	-0.1

[1] The sum of public corporations and private sector investment in new dwellings, improvements to dwellings and transfer costs.
[2] The sum of government consumption and general government investment.
Note: Components may not sum to total due to rounding and the statistical discrepancy.

3.55 Our central GDP growth forecast is shown in Chart 3.19. History suggests that the outturn is unlikely to be anywhere near as smooth as this, but we judge that deviations are as likely to be above as below it. The distribution surrounding the central forecast shows the probability of different outcomes based on past forecast accuracy. The solid black line shows our median forecast, with successive pairs of lighter shaded areas around it representing 20 per cent probability bands. These are based on the historical distribution of official forecast errors. They do not represent a subjective measure of the distribution of risks around the central forecast. Such risks are discussed at the end of the chapter. The Government's fiscal mandate requires us to say whether GDP growth has, or is expected to, fall below 1 per cent on a 4-quarter-on-4-quarter basis. This is discussed further in Chapter 5.

Chart 3.19: Real GDP growth fan chart



Source: ONS, OBR

Prospects for inflation

3.56 In assessing the outlook for the economy and the public finances, we are interested in a number of measures of inflation, including the Consumer Prices Index (CPI) and the Retail Prices Index (RPI). The basic measurement approach is the same in both indices, although there are a number of differences in coverage and the methods used to construct them (see Box 3.3 of our March 2015 *EFO* for details). We also forecast the GDP deflator and its components, which are used in generating our nominal GDP forecast.

3.57 The CPI and RPI measures of inflation are important because they both affect our fiscal forecast. The Government uses the CPI for the indexation of many tax rates, allowances and thresholds, and for the uprating of benefits and public sector pensions. The RPI is used to calculate interest payments on index-linked gilts, student loan payments and the revalorisation of excise duties. The ONS publishes other inflation measures, but these do not currently affect the public finances, so we do not forecast them.

CPI inflation

3.58 Annual CPI inflation was 0.1 per cent in the final quarter of 2015, in line with our November forecast. The latest monthly data show inflation at 0.3 per cent in January, the highest rate for a year. As discussed below, much of the present weakness is due to falling prices in volatile components including energy, food and alcohol. 'Core' CPI, which excludes these components as well as tobacco, has been stronger (although still relatively low), standing at 1.2 per cent in January. Inflation in import intensive goods and services has also remained relatively subdued following the appreciation of sterling that began in 2013 and which has only very recently begun to reverse. The final quarter of 2015 gave mixed signs for domestic inflationary pressures, with margins slightly falling over the year, but the sharp drop in productivity leading to a 1.1 per cent increase in unit labour costs.

3.59 Since our November forecast the price of oil has continued to fall, contrary to market expectations at the time (see Chart 3.12). This has fed through to fuel prices, which fell 12.8 per cent in the year to the final quarter of 2015, pulling down headline CPI inflation by 0.4 percentage points. Food prices fell 2.7 per cent over the same period, subtracting a further 0.3 percentage points from headline CPI.

3.60 These components continue to weigh on our CPI forecast in the near term, with a slow pick-up in inflation expected for the first three quarters of 2016. But they then contribute to the rise in inflation we expect in the medium term:

- markets expect substantial **oil price rises** from 2017, though the absolute price level is expected to remain low by recent historical standards. We expect this to feed through to higher petrol price growth over the same period, although with the level remaining below that implied in our November forecast;

- the recent sharp depreciation of the **sterling effective exchange rate**, as well as our conditioning assumption of further depreciation, is expected to slowly pass through to higher prices in import intensive goods and services across the forecast period; and

- **food price inflation** is expected to return to around its historical average over the next 18 months, reflecting both an expected stabilisation in global food commodity prices and the sterling depreciation.

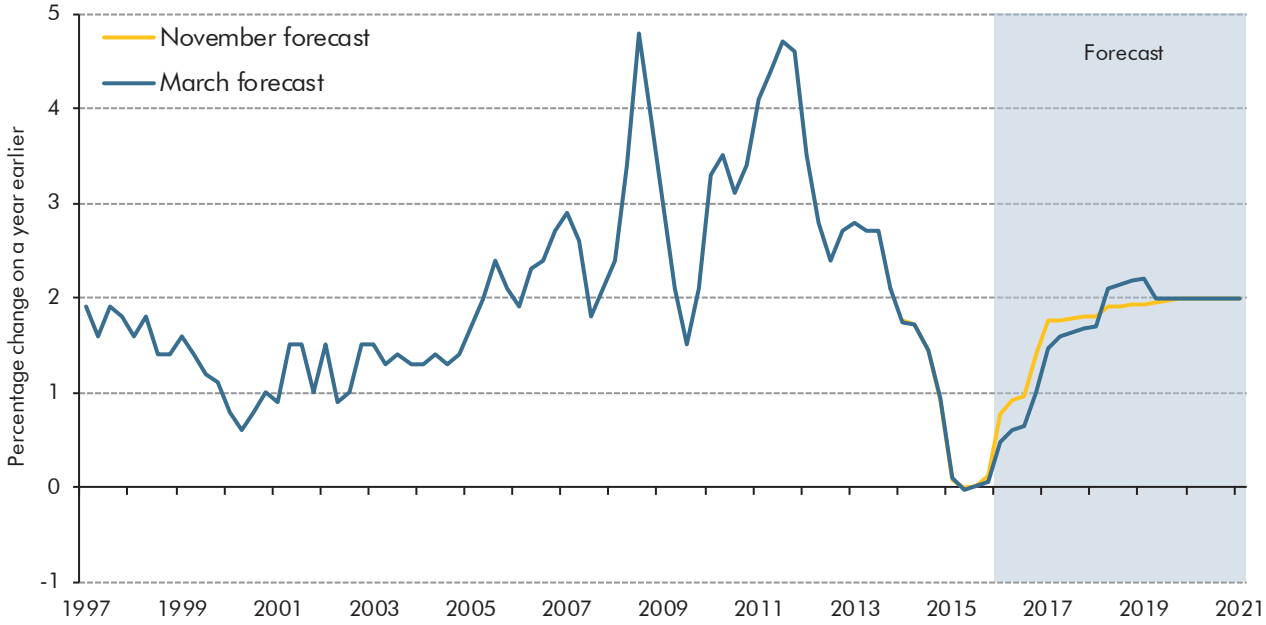
3.61 Working against these trends, recent falls in wholesale gas prices are forecast to act as a drag on inflation in the medium term as they pass through to retail prices. We expect this to happen slowly since utility companies buy wholesale energy up to two years in advance.

3.62 Inflation is forecast to move above the Bank of England's 2 per cent target in the second quarter of 2018, when the effect of the soft drinks industry levy announced in this Budget affects prices. We expect it to add around a quarter of a percentage point to CPI growth in 2018-19. Since the levy is unchanged in future years it affects the level, not the growth, of the CPI. We expect the Bank of England to look through this temporary effect, and so allow the rate of inflation to exceed 2 per cent until the impact of the levy dissipates. With the

output gap then close to zero and the expected transitory shocks to inflation complete, we assume that the Bank of England will keep inflation on target for the rest of the forecast. To the extent that the levy leads to reduced consumption of soft drinks, their weight in the CPI would fall in subsequent years, with the effect lagged because the ONS updates the weights in the index once a year to reflect the consumption patterns of two years previously.

3.63 As well as the soft drinks industry levy, we have also made small adjustments for several other policies announced in this Budget. These include changes to tobacco, fuel and most alcohol duties, the measures to reduce VAT fraud, and energy policies. The effects are small and broadly offsetting, and taken together imply almost no change to our CPI forecast.

Chart 3.20: CPI inflation



Source: ONS, OBR

RPI inflation

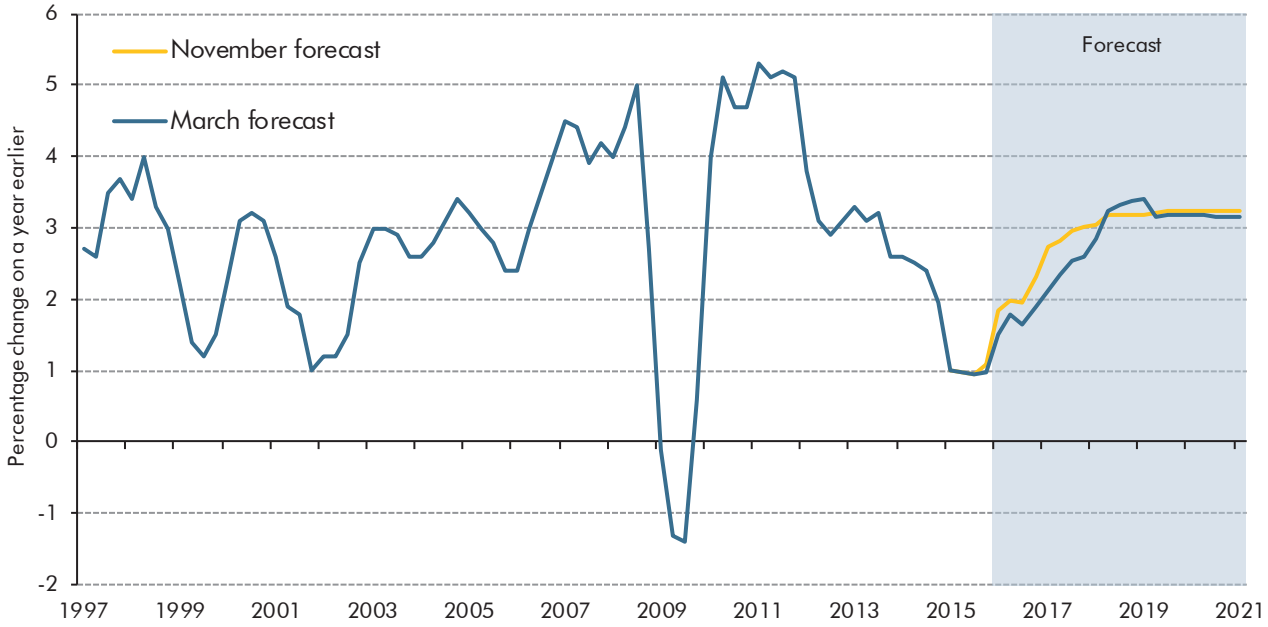
3.64 The calculation of RPI inflation in the UK does not meet international statistical standards,[8] but we continue to forecast it as an input in our fiscal forecasts – notably as a determinant of the interest paid on the large stock of index-linked gilts.

3.65 RPI inflation was 1.0 per cent in the fourth quarter of 2015, 0.1 percentage points lower than our November forecast. We expect RPI inflation to follow a similar path to CPI inflation over 2016, rising to 1.9 per cent by the end of the year. Across 2017 and 2018 we expect a rise in mortgage interest payments (MIPs), driven by small rises in the effective mortgage interest rate and the accumulation of mortgage debt. This feeds through to an increase in the wedge between RPI and CPI, which reaches 1.1 per cent in the first quarter of 2018 and is little changed for the rest of the forecast. Our RPI forecast is weaker than in November, in line with the weaker CPI profile.

[8] ONS, *Response to the National Statistician's consultation on options for improving the Retail Prices Index*, February 2013.

3.66 The RPI profile has also been adjusted to account for the policies announced in this Budget and discussed above. They affect RPI in a very similar way to CPI, so make almost no difference to the wedge between the two.

Chart 3.21: RPI inflation



Source: ONS, OBR

The GDP deflator

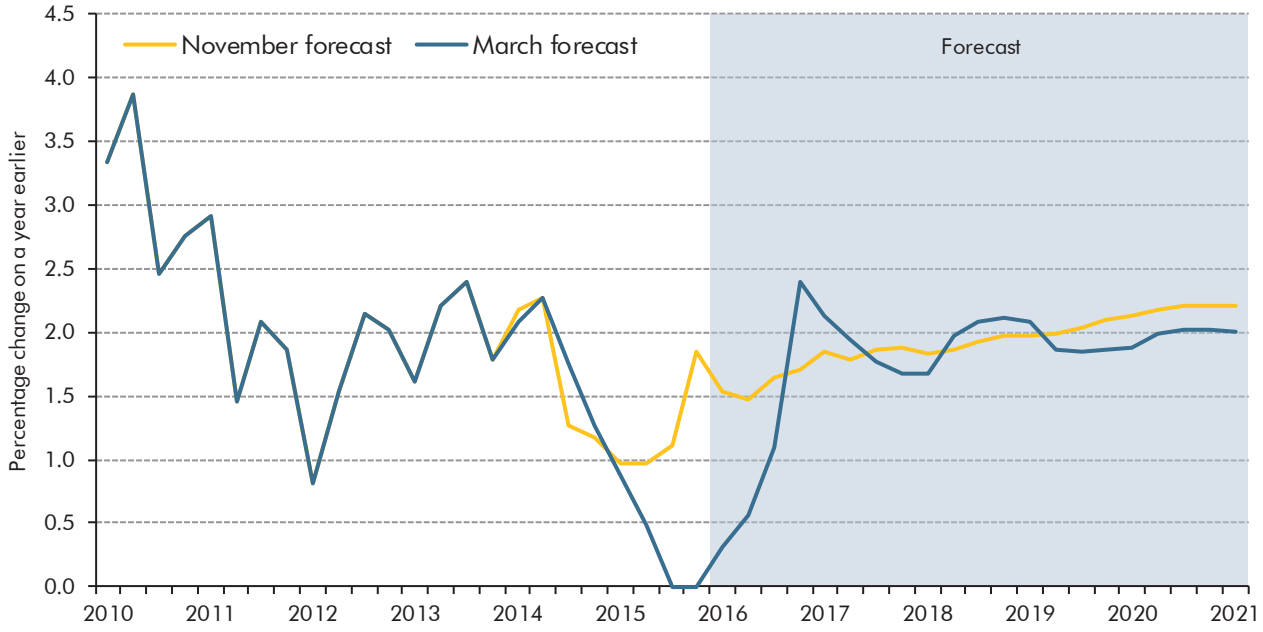
3.67 GDP deflator growth is the broadest measure of inflation in the domestic economy. It measures changes in the prices of the goods and services that make up GDP, including price movements in private and government consumption, investment and the relative price of exports and imports – the terms of trade.

3.68 As discussed in Chapter 2, the latest National Accounts data show that GDP deflator growth in the second half of 2015 was substantially below our November forecast. In the latest quarter its annual growth stood at zero – the (joint) lowest rate in 55 years – providing a very low starting point for the deflator forecast. This weakness was partly due to a very weak contribution from the change in inventories, a volatile component. We assume that the implied deflator for the change in inventories returns to a historical average over the next year. This unwinding, as well as a pick-up in the private and government consumption deflators, causes the GDP deflator level to increase steadily over the course of 2016. The low outturns in 2015 result in significant base effects in the annual growth rate, which spikes at 2.4 per cent at the end of 2016.

3.69 Annual growth in the GDP deflator falls away over 2017 as the base effects from the change in the inventories component wane. It then picks up from the middle of 2018, driven by the growth of the consumption deflator, which is linked to our CPI forecast. The path of GDP deflator growth in 2019 and 2020 is slightly uneven reflecting both CPI falling

back to target in the middle of 2019, and the uneven path of government consumption growth implied by the Government's latest fiscal plans.

Chart 3.22: GDP deflator



Source: ONS, OBR

Prospects for nominal GDP growth

3.70 Most public discussion of economic forecasts focuses on real GDP – the volume of goods and services produced in the economy. But the nominal or cash value – and its composition by income and expenditure – is more important in understanding the behaviour of the public finances. Taxes are driven more by nominal than real GDP. So too is the share of GDP devoted to public spending, as a large proportion of that spending is set out in multi-year cash plans (public services, grants and administration, and capital spending) or linked to measures of inflation (benefits, tax credits and interest on index-linked gilts).

3.71 The latest data indicate that nominal GDP growth slowed to 2.6 per cent in 2015, following growth of 4.2 per cent in 2013 and 4.7 per cent in 2014. On the expenditure side, part of this slowdown is attributable to a slowdown in consumption growth: while a fall in household saving helped to support consumer spending in 2013 and 2014, consumption growth was more closely in line with the growth of household disposable income in 2015, although consumption picked up sharply in the final quarter of the year (see paragraphs 3.79 to 3.80). Nominal government consumption growth also fell from 3.0 per cent in 2014 to 1.1 per cent in 2015, while nominal investment growth slowed from 9.0 per cent to 5.4 per cent as the growth of dwellings investment fell back sharply. On the income side the reduction in nominal growth in 2015 was largely attributable to a slowdown in profits growth, with the growth of labour income picking up slightly between 2014 and 2015.

3.72 We expect the weakness of nominal GDP growth to ease slightly in 2016, as some of the factors pushing down on nominal GDP growth at the end of 2015 are expected to unwind. It is then expected to increase to just over 4 per cent a year from 2017 onwards. Over the forecast period we expect nominal GDP to grow by a cumulative 23.7 per cent between the third quarter of 2015 and start of 2021, revised down from the cumulative growth of 26.5 per cent we expected in our November forecast. Of this 2.9 percentage point downward revision, around 1.5 percentage points is attributable to weaker real GDP growth, with the remainder accounted for by slower growth of the GDP deflator.

Prospects for individual sectors of the economy

The household sector

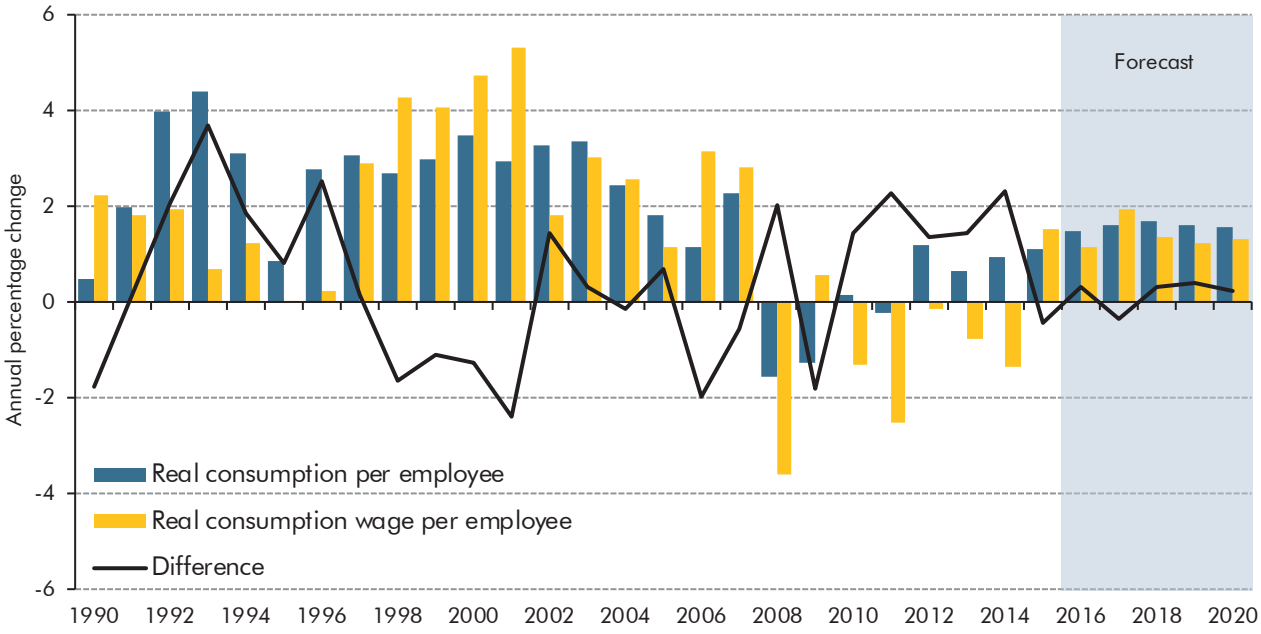
3.73 The household sector is the largest source of income and spending in the economy, with consumer spending making up 65 per cent of nominal GDP by expenditure and household disposable income making up 65 per cent of nominal GDP by income in 2014.

Real consumer spending

3.74 The latest data show that consumption increased 2.9 per cent in real terms in 2015, in line with our November forecast. Lower inflation caused the real consumption wage to increase in 2015, having fallen in 2014, but private consumption growth increased only slightly (Chart 3.23). We have revised down our forecast for consumption growth over the forecast, reflecting a downward revision to real wage growth from lower productivity growth. We assume that real consumption will grow broadly in line with real wages over the forecast period, having risen faster than real wages in each year from 2010 to 2014.[9]

[9] While consumption growth is expected to be broadly in line with labour income growth, it is expected to be stronger than household disposable income growth, as shown in Chart 3.26. This is because labour income includes employer pension contributions, which are expected to grow relatively strongly over the forecast period but which have a neutral effect on household disposable income.

Chart 3.23: Real consumption wage and real consumption



Source: ONS, OBR

The labour market and household income

3.75 The unemployment rate fell in the third and fourth quarters of 2015, reaching 5.1 per cent, 0.2 percentage points below our November forecast. We forecast the rate to decline more slowly over the coming year to a low of 4.9 per cent, as productivity growth picks up and firms expand output more through their existing workforce than through recruitment. The headline rate is then forecast to rise back to 5.4 per cent by the end of 2020, in part due to an increasing 'National Living Wage' which puts upward pressure on structural unemployment.[10] In the near term we expect the claimant count to fall slightly relative to the broader measure of unemployment. Thereafter we expect it to rise a little faster, as the lone parent obligation, which moves parents off income support and typically onto jobseeker's allowance in the first instance, is extended to lone parents of 3-year olds.

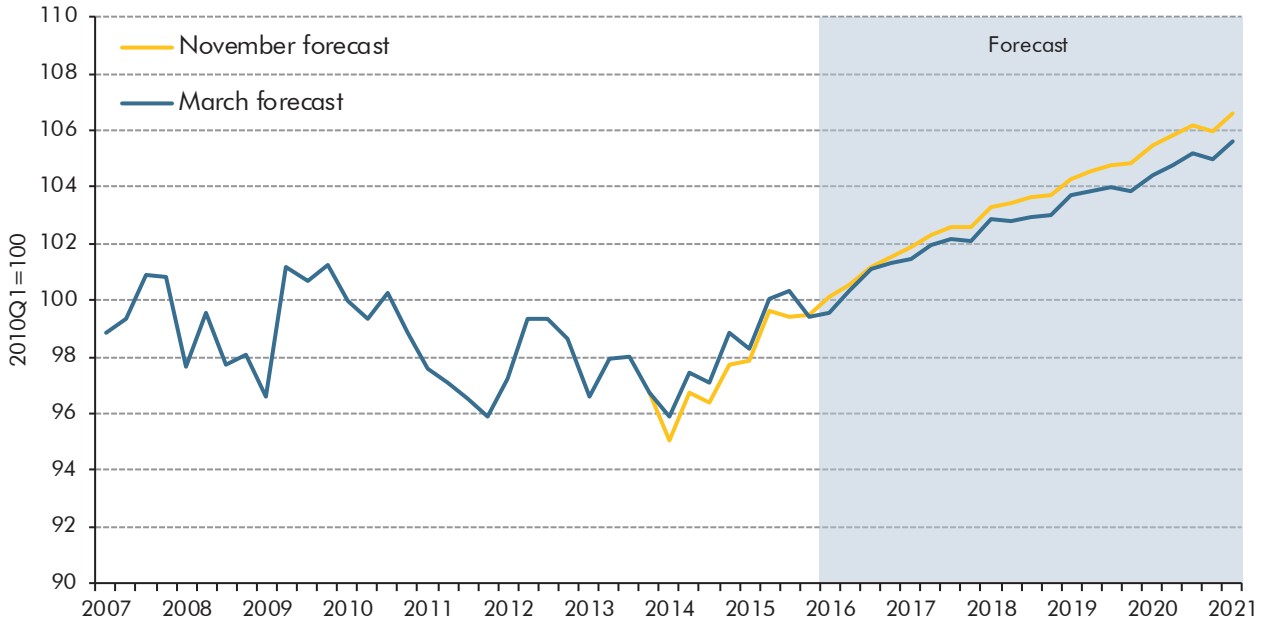
3.76 The participation rate has a relatively flat profile over the forecast, with the ageing population pushing it down and rising age-specific participation rates pushing it up. The participation rate is expected to stay broadly flat over the next four years, in part due to net inward migration (which is dominated by people of working age), and then to fall back to slightly below its current level as the population ages. The 0.9 million rise in employment over the forecast period can therefore be explained by additional population growth. The ONS population projections that underpin our forecast imply that around half the expected population growth over the forecast period will come from net migration, but that due to the concentration of migration among those of working age, around three-quarters of the increase in employment that we forecast would be accounted for by net migration.

[10] The level of the National Living Wage consistent with our forecast has been revised down since November – from £9.30 to £9.00 an hour in 2020. That reflects information from the 2015 Annual Survey of Hours and Earnings, which reported slower growth in median than mean hourly earnings, and the downward revision to our earnings growth forecast. The assumed annual path of the National Minimum Wage and National Living Wage consistent with our forecast are available in a supplementary table on our website.

3.77 Average earnings growth in the second half of 2015 has been lower than we expected in November. We have revised down average earnings growth in each subsequent year consistent with slower (but still rising) productivity growth over the next few years, although we continue to expect real average earnings to rise by slightly more than productivity per worker over this period. As in November, over the medium term, the weakness of earnings growth in part reflects our judgement that the additional costs created for firms and workers by the Government's introduction of the apprenticeship levy and ongoing auto-enrolment into workplace pensions – both of which are economically equivalent to payroll taxes – will largely be borne through lower wages. The announcement in this Budget that National Insurance contributions will be levied on termination payments over £30,000 has been judged to feed through into wages in a similar way. Lower whole economy inflation also translates into slower nominal earnings growth in the final two years of our forecast.

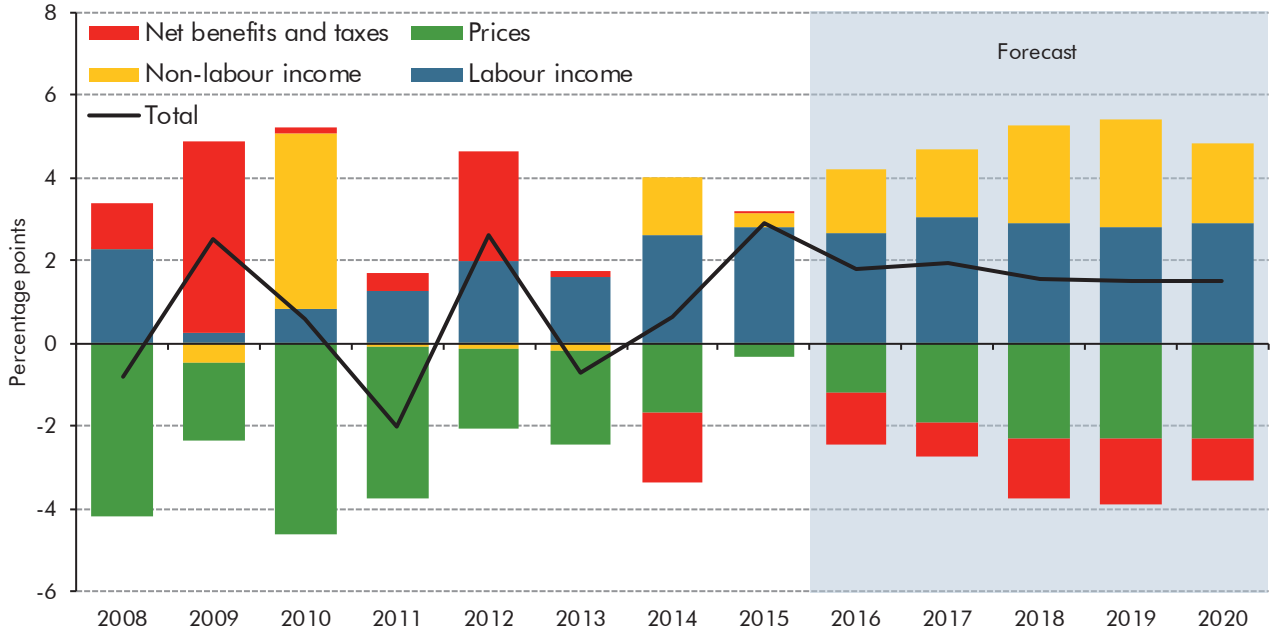
3.78 The significant fall in consumer price inflation over the past year has helped to support the growth of real household disposable income. We expect real household disposable income growth to have peaked at 2.9 per cent in 2015. We expect it to average 1.7 per cent a year from 2016 onwards. Over the forecast period we expect real household disposable income to grow more slowly than we assumed in November, with annual growth revised down by an average of 0.3 percentage points between 2016 and 2020, due mainly to the downward revision to productivity growth described above.

Chart 3.24: Real household disposable income per capita



Source: OBR

Chart 3.25: Contributions to real household income growth



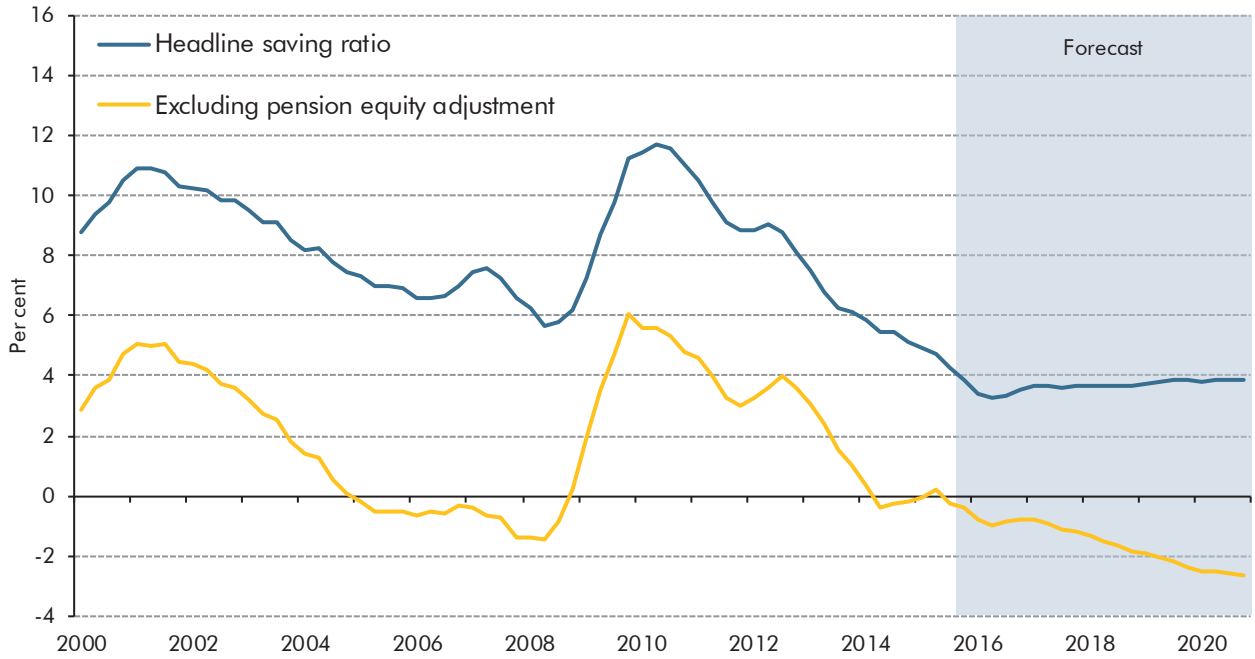
Source: ONS, OBR

The saving ratio

3.79 The headline saving ratio has fallen steadily since 2012, reaching 4.4 per cent in the third quarter of 2015 – the joint lowest ratio since 1963. While the fall in household saving over this period has largely reflected the strength of consumption relative to household disposable income, more recent falls have also reflected a reduction in measured pension saving. When pension saving is excluded, household saving stabilised between 2014 and the middle of 2015. (Chart 3.26).

3.80 Data on the household saving ratio in the final quarter of 2015 are not yet available, but consumption growth appears to have significantly outpaced the growth of labour income. Nominal consumer spending increased by 1.7 per cent on the previous quarter, while labour income was up 0.7 per cent, so household saving is likely to have fallen further. Over the forecast period we expect consumption to grow slightly faster than household disposable income, putting downward pressure on the saving ratio. This is offset by rising pension saving, as auto-enrolment coverage and contribution rates increase. It also reflects increases in gilt yields, which are used in the calculation of imputed employee pension contributions in the National Accounts.

Chart 3.26: The household saving ratio



Note: Both series show four-quarter moving averages. The estimate of the saving ratio excluding the pension equity adjustment is calculated as household disposable income less consumption, as a proportion of household disposable income.
Source: ONS, OBR

The housing market and dwellings investment

3.81 House price inflation picked up again in the fourth quarter of 2015, with year-on-year growth of 7.1 per cent (Chart 3.27). This is the first quarter where the growth rate has increased since the recent peak of 11.7 per cent in the third quarter of 2014. We expect house price inflation to rise further in the first quarter of 2016, to 8.3 per cent, before slowing thereafter. There remains considerable uncertainty about near-term prospects and the major lenders' house price indices have continued their recent divergence. The Halifax index is reporting year-on-year growth of 9.7 per cent in the year to February while the Nationwide index is up by just 4.8 per cent over the same period. Survey indicators from the Royal Institution of Chartered Surveyors have been broadly flat.

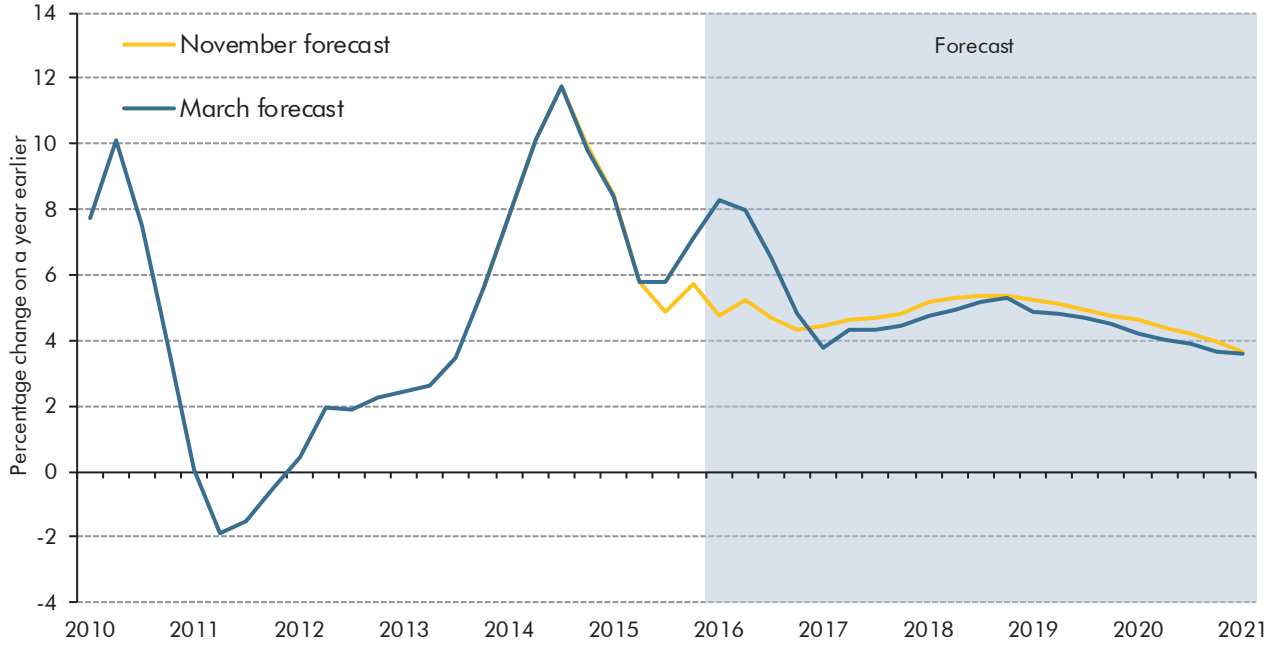
3.82 Beyond the near term, we use a house price model to inform our forecast.[11] Currently, this suggests that there is a significant amount of credit rationing in the mortgage market. Financial institutions are extending less secured debt than the model suggests households would like based on fundamental drivers of mortgage demand. This is consistent with changes to the regulatory environment, ongoing repair to bank balance sheets and changes to lenders' behaviour brought about by the Mortgage Market Review. We continue to assume this implied mortgage rationing will ease but we have slowed the rate at which it does so. This implies a higher level of rationing at the end of the forecast period than we assumed in November. This brings credit rationing in line with the downward adjustments we made to the levels of secured debt and property transactions in our November forecast.

[11] For more information on our house price model see Auterson (2014): *Working paper No. 6: Forecasting house prices*.

3.83 Over the forecast period, we expect house price inflation to persist at rates somewhat above earnings growth, consistent with historical trends in the UK. Revisions to the medium-term profile have been relatively small since our last forecast, with the level of house prices by the end of the forecast period 1.5 per cent higher than in November. House prices are expected to rise by 26.4 per cent by the first quarter of 2021.

3.84 We have made a small adjustment to our house price forecast to reflect the first-time buyer element of the lifetime ISA policy announced in this Budget. There is considerable uncertainty over how that might manifest itself, but we think it is more likely than not to lead to higher demand for the relatively fixed supply of housing in the UK and thus lead to higher prices. We have added 0.3 per cent to the level of house prices by the end of the forecast, but the effect could easily be larger (if more house deposit saving is channelled through lifetime ISAs than we have assumed) or smaller (perhaps if parents supporting their first-time buyer children's deposit saving reduce that support in light of the amount that will be provided by the Government).

Chart 3.27: House price inflation forecast



Source: ONS, OBR

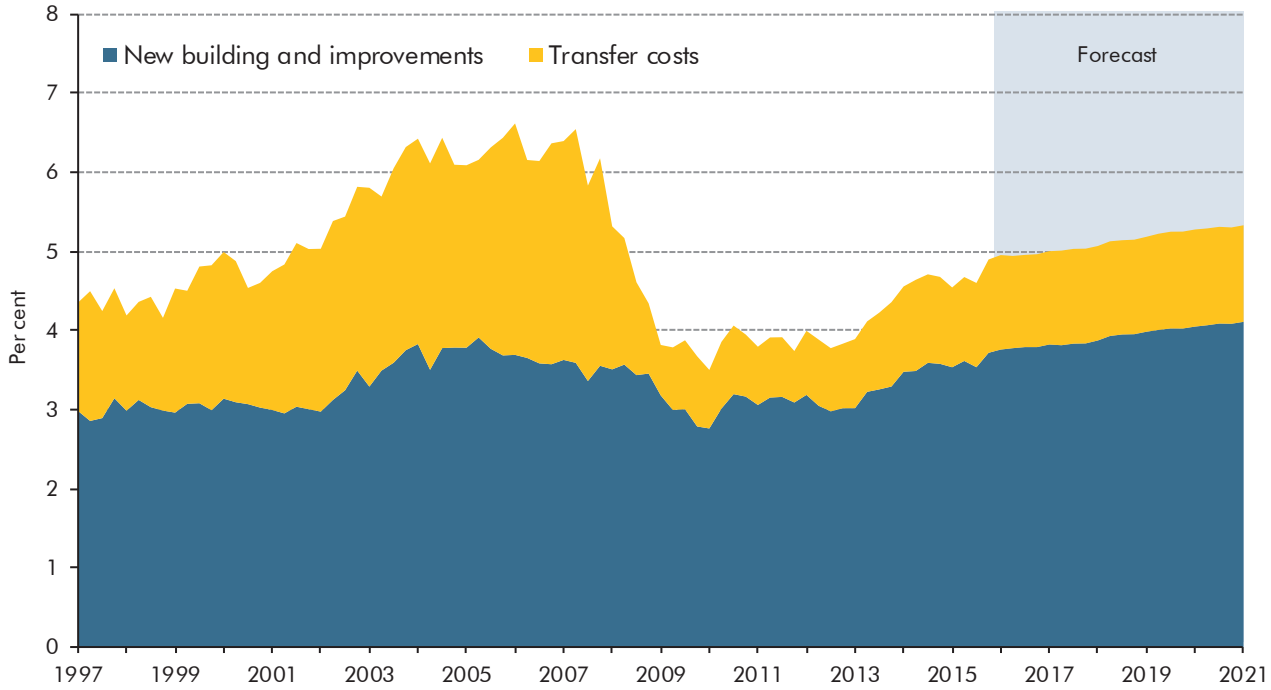
3.85 Our forecast for residential property transactions is little changed from November. Transactions grew by 8.6 per cent in the year to the fourth quarter of 2015, up from 2.9 per cent in the previous quarter. In the short term, we expect a slightly higher rate of growth in the first quarter of 2016, but a slowdown in growth in the second half of the year.

3.86 We lowered our medium-term forecast for residential transactions in November to reflect the near-doubling of privately renting households since 2000 and recent evidence that suggests rental properties are re-sold at about half the frequency of owner-occupied housing. We assume that the growth in private renting will continue and therefore reduced the number of residential property transactions. We also made downward adjustments in

November to capture the effects of policy measures targeting buy-to-let landlords. Due to the pre-announcement of the SDLT surcharge on second homes, we expect property transactions to be boosted temporarily in the run-up to its April 2016 introduction as investors bring forward transactions to avoid the new surcharge.

3.87 The latest National Accounts data show that residential investment grew by 3.4 per cent in 2015, higher than we forecast in November. The pattern of revisions to outturn data affect our forecast of residential investment growth in 2016, implying higher growth in that year. There was little change to our pre-measures forecast for residential investment from 2017 onwards, but we have adjusted our post-measures forecast to reflect several policies introduced in this Budget that affect housing associations' finances and which are therefore assumed to affect their housebuilding. These policy measures reduce total residential investment by 0.7 per cent by 2020-21.

Chart 3.28: Residential investment as a share of GDP



Source: ONS, OBR

Net lending and the household balance sheet

3.88 Our forecast for the household balance sheet is built up from a number of components:

- the accumulation of household **assets**, such as deposits, pension and insurance assets, equity, and other assets;
- the accumulation of **liabilities**, which are decomposed into mortgage debt and unsecured debt; and
- these are constrained to be consistent with our forecast for households' **net lending** position, which determines the rate at which households acquire assets relative to

liabilities (their 'net' asset accumulation). All else equal, positive net lending implies that households will accumulate more assets than liabilities and vice versa.

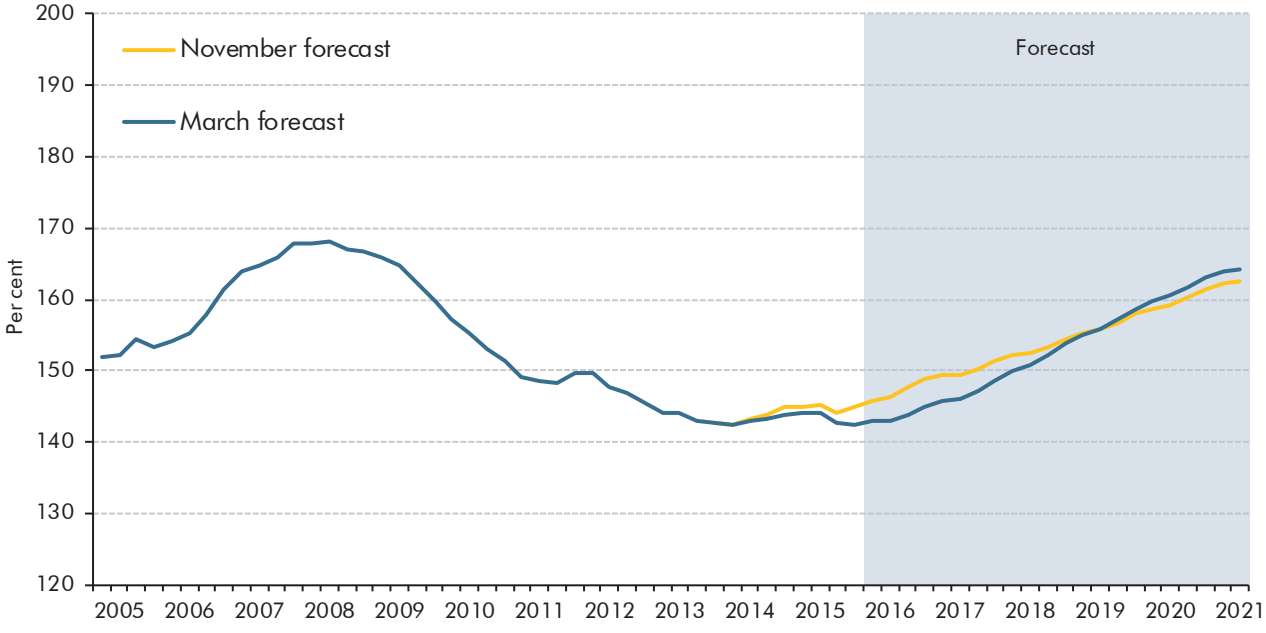
3.89 In November, we improved how we forecast the household balance sheet. We moved to a bottom-up approach to forecasting unsecured debt, based on its relationship with consumption and unemployment; and the use of 'other' assets as the residual to ensure consistency between the stock and flow positions of households' financial accounts. Further detail on these changes can be found in our November *EFO*.

3.90 We now expect gross household debt to reach 164 per cent of household disposable income by the end of the forecast, up slightly from an expected 163 per cent in November. We consider this upward trend at the whole economy level to be consistent with the macroprudential policy setting described in paragraphs 3.29 to 3.31, which is mainly focused on particular sectors or risks. The changes in our forecast since November reflect:

- in cash terms, **gross debt** is expected to be £5 billion lower by the start of 2021 than we expected in November. This is more than explained by a lower starting point, with the level of household debt £17 billion lower in the third quarter of 2015 than expected in November. This is partly offset by a £7 billion upward revision to the accumulation of secured debt over the forecast period and a £6 billion upward revision to the accumulation of unsecured debt; and

- the fall in gross debt is offset by a downward revision to our forecast of the level of **household disposable income**, which is expected to be around 1¼ per cent lower than our November forecast by the start of 2021.

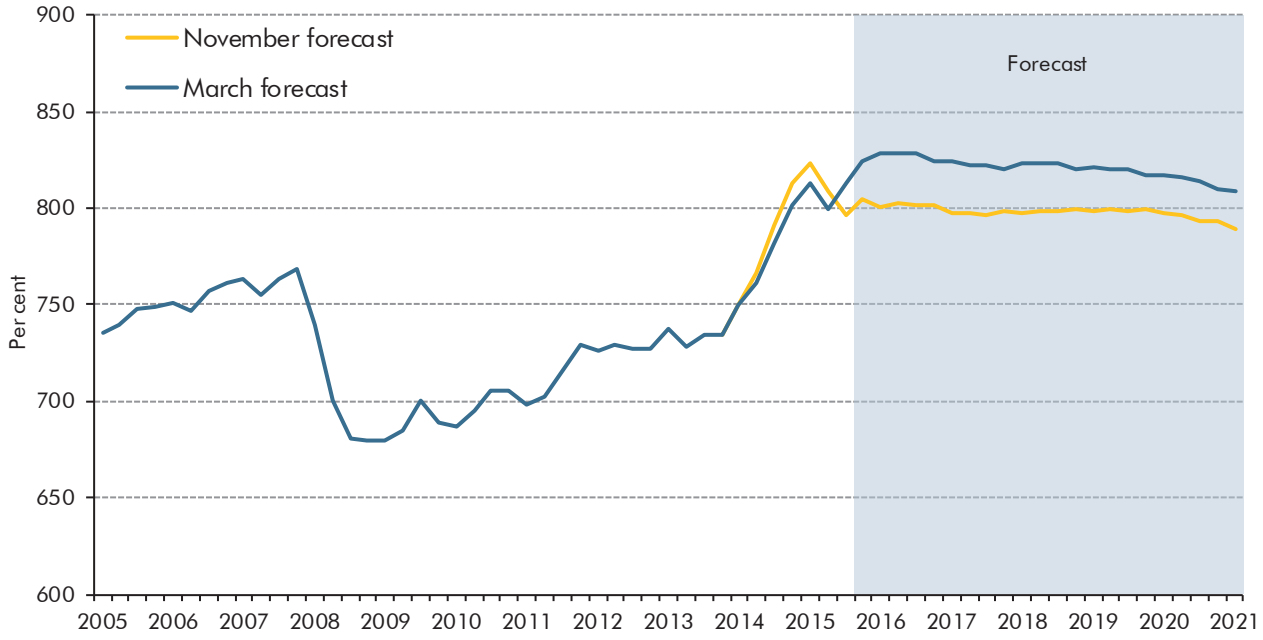
Chart 3.29: Household gross debt to income



Source: ONS, OBR

3.91 Chart 3.30 shows our forecast of household net worth, which includes housing equity as well as financial assets and liabilities. The ratio of net worth to income is expected to remain broadly stable over the next five years. The ongoing household deficit implies that the accumulation of financial assets is slower than the accumulation of liabilities over the forecast period, but the effect on household net worth is offset by the rising value of housing assets. Relative to November we expect a higher level of household net worth through the forecast, largely reflecting a higher level at the start. The higher starting point reflects a stronger than expected outturn for household net financial assets in the third quarter of 2015, as well as an updated estimate of the value of the housing stock.

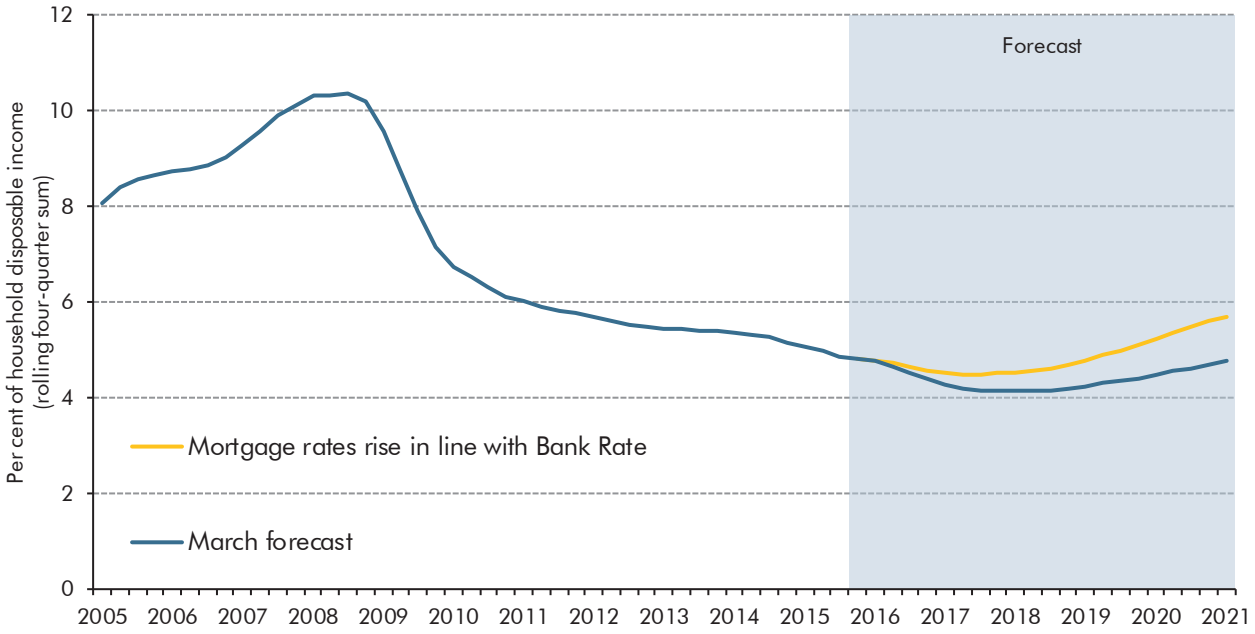
Chart 3.30: Household net worth relative to household income



Source: ONS, OBR

3.92 Household debt servicing costs are expected to remain low relative to household income, despite the expected increase in the stock of household debt (Chart 3.31). This reflects the fact that mortgage rates are expected to remain at historically low levels – consistent with the lagged effect of past falls in funding spreads, the exceptionally low level of Bank Rate and our assumption that lenders' margins on mortgage rates will narrow over the forecast. If mortgage rates increase at the same pace as Bank Rate, debt servicing costs would remain well below pre-crisis levels as a share of income, although they would be somewhat higher than our central forecast.

Chart 3.31: Household debt servicing costs



Source: ONS, OBR

The corporate sector

Business investment and stockbuilding

3.93 The latest data show that business investment fell in the final quarter of 2015. It is now estimated to have grown by 4.7 per cent in 2015, the same rate as in 2014, but lower than we forecast in November. The Bank of England's *Agents' Summary* reports investment intentions consistent with "*unchanged capital spending in manufacturing, but continued growth among services firms*", a weaker outlook than at the time of our November forecast. We now expect business investment growth of 2.6 per cent in 2016, a 4.9 percentage point downward revision since November, largely reflecting the 2.1 per cent fall in business investment in the final quarter of 2015. It is then expected to pick up from 2017, but to lower rates than we forecast in November. There were only tentative signs of uncertainty regarding the EU referendum result affecting investment intentions by the time we closed this forecast and we have made no adjustment to reflect a change in behaviour.[12]

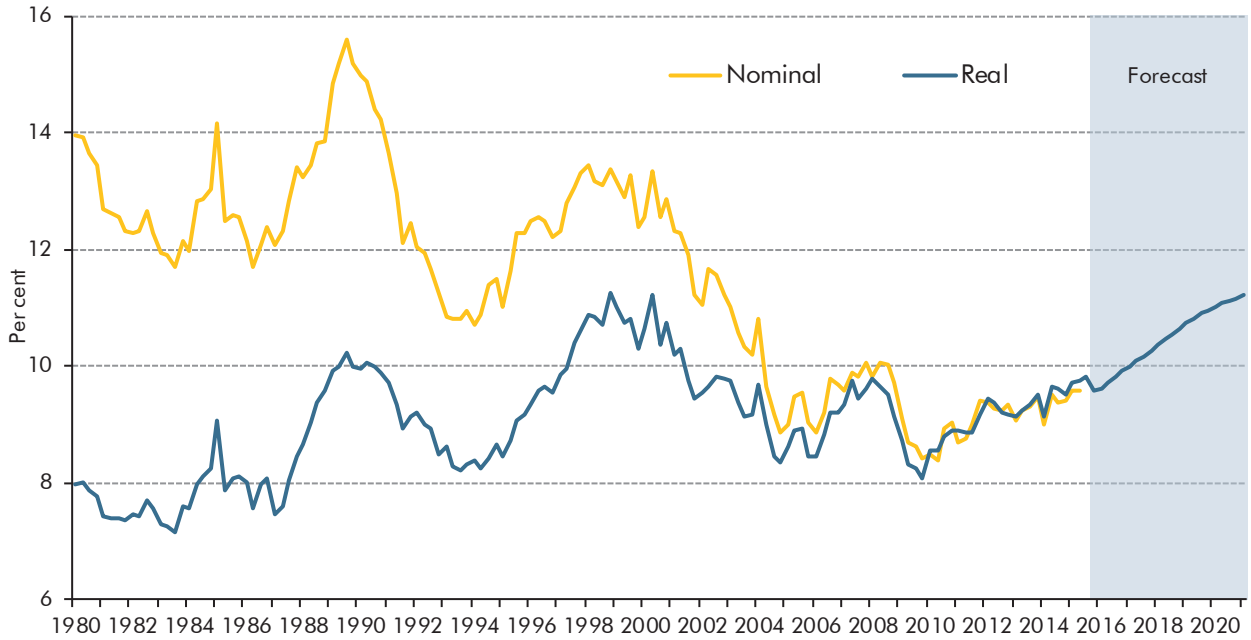
3.94 We adjusted our business investment forecast to reflect three business tax measures, but the Government informed us after our final economy forecast had been closed that one of those measures would not be going ahead. As a result, our business investment forecast is around 0.5 per cent higher than would be consistent with the final policy package announced in the Budget. The net effect of the other two measures was small.

3.95 As Chart 3.32 shows, our forecast implies that real business investment will rise as a share of GDP, as typically occurs during the later stages of a recovery. It also shows how the

[12] The clearest sign of an effect was seen in the latest EEF *Manufacturing outlook* where investment intentions fell to a six-year low, with the EU referendum cited as a possible cause.

nominal share has tended to fall relative to the real share because investment goods price inflation tends to be lower than whole economy inflation.

Chart 3.32: Business investment as a share of GDP



Source: ONS, OBR

3.96 The latest ONS data indicate that stocks acted as less of a drag on GDP growth in 2015 than we forecast in November. As discussed in paragraph 3.68, the implied price of the change in inventories is estimated to have fallen significantly in the final quarter of 2015, which contributed to a fall in the overall GDP deflator. We expect inventories to make a positive contribution to real GDP growth in 2016 and to be neutral thereafter.

Corporate profits

3.97 Data revisions have left the recent path of corporate profits significantly weaker than suggested by the data available to us at the time of our November forecast. The latest data indicate that non-oil corporate profits grew by 0.9 per cent in the year to the second quarter of 2015, revised down from a previous estimate of 4.4 per cent. The latest data on the high-level breakdown of income indicate a fall in corporations' gross operating surplus in the fourth quarter, pointing to a further slowdown in profit growth. As a result we have revised our forecast for non-oil profits growth in 2015 down from 6.3 to 1.9 per cent.

3.98 We expect non-oil profits to rise slightly more quickly than nominal GDP in the near term as the output gap continues to close. From 2017 we expect profits to grow slightly more slowly than nominal GDP, as the apprenticeship levy and auto-enrolment depress profit margins. These judgements are unchanged from November.

The government sector

3.99 Total public spending amounted to 40.8 per cent of GDP in 2014-15.[13] But not all government spending contributes directly to GDP. Spending on welfare payments and debt interest, for example, merely transfers income from some individuals to others. The government sector contributes directly to GDP via consumption of goods and services, and investment. These together accounted for 22.2 per cent of GDP in 2014-15.

Real government consumption

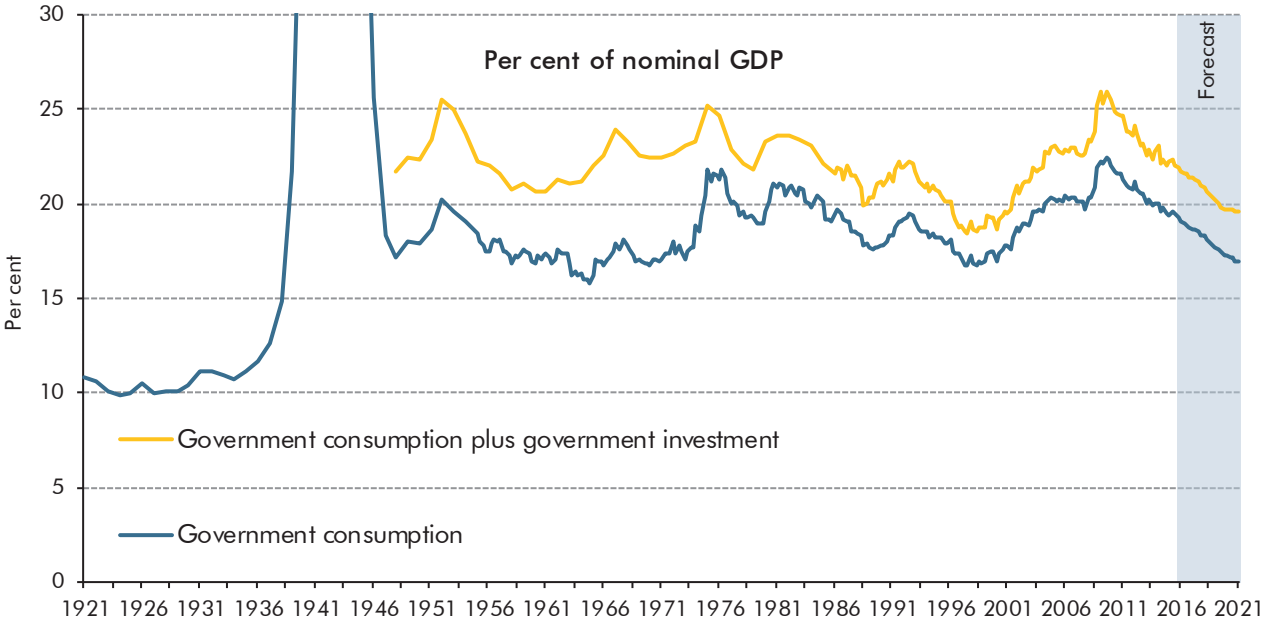
3.100 Real government consumption is estimated to have grown by 1.7 per cent in 2015, in line with our November forecast. We have revised our forecast down in 2016 and it is also slightly lower on average between 2017 and 2020, reflecting the Government's decisions on the pace and composition of fiscal consolidation.

Nominal government consumption

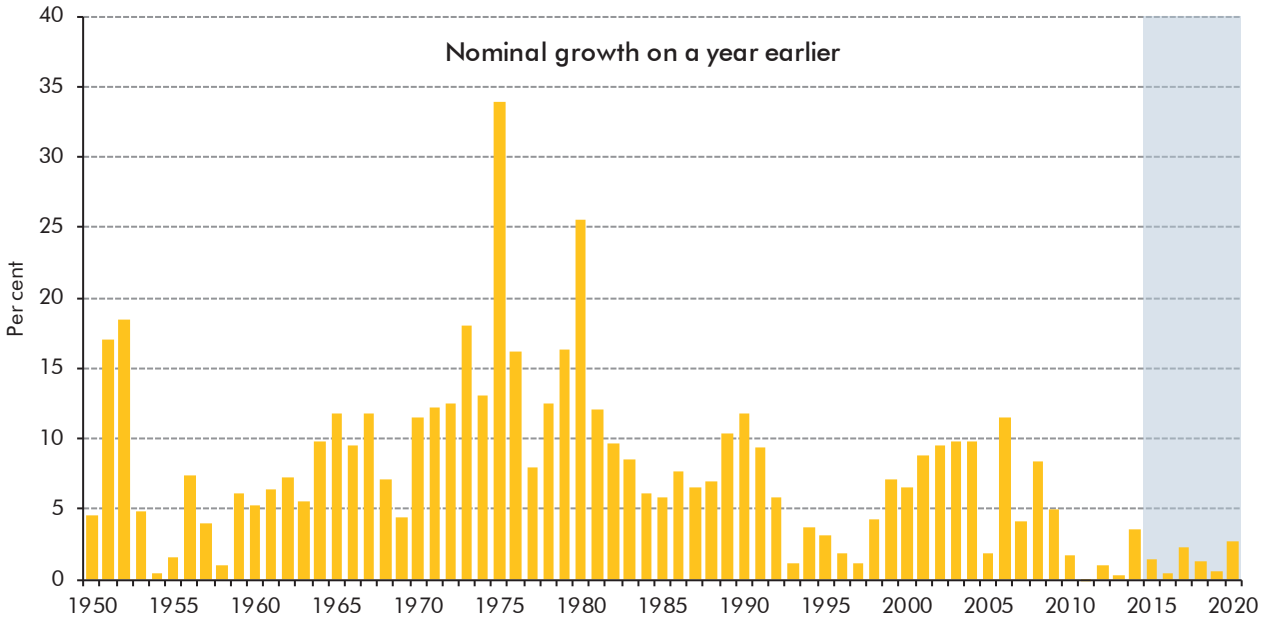
3.101 Nominal government consumption grew by 1.1 per cent in 2015, higher than our November forecast. But we have revised it down over the forecast. The Government's updated fiscal plans imply that nominal government consumption will grow by 1.3 per cent a year on average between 2016 and 2020, compared with 2.0 per cent in November. This implies that nominal government consumption will fall from 19.4 per cent of GDP in 2015 to 17.2 per cent of GDP in 2020, slightly higher than in November (Chart 3.33).

[13] Total managed expenditure (TME).

Chart 3.33: Government consumption and government investment



Note: Government consumption as a share of GDP is estimated to have peaked at 54.0 per cent of GDP in 1944.

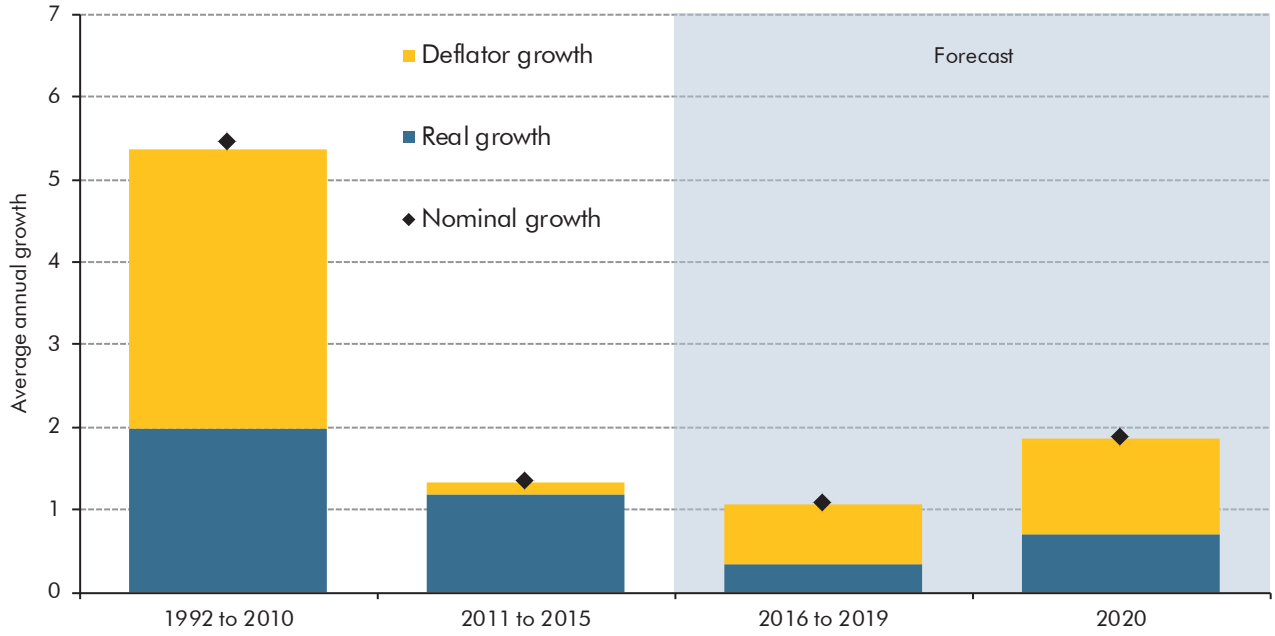


Note: Government consumption plus government investment on a National Accounts basis.
Source: ONS, OBR

3.102 Growth in the implied price of government consumption – the ratio of nominal spending to real government consumption – has been subdued as cash spending growth has slowed (Chart 3.34). This largely reflects the way real government consumption is measured, as described in Box 3.3.

3.103 The government consumption deflator is estimated to have fallen by 0.6 per cent in 2015. This is less than we forecast in November, reflecting stronger growth in nominal government consumption. Revisions to our forecast since November are also driven by the Government's decisions on the pace and composition of fiscal consolidation.

Chart 3.34: General government consumption



Source: ONS, OBR

Box 3.3: International comparisons of the government consumption deflator

The government consumption deflator measures the implied price of government services. In the UK, around one-third reflects actual deflators – where the prices are measured directly – and the other two-thirds reflect implied deflators – where it is the volume that is measured directly and the price inferred. Our earlier forecasts did not take sufficient account of the effect on implied deflators of the Government's spending cuts, which reduce the value of spending more than the directly measured volumes. We therefore overestimated deflator growth and so underestimated the growth of real government consumption.

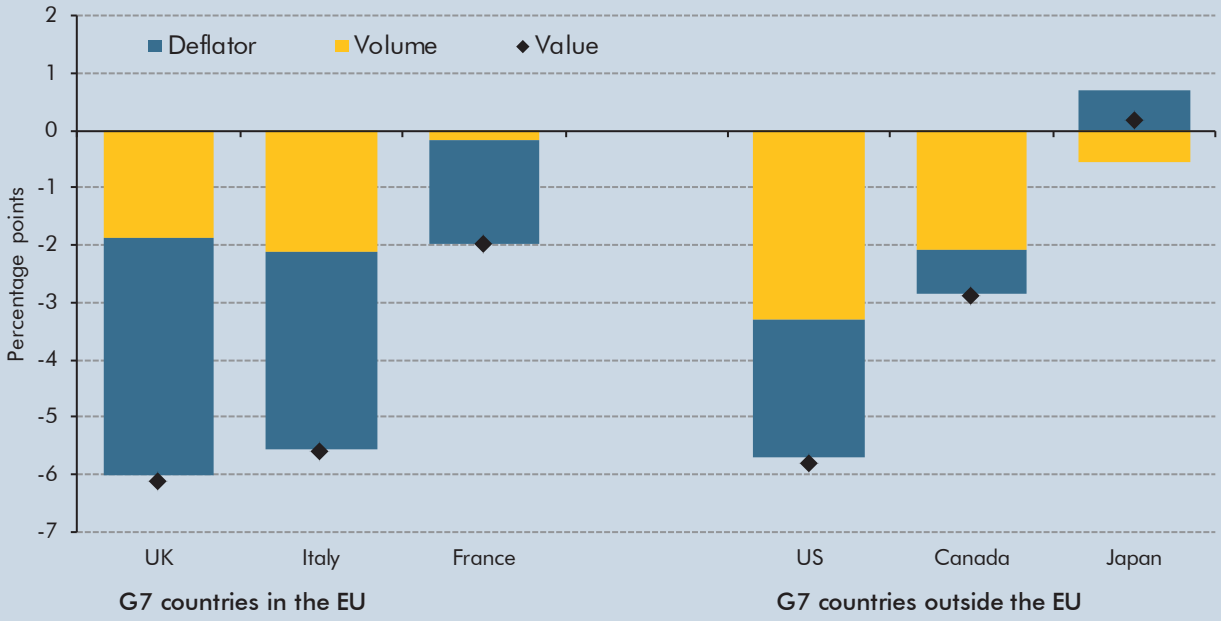
Methodologies for deriving the government consumption deflator vary across countries. Studies by the ONS[a] and OECD[b] suggest that non-EU countries tend to depend more on actual deflators and EU countries on implied deflators. That suggests that the effect of cuts in government consumption would be seen in the deflator to a greater extent in the UK and other EU countries than in non-EU countries.

Chart C shows how average annual growth in the value of six leading industrial countries'[c] government consumption since the third quarter of 2010 has changed relative to pre-recession averages (2000-2008). Growth in the value of government consumption is weaker in every country (bar Japan) than prior to the crisis. As we would expect, given the difference in deflator methodologies, lower deflator growth accounts for a greater proportion of cuts in the UK and other EU countries, while slower volume growth plays a bigger role in the non-EU countries. At the extremes, 90 per cent of the reduction in value growth has come via the deflator in France while 71 per cent came through volumes in Canada.

These differences in National Accounts methodologies may be important when considering international comparisons of the direct effect of government spending cuts on real GDP growth.

But comparisons in value terms should be less affected by such differences. In Box 3.3 of our November *EFO*, we showed that the planned cut in government consumption as a share of GDP in the UK would be the biggest ten-year fall seen in any G7 country in the past half century, according to OECD data dating back to 1960.

Chart C: Government consumption compared to pre-recession averages



Source: OECD

[a] Office for National Statistics, *Government implied deflators explained*, November 2014.
[b] OECD Working Paper, *Towards measuring the volume output of education and health services: A handbook*, April 2010.
[c] These are six of the seven members of the G7. Germany has not been included as growth in the value and volume of government consumption in Germany since mid-2010 has been greater than the pre-recession averages.

General government employment

3.104 In the absence of specific workforce plans, we project general government employment based on some simple and transparent assumptions. We begin by assuming that the total paybill will grow in line with a measure of current government spending. We also separately forecast government sector wage growth, taking into account recent data, stated government policy (such as limits on pay growth), historic rates of pay drift and whole economy earnings growth over the medium term. We then combine total and average pay growth to derive a projection of general government employment.

3.105 Slow growth in cash spending and low annual wage growth imply that general government employment will fall by 0.2 million between the first quarter of 2015 and the first quarter of 2021, leading to a total fall from early 2011 of 0.5 million.[14] We expect the fall to be more than offset by a rise in market sector employment.

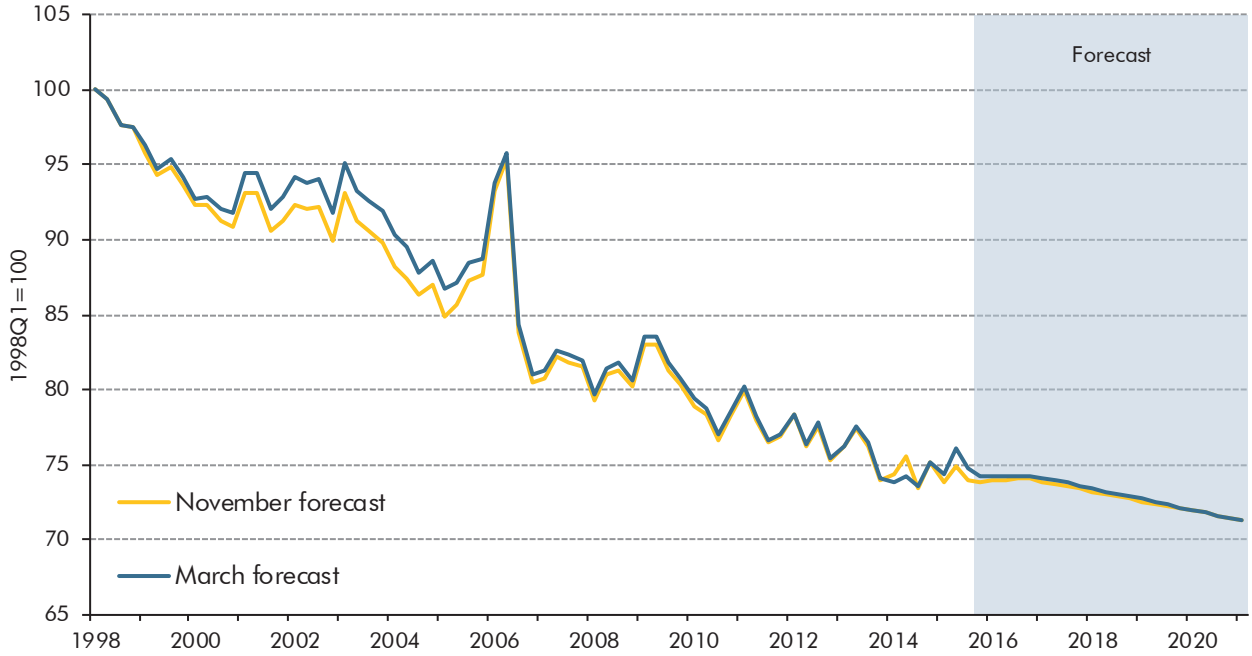
[14] These estimates exclude a classification change introduced in the second quarter of 2012, which moved around 196,000 employees from the public to the private sector. Further details about the assumptions for the public sector wages and employment can be found in the supplementary economy tables available on our website.

The external sector

Exports and imports

3.106 The latest National Accounts data revised up exports growth in late 2014 and early 2015 relative to the outturn data available at the time of our November forecast. Exports are then estimated to have fallen the final two quarters of 2015, having been expected to rise in November. Exports are estimated to have grown by 5.0 per cent in 2015, higher than we forecast in November, despite the weaker outturn data in the second half of the year. From 2016 onwards, we have revised down our forecast for exports to reflect a downward revision to UK export markets. Our key judgement – that the downward trend in UK export market share continues over the forecast period – is unchanged from November.

Chart 3.35: UK export market share



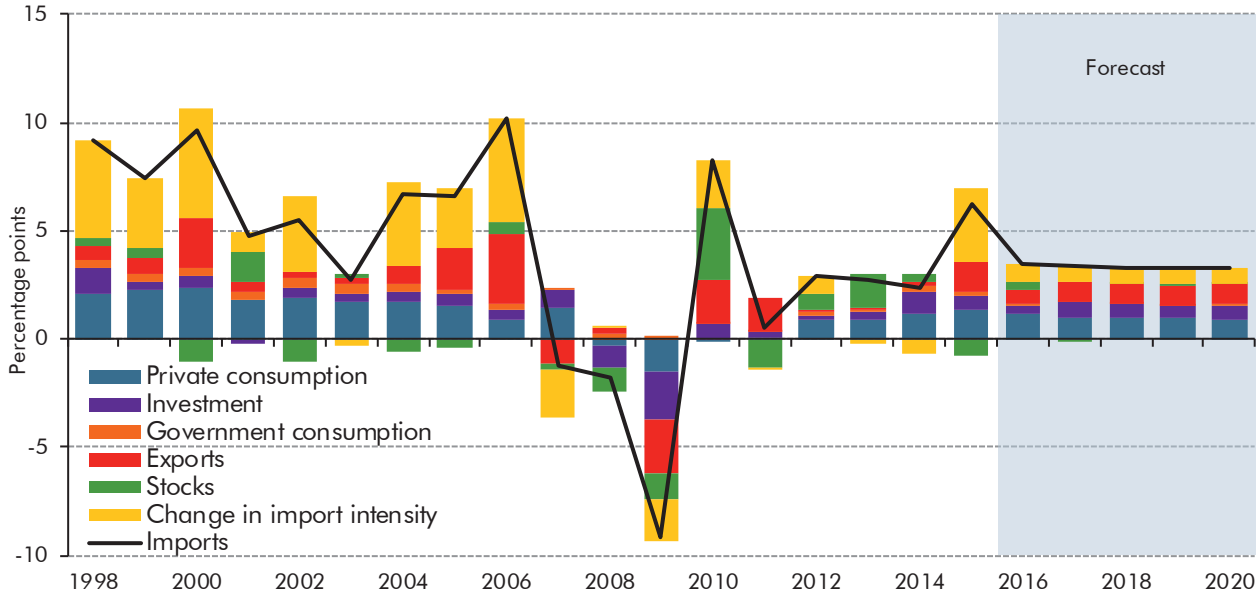
Note: UK export share defined as exports divided by UK export markets, where exports series have been adjusted to account for the effect of VAT Missing Trader Intra Community (MTIC) fraud, although there is uncertainty around MTIC data prior to 2007.
Source: OECD, ONS, OBR

3.107 At Budget 2012, the Government stated an aspiration to increase the cash value of exports to £1 trillion in 2020. That required export growth of £506 billion over nine years, whereas extending our March 2012 *EFO* forecast would have implied growth of £352 billion (see Box 3.4 of our November *EFO*). We now forecast that the value of total exports of goods and services will reach £643 billion in 2020, lower than we forecast in November and 36 per cent lower than the Government's aspiration.

3.108 Real imports are estimated to have grown by 6.2 per cent in 2015, significantly higher than we forecast in November. As with exports, this was driven by upward revisions to imports growth in late 2014 and early 2015.

3.109 Our forecast for UK imports is determined by the outlook for import-weighted domestic demand and a trend rise in the import intensity of that demand. We have not changed our judgement of the extent to which import intensity will rise over the forecast period. As Chart 3.36 shows, the contribution of rising import intensity to imports growth averaged 3.1 percentage points between 1998 and 2006, but it added just 0.2 percentage points to imports growth on average between 2007 and 2015. Our forecast assumes an average contribution of 0.8 percentage points between 2016 and 2020.

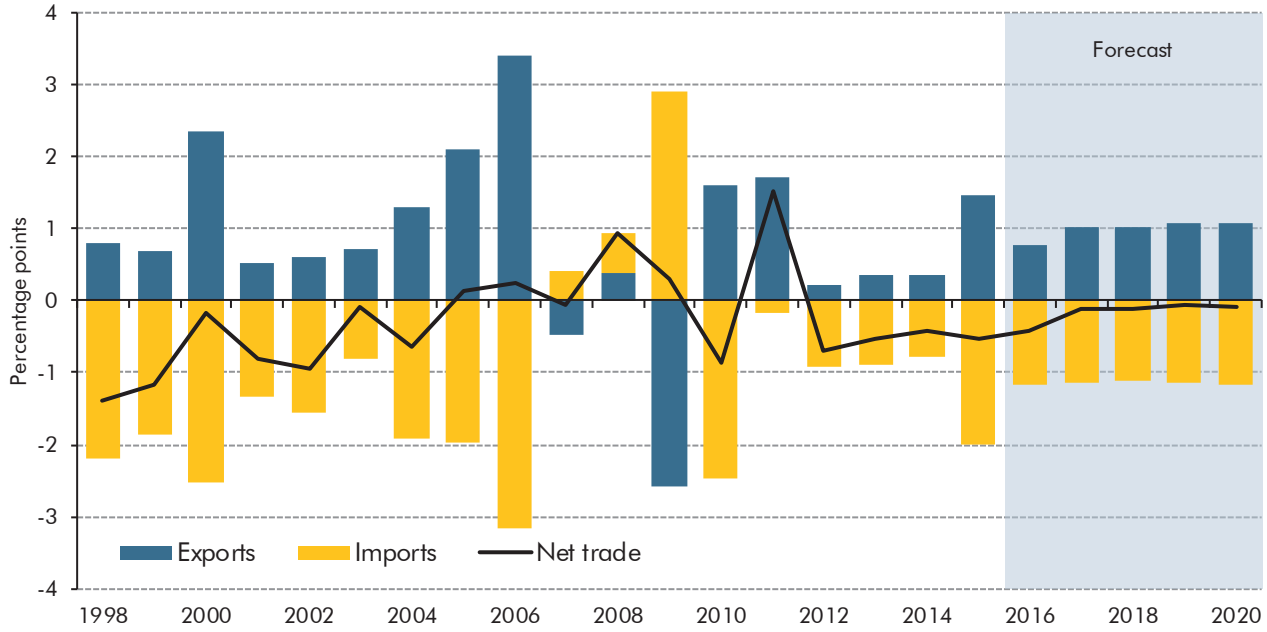
Chart 3.36: Contributions to import-weighted domestic demand and imports growth



Source: ONS, OBR

3.110 Net trade is estimated to have made a negative contribution to GDP growth in 2015, having been expected to make a positive contribution at the time of our November forecast. This change reflects an upward revision to imports growth, which is larger than the upward revision to exports. We expect net trade to subtract 0.4 percentage points from GDP growth in 2016, and 0.1 percentage points a year from 2017 onwards. Our net trade forecast reflects the weakness of export market growth, a gradual decline in export market share and a gradual increase in the ratio of imports to import-weighted domestic demand.

Chart 3.37: Net trade contribution to real GDP



Source: ONS, OBR

The current account balance

3.111 The latest data continue to indicate that the current account deficit widened significantly in recent years, reaching 5.1 per cent of GDP in 2014. However, recent data on foreign direct investment (FDI) may reduce this deficit when they are incorporated into the balance of payments.[15] Nevertheless the deficit in recent years remains large by historical standards, mainly as a result of a significant deterioration in the UK's net investment income balance: the income balance fell into deficit in 2013 and 2014 as the UK's net rate of return deteriorated, having averaged a surplus of just over 1 per cent of GDP in the decade prior to 2012.

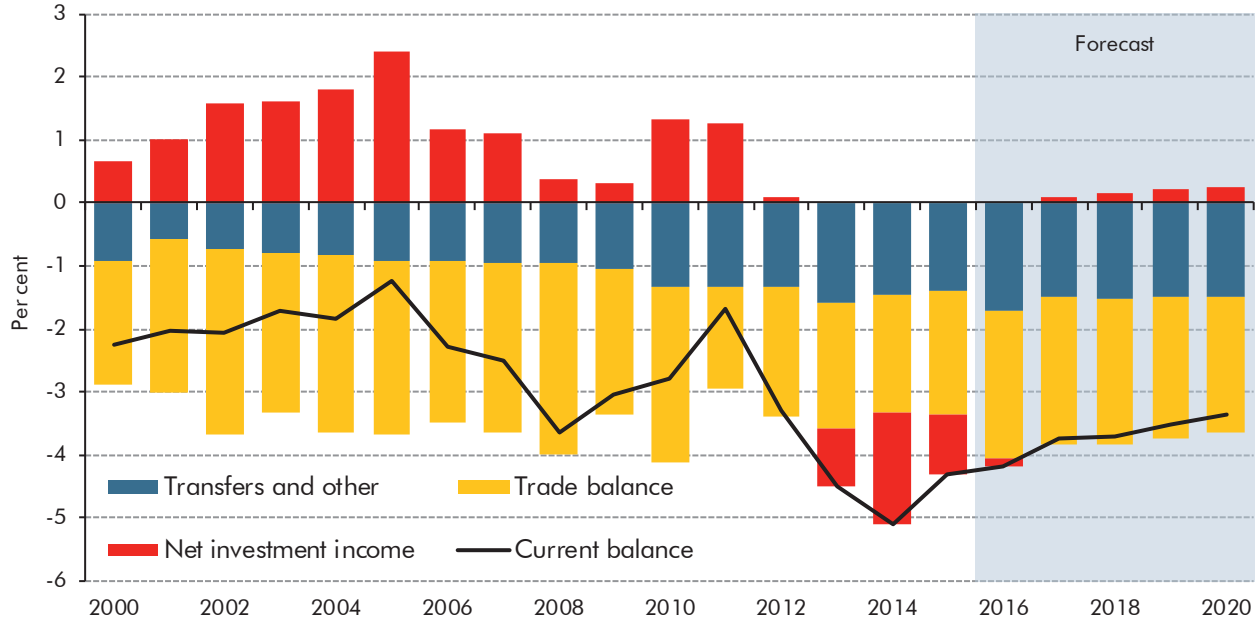
3.112 Recent quarterly data signal an improvement in the investment income balance, with the deficit narrowing from 2.4 per cent of GDP in the final quarter of 2014 to 0.7 per cent in the third quarter of 2015. We expect the investment income balance to continue to improve as rates of return normalise, a judgement conditioned on the assumption that the recent deterioration is partly temporary – reflecting, for example, the weaker growth outlook in the euro area or the possible effect of cross-border fines and compensation paid by UK firms abroad (although this is not verifiable from published data).

3.113 Despite the improvement in investment income, we expect the current account deficit to remain relatively large through the forecast as the trade deficit is expected to remain broadly stable. The current account deficit is expected to reach just over 3¼ per cent of GDP by 2020, a somewhat larger deficit than we expected in November, as a wider-than-expected trade deficit in the second half of 2015 has led to an upward revision to the size of the trade deficit through the forecast period.

[15] ONS, *Coherence between balance of payments Q3 2015 and the FDI 2014 bulletin*, December 2015.

3.114 The latest outturn trade data have a significant impact on the implied terms of trade, particularly in 2016. The terms of trade are now expected to fall in 2016, having been expected to rise relatively strongly in our November forecast. This affects the level of nominal GDP throughout the forecast period.

Chart 3.38: Current account balance as a share of GDP



Source: ONS, OBR

3.115 Table 3.5 shows how our forecast of the current account balance has changed since November:

- the increase in the current account deficit is almost entirely accounted for by an increase in our forecast of the trade deficit. This largely reflects a wider than expected trade deficit at the end of 2015. With little change to our forecast of net trade, this implies a wider trade deficit throughout the forecast period; and
- revisions to the investment income and transfers balance have been relatively small.

Table 3.5: Changes to the current account since November

	Current account (£ billion)						
	Outturn	Forecast					
	2014	2015	2016	2017	2018	2019	2020
November forecast	-92.9	-78.6	-58.9	-49.6	-50.7	-49.5	-48.6
March forecast	-92.5	-80.5	-80.3	-75.1	-77.0	-76.0	-76.1
Change	**0.4**	**-1.9**	**-21.4**	**-25.5**	**-26.4**	**-26.5**	**-27.5**
of which:							
Trade balance	0.1	-9.3	-21.8	-23.1	-24.4	-25.6	-26.5
Volumes	-1.1	-11.1	-13.8	-15.2	-15.8	-16.2	-16.8
Prices	1.2	1.8	-8.0	-7.9	-8.6	-9.3	-9.8
Investment income balance	0.2	5.3	2.5	-0.5	0.0	0.6	0.9
Transfers and other	0.1	2.1	-2.2	-1.9	-1.9	-1.6	-1.8

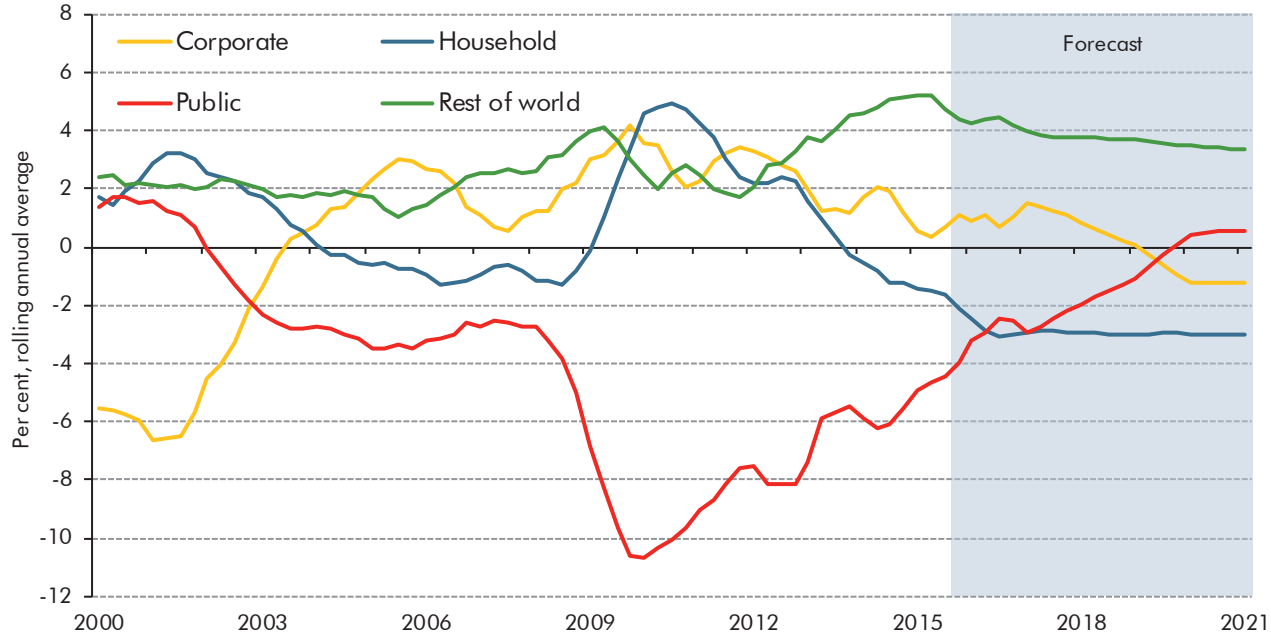
Sectoral net lending

3.116 In the National Accounts framework that we use for our economic forecast, the income and expenditure of the different sectors imply a path for each sector's net lending or borrowing from others. By identity, these must sum to zero – for each borrower, there must be a lender. In 2015, for which three quarters of data are now available, we estimate that the public and household sectors are in deficit, while the corporate and rest of world sectors are in surplus (Chart 3.39).

3.117 On current government policy we expect the public sector deficit to narrow, offset by a narrowing of the rest of the world surplus (a narrowing current account deficit) and a widening of the corporate deficit. We forecast little change in the household deficit, which is expected to remain around 3 per cent of GDP through the forecast period. The persistence of a household deficit of this size would be unprecedented in the latest available historical data, which extend back to 1987. Other datasets extending back to 1963 also suggest little evidence of a large, persistent household deficit, with the household surplus moving into negative territory in only one year between 1963 and 1987.[16] A household deficit of the size and persistence we expect over the forecast period might be considered consistent with the unprecedented scale of the fiscal consolidation and the extremely accommodative monetary policy upon which our forecast is conditioned. It nevertheless demonstrates that the adjustment to the fiscal consolidation is subject to very significant uncertainty, and alternative adjustment paths are quite possible (see paragraph 3.119).

[16] Based on historical estimates of the personal sector surplus on an ESA95 basis, as set out in Thomas, R. and Nolan, L., *National Accounts articles: Historical estimates of financial accounts and balance sheets*, January 2016.

Chart 3.39: Sectoral net lending



Source: ONS, OBR

Risks and uncertainties

3.118 As always, we emphasise the uncertainties that lie around our central forecast for the economy, and the implications that these can have for the public finances (see Chapter 5). There are some risks and uncertainties common to all forecasts: conditioning assumptions may prove inaccurate; shocks may prove asymmetric; and previously stable relationships that have described the functioning of the economy may change.

3.119 In addition, prevailing economic circumstances suggest some specific risks to the forecast. In this *EFO*, we would highlight:

- since November, **volatility in financial and commodity markets** has increased. If this persists it could have a negative effect on the UK economy via financial markets linkages and world trade;

- the IMF recently identified a sharper-than-expected **slowdown in China** as a risk to its global forecast. Although direct trade with China accounts for only 3.6 per cent of UK exports, China's contribution to world GDP and trade growth is significant and its increasing integration in global financial markets means that lower growth in China could have wider implications;

- we have revised down our forecast for potential output growth since November, but considerable uncertainty remains around this part of the forecast. If **productivity** fails to recover as predicted, but wage growth continues to accelerate, the MPC could be forced to raise interest rates more quickly, which could in turn have a negative impact on consumer spending and housing investment. Alternatively, lower productivity

growth could mean that wage growth falls short of expectations, in a similar manner to the revisions we have made in this forecast;

- even in our central forecast, the ratio of **households' gross debt** to income rises significantly over the forecast. That seems consistent with supportive monetary policy and other interventions to support demand in the housing market (to which the Government has added again in this Budget via the first-time buyer element of the lifetime ISA), but it could pose risks to the recovery over the longer term;

- our forecast assumes that the decline in public sector net borrowing is offset in a widening corporate deficit and a modest improvement in the current account. Some external commentators argue that the prospective path of the sectoral balances points to the risk of a **significant depreciation of sterling**; and

- whatever the long-term pros or cons of the UK's membership of the European Union, a vote to leave in the **forthcoming referendum** could usher in an extended period of uncertainty regarding the precise terms of the UK's future relationship with the EU. This could have negative implications for activity via business and consumer confidence and might result in greater volatility in financial and other asset markets (see Box 3.4).

Box 3.4: External analysis of 'Brexit' risks and uncertainties

The Government has announced that a referendum will be held on 23 June to determine whether the UK should remain a member of the European Union (EU) – and the Government is arguing that it should. Parliament has told us to prepare our forecasts on the basis of the current policy of the current Government and not to consider alternatives. So it is not for us to judge at this stage what the impact of 'Brexit' might be on the economy and the public finances.

Outside analysts have of course addressed this question. For example, a study published by the Centre for Economic Performance estimates that leaving the EU would result in lower trade and therefore lower GDP. It presents a 'pessimistic' scenario where incomes could fall by close to 10 per cent.[a] Conversely, a study published by the Institute of Economic Affairs argues that leaving the EU could increase UK GDP by 13 per cent.[b] The range of estimates in part reflects sensitivity to assumptions about what exactly would replace the current rules that are attached to EU membership. That was also apparent in the views presented at the National Institute of Economic and Social Research conference on the 'Economics of the UK's EU Membership' last month.[c]

These estimates are as large as they are in part because they incorporate 'dynamic' effects, reflecting for example long-term changes in UK productivity. As well as being highly uncertain, these take many years to materialise, with IMF research suggesting that it takes around 10 years for half the effect of changes in the trade share of GDP to be seen in income levels.[d] So even if we were to base our central forecast on an assumption of 'Brexit', the full impact would not show up within our five-year forecast horizon. A study by Open Europe modelled a scenario in which the UK leaves the EU in 2018 and found that GDP could be 2.2 per cent lower or 1.6 per cent higher by 2030, depending on the arrangements for trade and regulation that follow 'Brexit'.[e] It argued that much of the transition to either of these levels would take place beyond 2020.

Leaving aside the debate over the long-term impact of 'Brexit', there appears to be a greater consensus that a vote to leave would result in a period of potentially disruptive uncertainty while the precise details of the UK's new relationship with the EU were negotiated. For example:

- **Goldman Sachs** expects that delayed business investment spending would have a "*significantly negative*" impact on UK growth;[f]
- a **JPMorgan** study uses a VAR model to estimate that the uncertainty following a 'leave' vote could cause a 1 percentage point reduction in GDP growth in 2016.[g] **Deutsche Bank** predict a similar effect on GDP growth in the two-to-three years after a vote to leave;[h]
- **Scotiabank** predicts that GDP growth could slow by 2 to 5 per cent over a one-to-two-year horizon, due to a "*sharp drop*" in consumer confidence and lower consumption;[i]
- **Bloomberg Intelligence** modelled a fall in demand of 1.5 per cent of GDP, accompanied by an increase in credit spreads and a sterling depreciation. It argued that Bank Rate would be lower over our forecast period, with inflation higher initially but lower by the end of our forecast due to a persistent negative output gap;[j] and
- a number of forecasters suggest that uncertainty could lead to a significant sterling depreciation (especially given the UK's large current account deficit). **Nomura** estimate that sterling could depreciate by between 10 and 15 per cent following a vote to leave.[k]

There were only tentative signs that uncertainty regarding the referendum result was affecting business and consumer confidence and spending intentions by the time we closed this forecast.[l] But it may have contributed to recent financial market movements (and thus to some of the conditioning assumptions that underpin it). For example, sterling fell to a 7-year low against the dollar shortly after the date of the referendum was announced. That period fell within the 10-day window over which we have averaged market assumptions for this forecast.

[a] Centre for Economic Performance, *The costs and benefits of leaving the EU*, May 2014.
[b] Institute of Economic Affairs, *Should Britain leave the EU? An economic analysis of a troubled relationship*, February 2016.
[c] NIESR conference summary: *Economics of the UK's EU Membership*, held in February 2016.
[d] IMF working paper, *The long-run effects of trade on income and income growth*, February 2003.
[e] Open Europe, *What if…? The consequences, challenges and opportunities facing Britain outside the EU*, March 2015.
[f] Goldman Sachs Economics Research, *Brexit: The uncertainty shock of leaving the EU*, March 2016.
[g] JPMorgan Economic Research, *Brexit: What impact might uncertainty have on UK GDP?*, February 2016.
[h] Deutsche Bank Research, *The UK & EU: Exit emergency*, February 2016.
[i] Scotiabank, *Brexit – market and economic impact*, February 2016.
[j] Bloomberg Intelligence, *Brexit special: Modeling a surprise exit*, February 2016.
[k] Nomura Economic Insights, *Brexit carries a recessionary risk*, February 2016.
[l] Investment intentions in the latest EEF *Manufacturing outlook* were at a six-year low, with the EU referendum cited as a possible cause.

Comparison with external forecasters

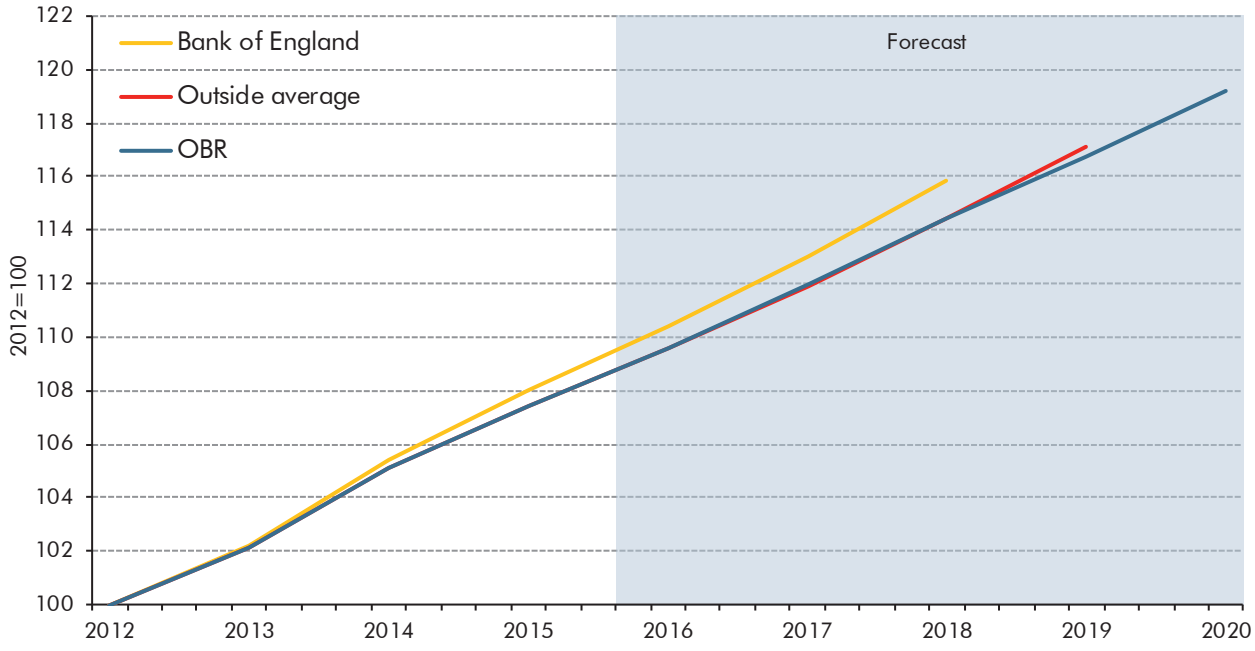
3.120 In this section, we compare our latest projections with those of selected outside forecasters. The differences between our forecast and those of external forecasters are generally small compared with the uncertainty that surrounds any one of them.

Comparison with the Bank of England's *Inflation Report* forecast

3.121 Alongside its February 2016 *Inflation Report*, the Bank of England published additional information about its forecast against which we can compare our own (see Table 3.6). This included the Bank staff's forecasts for the expenditure composition of GDP, consistent with the MPC's central forecasts of GDP, CPI inflation and the unemployment rate.

3.122 The MPC's modal forecast for GDP growth is 2.2 per cent in 2016, higher than our forecast due to stronger growth in private consumption and business investment, as well as a less negative contribution from net trade. The Bank's modal forecast is also higher than ours in 2017 and 2018, primarily due to stronger consumption growth in both years. The Bank's forecast for the level of GDP is 0.9 per cent higher than ours in 2017, the same as at the time of our last forecast in November.

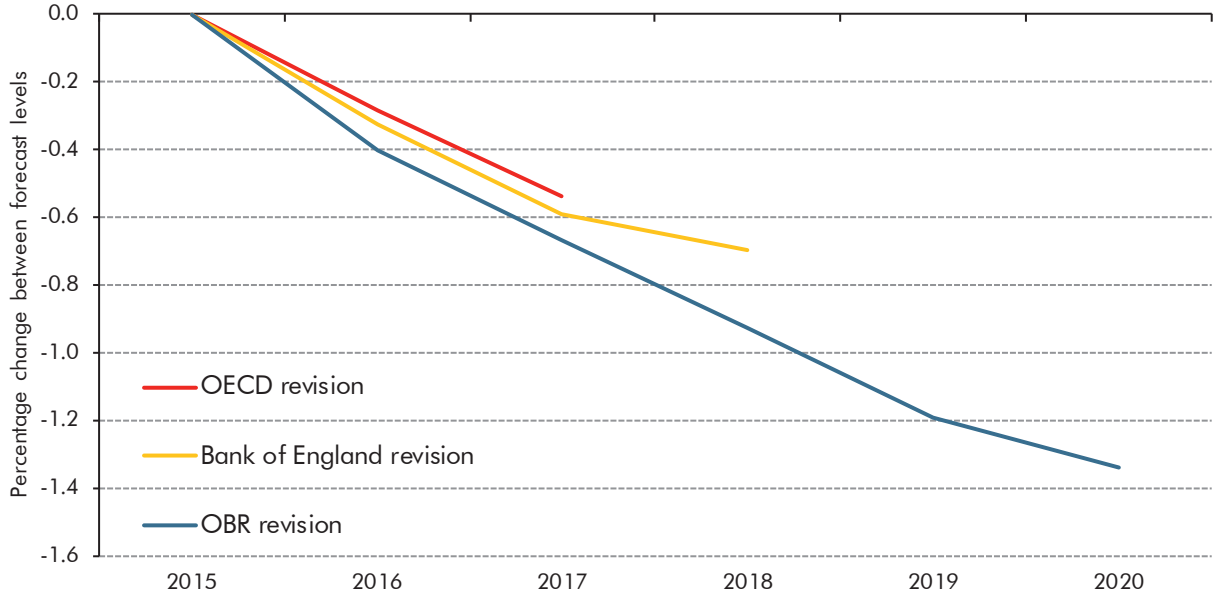
Chart 3.40: Comparison of forecasts for the level of GDP projections



Source: Bank of England, HM Treasury, ONS, OBR

3.123 While remaining more optimistic than us and the average of external forecasts, the MPC's best collective judgement on the implications of news since November has led them to revise down cumulative real GDP growth over their 3-year forecast horizon. These revisions are similar to the changes in our forecast since November. The OECD has also revised down its forecast for GDP growth in 2016 and 2017 (Chart 3.41).

Chart 3.41: Comparison with Bank of England and OECD revisions to real GDP since November



Note: All revisions are calculated on an annual basis.
Source: Bank of England, OECD, OBR calculations

Table 3.6: Comparison with the Bank of England's illustrative projections

	Per cent			
	2015[1]	2016	2017	2018
Bank of England February *Inflation Report* forecast				
Household consumption	2¾	2¾	2½	2¾
Business investment	6½	5½	6	6¼
Housing investment[2,3]	2¼	4	5½	5¾
Exports	5½	2¼	1¼	2
Imports	6¼	2½	2¼	2½
Employment[4]	2	¾	¾	¾
Productivity[5]	1	1¼	1¾	1¾
Average weekly earnings[3,4]	1¾	3	3¾	4¼
Difference from OBR forecast				
Household consumption	-0.1	0.3	0.3	0.6
Business investment	1.8	2.9	-0.1	0.4
Exports	0.5	-0.3	-2.1	-1.3
Imports	0.0	-1.0	-1.1	-0.8
Employment[4]	0.3	0.1	0.3	0.4
Productivity[5]	0.2	0.2	0.0	-0.3

[1] 2015 estimates contain a combination of data and projections.
[2] Whole economy measure. Includes transfer costs of non-produced assets.
[3] We have not shown a comparison for housing investment and average weekly earnings as the definitions of these variables differ and are therefore not directly comparable.
[4] Four-quarter growth rate in Q4.
[5] Output per hour.

Comparison with other external forecasters

3.124 In its most recent *World economic outlook*, the **IMF**'s forecast for GDP growth was slightly above our central forecast in 2016 and in line with ours in 2017. Since publishing its most recent *Economic outlook*, the **OECD** has updated its short-term forecast for GDP growth. The OECD's updated forecast is slightly above ours in 2016 and slightly below it in 2017. In its February *Economic review*, the **National Institute for Economic and Social Research** (NIESR) forecast GDP growth of 2.3 per cent in 2016, higher than our forecast. NIESR forecast stronger consumption and investment growth in 2016, partly offset by a weaker forecast for net trade. NIESR's forecast for GDP growth is also higher than ours from 2017 onwards, with a positive contribution from net trade only partially offset by lower consumption growth. The **European Commission**'s forecast for GDP growth is slightly higher than ours in 2016, due to higher growth in private consumption, government consumption and investment, partly offset by negative contributions from inventories and net trade. The Commission forecast for 2017 is slightly lower than ours, with higher private consumption growth offset by lower government consumption growth.

Table 3.7: Comparison with external forecasters

	Per cent					
	2014	2015	2016	2017	2018	2019
OBR (March 2016)						
GDP growth	2.9	2.2	2.0	2.2	2.1	2.1
CPI inflation	1.5	0.0	0.7	1.6	2.0	2.1
Output gap	-1.0	-0.3	-0.2	0.0	0.0	0.0
Oxford Economics (February 2016)						
GDP growth	2.9	2.2	2.2	2.5	2.2	2.2
CPI inflation	1.5	0.0	0.5	1.7	1.8	1.9
Output gap	-2.9	-2.8	-2.7	-2.5	-2.4	-2.2
Bank of England (February 2016)[1,2]						
GDP growth (mode)		2.5	2.2	2.4	2.5	
CPI inflation (mode)[3]		0.1	0.9	1.9	2.2	
European Commission (February 2016)						
GDP growth	2.9	2.3	2.1	2.1		
CPI inflation	1.5	0.0	0.8	1.6		
Output gap	-0.6	0.0	0.3	0.7		
NIESR (February 2016)[1]						
GDP growth	2.9	2.2	2.3	2.7	2.7	2.5
CPI inflation	1.4	0.1	0.3	1.3	2.1	2.2
OECD (November 2015)[4]						
GDP growth	2.9	2.4	2.4	2.3		
CPI inflation	1.5	0.1	1.5	2.0		
Output gap	-0.5	0.0	0.4	0.8		
IMF (October 2015)[5]						
GDP growth	3.0	2.5	2.2	2.2	2.2	2.2
CPI inflation	1.5	0.1	1.5	2.0	2.0	2.0
Output gap	-1.4	-0.7	-0.4	-0.2	-0.1	0.0

[1] Output gap not published.

[2] Forecast based on market interest rates and the Bank of England's 'backcast' for GDP growth.

[3] Fourth quarter year-on-year growth rate.

[4] The OECD has since published its February 2016 *Interim economic outlook* . For the UK, GDP growth was revised down to 2.1 per cent in 2016 and 2.0 per cent in 2017.

[5] The IMF updated its short-term forecast in the January 2016 *World economic outlook update*. For the UK, GDP growth was revised down to 2.2 per cent in 2015. Growth in 2016 and 2017 were unrevised, also at 2.2 per cent.

Table 3.8: Detailed summary of forecast

	Percentage change on a year earlier, unless otherwise stated						
	Outturn	Forecast					
	2014	2015	2016	2017	2018	2019	2020
UK economy							
Gross domestic product (GDP)	2.9	2.2	2.0	2.2	2.1	2.1	2.1
GDP level (2014=100)	100.0	102.2	104.3	106.6	108.9	111.1	113.5
Nominal GDP	4.7	2.6	3.1	4.1	4.1	4.0	4.1
Output gap (per cent of potential output)	-1.0	-0.3	-0.2	0.0	0.0	0.0	0.0
Expenditure components of GDP							
Domestic demand	3.2	2.7	2.2	2.3	2.2	2.0	2.0
Household consumption[1]	2.5	2.9	2.4	2.2	2.1	2.0	1.9
General government consumption	2.5	1.7	0.2	0.6	0.5	0.2	0.7
Fixed investment	7.3	4.2	2.9	4.5	4.1	4.0	4.3
Business	4.7	4.7	2.6	6.1	5.8	5.5	4.4
General government[2]	5.8	2.2	0.2	1.9	-0.3	-0.2	6.5
Private dwellings[2]	14.0	3.4	5.1	2.8	3.0	3.0	2.9
Change in inventories[3]	0.2	-0.4	0.2	0.0	0.0	0.0	0.0
Exports of goods and services	1.2	5.0	2.5	3.3	3.3	3.4	3.4
Imports of goods and services	2.4	6.2	3.5	3.3	3.3	3.3	3.3
Balance of payments current account							
Per cent of GDP	-5.1	-4.3	-4.2	-3.8	-3.7	-3.5	-3.4
Inflation							
CPI	1.5	0.0	0.7	1.6	2.0	2.1	2.0
RPI	2.4	1.0	1.7	2.4	3.2	3.2	3.2
GDP deflator at market prices	1.8	0.3	1.1	1.9	2.0	1.9	2.0
Labour market							
Employment (millions)	30.7	31.2	31.6	31.7	31.9	32.0	32.1
Productivity per hour	0.1	0.8	1.0	1.7	2.0	2.0	2.0
Wages and salaries	2.9	4.1	3.6	4.2	3.9	3.8	3.9
Average earnings[4]	1.4	2.3	2.6	3.6	3.5	3.4	3.6
LFS unemployment (% rate)	6.2	5.4	5.0	5.0	5.2	5.3	5.3
Claimant count (millions)	1.04	0.80	0.75	0.78	0.84	0.86	0.87
Household sector							
Real household disposable income	0.6	2.9	1.8	1.9	1.6	1.5	1.5
Saving ratio (level, per cent)	5.4	4.2	3.3	3.6	3.7	3.9	3.9
House prices	9.9	6.8	6.9	4.2	5.0	4.7	3.9
World economy							
World GDP at purchasing power parity	3.4	3.1	3.3	3.5	3.8	3.9	3.9
Euro area GDP	0.9	1.5	1.6	1.6	1.6	1.6	1.6
World trade in goods and services	3.5	2.4	3.0	3.6	4.2	4.3	4.3
UK export markets[5]	3.9	4.1	3.4	3.9	4.4	4.5	4.5

[1] Includes households and non-profit institutions serving households.

[2] Includes transfer costs of non-produced assets.

[3] Contribution to GDP growth, percentage points.

[4] Wages and salaries divided by employees.

[5] Other countries' imports of goods and services weighted according to the importance of those countries in the UK's total exports.

Table 3.9: Detailed summary of changes to the forecast

	Percentage change on a year earlier, unless otherwise stated						
	Outturn	Forecast					
	2014	2015	2016	2017	2018	2019	2020
UK economy							
Gross domestic product (GDP)	-0.1	-0.1	-0.4	-0.3	-0.3	-0.3	-0.2
GDP level (2014=100)[1]	0.0	-0.1	-0.5	-0.8	-1.0	-1.3	-1.5
Nominal GDP	0.0	-1.1	-0.9	-0.2	-0.2	-0.4	-0.4
Output gap (per cent of potential output)	0.0	0.4	0.2	0.2	0.0	0.0	0.0
Expenditure components of GDP							
Domestic demand	0.0	0.4	-0.4	-0.2	-0.2	-0.3	-0.3
Household consumption[2]	-0.2	0.0	-0.2	-0.1	-0.2	0.0	0.1
General government consumption	0.6	0.0	-0.3	0.0	0.1	-0.3	-0.4
Fixed investment	-0.3	0.0	-2.5	-0.6	-0.6	-1.0	-0.5
Business	0.1	-1.3	-4.9	-1.0	-1.2	-1.1	-0.1
General government[3]	-1.8	-0.8	-0.6	1.3	1.3	-1.9	-2.7
Private dwellings[3]	-0.2	3.2	1.3	-0.6	-0.1	0.0	-0.1
Change in inventories[4]	-0.1	0.5	0.2	0.0	0.0	0.0	0.0
Exports of goods and services	-0.6	1.7	-0.9	-0.2	-0.2	-0.2	-0.2
Imports of goods and services	-0.4	3.4	-0.4	0.0	-0.2	-0.2	-0.2
Balance of payments current account							
Per cent of GDP	0.0	-0.1	-1.2	-1.3	-1.3	-1.3	-1.3
Inflation							
CPI	0.0	0.0	-0.3	-0.2	0.1	0.1	0.0
RPI	0.0	0.0	-0.3	-0.5	0.0	0.0	-0.1
GDP deflator at market prices	0.1	-0.9	-0.5	0.0	0.1	-0.1	-0.2
Labour market							
Employment (millions)	0.0	0.1	0.1	0.0	0.0	0.0	0.0
Productivity per hour	-0.1	-0.2	-0.5	-0.2	-0.1	-0.2	-0.2
Wages and salaries	-0.1	-0.3	-0.9	-0.3	-0.3	-0.3	-0.4
Average earnings[5]	-0.1	-0.3	-0.7	-0.1	-0.1	-0.3	-0.3
LFS unemployment (% rate)	0.0	-0.1	-0.2	-0.2	-0.1	-0.1	-0.1
Claimant count (millions)	0.00	0.00	-0.03	-0.03	-0.02	-0.01	-0.01
Household sector							
Real household disposable income	0.9	-0.5	-0.7	-0.2	-0.2	-0.1	-0.3
Saving ratio (level, per cent)	0.5	0.1	-0.8	-0.8	-0.7	-0.6	-0.8
House prices	0.0	0.6	2.1	-0.4	-0.3	-0.3	-0.4
World economy							
World GDP at purchasing power parity	0.0	0.0	-0.3	-0.3	-0.1	0.0	0.0
Euro area GDP	0.0	0.0	-0.1	0.0	0.0	0.0	0.0
World trade in goods and services	0.2	-0.6	-0.5	-0.3	-0.1	-0.1	-0.1
UK export markets[6]	0.1	0.0	-0.2	-0.2	-0.2	0.0	0.0

[1] Per cent change since November.

[2] Includes households and non-profit institutions serving households.

[3] Includes transfer costs of non-produced assets.

[4] Contribution to GDP growth, percentage points.

[5] Wages and salaries divided by employees.

[6] Other countries' imports of goods and services weighted according to the importance of those countries in the UK's total exports.

4 Fiscal outlook

Introduction

4.1 This chapter:

- sets out the key **economic and market determinants** that drive the fiscal forecast (from paragraph 4.3);
- explains the **effects of new policies** announced in this Budget – and since the November Spending Review and Autumn Statement – on the fiscal forecast (from paragraph 4.5);
- describes the **outlook for public sector receipts**, including a tax-by-tax analysis explaining how the forecasts have changed since November (from paragraph 4.21);
- describes the **outlook for public sector expenditure**, focusing on spending covered by departmental expenditure limits and the components of annually managed expenditure, including those subject to the Government's welfare cap (from paragraph 4.87);
- describes **the outlook for government lending to the private sector and other financial transactions**, including asset sales (from paragraph 4.150);
- describes the **outlook for the key fiscal aggregates**: headline and structural measures of public sector net borrowing and the current budget, and public sector net debt (from paragraph 4.172);
- summarises **risks and uncertainties** (paragraph 4.187); and
- provides a **comparison with forecasts from international organisations** (from paragraph 4.188).

4.2 Further breakdowns of receipts and expenditure and other details of our fiscal forecast are provided in the supplementary tables on our website. The medium-term forecasts for the public finances in this chapter start from outturn 2014-15 data.[1] We then present an in-year estimate for 2015-16 that makes use of published Office for National Statistics (ONS) outturn data for April to January and some administrative receipts data for February,

[1] Outturn data for 2014-15 are consistent with the *Public Sector Finances January 2016 Statistical Bulletin* (released in February) published by the ONS and HM Treasury.

followed by forecasts for 2016-17 to 2020-21. As in previous *Economic and fiscal outlooks (EFOs),* this fiscal forecast:

- **represents our central view** of the path of the public finances, conditioned on the current policies and policy assumptions of the Government. On that basis, we believe that the outturns – which will be affected by any errors in our forecast assumptions or future Government policy changes – are as likely to be above the forecast as below it;

- is **based on announced Government policy** on the indexation of rates, thresholds and allowances for taxes and benefits, and incorporates certified costings for all new policy measures announced by the Chancellor in the Budget; and

- **focuses on official 'headline' fiscal aggregates** that exclude public sector banks.

Economic determinants of the fiscal forecast

4.3 Our fiscal forecasts are based on the economic forecasts presented in Chapter 3. Most economic forecasts focus on the outlook for real GDP, but it is nominal GDP that matters most when forecasting the public finances. Forecasts of tax receipts are particularly dependent on the profile and composition of economic activity. On the income side, labour income is generally taxed more heavily than company profits. On the expenditure side, consumer spending is subject to VAT and other indirect taxes while business investment attracts capital allowances that reduce corporation tax receipts in the short term. And while around half of public sector expenditure is set out in multi-year plans, large elements (such as social security and debt interest payments) are linked to developments in the economy – notably inflation, market interest rates and the labour market.

4.4 Table 4.1 sets out some of the key economic determinants of the fiscal forecast. Table 4.2 shows how these have changed since our November forecast. Detailed descriptions of these forecasts and changes are provided in Chapter 3. In summary:

- **nominal GDP** is forecast to grow by 3.7 per cent a year on average between 2015-16 and 2020-21. This is down from 4.3 per cent a year in November, reflecting weaker outturn growth in 2015 and a weaker outlook for underlying productivity growth. Box 4.1 describes the large data-driven revision to near-term growth in the non-seasonally adjusted measure of nominal GDP that is used as the denominator when expressing fiscal aggregates as a percentage of GDP;

- on the income side of GDP, **wages and salaries** are forecast to grow by 3.9 per cent a year on average between 2015-16 and 2020-21, down 0.4 percentage points from our November forecast. Within that, employment growth is broadly unchanged, while average earnings growth has been revised down due to lower expected productivity growth. Non-oil, non-financial **profits** grow by 3.5 per cent a year on average, down from 4.6 per cent in November;

- on the expenditure side of GDP, **nominal consumer spending** is forecast to grow by 4.0 per cent a year on average between 2015 and 2020, down by 0.1 percentage points from our November forecast reflecting the productivity-driven reduction in expected earnings growth;

- the CPI measure of **inflation** has been revised down in the near term, reflecting the pass-through of lower oil and gas prices to petrol prices and utility bills. It is expected to move slightly above the 2 per cent target during 2018-19 reflecting the introduction of the soft drinks industry levy in that year. Thereafter, it is assumed to return to target. We continue to expect RPI inflation to be higher than CPI inflation throughout the forecast period because of differences in the ONS approach to constructing the two measures;

- **house price inflation** has been revised up in the short term due to stronger outturns, but down towards the end of the forecast period due to weaker income growth. **Residential property transactions** are broadly unchanged since November;

- our pre-measures forecasts for **commercial property prices and transactions** are little changed since November. The Budget announced reforms to stamp duty on non-residential transactions and leases. We expect these reforms to reduce both the frequency of transactions and to increase the number of transactions that avoid SDLT, meaning that our forecast for SDLT-paying transactions falls next year. We also expect the increase in tax rates to reduce growth in commercial property prices next year;

- market-derived assumptions for **equity prices**, **interest rates** and the **oil price** reflect average prices in the 10 days to 25 February. Equity and oil prices have been revised down significantly since November in line with recent outturns, while market expectations of interest rates have fallen substantially further (from the already low levels that were assumed in November);

- our **oil and gas production** forecasts are informed by the central projections published by the Oil and Gas Authority (OGA). We have revised our oil production forecast up, reflecting stronger-than-expected growth in 2015. We expect higher production to persist over the forecast, reflecting a return from the high levels of investment in recent years. The sharp falls in oil and gas prices since November mean this forecast – always subject to uncertainty – may be even more uncertain than usual; and

- the **output gap** – which we use to estimate the structural health of the public finances – is narrower than in our November forecast. It is expected to average -0.3 per cent in 2015-16 and to close a year earlier in 2017-18.

Box 4.1: Non-seasonally adjusted nominal GDP

The economy and public finances are affected by many factors, including some predictable ups and downs during the course of the year: Christmas boosts high street spending; people are more likely to move house in the summer than the winter; and so on.

The headline GDP data that form the basis of our *economy forecast* are 'seasonally adjusted' by the Office for National Statistics (ONS) to strip out those regular patterns. But the headline ONS public finances data on which our *fiscal forecast* – and the Government's fiscal targets – are based are not. For consistency, when the ONS presents official estimates of the deficit or debt as a percentage of GDP, rather than in billions of pounds, it uses the non-seasonally adjusted (NSA) measure of nominal GDP as the denominator. Moreover, it uses different time periods to calculate the denominators:

- the ratio for the **deficit** in any given fiscal year is straightforward. It is the cash deficit divided by the sum of NSA nominal GDP over the four quarters that comprise the fiscal year. In other words, the second quarter of 2015 to the first quarter of 2016, for fiscal year 2015-16; and
- the ratio for **net debt** in a particular fiscal year is slightly less intuitive. Because debt is a stock rather than a flow, the conventional way to define the debt ratio for 2015-16 is to focus on the level of debt at the *end* of the year. This is calculated as the cash value of the debt at the end of the year divided by the sum of NSA nominal GDP for the previous and subsequent six months. In other words, from the fourth quarter of 2015 to the third quarter of 2016, for the 2015-16 fiscal year.

As a result, we need to forecast NSA nominal GDP for our fiscal forecast. We do that by applying a 3-year average of the quarterly seasonal factors implied by the ONS nominal GDP data to add a seasonal pattern to our forecast. This normally is not noteworthy, but in our November forecast it made a material difference to the path of the debt ratio and the revision between November and this forecast has been large. Chapter 5 sets out the implications this has had for the Government's target to reduce debt as a share of GDP each year.

Headline nominal GDP growth during 2015 has slowed significantly – to 1.9 per cent in the year to the final quarter of 2015, far below the 3.9 per cent we forecast in November. As discussed below, this reflects ONS revisions through the year as well as the first estimate for the fourth quarter, which was published last month. Slower growth in seasonally adjusted nominal GDP would have reduced our forecast of the NSA measure anyway. But a change in the ONS estimates of the seasonal pattern through 2015 has pushed it down even further.

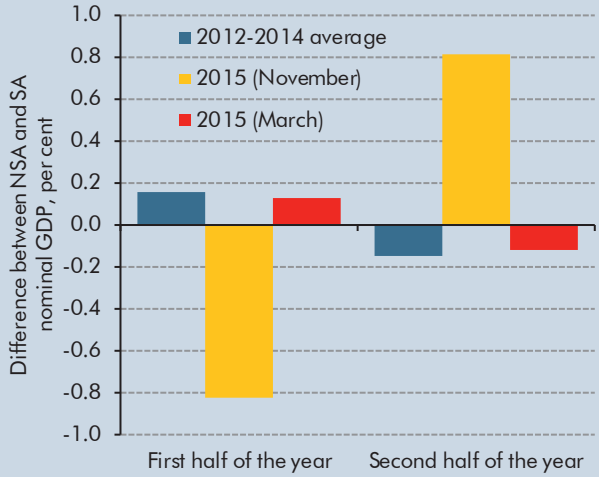
Chart A shows how the GDP estimates available at the time of our November forecast reported an unusually big gap between NSA and headline nominal GDP in the first half of 2015, with NSA low relative to the headline figure. These seasonal effects must by definition cancel out over the calendar year, so that meant that our forecast in November had to assume NSA GDP would be higher in the second half of the year, which boosted growth in NSA nominal GDP in the period used as the denominator for 2015-16 debt-to-GDP. The latest ONS data show a seasonal pattern through 2015 that looks more like previous years, which means the shortfall in NSA nominal GDP growth relative to our November forecast is even greater: 1.7 per cent year-

on-year in the final quarter of 2015 relative to our forecast of 4.7 per cent.

Chart B shows how the combination of weaker headline nominal GDP growth and revisions to the estimated seasonal pattern of activity through 2015 have affected annual average growth in NSA nominal GDP in the denominator period for the 2015-16 debt-to-GDP calculation:

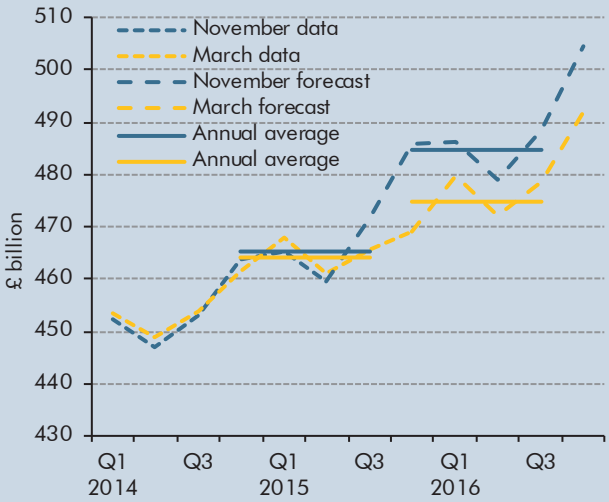
- in the **first two quarters of 2015**, the latest data have been revised up, as the revision to the implied seasonal factors more than offset weaker headline nominal GDP;
- in the **second half of 2015**, the latest data are much weaker than we forecast in November, with weakness in headline nominal GDP explaining around two-thirds of the shortfall and the change in the assumed seasonal pattern the rest;
- a **lower expected level of nominal GDP in 2016**, mainly due to the unexpected weakness at the end of 2015; and
- the combination of a slightly higher average level of NSA nominal GDP in the base year and a much lower level in the denominator year means that **annual growth has been revised down** from 4.3 per cent in November to 2.3 per cent in this forecast. For a given year-on-year change in the level of debt, it is that growth rate that affects the pace at which debt is estimated to rise or fall as a share of GDP.

Chart A: The seasonal profile of nominal GDP



For November, the first half of the year is data and the second half forecast. March is all data. Source: ONS, OBR

Chart B: Non-seasonally adjusted nominal GDP growth data and forecasts



Source: ONS, OBR

Table 4.1: Determinants of the fiscal forecast

	Percentage change on previous year unless otherwise specified						
	Outturn	Forecast					
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
GDP and its components							
Real GDP	2.8	2.1	2.0	2.2	2.1	2.1	2.2
Nominal GDP[1]	4.3	2.4	3.6	4.0	4.2	3.9	4.2
Nominal GDP (£ billion)[1,2]	1832	1876	1943	2021	2106	2189	2281
Nominal GDP (centred end-March £bn)[1,3]	1856	1899	1983	2063	2147	2234	2328
Wages and salaries[4]	3.2	3.8	3.9	4.1	3.9	3.8	4.1
Non-oil PNFC profits[4,5]	10.0	1.9	3.8	3.5	3.8	3.9	4.2
Consumer spending[4,5]	4.2	3.2	3.6	4.1	4.4	4.4	4.2
Prices and earnings							
GDP deflator	1.5	0.2	1.5	1.8	2.1	1.9	2.0
RPI (September)[6]	2.3	0.8	1.7	2.6	3.3	3.2	3.2
CPI (September)[6]	1.2	-0.1	0.6	1.6	2.1	2.0	2.0
Average earnings[7]	1.3	2.4	3.0	3.5	3.5	3.3	3.8
'Triple-lock' guarantee (September)	2.5	2.9	2.5	3.6	3.5	3.5	3.4
Key fiscal determinants							
Claimant count (millions)	0.95	0.78	0.74	0.80	0.85	0.86	0.87
Employment (millions)	30.9	31.3	31.6	31.8	31.9	32.0	32.1
VAT gap (per cent)	10.8	11.4	11.5	11.2	10.9	10.5	10.3
Output gap (per cent of potential output)	-0.7	-0.3	-0.1	0.1	0.0	0.0	0.0
Financial and property sectors							
Equity prices (FTSE All-Share index)	3580	3400	3337	3471	3617	3760	3918
HMRC financial sector profits[1,5,8]	4.3	2.4	3.5	4.0	4.1	4.0	4.4
Residential property prices[9]	10.0	6.8	5.7	4.5	5.1	4.5	3.8
Residential property transactions (000s)[10]	1201	1258	1257	1282	1294	1301	1310
Commercial property prices[10]	17.6	7.4	2.1	1.8	1.9	1.9	2.2
Commercial property transactions[10]	8.6	3.5	-0.9	2.3	2.3	2.1	2.1
Volume of stampable share transactions	-8.6	10.3	0.0	0.0	0.0	0.0	0.0
Oil and gas							
Oil prices ($ per barrel)[5]	98.9	52.4	35.5	41.9	44.0	44.0	44.0
Oil prices (£ per barrel)[5]	60.0	34.3	24.9	29.3	30.7	30.6	30.4
Gas prices (p/therm)[5]	50.2	43.0	29.9	32.3	32.3	32.3	32.3
Oil production (million tonnes)[5]	40.0	45.0	43.2	43.3	43.4	41.3	39.2
Gas production (billion therms)[5]	13.0	14.0	13.0	12.4	11.8	11.3	10.7
Interest rates and exchange rates							
Market short-term interest rates (%)[11]	0.6	0.6	0.5	0.6	0.8	1.0	1.2
Market gilt rates (%)[12]	2.3	1.9	1.7	1.9	2.1	2.2	2.4
Euro/Sterling exchange rate (€/£)	1.28	1.37	1.28	1.27	1.26	1.25	1.24

[1] Not seasonally adjusted.
[2] Denominator for receipts, spending and deficit forecasts as a per cent of GDP.
[3] Denominator for net debt as a per cent of GDP.
[4] Nominal. [5] Calendar year.
[6] Q3 forecast used as a proxy for September.
[7] Wages and salaries divided by employees.
[8] HMRC Gross Case 1 trading profits.
[9] Outturn data from ONS House Price Index.
[10] Outturn data from HMRC information on stamp duty land tax.
[11] 3-month sterling interbank rate (LIBOR).
[12] Weighted average interest rate on conventional gilts.

Table 4.2: Changes in the determinants of the fiscal forecast

	Percentage change on previous year unless otherwise specified						
	Outturn	Forecast					
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
GDP and its components							
Real GDP	-0.1	-0.1	-0.5	-0.2	-0.3	-0.2	-0.1
Nominal GDP[1]	0.1	-1.6	-0.4	-0.3	-0.3	-0.5	-0.3
Nominal GDP (£ billion)[1,2]	3	-27	-37	-44	-51	-62	-72
Nominal GDP (centred end-March £bn)[1,3]	-4	-40	-39	-46	-56	-67	-77
Wages and salaries[4]	-0.2	-0.4	-0.8	-0.3	-0.3	-0.3	-0.3
Non-oil PNFC profits[4,5]	-0.3	-4.4	-0.8	-0.3	-0.3	-0.4	-0.4
Consumer spending[4,5]	0.0	-0.2	-0.3	-0.3	-0.1	0.1	0.0
Prices and earnings							
GDP deflator	0.1	-1.2	-0.2	0.0	0.2	-0.2	-0.2
RPI (September)[6]	0.0	0.0	-0.3	-0.4	0.1	0.0	0.0
CPI (September)[6]	0.0	0.0	-0.4	-0.2	0.2	0.0	0.0
Average earnings[7]	-0.2	-0.5	-0.5	-0.2	-0.2	-0.4	-0.2
'Triple-lock' guarantee (September)	0.0	0.0	-0.7	-0.1	-0.1	-0.2	-0.5
Key fiscal determinants							
Claimant count (millions)	0.00	-0.01	-0.03	-0.04	-0.02	-0.02	-0.01
Employment (millions)	0.0	0.1	0.0	0.0	0.0	-0.1	-0.1
VAT gap (per cent)	0.4	0.3	0.6	0.3	0.2	0.0	0.0
Output gap (per cent of potential output)	0.1	0.4	0.2	0.2	0.0	0.0	0.0
Financial and property sectors							
Equity prices (FTSE All-Share index)	0	-80	-285	-306	-326	-357	-385
HMRC financial sector profits[1,5,8]	-0.1	-1.2	-0.6	-0.4	-0.4	-0.4	0.0
Residential property prices[9]	0.0	1.5	1.0	-0.3	-0.2	-0.4	-0.3
Residential property transactions (000s)[10]	-1	0	8	5	3	1	0
Commercial property prices[10]	0.0	0.0	-1.0	0.0	0.0	-0.2	0.1
Commercial property transactions[10]	0.0	-0.2	-3.3	-0.2	-0.2	-0.2	-0.2
Volume of stampable share transactions	0.0	10.3	0.0	0.0	0.0	0.0	0.0
Oil and gas							
Oil prices ($ per barrel)[5]	0.0	-1.4	-18.1	-16.2	-14.8	-14.8	-14.8
Oil prices (£ per barrel)[5]	0.0	-0.8	-9.9	-8.4	-7.4	-7.4	-7.5
Gas prices (p/therm)[5]	-0.1	0.0	-9.2	-7.8	-7.8	-7.8	-7.8
Oil production (million tonnes)[5]	0.0	3.8	5.3	7.3	9.2	8.8	8.3
Gas production (billion therms)[5]	0.0	0.6	0.6	0.6	0.6	0.7	0.6
Interest rates and exchange rates							
Market short-term interest rates[11]	0.0	0.0	-0.3	-0.6	-0.7	-0.8	-0.8
Market gilt rates[12]	0.0	-0.1	-0.4	-0.4	-0.4	-0.4	-0.4
Euro/Sterling exchange rate (€/£)	0.00	-0.01	-0.09	-0.09	-0.08	-0.07	-0.07

[1] Not seasonally adjusted.
[2] Denominator for receipts, spending and deficit forecasts as a per cent of GDP.
[3] Denominator for net debt as a per cent of GDP.
[4] Nominal. [5] Calendar year.
[6] Q3 forecast used as a proxy for September.
[7] Wages and salaries divided by employees.
[8] HMRC Gross Case 1 trading profits.
[9] Outturn data from ONS House Price Index.
[10] Outturn data from HMRC information on stamp duty land tax.
[11] 3-month sterling interbank rate (LIBOR).
[12] Weighted average interest rate on conventional gilts.

Policy announcements, risks and classification changes

4.5 The Government publishes estimates of the direct impact on the public finances of tax and selected spending policy decisions in its 'scorecard', after detailed discussions with the OBR. It also makes changes to departmental spending – only some of which are shown on the scorecard – on top of the changes already announced in the Spending Review. If we were to disagree with any of the final scorecard numbers they chose, we would use our own estimates in our forecast. We are also responsible for assessing any indirect effects of policy measures on our economy forecast.[2] These are discussed in Box 3.2 in Chapter 3. We note as risks to the fiscal forecast any significant policy commitments that are not quantifiable, as well as any potential statistical classification changes.

Direct effect of new policy announcements on the public finances

4.6 In Annex A, we reproduce the Treasury's scorecard of the direct effect on PSNB of policy decisions in the Budget or announced since the November Spending Review and Autumn Statement. Annex A also includes our formal assessment of the degree of uncertainty associated with each costing that we have certified.

4.7 Table 4.3 summarises the Treasury's policy scorecard and the changes since our last forecast to the Government's plans for spending subject to departmental expenditure limits (DELs). These encompass spending on public services, grants, administration and capital investment. A positive figure means an improvement in PSNB, i.e. higher receipts or lower expenditure. (We produce a detailed breakdown in a supplementary fiscal table on our website, showing how each policy measure is allocated to different categories of tax and spending.)

[2] In March 2014, we published a briefing paper on our approach to scrutinising and certifying policy costings, and how they are fed into our forecasts, which is available on our website: *Briefing paper No 6: Policy costings and our forecast.*

Table 4.3: Summary of the effect of Government decisions on the budget balance

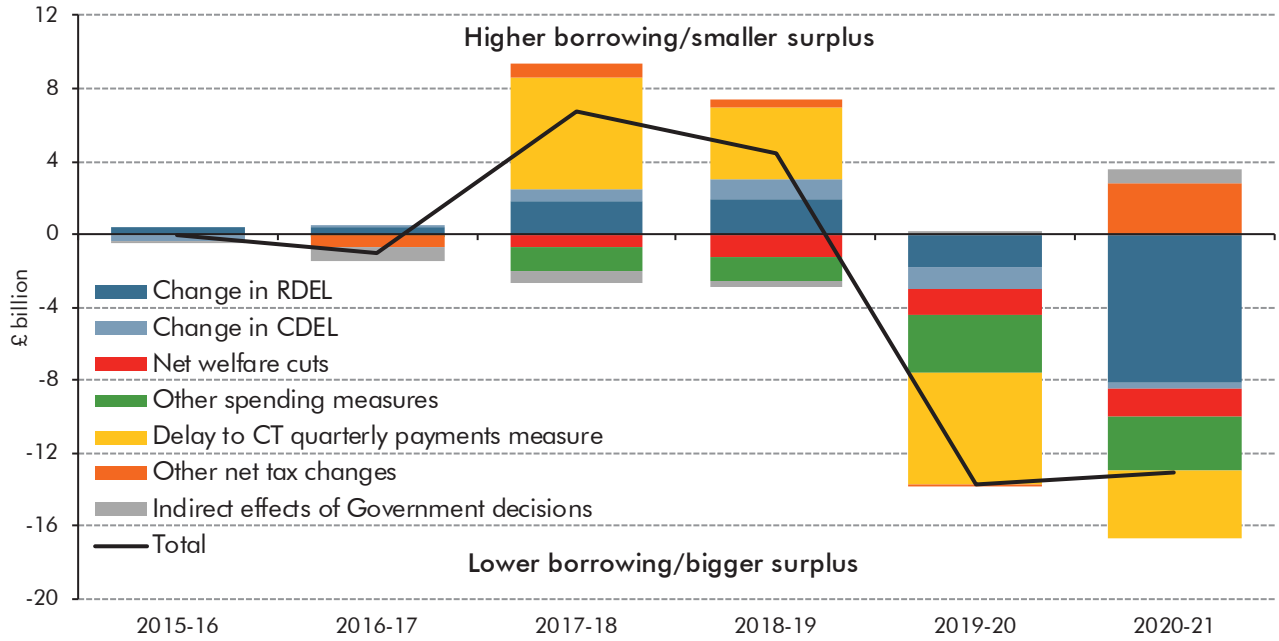
	£ billion					
	Forecast					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Total effect of scorecard measures	**0.0**	**0.3**	**-7.6**	**-4.8**	**13.9**	**4.2**
Effects of scorecard receipts measures	**0.0**	**0.6**	**-7.0**	**-4.3**	**6.3**	**0.8**
of which:						
Onshore corporation tax	0.0	0.5	-3.1	-0.5	8.3	4.8
Business rates	0.0	0.0	-1.4	-1.5	-1.5	-1.9
Income tax and NICs	0.0	0.2	-1.8	-2.3	-1.7	-2.8
Fuel duty	0.0	-0.4	-0.4	-0.4	-0.4	-0.4
Soft drinks levy	0.0	0.0	0.0	0.5	0.5	0.5
Stamp duty land tax	0.0	0.5	0.6	0.6	0.7	0.7
Capital gains tax	0.0	-0.1	-0.2	-0.4	-0.4	-0.3
Oil and gas revenues	0.0	-0.2	-0.3	-0.2	-0.2	-0.2
VAT	0.0	0.1	0.2	0.2	0.4	0.4
Other	0.0	0.0	-0.5	-0.4	0.6	0.1
Effects of scorecard AME measures	**0.0**	**0.1**	**2.1**	**2.6**	**4.6**	**4.5**
of which:						
Welfare	0.0	0.0	0.7	1.3	1.4	1.4
Locally financed current expenditure	0.0	-0.1	0.6	0.8	1.1	1.4
Public service pensions	0.0	0.0	0.0	0.0	2.0	2.0
Other AME measures	0.0	0.2	0.8	0.5	0.1	-0.3
Effects of scorecard DEL measures	**0.0**	**-0.4**	**-2.7**	**-3.0**	**3.0**	**-1.1**
	Summary of changes					
Total effect of Government decisions	**0.1**	**1.0**	**-6.7**	**-4.5**	**13.7**	**13.1**
of which:						
Receipts and AME scorecard measures	0.0	0.7	-4.9	-1.7	10.9	5.3
RDEL changes	-0.4	-0.3	-1.8	-1.9	1.8	8.1
CDEL changes	0.4	-0.1	-0.7	-1.1	1.2	0.4
Indirect effect of Government decisions	0.1	0.7	0.6	0.3	-0.2	-0.7
Financial transactions[1]	0.0	0.0	0.0	0.1	0.2	0.3
Memo: gross tax increases	0.0	1.6	5.8	7.9	15.2	11.5
Memo: gross tax cuts	0.0	-0.9	-12.7	-12.2	-8.9	-10.7

[1] Affects PSNCR, not PSNB.

Note: The full Treasury scorecard can be found in Annex A. This table uses the Treasury scorecard convention that a positive figure means an improvement in PSNB, PSNCR and PSND.

4.8 Chart 4.1 summarises the impact of Government decisions on PSNB across the forecast. It shows how the Government has loosened policy in the short term and then tightened it significantly in 2019-20 and 2020-21 – the years in which its surplus target applies. This uneven path has meant the overall pace of fiscal tightening over the coming five years – which in November was relatively smooth and diminishing over time – is set to pick up slightly over the next three years, then dramatically in 2019-20 before slowing abruptly in 2020-21. This is shown in Chart 4.13 in the fiscal aggregates section of this chapter.

Chart 4.1: The effect of Government decisions on public sector net borrowing



Source: OBR

Policy risks

4.9 Parliament requires that our forecasts only reflect current Government policy. As such, when the Government or governing party sets out 'ambitions' or 'intentions' we ask the Treasury to confirm whether they represent firm policy that should be reflected in our forecast. Where they are not yet firm policy, we note them as a source of risk to our central forecast. For this forecast, there are a number that we need to note:

- commitments on **income tax allowances**: in November's Autumn Statement, the Government stated that it "*is determined to support those in work by continuing to reduce taxes. In recognition of this, the government has committed to raise the personal allowance to £12,500 and the higher rate threshold to £50,000 by the end of this Parliament.*" These objectives are specified in terms of the levels being targeted and by when (the end of the Parliament), but the Government has not set out how it would get from the current level to £12,500. The Treasury argues that it will do so progressively, assessing the affordability of incremental steps at each stage. As such, we are not able to quantify the effect on each year of the forecast of achieving this goal. In this Budget it has announced increases to £11,500 and £45,000 respectively, with a scorecard cost of £2.5 billion in 2019-20 and £2.6 billion in 2020-21. Our central forecast assumes that thresholds are uprated in line with CPI inflation in years for which the Government has not set specific parameters, so by 2019-20 the personal allowance reaches £11,950 and by 2020-21 it reaches £12,190. For the higher rate threshold, those figures are £46,850 and £47,790. Due to the much larger number of taxpayers affected by changes in the personal allowance, it is that element of the Government's commitment that would be most costly to meet. HMRC has provided an estimate of the cost in 2020-21 alone of closing the remaining gaps between the levels of the

personal allowance and higher rate threshold reached in our central forecast and the Government's commitments: £2.4 billion. If 'the end of this Parliament' was interpreted as 2019-20, the cost would be closer to £4 billion (reflecting the larger gaps that would remain to be closed);

- the **intention to localise all business rates** and to provide some additional discretion to local authorities in setting business rates, while also shifting some new spending responsibilities to local authorities. There are elements of this prospective package of measures that could be quantified now, but it would be misleading to include only part it in our central forecast when the Government has stated that when fully specified it will be fiscally neutral as a whole. When the package is fully specified, we will include it in the forecast and judge whether it is in fact fiscally neutral (see Box 4.3);

- the outcome of **the consultation on fee proposals for grants of probate**. Depending on classification, these fees could boost receipts or leave more space for departmental spending. The fees may also affect inheritance tax receipts; and

- the **intention to expand right-to-buy to tenants of housing associations**, which is currently being piloted and features in the Housing Bill that is progressing through Parliament, but which the Government has not yet specified in a manner that would allow its effects to be estimated on a year-by-year basis.

4.10 We are not able to estimate the effects of the planned restrictions on EU migrants' access to certain in-work benefits and tax credits at this stage because the Government has not set out the precise parameters of these policies that would be necessary for us to quantify specific effects in specific years. The Treasury has confirmed that the final details of the policy will be set out following the EU referendum, consistent with the conclusions of the February European Council. It intends to cost the policy at the Autumn Statement.

4.11 The Government has announced further cuts to departmental spending in 2019-20 and 2020-21, but these have not been fully allocated to individual departments. For 2019-20, where detailed plans were set in November's Spending Review, it has stated that the cuts will be allocated to departments following an 'efficiency review' that will report in 2018. Given the Treasury's long-standing track record in keeping departmental spending within its published limits, we have reflected these planned cuts in our forecast, although we have also reduced the amount by which we expect departments to underspend the lower spending limits. (It is not for us to judge now or later whether the cuts would in fact be genuine efficiency savings or cuts in the quality and quantity of public services.) The planned cuts in 2020-21 are much larger, but relate to totals that were not fully allocated in the Spending Review. Again, we have reduced our assumption of underspending as a result. This process of adjusting assumed departmental spending totals by sometimes large amounts between forecasts was a feature of the last Parliament too.

Contingent liabilities

4.12 We have asked the Treasury to identify any changes to future contingent liabilities as a result of policy announcements since November. One announcement appears relevant:

- the new **Scottish Government fiscal framework** includes additional borrowing powers for the Scottish Government, allowing it to borrow for current spending in specific circumstances and extending its existing ability to borrow for capital spending. These borrowing powers will not be a contingent liability in the Whole of Government Accounts (WGA), but they do transfer certain economy-related fiscal risks from the UK to the Scottish Government.

4.13 A small number of universities in the UK have recently issued bonds in their own names, typically raising around £¼ billion each. Universities are classified as 'non-profit institutions serving households' in the National Accounts, so are part of the private sector. As such, these liabilities will not add to the ONS measure of public sector net debt or feature in our fiscal forecast. Moreover, since the bonds are not issued with a government guarantee, they are not contingent liabilities in WGA terms either. But given the public service nature of universities' roles, it is possible that if one or more were to default on their bonds, the liabilities could ultimately be transferred to government. Investors in universities' bonds might even anticipate such an implicit guarantee. This could represent a broader fiscal risk of the type that we will aim to address in the new *Fiscal risks report (FRR)* that Parliament – in the October 2015 update to the *Charter for Budget Responsibility* – has asked us to produce. We plan to publish a *FRR* discussion paper this autumn and our first full report next summer.

Classification changes

4.14 In our November forecast, we anticipated the effect on the public finances of the ONS decision to reclassify housing associations into the public sector.[3] The ONS has now implemented that decision in the official data. Box 4.2 sets out how the latest data compare with the assumptions we made in November and the changes we have made to our forecasts since then. The Government is in the process of reforming the regulation of housing associations, with one of its stated aims being to reduce control sufficiently that they are reclassified back to the private sector. At this stage it is unclear whether this would lead the ONS to consider another classification decision.

4.15 Our November forecast included a number of other items that anticipated future revisions and classification changes that the ONS had announced, but had not yet implemented (see Box 4.1 of the November *EFO*). A number of these items are now included in outturn, including community infrastructure levy receipts, the heavy goods vehicle road user levy and other smaller items related to work that the ONS, Treasury and we have been undertaking to resolve previously unexplained differences between accrued and cash measures of

[3] *'Classification announcement: "Private registered providers" of social housing in England'*, ONS, 30 October 2015.

borrowing. Our current forecast includes further items related to this work, the details of which can be found in a supplementary fiscal table on our website.

4.16 The possibility of future classification decisions will always represent a source of uncertainty around our forecasts. The ONS publishes a quarterly forward workplan that lists classification issues currently under consideration. In its December 2015 publication, 13 items were listed, some of which – e.g. the treatment of various pension schemes and the classification of contracts under the Government's 'priority schools building programme' – could have a substantial impact on the public sector finances were any classification decisions to result from these reviews.[4]

Box 4.2: The reclassification of housing associations into the public sector

In our November forecast, we anticipated the effect on the public finances of the ONS decision to reclassify private registered providers of social housing in England – which includes most housing associations (HAs) and some other private sector providers – into the public sector (see Annex B of that *EFO*.) The ONS has now implemented that decision in the official data, reflecting 2014-15 'global accounts' data for HAs that were not available when we completed our November forecast. The ONS estimates that HAs increased public sector borrowing by £3.6 billion and net debt by £60 billion (3.3 per cent of GDP) in 2014-15. That is around £1 billion lower for borrowing than we had estimated (due to lower capital spending), but about £0.5 billion higher for debt (due to the inclusion of certain lease obligations and other items).

Our pre-measures forecast for HAs' borrowing in 2015-16 is £0.7 billion lower than in November, mainly due to lower capital spending. We have recalibrated our forecast model to be consistent with the latest ONS estimate for 2014-15, which implied that HAs had leveraged grants and cash surpluses by less than we had assumed. All else equal, that would reduce capital spending in the initial years of the forecast. Offsetting that, we have revised up our forecast of rental income and cash surpluses to make the forecast consistent with how the ONS has grossed up the 'global accounts' data for small providers not covered in that report. That pushes up capital spending via our assumption about leveraging. By 2020-21, that means our pre-measures HAs borrowing forecast has been revised up by £0.4 billion. Effects on PSND have been largely offsetting, with revisions since November averaging less than £1 billion a year across the forecast period.

Our forecast now factors in the effect of the **right-to-buy pilot** that was announced in November, but that the Government did not provide us with a costing at that time. The full expansion of right-to-buy to HA tenants has not yet been specified sufficiently to be included in our forecast. In this Budget, the Government has announced two further policy measures that affect our HAs fiscal forecast:

- the **pay to stay** policy announced in July 2015 has been amended in two ways. First, it has been made voluntary for HAs (although it remains mandatory for local authorities) as the Government seeks to reduce its control over HAs. Some HAs are expected not to charge tenants the additional rent and some to implement the policy in a way that is

[4] *'National Accounts Sector Classification: December 2015'*, ONS, 31 December 2015.

more generous to tenants. The Government has also announced that rent increases will now be tapered as income rises, replacing the 'cliff-edge' policy design whereby rents would jump to 80 per cent of market rent when a households' income topped £30,000 (£40,000 in London) and 100 per cent of market rent when it topped £40,000 (£50,000 in London). Both amendments are expected to reduce HAs' rental incomes; and

- the **1 per cent a year social sector rent cuts for supported housing** will also be deferred by a year, raising HAs' rental income.

The pay to stay policy amendments have the biggest effect on our HAs' borrowing forecast, because they reduce rental income and cash surpluses. We assume that this feeds more than one-for-one into lower capital spending on housebuilding.

Table A: March forecast for HAs' effects on the public finances

	£ billion, unless otherwise stated						
	Outturn	Forecast					
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Current receipts (a)	6.5	6.9	6.7	6.8	6.6	6.4	6.9
Current spending (b)	3.0	2.9	3.0	3.2	3.4	3.6	3.8
Depreciation (c)	1.6	1.6	1.7	1.7	1.8	1.8	1.9
Capital spending (d)	7.1	7.9	6.9	6.4	5.8	5.1	6.3
of which: Additional capital	6.4	7.0	5.9	5.5	6.4	7.0	9.7
Current deficit (b+c-a)	**-1.9**	**-2.3**	**-2.1**	**-1.9**	**-1.4**	**-1.0**	**-1.2**
Pre-measures borrowing (b+d-a)	3.6	3.9	3.2	2.8	2.7	2.3	3.2
Budget policy measures (e)	0.0	0.0	0.0	-0.3	-0.3	-0.4	-0.4
Post-measures net borrowing (b+d-a+e)	3.6	3.9	3.2	2.4	2.4	2.0	2.8
Net debt (post measures)	**60**	**64**	**67**	**69**	**72**	**74**	**77**
Net debt (post measures) as a share of GDP	**3.2**	**3.3**	**3.4**	**3.4**	**3.3**	**3.3**	**3.3**

Table B: Changes in post-measures HAs forecast since November

	£ billion, unless otherwise stated						
	Outturn	Forecast					
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Current receipts (a)	0.1	0.3	0.3	0.3	0.2	0.3	0.3
Current spending (b)	0.3	0.0	0.0	0.0	0.0	0.0	0.0
Depreciation (c)	0.1	0.1	0.1	0.1	0.1	0.1	0.1
Capital spending (d)	-1.2	-0.4	0.4	0.6	0.6	0.6	0.6
of which: Additional capital	-1.1	-0.2	0.6	1.0	1.0	1.2	1.4
Current deficit (b+c-a)	**0.3**	**-0.3**	**-0.3**	**-0.2**	**-0.2**	**-0.2**	**-0.2**
Pre-measures borrowing (b+d-a)	-1.0	-0.7	0.1	0.4	0.3	0.3	0.4
Post-measures net borrowing	-1.0	-0.7	0.0	0.0	0.0	0.0	-0.1
Net debt (post measures)	**0.5**	**-0.2**	**-0.1**	**0.2**	**0.5**	**0.9**	**1.2**
Net debt (post measures) as a share of GDP	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.1**

Financial sector interventions

4.17 The Government undertook a number of interventions in the financial sector as a result of the crisis and recession of the late 2000s. In each *EFO* we provide an update on the estimated net effect of those interventions on the public finances. Table 4.4 summarises the position as at the end of December 2015.[5]

4.18 In total, £133 billion was disbursed by the Treasury during and following the crisis. By the end of December, principal repayments on loans, proceeds from share sales and redemptions of preference shares amounted to £56 billion, up from the £50 billion reported in our last *EFO*. The additional proceeds mainly relate to a £4.5 billion repayment on the Government's loan to NRAM, associated with the sale of the Granite securitisation vehicle and some other assets. The figures in the table predate the final repayment from Icesave that was received in January. In total, the Treasury also received a further £21 billion in other fees and interest, so the net cash position stood at around a £56 billion shortfall.

4.19 As of the end of December, the Treasury was owed £31 billion (largely the value of loans outstanding). The value of the shares it still retained in Lloyds and RBS by the end of February had fallen to £25 billion, down from £34 billion in November, as their share prices fell and some Lloyds shares were sold. Its holdings in B&B and NRAM plc had an equity book value of around £7½ billion.

Table 4.4: Gross and net cash flows of financial sector interventions

	£ billion						
	Cash outlays	Principal repayments	Other fees received[1]	Outstanding payments	Market value[2]	Implied balance	Change since November *EFO*[3]
Lloyds	-20.5	16.9	3.0	0.0	4.1	3.4	-0.9
RBS	-45.8	2.6	4.1	1.2	20.7	-17.2	-6.7
UK Asset Resolution[4]	-40.8	26.9	4.0	13.4	7.6	11.2	0.6
FSCS[5]	-20.9	5.2	2.7	15.7	-	2.7	0.4
Other interventions	-5.3	4.5	0.2	0.7	-	0.2	0.1
Credit Guarantee Scheme	-	-	4.3	-	-	4.3	0.0
Special Liquidity Scheme	-	-	2.3	-	-	2.3	0.0
Pre-financing total	**-133.2**	**56.2**	**20.6**	**31.0**	**32.3**	**6.9**	**-6.5**
Exchequer financing						**-24.4**	**-0.8**
Total						**-17.5**	**-7.2**

[1] Fees relating to the asset protection scheme and contingent capital facility are included within the Lloyds and RBS figures.
[2] Lloyds and RBS figures are based on average share prices in the 10 working days to 25 February 2016. UKAR is book value of equity derived from its Interim Financial Report for the 6 months to 30 September 2015.
[3] November *EFO* figures were consistent with 30 September 2015 data.
[4] Holdings in Bradford & Bingley and Northern Rock Asset Management plc are now managed by UK Asset Resolution.
[5] Financial services compensation scheme.

4.20 If the Treasury was to receive all loan payments in full, and sold its remaining shares at their end-February 2016 values, it would realise an overall cash surplus of £6.9 billion. But that

[5] The Lloyds and RBS figures show the position at 25 February, so they are consistent with the market-derived assumptions used in the rest of our fiscal forecast. All other figures reflect end-December data, allowing time for detailed scrutiny before the figures are provided to us.

excludes the costs to the Treasury of financing these interventions. If all interventions were financed through debt, the Treasury estimates that additional debt interest costs would have amounted to £24.4 billion by the end of December 2015, implying an overall cost of £17.5 billion to the Government. This is £7.2 billion higher than we estimated in the November, reflecting the fall in the value of Lloyds and RBS shares.

Public sector receipts

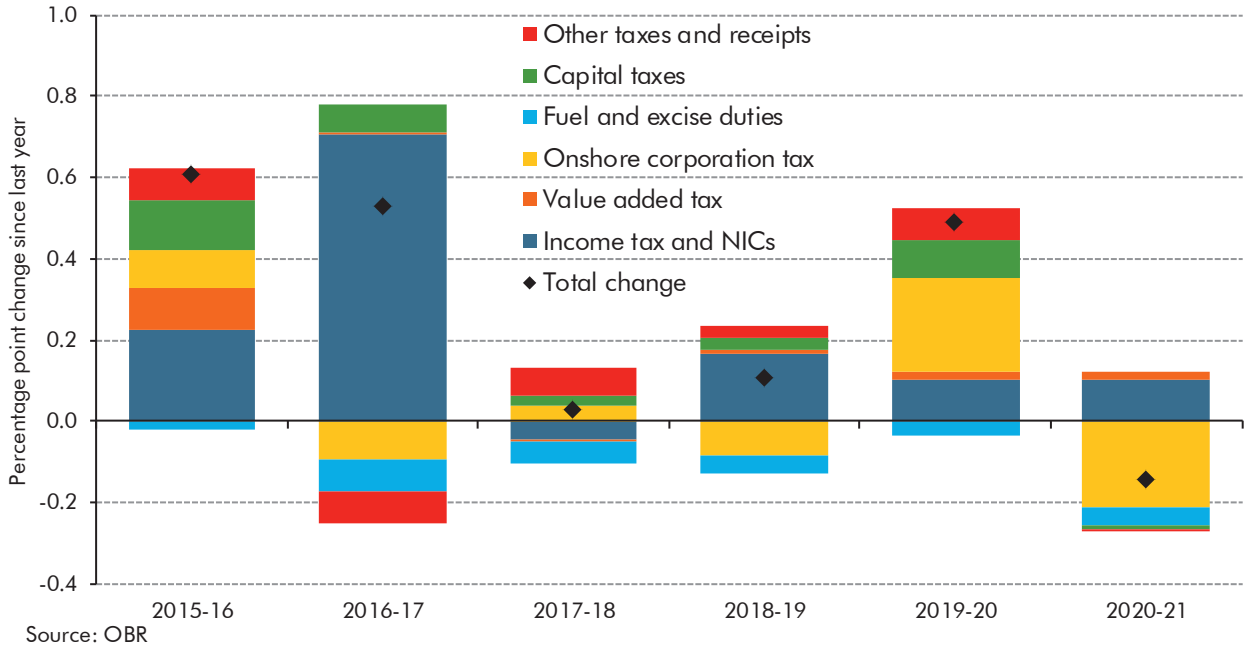
4.21 Table 4.5 summarises our receipts forecast. The tax-to-GDP ratio is expected to rise between 2014-15 and 2019-20, then fall in 2020-21.

Table 4.5: Major receipts as a per cent of GDP

	Per cent of GDP						
	Outturn	Forecast					
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Income tax and NICs	15.0	15.2	15.9	15.8	16.0	16.1	16.2
Value added tax	6.1	6.2	6.2	6.2	6.2	6.2	6.2
Onshore corporation tax	2.2	2.3	2.2	2.3	2.2	2.4	2.2
Fuel duties	1.5	1.5	1.4	1.4	1.3	1.3	1.3
Business rates	1.5	1.5	1.5	1.4	1.4	1.4	1.3
Council tax	1.5	1.5	1.5	1.6	1.6	1.6	1.6
Excise duties	1.1	1.1	1.0	1.0	1.0	1.0	1.0
Capital taxes	1.3	1.4	1.5	1.5	1.5	1.6	1.6
UK oil and gas receipts	0.1	0.0	-0.1	-0.1	0.0	0.0	0.0
Other taxes	2.9	3.0	3.0	3.2	3.2	3.2	3.2
National Accounts taxes	**33.0**	**33.6**	**34.2**	**34.2**	**34.3**	**34.8**	**34.6**
Interest and dividend receipts	0.3	0.3	0.3	0.3	0.3	0.4	0.5
Other receipts	2.4	2.4	2.4	2.3	2.3	2.3	2.3
Current receipts	**35.7**	**36.3**	**36.9**	**36.9**	**37.0**	**37.5**	**37.4**

4.22 Chart 4.2 shows the year-on-year change in the receipts-to-GDP ratio over the forecast. It shows that the rise in 2015-16 is broad-based as receipts hold up despite the weakness in nominal GDP growth recorded in the latest ONS data. In 2016-17, the abolition of the NICs contracting out rebate and other measures help boost income tax and NICs receipts by 0.7 per cent of GDP. The tax-to-GDP ratio flattens off in 2017-18 and 2018-19, before jumping in 2019-20 thanks to the one-off boost to corporation tax receipts from bringing forward large firms' payments (in effect recording five quarterly payments in that year). That boost is not repeated in 2020-21, so the tax-to-GDP ratio falls back again. Non-tax receipts – in particular interest and dividend receipts – are also expected to rise over the forecast period, so that total receipts rise by 1.0 per cent of GDP between 2015-16 and 2020-21.

Chart 4.2: Year-on-year changes in the receipts-to-GDP ratio



Source: OBR

Sources of changes in the tax-to-GDP ratio

4.23 Movements in the tax-to-GDP ratio arise from two sources:

- changes in the **composition of GDP** can lead to specific tax bases growing more or less quickly than the economy as a whole; and
- the **effective tax rate paid on each tax base** can change due to policy or other factors.

4.24 We have used this approach to identify the main drivers of the rise in the tax-to-GDP ratio over the forecast period.

Change in the tax-to-GDP ratio over the forecast period

4.25 Chart 4.2 shows that the main sources of the 0.9 percentage point rise in the tax-to-GDP ratio between 2015-16 and 2020-21 are:

- a 0.9 per cent of GDP rise in **PAYE income tax and NICs receipts**. This is driven almost entirely by a rise in the effective tax rate. Most of this is explained by the return of 'fiscal drag', as productivity and real earnings growth are assumed to pick up (although to still historically subdued rates), dragging more income into higher tax brackets. Around 0.3 per cent of GDP is accounted for by the Budget 2013 policy decision to abolish the NICs contracting out rebate from April 2016. This is expected to raise NICs receipts by over £5 billion in 2016-17;
- a 0.2 per cent of GDP rise in **self-assessment (SA) receipts**. This largely reflects the strong receipts boost in 2016-17 from a number of measures announced in previous Budgets and Autumn Statements; and

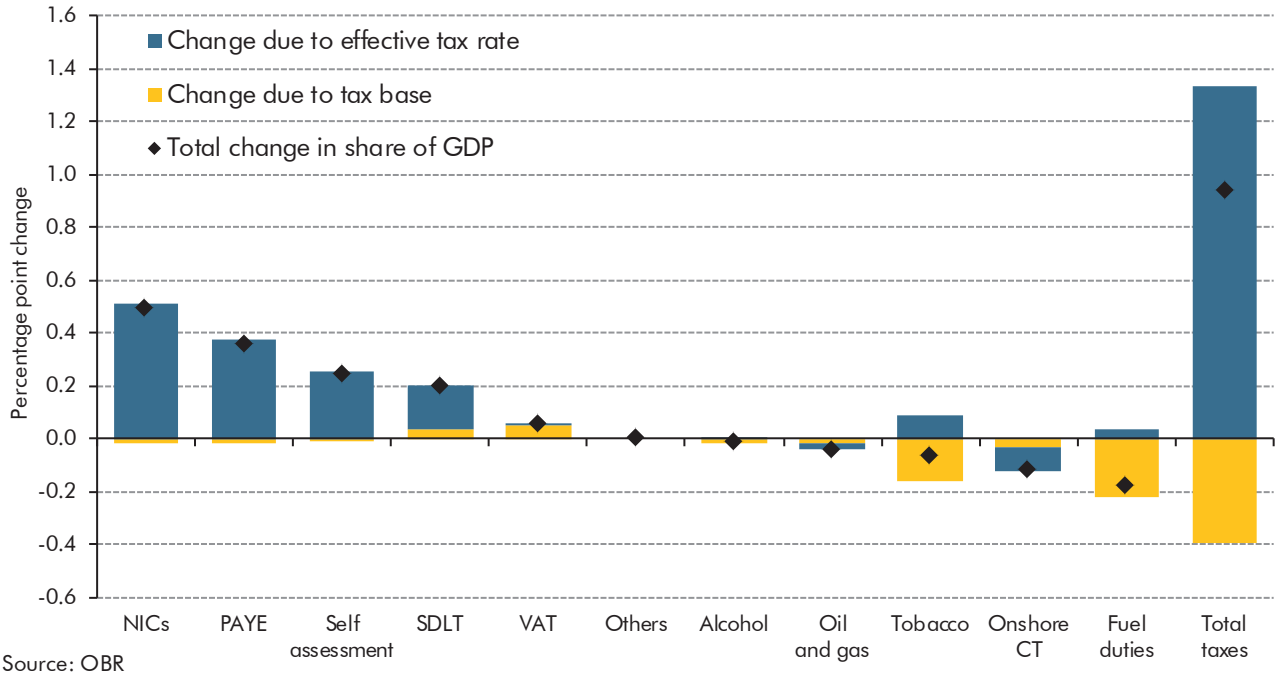
- a 0.2 per cent of GDP rise in **stamp duty land tax (SDLT)** receipts (including the Scottish land and buildings transaction tax (LBTT)). This reflects both the tax base and the effective tax rate. Growth in the base reflects rising prices and transactions. With SDLT thresholds still fixed in cash terms over the forecast period, rising house prices drag a greater proportion of the value of residential transactions into higher tax brackets.

4.26 Partly offsetting these rises are:

- a 0.3 per cent of GDP fall in **excise duties**. This is explained by declining tax bases, due to falling alcohol and tobacco consumption and rising fuel efficiency. These falls are only partly offset by assumed rises in duty rates, raising the effective tax rate; and

- a 0.1 per cent of GDP fall in **onshore corporation tax** receipts. This is volatile between years given the measure to change the timing of payments for large companies. Over the whole of the forecast period, the fall in the ratio is driven by a falling effective tax rate: the main corporation tax rate is set to fall to 17 per cent in 2020-21, strong growth in investment increases the use of capital allowances and the financial sector is expected to set past losses against future liabilities.

Chart 4.3: Sources of changes in the tax-to-GDP ratio (2015-16 to 2020-21)



Source: OBR

Detailed current receipts forecast

4.27 Our detailed receipts forecasts and changes since November are presented in Tables 4.6 and 4.7. Further detailed breakdowns of other taxes and non-tax revenues are available in supplementary fiscal tables on our website. Our forecasts for Scottish and Welsh devolved taxes are discussed in more detail in *Devolved tax forecasts*, also available on our website.

Table 4.6: Current receipts

	£ billion						
	Outturn	Forecast					
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Income tax (gross of tax credits)[1]	163.7	169.8	182.1	186.6	198.2	208.1	218.8
of which: Pay as you earn	*140.0*	*146.5*	*153.4*	*161.1*	*169.7*	*177.8*	*186.4*
Self assessment	*23.6*	*24.1*	*30.2*	*28.0*	*30.9*	*33.1*	*34.9*
National insurance contributions	110.3	114.9	126.5	133.4	138.9	144.5	151.1
Value added tax	111.2	115.8	120.1	124.8	130.3	135.9	142.0
Corporation tax[2]	43.0	44.1	43.5	46.0	46.1	52.8	50.2
of which: Onshore	*40.9*	*43.6*	*43.4*	*45.9*	*46.1*	*53.0*	*50.4*
Offshore	*2.1*	*0.5*	*0.1*	*0.1*	*0.0*	*-0.1*	*-0.1*
Petroleum revenue tax	0.1	-0.5	-1.1	-1.1	-0.9	-0.9	-0.8
Fuel duties	27.2	27.5	27.6	27.8	28.2	28.7	29.3
Business rates	27.5	27.8	28.4	27.7	28.7	29.8	30.5
Council tax	28.2	28.8	30.1	31.4	32.8	34.1	35.6
VAT refunds	13.7	14.3	14.7	15.0	15.0	15.1	15.5
Capital gains tax	5.6	7.0	7.0	6.9	7.5	9.2	8.9
Inheritance tax	3.8	4.6	4.8	4.9	5.0	5.3	5.6
Stamp duty land tax[3]	10.9	10.7	12.9	14.2	15.2	16.3	17.4
Stamp taxes on shares	2.9	3.2	3.0	3.2	3.3	3.4	3.5
Tobacco duties	9.3	9.2	9.2	9.3	9.4	9.5	9.7
Spirits duties	3.0	3.3	3.3	3.4	3.6	3.8	3.9
Wine duties	3.8	4.0	4.2	4.4	4.7	5.0	5.3
Beer and cider duties	3.7	3.6	3.5	3.7	3.7	3.8	3.8
Air passenger duty	3.2	3.1	3.2	3.3	3.5	3.7	3.9
Insurance premium tax	3.0	3.6	4.6	4.8	4.9	4.9	5.0
Climate change levy	1.6	1.8	2.1	2.2	2.1	2.4	2.2
Other HMRC taxes[4]	6.6	7.1	7.0	7.1	7.4	7.6	7.8
Vehicle excise duties	5.9	5.6	5.5	5.7	5.8	6.0	6.2
Bank levy	2.8	3.5	2.9	2.7	2.5	2.3	2.2
Bank surcharge	0.0	0.0	0.8	1.1	1.1	1.5	1.5
Apprenticeship levy	0.0	0.0	0.0	2.7	2.8	2.9	3.0
Licence fee receipts	3.1	3.1	3.1	3.2	3.2	3.3	3.4
Environmental levies	3.6	6.2	7.4	8.6	10.4	11.9	12.3
EU ETS auction receipts	0.6	0.5	0.5	0.4	0.4	0.4	0.4
Scottish taxes[5]	0.0	0.5	0.6	0.7	0.8	0.8	0.9
Diverted profits tax	0.0	0.0	0.1	0.1	0.1	0.1	0.1
Soft drinks industry levy	0.0	0.0	0.0	0.0	0.5	0.5	0.5
Other taxes	6.5	7.3	7.8	8.0	8.1	8.4	8.8
National Accounts taxes	**604.5**	**630.5**	**665.1**	**692.1**	**723.3**	**761.4**	**788.3**
Less own resources contribution to EU	-3.0	-3.2	-3.3	-3.2	-3.2	-3.4	-3.6
Interest and dividends	6.0	6.3	5.6	6.3	7.3	9.3	11.1
Gross operating surplus	44.1	45.4	47.0	48.6	50.0	51.5	54.1
Other receipts	3.3	2.7	2.0	2.0	2.1	2.1	2.2
Current receipts	**654.8**	**681.8**	**716.5**	**745.8**	**779.5**	**820.9**	**852.2**
Memo: UK oil and gas revenues[6]	*2.2*	*0.0*	*-1.1*	*-1.0*	*-0.9*	*-1.0*	*-0.9*

[1] Includes PAYE, self assessment, tax on savings income and other minor components.

[2] National Accounts measure, gross of reduced liability tax credits.

[3] Forecast for SDLT is for England, Wales and Northern Ireland from 2015-16.

[4] Consists of landfill tax (excluding Scotland from 2015-16), aggregates levy, betting and gaming duties and customs duties.

[5] Consists of Scottish LBTT and landfill tax but not the Scottish rate of income tax or aggregates levy.

[6] Consists of offshore corporation tax and petroleum revenue tax.

Table 4.7: Change to current receipts since November

	£ billion						
	Outturn	Forecast					
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Income tax (gross of tax credits)[1]	0.0	-2.0	-4.8	-8.5	-10.0	-11.7	-14.7
of which: Pay as you earn	0.0	-0.7	-3.5	-6.8	-8.1	-9.2	-11.7
Self assessment	0.0	-0.8	-1.3	-1.1	-1.7	-2.0	-2.5
National insurance contributions	0.0	0.2	-0.6	0.2	-0.4	-1.5	-2.3
Value added tax	0.0	0.2	0.0	-0.1	0.1	0.0	-0.3
Corporation tax[2]	0.0	-0.2	-1.3	-3.8	-1.8	7.5	3.7
of which: Onshore	0.0	0.2	-0.8	-3.3	-1.3	8.0	4.3
Offshore	0.0	-0.4	-0.5	-0.5	-0.5	-0.5	-0.6
Petroleum revenue tax	0.0	0.2	-0.6	-0.7	-0.6	-0.7	-0.6
Fuel duties	0.0	0.1	0.1	-0.2	-0.3	-0.4	-0.4
Business rates	0.2	0.0	0.2	-1.4	-1.6	-1.6	-2.0
Council tax	0.2	0.1	0.3	0.5	0.6	0.7	0.8
VAT refunds	0.0	0.1	0.2	0.3	0.4	0.2	0.0
Capital gains tax	0.0	0.6	0.3	-0.4	-0.4	-0.3	-0.5
Inheritance tax	0.0	0.2	0.2	0.1	0.0	0.0	0.0
Stamp duty land tax[3]	0.0	-0.5	-0.1	0.0	-0.2	-0.3	-0.4
Stamp taxes on shares	0.0	0.3	0.0	0.0	-0.1	-0.1	-0.1
Tobacco duties	0.0	0.0	0.1	0.1	0.2	0.2	0.2
Spirits duties	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Wine duties	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Beer and cider duties	0.0	0.1	0.0	0.0	0.0	0.0	0.0
Air passenger duty	0.0	0.0	0.0	0.0	0.0	0.0	0.1
Insurance premium tax	0.0	0.1	-0.1	0.1	0.0	0.0	0.0
Climate change levy	0.0	-0.3	-0.4	-0.2	-0.2	0.2	0.2
Other HMRC taxes[4]	0.0	0.2	0.1	0.2	0.2	0.2	0.1
Vehicle excise duties	0.0	0.2	0.2	0.1	0.1	0.1	0.1
Bank levy	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Bank surcharge	0.0	0.0	-0.1	-0.5	-0.5	0.2	0.2
Apprenticeship levy	0.0	0.0	0.0	-0.1	-0.1	-0.1	-0.1
Licence fee receipts	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Environmental levies	0.0	0.0	0.0	0.1	0.1	-0.3	-0.9
EU ETS auction receipts	0.0	0.0	0.0	-0.1	-0.2	-0.2	-0.2
Scottish taxes[5]	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Diverted profits tax	0.0	0.0	-0.2	-0.3	-0.2	-0.2	-0.3
Soft drinks industry levy	0.0	0.0	0.0	0.0	0.5	0.5	0.5
Other taxes	0.2	0.0	0.3	0.0	-0.1	-0.1	0.0
National Accounts taxes	**0.7**	**-0.4**	**-6.1**	**-14.5**	**-14.2**	**-7.4**	**-17.1**
Less own resources contribution to EU	0.0	0.0	-0.1	-0.1	-0.1	-0.1	-0.1
Interest and dividends	0.0	0.1	-0.6	-1.9	-2.4	-2.2	-2.1
Gross operating surplus	-0.4	-0.3	-0.2	-0.5	-0.4	-0.5	-0.5
Other receipts	0.3	0.2	0.1	0.0	0.1	0.1	0.1
Current receipts	**0.5**	**-0.4**	**-6.9**	**-16.9**	**-17.0**	**-10.2**	**-19.8**
Memo: UK oil and gas revenues[6]	*0.0*	*-0.1*	*-1.1*	*-1.2*	*-1.1*	*-1.2*	*-1.2*

[1] Includes PAYE, self assessment, tax on savings income and other minor components.

[2] National Accounts measure, gross of reduced liability tax credits.

[3] Forecast for SDLT is for England, Wales and Northern Ireland from 2015-16.

[4] Consists of landfill tax (excluding Scotland from 2015-16), aggregates levy, betting and gaming duties and customs duties.

[5] Consists of Scottish LBTT and landfill tax but not the Scottish rate of income tax or aggregates levy.

[6] Consists of offshore corporation tax and petroleum revenue tax.

Changes in the receipts forecast since November

4.28 We have revised our receipts forecast down in every year of the forecast, with the size of the revision increasing over time to reach £19.8 billion in 2020-21. As Table 4.8 shows, the main downward revisions are explained by:

- **PAYE income tax and national insurance contributions (NICs)**. Weaker earnings growth (due to our downward revision to underlying productivity growth) and updated assumptions about differential earnings growth (reflecting the latest ONS Annual Survey on Hours and Earnings) have reduced receipts significantly over the forecast;

- **VAT** receipts. Weaker consumer spending (also a consequence of weaker underlying productivity growth hitting incomes and therefore spending) is only partly offset by upward revisions to the standard rated share of spending;

- **corporation tax**. Weaker industrial and commercial profits (again productivity driven) reduce receipts in all years; and

- **stamp duty land tax (SDLT)**. A boost from stronger house price growth is more than offset by weak outturn receipts (pointing to underperformance of transactions in high priced properties) and changes to the modelling of the transaction distribution.

4.29 Over the forecast period as a whole, the effect of Budget tax measures is to lower receipts slightly (£0.7 billion a year on average) but the effect is very uneven across years (reducing receipts by £7.0 billion in 2017-18, but raising them by £6.3 billion in 2019-20). The indirect effects of Government decisions on receipts are slightly positive in the first half of the forecast, but negative by 2020-21, largely reflecting the overall decisions on the pace of fiscal tightening.

Table 4.8: Sources of change to the receipts forecast since November

	£ billion					
	Forecast					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
November forecast	682.2	723.4	762.7	796.5	831.1	871.9
March forecast	681.8	716.5	745.8	779.5	820.9	852.2
Change	**-0.4**	**-6.9**	**-16.9**	**-17.0**	**-10.2**	**-19.8**
	Underlying OBR forecast changes					
Total change to underlying forecast	**-0.4**	**-8.2**	**-10.5**	**-14.0**	**-16.3**	**-19.5**
of which:						
Income and expenditure	**-2.1**	**-6.8**	**-8.8**	**-11.0**	**-12.3**	**-13.8**
Average earnings	-2.1	-4.7	-5.6	-6.8	-7.6	-8.5
Employee numbers	0.4	-0.1	-0.5	-1.0	-1.1	-1.3
Non-financial company profits	-0.1	-0.9	-1.3	-1.5	-1.7	-1.9
Consumer expenditure	-0.2	-0.8	-1.1	-1.4	-1.5	-1.7
Investment	0.0	0.0	0.5	0.7	1.0	1.2
Other	-0.2	-0.3	-0.8	-1.0	-1.3	-1.6
North Sea	**0.3**	**0.0**	**-0.1**	**-0.1**	**-0.1**	**-0.1**
Oil and gas prices	-0.1	-0.4	-0.5	-0.4	-0.4	-0.4
Production and expenditure	0.4	0.4	0.4	0.3	0.3	0.3
Property markets	**0.2**	**0.5**	**0.4**	**0.3**	**0.2**	**0.1**
Market-derived assumptions	**-0.1**	**-1.1**	**-2.4**	**-2.8**	**-3.2**	**-3.4**
Equity prices	-0.1	-0.8	-1.8	-1.9	-2.1	-2.3
Interest rates	0.0	-0.3	-0.6	-0.9	-1.1	-1.1
Prices	**0.0**	**-0.3**	**-0.3**	**-0.1**	**-0.1**	**0.0**
Other economic determinants	**0.2**	**-0.2**	**0.2**	**0.2**	**0.1**	**-0.1**
Other assumptions	**1.2**	**-0.3**	**0.4**	**-0.5**	**-0.9**	**-2.2**
IT and NICs receipts and modelling	0.1	0.0	0.6	0.7	0.5	0.1
SDLT receipts and modelling	-0.7	-0.9	-1.0	-1.1	-1.2	-1.4
Corporation tax receipts and modelling	0.4	-0.4	0.8	-0.3	0.1	-0.4
VAT receipts and modelling	0.5	0.4	0.1	-0.1	-0.1	0.1
Incorporations modelling	-0.1	-0.4	-0.7	-0.9	-1.3	-1.6
Other judgements and modelling	1.0	1.1	0.7	1.3	1.1	0.9
	Effect of Government decisions					
Total effect of Government decisions	**0.0**	**1.3**	**-6.4**	**-3.0**	**6.1**	**-0.2**
of which:						
Scorecard measures	0.0	0.6	-7.0	-4.3	6.3	0.8
Indirect effects	0.0	0.7	0.6	1.3	-0.2	-1.1
Memo: March forecast on a pre-measures basis	*681.8*	*715.1*	*752.2*	*782.6*	*814.8*	*852.4*

Receipts in 2015-16

4.30 In preparing this forecast, we had access to full ONS receipts data up to January 2016 and some administrative data for February. Central government receipts in January were up by £2.4 billion (3.4 per cent) on a year earlier, largely reflecting payments of SA income tax and capital gains tax (CGT) relating to 2014-15 liabilities.

4.31 Table 4.9 looks at receipts growth in the first ten months of 2015-16. It shows that we expect overall growth in National Accounts taxes in the final two months of 2015-16 to be considerably higher than in the first ten months. This reflects a number of factors:

- **stamp duty land tax** receipts are expected to be 16.5 per cent higher in February and March combined than in the same months last year, up from a 0.3 per cent increase year-to-date. This is due largely to the December 2014 introduction of a 'slice' system for residential properties. The giveaway associated with this change stopped depressing year-on-year growth in SDLT receipts in December. The expected pick-up in the growth of SDLT receipts remains despite a £0.5 billion downward revision to our forecast since November;

- stronger growth in **income tax and NICs receipts**, reflecting indications from HMRC administrative data for February. The Government's **marriage tax allowance** is also costing less than expected, thanks to IT problems for many people trying to claim it and a combination of lack of awareness and reluctance to attract the attention of HMRC among other potential recipients. That more than offsets the lower yield from the introduction of **Class 3A voluntary NICs**, where lack of awareness has also led to much lower take-up than expected;

- our forecast for **environmental levies** receipts (contained within the 'other' line of Table 4.9) is higher than would be suggested by receipts year to date. We are investigating differences in estimates between DECC and the ONS;

- **alcohol duties** grow more strongly in the final two months of the year, as we expect that reverse forestalling associated with cuts in duty rates last year will not be repeated;

- **stamp duty on shares** and **VAT** receipts will both be boosted by large payments made in February; and

- **insurance premium tax (IPT)** receipts will be boosted by the July Budget measure to increase the standard rate of IPT to 9.5 per cent from November 2015.

4.32 Weaker growth in corporation tax receipts (where timing effects boosted receipts at the end of 2014-15) partly offsets this growth. Our forecasts for the split of SA between income tax, CGT and NIC4 in 2015-16 are based on the latest estimates from HMRC. These estimates have been revised from the initial data used in the January ONS numbers.

Table 4.9: Receipts in 2015-16

	£ billion			Percentage change on 2014-15		
	Outturn	Forecast		Outturn	Forecast	
	Apr-Jan	Feb-Mar	Full year	Apr-Jan	Feb-Mar	Full year
Income tax and NICs	230.0	54.7	284.7	3.8	4.6	3.9
of which:						
PAYE and NICs	209.9	51.5	261.4	4.4	4.6	4.4
Self assessment	21.1	3.1	24.1	2.7	-3.0	2.0
Value added tax	96.4	19.4	115.8	3.6	6.6	4.1
Corporation tax	40.5	3.6	44.1	3.0	-1.4	2.6
Petroleum revenue tax	-0.3	-0.2	-0.5			
Fuel duties	23.1	4.4	27.5	1.5	-0.3	1.2
Capital gains tax	5.5	1.6	7.0	28.0	22.2	26.7
Inheritance tax	3.9	0.7	4.6	19.6	21.9	19.9
Stamp duties	12.1	2.3	14.4	1.5	21.5	4.2
Tobacco duties	7.0	2.2	9.2	-0.4	0.8	-0.1
Alcohol duties	9.1	1.8	10.9	2.6	14.9	4.5
Business rates	23.5	4.3	27.8	1.8	-1.2	1.3
Council tax	24.1	4.7	28.8	2.8	-0.2	2.2
Other[1]	44.4	10.0	54.4	4.8	19.7	7.3
National Accounts taxes[1]	**519.2**	**109.5**	**628.7**	**3.6**	**5.9**	**4.0**

[1] Forecast data have been adjusted to exclude feed-in-tariffs, the warm home discount and other items which were excluded in the January ONS Public Sector Finances release. Further detail on these items can be found in the fiscal supplementary tables on our website.

Tax-by-tax analysis

Income tax and NICs

4.33 Receipts of income tax and NICs are expected to be £1.7 billion lower in 2015-16 than we forecast in November. This reflects shortfalls in a number of tax streams – PAYE and NIC receipts on employment income are expected to be £0.5 billion lower, self-assessment (SA) income tax £0.8 billion lower, non-SA (largely PAYE) repayments £0.4 billion higher and the yield from the Budget 2014 measure on voluntary NICs just under £0.4 billion lower. Receipts from NICs on the self-employed (NIC4) were £0.4 billion higher than expected.

4.34 The shortfall in the pre-measures income tax and NICs forecast relative to November widens to £13.1 billion by 2020-21, with weaker earnings growth explaining £8.5 billion of the shortfall by then. Lower earnings growth in each year reflects our judgement in the economic forecast that trend productivity growth will be around 0.2 percentage points lower each year. This lowers real (and nominal) wage growth by a similar amount.

4.35 Earnings growth in the second half of 2015-16 has been weaker than we expected in November and more than explains the £0.5 billion shortfall in PAYE and NIC receipts on employment income. Lower earnings growth should have taken around £2.1 billion off the 2015-16 forecast since November, but has been partly offset by a higher effective tax rate on these earnings, particularly due to strong growth of receipts from the business services sector. In the light of initial receipts from bonuses and recent announcements about major banks' bonus pools, we have assumed a 5 per cent fall in financial sector bonuses in 2015-

16. With most bonuses paid in February and March (and associated tax received by HMRC in March and April), this judgement remains uncertain.

4.36 Receipts from PAYE and NICs are expected to rise by 0.5 per cent of GDP in 2016-17, with NICs accounting for the majority of the rise. This mainly reflects the Budget 2013 policy decision to abolish the NICs contracting-out rebate from April 2016. This is expected to raise NICs receipts by £5.6 billion, 0.3 per cent of GDP in 2016-17, with around 50 per cent of the extra burden falling on public sector employers in higher employer NICs. NIC receipts will also be boosted in 2016-17 by unchanged tax thresholds, since CPI inflation in September 2015 (the month used for uprating NIC thresholds for the following financial year) was -0.1 per cent. Growth in PAYE receipts will be slower reflecting the decision to raise the personal allowance to £11,000 and the higher rate threshold to £43,000 from April 2016.

4.37 In this Budget, further above-inflation rises in the personal allowance and higher rate thresholds in 2017-18 have been announced. We have not included the effect from the Government's commitment to raise the personal allowance to £12,500 for all taxpayers and raising the higher rate threshold to £50,000 by the end of the Parliament. Paragraph 4.9 provides an estimate of the additional cost of meeting these commitments in 2020-21.

4.38 We expect a further 0.4 percentage point rise in the income tax and NICs to GDP ratio in the final three years of the forecast, with earnings growth outpacing inflation-linked rises in thresholds and allowances. This will drag more income into higher tax brackets.

4.39 Our forecast for PAYE and NIC receipts depends on the shape of the income distribution. In particular PAYE income tax benefits from stronger growth at the top end, given its progressive structure. When calculating marginal and average tax rates to feed into the forecast, we allow for differential earnings growth for different parts of the income distribution. These are based on historical averages from the ONS's Annual Survey of Hours and Earnings (ASHE). In contrast to the pre-crisis period, when earnings growth at the top end was stronger than for the whole distribution, the latest 7-year average suggests that earnings growth at the top end is similar to the distribution as a whole. Including the latest information on the income distribution takes around £0.8 billion off the forecast by 2020-21 relative to our November forecast. We have also continued to allow for the effects of introducing the National Living Wage. With many of those on the minimum wage close to or below the personal allowance or the lower earnings limit for NICs, the effective tax rate on their higher earnings will be very low.

4.40 A number of policy measures came into effect in 2015-16:

- tax from pension withdrawals relating to the **pension flexibility measure** is expected to be around £0.9 billion for the whole of 2015-16, around £0.2 billion higher than assumed in the original costing;

- take-up of the **transferable marriage allowance** has been much lower than initially assumed. We have incorporated a take-up rate of 12 per cent for 2015-16 compared

with over 70 per cent in the original costing. We assume that take-up eventually rises to around 50 per cent by the end of the forecast period. Lower take-up is likely to reflect issues with HMRC's IT systems, a lack of awareness of the allowance (e.g. reflecting limited initial advertising) and possibly a reluctance by those eligible to engage with HMRC. The lower take-up rate has boosted receipts by £0.4 billion in 2015-16. The improvement in receipts is smaller in future years, because taxpayers will be able to claim for previous years as take-up increases; and

- the yield from the Budget 2014 measure on **voluntary NICs** has been much lower than anticipated. This measure enabled pensioners to acquire additional state pension in exchange for a lump sum National Insurance payment at an actuarially fair price. Take-up has been much lower than expected, although the average amount contributed has been higher. We now expect receipts of around £65 million in both 2015-16 and 2016-17, compared with original estimates of £435 million in both years.

4.41 We expect self-assessment (SA) income tax receipts in 2015-16 (which relate to 2014-15 liabilities) to be up 2 per cent on the previous year, which itself had been boosted by the deferral of income relating to the reduction in the additional rate of income tax to 45 per cent. Relative to our November forecast, receipts were £0.8 billion lower than expected. This is partly due to lower SA from the Construction Industry Scheme and may also reflect lower than expected receipts from the Budget 2013 and Autumn Statement 2013 measures on partnerships. Preliminary data from SA returns suggests partnership income did not grow as strongly as expected. We will look further at this measure in our analysis of anti-avoidance measures in our next *EFO*.

4.42 We expect SA income tax receipts to rise by just over £6 billion in 2016-17 (0.3 per cent of GDP), with forestalling ahead of the rise in dividend tax adding £2.5 billion. This estimate is informed by the 2010-11 introduction of the 50p additional rate of income tax for incomes over £150,000[6]. We also expect 2016-17 to be the peak year for yield from the accelerated payments measure. If our estimate of the yield is correct, this explains a further £0.9 billion of the rise in 2016-17 SA receipts. The unwinding of the forestalling in 2017-18 and 2018-19 will depress receipts in those years but we expect SA receipts to increase by 45 per cent between 2015-16 and 2020-21, almost double the 25 per cent rise in public sector current receipts as a whole. In addition to the rise in dividend tax, a number of other measures announced at recent Budgets and Autumn Statements will boost receipts. These include changes in non-domicile rules, HMRC compliance and 'making tax digital' measures, restrictions on residential landlords' deductions from taxable income and the savings tax reforms. Much of the remaining liabilities on savings income will now be collected via SA.

[6] The Survey of Personal Incomes released at the start of March indicated that tax liabilities from additional rate taxpayers rose by £8 billion between 2012-13 and 2013-14. Taxpayers shifting income between years to take advantage of the lower 45p rate is likely to be a major factor driving this increase. In Box 4.2 of the March 2012 EFO, we forecast that deferring income between the two years would reduce tax liabilities by £3.4 billion in 2012-13 and raise them by £3.3 billion in 2013-14. Underlying growth in self-employment and dividend income will also have increased tax liabilities. The March 2012 costing of the pre-announced reduction in the additional rate estimated the measure would reduce receipts by £0.1 billion in 2013-14. The extent of the income-shifting prompted by the pre-announcement means it will never be possible to estimate the true cost of reducing the rate with any confidence, but we believe the original costing remains a reasonable guide to its effect on receipts.

4.43 We have reduced the yield we expect from the Liechtenstein and Crown Dependencies disclosure facilities in light of lower than expected registrations when they closed at the end of 2015. Much of the yield was expected to come through via SA in 2016-17 and this has reduced SA receipts by £0.6 billion in that year. Annex A provides more detail on the re-costing of these measures.

4.44 Our forecasts for PAYE, SA, NICs and corporation tax have included an effect from the rising trend in incorporations. When individuals choose to form companies, there will be a tax saving given the lower tax rates faced by incorporated businesses. This will lower PAYE, SA and NIC receipts, but raise corporation tax receipts, with the net effect negative for receipts overall. We have re-assessed the trend in incorporations in light of continued strong growth in the number of one-director companies. Tax rate differentials will be one reason for this growth, but in sectors such as information technology and construction, incorporation is becoming an increasingly popular way of working. We have assumed that there will be stronger growth in incorporations over the forecast period. Compared with our November forecast, this takes £2.6 billion off PAYE, SA and NIC receipts by 2020-21, but adds £1.1 billion to corporation tax.

Table 4.10: Key changes to the income tax and NICs forecast since November

	£ billion					
	Forecast					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
November forecast	286.4	313.9	328.3	347.5	365.8	386.8
March forecast	284.7	308.6	320.0	337.1	352.6	369.8
Change	**-1.7**	**-5.3**	**-8.3**	**-10.5**	**-13.1**	**-17.0**
	Underlying OBR forecast changes					
Total	**-1.7**	**-5.9**	**-7.0**	**-9.0**	**-10.9**	**-13.1**
(by economic determinant)						
Average earnings	-2.1	-4.7	-5.6	-6.8	-7.6	-8.5
Employee numbers	0.4	-0.1	-0.5	-1.0	-1.1	-1.3
Inflation	0.0	-0.1	0.3	0.6	0.7	0.7
SA determinants	0.1	-0.2	-0.3	-0.5	-0.6	-0.7
Other economic determinants	0.0	-0.3	-0.4	-0.6	-0.7	-0.7
(by other category)						
Outturn IT and NICs receipts	1.0	0.8	0.7	0.7	0.8	0.8
Outturn SA receipts	-0.3	-0.4	-0.6	-0.6	-0.6	-0.6
Incorporations modelling	-0.1	-0.5	-1.0	-1.4	-2.0	-2.6
Income distribution modelling	-0.2	-0.1	-0.3	-0.3	-0.5	-0.8
Marriage tax allowance recosting	0.4	0.1	0.3	0.4	0.3	0.3
Offshore recostings	0.0	-0.6	-0.2	0.2	0.1	0.0
Voluntary NICs recosting	-0.4	-0.4	0.0	0.0	0.0	0.0
Other costing revisions	0.2	0.6	0.4	0.1	0.1	0.2
Other modelling and receipts changes	-0.6	-0.1	0.3	0.3	0.3	0.3
	Changes due to Government decisions					
Scorecard measures	**0.0**	**0.2**	**-1.8**	**-2.3**	**-1.7**	**-2.8**
Indirect effects of Government decisions	**0.0**	**0.4**	**0.5**	**0.9**	**-0.6**	**-1.0**

VAT

4.45 Accrued VAT receipts are expected to increase by 4.1per cent in 2015-16 from a year earlier and are £0.2 billion higher than our November forecast. Very weak growth in cash VAT receipts in April and May 2015 depressed 2014-15 accruals, boosting accrued receipts growth in 2015-16. The share of consumer spending subject to the standard rate of VAT is expected to rise by 0.3 percentage points in 2015 despite lower spending on standard-rated road fuels resulting from the sharp drop in the oil price. This has been offset by higher spending on new cars and on recreation and culture.

4.46 Compared with our November forecast, we expect accrued VAT receipts to be lower from 2016-17 onwards. Growth in nominal consumer spending has been revised down in each year reflecting our judgement that trend productivity growth will be weaker than previously assumed. This feeds into lower real wages and lower real (and nominal) consumer spending. This takes £1.6 billion off the VAT forecast by 2020-21. Partly offsetting this, the share of consumer spending subject to the standard rate of VAT is expected to be higher throughout the forecast. This reflects the higher 2015 starting point and our lower interest rate assumptions which mean less income will be spent on mortgage interest payments.

4.47 A key element of the VAT forecast is the assumption for the VAT gap – the difference between the theoretical level of VAT payments and actual amounts received by HMRC. In the absence of measures, we hold the underlying VAT gap flat at its 2015-16 level. After measures, we expect a fall in the VAT gap of just over 1 percentage point to 10.3 per cent by the end of the forecast period. The decline largely reflects the operational measures announced in the July 2015 Budget and the measures tackling overseas trader evasion and the reverse charge on electronic communication services announced in this Budget.

Table 4.11: Key changes to the VAT forecast since November

	£ billion					
	Forecast					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
November forecast	115.6	120.1	124.9	130.2	135.9	142.3
March forecast	115.8	120.1	124.8	130.3	135.9	142.0
Change	**0.2**	**0.0**	**-0.1**	**0.1**	**0.0**	**-0.3**
	Underlying OBR forecast changes					
Total	**0.2**	**-0.2**	**-0.4**	**-0.5**	**-0.7**	**-1.0**
of which:						
Household spending	-0.2	-0.8	-1.1	-1.3	-1.4	-1.6
Standard rated share	0.5	0.4	0.7	1.0	1.1	1.1
Other economic determinants	-0.1	0.1	0.1	0.1	-0.1	-0.4
Outturn receipts and modelling	0.0	0.1	-0.2	-0.3	-0.3	-0.1
	Changes due to Government decisions					
Scorecard measures	**0.0**	**0.1**	**0.2**	**0.2**	**0.4**	**0.4**
Indirect effects of Government decisions	**0.0**	**0.0**	**0.2**	**0.5**	**0.3**	**0.3**

Onshore corporation tax

4.48 We expect receipts from onshore corporation tax (CT) in 2015-16 to be up by 6.6 per cent from a year earlier, in light of strong growth in payments from the financial sector and from larger industrial and commercial companies. Strong growth in receipts from the financial sector is likely to be the result of the Autumn Statement 2014 measure to limit the use of trading losses by the financial sector. Growth in receipts from larger industrial and commercial companies was boosted by unusually high payments relating to previous years' liabilities. This helped offset the effect from the cut in the main rate of corporation tax to 20 per cent. In contrast, CT receipts from smaller industrial and commercial companies have fallen in 2015-16, partly reflecting the increase in the annual investment allowance to £500,000 until December 2015.

4.49 Growth in onshore CT slowed through 2015-16 and is expected to fall slightly in 2016-17. This reflects a combination of factors – the slowdown in profit growth evident in the latest National Accounts data, a return to a more usual pattern of payments relating to liabilities from previous years, the effect of lower equity prices on the profits of life assurance firms and that the accelerated payments measure has brought forward receipts into 2015-16 at the expense of lower yield in future years. We expect growth in receipts from smaller industrial and commercial companies to resume in 2016-17, helped by the rise in incorporations (particularly of one-director companies).

4.50 Compared with November, our pre-measures onshore CT forecast is lower in each year from 2016-17 onwards. Weaker growth in industrial and commercial company profits takes off £1.9 billion by 2020-21, but this is partly offset by weaker growth in investment (which means that fewer capital allowances are used to offset taxable profits) and an upward revision to the number of incorporations expected over the forecast period. This adds £1.1 billion to the forecast by 2020-21 (although the loss of PAYE, SA and NIC receipts more than offsets higher CT receipts).

4.51 The profile of onshore CT receipts over the forecast period – with a sharp rise in 2019-20 – largely reflects the measures announced in this Budget and the July 2015 Budget. In July, the Government decided to bring the CT payment date for larger companies forward by four months from April 2017 raising receipts by over £5 billion in 2017-18 and around £3 billion in 2018-19. In this Budget, the Government has delayed the start of this policy to April 2019 "to give business more time to prepare". This moves the boost to receipts back to 2019-20 and 2020-21. Of the £6.9 billion rise in onshore CT in 2019-20, around £5.8 billion is from the CT timing measure. Receipts are in effect being brought forward from later years, providing a one-off boost that is neither repeated nor subsequently reversed.

4.52 Abstracting from the CT timing measure, this Budget raises onshore CT receipts in each year of the forecast. Measures such as those on restricting the use of trading losses, the tax deductibility of corporate interest expenses, reducing evasion by offshore property developers and extending the scope of the hybrid mismatch rules raise over £2 billion in 2017-18 and 2018-19. The announcement that the rate of corporation tax will be reduced to 17 per cent in 2020-21 provides a partial offset at the end of the forecast period.

4.53 The Government announced the introduction of a diverted profits tax in Autumn Statement 2014. This is designed to target multinationals that use contrived tax arrangements and was expected to raise around £300 million a year from 2016-17 onwards. Our forecast assumes that overall yield from the measure will be close to that originally scored, but we now expect that around two-thirds of the yield will come through higher CT payments (as firms restructure their tax affairs) rather than via the diverted profits tax itself. Yield from multinationals using such tax arrangements is highly uncertain, so we will need to look again at the yield and the split between CT and diverted profits tax in future forecasts.

Table 4.12: Key changes to the onshore corporation tax forecast since November

	£ billion					
	Forecast					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
November forecast	43.4	44.2	49.2	47.4	44.9	46.1
March forecast	43.6	43.4	45.9	46.1	53.0	50.4
Change	**0.2**	**-0.8**	**-3.3**	**-1.3**	**8.0**	**4.3**
	Underlying OBR forecast changes					
Total	**0.3**	**-1.3**	**-0.2**	**-0.9**	**-0.2**	**-0.4**
of which:						
Industrial and commercial company profits	-0.1	-0.9	-1.3	-1.5	-1.7	-1.9
Industrial and commercial company investment	0.0	0.2	0.4	0.6	0.8	1.0
Other economic determinants	0.0	-0.3	-0.4	-0.3	-0.2	-0.2
Incorporations modelling	0.0	0.1	0.3	0.5	0.7	1.1
Other modelling and costings updates	-0.5	-0.1	0.8	-0.1	0.3	-0.2
Latest receipts data	0.9	-0.2	-0.1	-0.1	-0.2	-0.2
	Changes due to Government decisions					
Scorecard measures	**0.0**	**0.5**	**-3.1**	**-0.5**	**8.3**	**4.8**
Indirect effects of Government decisions	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**-0.1**

UK oil and gas revenues

4.54 We expect UK oil and gas revenues to be slightly negative (-£10 million) in 2015-16, down from £2.2 billion in 2014-15 and almost £11 billion as recently as 2011-12. We have revised oil and gas revenues down by an average of £1.2 billion a year from 2016-17. Receipts are expected to be negative throughout the forecast period – with repayments around £1 billion higher than payments in each year.

4.55 A key element of the downward revision in oil and gas revenues since our November forecast is the further drop in oil and gas prices. Oil prices are projected using futures prices for the first two years and then held flat in nominal terms. This leaves them $18 a barrel lower in 2015 and $15 a barrel lower in the medium term than in our November forecast. The depreciation of sterling against the dollar in recent months means that the percentage fall in sterling oil prices has been smaller. Gas prices are expected to be 9.2p a therm lower in 2016 and then nearly 8p a therm lower over the rest of the forecast.

4.56 Oil production rose by 12.8 per cent in 2015, partly reflecting the lagged effects of high levels of investment in the North Sea in recent years and an unusually low level of both planned and unplanned outtages. Despite the lower oil price environment, we expect this

higher level of production to be sustained in the near term. In light of higher plans for capital expenditure that have already been sanctioned by the Oil and Gas Authority (OGA), we also expect higher capital expenditure in the near term. But given lower oil and gas prices, we have reduced our forecast for capital expenditure towards the end of the forecast as lower prices are expected to result in lower unit costs and fewer projects clearing investment hurdle rates. Operating expenditure fell by more than we expected in 2015 and this effect is pushed into the near-term forecast.

4.57 With oil and gas prices down on their 2015 levels, we expect a further decline in the profitability of the sector in 2016-17 with many firms making losses. Payments of offshore CT and petroleum revenue tax (PRT) will be lower and are likely to be dwarfed by repayments relating to decommissioning costs and the carry back of trading losses.

4.58 The Budget announced that the rate of PRT will be reduced from 35 per cent to zero and the supplementary charge reduced to 10 per cent. This lowers receipts by an average of £0.2 billion a year from 2016-17. The cost is small because there are only a few profitable firms in the sector. Lower tax rates will boost the post-tax returns on oil and gas production, but we have assumed only a modest behavioural response. As noted earlier, the low oil and gas price environment will make it difficult for projects to clear investment hurdles. This is likely to be the case even with lower tax rates.

4.59 This forecast remains subject to significant uncertainty, particularly the extent to which much lower oil and gas prices will affect production and expenditure. The forecast model that HMRC operates for us to produce this forecast implies big rises in aggregate losses across the forecast period, which, if it proved accurate, might lead to bigger changes in activity in the North Sea than are assumed in our central forecast.

Stamp duties

4.60 Stamp duty land tax (SDLT) receipts are forecast to increase from £10.7 billion in 2015-16 to £17.4 billion in 2020-21[7]. This strong rise reflects both tax base effects – rising prices and, to a lesser extent, transactions – as well as a rising effective tax rate, as rising house prices drag a greater proportion of the value of residential transactions into higher tax brackets. It also reflects announcements in Autumn Statement 2015 and in this Budget raising the stamp duty on second homes and buy-to-let properties and the move to a 'slice' system for SDLT on commercial property. These measures add around £1.1 billion to SDLT receipts in 2016-17, rising to £1.6 billion by the end of the forecast.

4.61 Compared with November, SDLT receipts in 2015-16 have been revised down by £0.5 billion. This is despite house prices being a little stronger than expected in recent months and property transactions close to forecast. The effective tax rate appears to have fallen, reflecting the weaker top end of the residential property market. Pushing the weaker 2015-16 receipts through the forecast (plus modelling changes) takes over £1 billion off receipts by 2020-21. In particular, SDLT receipts are weaker because transactions among properties

[7] SDLT is no longer paid in Scotland, where property transactions tax has been devolved and the Scottish Government introduced a land and buildings transactions tax (LBTT) in April 2015.

worth at least £2 million have fallen. While the 9 per cent year-on-year drop over the first ten months of 2015-16 represents only around 390 fewer transactions, each transaction pays a very large amount of SDLT. Assuming an average transaction price in this bracket of £4 million would imply a £150 million drop in receipts.

4.62 We have reduced our forecast for stamp duty on shares by £0.1 billion a year on average from 2016-17. This is more than explained by the lower path for equity prices. Stamp duty on shares is up £0.3 billion in 2015-16 compared with our November forecast reflecting a large one-off payment and a higher volume of stampable shares than previously assumed. The latter effect is pushed through the forecast.

Table 4.13: Key changes to the SDLT forecast since November

	£ billion					
	Forecast					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
November forecast	11.2	12.9	14.3	15.4	16.6	17.8
March forecast	10.7	12.9	14.2	15.2	16.3	17.4
Change	**-0.5**	**-0.1**	**0.0**	**-0.2**	**-0.3**	**-0.4**
	Underlying OBR forecast changes					
Total	**-0.5**	**-0.6**	**-0.7**	**-0.8**	**-1.0**	**-1.2**
of which:						
House prices	0.2	0.3	0.3	0.3	0.3	0.2
Residential property transactions	0.0	0.1	0.0	0.0	0.0	0.0
Commercial property market	0.0	0.0	0.0	-0.1	-0.1	-0.1
Other modelling and receipts outturns	-0.7	-0.9	-1.0	-1.1	-1.2	-1.4
	Changes due to Government decisions					
Indirect effects of Government decisions	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.1**
Scorecard measures	**0.0**	**0.5**	**0.6**	**0.6**	**0.7**	**0.7**

Taxes on capital

4.63 **Capital gains tax (CGT)** is currently paid via SA in the final quarter of the financial year after the year in which the gains from the sale of an asset are realised. So CGT receipts in 2015-16 reflect asset disposals in 2014-15. CGT receipts have risen from £5.6 billion in 2014-15 to £7.0 billion in 2015-16, a rise of 27 per cent. This is on top of a rise of 42 per cent in 2014-15, so that 2015-16 receipts are 80 per cent up on 2013-14. CGT receipts in 2015-16 were stronger than would have been suggested by growth in house and equity prices in 2014-15. Preliminary analysis suggests disposals of property (because CGT is payable on the gains from non-principal residences) and unlisted shares drove the rise in receipts.

4.64 Compared to our November forecast, CGT receipts are £0.6 billion higher in 2015-16 but weaker from 2017-18 onwards. Lower equity prices more than offset the effect of pushing the higher 2015-16 outturn through the forecast. CGT is highly geared to changes in equity prices, since around two-thirds of chargeable gains are related to financial assets and CGT is only charged on the gain rather than the disposal price. The profile for receipts over the forecast largely reflects the path of equity prices and the Autumn Statement 2015 measure that from 2019-20 CGT on residential property would be due 30 days after the disposal

rather than between 10 and 21 months after the sale. This brings around £0.9 billion of CGT receipts into 2019-20. As with the measures that bring forward CT payment dates, this represents a one-off increase in receipts that is neither repeated nor reversed in later years.

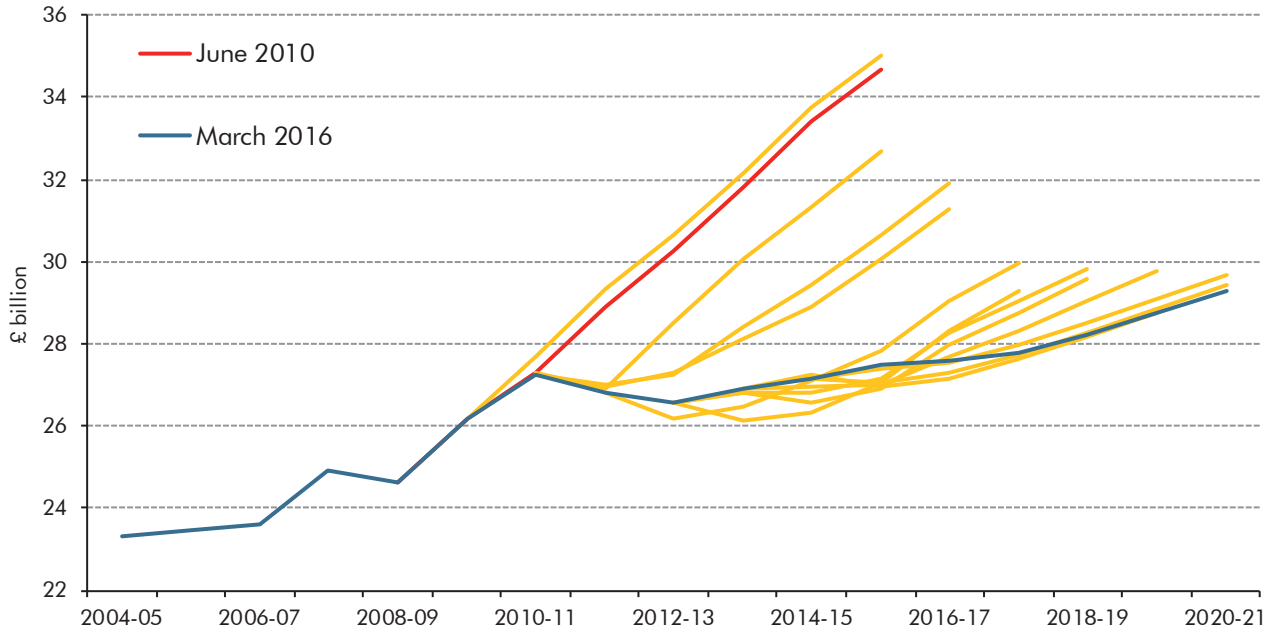
4.65 Receipts from **inheritance tax (IHT)** are expected to rise by around 20 per cent in 2015-16 and have been revised up by £0.2 billion from our estimate in November. Given the lags before IHT is paid, strong growth in house prices in 2014-15 is likely to be a key factor driving recent receipts growth. Housing assets account for around 50 per cent of the value of estates notified for probate. A higher number of deaths last winter and some exceptionally high-value estates have also boosted receipts this year. Further out, the effect from lower equity prices broadly offsets this higher starting point, meaning that IHT receipts are similar to our November forecast. The Government recently opened a consultation on proposals to change the fees payable for an application for a grant of probate. We would expect these changes to reduce IHT receipts if they go ahead, but since they are currently proposals subject to consultation no impact has been included in this forecast.

Fuel duties

4.66 Compared with November, we have revised fuel duty receipts up by £0.1 billion in 2015-16, leaving them up around 1 per cent on a year earlier. With duty rates frozen, this reflects a small rise in fuel clearances. These had fallen in every year between 2007-08 and 2012-13, reflecting improvements in fuel efficiency and the effects of the late 2000s recession on mileage. With fuel duty charged on a pence per litre basis, the drop in pump prices has helped raise the demand for fuel and boost receipts in the past three years. The further fall in oil prices since November provides a £0.2 to £0.3 billion a year boost to receipts, but there are offsets from our lower forecasts for both real GDP growth and RPI inflation.

4.67 The Budget announced that fuel duty would be frozen in April 2016 rather than being uprated in line with RPI inflation – the first freeze in this Parliament, following the five freezes and one cut that took place in the last Parliament. The Government maintains in its *Budget 2016 policy costings document* that its policy is to uprate duty rates with RPI inflation each year from April 2017. With improved fuel efficiency likely to reduce the demand for fuel from 2017-18 onwards, the £1.7 billion increase in receipts between 2016-17 and 2020-21 is more than explained by the implied duty rises. But this could be considered a source of policy risk to the forecast, given repeated decisions to cancel planned duty rises in recent years. Chart 4.3 shows our forecasts for fuel duty since June 2010, with the downward revisions dominated by these policy decisions.

Chart 4.4: Successive fuel duty forecasts since June 2010



Source: HMRC, OBR

Alcohol and tobacco duties

4.68 Alcohol duty is expected to rise from £10.9 billion in 2015-16 to £13.0 billion in 2020-21. Receipts from wine and spirits are expected to increase by £1.3 billion and £0.6 billion respectively, but we expect a rise of just £0.2 billion from beer and cider. We assume that the downward trend in beer clearances continues through the forecast. Our forecast for alcohol duties is little changed since November. It incorporates the Budget announcement that alcohol duties for beer, cider and spirits will be frozen in April 2016.

4.69 Tobacco receipts are expected to rise only slightly, from £9.2 billion in 2015-16 to £9.7 billion in 2020-21, despite RPI plus 2 per cent rises in duty each year. The effect of these duty rises is largely offset by the downward trend in cigarette clearances, thanks in part to the recent above-RPI increases in duty, changing attitudes to smoking, policies (such as the display ban) and the growing popularity of e-cigarettes. Our forecast is little changed since November. Receipts are £0.1 billion a year higher reflecting a lower euro/sterling exchange rate, which reduces the relative benefits of cross border shopping.

Other taxes

4.70 **Business rates** receipts are calculated by multiplying the rateable value of non-domestic property by the multiplier (which is uprated in line with RPI inflation). In the absence of measures, receipts would be down by around £0.2 billion by 2020-21, reflecting the downward revisions in our RPI forecasts. The Budget announced a package of measures on business rates which reduce receipts by between £1.4 and £1.9 billion a year from 2017-18. These include the permanent doubling of the small business rate relief and a widening in its eligibility criteria, as well as moving indexation of the multiplier to CPI rather than RPI

from 2020-21. The Government had previously extended the doubling of small business rate relief for one year every year since 2011.

4.71 Our business rates forecast is subject to some further policy-related uncertainty following the Government's announcement of its intention to localise all business rates and to provide some additional discretion to local authorities in setting business rates. However, the Government has told us that because this will be implemented as part of a wider package that it intends to be fiscally neutral, this element alone does not yet constitute firm Government policy. We have not therefore reflected it in this forecast (see Box 4.3).

4.72 Receipts from **council tax** are expected to be around £0.8 billion higher in 2020-21 than in our November forecast. These changes are explained in more detail in the expenditure section of this chapter. Changes in council tax receipts are offset within the locally financed expenditure forecast and are therefore neutral for borrowing.

4.73 **Environmental levies** include levy-funded spending policies such as the renewables obligation (RO), contracts for difference (CfD), feed-in tariffs (FITs) and the warm homes discount. Environmental levy receipts also include receipts from the carbon reduction commitment, but not other DECC schemes that affect energy bills such as the energy company obligation. Our forecast shows environmental levy receipts are expected to rise from £6.2 billion in 2015-16 to £12.3 billion in 2020-21. This steep rise mainly reflects the expected rise in electricity generation from renewable sources.

4.74 Compared with November, our forecast is lower by £0.9 billion by 2020-21, although it would have been higher prior to policy announcements. This reflects higher assumptions on load factors for a variety of renewable technologies (leading to higher electricity generation) and the fact that lower electricity prices will raise spending through the CfD scheme. The December announcements on FITs (lower tariffs and a deployment cap) and closing the RO to small-scale solar PV from April 2016 reduce spending by 2020-21 by a little over £400 million and £60 million respectively. The Spending Review decision to remove the capital budget for the carbon capture and storage (CCS) competition means that we no longer expect the CCS demonstration projects to deploy. The associated CfD spending is reduced by £0.5 billion in 2020-21. All these policies have the same effect on both receipts and spending, so are neutral for borrowing. The abolition of the carbon reduction commitment reduces receipts by around £0.5 billion in 2020-21.

4.75 The environmental levies forecasts are produced for us by DECC using forecasting models that are relatively complex and that rely on commercially sensitive information. Both factors reduce the transparency of the forecasting process and our ability to scrutinise forecast changes in detail. This is an area that we hope to be able to improve over time, subject to the availability of analytical resources.

4.76 The Budget has announced that a **soft drinks industry levy** will be introduced from 2018-19 onwards. The liability arises at the point beverages are packaged for sale and will rely on producers and importers to report volumes each quarterly accounting period. It will consist of two rates, based on the sugar content of these beverages. The levy will operate with a

specific revenue target of £500 million for the second year of implementation (2019-20). This currently implies levy rates of 18 pence and 24 pence per litre unit. These take into account a variety of behavioural effects which will affect the revenue raised.

4.77 The costing for this measure allows for several behavioural responses to the introduction of the levy. These include an initial 0.8 per cent reduction in demand for every 1 per cent rise in price, rising to 1 per cent. Producers are also assumed to reformulate their products to reduce sugar content or introduce sub-brands. We have assumed a 5 per cent a year drop in volumes subject to the higher rate and a 2 per cent a year rise in those subject to the main rate. We also expect some initial forestalling ahead of the introduction of the tax, plus the emergence of a 'tax gap' given the incentive for increased cross-border shopping and illicit trade. From a pre-behavioural yield of over £900 million, the behavioural responses lower the yield to around £500 million a year. As a new tax likely to prompt a large behavioural response, these estimates are clearly subject to significant uncertainty.

4.78 Receipts from **insurance premium tax (IPT)** are expected to rise by over 50 per cent between 2014-15 and 2016-17, reflecting the July 2015 Budget measure to increase the standard rate of IPT from 6 to 9.5 per cent in November 2015 and the further rise to 10 per cent from September 2016 announced in the Budget. Abstracting from the increases in the IPT rate, growth in underlying IPT receipts in the forecast is expected to remain modest. We have continued to assume a small negative effect from reforms designed to reduce the cost of certain forms of road traffic personal injury claims.

4.79 **Air passenger duty** receipts are expected to rise from £3.1 billion in 2015-16 to £3.9 billion in 2020-21. This reflects duty rate rises and growth in passenger numbers. Our forecast is little changed since November.

4.80 **Vehicle excise duty (VED)** is levied annually on road vehicles and is expected to rise from £5.6 billion in 2015-16 to £6.2 billion in 2020-21, reflecting the uprating of duties in line with RPI inflation and measures announced in the July 2015 Budget. Relative to November, our forecast is higher by £0.1 to £0.2 billion a year, reflecting higher receipts so far this year that have been pushed through to the rest of the forecast.

4.81 Receipts from the **climate change levy (CCL)** are expected to be around £0.3 billion lower in 2015-16 than in our November forecast. This reflects lower than expected receipts from the carbon price floor (CPF) element of the CCL. The almost doubling of the carbon support rates in 2015-16 was expected to lead to a strong rise in CPF receipts this year. However, DECC data suggest that the switch away from coal-fired to gas-fired electricity generation (which has a lower tax rate) was much bigger than previously assumed, limiting the growth in CPF receipts. With CPF tax rates little changed until 2020-21 (when they rise in line with RPI inflation), the smaller tax base reduces receipts by at least £0.2 billion a year. In contrast to declining CPF receipts, we expect a rise in CCL receipts (excluding CPF), reflecting the July 2015 Budget decision to remove the CCL exemption from energy generated from renewable sources and the higher CCL rates from 2019-20 announced in the Budget to compensate for the loss of revenues from removing the carbon reduction commitment.

4.82 **Bank levy** receipts are expected to fall from £3.5 billion in 2015-16 to £2.2 billion in 2020-21. This mainly reflects the graduated cuts in the bank levy rate from 0.21 per cent to 0.1 per cent by 2021, which were announced in the July 2015 Budget. Our forecast is unchanged since November.

4.83 **VAT refunds** to central and local government are neutral for borrowing, as they are offset within spending. The forecast for VAT refunds largely reflects the path of government procurement and investment. Relative to November, our forecast is higher by around £0.2 billion a year, reflecting changes to overall central and local government spending.

Other receipts

4.84 **Interest and dividend** receipts include interest income on the government's stock of financial assets, which includes student loans and holdings related to financial sector interventions. Our forecast for interest and dividend receipts is significantly lower than in November, with receipts expected to be over £2 billion lower in each of the final three years of the forecast. The key driver is that interest rates are expected to remain lower for longer – with the direct effect of lower interest rates on the stock of central government assets (including foreign exchange reserves) and local authority assets over £1½ billion by 2020-21.

4.85 Lower interest rates also affect the accrued interest on the stock of some older student loans and the interest from the UK Asset Resolution mortgage book. The Budget announcement of a further large sale of mortgage assets in 2016-17 and 2017-18 will lower interest received by around £0.3 billion a year. With the sale of the Government's remaining stake in Lloyds delayed into 2016-17, we have factored in an additional dividend payment of £130 million before the sale has been completed.

4.86 Our forecast for **gross operating surplus (GOS)** comprises general government depreciation and public corporations' gross operation surplus (PCGOS), including the operating surpluses of housing associations. Our forecast for GOS has fallen by an average of £0.4 billion a year over the forecast period since November, largely because of the scorecard measure that makes pay to stay voluntary for housing associations, which is assumed to reduce additional rents from pay to stay by an average of £0.3 billion a year from 2017-18 onwards.

Public sector expenditure

Definitions and approach

4.87 This section explains our central forecast for public sector expenditure, which is based on the National Accounts aggregates for public sector current expenditure (PSCE), public sector gross investment (PSGI) and total managed expenditure (TME), which is the sum of PSCE and PSGI. In our forecast, we combine these National Accounts aggregates with the two administrative aggregates used by the Treasury to manage public spending:

- **departmental expenditure limits (DELs)**[8] – mostly covering spending on public services, grants, administration and capital investment, which can be planned over extended periods. Our fiscal forecast therefore shows PSCE in resource DEL and PSGI in capital DEL. We typically assume (in line with historical experience) that departments will underspend the limits that the Treasury sets for them, so – unless otherwise stated – when we refer to PSCE in RDEL and PSGI in CDEL (or RDEL and CDEL for simplicity) we are referring to the net amount that we assume is actually spent; and

- **annually managed expenditure (AME)** – categories of spending less amenable to multi-year planning, such as social security spending and debt interest. Again, our fiscal forecast shows PSCE in current AME and PSGI in capital AME.

Summary of the expenditure forecast

4.88 Table 4.14 summarises our latest forecast for public spending. TME is expressed as a share of GDP, but not all of TME contributes directly to GDP – benefit payments, debt interest and other cash transfers merely transfer income from some individuals to others. The table also shows how TME is split between DEL spending and AME, and the main components of each. It shows that TME is expected to fall by 3.2 per cent of GDP over the four years of the latest Spending Review period up to 2019-20, and slightly further in 2020-21.

Table 4.14: TME split between DEL and AME

	Per cent of GDP						
	Outturn	Forecast					
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
TME	**40.8**	**40.2**	**39.7**	**38.8**	**38.0**	**37.0**	**36.9**
of which:							
TME in DEL[1]	**19.4**	**18.8**	**18.6**	**18.1**	**17.6**	**16.9**	**16.9**
of which:							
PSCE in RDEL	17.3	16.9	16.6	16.1	15.6	14.9	14.6
PSGI in CDEL	2.0	1.9	2.0	2.0	2.0	2.0	2.3
TME in AME[1]	**21.4**	**21.4**	**21.1**	**20.7**	**20.4**	**20.1**	**19.9**
of which:							
Welfare spending	11.7	11.5	11.2	10.8	10.5	10.2	10.1
Debt interest net of APF	1.8	1.8	1.8	1.9	2.0	2.0	1.9
Locally-financed current expenditure	2.0	2.2	2.1	2.1	2.1	2.1	2.1
Net public service pension payments	0.7	0.6	0.6	0.6	0.6	0.6	0.6
Other PSCE in AME	3.3	3.3	3.4	3.3	3.4	3.5	3.5
PSGI in AME	2.0	2.0	2.0	1.9	1.7	1.6	1.7

[1] In relation to Table 4.15, TME in DEL is defined as PSCE in RDEL plus PSGI in CDEL plus SUME, and TME in AME is defined as PSCE in AME plus PSGI in AME minus single use military equipment (SUME).

4.89 Tables 4.15 and 4.16 detail our latest spending forecast and the changes since November.

[8] Our presentation of expenditure only shows those components of RDEL, CDEL and AME that are included in the fiscal aggregates of PSCE and PSGI. For budgeting purposes, the Treasury also includes other components in DEL and AME such as non-cash items and financial transactions, which are discussed later in this chapter.

Table 4.15: Total managed expenditure

	£ billion						
	Outturn	Forecast					
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Public sector current expenditure (PSCE)							
PSCE in RDEL	**317.6**	**316.1**	**321.7**	**325.3**	**327.7**	**327.1**	**333.7**
PSCE in AME	**355.7**	**365.1**	**372.5**	**380.8**	**394.9**	**404.3**	**416.2**
of which:							
Welfare spending	213.9	216.6	218.3	219.2	221.2	224.2	229.5
of which:							
Inside welfare cap	*119.3*	*120.4*	*119.8*	*118.0*	*116.4*	*116.2*	*118.1*
Outside welfare cap	*94.7*	*96.2*	*98.4*	*101.2*	*104.8*	*108.1*	*111.4*
Company and other tax credits	2.1	2.4	2.6	2.7	2.7	2.8	2.8
Net public service pension payments	12.3	11.5	11.2	12.1	13.7	13.2	14.7
National lottery current grants	1.4	1.4	1.4	1.4	1.5	1.5	1.5
BBC current expenditure	3.8	3.8	3.8	3.8	3.7	3.6	3.7
Network Rail other current expenditure[1]	1.0	0.8	0.8	0.3	-0.2	-0.1	-0.1
Other PSCE items in departmental AME	1.0	1.2	0.9	0.9	0.8	0.8	0.8
Expenditure transfers to EU institutions	10.4	10.5	11.8	9.4	11.2	11.6	11.9
Locally financed current expenditure	36.0	40.5	40.8	43.3	45.1	47.0	48.8
Central government gross debt interest	45.2	45.7	47.8	51.0	54.1	54.4	53.5
Reductions in debt interest due to APF	-12.4	-11.6	-12.4	-12.4	-11.7	-11.0	-10.1
Public corporations' debt interest	2.9	3.1	3.3	3.5	3.8	4.0	4.2
General government depreciation	28.5	29.4	31.1	32.8	34.5	36.1	37.8
Current VAT refunds	11.5	12.1	12.4	12.5	12.6	12.6	12.8
R&D expenditure	-7.2	-7.8	-7.9	-7.9	-8.0	-8.1	-8.4
Single use military expenditure	0.3	0.4	0.2	0.2	0.2	0.3	0.3
Environmental levies	3.2	5.9	7.3	8.7	10.7	12.4	13.4
Local authority imputed pensions	1.8	1.8	1.9	2.0	2.1	2.2	2.3
Other National Accounts adjustments	0.0	-2.7	-2.8	-2.9	-3.0	-3.2	-3.3
Total public sector current expenditure	**673.3**	**681.2**	**694.2**	**706.0**	**722.6**	**731.4**	**749.8**
Public sector gross investment (PSGI)							
PSGI in CDEL	**37.3**	**35.6**	**39.2**	**40.9**	**42.9**	**43.0**	**52.6**
PSGI in AME	**36.1**	**37.1**	**38.5**	**37.6**	**35.5**	**36.1**	**38.7**
of which:							
Tax litigation	0.0	0.0	0.9	1.2	1.5	1.8	1.9
Network Rail capital expenditure	6.2	6.3	6.9	6.1	5.1	5.0	5.3
Other PSGI items in departmental AME	0.8	0.2	1.1	1.5	1.7	2.0	2.4
Locally financed capital expenditure	6.9	7.3	6.9	7.3	5.8	6.4	6.6
Public corporations' capital expenditure	15.9	15.8	14.8	13.6	12.9	12.0	13.2
R&D expenditure	7.2	7.8	7.9	7.9	8.0	8.1	8.4
Other National Accounts adjustments	-0.8	-0.2	0.0	0.1	0.5	0.8	1.0
Total public sector gross investment	**73.4**	**72.7**	**77.8**	**78.6**	**78.4**	**79.1**	**91.3**
Less public sector depreciation	-38.6	-39.5	-41.4	-43.2	-45.1	-46.9	-48.9
Public sector net investment	**34.8**	**33.2**	**36.4**	**35.3**	**33.2**	**32.1**	**42.4**
Total managed expenditure	**746.7**	**753.9**	**771.9**	**784.6**	**801.0**	**810.4**	**841.1**

[1] Other than debt interest and depreciation, which are included in totals shown separately in this table.

Table 4.16: Changes to total managed expenditure since November

	£ billion						
	Outturn	Forecast					
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Public sector current expenditure (PSCE)							
PSCE in RDEL	**0.0**	**0.7**	**0.6**	**2.1**	**2.2**	**-1.5**	**-7.8**
PSCE in AME	**0.0**	**-1.7**	**-2.4**	**-6.8**	**-5.1**	**-9.1**	**-9.4**
of which:							
Welfare spending	0.0	-0.6	0.4	-0.5	-0.3	0.1	0.1
of which:							
Inside welfare cap	*0.0*	*-0.5*	*0.6*	*0.3*	*0.6*	*0.9*	*1.1*
Outside welfare cap	*0.0*	*-0.1*	*-0.2*	*-0.8*	*-0.8*	*-0.7*	*-1.0*
Company and other tax credits	0.0	0.0	0.0	0.0	0.0	0.0	-0.1
Net public service pension payments	0.0	0.2	-0.3	-0.6	-0.6	-2.5	-2.0
National lottery current grants	0.0	0.0	0.0	0.0	0.0	0.0	0.0
BBC current expenditure	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Network Rail other current expenditure[1]	-0.1	0.0	0.1	-0.1	-0.1	0.0	0.0
Other PSCE items in departmental AME	0.0	0.0	0.0	-0.1	-0.1	-0.1	-0.1
Expenditure transfers to EU institutions	0.0	-1.2	1.1	-0.2	0.2	0.2	0.2
Locally financed current expenditure	-0.2	0.7	0.5	-0.1	-0.4	-0.9	-1.1
Central government gross debt interest	0.0	-0.8	-3.2	-3.2	-1.5	-3.0	-3.1
Reductions in debt interest due to APF	0.0	0.2	-0.8	-1.9	-2.5	-2.7	-2.6
Public corporations' debt interest	0.3	-0.1	0.0	0.0	0.0	0.0	0.0
General government depreciation	0.0	-0.2	-0.1	-0.1	0.1	0.1	0.0
Current VAT refunds	0.0	0.1	0.2	0.3	0.4	0.3	0.0
R&D expenditure	0.0	-0.3	-0.3	-0.3	-0.3	-0.3	-0.4
Single use military expenditure	0.0	0.2	0.0	0.0	0.0	0.0	0.0
Environmental levies	0.0	0.0	0.0	-0.1	0.0	-0.3	-0.4
Local authority imputed pensions	0.0	0.0	-0.1	-0.1	-0.1	-0.1	-0.1
Other National Accounts adjustments	0.0	0.3	0.3	0.2	0.2	0.1	0.1
Total public sector current expenditure	**0.0**	**-1.1**	**-1.8**	**-4.7**	**-2.9**	**-10.6**	**-17.2**
Public sector gross investment (PSGI)							
PSGI in CDEL	**0.0**	**-0.2**	**0.3**	**0.8**	**1.3**	**-1.0**	**-0.2**
PSGI in AME	**-2.3**	**-0.5**	**0.1**	**1.0**	**1.4**	**1.1**	**1.3**
of which:							
Tax litigation	0.0	-0.2	0.2	0.0	0.0	0.0	0.0
Network Rail capital expenditure	0.0	-0.5	-0.5	0.5	0.7	0.0	0.0
Other PSGI items in departmental AME	0.0	-0.3	0.0	0.3	0.2	0.4	0.5
Locally financed capital expenditure	0.1	0.7	-0.2	-0.2	-0.1	0.2	0.5
Public corporations' capital expenditure	-0.1	0.1	0.4	0.0	0.1	-0.1	-0.2
R&D expenditure	0.0	0.3	0.3	0.3	0.3	0.3	0.4
Other National Accounts adjustments	-2.3	-0.6	-0.1	0.0	0.2	0.2	0.3
Total public sector gross investment	**-2.3**	**-0.7**	**0.4**	**1.8**	**2.7**	**0.1**	**1.1**
Less public sector depreciation	-0.1	0.3	0.2	0.1	-0.1	-0.1	-0.1
Public sector net investment	**-2.4**	**-0.4**	**0.6**	**1.9**	**2.6**	**0.0**	**1.0**
Total managed expenditure	**-2.3**	**-1.8**	**-1.4**	**-2.9**	**-0.2**	**-10.5**	**-16.1**

[1] Other than debt interest and depreciation, which are included in totals shown separately in this table.

4.90 Table 4.17 summarises the sources of changes to our forecast since November. It shows that:

- **economy forecast driven changes** have reduced spending, with the main impact from lower inflation, which has reduced spending throughout the forecast, with reductions ranging from £2.0 billion in 2016-17 to £0.6 billion in 2020-21;

- **debt interest** spending has been revised down significantly, due to further falls in market interest rate expectations. Higher borrowing offsets some of that reduction;

- our **pre-measures forecast for other AME spending** is higher every year. Welfare spending has been revised up, thanks largely to higher-than-expected caseloads and average awards as disabled people are migrated from disability living allowance to the new personal independence payment. Spending by local authorities and public corporations has also been revised up. We have made smaller downward revisions to spending on state pensions, tax credits and public service pensions;

- the **direct effect of Government decisions** reduces AME in all years. However overall spending is increased for the three years up to 2018-19 because of scorecard measures that increase departments RDEL and CDEL spending. Thereafter, in 2019-20 and 2020-21, although some scorecard measures continue to increase RDEL (in both years) and CDEL (in 2019-20), these increases are outweighed by larger RDEL and CDEL cuts so that overall spending falls by £7.6 billion in 2019-20, and by £13.0 billion in 2020-21; and

- the **indirect effect of Government decisions** are mostly small, with the biggest effect a £1.0 billion increase in the accrued interest on index-linked gilts due to the effect on RPI inflation of the introduction of a soft drinks industry levy.

Table 4.17: Sources of changes to the spending forecast since November

	£ billion					
	Forecast					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
November forecast	755.7	773.3	787.5	801.2	821.0	857.2
March forecast	753.9	771.9	784.6	801.0	810.4	841.1
Change	**-1.8**	**-1.4**	**-2.9**	**-0.2**	**-10.5**	**-16.1**
	Forecast changes					
Forecast changes since November	**-1.7**	**-1.7**	**-3.3**	**-1.6**	**-2.9**	**-2.8**
of which:						
Economic determinants	**-0.5**	**-2.0**	**-1.8**	**-0.7**	**-0.9**	**-0.9**
of which:						
Inflation	-0.5	-2.0	-1.4	-0.7	-0.8	-0.6
Unemployment	0.0	-0.1	-0.1	0.0	0.1	0.1
Other determinants	0.0	0.1	-0.2	-0.1	-0.2	-0.3
Market assumptions: interest rates	**-0.1**	**-2.0**	**-3.9**	**-5.2**	**-6.0**	**-6.2**
Other assumptions and changes	**-1.1**	**2.3**	**2.5**	**4.3**	**4.0**	**4.2**
of which:						
Other welfare changes	-0.6	0.4	1.0	1.9	2.3	2.2
Locally financed and public corporations' capital expenditure forecast changes	0.8	0.5	0.8	0.8	0.8	0.8
Expenditure transfers to EU institutions changes	-1.2	1.1	-0.4	-0.1	-0.1	-0.2
Other debt interest forecast changes	0.0	0.1	0.2	0.5	0.8	1.1
DEL forecast changes	0.5	0.5	0.5	0.5	0.5	0.5
Locally financed current expenditure forecast changes	0.7	0.3	0.5	0.4	0.2	0.3
Public sector pensions forecast changes	0.2	-0.3	-0.5	-0.4	-0.4	-0.2
Network Rail current and capital expenditure changes	-0.6	-0.4	0.4	0.6	0.0	0.0
Other	-0.9	0.2	0.0	0.3	-0.1	-0.3
	Effect of Government decisions					
Total effect of Government decisions	**-0.1**	**0.3**	**0.4**	**1.4**	**-7.6**	**-13.3**
of which:						
AME scorecard measures	0.0	-0.1	-2.1	-2.6	-4.6	-4.5
RDEL changes[1]	0.4	0.3	1.8	1.9	-1.8	-8.1
CDEL changes[1]	-0.4	0.1	0.7	1.1	-1.2	-0.4
Indirect effects of Government decisions	-0.1	-0.1	0.0	1.0	0.0	-0.3

[1] Excludes changes to DELs that are forecast or classification changes.

Expenditure in 2015-16

4.91 We have revised down spending in 2015-16 by £1.8 billion since November. This includes £1.1 billion of spending that has been switched from 2015-16 to 2016-17, because some payments to the EU institutions that were expected to be paid at the start of 2016 are now being paid later in the year. Debt interest spending in 2015-16 is also £0.6 billion down since November due to lower RPI inflation affecting accrued interest payments on index-linked gilts. Other differences are largely offsetting. We have reduced the amount of underspending that we expect against departments' final RDEL plans, which increases

spending by £0.5 billion. But this is more than offset by a £0.6 billion reduction in our forecast for welfare spending, which mainly reflects a lower caseload on tax credits.

4.92 Monthly spending data are only available for central government spending. Table 4.18 compares the growth in central government spending over the first ten months of 2015-16 with our latest forecast for the full year. The latest official data for April to January report total central government spending 0.8 per cent higher than last year. Our forecast implies year-on-year falls in the remaining two months. That mainly reflects lower payments of current grants to local authorities and also lower capital spending. Current grants to local authorities are expected to be lower, because of changes in the profile of grant payments, including revenue support grant. Capital spending is expected to be lower because departments are forecasting a lower end year surge in capital spending, and because we still expect spending to fall below departments' own forecasts, as happens every year.

4.93 Within current central government spending, the lower February and March spending on current grants to local authorities is expected partly to be offset by higher payments of net social benefits and debt interest payments. Net social benefits are expected to be higher than last year partly because of the leap year effect. Debt interest payments are up year-on-year because RPI inflation, while lower than we expected in November, is still higher than last year. The EU payments and abatement receipts were actually known for February and March before this forecast closed, and so that provides a firm basis for our forecast that net current transfers abroad will be less negative over those months, compared to last year. The year-on-year comparison is complicated by the large historical adjustment payments that were made in December 2014. Growth in other current spending, largely PSCE in RDEL, is expected to be fairly steady to the end of the year.

Table 4.18: Central government expenditure in 2015-16

	Spending in 2015-16 (£ billion)			Percentage change on 2014-15		
	Outturn	Forecast[1]		Outturn	Forecast[1]	
	Apr-Jan	Feb-Mar	Full Year	Apr-Jan	Feb-Mar	Full Year
Total current expenditure	**547.5**	**105.8**	**653.3**	**0.7**	**-0.9**	**0.5**
of which:						
Net social benefits	171.0	33.1	204.0	0.7	3.6	1.2
Debt interest	40.8	4.9	45.7	0.8	4.0	1.1
Current grants to local authorities	99.7	18.1	117.8	-1.5	-15.3	-3.9
VAT and GNI based EU contributions	11.0	4.3	15.3	-3.6	-6.7	-4.5
Net current transfers abroad	3.3	-0.4	2.8	1.6	-34.8	11.4
Other current spending	221.7	45.9	267.6	2.0	2.3	2.0
Total (gross) capital spending	**41.7**	**10.3**	**52.0**	**1.9**	**-16.5**	**-2.4**
of which:						
Capital grants to local authorities	10.2	1.7	11.9	3.6	-19.0	-0.4
Other capital spending	31.5	8.6	40.1	1.3	-16.0	-3.0
Total central government expenditure in TME	**589.2**	**116.1**	**705.3**	**0.8**	**-2.5**	**0.2**

[1] Forecast data has been adjusted to be consistent with the latest National Accounts definitions of central government spending. One of our fiscal supplementary tables that are available on our website shows the items included in our forecasts that ONS have not yet included in outturn. The items shown in that table have been excluded from our forecast above, so that the above table compares outturn to date and our forecast for the full year on a comparable basis.

Spending within departmental expenditure limits (DELs)

DEL spending in 2015-16

4.94 Our latest forecasts for DEL spending in 2015-16 are shown in Table 4.15 above and changes since November in Table 4.16 below. These reflect departments' final plans published in *Supplementary Estimates 2015-16,* and the amount we expect departments to underspend against those plans.

4.95 Table 4.19 breaks down the changes in our forecasts for PSCE in RDEL and PSGI in CDEL (RDEL and CDEL hereafter) into three separate components:

- updated **forecasts for underspends** against the initial plans set out in *Public Expenditure Statistical Analyses* (PESA) 2015. In November we assumed that departments would underspend their PESA plans for RDEL and CDEL in 2015-16 by £1 billion and £2 billion respectively. We have not changed our CDEL underspend assumption, but have reduced our RDEL assumption to £0.5 billion. The evidence we considered in reaching these judgements is described more fully below;

- **classification changes** to reflect additional receipts that the ONS reclassified as negative spending in its February public sector finances release. This reflects ongoing work by the ONS and Treasury to reconcile accrued and cash measures of borrowing (described in Box 4.3 of our July *EFO*). It has reduced PSCE in RDEL by £0.2 billion and increased PSGI in CDEL by £0.2 billion (because the previous estimate of capital receipts was reduced). The Treasury has informed us that these further classification changes will also change the DEL plans set out in the Spending Review, so we have included these classification changes in our forecast from 2016-17 onwards; and

- the **effects of Government decisions**. For 2015-16, this includes changes to departments' detailed spending plans within their RDEL and CDEL limits, as reported in *Supplementary Estimates 2015-16*. These changes switched a net £0.4 billion of spending from CDEL to RDEL, which included £1 billion switched from CDEL to RDEL for the Department of Health to relieve some spending pressures current in the NHS.

4.96 Our underspend assumptions are measured against the plans set out in PESA 2015, net of Budget Exchange. Departments carry forward some spending headroom under the Treasury's Budget Exchange system, which presumes that they create similar headroom at the end of the year. So it also possible to look at our underspend estimates gross of Budget Exchange. Both figures are shown in Table 4.19.[9] It shows that:

- departments carried less spending forward under **Budget Exchange** this year than they did in 2014-15, with more in capital and less in resource budgets;

[9] The 2014 PESA plans also include our forecast of net underspend against those plans from our March 2014 *EFO*. Our measure of net underspend is measured against the PESA plans excluding our previous forecast of underspends.

- £2.4 billion of spending was surrendered in **Supplementary Estimates**, slightly more than last year. Surrenders were mostly on the capital side, with some spending switched from CDEL to RDEL;

- **departments' own 'forecast outturns'**, submitted to the Treasury in February, imply that both current and capital spending will be slightly lower than the final spending plans set in the Supplementary Estimates (as we would expect given the penalties that they would incur if spending limits were exceeded); and

- our **final underspend estimates** assume spending will fall further away from plans and 'forecast outturns', consistent with the pattern of previous years.

Table 4.19: DEL shortfalls against PESA plans for 2015-16

	£ billion					
	PSCE in RDEL		PSGI in CDEL		TME in DEL	
	Outturn	Forecast	Outturn	Forecast	Outturn	Forecast
	14-15	15-16	14-15	15-16	14-15	15-16
Budget Exchange brought into the year	2.2	0.5	1.0	1.6	3.2	2.1
Gross underspend	**-3.4**	**-1.0**	**-2.9**	**-3.6**	**-6.2**	**-4.6**
of which:						
Supplementary estimates (final plans)[1]	-1.6	0.0	-0.8	-2.4	-2.4	-2.4
Shortfall against final plans in departments' forecast outturn in February	-1.9	-0.3	-1.1	-0.3	-3.0	-0.6
OBR estimate of further shortfall	0.2	-0.7	-0.9	-0.9	-0.8	-1.6
Net underspend against PESA plans[2]	**-1.2**	**-0.5**	**-1.8**	**-2.0**	**-3.0**	**-2.5**

[1] Provisional estimates.

[2] Total underspend against final PESA plans, net of increases in spending from Budget Exchange carried forward from earlier years.

DEL spending from 2016-17 onwards

4.97 Table 4.20 shows our DEL forecasts for 2016-17 onwards. 'Actual spending' in this table reflects the plans that were set in November's Spending Review and the changes announced in this Budget, adjusted for expected underspending. Actual spending in 2020-21 reflects a mix of firm plans and policy assumptions set in the Spending Review and changes announced in the Budget, again adjusted for underspending.

4.98 The underspend assumption for CDEL in 2020-21 is much larger than the underspends we assume in the Spending Review years, due to the much faster rise in spending that the Government is assuming in that year. Experience suggests that actual spending falls further short of plans when the Government attempts to ramp up capital spending quickly.

4.99 We break down the changes in our forecast since November into underlying forecast changes (which reflect updates to our underspending assumptions excluding any consequences of Budget decisions), classification changes and the effect of Government decisions (which includes any implications for underspending). Table 4.20 shows that:

- we have reduced our **pre-measures forecast for underspending** against PSCE in RDEL by £0.5 billion a year. That reflects departments reporting higher 'non-fiscal' receipts (negative spending in the DEL control total). This does not directly affect PSNB, but some of the receipts have been used to raise 'fiscal' spending, which does affect PSNB. Given the upward trend in these non-fiscal receipts in recent years, and the upward revision in 2015-16 since our last forecast, we have assumed that this will feed through to lower underspending against PSCE in RDEL than we did in November. We will review this assumption after departmental plans have been set out in more detail in this summer's PESA publication. Our pre-measures forecast for underspending against PSGI in CDEL is unchanged;

- as noted above, the only **classification changes** relates to those in 2015-16, which the Treasury has informed us will be reflected in departments' plans for future years in due course;

- the Government's **Budget RDEL policy announcements** include scorecard measures that increase RDEL in every year except 2019-20, when the scorecard shows cuts that include £3.5 billion of as-yet unidentified cuts to be generated by an 'efficiency review' that will report in 2018. In 2019-20 and 2020-21, the Government has announced additional RDEL cuts that are not presented on its scorecard. In 2019-20 it has reduced overseas aid spending by £0.7 billion. In 2020-21, when departments' RDELs have not been fully allocated, it has cut the total RDEL envelope by £9.9 billion. We have reduced our RDEL underspend assumption by £0.5 billion in 2019-20 and 2020-21 to reflect these cuts and the additional pressure on budgets from higher employer contributions to public service pension schemes in those years, reflecting the Budget announcement that the Government will reduce the discount rate used in the forthcoming pensions revaluations (discussed in the public service pensions section below); and

- the Government's **Budget CDEL policy announcements** include scorecard measures that increase CDEL up until 2018-19, with the largest measure bringing forward £1.6 billion of capital spending from 2019-20 into 2017-18 and 2018-19. We have assumed that around 20 per cent of the CDEL spending that is brought forward will in reality slip into the following year, and have amended our assumptions for underspending to show that slippage. In 2019-20 and 2020-21 the scorecard measures reduce CDEL spending. The Government has also switched £0.2 billion of spending from fiscal CDEL to non-fiscal CDEL in 2020-21, reducing PSGI in CDEL.

Table 4.20: RDEL and CDEL spending and changes since November

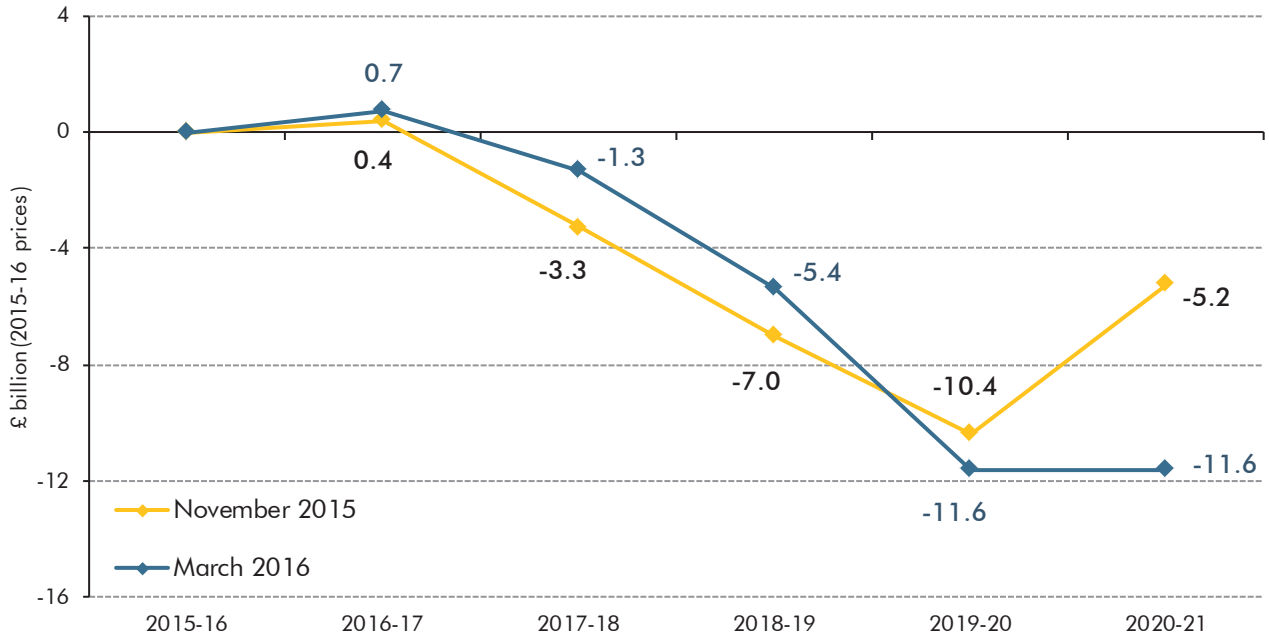
	£ billion					
	Forecast					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
PSCE in RDEL						
November forecast						
Actual spending	315.4	321.1	323.2	325.5	328.6	341.5
March forecast						
Limits	316.6	322.2	325.8	328.7	327.6	334.2
Assumed underspend[1]	-0.5	-0.5	-0.5	-1.0	-0.5	-0.5
Actual spending	316.1	321.7	325.3	327.7	327.1	333.7
Change	**0.7**	**0.6**	**2.1**	**2.2**	**-1.5**	**-7.8**
of which:						
Forecast changes	**0.3**	**0.3**	**0.3**	**0.3**	**0.3**	**0.3**
Assumed underspend (forecast changes)	0.5	0.5	0.5	0.5	0.5	0.5
Classification changes	-0.2	-0.2	-0.2	-0.2	-0.2	-0.2
Effect of government decisions	**0.4**	**0.3**	**1.8**	**1.9**	**-1.8**	**-8.1**
Assumed underspend (policy changes)	-	-	-	-	0.5	0.5
Scorecard measures	-	0.3	1.8	1.9	-1.6	1.3
Other changes to RDEL spending	0.4	-	-	-	-0.7	-9.9
PSGI in CDEL						
November forecast						
Actual spending	35.8	39.0	40.1	41.6	44.0	52.8
March forecast						
Limits	37.6	41.2	43.1	45.4	45.3	56.6
Assumed underspend[1]	-2.0	-2.0	-2.2	-2.5	-2.3	-4.0
Actual spending	35.6	39.2	40.9	42.9	43.0	52.6
Change	**-0.2**	**0.3**	**0.8**	**1.3**	**-1.0**	**-0.2**
of which:						
Forecast changes	**0.2**	**0.2**	**0.2**	**0.2**	**0.2**	**0.2**
Assumed underspend (forecast changes)	-	-	-	-	-	-
Classification changes	0.2	0.2	0.2	0.2	0.2	0.2
Effect of government decisions	**-0.4**	**0.1**	**0.7**	**1.1**	**-1.2**	**-0.4**
Assumed underspend (policy changes)	-	-	-0.2	-	0.2	-
Scorecard measures	-	0.1	0.9	1.1	-1.4	-0.1
Other changes to CDEL spending	-0.4	-	-	-	-	-0.2
	Per cent of GDP					
PSCE in RDEL (actual spending)						
November forecast	16.6	16.2	15.7	15.1	14.6	14.5
March forecast	16.9	16.6	16.1	15.6	14.9	14.6
Change	**0.3**	**0.3**	**0.4**	**0.5**	**0.3**	**0.1**
PSGI in CDEL (actual spending)						
November forecast	1.9	2.0	1.9	1.9	2.0	2.2
March forecast	1.9	2.0	2.0	2.0	2.0	2.3
Change	**0.0**	**0.1**	**0.1**	**0.1**	**0.0**	**0.1**

[1] Underspends are measured against plans at the start of each year as set out in PESA, and are net of amounts carried forward from previous years under Budget Exchange. For 2016-17 onwards, underspends are measured against the intitial plans set out in the 2015 Spending Review and Autumn Statement, since plans for these years have not been set out in a PESA publication yet.

The path of resource and capital DEL spending over the forecast period

4.100 The Government set out detailed departmental spending plans up to 2019-20 in November's Spending Review, and set some departmental plans and its overall current and capital spending totals for 2020-21. It has adjusted those plans and totals in this Budget. As a result, real cuts in RDEL spending – day-to-day spending on public services, administration and grants – are set to be slightly greater over this Parliament and are no longer expected to start reversing in the first year of the next Parliament (Chart 4.5).

Chart 4.5: Change in real RDEL from 2015-16



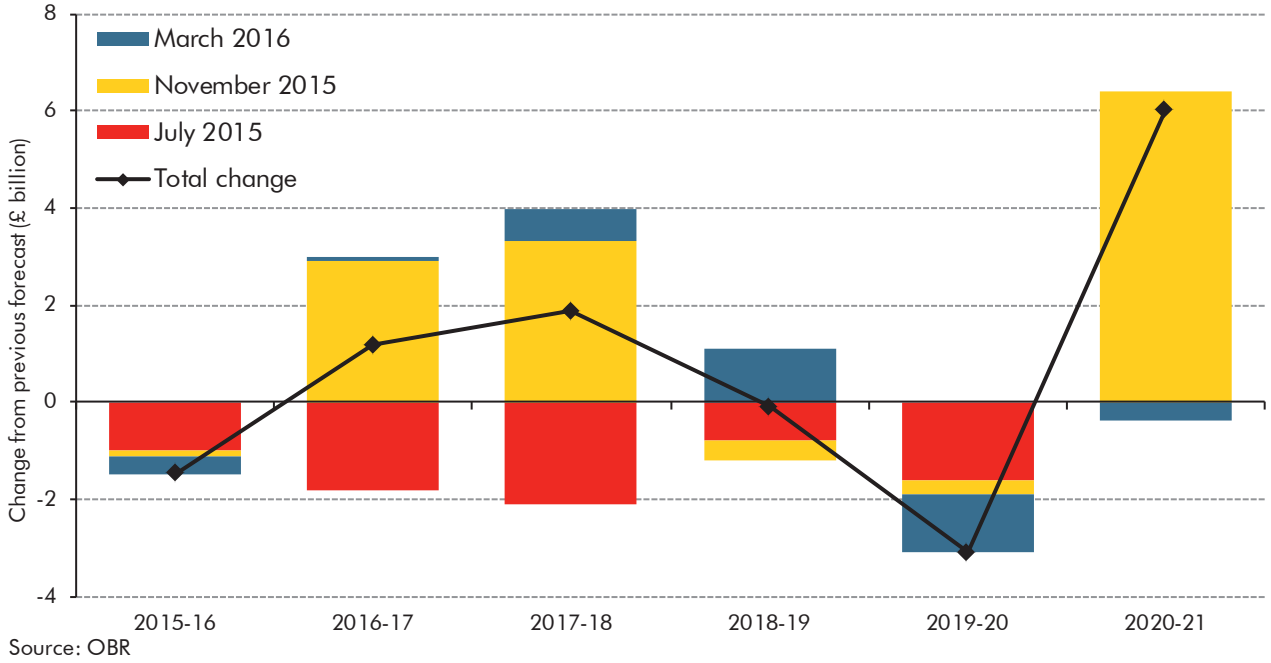
Source: OBR

4.101 The Government has also altered the planned path of CDEL spending – departmental spending on investment projects and capital grants – relative to the plans set out in November. It has brought forward some investment into 2017-18 and 2018-19, thereby cutting investment in 2019-20. Chart 4.6 shows how the Government has altered its investment plans in the three fiscal events since it took office in May last year:

- in the **July Budget**, it cut CDEL spending in every year relative to the totals that had been pencilled in by the Coalition Government in its final Budget in March;
- in the **November Spending Review**, it boosted CDEL spending in the next two years, then reduced it slightly in the subsequent two years before adding £6.4 billion (14.5 per cent) to CDEL spending in 2020-21;
- in **this Budget**, it has again boosted CDEL spending at the start of the forecast, before cutting it slightly in 2019-20; and
- across these three fiscal events, it has therefore **adjusted CDEL spending in different directions in most years**, while adding to it in 2020-21. The only year in which the

direction of its policy changes has been consistent is 2019-20 – the year in which the surplus target first bites. In that year the Government has chosen to cut CDEL spending in both Budgets and the November Spending Review.

Chart 4.6: Policy changes to CDEL spending since March 2015



Source: OBR

Annually managed expenditure (AME)

4.102 Table 4.15 sets out our latest central projection of AME spending to 2020-21, based on the economy forecast described in Chapter 3, the latest estimates of agreed policy commitments and the measures announced in this Budget.

Welfare cap and other spending

4.103 Total welfare spending in our forecast refers to AME spending on social security and tax credits – a subset of which is subject to the Government's 'welfare cap' (around 56 per cent in 2015-16). We have been tasked with assessing the Government's performance against the cap at each Autumn Statement.

4.104 Table 4.21 shows that total welfare spending is forecast to increase by 5.9 per cent over the forecast period, from £217 billion in 2015-16 to £230 billion in 2020-21. Over that period, spending on items subject to the cap (predominantly working-age welfare spending) is projected to fall by 1.9 per cent. By contrast, spending on items outside the cap (largely state pensions) is expected to rise by 15.7 per cent.

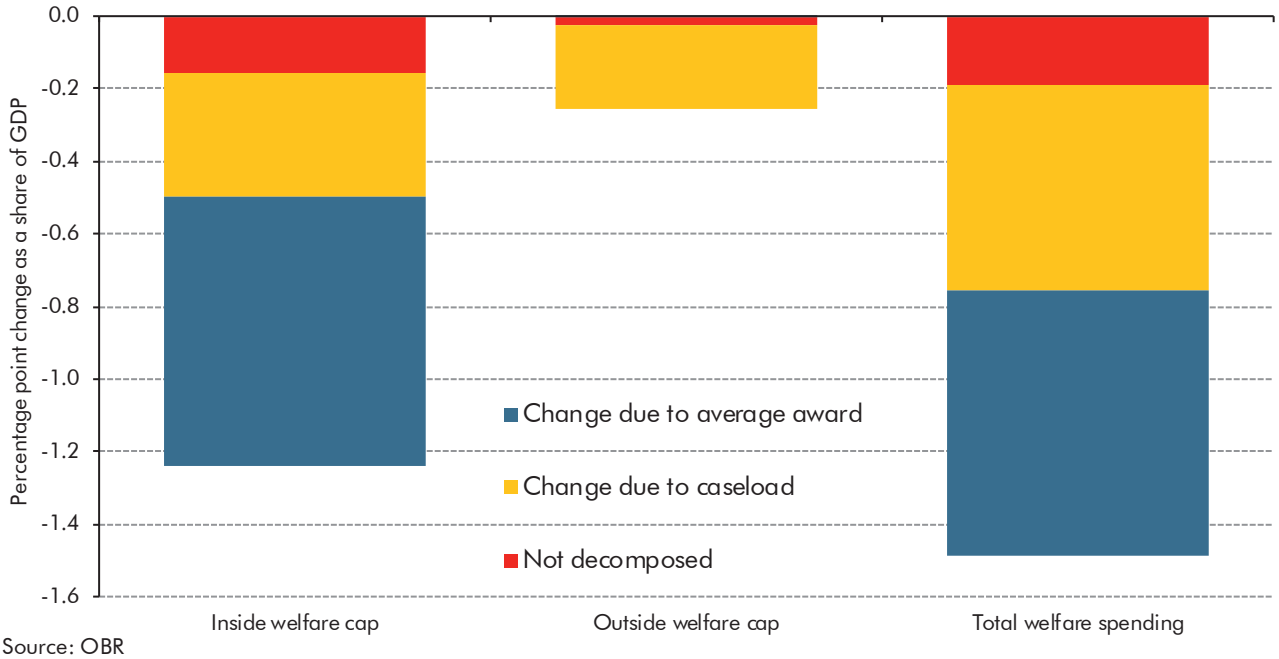
4.105 Relative to the size of the economy, welfare spending is forecast to fall by 1.5 per cent of GDP between 2015-16 and 2020-21 to its lowest share of GDP in 30 years, with spending inside the welfare cap falling by 1.2 per cent of GDP and spending outside the cap falling by 0.2 per cent of GDP.

Table 4.21: Welfare spending forecast overview

	Outturn	Forecast					
		Welfare cap period					
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
£ billion							
Total welfare spending	213.9	216.6	218.3	219.2	221.2	224.2	229.5
of which:							
Inside welfare cap	119.3	120.4	119.8	118.0	116.4	116.2	118.1
Outside welfare cap	94.7	96.2	98.4	101.2	104.8	108.1	111.4
Per cent of GDP							
Total welfare spending	11.7	11.5	11.2	10.8	10.5	10.2	10.1
of which:							
Inside welfare cap	6.5	6.4	6.2	5.8	5.5	5.3	5.2
Outside welfare cap	5.2	5.1	5.1	5.0	5.0	4.9	4.9

4.106 Chart 4.7 shows that of the 1.5 per cent of GDP fall in welfare spending that we expect between 2015-16 and 2020-21, around a third can be explained by trends in caseloads and around half by trends in average awards with drivers of the remainder not decomposed. The overwhelming majority of the reduction in spending (83 per cent) occurs on items that are subject to the Government's welfare cap. Lower welfare cap spending is mainly driven by falls in relative average awards but also caseloads, while the smaller fall in spending on items outside the cap is driven almost entirely by the caseload falling as a share of the total population.

Chart 4.7: Sources of changes to welfare spending (2015-16 to 2020-21)

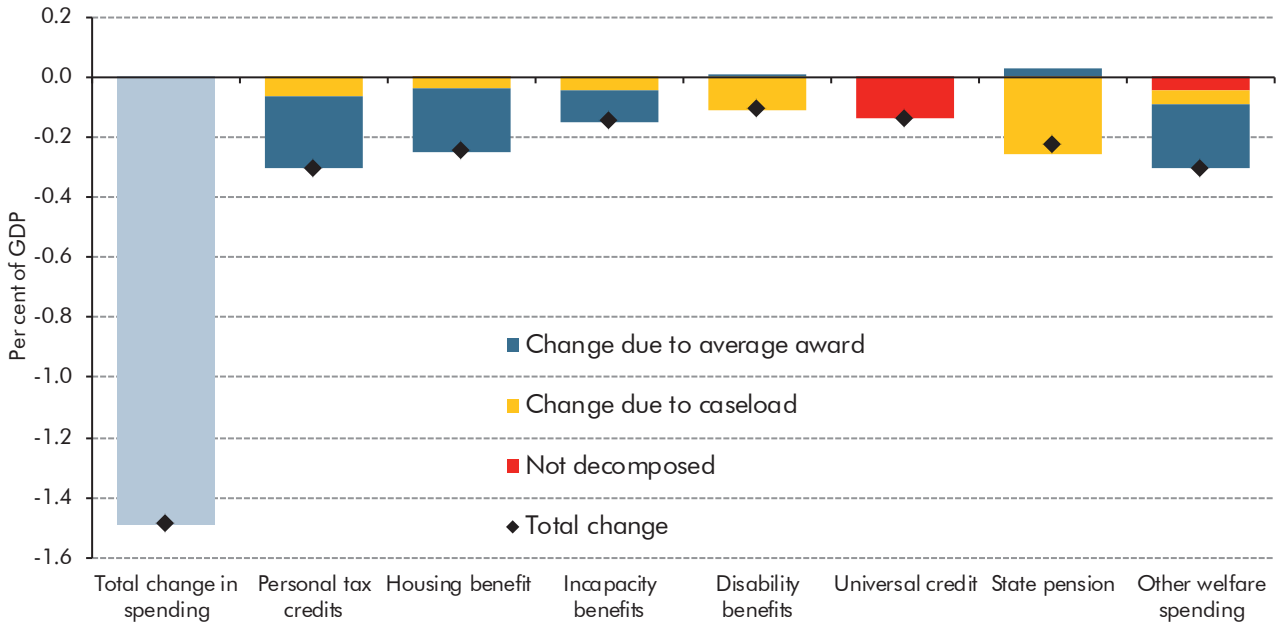


Source: OBR

4.107 Chart 4.8 splits the 1.5 per cent of GDP fall in welfare spending into its main components. These include:

- a fall in spending on **tax credits** (0.3 per cent of GDP). In particular, the uprating freeze between 2016-17 and 2019-20 means that average awards fall significantly relative to average earnings, reducing spending on tax credits as a share of GDP;
- a 0.2 per cent of GDP fall in spending on **housing benefit** (inside the cap). This is almost entirely driven by a reduction in average awards relative to average earnings. This largely reflects the July 2015 policy measures, including the freeze in working-age benefit uprating and the measure forcing social housing landlords to reduce rents by 1 per cent a year over four years;
- lower spending on **disability benefits** (0.1 per cent of GDP), due largely to the assumed drop in the caseload associated with the Budget measure on PIP aids and appliances. And lower spending on **incapacity benefits** (0.2 per cent of GDP), largely as average awards rise more slowly than average earnings. Awards outside the ESA 'support group' have been frozen for four years, like most working-age benefits; and
- a 0.2 per cent of GDP fall in spending on the **state pension**. This is driven entirely by the caseload rising more slowly than the total population as the state pension age rises. In contrast to working-age benefits, the basic state pension award is expected to rise mainly in line with earnings due to the triple lock on uprating, so average awards have little effect on state pension spending as a share of GDP. Indeed, with awards rising by 2.5 per cent in 2017-18 – higher than CPI inflation or average earnings – average awards push spending up slightly as a share of GDP.

Chart 4.8: Sources of changes to welfare spending (2015-16 to 2020-21)



Source: OBR

4.108 Table 4.22 sets out our detailed welfare spending forecasts for 2015-16 to 2020-21 on a pre-scorecard basis, plus the total effect on welfare spending of the Government's policy decisions announced in this Budget. A detailed post-measures forecast for each line is available in a supplementary fiscal table on our website.

Table 4.22: Welfare spending

	£ billion						
	Outturn	Forecast					
			Welfare cap period				
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Welfare cap							
DWP social security	74.5	76.5	76.1	74.9	74.2	74.2	75.4
of which:							
Housing benefit (not on JSA)[1]	21.4	21.9	21.7	21.0	20.7	20.5	21.0
Disability living allowance and personal independence payments	15.4	16.2	16.4	16.7	17.1	17.7	18.2
Incapacity benefits[2]	14.2	15.1	14.9	14.7	14.6	14.8	15.1
Attendance allowance	5.4	5.5	5.5	5.6	5.8	6.0	6.4
Pension credit	6.6	6.1	5.8	5.5	5.3	5.3	5.3
Carer's allowance	2.3	2.6	2.7	2.9	3.1	3.3	3.5
Statutory maternity pay	2.3	2.3	2.4	2.4	2.5	2.6	2.7
Income support (non-incapacity)	2.5	2.4	2.4	2.1	2.0	2.0	2.1
Winter fuel payments	2.1	2.1	2.1	2.0	2.0	2.0	2.0
Universal credit[3]	0.0	0.0	-0.1	-0.5	-1.4	-2.5	-3.1
Other DWP in welfare cap	2.3	2.3	2.4	2.4	2.4	2.4	2.4
Personal tax credits	29.7	28.7	28.5	28.1	27.9	27.5	27.9
Child benefit	11.6	11.7	11.7	11.6	11.6	11.6	11.8
Tax free childcare	0.0	0.0	0.0	0.5	0.6	0.7	0.7
NI social security in welfare cap	3.4	3.4	3.5	3.4	3.4	3.5	3.6
Paternity pay	0.1	0.1	0.1	0.1	0.1	0.2	0.2
Budget measures		0.0	0.0	-0.7	-1.3	-1.5	-1.5
Indirect effects of Government decisions		0.0	0.0	-0.1	-0.1	0.0	0.0
Total welfare cap[4]	**119.3**	**120.4**	**119.8**	**118.0**	**116.4**	**116.2**	**118.1**
Welfare spending outside the welfare cap							
DWP social security	92.0	93.9	96.0	98.8	102.1	105.2	108.4
of which:							
State pension	86.5	89.3	91.7	94.1	97.2	100.1	103.2
Jobseeker's allowance	3.1	2.3	2.5	2.7	2.8	2.9	3.0
Housing benefit (on JSA)	2.4	1.8	1.8	2.0	2.1	2.2	2.2
Universal credit[3]	0.1	0.4					
NI social security outside welfare cap	2.2	2.4	2.4	2.5	2.6	2.7	2.8
War pensions[5]	0.8						
Budget measures		0.0	0.0	0.0	0.0	0.0	0.0
Indirect effects of Government decisions		0.0	0.0	0.0	0.0	0.2	0.2
Total welfare outside the welfare cap[4]	**94.7**	**96.2**	**98.4**	**101.2**	**104.8**	**108.1**	**111.4**
Total welfare[4]	**213.9**	**216.6**	**218.3**	**219.2**	**221.2**	**224.2**	**229.5**
Memo: welfare cap as proportion of total welfare	*55.7*	*55.6*	*54.9*	*53.8*	*52.6*	*51.8*	*51.5*

[1] Housing benefit (not on jobseeker's allowance) is made up of a number of claimant groups. The main claimant groups are pensioners, those on incapacity benefits, lone parents, and housing benefit only claimants.

[2] Incapacity benefit, employment and support allowance, severe disablement allowance and income support (incapacity part).

[3] Universal credit actual spending for 2014-15 and 2015-16. Spending from 2016-17 onwards represents universal credit additional costs not already included against other benefits (i.e. UC payments that do not exist under current benefit structure).

[4] Total welfare outturn inside and outside of the welfare cap in 2014-15 is sourced from OSCAR, consistent with PESA 2015. For 2014-15 only, the components reflect departments' own outturns, which may not be on a consistent basis to OSCAR. For this year the components may not sum to the total for this reason.

[5] Transferred to departmental expenditure limits.

4.109 Table 4.23 sets out the changes in our welfare spending forecast since November, distinguishing between those that flow from our updated economy forecast, those from other movements in the pre-measures forecast, and the effects of policies announced in the Budget. It shows that – prior to the Budget scorecard measures – we have revised spending down in 2015-16, but revised it up from 2016-17 onwards. The pre-measures forecast revision reaches £1.3 billion in 2020-21, with a £2.5 billion upward revision to welfare cap spending partly offset by a £1.1 billion downward revision to spending outside the cap.

4.110 The sources of the revisions are different across years. In summary:

- spending has been revised down by £0.6 billion in **2015-16**, with a caseload-driven fall in spending on tax credits the biggest factor. (Tax credits spending in the first ten months of 2015-16 is down 3.8 per cent on a year earlier.) Spending on housing benefit is also lower than expected, as the in-work caseload appears not to have risen as fast as recent employment growth would have suggested. Spending on incapacity and disability benefits has been revised up;

- we have revised up our pre-measures forecast for **spending subject to the welfare cap** by increasing amounts from 2016-17 to 2020-21. The biggest change has been to disability benefits (described below), with knock-on effects on incapacity benefits spending via disability premiums. We have also revised up spending on attendance allowance and carer's allowance (reflecting higher inflows) and on the marginal cost of universal credit (reflecting interactions between legacy benefits and universal credit in recent policy costings). That is largely offset by lower housing benefit spending, since the revision reallocates spending between the legacy system and universal credit. Lower earnings growth also raises spending on tax credits, but that is more than offset by the effect of lower-than-expected outturns this year;

- changes to **spending outside the welfare cap** are driven by our economy forecast revisions. In particular, lower expected earnings growth has reduced the forecast for spending on the state pension due to its effect on triple lock uprating. The triple lock implies 2.5 per cent uprating in 2017-18, so state pensions will rise in real terms and relative to earnings; and

- the Government's **policy decisions** reduce spending by the end of the forecast. The largest measure is the decision to reduce the number of points awarded for some 'aids and appliances' descriptors in the personal independence payment assessment. This is estimated to save £1.3 billion by 2020-21. Other measures are smaller.

Table 4.23: Key changes to welfare spending since November

	£ billion						
	Outturn	Forecast					
			Welfare cap period				
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Welfare spending inside the welfare cap							
November forecast	119.3	120.9	119.2	117.7	115.9	115.3	117.1
March forecast	119.3	120.4	119.8	118.0	116.4	116.2	118.1
Change	**0.0**	**-0.5**	**0.6**	**0.3**	**0.6**	**0.9**	**1.1**
of which:							
Economic determinants	**0.0**	**0.0**	**0.1**	**0.0**	**0.0**	**0.1**	**0.2**
CPI inflation	0.0	0.0	0.0	-0.1	-0.3	-0.2	-0.1
Average earnings	0.0	0.0	0.1	0.2	0.2	0.2	0.3
Other	0.0	0.0	-0.1	0.0	0.1	0.1	0.0
Estimating/modelling changes	**0.0**	**-0.6**	**0.5**	**1.1**	**2.0**	**2.3**	**2.4**
Disability benefits[1]	0.0	0.1	0.3	0.8	1.4	1.6	1.5
Attendance/Carer's allowance	0.0	0.1	0.3	0.4	0.5	0.7	0.7
Incapacity benefits[2]	0.1	0.1	0.2	0.3	0.3	0.4	0.4
Personal tax credits	0.0	-0.5	-0.4	-0.5	-0.4	-0.4	-0.4
Other	-0.1	-0.3	0.2	0.1	0.2	0.2	0.1
Classification change	**0.0**	**0.0**	**0.0**	**-0.1**	**-0.1**	**-0.1**	**-0.1**
Budget measures		**0.0**	**0.0**	**-0.7**	**-1.3**	**-1.5**	**-1.5**
Indirect effect of Government decisions		**0.0**	**0.0**	**-0.1**	**-0.1**	**0.0**	**0.0**
Welfare spending outside the welfare cap							
November forecast	94.7	96.3	98.6	102.0	105.6	108.8	112.3
March forecast	94.7	96.2	98.4	101.2	104.8	108.1	111.4
Change	**0.0**	**-0.1**	**-0.2**	**-0.8**	**-0.8**	**-0.7**	**-1.0**
of which:							
Economic determinants	**0.0**	**0.0**	**-0.1**	**-0.7**	**-0.8**	**-1.0**	**-1.1**
CPI inflation	0.0	0.0	0.0	-0.1	-0.2	-0.2	-0.2
Claimant count unemployment	0.0	0.0	-0.1	-0.1	0.0	0.1	0.1
Triple lock	0.0	0.0	0.0	-0.5	-0.7	-0.8	-1.0
Other	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Estimating/modelling changes	**0.0**	**-0.1**	**-0.1**	**-0.1**	**-0.1**	**0.0**	**0.0**
Budget measures	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**
Indirect effect of Government decisions	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.2**	**0.2**
Total welfare spending							
November forecast	213.9	217.2	217.8	219.8	221.5	224.1	229.4
March forecast	213.9	216.6	218.3	219.2	221.2	224.2	229.5
Change	**0.0**	**-0.6**	**0.4**	**-0.5**	**-0.3**	**0.1**	**0.1**
of which:							
Economic determinants	**0.0**	**0.0**	**0.0**	**-0.7**	**-0.8**	**-0.9**	**-0.9**
Estimating/modelling changes	**0.0**	**-0.6**	**0.4**	**1.0**	**1.9**	**2.3**	**2.3**
Classification change	**0.0**	**0.0**	**0.0**	**-0.1**	**-0.1**	**-0.1**	**-0.1**
Budget measures	**0.0**	**0.0**	**0.0**	**-0.7**	**-1.3**	**-1.4**	**-1.4**
Indirect effect of Government decisions	**0.0**	**0.0**	**0.0**	**-0.1**	**0.0**	**0.2**	**0.2**

[1] Disability benefits refers to disability living allowance and personal independence payment.

[2] Incapacity benefit, employment and support allowance, severe disablement allowance and income support (incapacity part).

4.111 Once again we have needed to make significant upward revisions to our pre-measures forecast of spending on **disability benefits** (disability living allowance (DLA) and its replacement the personal independence payment (PIP)). As Table 4.24 shows, our pre-measures forecast in 2020-21 is £1.4 billion higher than in November. It is £3.0 billion higher than in July (the first time our forecasts extended to 2020-21).

4.112 Partly offsetting some of the increase in the pre-measures forecast, the Government has chosen to reduce the points awarded for some 'aids and appliances' descriptors in PIP, which we expect to save £1.3 billion by 2020-21. This includes knock-on reductions in spending on passported benefits, including carer's allowance and employment and support allowance. The change affects both caseloads and average awards for disabled claimants. The changes to the points awarded for 'aids and appliances' reduces our forecast of the PIP daily living caseload by around 290,000 in 2020-21 (accounting for £1.2 billion of the total saving) and reduces awards for an additional 80,000 who are expected to move from enhanced awards to standard awards (accounting for the remaining £0.1 billion).

Table 4.24: Key changes in disability benefits spending since November

	£ billion					
	Forecast					
	Welfare cap period					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
November forecast	16.2	16.1	15.9	15.8	16.2	16.7
March forecast	16.2	16.4	16.2	16.2	16.7	17.2
Change	**0.1**	**0.3**	**0.3**	**0.4**	**0.5**	**0.5**
of which:						
Forecasting changes	**0.1**	**0.3**	**0.8**	**1.3**	**1.5**	**1.4**
Average PIP reassessment awards	0.0	0.2	0.6	0.9	1.0	1.0
PIP reassessment success rates	0.0	0.2	0.5	0.8	0.8	0.7
PIP new claims	0.0	-0.1	-0.2	-0.2	-0.2	-0.2
Other forecast changes	0.0	0.0	-0.1	-0.1	-0.1	-0.1
Budget policy measures	**0.0**	**0.0**	**-0.5**	**-0.9**	**-1.0**	**-1.0**
Indirect effects of Government decisions	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**

4.113 Not for the first time, we have revised up our forecast for spending on disability benefits because the transition from DLA to PIP has saved less money than expected. DLA reforms were initially factored into the first OBR forecast in June 2010 on the assumption of a flat success rate of 80 per cent (i.e. 20 per cent of claims reassessed would stop receiving the benefit). Average awards were assumed to be unchanged, so the 20 per cent of cases not succeeding at reassessment resulted in 20 per cent savings, which increased to around £1.5 billion in 2015-16. There was little evidence on which to base this costing, which in essence reflected the Government's desire to reduce spending on disability benefits by 20 per cent. It was described in the Government's *Budget 2010 policy costings* document as "*Drawing on the evidence of the impact of the WCA [work capability assessment], the central assumption for this policy is that it will result in a 20 per cent reduction in caseload and expenditure once fully rolled out. It is assumed that existing claimants would be reassessed over three years, with 25 per cent of the caseload reassessed in [2013-14], 75 per cent by the end of [2014-*

15] and 100 per cent by the end of [2015-16]."[10] We would no longer certify costings where detail on policy design and delivery is so sparse.

4.114 In December 2012, we revised the assumed success rates down to 74 per cent based on the results of DWP analysis of 900 existing DLA cases. We also adjusted average awards in line with the outcomes of these 900 cases. In that forecast, 1.8 million reassessments – both 'natural' (when a claimant's award came to an end, circumstances changed or they reached 16) and managed (at DWP's behest) – were scheduled to be completed by 2018-19. The reassessments were expected to reduce spending by £3.0 billion in 2017-18.

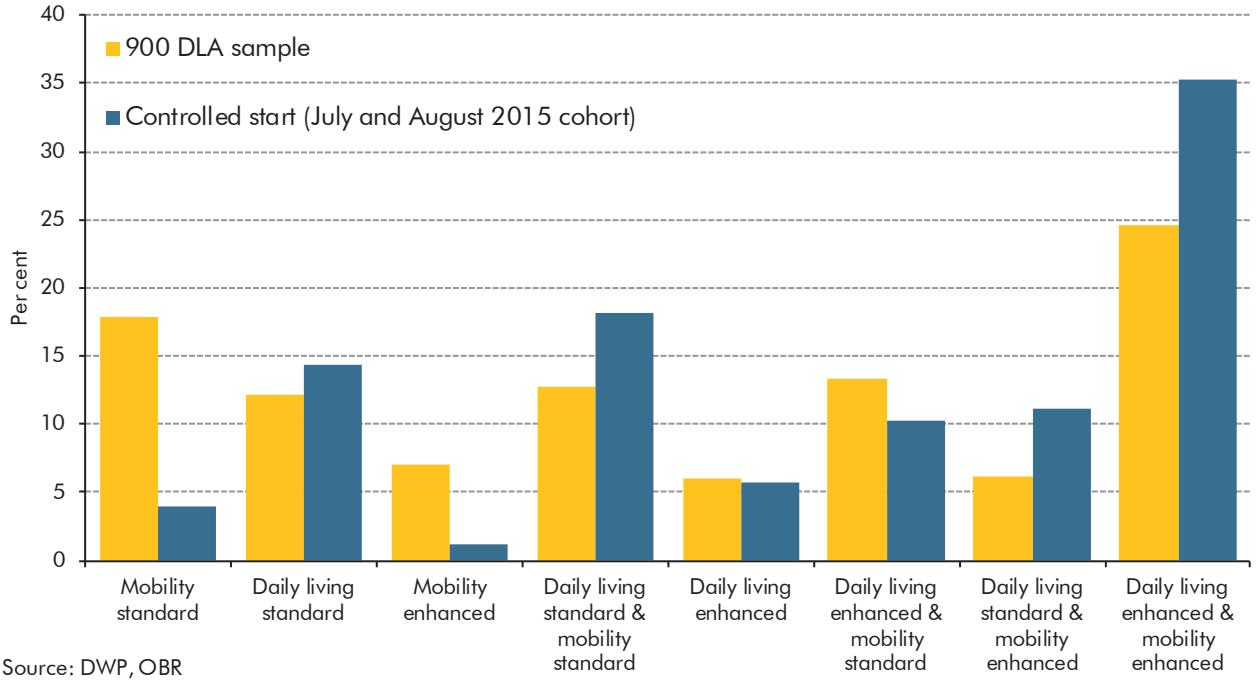
4.115 In this *EFO* we have made further changes to two key assumptions:

- **the probability of a DLA claim going through the managed reassessment process being successful for the claimant has been revised up from 74 to 83 per cent**, raising the PIP caseload. DWP now has evidence from 7,300 actual reassessment cases that are currently being processed through the 'controlled start' programme. It shows an initial claim success rate of 76 per cent, which we assume will rise to a final success rate of 83 per cent after mandatory reconsiderations and appeals. These assumptions remain subject to significant uncertainty since 7,300 cases represent less than 0.5 per cent of the 1.5 million managed reassessments expected to take place over the next three years, only some of which have yet completed the mandatory reconsideration and appeals processes. The new assumption added between £0.5 and £0.8 billion a year to our pre-measures forecast from 2017-18 onwards; and

- **average awards have been revised up by 16 per cent to £100 a week**. PIP awards had been assumed to be £86 a week (rising with CPI-linked uprating each year), again based on the distribution of expected successful cases from DWP's analysis of 900 DLA claims. The latest evidence points to a significantly higher proportion of claims being awarded the enhanced daily living and mobility payments (Chart 4.9). This change added £1.0 billion a year to our pre-measures forecast by 2020-21. Again, this assumption is subject to considerable uncertainty.

[10] See page 36 of *Budget 2010 policy costings*, HM Treasury and HM Revenue and Customs, June 2010.

Chart 4.9: Assumed composition of PIP caseloads after reassessments

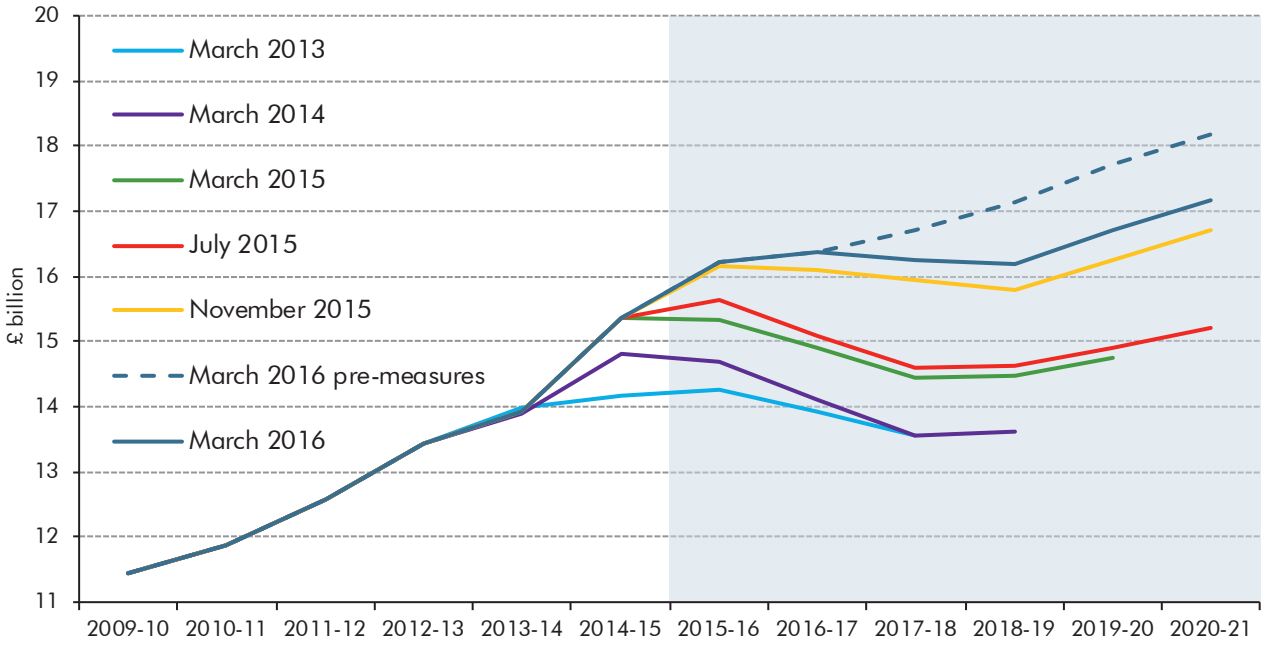


Source: DWP, OBR

4.116 As Chart 4.10 shows, in the absence of further policy measures in the Budget, this would have been the latest in a series of often substantial upward revisions to disability benefits spending. As noted above, our December 2012 forecast incorporated an assumed saving of £3.0 billion by 2017-18 from the introduction of PIP. If that costing had factored in the success rates and average awards assumed in this forecast, the saving would have been almost 90 per cent lower at £0.4 billion. This implies that the original 20 per cent saving sought by the Government looks more like 5 per cent in our pre-measures forecast, with the decisions announced in the Budget increasing that back towards the original target.

4.117 We have attempted to apply the lessons of the shortfall in PIP savings to date in scrutinising the aids and appliances policy costing included in this forecast. But the experience of recent years illustrates the uncertainty that surrounds such estimates. As reported in Annex A, we have assigned a 'medium-high' uncertainty rating to this costing.

Chart 4.10: Successive forecasts for spending on disability benefits



Source: DWP, OBR

4.118 Successive large revisions to our forecasts for incapacity and disability benefits spending have resulted from the results of the real-world rollout disappointing relative to the assumptions on which our forecasts have been based. The Treasury had similar problems forecasting tax credits spending as the system was reformed and expanded in the 2000s. Over the coming years, our forecast includes the effects of an even bigger reform of the welfare system: the introduction of **universal credit** (UC).

4.119 Forecasting the effects of any new system is difficult, not least because it takes time before the forecast can be informed by outturn data. With UC, the incorporation of tax credits recipients (administered by HMRC) into universal credit (administered by DWP) poses even greater challenges. In order to base our forecast as far as possible on actual data, UC is factored in as a marginal cost relative to the legacy benefits it replaces. This comprises a number of gross costs and gross savings, as shown in Table 4.25. The forecast is therefore more akin to a policy costing than a typical AME forecast. This adds greater uncertainty.

4.120 One specific source of uncertainty is that the costs are estimated from caseload forecasts generated by DWP's integrated forecasting model (INFORM), which models flows onto, between, and off different benefits. But DWP no longer uses INFORM to process our legacy benefit forecasts, with most now produced using separate stock-flow models where interactions between benefits are processed manually rather than integrated into the model.

4.121 The next key assumption underpinning the UC caseload forecast is the pace at which the system is rolled out to replace the legacy systems. We currently expect natural migration to progress in accordance with DWP's plans, but managed migration to start six months later than those plans. We have pushed our rollout assumption back on a number of occasions and it remains subject to uncertainty.

4.122 Table 4.25 shows that the main gross costs and savings associated with UC include:

- on a like-for-like basis spending on UC is expected to be higher than on the legacy benefits due to **higher take-up of benefits for claimants who would be eligible to multiple legacy benefits, but who do not claim them all**. They will receive their equivalent automatically under the single UC payment. We also assume that the UC design encourages slightly higher take-up for some claimants who are currently not claiming the legacy benefits to which they are entitled. This leads to a gross marginal UC cost of £0.8 billion on average, rising to £1.6 billion in 2020-21;

- the **average change in entitlement** for each legacy benefit is calculated using DWP's policy (micro-)simulation model (PSM). Policy in a steady-state UC world is compared to policy in a legacy-benefit world, with the difference generating a marginal UC cost or saving per case. These are then multiplied by the UC caseloads to generate gross UC marginal costs or savings. A number of policies are modelled outside the PSM and the resulting impact on expenditure added to the UC marginal costs off-model. This leads to a gross marginal UC cost of £1.5 billion on average, rising to £2.7 billion in 2020-21, where entitlement is estimated to be higher under UC;

- claimants that stand to lose when 'manage-migrated' will receive **transitional protection** until they either have a significant change in the circumstances or until the protection is eroded through increases in UC. Our estimate of the impact of transitional protection is derived mainly from the PSM: a gross marginal UC cost of £0.1 billion on average, rising to £0.5 billion in 2020-21. With a large number of policies modelled outside the PSM, and the UC and legacy policy comparisons being set in steady-state in the PSM, the transitional protection calculation is probably the most uncertain part of this forecast;

- the **gross marginal UC saving** of £2.5 billion on average, rising to £5.0 billion in 2020-21 **where entitlement is estimated to be lower under UC**;

- there are three **other large gross UC marginal savings**: abolishing the income disregards in tax credits (saving £0.6 billion by 2020-21); elements of UC design that reduce error and fraud (saving £1.1 billion by 2020-21); and the introduction of the minimum income floor for the self-employed (saving £0.8 billion by 2020-21). The marginal impact of these elements of our UC forecast all depend on changes in policy in the legacy benefits – primarily tax credits. These are estimated off-model, so rely on HMRC and DWP data-sharing procedures as policy continues to evolve; and

- a series of **off-model adjustments** that are necessary to reach a final estimate of the marginal cost of UC. Together these amount to £0.3 billion of additional net savings.

Table 4.25: The marginal cost of universal credit and its component parts

	£ billion				
	Forecast				
	Welfare cap period				
	2016-17	2017-18	2018-19	2019-20	2020-21
Marginal cost (pre-measures)	**-0.1**	**-0.5**	**-1.4**	**-2.5**	**-3.1**
of which:					
Gross cost	**0.3**	**1.2**	**2.7**	**3.7**	**4.7**
Gross cost of higher take-up[1]	0.1	0.4	0.9	1.3	1.6
Gross cost where entitlement is higher[2]	0.2	0.8	1.7	2.3	2.7
Transitional protection where entitlement is lower	0.0	0.0	0.0	0.2	0.5
Gross saving	**-0.4**	**-1.7**	**-4.1**	**-6.3**	**-7.7**
Gross saving where entitlement is lower[3]	-0.1	-0.8	-2.5	-4.0	-5.0
Gross saving of abolishing the disregards	0.0	-0.2	-0.4	-0.5	-0.6
Gross saving from reductions in error and fraud	0.0	-0.2	-0.5	-0.9	-1.1
Gross saving from the minimum income floor	0.0	-0.1	-0.4	-0.6	-0.8
Gross saving from other factors	-0.3	-0.3	-0.3	-0.3	-0.3
	Proportion of caseload migrated to UC (per cent)				
Jobseeker's allowance	32	61	90	99	100
Employment and support allowance	2	15	39	66	89
Income support (non-incapacity)	4	28	61	82	93
Tax credits	1	16	44	66	80
Housing benefit	7	28	65	88	99
All	5	21	50	72	87

[1] Includes both the change in entitlement and take-up for groups where take-up has increased.

[2] Entitlement for those who fully take-up their entitlement in the legacy system.

[3] Net entitlement and take-up impacts from those households who have lower entitlements.

4.123 Given the errors that have been identified when incorporating the effects of recent large policy measures, we have devoted considerable time to scrutinising the affected forecasts. That process has revealed new sources of significant concern with our UC marginal costs forecast. In particular, the model on which it is produced has not been able to keep pace with recent policy changes and has become even less transparent than was previously the case due to the increasing use of off-model adjustments. We will continue to work with DWP to try to resolve these issues and will report on progress in our next *Welfare trends report*.

Public service pensions

4.124 The public service pensions forecast covers net expenditure on benefits paid less employer and employee contributions received. It includes central government pay-as-you-go schemes and locally administered police and firefighters' schemes.[11] A breakdown of spending and income for the major schemes covered by our forecast is included in the supplementary fiscal tables on our website.

4.125 Table 4.26 details the changes to our public service pensions forecast since November. It shows that net expenditure has fallen by £1.0 billion a year on average over the forecast

[11] The police and firefighters' pension schemes are administered at a local level, but pensions in payment are funded from AME, along with other public service pension schemes. They are therefore included in our pensions forecast.

period. That is made up of a £0.4 billion a year downward revision in our pre-measures forecast and bigger falls in 2019-20 and 2020-21 as a result of decisions announced in the Budget. At the component level:

- **gross expenditure** has fallen, due largely to lower CPI inflation and a change in the forecast methodology for how pensions in payment and lump sums for new retirees are uprated in the NHS pension scheme. With evidence that those approaching retirement tend to earn close to the top of their pay range, we now uprate the annual awards and lump sums of new retirees by settlement growth only, since pay drift is not possible when an employee is at the top end of a given pay scale;

- **NHS receipts** have been revised down to reflect lower expected workforce growth than we had assumed in November (when we linked pensionable paybill growth to the growth in the NHS's RDEL budget). We now expect a higher proportion of additional NHS funding announced at the Spending Review to be spent on other, non-workforce areas, such as meeting existing pressures and delivering new policy commitments around mental health and access to cancer treatment;

- we have revised up a number of **other workforce assumptions**. Teachers' pension scheme (TPS) receipts are higher as workforce growth is higher than we assumed in November. (The number of teachers is predicated on the forecast number of pupils.) Scottish scheme receipts (NHS and teachers') are higher, as we now assume that the respective schemes' pensionable paybills will grow at the same rate as the England and Wales NHS and TPS schemes. Police scheme receipts are also higher, reflecting smaller workforce reductions as a result of the real terms budget protection announced in the Spending Review, which had not been factored into our November forecast;

- we have removed our centrally applied adjustment the **abolition of contracting out** from the years in the forecast in which firm plans now exist (up to 2019-20 for all schemes and 2020-21 for the armed forces and NHS schemes) as the impact should now be in individual scheme returns. The abolition of the contracting out rebate represents a departmental RDEL cost pressure, which we would expect, in part, to reduce workforce (and therefore pensionable paybill) growth. It is not possible to isolate the contributions effect of this on a scheme-by-scheme basis, as departments tend to consider all such pressures together. In practice, we expect that any estimated impact would roughly offset our previous central adjustment. We continue to adjust 2020-21 receipts for schemes that are not yet based on firm plans; and

- **Government decisions** reduce spending. The Budget announced that the Government will reduce the discount rate used in the forthcoming pensions revaluations from 3.0 to 2.8 per cent, which will lead to higher employer contributions. Absent any response from public sector employers, that would reduce net spending by around £2.5 billion a year from 2019-20 onwards. However, we expect the additional pressure on departmental budgets to prompt lower workforce growth, offsetting part of the saving. The effect of the policy therefore reduces net spending by £2.0 billion a year. We

assume that other RDEL cuts announced in the Budget will also lead to lower workforce growth, reducing contributions and raising net spending by £0.4 billion in 2020-21.

4.126 Our public service pensions forecast has not been adjusted for the recent ruling in the GAD-Milne court case, which will lead to compensation payments associated with past underpayment in the firefighters' and police pension schemes. The latest information we have suggests that these payments will be treated as capital AME. The latest data on payments that have been made and those due to be made in 2015-16 closely aligns with our previous forecast, leading to negligible changes in estimated payments (and the associated tax charges, which are directly offset in the receipts forecast).

Table 4.26: Key changes to public service pensions since November

	£ billion					
	Forecast					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Net public service pensions						
November forecast	11.4	11.5	12.7	14.3	15.7	16.7
March forecast	11.5	11.2	12.1	13.7	13.2	14.7
Change	**0.2**	**-0.3**	**-0.6**	**-0.6**	**-2.5**	**-2.0**
Expenditure						
November forecast	39.4	40.0	41.5	43.4	45.2	47.2
March forecast	39.5	40.0	41.3	43.1	44.9	46.9
Change	**0.0**	**0.0**	**-0.2**	**-0.3**	**-0.3**	**-0.3**
of which:						
CPI inflation	0.0	0.0	-0.1	-0.2	-0.1	-0.2
NHS pay drift assumption	0.0	0.0	-0.1	-0.2	-0.2	-0.3
Other	0.0	0.0	0.0	0.0	0.1	0.1
Income						
November forecast	-28.1	-28.5	-28.8	-29.1	-29.5	-30.5
March forecast	-27.9	-28.8	-29.2	-29.4	-31.8	-32.2
Change	**0.1**	**-0.3**	**-0.4**	**-0.3**	**-2.2**	**-1.7**
of which:						
NHS paybill growth	-0.1	0.0	0.2	0.4	0.7	0.8
TPS paybill growth	0.0	0.0	0.0	-0.1	-0.1	-0.2
Scottish schemes' paybill growth	0.0	-0.1	-0.1	-0.2	-0.3	-0.2
Police paybill growth	0.0	0.0	0.0	-0.1	-0.1	-0.1
Contracting out adjustments	0.0	-0.3	-0.3	-0.3	-0.3	-0.2
Other forecast changes	0.1	0.1	0.0	-0.1	-0.1	-0.1
Scorecard measure	0.0	0.0	0.0	0.0	-2.0	-2.0
Indirect effects of Government RDEL decisions	0.0	0.0	0.0	0.0	0.0	0.4

EU contributions

4.127 Exchange rate movements have increased our forecast for EU contributions over most of the forecast period, but this effect has mostly been offset by reductions in the UK share of EU GNI and VAT bases. Our latest forecast also includes some large changes associated with the profile of spending in 2016. This has no effect on total spending in the calendar year, but moves it from 2015-16 to 2016-17 in fiscal year terms. Table 4.27 summarises the main changes to our forecast since November, which include:

- **sterling depreciation** since November, which we assume will persist, has increased spending by £0.4 billion a year from 2018-19 onwards. The effect of weaker sterling on the UK's contributions is not straightforward. It reduces the UK's share in euro-denominated GNI and VAT bases, but it also increases the sterling value of euro-denominated payments, abatements and receipts;

- the downward revision to our **UK productivity forecast** has fed through to a lower assumed share of EU GNI and VAT bases, reducing spending by £0.4 billion in 2016-17 and £0.1 billion to £0.2 billion a year from 2018-19 onwards. The UK's GNI and VAT payments for 2016 were set initially in May 2015. We have revised our forecast for these payments down by £0.4 billion to anticipate revisions that will be made when the latest estimates for the EU GNI and VAT bases become available in May 2016;

- we have anticipated additional GNI and VAT adjustments being levied in late 2016 as a result of forthcoming **upward revisions to UK GNI estimates relating to 2010 to 2014**, which we have calibrated on the basis of two recent ONS articles about foreign direct investment earnings data and previewing Blue Book 2016. That has added £0.5 billion to spending in 2016-17, but subtracted £0.4 billion in 2017-18 due to the associated abatement. We also assume that these adjustment payments will add to surplus EU funds that will be returned to Member States in proportion to their financing shares. Given this estimate is based on only preliminary UK estimates, there is considerable scope for it to change in light of final Blue Book revisions and any upward or downward revisions to other Member States' historical GNI and VAT bases over the summer;

- a revised estimate of the **effects of the VAT and GNI adjustments that were applied in 2015**, on the UK rebate received in 2016. The estimated impact has been revised up by £0.2 billion, increasing the rebate, reflecting new information on the profile of other Member States' adjustments;

- two relatively large **timing effects within 2016** have together moved £1.1 billion of spending from late 2015-16 to 2016-17. First, in contrast to recent years, the Commission's first quarter payment demand was less than the maximum 5-month draw-forward (at 4.3 months, it moved £0.7 billion to later in 2016). Second, the payments that we assume will result from implementing the 2014 Own Resources Directive following ratification by all Member States has been allocated entirely to 2016-17. When we closed this forecast, several Member States were yet to ratify, with all expected to complete the process by the end of 2016;[12] and

- **other factors** have generally been small and partly offsetting. For example, we have attempted to anticipate the forthcoming recalculation of structural funds payments

[12] The 2014 own resources decision (ORD) was agreed ahead of the 2014-2020 Multiannual Financial Framework (MFF). In our December 2013 *EFO* we explained that our forecast assumed that this would come into effect in 2016, two years after the start of the MFF. This reduced our forecast for payments in 2013-14 and 2014-15, but increased them in 2015-16 and 2016-17, as we forecast retrospective payments would be made to correct for the lag in the implementation. There is still some uncertainty over the precise impact of the retrospective adjustment, but, as many of the payments are abatable, any changes to our forecast should be small, and contained in 2016-17 and 2017-18.

across Member States, which the Commission is expected to publish in May. The net effect on our forecast has been small. It will affect payments for the next seven years, starting in 2016-17. There remains some uncertainty over the timing of the payments.

4.128 Further details of our forecast for expenditure transfers to EU institutions are contained in supplementary fiscal tables on our website. They show our latest assumptions for the levels of EU budget expenditure and transactions broken down into the GNI and VAT contributions and rebate, with details of adjustments for historic years.

4.129 Our forecast only covers the effect of transactions on the public sector finances, reflecting definitions that are set out in the National Accounts, under the European System of Accounts 2010. It does not cover the wider effect of EU transactions on the whole of the UK, including the private sector. For instance, our forecast does not include most customs duties, which are deemed to be collected on behalf of the EU. Nor does it include public sector or private sector receipts from the EU.

Table 4.27: Key changes to expenditure transfers to EU institutions since November

	£ billion					
	Forecast					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
November forecast	11.7	10.7	9.7	10.9	11.4	11.7
March forecast	10.5	11.8	9.4	11.2	11.6	11.9
Change	**-1.2**	**1.1**	**-0.2**	**0.2**	**0.2**	**0.2**
of which:						
Exchange rate assumptions	0.0	0.0	0.1	0.4	0.4	0.4
UK share of EU GNI and VAT bases[1,2]	0.0	-0.4	0.0	-0.1	-0.1	-0.2
2016 adjustment for historical GNI changes[2,3]	-	0.5	-0.4	-	-	-
Change to rebate in respect of GNI and VAT adjustments in 2015[2]	-	-0.2	-	-	-	-
Change in payments drawn forward into 2015-16	-0.7	0.7	-	-	-	-
Re-profiling of ORD14 impact	-0.4	0.4	-	-	-	-

[1] Reflects OBR forecasts of UK GNI and VAT, and IMF forecasts for other member states. This mainly includes an adjustment to anticipate revisions to the UK payments during 2016 that will be required when the latest estimates for the EU GNI and VAT bases are agreed in the ACOR figures in May 2016. This also includes revisions to the forecasts of the GNI and VAT adjustments that will be applied in 2016 in respect of estimated outturns in 2015.

[2] All the forecast adjustments to the GNI and VAT payments and the rebate are shown in detail in the supplementary fiscal table on our website.

[3] Adjustment for historical GNI changes in respect of 2010 to 2014.

Locally financed current expenditure

4.130 We forecast local authority spending by forecasting the sources of income that local authorities use to finance their spending and then the extent to which spending will be higher or lower through additions to or withdrawals from their reserves. Our forecast therefore encompasses spending financed by grants from central government, which are mostly in DEL, and local authority self-financed expenditure (LASFE) in AME. Table 4.28 below focuses on LASFE, while further detail on all aspects of local authority spending in our forecast is available in supplementary tables on our website.

4.131 There are currently a number of important uncertainties affecting this forecast:

- **financing from central government** comes from a variety of sources that have been affected by November's Spending Review. While funding from the Department for Communities and Local Government (CLG), including the local government settlement for 2016-17, is either known or can be estimated with reasonable confidence, there is more uncertainty over other sources. Perhaps the most important of these is the split of Dedicated Schools Grant (DSG) funding between payments to local authorities (for schools) and payments made directly to academies, which are classified as part of central government in the National Accounts. The Government's proposals about academies in *Intervening in failing, underperforming and coasting schools* last year and further announcements in this Budget add to this uncertainty. We have based our forecast on recent trends in the rate at which schools are converting to academies. This assumption affects total funding and spending by local authorities, but not LASFE; and

- **local sources of financing** are dominated by council tax and business rates. We expect council tax to rise by 14 per cent in real terms over the forecast period, in part due to the Autumn Statement announcements helping some local authorities to increase council tax more quickly to meet some of the costs associated with adult social care and policing. The biggest source of uncertainty, though, relates to business rates, where the Government has announced that local authorities will retain 100 per cent of business rates by the end of the Parliament (up from 50 per cent at present). The potential implications of that announcement – and the unspecified spending responsibilities that will be transferred at the same time – are described in Box 4.3 at the end of this section.

4.132 These uncertainties could affect the overall level of local authority spending and the split of financing between central government and local sources. One effect on our forecast for current LASFE is that we assume that they will cause local authorities to add more to their reserves in 2016-17, with additions tapering to zero over four years as pressures on local authority budgets intensify.

4.133 The latest in-year data on local authorities' current spending – which CLG have been improving to deal with some recent quality concerns – suggest that local authorities in England may spend more this year than we assumed in November. Table 4.28 shows that we have increased our forecast in 2015-16 by £0.7 billion, and reduced our forecast for local authorities' net additions to their reserves by £0.4 billion (implying a small net drawdown).[13] We still expect English local authorities to underspend their budgets this year, largely because those budgets assumed that they would draw down their reserves by £1.8 billion. Our forecast implies an underspend of £2.6 billion on their net current expenditure, which would be slightly higher than last year.

[13] This revision has prompted us to reduce our forecast for net additions to reserves in future years. We now assume additions of £0.9 billion in 2016-17, declining steadily to zero by 2019-20.

4.134 From 2016-17 onwards, our current LASFE forecast is largely driven by our forecasts for council tax and business rates. We have assumed that council tax increases in England will average 3.4 per cent. This assumes an average increase of 1.9 per cent for all local authorities, just below the referendum cap of 2 per cent[14] and an additional 1.5 per cent in respect of those local authorities allowed to increase council tax by up to a further 2 per cent, in large part to help fund spending on adult social care, the cost of which is expected to rise due to the introduction of the National Living Wage. We expect that 95 per cent of eligible local authorities take the opportunity to raise their council tax to the 3.99 per cent limit. We have also increased our forecast of growth in the council tax base. We continue to assume that council tax levels in Scotland will rise in line with CPI inflation from 2016-17, and that Welsh council tax will increase in line with a three-year historical average.

4.135 Table 4.28 summarises the main changes to our current LASFE forecast. As well as those described above, they include:

- revisions to our forecast for **revenue used to finance capital expenditure (CERA)**, which we have increased slightly in 2015-16, but then revised down in later years. This reflects the uncertainty over levels of local authority funding, which has led us to assume an unchanged level of CERA from 2017-18 onwards. Compared to our previous forecast, this switches more forecast spending from current to capital LASFE;

- lower **spending financed by interest receipts**, due to lower interest rates;

- **other changes to the pre-measures forecast** include a small increase in current LASFE for local authorities in Scotland, which reflects increases seen in the final outturn for 2014-15. In 2016-17 this is offset by a £0.2 billion reduction in the forecast for retained business rates, which reflects more income being retained in the business rates collection fund in case it is needed to settle increases seen in the level of appeals; and

- **scorecard measures** that include three separate measures that reduce the amounts of business rates, and also a measure to allow local authorities to spend proceeds from sales of some specific assets on some specific elements of current spending. Local authorities will receive additional RDEL grants to offset the reduction in business rate income, where the additional RDEL for those grants is included in RDEL scorecard measures discussed above.

[14] Larger authorities and other bodies, such as police and crime commissioners, have to hold a referendum if they want a rise of 2 per cent or more, or would raise bills by £5 a year per household.

Table 4.28: Key changes to locally financed expenditure and public corporations expenditure since November

	£ billion					
	Forecast					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Locally financed current expenditure						
November forecast	39.8	40.3	43.4	45.6	48.0	49.9
March forecast	40.5	40.8	43.3	45.1	47.0	48.8
Change	**0.7**	**0.5**	**-0.1**	**-0.4**	**-0.9**	**-1.1**
of which, changes in local finance:						
Council tax	0.0	0.2	0.4	0.5	0.6	0.6
Revenue used to finance capital expenditure (CERA)	0.1	0.0	-0.1	-0.2	-0.3	-0.3
Net use of current reserves	0.4	0.3	0.2	0.1	0.0	0.0
Interest receipts	0.0	-0.1	-0.2	-0.2	-0.2	-0.2
Other changes in local finance	0.2	-0.1	0.2	0.1	0.2	0.1
Scorecard measures	0.0	0.1	-0.6	-0.8	-1.1	-1.4
Locally financed and public corporations' capital expenditure						
November forecast	22.2	21.4	21.1	18.8	18.3	19.6
March forecast	23.1	21.7	20.9	18.7	18.4	19.8
Change	**0.8**	**0.2**	**-0.2**	**0.0**	**0.1**	**0.2**
of which:						
Housing associations' capital spending	-0.4	0.4	0.6	0.6	0.6	0.6
Local authority capital expenditure financed from the revenue account (CERA)	-0.1	0.0	0.1	0.2	0.3	0.3
Additional financial transactions to align with in-year quarterly outturns[1]	0.5	0.0	0.0	0.0	0.0	0.0
Other changes to capital LASFE and public corporations' capital expenditure	0.8	0.0	0.0	0.1	-0.1	-0.1
Scorecard measures	0.0	-0.2	-1.0	-0.9	-0.7	-0.6

[1] These financial transactions are not included in PSGI, and so are removed elsewhere within our accounting adjustments included in PSGI in AME. The adjustment to remove financial transactions and all the other main accounting adjustments are detailed in a supplementary fiscal table available on our website.

Locally financed and public corporations capital expenditure

4.136 Our latest forecasts for locally financed capital expenditure (capital LASFE) and public corporations' capital spending are shown in Table 4.28 above. These forecasts are net of asset sales, forecasts for which are shown in the supplementary tables on our website. Capital LASFE is measured net of capital spending by local authorities' Housing Revenue Accounts (HRAs) and the Transport for London (TfL) subsidiaries that are treated as public corporations in the National Accounts.[15] We switch these items out of capital LASFE and include them in our forecast for public corporations net capital expenditure to ensure our forecast is consistent with the National Accounts. We therefore look at changes for LASFE

[15] These TfL transport subsidiaries trade under the company name 'Transport Trading Ltd' (TTL). Previously the ONS classified all the TTL subsidiaries as public corporations apart from Crossrail, which was classified as part of the local authority sector. However, the ONS has recently reclassified two of the other TTL subsidiaries to the local authority sector. We would expect that these reclassifications will have a neutral effect on the public sector finances and we are waiting for further details of how the ONS has implemented those reclassifications in the outturn data before we reflect them in our forecast.

and public corporations capital spending together, so that any changes to the switches net out and do not obscure the changes that affect TME.

4.137 In November we included provisional forecasts for housing associations, following the ONS's announcement that they would be reclassified to the public sector. The ONS has now implemented that reclassification. Its estimate of housing associations' capital spending in 2014-15 was lower than we had expected, so we have revised down our forecast for 2015-16. From 2016-17 onwards, we have revised capital spending up due to a higher forecast of rental income, which we assume housing associations will use to finance borrowing for housebuilding. Our housing association forecast is described in more detail in Box 4.2.

4.138 The remaining changes to our forecasts mainly reflect:

- the revision to **CERA** described in the section on current LASFE;
- increases in our forecast for capital spending financed by the **community infrastructure levy (CIL)**, which we have assumed are largely offset by reductions in capital spending financed by contributions from private developers;[16] and
- other changes to our forecast of capital LASFE to reflect the latest **quarterly in-year information**. This suggests that local authorities in England will underspend their capital budgets by £4.4 billion. This is a little lower than the average of £5.3 billion underspending over the previous two years;[17] and
- the effects of several **scorecard measures** that include additional asset sales to finance specific current spending, as detailed above, and measures to defer the downrating of social rents by a year, and change pay to stay to include a taper, and make the pay to stay policy voluntary for housing associations, and also a measure to pilot right to buy for housing associations. Table 4.28 shows the total effect of all these measures on capital LASFE and the capital spending by HRAs and housing associations.

Box 4.3: Local authorities' retention of business rates

The Government announced in Autumn Statement 2015 that it will let English local authorities retain 100 per cent of business rates by the end of the Parliament. It has stated that the reform is intended to be fiscally neutral: as part of these reforms, the main local government grant will be phased out and additional spending responsibilities devolved to local authorities. These details have not yet been confirmed. The reforms are subject to a number of rounds of engagement and consultation over the next two years and will require primary legislation. The final policy package is therefore not expected to be agreed until at least early 2017. The Government announced in the Budget that it is piloting this, but we were not informed in time to factor this into our forecast.

[16] Both CIL and the contributions from private developers are offset elsewhere in the public finances account and so are neutral for borrowing overall.
[17] The measure of local authority capital spending in England that we use in our forecast is the main measure of capital spending, net of asset sales, which CLG use in their local authority data collection and statistical releases. These include financial transactions that are not included in PSGI or PSNB in the National Accounts, and which are therefore removed in the accounting adjustments in capital AME.

Business rates are currently classified as a central government tax, but they are levied on non-domestic properties by local authorities and raise around £26 billion a year in England. The tax is levied as a proportion ('the multiplier') of the market rateable value as estimated by the Valuation Office Agency; the multiplier is currently increased in line with RPI inflation each year. The Budget announced that indexation would switch to CPI inflation from April 2020. From 2013, local authorities have retained around 50 per cent of receipts from business rates. The new reforms will mean that the remaining 50 per cent of business rates would also be retained. Local authorities will also be given powers to cut business rates, while mayoral authorities will be given the power to increase business rates to fund infrastructure projects, provided that they have the support of the local business community via an agreed process. As in the current business rates system, there will also be a need for redistribution via a top-up and tariff system.

Since the Autumn Statement, CLG has issued a consultation on *The provisional Local Government Finance Settlement 2016-17 and an offer to councils for future years.* This set out some examples of grants and responsibilities that might be devolved, including:

- the main local government grant;
- the responsibility for funding the administration of housing benefit for pensioners;
- Transport for London's capital grant;
- the public health grant; and
- additional responsibilities to provide support for older people with disabilities or care needs, who would currently be supported via attendance allowance.

These items are subject to further consultation, so do not represent firm Government policy. Once the proposed transfer of grants and responsibilities is known, we will scrutinise all parts of the proposed package in detail to consider any direct and indirect effects. The latest information that the Treasury has given us suggests that formal consultation will commence in summer 2016, with primary legislation to follow as soon as possible. That would suggest the final package will not be firm enough to incorporate in our forecasts until Budget 2017, at the earliest.

The channels by which these changes could affect our forecast would include:

- if the package was completely fiscally neutral, public sector current receipts and total managed expenditure would be unchanged – it would just be the balance between central and local government that would change;
- spending on items funded by the main local government grants, other components of local government DEL, the housing benefit administrative subsidy, and the public health grant would shift from RDEL (which would be lower) to current LASFE in our AME forecast (which would be higher);
- the Transport for London capital grant would move from CDEL to capital LASFE; and
- spending on attendance allowance (AA) in England would move from welfare spending to current LASFE within our AME forecast (at the Great Britain level, we forecast AA will rise to £6.4 billion by 2020-21 (see Table 4.22) – in 2014-15, 84 per cent of AA spending was in England).

Central government debt interest

4.139 Central government debt interest payments (net of the effect of the Bank of England's Asset Purchase Facility (APF) holdings of gilts) are forecast by applying interest rates to the stocks of different liabilities. These interest rates are derived from financial market expectations and our inflation forecast (for index-linked gilts).[18]

4.140 Table 4.29 shows a significant downward revision to debt interest spending, net of the saving from financing some debt at Bank Rate through the APF, averaging £4.9 billion a year from 2016-17 onwards. The cumulative saving over the next five years relative to our November forecast is £24.5 billion. This comes on top of significant downward revisions in three of our last four forecasts. Debt interest spending (net of the APF) in 2018-19 is now forecast to be £42.4 billion, down more than 40 per cent since our March 2014 forecast, before market interest rate expectations began falling again. Box 4.4 discusses the evolution of our recent debt interest forecasts and the risks to which our latest forecast may be subject.

4.141 There have been significant changes to both elements of the forecast – the gross debt interest paid by central government (including that paid to the APF) and the amount that is netted off because the APF is part of the public sector. The table therefore shows the sources of changes to both elements. These include the effect of:

- **lower gilt yields**, which have fallen further since November, reducing spending by rising amounts over the forecast period as lower gilt yields reduce gross debt interest payments on new issues of conventional gilts;

- **market expectations of Bank Rate have fallen** even more significantly since November. Market expectations are below the current rate of 0.5 per cent for the next two years, do not reach 0.75 per cent until 2019 (a full decade after Bank Rate was initially cut to 0.5 per cent) and only reach 1.1 per cent by the end of our 5-year forecast period. As we have used market expectations throughout the forecast period, our forecast is consistent with Bank Rate being reduced below 0.5 per cent for some of the next two years. That is consistent with the Bank of England's published guidance on the possibility of Bank Rate cuts if the Monetary Policy Committee considered that necessary in the context of setting policy to meet its inflation target.[19] Lower Bank Rate reduces the cost of financing the Bank of England reserves created to fund the APF's gilt purchases;

[18] Our forecasting approach was explained in Box 4.4 of our March 2015 *EFO*. We publish a supplementary fiscal table on our website that presents the different stocks, flows and effective interest rates that make up our debt interest forecast.

[19] For example, the February 2015 *Inflation Report* stated that *"…there are risks to the inflation outlook in both directions. Were downside risks to materialise, market expectations of the future path of interest rates could adjust to reflect an even more gradual and limited path for Bank Rate increases than is currently priced. The Committee could also decide to expand the Asset Purchase Facility or to cut Bank Rate further towards zero from its current level of 0.5%. The scope for prospective downward adjustments in Bank Rate reflects, in part, the fact that the United Kingdom's banking sector is operating with substantially more capital now than it did in the immediate aftermath of the crisis. Reductions in Bank Rate are therefore less likely to have undesirable effects on the supply of credit to the UK economy than previously judged by the MPC. Were upside risks to materialise, it would be appropriate for Bank Rate to increase more quickly than embodied in current market yields but the likelihood is that those increases would still be more gradual and limited than in previous tightening cycles. The MPC stands ready to take whatever action is needed, as events unfold, to ensure inflation remains likely to return to target in a timely fashion."*

- **lower RPI inflation** – excluding the knock-on effects of Budget measures – has reduced debt interest costs on index-linked gilts. This saving is greatest in the initial years of the forecast, reflecting lower oil prices and other factors;

- **changes to the pre-measures financing requirement** due to higher borrowing have offset some of these debt interest savings; and

- the **indirect effects of Government decisions** are uneven across the forecast period. The effect of duty measures on RPI inflation pushes up the accrued cost of servicing index-linked gilts, with the effect particularly large in 2018-19 when the soft drinks industry levy is introduced. Offsetting that, UKAR asset sales reduce the financing requirement from 2016-17 onwards and fiscal tightening reduces it further from 2019-20.

Table 4.29: Key changes to central government debt interest since November

	£ billion					
	Forecast					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
November forecast (net of APF)	34.7	39.5	43.7	46.4	49.0	49.1
March forecast (net of APF)	34.1	35.4	38.6	42.4	43.4	43.4
Change	**-0.6**	**-4.0**	**-5.1**	**-4.0**	**-5.6**	**-5.7**
November forecast (gross of APF)	46.5	51.0	54.2	55.7	57.3	56.6
March forecast (gross of APF)	45.7	47.8	51.0	54.1	54.4	53.5
Change	**-0.8**	**-3.2**	**-3.2**	**-1.5**	**-3.0**	**-3.1**
of which:						
Interest rates	-0.1	-1.0	-1.9	-2.5	-3.0	-3.3
Inflation	-0.5	-2.0	-1.1	-0.1	-0.2	-0.2
Financing	0.0	0.0	-0.1	0.1	0.5	1.0
Other factors (including outturn)	-0.2	0.0	0.1	0.2	0.1	-0.2
Indirect effects of Government decisions	0.0	-0.1	-0.2	0.8	-0.3	-0.5
of which:						
Inflation	0.0	0.1	0.1	1.0	0.1	0.2
Other	0.0	-0.2	-0.3	-0.3	-0.4	-0.6
Changes from the Asset Purchase Facility						
November forecast	-11.7	-11.5	-10.6	-9.3	-8.3	-7.6
March forecast	-11.6	-12.4	-12.4	-11.7	-11.0	-10.1
Change	**0.2**	**-0.8**	**-1.9**	**-2.5**	**-2.7**	**-2.6**
of which:						
Interest rates	0.0	-1.0	-2.0	-2.7	-3.0	-2.8
Other factors (including outturn)	0.2	0.1	0.2	0.2	0.3	0.3

Box 4.4: Debt interest spending and the yield curve

In several recent forecasts we have revised down debt interest spending as market expectations of the interest rates at which the Government can borrow and service its debt have moved progressively lower and as inflation has fallen.

Since March 2014 our forecast for the budget balance in 2018-19 (the final year of that forecast) has deteriorated by £22.6 billion from a small surplus to a deficit of £21.5 billion in

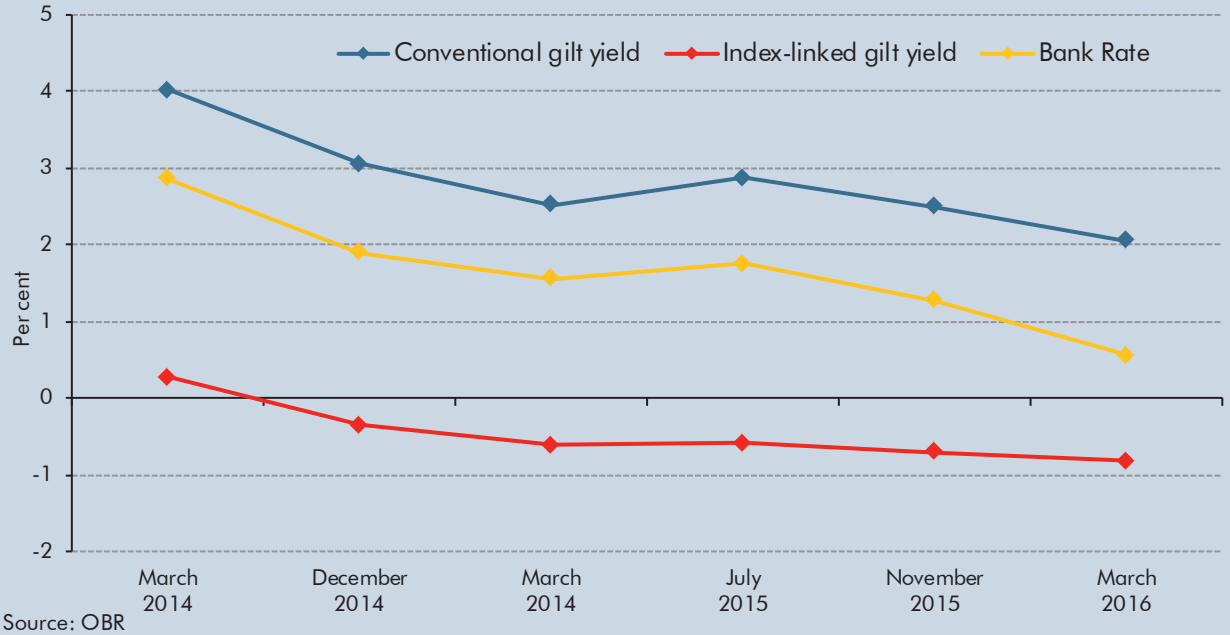
this forecast. That has occurred despite a £33.0 billion reduction in expected debt interest spending in that year. As Table C shows, lower interest rates (conventional and real gilt yields and short-term rates) explain the majority of the change, with lower RPI inflation and other factors (e.g. updated assumptions about gilt holdings in the APF) contributing smaller amounts.

Table C: Sources of changes to debt interest spending since March 2014

	£ billion					
	Forecast					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
March 2014 (post-PSF review basis)	50.1	60.4	69.7	75.4		
March 2016	34.1	35.4	38.6	42.4	43.4	43.4
Change	**-16.0**	**-25.0**	**-31.1**	**-33.0**		
of which:						
Interest rates	-5.4	-14.1	-20.3	-24.1		
RPI inflation	-9.4	-7.8	-5.9	-5.0		
Other factors	-1.2	-3.1	-4.9	-3.9		

Chart C shows how market expectations for the 2018-19 level of the key interest rates that drive our debt interest forecast have fallen since March 2014. Bank Rate expectations have fallen from around 3 per cent in March 2014 to only just above ½ per cent now. Expectations of yields on conventional and index linked gilts have also fallen significantly.

Chart C: Successive market expectations for interest rates in 2018-19



Source: OBR

Given how low the market yield curve has fallen – and the extent to which lower interest rates have cushioned the effects of other forecast changes – the rest of this box reviews the sensitivity of debt interest spending to changes in various factors and what might drive them.

What could cause market expectations of interest rates to rise?

When considering the possible implications of higher interest rates, it is important to think about

the underlying drivers of any change. In broad terms:

- if market expectations move higher because **strengthening growth prospects** mean that markets expect monetary policy to be tightened, the upward pressure on borrowing from higher interest rates via debt interest spending would be offset by the effects of a stronger economy in boosting receipts and reducing some welfare spending; but
- if interest rate expectations move higher due to **higher risk premia** (e.g. due to greater uncertainty about inflation prospects or the outlook for the economy and public finances) those offsetting factors could be absent or could even exacerbate the direct effect of higher debt interest spending. Yields on UK government bonds have typically been very closely correlated with those on US government bonds, so it would also be possible for developments in the US economy and markets to cause gilt yields to rise, which might also be associated with smaller offsetting effects on UK borrowing.

What would be the effect on the fiscal position of a sudden increase in interest rates?

Debt interest payments are very sensitive to changes in market interest rates, inflation and borrowing. Alongside each *EFO*, we publish a table of debt interest ready reckoners on our website that quantifies these sensitivities. Table D contains the ready reckoners consistent with this forecast. The overall effect on net borrowing would, as described above, depend on what had driven any change to these determinants of the forecast. Looking just at the direct effect on debt interest spending, the table shows that:

- the effect of a persistent increase in **conventional gilt rates** would build only gradually over time, as higher rates only apply to new debt issuance, and UK conventional gilts have a relatively long average maturity;
- higher **short-term interest rates** would quickly lead to higher debt interest costs, through the APF holdings and as short-term debt rolls over;
- an increase in **RPI inflation** would also have an immediate impact, as it increases accrued payments on both old and new index-linked debt. The table shows the consequences of a succession of shocks to annual inflation, with the higher impact over time mainly reflecting a rising stock of gilts; and
- assuming interest rates were to remain unchanged, an increase in the **central government net cash requirement** would have a more modest effect over the forecast period.

Table D: Debt interest ready reckoner

	£ billion				
	Forecast				
	2016-17	2017-18	2018-19	2019-20	2020-21
1 per cent increase in gilt rates	0.5	1.4	2.2	3.0	3.8
1 per cent increase in short rates	4.9	4.9	4.9	4.9	4.9
1 per cent increase in inflation	3.6	4.2	4.7	5.4	5.7
£5bn increase in CGNCR	0.0	0.1	0.3	0.4	0.5

Note: all increases are assumed to take effect at the beginning of 2016-17 and continue throughout the forecast.

Other AME spending

4.142 Our forecasts of **BBC** spending and licence fee income are little changed since November. Further detail can be found in the supplementary fiscal tables on our website.

4.143 Our RDEL forecast includes spending on **research & development (R&D)**, but this is classified in the National Accounts as capital spending. In order to move this spending from current to capital in our forecast, current AME includes a negative R&D accounting adjustment and capital AME includes an offsetting positive entry. Our latest forecast includes revisions to 2015-16 that reflect the latest in-year departmental outturn data. Spending from 2016-17 onwards is assumed to grow in line with RDEL, so reflects movements in the 2015-16 baseline as well as the changes the Government has made to RDEL totals in this forecast.

4.144 **Other PSCE in departmental AME** is little changed. The movement in **other PSGI items in departmental AME** is largely explained by three factors (all treated as capital grants):[20]

- spending attributable to the bonus shares element that will be part of the forthcoming **Lloyds retail share offering** (see paragraph 4.159 has been pushed back a year due to the delayed sale;
- we have revised down our forecast for payments on the **Help to Buy ISA** by between £0.1 billion and £0.4 billion due to the effect of lower interest rates and a methodological change to capture the effect of rising house prices on the proportion of first-time buyer property transactions that will be below the scheme caps (which are fixed in cash terms); and
- the Budget announcement of a **lifetime ISA.** This introduces an individual savings account (ISA) that individuals can save into and receive a 25 per cent contribution match from the Government. There is an option to withdraw the full amount for first-time homebuyers, but individuals cannot use this ISA in combination with the Help to Buy ISA. We expect this measure to cost £0.8 billion by 2019-20.

4.145 **Environmental levies** include spending on DECC levy-funded policies such as the renewables obligation, feed-in tariffs and the warm homes discount. Most are neutral for borrowing as they are directly offset by receipts. These forecasts and the downward revision since November are explained in the receipts section.

4.146 **VAT refunds** expenditure is neutral for borrowing, as it is directly offset within receipts. The upward revisions to the forecast are also explained in the receipts section.

4.147 Our forecast for **HMRC tax litigation** spending is unchanged on average over the forecast period. There has been a slight change to the profile, as the £0.2 billion of spending that we forecast for 2015-16 in November has now been delayed a year, increasing 2016-17 spending by that amount in this forecast.

[20] The spending in these categories is detailed in the supplementary fiscal tables on our website.

4.148 Our forecast for **Network Rail** spending has been revised by only small amounts over the whole forecast period, with current spending down by £0.2 billion and with around £1 billion of capital spending pushed back from 2015-16 and 2016-17 into 2017-18 and 2018-19.

4.149 The AME forecast includes other **National Accounts adjustments**, which are included in the definitions for PSCE and PSGI. Revisions to current National Accounts adjustments reflect broadly offsetting revisions to a number of local authority current accounting adjustments. The revision to capital National Accounts adjustments in 2014-15 reflects improved alignment of the residual adjustment between our estimated sum of the detailed components of spending and the latest outturns for PSGI published by the ONS. The revision in 2015-16 largely reflects a £0.6 billion upward revision to local authority financial transactions, which are removed from central government spending totals (thus reducing spending – this offsets an increase in capital LASFE, noted above). Revisions in later years mostly reflect downward revisions to our forecast for an adjustment to reflect ONS outturn data for local authorities' receipts of capital grants from the private sector (thus increasing spending). Further details of our forecasts for all the other National Accounts adjustments are included in the supplementary tables on our website. Explanations and the background to National Accounts adjustments are given in Annex D to PESA 2015.[21]

Loans and other financial transactions

4.150 Public sector net borrowing (PSNB) is the difference between total public sector receipts and expenditure each year, measured on an accrued basis. But the public sector's fiscal position also depends on the flow of financial transactions, such as loans and repayments between government and the private sector, and the sale of financial assets to the private sector. These do not directly affect PSNB, but they do lead to changes in the Government's cash flow position and stock of debt.

4.151 The public sector net cash requirement (PSNCR) is the widest measure of the public sector's cash flow position in each year.[22] It drives our forecast of public sector net debt (PSND), which is largely a cash measure. Estimating the PSNCR also allows us to estimate the central government net cash requirement (CGNCR), which in turn largely determines the Government's financing requirement – the amount it needs to raise from instruments including treasury bills, gilt issues and NS&I products.

4.152 Differences between the PSNCR and PSNB can be split into the following categories:

- **loans and repayments**: loans that the public sector makes to the private sector do not directly affect PSNB, but the cash flows affect the PSNCR;

- **transactions in other financial assets**: the public sector may buy or sell financial assets, such as corporate bonds or equities. When it sells an asset for cash the initial

[21] See HM Treasury, July 2015, *Public Expenditure Statistical Analyses 2015*.
[22] Consistent with the measures of debt and deficit used in this forecast, PSNCR excludes the public sector banks.

transaction does not affect PSNB, whereas the cash received will reduce the PSNCR. But both PSNB and the PSNCR will be higher in future years if the government foregoes an income stream that flowed from the asset sold;

- accruals adjustments: PSNB is an accruals measure of borrowing in which, where possible, spending and receipts are attributed to the year of the activity to which they relate. In contrast, PSNCR is a cash measure in which spending and receipts are attributed to the year in which the cash flow takes place. These timing differences need to be adjusted for;

- UK Asset Resolution: we separately identify transactions relating to UKAR holdings, including asset sales and the natural rundown of loan books that the Government acquired during the late 2000s financial crisis; and

- other factors affecting the central government net cash requirement: these include Network Rail and some other adjustments that do not fall into the categories above.

Table 4.30: Reconciliation of PSNB and PSNCR

	£ billion					
	Forecast					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Public sector net borrowing	**72.2**	**55.5**	**38.8**	**21.4**	**-10.4**	**-11.0**
Loans and repayments	**14.4**	**18.6**	**20.8**	**21.8**	**21.6**	**21.7**
of which:						
Student loans[1,2]	11.1	12.7	14.7	16.8	18.4	19.5
DFID	0.0	0.8	1.2	0.8	1.0	1.2
Green Investment Bank	0.4	0.6	0.2	0.2	0.1	0.0
Business Bank/Partnership	0.4	0.3	0.3	-0.1	0.0	0.0
Help to Buy	1.5	1.5	1.5	1.4	1.3	1.2
UK Export Finance	0.1	0.4	0.8	1.0	0.9	0.0
Ireland	0.0	0.0	0.0	0.0	-1.6	-1.6
Other lending	1.3	3.1	2.9	2.7	2.5	2.5
Allowance for shortfall	-0.3	-0.8	-0.8	-1.0	-1.0	-1.0
Transactions in financial assets	**-13.7**	**-11.7**	**-7.9**	**-7.9**	**-7.8**	**-2.4**
of which:						
Student loan book	0.0	-2.4	-2.4	-2.4	-2.4	-2.4
Royal Mail pension asset disposal	-0.5	-0.3	-0.2	-0.1	-0.1	-0.1
Lloyds Banking Group share sales	-7.4	-3.6	0.0	0.0	0.0	0.0
Royal Bank of Scotland share sales	-2.1	-5.4	-5.4	-5.4	-5.3	0.0
Other	-3.6	-0.1	0.0	0.0	0.0	0.0
Accruals adjustments	**8.0**	**10.1**	**2.8**	**-4.1**	**-2.3**	**7.1**
of which:						
Student loan interest[1,2]	1.9	2.1	2.8	3.9	5.3	6.5
PAYE income tax and NICs	2.2	2.0	2.0	1.6	1.9	2.2
Indirect taxes	1.6	1.3	0.9	1.0	1.0	0.8
Other receipts	2.4	2.5	2.5	2.7	2.8	2.7
Index-linked gilts[3]	-4.5	1.5	-7.2	-14.6	-13.9	-5.5
All gilts	3.3	3.4	4.6	4.2	3.7	3.5
Other expenditure	1.1	-2.6	-2.8	-2.8	-3.0	-3.2
Other factors	**-18.6**	**-14.4**	**-14.0**	**-1.1**	**-1.3**	**-0.8**
of which:						
UKAR alignment and asset sales	-18.6	-14.3	-13.3	-1.3	-1.3	-1.1
Network Rail	0.8	0.8	0.1	1.0	0.8	1.1
Alignment adjustment	-1.1	-1.1	-1.1	-1.1	-1.1	-1.1
Public sector net cash requirement	**62.3**	**58.1**	**40.5**	**30.1**	**-0.3**	**14.6**

[1] The table shows the net flow of student loans and repayments. This can be split out as follows:

Cash spending on new loans	13.2	15.2	17.3	19.5	21.3	22.7
Cash repayments	2.1	2.5	2.6	2.6	2.9	3.2

[2] Cash payments of interest on student loans are included within 'Loans and repayments' as we cannot easily separate them from repayments of principal. To prevent double counting the 'Student loan interest' timing effect therefore simply removes accrued interest.

[3] This reconciliation to the net cash requirement does not affect public sector net debt.

Table 4.31: Changes in the reconciliation of PSNB and PSNCR

	£ billion					
	Forecast					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Public sector net borrowing	**-1.3**	**5.5**	**14.0**	**16.8**	**-0.3**	**3.7**
Loans and repayments	**-1.6**	**0.3**	**0.6**	**1.4**	**-0.8**	**-1.2**
of which:						
Student loans[1,2]	-0.1	-0.1	-0.1	0.0	-0.3	-0.1
DFID[3]	-	-	-	-	-	-
Green Investment Bank[3]	-	-	-	-	-	-
Business Bank/Partnership[3]	-	-	-	-	-	-
Help to Buy[3]	-	-	-	-	-	-
UK Export Finance[3]	-	-	-	-	-	-
Ireland	0.0	0.0	0.0	0.4	-1.6	-1.6
Other lending [3]	-	-	-	-	-	-
Allowance for shortfall	-0.3	0.0	0.0	0.0	0.0	0.0
Transactions in financial assets	**3.6**	**-2.0**	**0.5**	**0.5**	**0.4**	**5.8**
of which:						
Student loan book	0.0	-0.1	-0.1	-0.1	-0.1	-0.1
Royal Mail pension asset disposal	0.0	0.2	0.2	0.2	0.0	0.1
Lloyds Banking Group share sales	4.7	-3.6	0.0	0.0	0.0	0.0
Royal Bank of Scotland share sales	0.0	0.4	0.4	0.4	0.5	5.8
Other	-1.1	1.1	0.0	0.0	0.0	0.0
Accruals adjustments	**0.8**	**2.7**	**0.7**	**-1.4**	**0.3**	**0.0**
of which:						
Student loan interest[1,2]	0.0	-0.1	-0.4	-0.4	-0.1	0.0
PAYE income tax and NICs	0.5	0.5	0.0	-0.4	0.0	0.0
Indirect taxes	-0.2	0.1	0.0	0.1	0.0	-0.1
Other receipts	0.0	0.1	0.0	0.1	0.2	0.0
Index-linked gilts[3]	0.6	2.0	1.1	-0.9	0.1	0.0
All gilts	-0.2	0.0	0.0	0.0	0.1	0.1
Other expenditure	0.0	0.1	-0.1	0.0	0.0	0.0
Other factors	**-0.2**	**-8.3**	**-8.6**	**4.1**	**3.1**	**1.2**
of which:						
UKAR alignment and asset sales	-0.7	-8.8	-8.2	3.8	3.2	0.9
Network Rail	0.2	0.2	-0.7	0.0	-0.4	0.0
Alignment adjustment	0.3	0.3	0.3	0.3	0.3	0.3
Public sector net cash requirement	**1.3**	**-1.7**	**7.2**	**21.4**	**2.6**	**9.4**

[1] The table shows the net flow of student loans and repayments. This can be split out as follows:

Cash spending on new loans	-0.2	-0.2	-0.3	-0.3	-0.2	-0.2
Cash repayments	0.0	-0.1	-0.2	-0.3	0.0	-0.1

[2] Cash payments of interest on student loans are included within 'Loans and repayments' as we cannot easily separate them from repayments of principal. To prevent double counting the 'Student loan interest' timing effect therefore simply removes accrued interest.

[3] In November, we were not provided with individual forecasts but only for total lending as the Spending Review was completed.

Loans and repayments

Student loans

4.153 Net lending by the public sector to the private sector, in particular for student loans, raises the net cash requirement relative to net borrowing in each year of our forecast. The recent student loan reforms have increased the size of the upfront loans, with repayments being made over a longer period. In our 2015 *Fiscal sustainability report*, on the policy settings that were current at the time, we estimated that student loans would increase PSND by 8.8 per cent of GDP by the late 2030s before falling to 8.0 per cent of GDP in 2064-65.

4.154 We have made small revisions to our forecast for student numbers in England. Our estimate for 2015-16 is unchanged, but beyond that we have made small upward revisions, as the latest UCAS data show slightly higher acceptance and application rates, which more than offset lower population growth than we expected in November. Details of our student numbers forecast are available in a supplementary fiscal table on our website.

4.155 All else equal, higher student numbers would translate into higher spending, but we have revised down our forecast for student loan outlays due to the bigger effect of lower RPI inflation than assumed in November. We have revised our repayment forecast down slightly due to lower earnings growth and a lower Bank Rate assumption than in November.

4.156 The Government has announced the establishment of doctoral income contingent loans that will provide a new loan of £25,000 to eligible students who enrol in any doctoral programme at eligible UK institutions from academic year 2018-19. This is expected to increase outlays by £0.3 billion by 2020-21, but to have no effects on repayments within the forecast horizon. The Government has also decided to extend the availability of the Master's loan further to include 3 year part-time Master's courses. This policy increases outlays of about £30 million by 2020-21. Our forecast also takes account of the changes to higher education funding and student support announced in November. Those include:

- **freeze of the repayment threshold** at £21,000 for five years from 2016-17 for post-2012 student loans;
- **converting maintenance grants into loans** for students in certain health-related courses; and
- **other changes** that expand the number of student eligible for loans from government.

Other lending

4.157 Other lending covers a range of Government schemes. In order to inform our estimate for the current year, we ask the Government to provide us with details of the planned lending by each institution or scheme. In light of new information provided by the Treasury, we have included a £0.3 billion under-lending assumption in 2015-16 to reflect the fact that the latest in-year plans appear slightly optimistic when compared with available outturn data. This forecast includes the 2015-16 final repayment of £0.7 billion to the Financial Services

Compensation Scheme (FSCS), completing recovery of the cost of compensating UK Icesave depositors in 2008.

4.158 For 2016-17 onwards, the Government has now provided us with an estimate of the planned lending by each institution or scheme, having provided only totals in November as the Spending Review was completed. That has allowed us to scrutinise the figures in greater detail. Table 4.30 splits out the major lending schemes, but we are not able to report changes since November in Table 4.31. One change since November that can be quantified relates to the size and timing of repayments on the loan to Ireland, aligning our forecast to the latest agreement, which reduces our lending forecast by £1.6 billion in both 2019-20 and 2020-21.

Transactions in other financial assets

4.159 We only include the impact of financial asset sales and purchases in our forecasts when firm details are available that allow the effects to be quantified with reasonable accuracy and allocated to a specific year. There are a number of asset sales that currently meet these criteria. The scale of these sales is illustrated in the top panel of Chart 4.11, while the extent to which our forecast has changed is shown in the bottom panel. Our latest forecast and changes since November reflect:

- in Autumn Statement 2013, the Government announced its plan to sell part of the **student loan book**, which it expected would raise around £12 billion over five years from 2015-16. In November, the Treasury informed us that they expected the first loan sale in 2016-17, one year later than originally thought. And they have confirmed for this forecast that that remains the case. We continue to believe that this is a central assumption, although last year's delay shows that it remains uncertain. Selling the loan book changes the years in which payments are received by government, with more recorded upfront as sales proceeds, but less in future years, because future loan repayments will flow to the private sector rather than the Exchequer;

- as in November, we have made a neutral assumption that loan book sales will be evenly spread across the five years, starting in 2016-17. The total proceeds have been revised up by £0.5 billion because we have now aligned the accounting treatment for repayments, interest and write-offs to the way in which we expect them to be treated in the National Accounts. This is largely a timing effect, since the information on which the sales will take place will be based on the last known balances, but after that point the Government will have received repayments and interest, and carried out write-offs, that will in effect have been on behalf of the buyer. Those effects were not captured in our previous forecasts. The sale of the loan book is expected to reduce the flow of repayments to the Exchequer by around £1.5 billion by 2020-21;

- our forecast in November included the Government's planned sales of £12.1 billion of **Lloyds Banking Group** shares in 2015-16. We have revised that down to £7.4 billion, reflecting the total proceeds in the year-to-date. On 28 January, the Chancellor announced that the remaining sales of Lloyds shares in 2015-16 would be delayed

due to turbulence in financial markets. The Budget confirms that the Government remains committed to selling its remaining stake in Lloyds during 2016-17, including via a retail offer that will include some gift elements. Based on the share price assumption underpinning our forecast (the 10-day average to 25 February), we expect Lloyds share sales to raise £3.6 billion in 2016-17;

- our November forecast incorporated the Government's commitment to sell over £25 billion of **Royal Bank of Scotland (RBS)** shares over the course of this Parliament (announced in July) and a further £5.8 billion in 2020-21 (announced in November). The sharp fall in the RBS share price since then means we expect sales of RBS shares to raise considerably less in this forecast. The Budget confirms that the Government will continue to seek further opportunities to dispose of its holding in RBS, following the August 2015 sale that raised £2.1 billion. But, based on the share price assumption underpinning this forecast, we expect proceeds to total £21.5 billion between 2016-17 and 2019-20, with nothing in 2020-21. This forecast will remain sensitive to movements in the RBS share price and decisions about the specific timing of sales;

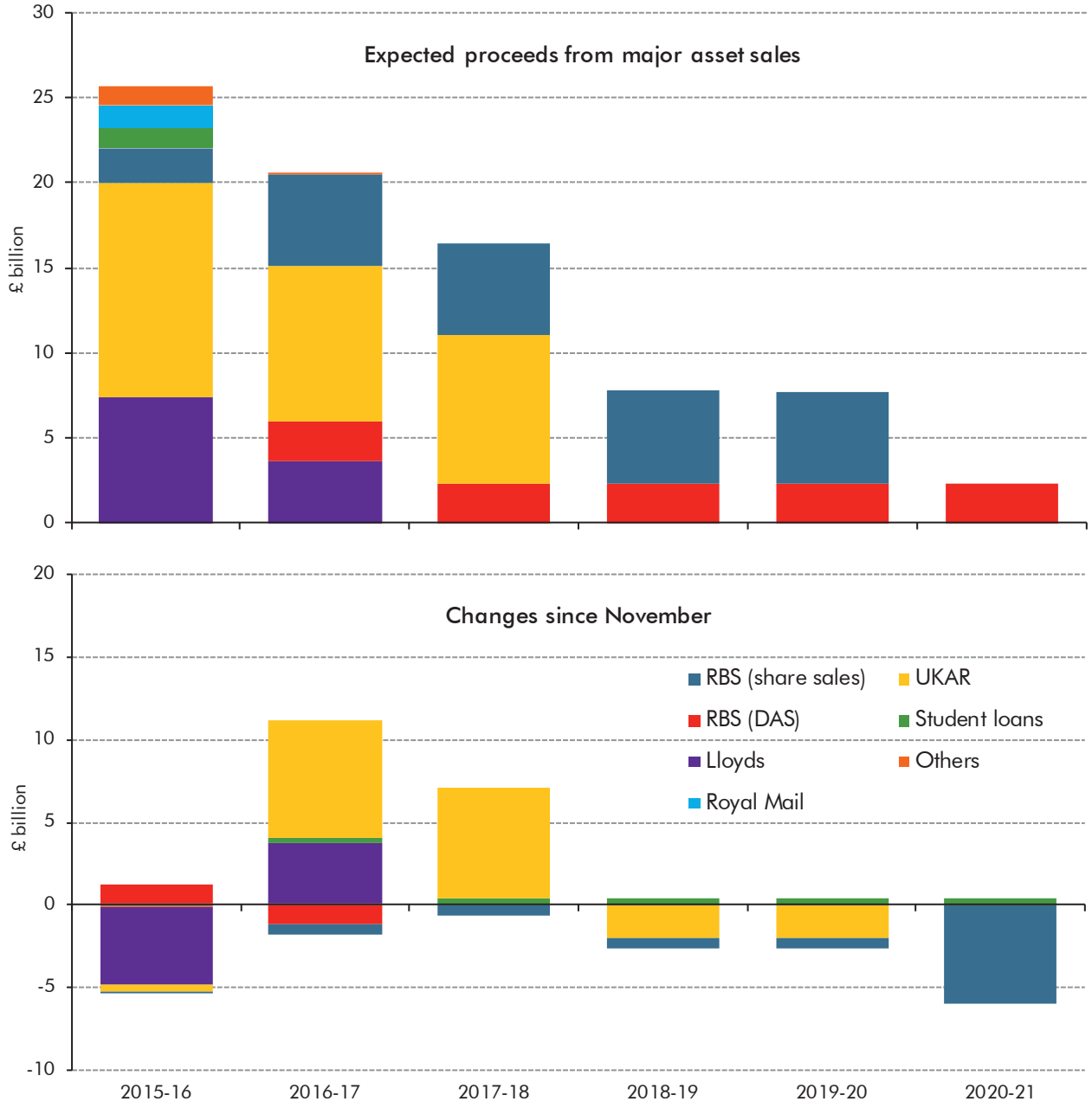
- we have revised the expected timing of when the Government will receive the remaining payment from RBS of about £1.2 billion to retire the **dividend access share** (DAS). It is now expected in 2015-16, consistent with the announcement made by RBS in its February 2016 results, rather than 2016-17, subject to regulatory approval; and

- a further significant sale of **UK Asset Resolution's** (UKAR) assets, in addition to the natural rundown of the loan book. These are discussed in the UKAR section below.

4.160 The Government has confirmed that it still intends to include a gift element to the Lloyds retail share offering in 2016-17 – allocating bonus shares to small investors and assuming that shares will be sold at a small discount to the prevailing market price. We estimate that will add £0.1 billion to public spending in 2016-17 and £0.2 billion in 2017-18, as the gift element is treated as a capital grant to the private sector in the National Accounts.

4.161 We expect the proceeds of these major asset sales to total £25½ billion in 2015-16 (all of which has been completed). A further £52 billion is expected over the remainder of this Parliament to 2019-20, and £2½ billion in 2020-21. Relative to our November forecast, we expect the Government to receive about £4 billion less in 2015-16, reflecting the net effect of the postponed Lloyds share sales and the earlier receipt of the RBS DAS payment. We then forecast that the Government will receive about £11 billion more over the rest of the Parliament, with the additional UKAR sale more than offsetting the effect of the lower RBS share price.

Chart 4.11: Proceeds from major asset sales and changes since November



Source: HMT, OBR

Accruals adjustments

4.162 To move from PSNB to PSNCR, it is necessary to adjust for the expected impact of timing differences between cash flows and accruals. For example, if receipts are forecast to rise over time, the cash received each year will generally be lower than the accrued receipts.

4.163 A large component of the receipts timing adjustment relates to the interest on student loans. This is included in the accrued measure of public sector current receipts as soon as the loan is issued, but cash repayments are not received until the point at which former students earn sufficient income. This part of the forecast is lower than in November, reflecting the effects

of lower Bank Rate and RPI inflation on the interest rate applied to these loans. Our forecast includes student interest payments related to Scotland, Wales and Northern Ireland.

4.164 Similar timing adjustments are made for expenditure. The largest is for the timing of payments on index-linked gilts. This is very sensitive to RPI inflation, as well as to the uneven profile of redemptions from year to year. Positive RPI inflation raises the amount the government will have to pay on index-linked gilts when they are redeemed. This commitment is recognised in PSNB as debt interest payments each year, but the actual cash payments do not occur until redemption, which may be many years in the future. Since November, the downward revision to RPI inflation, especially in the first half of the forecast, has reduced accrued debt interest, with a largely offsetting change in the accrual adjustment.

4.165 Since our last forecast, HMRC has made significant interim payments in relation to tax litigation cases. These payments do not necessarily affect accrued spending immediately. These interim payments have been recorded in the public finances as financial transactions, while any associated spending will only be recorded when the relevant court proceedings have been finalised. We have therefore include accruals adjustments associated with all tax litigation payments so far in 2015-16 equal to £1.5 billion.

UK Asset Resolution

4.166 The rundown of UKAR's Bradford & Bingley and NRAM plc (B&B and NRAM) loan books directly reduces the net cash requirement, in addition to those loans generating net interest that also reduces net borrowing. As well as this rundown, our November forecast reflected the £13 billion sale of the Granite securitisation vehicle and some related assets, the vast majority of which was paid in 2015-16 with the remainder (about £0.5 billion) expected early in 2016-17. In November, the Government announced that UKAR will undertake further asset sales totalling £7.5 billion over the course of this Parliament to 2019-20.

4.167 In this Budget, the Government has announced that it expects UKAR to begin a major sale programme of Bradford & Bingley mortgages. We have assumed that this will raise sufficient proceeds for B&B to repay its £15.7 billion liability to the FSCS, and for the FSCS to repay its corresponding loan from the Treasury. The Government expects the proceeds from this programme of sales to be delivered in 2016-17 and 2017-18, and to have concluded in full by the end of 2017-18. We consider the information that the Government has provided us in relation to this announcement to be sufficiently firm for the effect to be included in our forecast and have assumed that the gross proceeds will be spread evenly across 2016-17 and 2017-18. As with any major asset sale, it is subject to uncertainty. We have assumed that there will be sufficient private-sector demand for the sale to take place and at a sufficiently attractive price for the transaction to go ahead. There will be effects from foregone mortgage repayments associated with the sale. These reduce interest receipts (affecting both PSNB and PSND) and principal repayments (affecting only PSND).

Central government net cash requirement

4.168 The central government net cash requirement (CGNCR) is the main determinant of government's net financing requirement. Table 4.32 reconciles CGNCR with PSNCR and Table 4.33 sets out the changes in this reconciliation since November. The CGNCR is derived by adding or removing transactions associated with local authorities and public corporations to the PSNCR.

4.169 Cash flows are usually more volatile than the underlying accrued position of the public finances, and reconciling borrowing and estimating the net cash requirement has recently proved difficult. The net cash requirement has come in lower than the bottom-up receipts, expenditure and financial transactions forecasts we use to project it would suggest.[23]

4.170 In November, we included a £1.4 billion a year 'alignment adjustment' for factors that we expected to persist. Since November, the Treasury and ONS have continued their work on reconciling PSNB and PSNCR. This has uncovered a number of additional small receipts lines that were affecting PSNCR but not PSNB. They amount to around £0.3 billion a year and have now been added to our receipts and spending forecasts (where some score as negative spending). We have therefore subtracted £0.3 billion a year from the alignment adjustment we make between the PSNB and PSNCR forecasts.

4.171 The classification of B&B and NRAM plc and Network Rail in the central government sector means that the CGNCR is no longer simply a measure of the cash required by the Exchequer to fund its operations, which forms the basis for the Government's net financing requirement.[24] This has three effects:

- the **banks' own cash requirements are included in the headline CGNCR**. Running down the banks' loan books (including through asset sales) reduces the CGNCR by almost £18.6 billion in 2015-16, falling to around £1 billion by 2020-21, but this does not directly affect the Exchequer (this forecast is shown towards the bottom of Table 4.32);

- **interactions between the Exchequer and these bodies net off** within the headline measure. The banks' loan repayments to the Exchequer vary from around £1 billion to £6 billion a year; and

- the Treasury will finance **Network Rail**'s new and maturing debt in future, for which Network Rail will pay a fee. Refinancing needs are projected at £3 billion in 2015-16, but decline over time.

[23] In See Box 4.3 of our July 2015 *EFO* for a discussion of a number of changes we had made to our forecast as we explored the reasons for this discrepancy.
[24] The Government is publishing a revised financing remit for 2015-16 and 2016-17 alongside the Budget. The OBR provides the Government with the forecast of the CGNCR for this purpose, but plays no further role in the derivation of the net financing requirement.

Table 4.32: Reconciliation of PSNCR and CGNCR

	£ billion					
	Forecast					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Public sector net cash requirement (NCR)	**62**	**58**	**40**	**30**	**0**	**15**
of which:						
Local authorities and public corporations NCR	3	3	1	-1	-3	-1
Central government (CG) NCR own account	59	55	40	31	3	16
CGNCR own account	59	55	40	31	3	16
Net lending within the public sector	1	1	1	1	1	1
CG net cash requirement	**60**	**56**	**41**	**32**	**3**	**17**
B&B and NRAM adjustment	13	4	0	0	1	1
Network Rail adjustment	3	2	1	1	-1	0
CGNCR ex. B&B, NRAM and Network Rail	**76**	**62**	**41**	**32**	**3**	**17**

Table 4.33: Changes in the reconciliation of PSNCR and CGNCR

	£ billion					
	Forecast					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Public sector net cash requirement (NCR)	**1**	**-2**	**7**	**21**	**3**	**9**
of which:						
Local authorities and public corporations NCR	1	1	0	0	-1	-1
Central government (CG) NCR own account	0	-3	7	21	3	10
CGNCR own account	0	-3	7	21	3	10
Net lending within the public sector	-2	-1	-1	-1	-1	-1
CG net cash requirement	**-2**	**-3**	**7**	**21**	**3**	**10**
B&B and NRAM adjustment	2	2	2	-2	0	0
Network Rail adjustment	0	0	0	0	0	0
CGNCR ex. B&B, NRAM and Network Rail	**0**	**-2**	**9**	**19**	**3**	**10**

Key fiscal aggregates

4.172 Our central forecast for the key fiscal aggregates incorporates the forecast for receipts, expenditure and financial transactions set out earlier in this chapter. In this section we explain the changes in five key fiscal aggregates:

- **public sector net borrowing:** the difference between total public sector receipts and expenditure on an accrued basis each year. As the widest measure of borrowing, PSNB is a key indicator of the fiscal position. We focus on it when explaining the reasons for changes since the previous forecast. It is the target measure for the Government's fiscal mandate;

- **cyclically adjusted net borrowing:** public sector net borrowing adjusted to reflect the estimated impact of fluctuations in the economic cycle. It represents an estimate of underlying or 'structural' net borrowing, in other words borrowing we would expect to see if the output gap was zero;

- the **current budget deficit**: the difference between receipts and public sector current expenditure each year. In effect, this is public sector net borrowing excluding borrowing to finance investment;

- the **cyclically adjusted current budget deficit**: the current budget adjusted to reflect the estimated impact of fluctuations in the economic cycle. It was the target measure for the Coalition Government's fiscal mandate in the last Parliament; and

- **public sector net debt**: a stock measure of the public sector's net liability position defined as its gross liabilities minus its liquid assets. In broad terms, it is the stock equivalent of public sector net borrowing, measured on a cash basis rather than an accrued basis. It is used for the Government's supplementary fiscal target (and was also targeted by the Coalition Government in the last Parliament).

4.173 In our November forecast, we anticipated the effect on these fiscal aggregates of the ONS decision to reclassify housing associations to the public sector.[25] In February, the ONS implemented that reclassification decision in the official statistics. All forecasts and changes since November discussed in this section are therefore presented on that basis.

Public sector net borrowing

Expected borrowing in 2015-16

4.174 We expect borrowing to fall to £72.2 billion this year, down £19.7 billion or 21.4 per from 2014-15. That is a bigger drop than would be implied by the data for the first 10 months of the year, which showed borrowing down £10.6 billion or 13.7 per cent on 2014-15. So it is not surprising that outside analysts tend to have higher forecasts.

[25] Strictly speaking, it is 'private registered providers' of social housing in England that have been reclassified. These include most housing associations as well as some for-profit housing bodies. We refer to 'housing associations' for simplicity.

4.175 We have revised down our receipts forecast since November (although it still implies stronger year-on-year growth in the final two months of the year than in the first ten). But this has been more than offset by downward revisions to spending.

4.176 As ever, it is important to stress the uncertainty that remains around in-year borrowing, even at this late stage in the year. It is also important to remember that we are forecasting the level at which the budget deficit will settle when all the relevant data have been gathered over the coming months. History suggests that this will not be the level initially reported by the ONS when it publishes its first estimate next month. This will necessarily be based on provisional data that will be revised as final outturn data are received.

4.177 The main factors that are likely to explain the difference between our latest forecast for borrowing in 2015-16 and the gloomier outside expectations include:

- we expect stronger growth in **income tax and NICs receipts**, reflecting indications from HMRC administrative data for February. The Government's **marriage tax allowance** is also costing less than expected, thanks to IT problems for many people trying to claim it and a combination of lack of awareness and reluctance to attract the attention of HMRC among other potential recipients. That more than offsets the lower yield from the introduction of **Class 3A voluntary NICs**, where lack of awareness has also led to much lower take-up than expected;

- we expect **stamp duty land tax** to rise by 16.5 per cent in the year to February and March combined, up from 0.3 per cent year-to-date, due largely to the timing of the 2014 reform. That pick-up remains despite a £0.5 billion downward revision to our forecast since November. We also expect **stamp duty on shares** to be boosted by a large payment made in February as a result of a recent corporate takeover;

- **VAT** is also expected to be stronger over the remaining two months, reflecting February administrative data. We also forecast stronger receipts from **environmental levies** (where we are investigating differences between DECC and the ONS estimates) and **alcohol duties** (where we expect timing effects associated with cuts in duty rates last year not to be repeated);

- a £0.7 billion downward revision to **housing associations**' net borrowing, informed by the £1.0 billion lower-than-expected ONS estimate for their borrowing in 2014-15. The latest public finances data for 2015-16 are based on our November 2015 housing associations forecast, so our new forecast will be reflected in the official data until the ONS can replace it with firm data from housing associations; and

- we have revised down spending on **EU contributions** in 2015-16 by £1.2 billion, largely due to a lower-than-expected demand from the European Commission for a contribution in March.

Forecast for borrowing from 2016-17 onwards

4.178 Table 4.34 shows how changes to our underlying forecast judgements and the Government's policy decisions have affected our forecast for public sector net borrowing:

- we have revised down our **pre-measures receipts forecast** significantly (which increases borrowing and therefore shows up as positive figures in the table). Weaker productivity growth implies weaker nominal GDP growth and this reduces growth in all the main tax bases (wages and salaries, consumer spending and corporate profits). Lower share prices have also reduced receipts from capital taxes, while lower market expectations of interest rates have reduced interest and dividend receipts. Updated modelling of stamp duty land tax has also contributed to the downward revision;

- lower market expectations of Bank Rate and gilt yields, plus downward revisions to our RPI inflation forecast, have prompted a further large downward revision to **debt interest spending**, net of the saving associated with financing part of the debt at Bank Rate through the Asset Purchase Facility (APF). This is the third time in our last four forecasts that changes in market expectations have led to a large downward revision to debt interest spending (as set out in Box 4.4 in Chapter 4). Higher interest rates clearly pose an upside risk to our spending, although recent experience shows that even at very low interest rates it is possible for them to fall further;

- our **pre-measures forecast for other AME spending** is higher every year. Welfare spending has been revised up, thanks largely to higher-than-expected caseloads and average awards as disabled people are migrated from disability living allowance to the new personal independence payment. Spending by local authorities and public corporations has also been revised up. We have made smaller downward revisions to spending on state pensions, tax credits and public service pensions;

- the **direct effect of the Government's policy decisions** has been to increase the deficit in 2017-18 and 2018-19, but then to turn our pre-policy-measures forecasts of deficits in 2019-20 and 2020-21 into surpluses. The year-on-year fiscal tightening in 2019-20 implied by this uneven profile is striking – a £18.2 billion or 0.8 per cent of GDP turnaround relative to the small giveaway in 2018-19. In part that reflects the Government's decision to delay the July Budget measure that brings forward the timing of large firms' quarterly corporation tax payments. That measure gives a one-off boost to receipts that is neither repeated nor reversed in later years. The biggest boost has been shifted from 2017-18 to the surplus target year of 2019-20; and

- the net **indirect effects** on the public finances of the Government's decisions have been relatively small. In most years, they reflect the knock-on effects of how the Government has altered the pace of fiscal tightening. In 2018-19, the effect on RPI inflation of the introduction of a soft drinks industry levy has added around £1 billion to accrued interest payments on index-linked gilts.

Table 4.34: Public sector net borrowing since November

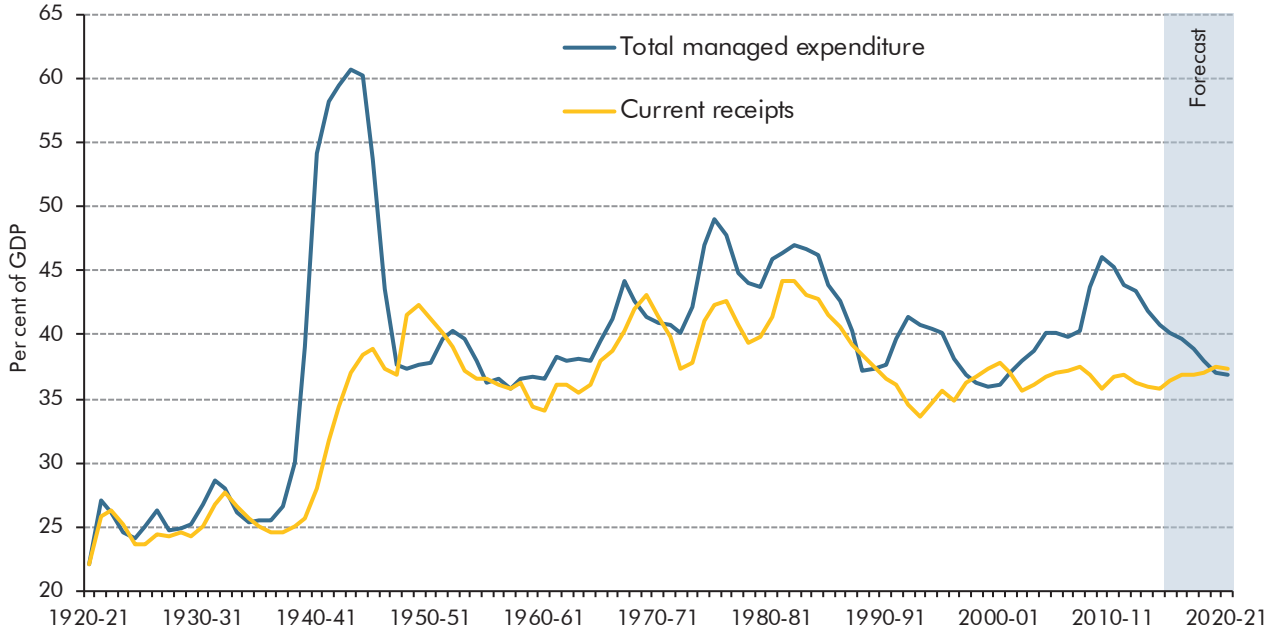
	£ billion						
	Outturn	Forecast					
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
November forecast	**94.7**	**73.5**	**49.9**	**24.8**	**4.6**	**-10.1**	**-14.7**
Total forecast changes	**-2.8**	**-1.3**	**6.6**	**7.2**	**12.3**	**13.4**	**16.7**
of which:							
Receipts	-0.5	0.4	8.2	10.5	14.0	16.3	19.5
Debt interest spending	0.0	-0.6	-3.9	-4.9	-4.8	-5.4	-5.2
Non-interest AME spending	-2.3	-1.5	1.8	1.1	2.7	2.0	2.0
Revisions to DEL spending	0.0	0.5	0.5	0.5	0.5	0.5	0.5
March forecast pre-policy decisions	**91.9**	**72.2**	**56.5**	**32.0**	**17.0**	**3.2**	**2.0**
Total effect of Government decisions		**-0.1**	**-1.0**	**6.7**	**4.5**	**-13.7**	**-13.1**
of which:							
Scorecard receipts measures		0.0	-0.6	7.0	4.3	-6.3	-0.8
Scorecard AME spending measures		0.0	-0.1	-2.1	-2.6	-4.6	-4.5
Changes to RDEL spending		0.4	0.3	1.8	1.9	-1.8	-8.1
Changes to CDEL spending		-0.4	0.1	0.7	1.1	-1.2	-0.4
Indirect effect of Government decisions		-0.1	-0.7	-0.6	-0.3	0.2	0.7
March forecast post-policy decisions	**91.9**	**72.2**	**55.5**	**38.8**	**21.4**	**-10.4**	**-11.0**
Overall change since November	**-2.8**	**-1.3**	**5.5**	**14.0**	**16.8**	**-0.3**	**3.7**

Note: This table uses the convention that a negative figure means a reduction in PSNB, i.e. an increase in receipts or a reduction in spending will have a negative effect on PSNB.

4.179 Between 2009-10 and 2019-20, the budget balance is forecast to move from a post-war record deficit of 10.3 per cent of GDP to a small surplus of 0.5 per cent – a turnaround of 10.8 per cent of GDP (£202 billion in today's terms). By 2015-16, around 60 per cent of that planned reduction – 6.4 per cent of GDP (£121 billion) – will have been completed.

4.180 Chart 4.12 shows current receipts and total managed expenditure as a share of GDP since 1920-21 using Bank of England and ONS data. Total spending falls to 36.9 per cent of GDP in by the end of the forecast period, which is the lowest since 2000-01. Current receipts as a share of GDP are forecast to peak at 37.5 per cent in 2019-20, then fall back to 37.4 per cent in 2020-21. Receipts have not been higher than 37 per cent of GDP in any year since 2007-08.

Chart 4.12: Total public sector spending and receipts



Source: Bank of England, ONS, OBR

Cyclically adjusted net borrowing (the structural fiscal position)

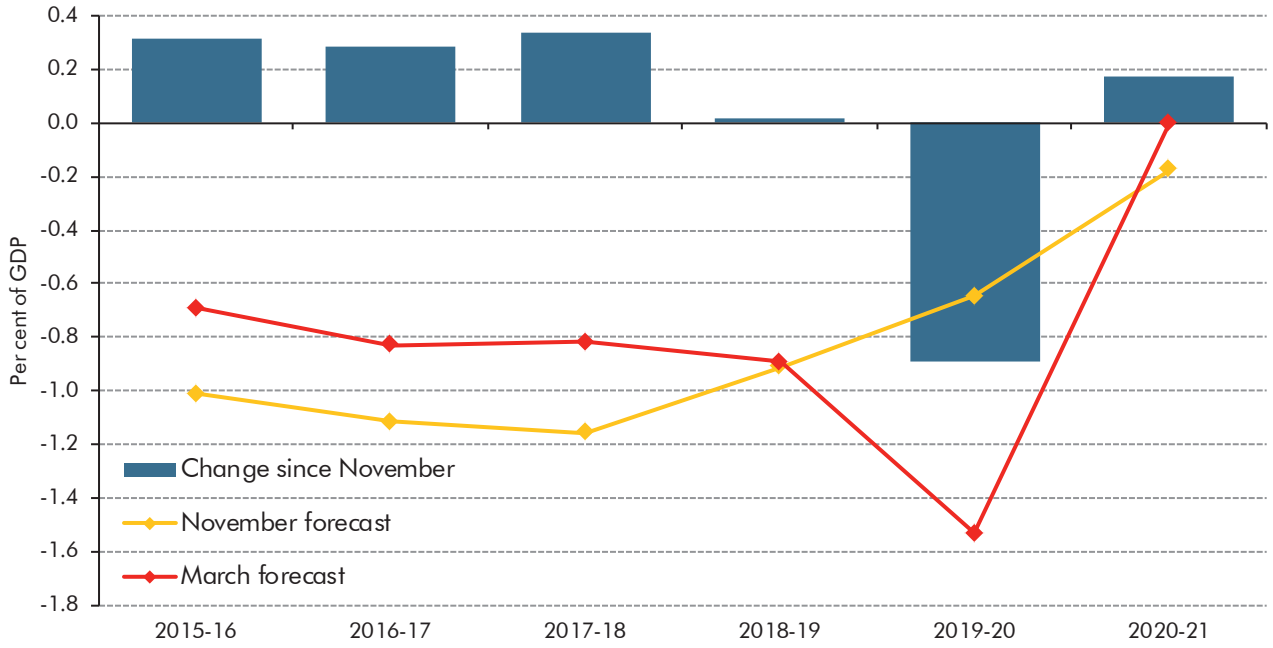
4.181 Our estimate of the margin of spare capacity in the economy is small in 2015-16 at just 0.3 per cent of potential output – slightly narrower than we estimated in November – and we expect the output gap to be very close to zero from 2016-17 onwards. This means that more of the deficit in 2015-16 is considered structural than was the case in November, but the path of structural borrowing is similar to that of headline borrowing described above.

4.182 The year-on-year change in the structural budget deficit – public sector net borrowing adjusted for the size of the output gap – is a common measure of the pace of fiscal consolidation. It has drawbacks when estimates of potential output change significantly, but is more useful when potential output growth is more stable. Chart 4.13 shows that:

- **in November's Spending Review and Autumn Statement**, the Government set a path for the structural deficit that saw the pace of tightening pick up slightly in 2016-17 and 2017-18 and then diminish year by year as the budget moved into surplus; but

- **in this Budget**, thanks to tax and spending policy changes that have uneven effects on borrowing across the forecast, the Government has charted a course that sees the pace of tightening pick up gradually up to 2018-19, then dramatically in 2019-20 (the year in which its surplus target first applies), before slowing abruptly in 2020-21. The 1.5 per cent of GDP tightening of the structural fiscal position in 2019-20 would be the sharpest since 2010-11.

Chart 4.13: Year-on-year changes in cyclically adjusted net borrowing



Source: OBR

Current budget

4.183 We estimate that the current budget deficit, which excludes borrowing to finance net investment spending, will have been £39.0 billion in 2015-16, down from a peak of £103.2 billion in 2009-10. Our latest forecast shows the current budget moving into surplus in 2018-19 (a year later than in our November forecast) and the surplus increasing thereafter to reach £53.4 billion in 2020-21.

Cyclically adjusted current budget

4.184 We expect the cyclically adjusted current budget (CACB) to move from a deficit of 1.8 per cent of GDP in 2015-16 to a surplus of 0.5 per cent in 2018-19, also a year later than in our November forecast. The surplus rises to 2.4 per cent of GDP in 2020-21.

Public sector net debt

4.185 In November we forecast that public sector net debt (PSND) would fall as a share of GDP in 2015-16 and in each subsequent year of the forecast. But despite revising down the cash level of net debt this year, we now expect it to rise as a share of GDP in 2015-16 before declining from 2016-17 onwards. This reflects revisions to the nominal GDP forecast.

4.186 PSND is now forecast to come in at 83.7 per cent of GDP this year, falling to 74.7 per cent of GDP in 2020-21. Table 4.35 shows that we have revised up the debt-to-GDP ratio by increasing amounts across the forecast period since November. That is because:

- lower **nominal GDP growth** in the near term has raised the debt-to-GDP ratio significantly. In particular, the sharp slowdown in the year to the final quarter of 2015

– up just 1.9 per cent, compared with the 3.9 per cent we forecast in November – has fed through to the denominator for the 2015-16 debt-to-GDP ratio calculation (see Box 4.1). This has pushed the ratio up significantly compared to 2014-15. From 2016-17 onwards, smaller downward revisions to our nominal GDP growth forecast, due to a lower estimate of underlying productivity growth, push the ratio up a little further;

- **cumulative borrowing** across the forecast has been revised up significantly. As described above, that reflects a large upward revision to our pre-policy-measures forecast, partly offset by the impact of the Government's policy decisions;

- the depreciation of the pound has increased the sterling value of the UK's **foreign currency reserves**, as measured in the PSND calculation.[26] In reality, the reserves are largely hedged against currency movements to reduce the Exchequer's exposure to currency risk, but Eurostat's *Manual on government deficit and debt* stipulates that derivative instruments must not be counted in EDP measures of debt (even though they are counted in the full National Accounts). The ONS follows this Eurostat guidance for its PSND calculations. The result is that the sharp drop in the value of sterling this year has raised the sterling value of the official reserves, which net off PSND. The effect was worth £6.3 billion in January alone and we estimate it will subtract £10 billion from PSND by the end of the year. This is a feature of the PSND calculation rather than a true reflection of the public sector's net worth;

- the pace at which **UK Asset Resolution's assets** are sold or run down has increased, reducing PSND. UKAR's mortgage book has been running down slightly faster than expected as its customers take advantage of lower mortgage rates currently offered by other lenders. UKAR is then planning a further large sale of mortgage assets – following last year's £13 billion sale of the Granite securitisation and other assets. That brings forward around £17½ billion of sales into 2016-17 and 2017-18, while reducing the amount of mortgages that would otherwise have run down naturally later in the forecast period. Taken together, the reduction in PSND relative to our last forecast peaks in 2017-18 then declines in subsequent years;

- lower proceeds from **other financial asset sales** across the forecast period. Sales of the Government's remaining stake in Lloyds have been pushed back from 2015-16 to 2016-17, with proceeds also lower due to the fall in the share price since November. (The Government still plans to give some shares away to retail investors, so while this sale reduces PSND it would worsen a broader measure of public sector net worth.) More significantly, the expected proceeds from RBS share sales between 2016-17 and 2020-21 have fallen by 26 per cent to £21.5 billion, more than explained by the sharp fall in the share price;

[26] The ONS has introduced a new table in its public sector finances bulletin that details how to reconcile changes in the central government net cash requirement and changes in central government net debt, of which these effects on the foreign exchange reserves are one element. Thanks to this greater transparency, we will be able to forecast its elements directly rather than treating it as an unexplained residual in the PSND calculation.

- **APF balance sheet effects** have been revised up slightly, due to the difference between the amount the Bank pays for the gilts held in the APF and their nominal value at redemption. Lower market expectations of gilt yields mean that when the APF replaces gilts that reach their redemption date the new gilts will be purchased at a greater premium to the nominal values at which they are valued for PSND. As a result, over the coming five years we expect that the APF will need to purchase gilts with a market value of £138½ billion to replace gilts of the same value that are redeemed, but that the nominal value of those gilts will be £115½ billion compared with the redeemed gilts' nominal value of £124½ billion. That £9 billion difference by 2020-21 is around £4 billion higher than assumed in November; and

- movements in expected **gilt premia** push PSND down in every year of the forecast and **other factors** are generally smaller and partly offsetting.

Table 4.35: Changes in public sector net debt since November

	Per cent of GDP						
	Outturn	Forecast					
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
November forecast	83.1	82.5	81.7	79.9	77.3	74.3	71.3
March forecast	83.3	83.7	82.6	81.3	79.9	77.2	74.7
Change	**0.2**	**1.3**	**0.9**	**1.4**	**2.6**	**2.9**	**3.4**
of which:							
Change in nominal GDP[1]	0.2	1.7	1.6	1.8	2.0	2.2	2.3
Change in cash level of net debt	0.1	-0.5	-0.7	-0.4	0.6	0.7	1.1
	£ billion						
November forecast	1546	1599	1652	1685	1702	1708	1715
March forecast	1547	1591	1638	1677	1715	1725	1740
Change in cash level of net debt	**1**	**-9**	**-14**	**-8**	**14**	**16**	**25**
of which:							
Pre-measures borrowing	0	-1	5	13	25	38	55
Policy effects on borrowing	0	0	-1	6	10	-4	-17
Foreign currency reserves	0	-10	-10	-10	-10	-11	-11
UKAR asset sales and rundown	0	-1	-9	-18	-14	-11	-10
Other financial asset sales	0	4	2	2	3	3	9
Gilt premia	0	-2	-4	-4	-6	-6	-7
APF balance sheet effects	0	0	1	1	2	3	4
Other factors	1	1	3	3	4	3	2

[1] Non-seasonally-adjusted GDP centred end-March.

Table 4.36: Fiscal aggregates

	Per cent of GDP						
	Outturn	Forecast					
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Receipts and expenditure							
Public sector current receipts (a)	35.7	36.3	36.9	36.9	37.0	37.5	37.4
Total managed expenditure (b)	40.8	40.2	39.7	38.8	38.0	37.0	36.9
of which:							
Public sector current expenditure (c)	36.8	36.3	35.7	34.9	34.3	33.4	32.9
Public sector net investment (d)	1.9	1.8	1.9	1.7	1.6	1.5	1.9
Depreciation (e)	2.1	2.1	2.1	2.1	2.1	2.1	2.1
Deficit							
Current budget deficit (c+e-a)	3.1	2.1	1.0	0.2	-0.6	-1.9	-2.3
Cyclically adjusted current budget deficit	2.4	1.8	0.9	0.2	-0.5	-2.0	-2.4
Cyclically adjusted net borrowing	4.3	3.6	2.7	1.9	1.0	-0.5	-0.5
Primary balance	-3.4	-2.2	-1.1	-0.1	0.9	2.2	2.1
Cyclically adjusted primary balance	-2.6	-1.9	-1.0	-0.1	0.8	2.3	2.1
Fiscal mandate and supplementary target							
Public sector net borrowing (b-a)	5.0	3.8	2.9	1.9	1.0	-0.5	-0.5
Public sector net debt[1]	83.3	83.7	82.6	81.3	79.9	77.2	74.7
Financing							
Central government net cash requirement	4.6	3.2	2.9	2.0	1.5	0.2	0.7
Public sector net cash requirement	4.2	3.3	3.0	2.0	1.4	0.0	0.6
Stability and Growth Pact							
Treaty deficit[2]	5.0	3.9	2.9	2.0	1.1	-0.3	-0.4
Cyclically adjusted Treaty deficit	4.2	3.6	2.7	2.0	1.1	-0.3	-0.4
Treaty debt ratio[3]	87.4	88.9	88.3	87.1	85.6	83.0	80.3
				£ billion			
Public sector net borrowing	91.9	72.2	55.5	38.8	21.4	-10.4	-11.0
Current budget deficit	57.0	39.0	19.1	3.5	-11.8	-42.6	-53.4
Cyclically adjusted net borrowing	78.1	67.0	53.3	39.0	21.8	-10.9	-11.3
Cyclically adjusted current budget deficit	43.3	33.8	17.0	3.6	-11.4	-43.0	-53.7
Public sector net debt	1547	1591	1638	1677	1715	1725	1740
Memo: Output gap (per cent of GDP)	*-0.7*	*-0.3*	*-0.1*	*0.1*	*0.0*	*0.0*	*0.0*

[1] Debt at end March; GDP centred on end March.

[2] General government net borrowing on a Maastricht basis.

[3] General government gross debt on a Maastricht basis.

Risks and uncertainties

4.187 As always, we emphasise the uncertainties that lie around our central fiscal forecast. We expose our judgements to different sensitivities and scenarios in Chapter 5. While there are some risks and uncertainties common to all forecasts, in this *EFO* we have highlighted:

- global and domestic risks associated with **the economy**, including the outlook for productivity growth in the UK, the implications of lower growth in China and uncertainty associated with the forthcoming EU referendum (paragraph 3.118);

- uncertainties associated with the **delivery of reforms to the welfare system**, particularly in relation to disability benefits (from paragraph 4.113) and universal credit (from paragraph 4.118);

- **higher interest rates** clearly pose an upside risk to our spending forecast, although recent experience shows that even at very low interest rates it is possible for them to fall further (from Box 4.4);

- ongoing uncertainties around the large **financial asset sales** that are planned to take place over this Parliament (from paragraph 4.159); and

- the Government has set out a number of **ambitions or intentions** that have not yet been confirmed as firm policy decisions, but which remain a source of risk to the forecast (paragraph 4.9).

International comparisons

4.188 International organisations, such as the European Commission and the International Monetary Fund (IMF), produce forecasts of deficit and debt levels of different countries on a comparable basis. These are based on general government debt and borrowing and are presented on a calendar year basis. To facilitate comparisons, Tables 4.37 and 4.38 present our UK forecasts on a basis that is comparable with that used by these international organisations. With both modelling and reporting of much tax and expenditure done primarily on a financial year basis, the calendar year forecasts are illustrative and have been derived by simply weighting our financial year forecasts.

Table 4.37: Comparison with European Commission forecasts

	Per cent of GDP					
	Treaty deficit[1]			Treaty debt[2]		
	2015	2016	2017	2015	2016	2017
UK (March *EFO*)	**4.4**	**3.1**	**2.2**	**89.3**	**88.6**	**87.4**
UK (EC)	4.4	3.1	2.1	88.6	89.1	88.2
Germany	-0.5	-0.1	0.0	71.6	69.2	66.8
France	3.7	3.4	3.2	96.2	96.8	97.1
Italy	2.6	2.5	1.5	132.8	132.4	130.6
Spain	4.8	3.6	2.6	100.7	101.2	100.1
Euro area	2.2	1.9	1.6	93.5	92.7	91.3

[1] General government net borrowing.

[2] General government gross debt.

Source: European Commission, *European Economic Forecast Winter 2016,* OBR

Table 4.38: Comparison with IMF forecasts

	Per cent of GDP					
	General government net borrowing			General government net debt		
	2015	2016	2020	2015	2016	2020
UK (March *EFO*)	4.4	3.1	-0.4	80.7	79.6	72.2
UK (IMF)	4.2	2.8	-0.1	80.3	79.5	69.3
Germany	-0.5	-0.3	-1.0	48.4	46.4	38.1
France	3.8	3.4	0.7	89.4	90.3	85.4
Italy	2.7	2.0	0.2	113.5	112.8	104.8
Japan	5.9	4.5	4.1	126.0	128.1	132.1
U.S	3.8	3.6	4.2	79.9	80.7	81.2

Source: IMF, *World Economic Outlook,* October 2015, OBR

5 Performance against the Government's fiscal targets

Introduction

5.1 This chapter:

- sets out the Government's **medium-term fiscal targets** (from paragraph 5.2);
- examines whether the Government has a better than 50 per cent **chance of meeting them** on current policy, given our central forecast (from paragraph 5.7); and
- assesses how robust these judgements are to the **uncertainties** inherent in any fiscal forecast, by looking at past forecast errors, sensitivity to key parameters of the forecast and alternative economic scenarios (from paragraph 5.31).

The Government's fiscal targets

5.2 The *Charter for Budget Responsibility* requires the OBR to judge whether the Government has a greater than 50 per cent chance of hitting its fiscal targets under current policy. The latest version of the *Charter* (approved by Parliament in October 2015 and available on our website) sets out two targets that are formally in place for this forecast:

- the Government's fiscal mandate requires a surplus on **public sector net borrowing** by the end of 2019-20 and in each subsequent year; and
- it is supplemented by a target for **public sector net debt** to fall as a percentage of GDP in each year to 2019-20 (after which it would continue to do so if the mandate is met).

5.3 The *Charter* states that *"These targets apply unless and until the Office for Budget Responsibility (OBR) assess, as part of their economic and fiscal forecast, that there is a significant negative shock to the UK. A significant negative shock is defined as real GDP growth of less than 1% on a rolling 4 quarter-on-4 quarter basis."* We will make this assessment in each *Economic and fiscal outlook (EFO)*, at the same time as we carry out our assessment of performance against the fiscal targets.

5.4 The current fiscal mandate replaced the Coalition Government's target of achieving cyclically adjusted current balance by the end of the third year of the forecast period. The current supplementary target requires public sector net debt as a percentage of GDP to be falling in each year rather than at a fixed date in 2016-17 as was the case previously. Both

targets were amended in the last Parliament, with the fiscal mandate initially applying to the final year of the five-year forecast period and the debt target to 2015-16.

5.5 The fiscal mandate is further supplemented by:

- a cap on a subset of **welfare spending**, at cash levels set out by the Treasury for each year from 2016-17 to 2020-21 in the July 2015 Budget.

5.6 In this chapter, we assess the Government's performance against the current targets and provide an update on how our central forecast compares with the requirements of the targets that preceded them. As we are tasked with assessing the Government's performance against the welfare cap formally only once a year alongside the Autumn Statement, we provide only an update in this *EFO*. On our central forecast, the Government is on course to meet its fiscal mandate but to miss its supplementary target. The previous fiscal mandate and supplementary target would have been met. Welfare cap spending is forecast to exceed the formal ceiling in every year, and by more than the 2 per cent forecast margin in all years. We would therefore not change our November 2015 assessment that the terms of the welfare cap have been breached.

The implications of our central forecast

5.7 Table 5.1 shows our central forecasts for the fiscal aggregates relevant to the current and previous fiscal targets: public sector net borrowing (PSNB); public sector net debt (PSND); spending subject to the welfare cap; and the cyclically adjusted current budget deficit (CACB). These forecasts are described in detail in Chapter 4. They are median forecasts, so we believe it is equally likely that outturns will come in above them as below them.

Table 5.1: Fiscal aggregates relevant to the Government's fiscal targets

	Per cent of GDP						
	Outturn	Forecast					
	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Fiscal mandate: Public sector net borrowing							
November forecast	5.2	3.9	2.5	1.2	0.2	-0.5	-0.6
March forecast	5.0	3.8	2.9	1.9	1.0	-0.5	-0.5
Supplementary target: Public sector net debt							
November forecast	83.1	82.5	81.7	79.9	77.3	74.3	71.3
March forecast	83.3	83.7	82.6	81.3	79.9	77.2	74.7
Spending subject to the welfare cap (£ billion)							
November forecast	119.3	120.9	119.2	117.7	115.9	115.3	117.1
March forecast	119.3	120.4	119.8	118.0	116.4	116.2	118.1
Previous fiscal mandate: Cyclically adjusted current budget deficit							
November forecast	2.4	1.6	0.5	-0.5	-1.2	-1.9	-2.4
March forecast	2.4	1.8	0.9	0.2	-0.5	-2.0	-2.4

The fiscal mandate

5.8 The Government's fiscal mandate requires it to achieve an overall budget surplus (in other words, that PSNB must be negative) in 2019-20 and each year thereafter. In the absence of any policy measures in this Budget, the Government would have been on course for small deficits in 2019-20 (£3.2 billion) and 2020-21 (£2.0 billion), breaching the fiscal mandate.

5.9 But the Government's Budget policy measures raise £13.7 billion in 2019-20 and £13.1 billion in 2020-21, broadly offsetting the deterioration in the underlying forecast and putting it back on course to meet the surplus target by £10.4 billion and £11.0 billion respectively. We therefore judge that the Government is more likely than not to meet its target on existing policy, but with a margin that is small in comparison with the uncertainty that surrounds our fiscal forecast at that horizon.

5.10 How has the Government maintained its surplus in 2019-20? Chart 5.1 shows that it has:

- cut its limit on **departmental current spending** by £2.3 billion (which we estimate would translate into an actual spending cut of £1.8 billion as departments underspend their budgets by less). The Government says that this £2.3 billion gross cut – together with £1.9 billion of new spending commitments in areas such as lengthening the school day, full 'academisation' of state schools and improving flood defences – will be funded from a £0.7 billion cut in overseas aid and £3.5 billion of as-yet unidentified cuts to be generated by an 'efficiency review' that will report in 2018;

- the Government has also placed an additional £2.0 billion a year squeeze on departments in that year by raising planned **public service pension contributions**, in line with a lower discount rate, but not compensating them for the additional costs they will face. This reduces borrowing by displacing other departmental spending within existing expenditure limits, while reducing net spending on public service pensions;

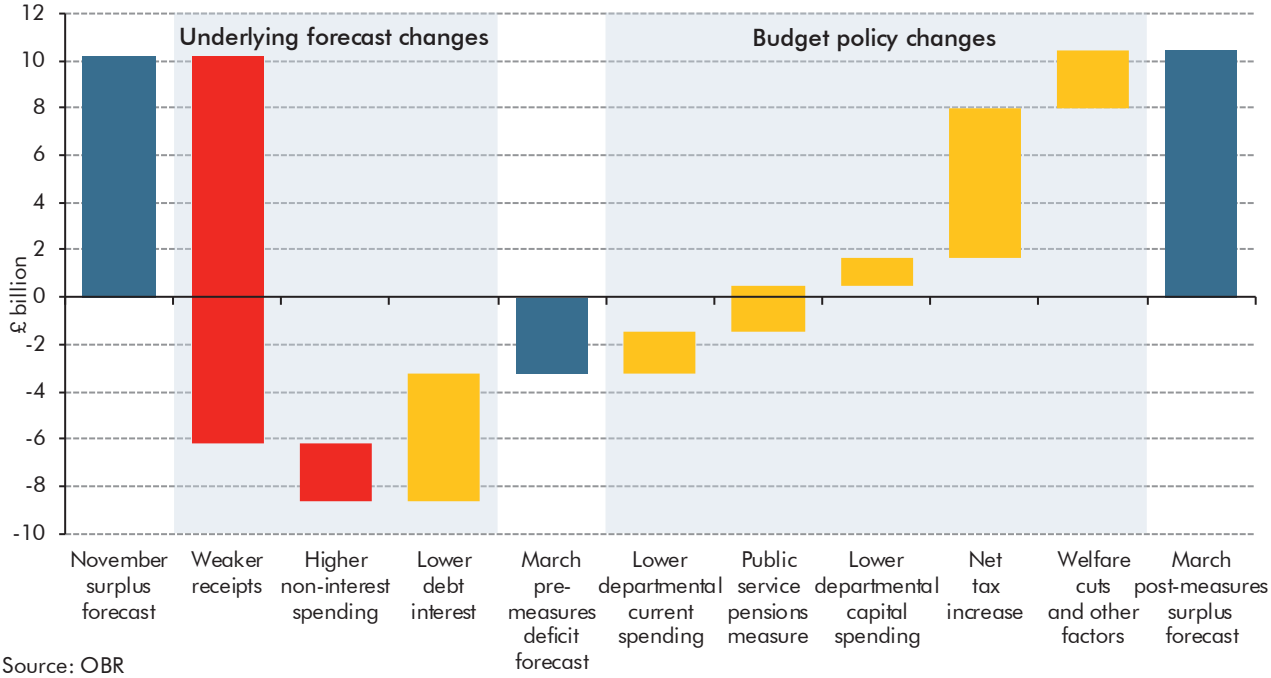
- cut its limit on **departmental capital spending** by £1.2 billion, largely by bringing £1.6 billion forward from the 2019-20 target year to 2017-18 and 2018-19, which it describes as "accelerating investment plans". We assume that £0.2 billion of the spending brought forward to 2018-19 will in reality slip back into 2019-20. There are also £0.2 billion of new spending commitments, for example to ease congestion on the M62;

- announced a net **tax increase** of £6.3 billion in 2019-20, although across the forecast as a whole Budget tax measures *reduce* receipts by £0.7 billion a year on average. All but £300 million of this increase reflects the Government's decision to delay the July Budget measure that brings forward the timing of large firms' quarterly corporation tax payments "to give businesses more time to prepare". This also boosts receipts by £3.6 billion in 2020-21 (but not at all thereafter). However, combined with an additional net cut in other (mostly business) taxes taking effect in 2020-21, this gives a much more modest overall net tax increase in that year of £0.8 billion. So the Government

needs a much bigger cut in current departmental spending in 2020-21 – £8.1 billion compared to £1.8 billion in 2019-20 – to achieve the surplus it wants; and

- cut **welfare spending** by £1.4 billion in 2019-20, largely through a further tightening of the disability benefits system. **Other factors** include a small boost to receipts from easing fiscal tightening over the next two years.

Chart 5.1: Changes to public sector net borrowing in 2019-20



Source: OBR

5.11 The budget balance is now expected to move from a deficit of 3.8 per cent of GDP this year to a surplus of 0.5 per cent in 2019-20. As Chart 5.2 illustrates, the main factors that contribute (negatively and positively) to this 4.3 per cent of GDP improvement include:

- relatively small increases in **debt interest** spending (0.2 per cent of GDP). Interest rates are assumed to rise in line with market expectations, but these remain well below historical averages by the end of the forecast period;

- a small increase in **capital spending** (0.1 per cent of GDP). As noted above, capital spending in 2019-20 has been reduced by moving some spending forward to earlier years, thereby boosting the surplus in the target year;

- a small decrease in **annually managed expenditure (AME) other than on debt interest and welfare** (0.2 per cent of GDP). The declining path we forecast for housing associations' capital spending explains much of this fall;

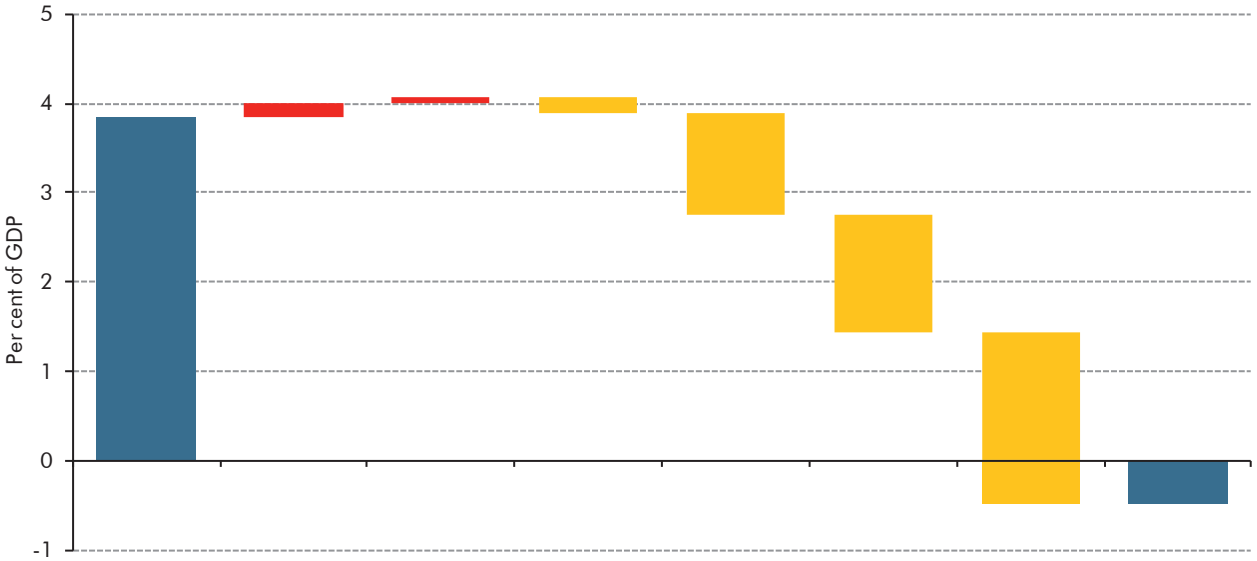
- a 1.1 per cent of GDP rise in **receipts**. This is largely explained by a rise in the tax-to-GDP ratio, as the NICs contracting out rebate is abolished in 2016-17 and as a return to (subdued) real earnings growth pulls more income into higher tax brackets over

time. In 2019-20 the tax-to-GDP ratio is increased by the one-off boost to corporation tax receipts from the quarterly instalment payments policy measure described above. Higher receipts also reflect a 0.2 per cent of GDP rise in interest and dividend receipts on the government's stock of financial assets as interest rates rise;

- a 1.3 per cent of GDP fall in **welfare spending**. This mostly reflects average awards rising more slowly than earnings. Spending subject to the welfare cap accounts for 1.1 per cent of GDP of the fall, while spending outside falls by just 0.2 per cent of GDP. State pensions continue to be uprated with the triple-lock, so – unlike most working-age benefits – average awards do not fall relative to earnings. State pension spending thus falls only slightly as a share of GDP as the pension age continues to rise; and

- a 1.9 per cent of GDP cut in **day-to-day spending on public services and administration**, reflecting the Government's November Spending Review plans and the further cuts in 2019-20 set out in this Budget.

Chart 5.2: Sources of deficit reduction from 2015-16 to 2019-20



Source: OBR

5.12 The fiscal mandate then requires a headline budget surplus in all subsequent years, subject to the economy not being hit by a negative shock. This is ambitious relative to the performance of past governments. The public sector has run a surplus in only five of the last 40 years – and in four of those years that was only because economic activity was running above its sustainable level (at least with the benefit of hindsight). Our central forecast of structural budget surpluses of 0.5 per cent of GDP in 2019-20 and 2020-21 would equal the largest in the past 40 years for which we have estimated the structural fiscal position – matching the 0.5 per cent achieved in 2000-01.

The negative shock threshold

5.13 Beyond 2019-20, the Government's fiscal targets only apply if we confirm that the UK economy is not expected to experience a 'negative shock' – defined by the Government as real GDP growth of less than 1 per cent on a rolling 4 quarter-on-4 quarter basis.[1] As described in Chapter 3, we expect the economy to be growing at a rate consistent with its underlying potential in the final year of the forecast, so we are not forecasting a negative shock on the Government's definition after 2019-20. But, based on past official forecast errors (as used in the fan charts we present in our *EFOs*), our central forecast nonetheless implies that there is around a 35 per cent chance that GDP growth will be below 1 per cent in 2020, in which case we would also expect the budget balance to be weaker.

The previous fiscal mandate

5.14 As in our November forecast, the previous target to achieve cyclically adjusted current balance (CACB) by the third year of the forecast period (2018-19 in this forecast) would be met. We forecast the CACB will move from deficit in 2017-18 to a surplus of 0.5 per cent of GDP in 2018-19. The surplus in 2018-19 has been revised down by 0.7 per cent of GDP since November, reflecting the structural fiscal hit associated with the downward revision we have made to trend productivity growth in this forecast.

The supplementary target

5.15 The supplementary target requires public sector net debt (PSND) to fall as a share of GDP in every year to 2019-20. The previous target required PSND to fall as a share of GDP between 2015-16 and 2016-17, with that year fixed. In November, we expected PSND to fall as a share of GDP in every year of the forecast, so that in our central forecast the Government was on course to meet both the current and the previous supplementary targets. We now expect the debt-to-GDP ratio to rise between 2014-15 and 2015-16, thereby missing the current supplementary target. But we still expect it to fall between 2015-16 and 2016-17, so the previous target would have been met. It is also forecast to fall in each year thereafter.

5.16 Chart 5.3 decomposes the year-on-year changes in the debt-to-GDP ratio that we expect to see over the forecast period. It shows that in 2015-16 the ratio rises by 0.4 per cent of GDP. A primary deficit of 2.1 per cent of GDP and net lending to the private sector (the largest element of which is student loans) of 0.8 per cent push net debt higher as a share of GDP. This is only partly offset by the proceeds from a number of large financial asset sales (1.7 per cent of GDP), the effect of issuing government bonds at a premium to their nominal value (0.6 per cent) and the effect of sterling depreciation on the value of the UK's foreign exchange reserves (0.5 per cent). As described in Chapter 4, the reserves effect is a peculiarity of the PSND calculation, since in reality the reserves are largely hedged against currency movements so that their hedged sterling value is not subject to big fluctuations.

[1] In Chapter 5 of our November 2015 *EFO*, we looked back at how GDP growth over the past six decades and how it would have related to this threshold. It showed that it would have been triggered in four distinct episodes, with two coinciding with recessions (where those were associated with tighter domestic macroeconomic policy attempting to reduce domestic inflation) and two following soon after recessions (where global economic shocks led to more abrupt falls in output).

Unusually in the current low interest rate environment, the growth-interest rate differential – a key component of public sector debt dynamics – makes only a very small negative contribution to the change in net debt this year.

5.17 From 2016-17 onwards, Chart 5.3 shows that:

- changes in the year-on-year profile typically reflect the steady expected improvement in the **primary balance** (a measure of the deficit excluding interest payments). But the debt-to-GDP ratio falls in 2016-17 despite a primary deficit of 1.1 per cent of GDP;

- significant **financial asset sales** continue to reduce PSND each year, by diminishing amounts. Our latest estimates of these sales are described from paragraph 4.159 in Chapter 4. The biggest effect is in 2016-17, when additional UKAR asset sales, the postponed Lloyds share sales and further RBS share sales are sufficient to push the debt-to-GDP ratio down despite the remaining primary deficit. (Financial asset sales typically bring forward cash that would otherwise have been received in future revenues, in the shape of mortgage repayments and dividends, so they only reduce the debt-to-GDP ratio temporarily. In broad terms, financial asset sales leave the public sector's net worth unchanged. When the Government gives away some of the assets that it is disposing of, as with the disposal of Royal Mail shares last year and the planned retail offering of Lloyds shares in 2016-17, the sale raises less than the asset is worth and the public sector's net worth is reduced);

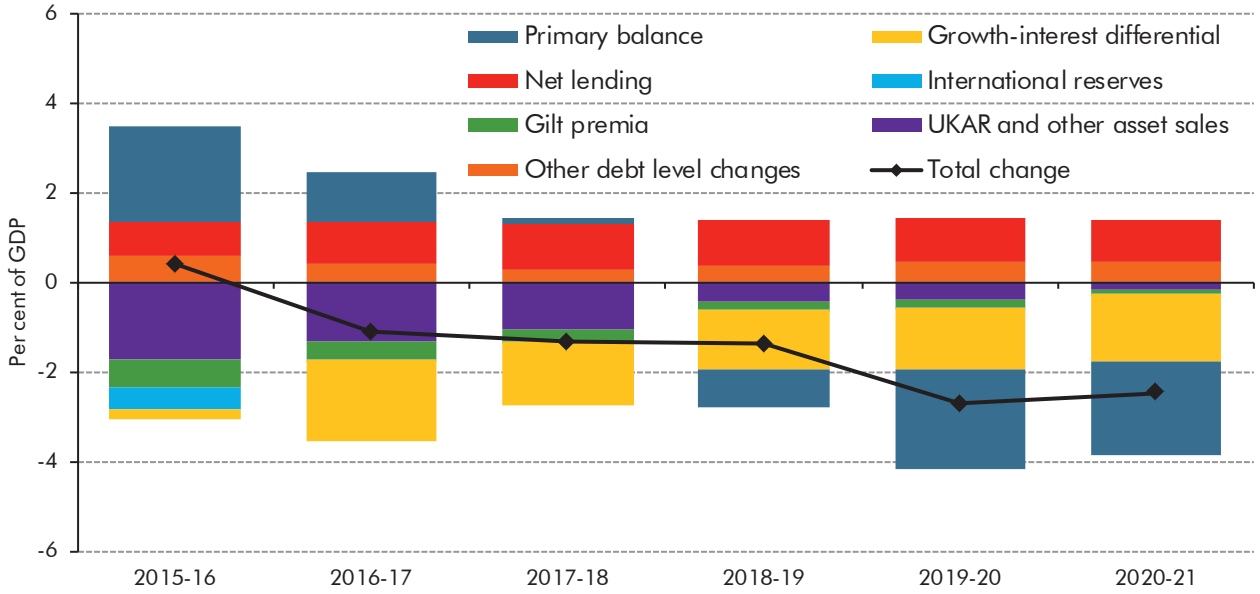
- the fact that **nominal GDP growth exceeds expected interest rates** would, all else equal, be sufficient for debt to fall by 1.8 per cent of GDP in 2016-17 and by 1.5 per cent of GDP in 2020-21. This differential is an extremely important component of public sector debt dynamics, especially over longer timeframes. In our *Fiscal sustainability reports*, we analyse the impact of different assumptions on our results;

- **net lending to the private sector** – mainly student loans, but also through schemes like Help to Buy – increases net debt in every year (but, as a financial transaction, it does not directly affect measures of the deficit);

- **issuing debt at a premium to its nominal value** reduces net debt over the forecast period. But this is ultimately only temporary and will unwind over the long term; and

- **other changes**, including those associated with the Asset Purchase Facility's (APF) balance sheet and various timing effects, are fairly constant. Accrued receipts exceed cash receipts over the medium term, partly because some receipts are collected with a lag (including interest on student loans, where the lag can be many years).

Chart 5.3: Year-on-year changes to the debt-to-GDP ratio



Source: OBR

5.18 Table 5.2 decomposes the changes in the profile of net debt since our November forecast. It shows that the reason we now expect PSND to rise as a share of GDP in 2015-16 largely reflects the denominator in the calculation: non-seasonally adjusted nominal GDP growth in the year centred on the end of March 2016.

5.19 In November, we expected the cash level of PSND at the end of 2015-16 to be 3.5 per cent (£54 billion) higher than a year earlier. Thanks to higher expected gilt premia and a rise in the sterling value of the UK's foreign exchange reserves as recorded for PSND, we now expect the rise to be slightly smaller at 2.8 per cent (£44 billion) despite £4½ billion of Lloyds share sales having been postponed. But at the same time we have revised down growth in the denominator by much more: from 4.3 per cent (£79 billion) in November to 2.3 per cent (£43 billion). So, despite a lower cash increase, PSND is expected to rise by 0.4 per cent of GDP rather than falling by 0.6 per cent.

5.20 The downward revision to growth in the denominator largely reflects weakness in the latest ONS estimates of GDP deflator growth over the past year, which has knock-on effects to our forecast for 2016, plus some more technical factors (as explained in Box 4.1 in Chapter 4). In broad terms, around three-quarters of the revision reflects weakness in headline nominal GDP growth (thanks largely to a wider trade deficit and weak investment) and a quarter is due to changes in the implied seasonal pattern of GDP through the year (with the ONS having revised away a pattern that in November we had noted looked unusual).

5.21 From 2016-17 onwards, the table shows that:

- with the exception of 2016-17, the downward revision to our trend **productivity growth** assumption feeds through to lower nominal GDP growth, which has reduced the pace at which debt falls relative to GDP;

- the large upward revision to our **pre-measures borrowing forecast** has also reduced the pace at which debt falls. That is partly offset by the effect of Government decisions on borrowing, particularly towards the end of the forecast;

- changes to our forecast of **financial asset sales** have slowed the pace of decline in most years, reflecting the postponement of the Lloyds share sales into 2016-17 and the significant fall in the RBS share price since November reducing the proceeds from the Government selling its remaining stake over this Parliament. Partly offsetting those changes are further active asset sales by UKAR in 2016-17 and 2017-18 (on top of the natural rundown of its mortgage assets);

- movements in expected **gilt premia** push PSND down in every year of the forecast, with the further fall in gilt yields since November implying issuance at greater premia; and

- changes to **other factors**, including government lending to the private sector and APF balance sheet effects, have been subject to relatively small revisions that are uneven from year-to-year.

Table 5.2: Changes in the profile of net debt since November

	Per cent of GDP					
	Forecast					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
November forecast	-0.6	-0.7	-1.8	-2.6	-3.0	-3.0
March forecast	0.4	-1.1	-1.3	-1.4	-2.7	-2.5
Change	**1.0**	**-0.4**	**0.5**	**1.3**	**0.3**	**0.5**
of which:						
Nominal GDP[1]	1.6	-0.1	0.2	0.2	0.2	0.1
Pre-measures borrowing	-0.1	0.3	0.3	0.6	0.6	0.7
Effect of Government decisions on borrowing	0.0	-0.1	0.3	0.2	-0.6	-0.6
UKAR asset sales and rundown	0.0	-0.4	-0.4	0.2	0.2	0.1
Other financial asset sales	0.2	-0.1	0.0	0.0	0.0	0.2
Foreign exchange reserves	-0.5	0.0	0.0	0.0	0.0	0.0
Gilt premia	-0.1	-0.1	0.0	-0.1	0.0	0.0
Other factors	0.0	0.1	0.0	0.1	0.0	0.0

[1]GDP is centred end-March.

The welfare cap

5.22 The welfare cap was initially set in line with our March 2014 forecast for the items of spending that are subject to it. As required under the *Charter*, the welfare cap was reset for this Parliament at the July 2015 Budget, where the Government chose to set it at our then post-measures forecast. This locked in a reduction in the level of the cap that reached £16.3 billion by 2019-20. The Government sets a 2 per cent forecast margin above the cap, which can be used if our forecast judgements push up expected spending, but cannot be used to accommodate policy measures that increase spending. We are required to assess the Government's performance against the cap formally at each Autumn Statement. In November 2015, we reported that the Government had breached the terms of the cap. In

this *EFO*, we provide an update on performance against the cap, but will not make another formal assessment until the next Autumn Statement.

Performance against the welfare cap

5.23 Based on the forecasting and policy changes described below, Table 5.3 shows our forecast for spending subject to the welfare cap in each year to 2020-21. It shows that spending remains above the welfare cap in all years and above the forecast margin in all years. On this basis, our November 2015 assessment that the cap has been breached would still hold.

Table 5.3: Performance against the welfare cap

	£ billion				
	Forecast				
	Welfare cap period				
	2016-17	2017-18	2018-19	2019-20	2020-21
Welfare cap set in July 2015					
Welfare cap	115.2	114.6	114.0	113.5	114.9
2 per cent forecast margin	2.3	2.3	2.3	2.3	2.3
Latest forecast and changes since November 2015					
November forecast	119.2	117.7	115.9	115.3	117.1
March forecast	119.8	118.0	116.4	116.2	118.1
Change	**0.6**	**0.3**	**0.6**	**0.9**	**1.1**
of which:					
Forecasting changes	**0.6**	**1.1**	**2.0**	**2.4**	**2.6**
Disability benefits	0.3	0.8	1.3	1.5	1.4
Incapacity benefits	0.2	0.3	0.3	0.4	0.4
Carer's allowance	0.2	0.3	0.3	0.4	0.4
Universal credit	0.1	0.1	0.3	0.4	0.3
Personal tax credits	-0.3	-0.4	-0.2	-0.2	0.0
Attendance allowance	0.1	0.1	0.2	0.2	0.3
Tax free childcare	0.0	-0.1	0.0	-0.1	-0.1
Other factors	0.2	0.0	-0.2	-0.2	-0.2
Classification changes	**0.0**	**-0.1**	**-0.1**	**-0.1**	**-0.1**
Scorecard measures	**0.0**	**-0.7**	**-1.3**	**-1.5**	**-1.5**
Indirect effects of Government decisions	**0.0**	**-0.1**	**-0.1**	**0.0**	**0.0**
Difference from welfare cap	**+4.6**	**+3.4**	**+2.5**	**+2.7**	**+3.2**
Difference from welfare cap + forecast margin	**+2.3**	**+1.1**	**+0.2**	**+0.4**	**+0.9**

Forecasting changes

5.24 As the 2 per cent margin can be used for forecasting reasons, but not for policy reasons, we need to track the sources of changes to our welfare cap spending forecast in order to assess performance against it. Since November we have revised up expected spending on a number of benefits, most notably disability benefits but also incapacity benefits, attendance allowance and carer's allowance. We have revised down spending on tax credits. These changes – particularly the rise in spending on disability benefits resulting from the latest evidence on PIP reassessments (described in Chapter 4) – mean that forecasting changes have further increased the amount by which spending is expected to exceed the welfare cap and the forecast margin above it.

Policy changes

5.25 The Government has announced a number of policy measures in the Budget that reduce spending subject to the welfare cap. The biggest is the reduction in the number of points awarded on the basis of 'aids and appliances' in the PIP assessment, reducing welfare cap spending by £1.3 billion in 2019-20 and 2020-21.

Classification changes

5.26 The *Charter* requires that fiscally neutral classification changes of spending subject to the cap into departmental expenditure limits (DEL) must be accompanied by an adjustment of the cap, although it does not specify when that change must take place. The Treasury has informed us that the fees associated with the administration of tax-free childcare, which had previously been captured in the relevant welfare cap spending line, were transferred into HMRC's DEL in the Spending Review. Given that there has been no underlying change in welfare cap spending, we therefore expect the cap to be reduced by £0.1 billion a year on average. The Treasury has advised us that it intends to make that adjustment at the next Autumn Statement.

Risks to performance against the welfare cap

5.27 Developments in the economy – notably in the labour and housing markets – pose important risks to our welfare spending forecast. Typically, inflation would also be an important source of risk, because the welfare cap is set in cash terms and changes in inflation typically feed through to spending via uprating. But the four-year freeze on the uprating of most benefits subject to the cap means that, for most of the forecast period, welfare cap spending will be relatively insensitive to changes in inflation.

5.28 We highlighted other key sources of uncertainty – and therefore risks to the forecast – in our 2015 *Welfare trends report*. These in particular related to reforms to incapacity and disability benefits, and the rollout of universal credit. We have had to make a succession of large revisions to our forecasts of incapacity benefits as the rollout of reassessments has continued to disappoint against the assumptions in our forecast. In this forecast, we have again revised up spending on disability benefits due to a higher than expected proportion of reassessments resulting in an award, and those awards being higher on average than had been assumed. The evidence on which our latest forecast is based remains a relatively early sample of actual reassessments, so considerable uncertainty remains. It is a concern for us that, despite repeated and often large revisions, we cannot be certain whether we have reached a point where the risks to our forecast are balanced.

5.29 We have attempted to apply the lessons of this significant underperformance in scrutinising the aids and appliances policy costing included in this forecast, but the experience of recent years illustrated the uncertainty that surrounds such estimates. As reported in Annex A, we have assigned a 'medium-high' uncertainty rating to this costing.

5.30 The lessons from the rollout of incapacity and disability benefits reforms highlight the even greater uncertainty that must be associated with our forecast of universal credit spending.

Forecasting the impact of universal credit requires capturing changes in six legacy benefits within an entirely new benefit, where the timing of the transition from legacy benefit to universal credit has large effects on spending. Modelling these effects is a significant challenge that requires the transfer of data, expertise and evolving policy designs across departments. As set out in Chapter 4, we continue to work with DWP on how best to forecast universal credit, but this should be considered one of the largest sources of uncertainty in our forecast for welfare spending.

Recognising uncertainty

5.31 Past experience and common sense suggest that there are significant upside and downside risks to our central forecasts for the public finances. These reflect uncertainty both about the outlook for the economy and about the level of receipts and spending in any given state of the economy. The size and composition of the remaining fiscal consolidation – and its impact on national income and spending – create additional uncertainty.

5.32 Given these uncertainties, it is important to stress-test our judgements about the Government performance against its fiscal targets. We do this in three ways:

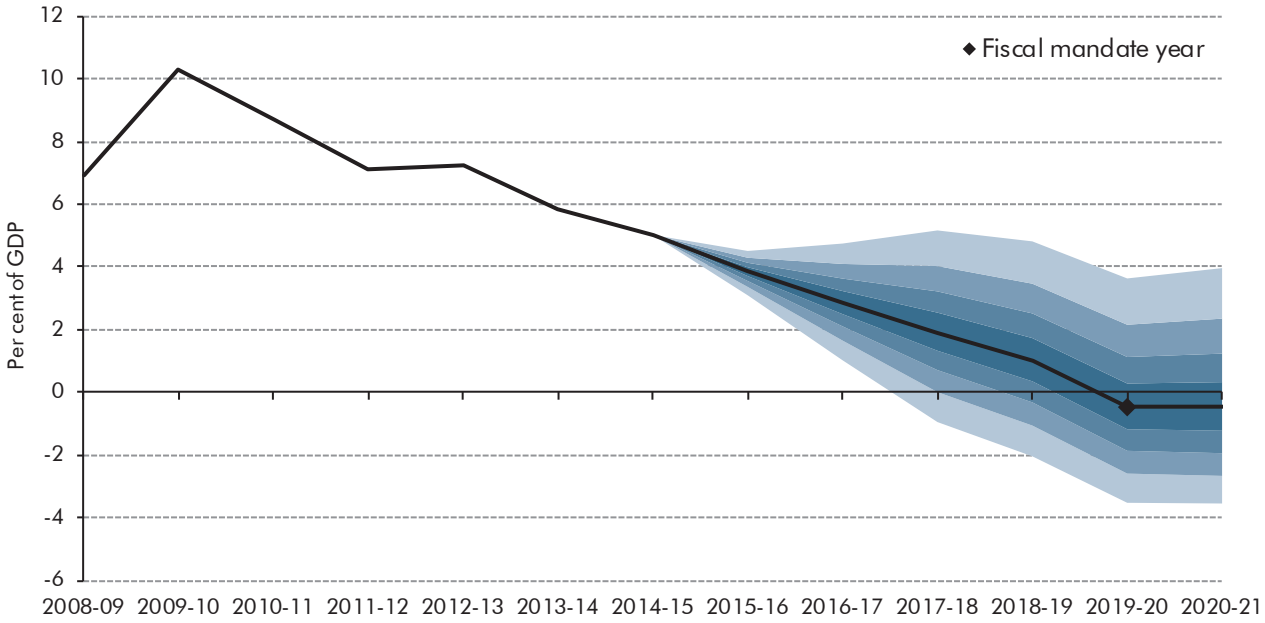
- by looking at the evidence from **past forecast errors**;
- by seeing how our central forecast would change if we altered some of the key **judgements and assumptions** that underpin it; and
- by looking at **alternative economic scenarios**.

Past performance

5.33 One relatively simple way to illustrate the uncertainty around our central forecast is to consider the accuracy of previous official public finance forecasts. This can be done using fan charts like that we presented for GDP growth in Chapter 3. The fan charts do not represent our assessment of specific risks to the central forecast. Instead they show the outcomes that someone might anticipate if they believed, rightly or wrongly, that forecast errors in the past offered a reasonable guide to likely forecast errors in the future.

5.34 Chart 5.4 shows our central forecast for PSNB on the same basis. Again, a direct reading of the chart would imply that the probability that PSNB will reach balance rises from 20 per cent in 2017-18 to 35 per cent in 2018-19, then to 55 per cent in 2019-20 and 2020-21. The Government therefore has a small margin against its fiscal mandate. It is notable that the £13.7 billion revision to our pre-measures PSNB forecast in 2019-20 was equivalent to moving only 20 percentage points through the fan chart distribution, but that – absent the Government's policy response – this would have been sufficient to move from above to below 50 per cent chance of meeting the target.

Chart 5.4: Public sector net borrowing fan chart



Source: ONS, OBR

5.35 Unfortunately, we cannot estimate the probability of achieving the supplementary target as we do not have the joint distribution that would allow us to apply the same technique. But our central forecast shows the debt-to-GDP ratio rising in 2015-16 and falling in each year thereafter, implying a less than 50-50 chance that the supplementary target will be met since it requires the ratio to be falling in every year. We also do not have a long enough disaggregated series of past welfare spending forecasts to produce a fan chart for the welfare cap projections.

Sensitivity analysis

5.36 It is very difficult to produce a full subjective probability distribution for the Government's target fiscal variables because they are affected by a huge variety of economic and non-economic determinants, many of which are correlated with each other. However we can go further than using evidence from past forecast errors by quantifying roughly how sensitive our central forecast is to changes in certain key economic parameters.

5.37 In thinking about the evolution of the public finances over the medium term, there are several parameters that have an important bearing on the forecast. Here we focus on:

- the **sensitivity of the fiscal mandate** headline surplus measure to changes to the level of GDP, inflation, interest rates and effective tax rates; and
- the **sensitivity of the supplementary debt target** to differences in the level of debt or the growth rate of the economy, which both affect how debt changes from year-to-year as a share of GDP (as has been illustrated by the revision to the debt-to-GDP profile in 2015-16 in this forecast).

The fiscal mandate

5.38 We have already shown that, on the basis of past forecast errors, there is a 45 per cent probability that the budget will be in deficit rather than surplus in 2019-20. There are many reasons why we could see such an outcome. For example, economic developments could be less favourable than we forecast or we could be wrong about prospects for receipts or spending for a given state of the economy. And while our forecasts are conditioned on current Government policy, that may also evolve over time.

5.39 In Annex B of our March 2015 *EFO*, we presented a range of ready-reckoners that show how the public finances could be affected by changes in selected economic determinants of our fiscal forecast. It is important to stress that these were stylised quantifications that reflect the typical impact of changes in variables on receipts and spending. They are subject to significant uncertainty. But with those caveats in mind, we can use these ready-reckoners to calibrate a number of possible negative surprises relative to our central forecast that would be sufficient to push the budget from surplus to deficit in 2019-20. Where possible, we assess the probability of such a surprise on the basis of past forecast errors.

5.40 This analysis suggests that the 0.5 per cent of GDP surplus in 2019-20 could fall to zero if:

- there was a **negative output gap** of 0.7 per cent or **potential output** was 1.0 per cent lower. Swings in the output gap have a larger effect since we assume that these also drive changes in asset prices, which have geared effects on receipts. As the scenario analysis below illustrates, the composition of any shock to potential output can affect these sensitivities, with a productivity-driven shock likely to have a greater impact than an employment- or population-driven shock;

- **whole economy prices** rise by 1.2 per cent less than expected. This is important because receipts are linked to nominal tax bases and thus rise and fall with prices (slightly more than proportionately). However, much public spending is fixed in nominal terms in Spending Reviews or relatively insensitive to prices (e.g. much of debt interest on conventional gilts is based on the stock that has already been accumulated, on which interest rates are fixed). That is particularly true in our current forecast since most working-age welfare spending is subject to a four-year freeze on uprating;

- higher **interest rates** pushed up debt interest spending. If interest rates were 1.2 percentage points above market expectations by 2019-20, this would be sufficient to add 0.5 per cent of GDP to spending on debt interest. Such an effect would not happen in isolation – for example, a boost to interest receipts on the government's stock of financial assets would partly offset higher debt interest;

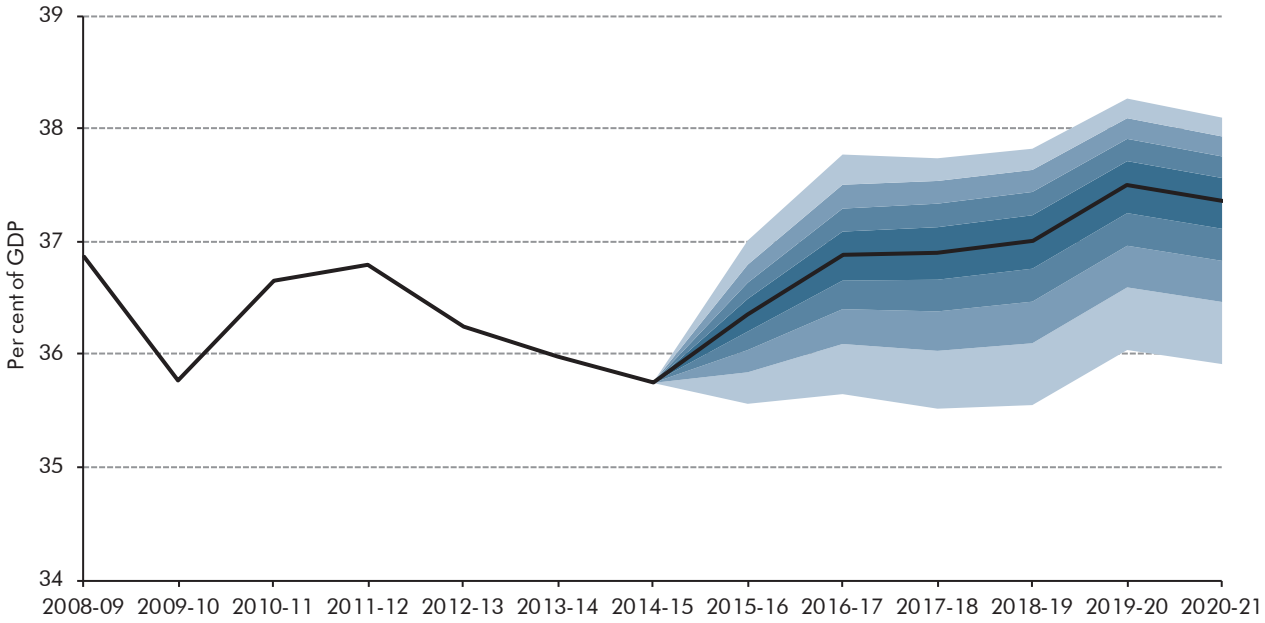
- the **effective tax rate** – as measured by the tax-to-GDP ratio – was 0.5 per cent of GDP lower than in our central forecast. This could be because the composition of GDP was less tax rich than expected, or asset markets underperformed our assumptions, or the income distribution was skewed towards people with lower effective tax rates. Chart 5.5 presents a fan chart for receipts as a share of GDP using a similar methodology to

that used in the PSNB fan chart above. It suggests there is a 35 per cent chance that receipts could be 0.5 per cent of GDP lower than forecast;

- planned **spending cuts** – which reduce RDEL by 1.9 per cent of GDP between 2015-16 and 2019-20 in our forecast – fell short by around a quarter; and

- a jump in **RPI inflation** could increase accrued interest on index-linked gilts. Taken in isolation, if RPI inflation was 2.2 percentage points higher than expected in 2019-20, that alone would add 0.5 per cent of GDP to debt interest costs. Based on past forecast errors, there would be around a 10 per cent probability of that happening. Of course, this sort of shock to inflation would be likely to have other material effects on the public finances.

Chart 5.5: Receipts fan chart



Source: ONS, OBR

The supplementary debt target

5.41 The supplementary debt target is focused on year-on-year changes in the debt-to-GDP ratio. Table 5.4 shows how our central forecast for a 2.7 per cent of GDP fall in PSND in 2019-20 would be affected by two sources of sensitivity: differences in the level of debt in the preceding year and by differences in growth in 2019-20. We use cyclical adjustment coefficients to estimate the effect of GDP growth shocks on borrowing, but do not vary interest rates, so that differences in the assumed GDP growth rate result in changes to the interest rate-growth rate differential. On that basis, the table shows that:

- in most cases, the extent to which debt falls in 2019-20 is inversely related to **the level of debt in the preceding year**. That counter-intuitive result is due to the low level of interest rates assumed in our central forecast, which means that the effect of GDP growth on the denominator in the debt-to-GDP ratio is greater than the effect of

interest rates on growth in the cash level of debt (via debt interest spending). The higher the starting level of debt, the more the denominator effect outweighs the interest rate effect. It is only the bigger negative growth shocks that see the growth rate fall close to the interest rate. When they are similar (which would be the case if growth was around 2 percentage points lower), the two effects cancel out. When the growth rate is lower than the interest rate, the extent to which debt falls is positively related to the level of debt in the preceding year; and

- as expected, negative **shocks to GDP growth** reduce the extent by which debt falls as a share of GDP and positive shocks increase it. The year-on-year change in the debt-to-GDP ratio is more sensitive than the deficit to GDP shocks, because it is affected both by the deficit channel (which drives the accumulation of debt in that year) and by the denominator channel (which means the previous year's cash debt is divided by a different level of nominal GDP).

Table 5.4: Illustrative debt target sensitivities in 2019-20

		Year on year change in the PSND-to-GDP ratio in 2019-20					
		Difference in GDP growth in 2019-20 (percentage points)					
		-3	**-2**	**-1**	**0**	**+1**	**+2**
Difference in the level of PSND in 2018-19 (per cent of GDP)	**-20**	1.5	0.2	-1.1	-2.4	-3.6	-4.9
	-10	1.6	0.2	-1.2	-2.5	-3.9	-5.2
	+0	1.7	0.2	-1.2	**-2.7**	-4.2	-5.6
	+10	1.8	0.2	-1.3	-2.9	-4.4	-5.9
	+20	2.0	0.3	-1.4	-3.1	-4.7	-6.3

Scenario analysis

5.42 The sensitivity analysis discussed above focuses on individual factors and therefore offers only a limited assessment of potential uncertainty. In this section, we set out the fiscal implications of illustrative alternative economic scenarios, designed to test how dependent our conclusions are on key judgements that are subject to debate in the forecasting community. We stress that these scenarios are not intended to capture all possible ways in which the economy might deviate from the central forecast and we do not attempt to attach particular probabilities to them occurring.

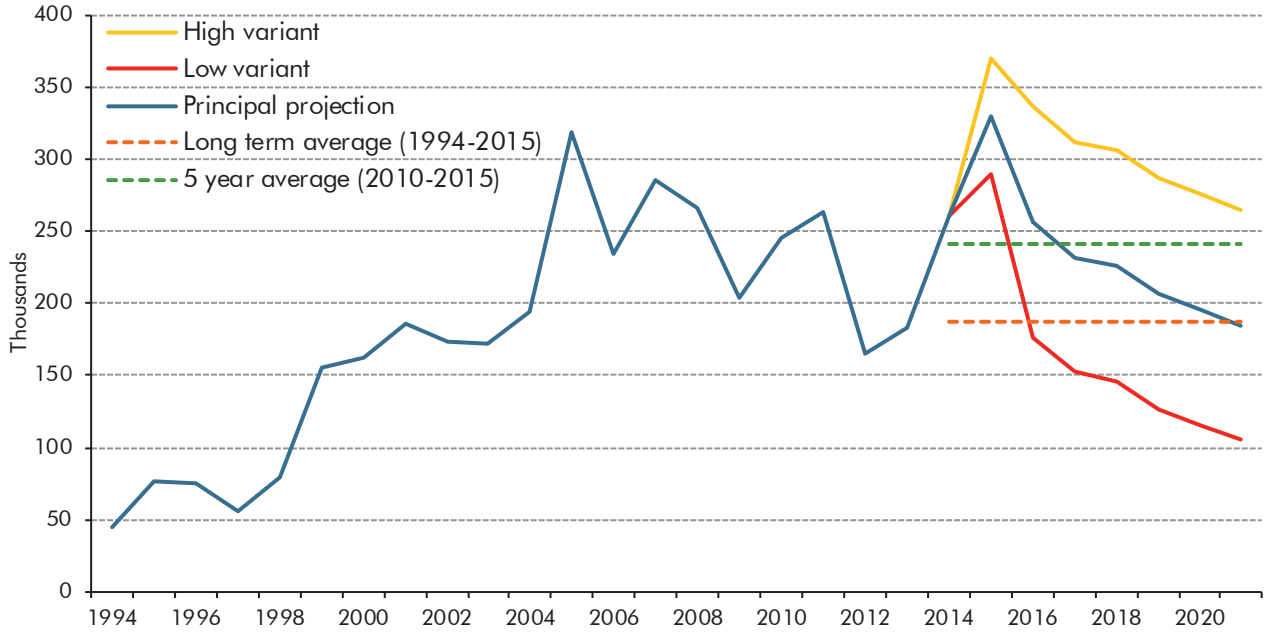
5.43 Net international migration to the UK is an important driver of the economy's underlying growth potential. It affects it directly (via population growth) and indirectly (by contributing to changes in the employment rate, average hours worked or underlying productivity growth). Net migration has accounted for over half of UK population growth over the past 15 years and the ONS projects that this will remain so over the five years of our forecast period. Net migration to the UK has typically been concentrated among people of working age, which the ONS assumes will continue over the coming years. That means net migration leads to a higher employment rate and lower dependency ratio than would otherwise be the case.

5.44 In our central forecast, we capture the effects of net migration on population growth and the employment rate, while assuming that it has no effect on underlying productivity growth.

The latest data reported net international migration to the UK of 323,000 in the year to September 2015. Our central forecast is based on the ONS principal population projection, which assumes 329,000 in 2015 and 256,000 in 2016, declining to 185,000 in 2021 – close to the average of the past 20 years, but much lower than in the past five years.

5.45 To illustrate the effect of different net migration assumptions, we consider the effects on our economy and fiscal forecast of three alternative ONS population projections: 'high migration', 'low migration' and 'zero net migration' (or 'natural change'). The principal projection and the high and low variants are shown in Chart 5.6. Even under the low scenario, net inward migration does not quite drop into the 'tens of thousands' sought by the Government within the forecast period. We include the natural change scenario as a means of illustrating the short-term fiscal effects of demographic trends in the currently resident population, not to suggest it is a plausible scenario in the immediate future.

Chart 5.6: Past and projected net migration to the UK



Source: ONS, OBR

5.46 For the purposes of these scenarios, we have assumed that net migration affects potential output growth (via population and employment rate effects), but not the output gap. As such, while real and nominal GDP growth vary in each scenario, inflation, average earnings growth, interest rates and the unemployment rate are unchanged. We have, however, assumed that given the very low responsiveness of housing supply in the UK to changes in demand, changes in population growth will feed through to changes in house prices.

5.47 Relative to our central forecast, the main differences in the three scenarios are:

- in the **'high migration'** scenario, net inward migration falls to 265,000 by 2021. The population is 0.6 per cent higher by 2020 and the employment rate 0.1 percentage

points higher. That translates into potential output and nominal GDP 0.8 per cent higher. House prices are 1.3 per cent higher;

- in the **'low migration'** scenario, net inward migration falls to 105,000 by 2021.The population is 0.6 per cent lower by 2020 and the employment rate 0.1 percentage points lower. That translates into potential output and nominal GDP 0.8 per cent lower. House prices are 1.3 per cent lower; and

- in the **'zero net migration'** scenario the population is 1.5 per cent lower by 2020 and the employment rate 0.2 percentage points lower. That translates into potential output and nominal GDP 1.9 per cent lower. House prices are 3.0 per cent lower.

5.48 In assessing the fiscal implications, we have made the following key assumptions:

- net migrants to the UK on average have the same **age- and gender-specific characteristics** as the native population, with the same employment rates and productivity and the same net contributions to the public finances. These assumptions look reasonable at a whole economy level (as discussed in Annex A to our 2013 *FSR*), but what is true on average will of course not be true of every individual migrant;

- the impact of different migration assumptions on **receipts** is estimated using the age-specific profiles that underpin our *FSR* projections. For each scenario, we hold per capita receipts by age and gender fixed and use the demographic projection to estimate total receipts in each year;

- the impact of different migration assumptions on **welfare spending** is also modelled using age-specific profiles for tax credits, child benefit and social security spending administered by DWP. As inflation and earnings are unchanged across the scenarios, the impact on welfare spending is relatively small since only caseloads vary;

- **debt interest spending** is modelled using our debt interest ready reckoner (see Box 4.4 in Chapter 4), applied to the difference in borrowing relative to the central forecast. Since the interest paid on debt that has already been issued is fixed in cash terms, in per capita terms it varies negatively with changes in net migration – i.e. higher net migration spreads the cost of a given amount of debt interest across more people and vice versa; and

- **departmental expenditure limits (DEL)** are fixed in cash terms at the levels set out in the November Spending Review and this Budget, so changes in the size of the population do not affect the level of spending on public services or investment. This means that DEL spending on a per capita basis and as a share of GDP changes inversely with the assumed level of net migration. This is different to the assumption underpinning our long-term fiscal projections, where age- and gender-specific spending are held constant as a share of GDP so that demographic trends lead to changes in spending on age-related public services. But since the Government has set out departmental spending plans in cash terms for the next four years, and a cash total for 2020-21,

using our *FSR* assumption would not be consistent with 'unchanged government policy' for the purposes of these medium-term scenarios.

5.49 As we noted in Box 3.4 of our 2014 *FSR*, it is important to emphasise that just because we find that higher net inward migration is likely to improve the fiscal position, that does not mean that we are recommending that the Government should aim for more inward migration rather than less. This judgement lies outside our remit and for those that have to make it there are clearly other factors to consider beyond the impact of migration on the public finances via the age structure of the population. It would also be wrong to conclude from our analysis that the Government has to accept higher inward migration in order to put or to keep the public finances on a sustainable path. If a government succeeded in reducing net inward migration from what would otherwise occur then that would be likely to create additional fiscal pressures, but it could always choose to offset those pressures through additional spending cuts or tax increases.

5.50 Given the assumptions above, Table 5.5 sets out the main fiscal implication for each scenario on each Government's fiscal targets. It shows that:

- under the **'high migration' scenario** receipts would be higher in cash terms due to the larger population, but also slightly higher as a share of GDP due to the higher employment rate. In terms of the tax-to-GDP ratio, the main effect would come via income tax and NICs receipts. Spending would be higher in cash terms, again due to the larger and younger population feeding through to working-age welfare spending. However, it would be lower as a share of GDP, partly due to the lower dependency ratio affecting state pensions spending but more significantly because DELs are held flat in cash terms. In this scenario, PSNB and PSND would fall faster than in our central forecast. The fiscal mandate would be met by a margin £4½ billion larger in 2019-20 and £6 billion larger in 2020-21. Lower borrowing and higher surpluses would reduce debt interest spending by around 0.7 per cent (around 1.5 per cent on a per capita basis) by 2020-21. Since the improvement in the fiscal position would partly reflect DEL spending per capita being around 1 per cent lower, a government might choose to use some of that improvement to finance higher DELs, but we have not quantified such a response as we are not allowed to consider alternative policies. PSND would still rise in 2015-16, so the supplementary target would be missed, but it would fall more rapidly than in our central forecast in subsequent years. Welfare cap spending would remain significantly higher than the cap, as in our central forecast;

- under the **'low migration' scenario**, the effects described in the 'high migration' scenario would operate in reverse, with the tax-to-GDP ratio slightly lower and spending-to-GDP ratio slightly higher. The fiscal mandate would be met by a margin £4½ billion smaller in 2019-20 and £6 billion smaller in 2020-21. Debt interest spending would be around 0.8 per cent higher by 2020-21 (1.6 per cent higher in per capita terms). Mirroring the 'high migration' scenario, part of the deterioration in the fiscal position would reflect higher per capita DEL spending, which a government might choose to adjust. As in our central scenario, the supplementary target would be

missed because debt would rise as a share of GDP in 2015-16. Welfare cap spending would remain significantly higher than the cap, despite the smaller population; and

- under the **'natural change' scenario**, the effects on the public finances of a smaller and older population would be more significant. The tax-to-GDP ratio would be lower due to a lower employment rate, while non-interest spending would be significantly higher as a share of GDP because cash DELs are fixed and a higher proportion of the population receiving state pensions. Debt interest spending would be 1.5 per cent higher, offsetting the lower cash spending on items linked to the size of the population. As a consequence, the budget would be close to balance in 2019-20 and 2020-21, just missing the fiscal mandate by the end of the forecast period. But GDP growth in this scenario would remain above 1 per cent on a 4-quarter-on-4-quarter basis, so this would occur in 'normal times' as defined by the *Charter*. As in the other scenarios, the supplementary target would be missed and welfare cap spending would continue to exceed the cap.

5.51 These results illustrate the value of running full scenarios rather than relying on sensitivity analysis. The reduction in potential output in the 'low migration' scenario is of a similar size to that which the sensitivity analysis suggests would be sufficient to miss the surplus target, yet that scenario shows the surplus target still being met. The difference is that the top-down estimate will reflect the sensitivity of the budget balance to all aspects of potential output shocks – population, hours worked and productivity – according to how they have moved on average in the past. The scenarios focus on population-driven changes to employment, with productivity assumed to be unchanged. These have smaller implications for the tax-to-GDP ratio: employment-driven total wage growth is less tax-rich than earnings-driven total wage growth, because it lowers the average tax rate (as more people get tax-free personal allowances for example) rather than raising it (as fiscal drag pushes some people up a tax bracket). But as our long-term fiscal projections have illustrated, even relatively small differences over a medium-term horizon can be material over the long term.

5.52 The effects of these scenarios on the public finances are reasonably linear, so they can be scaled to provide an approximate illustration of different assumptions. For example, multiplying the results of the 'low migration' scenario by 1.5 would be illustrative of the impact on the public finances if net migration fell below 100,000 by 2019-20. On that basis, the surplus in 2019-20 would fall closer to zero. These results would remain subject to the important caveat that they reflect the age composition of migration assumed in the ONS population projections.

Table 5.5: Key economic and fiscal aggregates under alternative scenarios

	Per cent of GDP (unless otherwise stated)					
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21
Central forecast						
Economic assumptions						
GDP growth	2.1	2.0	2.2	2.2	2.1	2.1
Fiscal outcome						
Public sector net borrowing (£ billion)	72.2	55.5	38.8	21.4	-10.4	-11.0
Public sector net debt	83.7	82.6	81.3	79.9	77.2	74.7
Difference from welfare cap (per cent)		4.0	2.9	2.2	2.4	2.8
Cyclically adjusted current deficit	1.8	0.9	0.2	-0.5	-2.0	-2.4
High migration						
Economic assumptions						
GDP growth	2.1	2.2	2.3	2.3	2.3	2.3
Fiscal outcome						
Public sector net borrowing (£ billion)	72.2	54.7	36.9	18.4	-14.8	-16.9
Public sector net debt	83.7	82.5	81.0	79.3	76.2	73.3
Difference from welfare cap (per cent)		4.1	3.2	2.5	2.8	3.4
Cyclically adjusted current deficit	1.8	0.8	0.1	-0.7	-2.2	-2.6
Low migration						
Economic assumptions						
GDP growth	2.1	1.9	2.0	2.0	1.9	1.9
Fiscal outcome						
Public sector net borrowing (£ billion)	72.2	56.3	40.6	24.5	-6.1	-5.2
Public sector net debt	83.7	83.0	81.9	80.8	78.3	76.1
Difference from welfare cap (per cent)		3.8	2.7	1.8	1.9	2.2
Cyclically adjusted current deficit	1.8	0.9	0.3	-0.4	-1.8	-2.1
Natural change						
Economic assumptions						
GDP growth	2.1	1.7	1.7	1.7	1.7	1.7
Fiscal outcome						
Public sector net borrowing (£ billion)	72.2	57.0	42.5	27.7	-1.6	0.8
Public sector net debt	83.7	83.3	82.5	81.8	79.6	77.7
Difference from welfare cap (per cent)		3.2	1.8	0.8	0.6	0.7
Cyclically adjusted current deficit	1.8	1.0	0.4	-0.2	-1.6	-1.9

A Budget 2016 policy decisions

Overview

A.1 Our *Economic and fiscal outlook (EFO)* forecasts incorporate the expected impact of the policy decisions announced in each Budget and Autumn Statement. In the run-up to each statement, the Government provides us with draft estimates of the cost or gain from each policy measure it is considering. We discuss these with the relevant experts and then suggest amendments if necessary. This is an iterative process where individual measures can go through several stages of scrutiny. After this process is complete, the Government chooses which measures to implement and which costings to include in its scorecard. We choose whether to certify the costings as 'reasonable and central', and whether to include them – or alternative costings of our own – in our forecast.

A.2 In this forecast, we have certified all the costings of tax and annually managed expenditure (AME) measures that appear in the Government's main policy decisions scorecard as reasonable and central.

A.3 In November, we were unable to certify the financial transaction costing for the additional sale of RBS shares in 2020-21 as it was submitted more than three days after the mutually agreed deadline for us to be informed of new policies. We included it in our forecast on the basis that the calculation was relatively straightforward – at the prevailing share price the Government owned a sufficient number of shares to raise the £5.8 billion costing in 2020-21. We have subsequently certified the methodology, though the change in share price means the original costing is no longer plausible, which has been reflected in our new forecast.

A.4 The costings process worked reasonably efficiently, with fewer measures submitted just before the deadline than has been the case in recent fiscal events. However, as in November, there were a very large number of measures submitted for scrutiny.

A.5 Table A.1 reproduces the Treasury's scorecard, with further details set out in Chapter 4 and in the Treasury's *Budget 2016 policy costings document*, which summarises very briefly the methodologies used to produce each costing and the main areas of uncertainty within each.

A.6 In Box 4.3 of our November *EFO* we discussed the challenge of estimating interactions between HMRC-administered tax credits and DWP-administered benefits in the run-up to a fiscal event. In November, we made a large, but neutral, reallocation of spending between tax credits and universal credit to bring the treatment of the July measures into line with the approach in our baseline forecast.

A.7 During the challenge process for this forecast it was revealed that November's costing of the effect on DWP benefits spending of reversing July's tax credit measures had been estimated incorrectly. This was the second successive scorecard containing errors in welfare spending measures that affect both HMRC and DWP administered benefits – with July's errors mostly due to insufficient time for scrutiny and November's due to HMRC analysts not being permitted to discuss the costings with their DWP counterparts.

A.8 At future fiscal events, if similar circumstances were to arise we would be unlikely to certify packages of measures as 'reasonable and central'. We would return to the costings at the next fiscal event when they could be estimated using the full forecast models and discussed with all relevant analysts.

Uncertainty

A.9 In order to be transparent about the potential risks to our forecasts, we assign each certified costing a subjective uncertainty rating, shown in Table A.1. These ratings range from 'low' to 'very high'. In order to determine the ratings, we have assessed the uncertainty arising from each of three sources: the data underpinning the costing; the complexity of the modelling required; and the possible behavioural response to the policy change. We take into account the relative importance of each source of uncertainty for each costing. The full breakdown that underpins each rating is available on our website. It is important to emphasise that, where we see a costing as particularly uncertain, we see risks lying to both sides of what we nonetheless judge to be a reasonable and central estimate.

Table A.1: Treasury scorecard of policy decisions and OBR assessment of the uncertainty of costings

		Head	2016-17	2017-18	2018-19	2019-20	2020-21	Uncertainty
Spending and efficiency								
1	Resource spending adjustment	Spend	0	0	0	+3,500	-	N/A
2	Capital spending: accelerate investment plans[3]	Spend	0	-760	-970	+1,585	+150	N/A
3	Public Service Pensions: update to discount rate	Spend	0	0	0	+1,970	+2,005	Medium-high
Personal Tax and Savings								
4	Personal Allowance: increase to £11,500 in April 2017	Tax	0	-1,665	-1,945	-1,945	-1,985	Medium
5	Higher Rate Threshold: increase to £45,000 in April 2017	Tax	0	-365	-595	-565	-600	Medium
6	Lifetime ISA and raise ISA limit to £20,000	Spend	*	-170	-330	-590	-850	Very high
7	Savings: remove withholding tax obligations	Tax	0	-260	-45	-100	-120	Medium-low
8	Financial Advice Markets Review: increase tax relief on employer provided pension advice	Tax	0	-10	-10	-5	*	High
Childhood Obesity and Education								
9	Soft Drinks Industry Levy	Tax	0	0	+520	+500	+455	Medium-high
10	Education: doubling the school sports premium	Spend	0	-110	-190	-190	-	N/A
11	Education: longer school day and breakfast clubs	Spend	-5	-85	-250	-350	-	N/A
12	Education: full academisation and accelerate transition to National Funding Formula	Spend	-75	-260	-195	-110	-	N/A
13	Education: Northern Powerhouse	Spend	-10	-25	-25	-20	-	N/A
14	Student Loans: postgraduate loans for part-time and distance learning	Spend	0	0	0	+5	+5	Medium-low
Business Tax								
15	Business Rates: permanently double the Small Business Rate Relief and extend thresholds	Tax	0	-1,575	-1,410	-1,420	-1,460	Medium-low
16	Business Rates: increase threshold for higher multiplier to £51,000	Tax	0	-125	-110	-110	-115	Medium-low
17	Business Rates: switch from RPI in April 2020	Tax	0	0	0	0	-370	Low
18	Corporation Tax: reduce to 17% in April 2020	Tax	0	0	0	-120	-945	Medium-low
19	Corporation Tax: restrict relief for interest	Tax	0	+920	+1,165	+995	+885	Medium-high
20	Corporation Tax: withholding tax on royalties	Tax	+210	+165	+115	+120	+125	Medium-high
21	Corporation Tax: extend scope of hybrid mismatch rules	Tax	+15	+265	+255	+215	+200	Medium-high
22	Corporation Tax: reform loss relief	Tax	0	+395	+415	+295	+255	High
23	Corporation Tax: further restrict use of banks' pre-2015 losses	Tax	+330	+520	+465	+375	+315	Medium-high
24	Corporation Tax: implement agreed patent box nexus approach	Tax	0	+15	+25	+35	+45	Medium
25	Corporation Tax: extend first year allowance and lower emission thresholds for business cars	Tax	0	0	+5	+35	+80	Medium
26	Corporation Tax: defer bringing forward payment for large groups for two years	Tax	0	-6,000	-3,850	+5,965	+3,600	Medium-low
27	Stamp Duty Land Tax for non-residential property: reform freehold and leasehold premium regime to slice and increase leasehold rate over £5m	Tax	+385	+515	+535	+560	+590	Medium-high

Enterprise								
28	Capital Gains Tax: reduce basic rate to 10% and main rate to 20% excluding residential property and carried interest	Tax	-105	-630	-605	-670	-735	Medium-high
29	Entrepreneurs Relief: extend to long-term investors in unlisted shares	Tax	*	+5	-25	-40	-60	Medium
30	Capital Gains Tax: lifetime limit under Employee Shareholder Status	Tax	0	0	0	+10	+35	High
31	Capital Gains Tax: extend reliefs	Tax	-45	-20	-40	-40	-40	Medium
32	Self Employed: abolish Class 2 NICs	Tax	0	0	-355	-360	-360	Medium
33	Sharing Economy: £1,000 allowance for both trading and property income	Tax	0	-15	-235	-195	-200	Medium-low
Energy and Environment								
34	Oil and Gas: abolish Petroleum Revenue Tax and reduce Supplementary Charge to 10%	Tax	-165	-265	-225	-155	-200	Medium-high
35	North Sea Seismic Survey	Spend	-15	0	0	0	-	N/A
36	Business Energy: abolish Carbon Reduction Commitment and offsetting increase to Climate Change Levy	Tax	0	0	0	+425	+35	Medium-low
37	Carbon Price Support Rate: cap at £18/tCO_2 in April 2019 and uprate in April 2020	Tax	0	0	0	0	+25	Medium-low
38	Corporation Tax: update technologies with access to enhanced capital allowances	Tax	*	+5	+5	+5	+5	Low
Avoidance, Evasion, Imbalances, and Operational Measures								
39	Disguised remuneration: tackling historic and new schemes	Tax	+100	+335	+645	+1,235	+215	Very high
40	Off-payroll working: transfer liability to public sector employers	Tax	0	+265	+65	+105	+120	High
41	Loans to participators: align rates with dividend higher rate	Tax	+15	+80	+80	+70	+65	Medium
42	Removing employer tax advantage of different forms of remuneration: pay-offs over £30,000	Tax	0	+45	+420	+470	+485	Medium-high
43	Offshore Property Developers: tackle avoidance and evasion	Tax	+130	+435	+550	+640	+520	Medium-high
44	Stamp Duty Land Tax on additional properties: exemptions	Tax	+45	+55	+60	+65	+70	High
45	Corporation Tax: removing the renewals allowance	Tax	+5	+5	+5	+5	+5	Low
46	Value Added Tax: tackling overseas trader evasion	Tax	0	+65	+130	+315	+365	High
47	Value Added Tax: extend reverse charge to electronic communications services	Tax	+115	+105	+90	+75	+60	Medium
48	Gambling Duties: reform treatment of freeplays	Tax	-20	+45	+90	+100	+110	Medium-low
49	Asset Managers: reform treatment of performance awards	Tax	+15	+210	+115	+90	+65	Medium-high
50	Border Force: Illicit Tobacco Strategy	Tax	-5	+20	+25	+30	+45	High
51	Landfill Tax: tackling waste crime	Tax	0	+5	+10	+20	+30	Medium-high
52	Tax Free Childcare and Employer Supported Childcare: updated roll-out and grandfathering	Tax	+20	-35	-155	-120	-85	Medium-high
53	DWP and HMRC operational and policy measures	Spend	-35	-50	+5	+45	+30	Medium-low

Duties								
54	Fuel Duty: freeze in April 2016	Tax	-440	-435	-445	-445	-450	Medium-low
55	Alcohol Duty: freeze for beer, spirits and cider	Tax	-85	-85	-85	-85	-85	Low
56	Heavy Goods Vehicles: freeze VED and Road User Levy	Tax	-5	-5	-5	-5	-5	Low
57	Hand-rolling Tobacco: increase by RPI+5%	Tax	+10	+10	+10	+10	+10	Low
58	Aggregates Levy: freeze rates	Tax	-5	-5	-5	-5	-5	Low
59	Package Recycling Target: reform	Tax	+5	+10	+5	0	-5	Medium-low
Local Growth								
60	Flood Defence and Resilience: additional investment	Spend	-80	-200	-205	-205	-	N/A
61	Insurance Premium Tax: increase by 0.5% in September 2016	Tax	+80	+200	+205	+205	+210	Medium-low
62	City Deals	Spend	-145	-60	-10	-10	-	N/A
63	Smart Motorways: M62	Spend	*	*	-75	-115	-	N/A
64	Office for National Statistics: Bean Review	Spend	-5	-10	0	0	-	N/A
65	Enterprise Zones: extend enhanced capital allowances	Tax	0	0	0	0	-5	Medium
66	Cathedral Repairs Fund	Spend	-5	-5	0	0	-	N/A
67	Additional Cultural Investment	Spend	-25	-30	-15	-15	-	N/A
68	Other local growth measures	Spend	-5	-5	-10	-5	-	N/A
Previously announced measures								
69	Local Government Assets: receipts flexibility	Spend	+100	+250	+380	+380	+190	Medium-high
70	Help to Save	Spend	0	0	0	-20	-70	High
71	Education: Mentoring for disadvantaged pupils	Spend	-5	-5	-5	-5	-	N/A
72	Right to Buy: pilots	Spend	0	-35	-35	-5	0	Medium-low
73	Personal Independence Payments: aids and appliances	Spend	+15	+590	+1,190	+1,300	+1,280	Medium-high
74	Pay to Stay: introduce taper and make voluntary for housing associations	Spend	0	+260	+205	+260	+305	Medium
75	Social Rent downrating: one year deferral for supported housing	Spend	-15	-20	-20	-25	-25	Low
76	Benefit Cap: exemption for recipients of carers and guardians allowance	Spend	-10	-20	-20	-20	-20	Medium-low
77	Local Housing Allowance: implement for new tenancies from April 2017	Spend	0	0	-60	-25	-15	Low
	TOTAL POLICY DECISIONS		**+285**	**-7,550**	**-4,770**	**+13,915**	**+4,175**	
	Memo: TOTAL POLICY DECISIONS *(excluding the impact of CT payment date measure)* [4]		***+285***	***-1,550***	***-920***	***+7,950***	***+575***	
	Total tax policy decisions (excluding the impact of CT payment date measure)[4]		+645	-960	-470	+330	-2,760	
	Total spending policy decisions		-360	-590	-450	+7,620	+3,335	

**negligible*

[1] Costings reflect the OBR's latest economic and fiscal determinants.

[2] At Spending Review 2015, the government set departmental spendng plans for RDEL for years up to 2019-20. RDEL budgets have not been set for most departments for 2020-21. Given this, RDEL figures are not set out for 2020-21.

[3] This measure is fiscally neutral over the scorecard period. Figures may not sum to zero due to rounding.

[4] This measure changes the timing of corporation tax payments by larger groups. As it represents a cash-flow impact, its effect over the scorecard period is broadly neutral.

A.10 Table A.2 shows the detailed criteria and applies them to a sample policy measure from this Budget: 'help to save'. It is expected to cost around £70 million in 2020-21. This measure introduces a regular saver account into which the Government will match an individual's savings at a rate of 50 per cent on monthly balances. The maximum monthly contribution limit is £50 and it has a 2-year term until maturity. Users can then choose to save for a further two year term. This is available to low income earners receiving either working tax credits or equivalent universal credit benefits.

A.11 We consider the modelling for this measure to be a 'high' source of uncertainty as it uses multiple stages of assumptions about the expected number of eligible individuals and when users of the accounts will withdraw their savings.

A.12 The data used consists of two datasets. First, working tax credits administrative data are used, which are relatively certain. Second, the Family Resources Survey is used for the universal credit population. As this is a sample of the population, it is less certain. We consider the data to be a 'medium-high' source of uncertainty.

A.13 The behavioural response consists of two key assumptions to which the costing is highly sensitive. First, the proportion of eligible individuals that will choose to use these accounts. Second, the amount these individuals will save and for how long they will continue to do so. Both are based on information from previous schemes of a similar nature, but still require a large degree of judgement. These behaviours can also be volatile, as demonstrated by previous schemes. We therefore judge this to be a 'high' source of uncertainty.

A.14 Taking all these judgments into account, we gave the costing an overall rating of 'high'.

Table A.2: Example of assigning uncertainty rating criteria: 'help to save'

Rating	Modelling	Data	Behaviour
Very high	Significant modelling challenges Multiple stages and/or high sensitivity on a range of unverifiable assumptions	Very little data Poor quality	No information on potential behaviour
High	Significant modelling challenges Multiple stages and/or high sensitivity on a range of unverifiable assumptions	Little data Much of it poor quality	Behaviour is volatile or very dependent on factors outside the tax/benefit system
Medium-high	Some modelling challenges Difficulty in generating an up-to-date baseline and sensitivity to particular underlying assumptions	Basic data May be from external sources Assumptions cannot be readily checked	Significant policy for which behaviour is hard to predict
Medium	Some modelling challenges Difficulty in generating an up-to-date baseline	Incomplete data High quality external sources Verifiable assumptions	Considerable behavioural changes or dependent on factors outside the system
Medium-low	Straightforward modelling Few sensitive assumptions required	High quality data	Behaviour fairly predictable
Low	Straightforward modelling of new parameters for existing policy with few or no sensitive assumptions	High quality data	Well established, stable and predictable behaviour
Importance	Medium	Medium	High
Overall		**High**	

A.15 Using the approach set out in Table A.2, we have judged eight measures in the scorecard to have 'high' uncertainty around the central costing. Two were judged to have 'very high' uncertainty. Together, these scorecard measures represent 13.0 per cent of those in the Budget by number and 8.3 per cent by absolute value (in other words ignoring whether they are expected to raise or cost money for the Exchequer). In net terms, they are expected to raise the Exchequer £3.7 billion in total over the forecast period. The measures are:

- **'lifetime ISA and raise ISA limit to £20,000'** – this measure receives a 'very high' uncertainty rating. The majority of the Exchequer impact of this measure can be attributed to the introduction of the lifetime individual savings account (ISA). This introduces a new type of ISA into which individuals can save up to £4,000 a year and receive a 25 per cent top-up from the Government. The lifetime ISA is not subject to tax when accessed but there will be a charge on early withdrawals. There is an option to withdraw the full amount for first-time homebuyers. The main source of uncertainty is the behavioural impact, because the cost of the top-up is extremely sensitive to it. In particular, assumptions are made about: the number of people choosing to use the

lifetime ISA; how much they choose to save; and when they choose to withdraw. There is little information that can be used to inform these assumptions and the behaviour is dependent on a variety of other factors, which amplifies the uncertainty;

- 'financial advice markets review: increase tax relief on employer provided pension advice' – this measure receives a 'high' uncertainty rating. This policy increases the value and amount in scope of tax-relieved employer provided pensions advice. The main uncertainty is within the behaviour. Estimating the behavioural impact on this costing requires a number of assumptions to be made, including: the number of new individuals taking up the scheme; the amount current users increase their usage of it; and the potential for rapid growth in the number of users in the initial years. These responses depend on a variety of factors outside the tax system and are difficult to predict. The lack of data on existing users' employer-provided pension advice also contributes to the uncertainty, leading to a 'high' rating overall;

- 'capital gains tax: lifetime limit under employee shareholder status' – this measure receives a 'high' uncertainty rating. From Budget 2016, this introduces a lifetime limit on the capital gains an individual can make on shares acquired through employee shareholder status arrangements that are exempt from capital gains tax. The main source of uncertainty in this costing is from the absence of good quality data on the lifetime gains that may breach this limit. In particular, this costing is sensitive to the size of the upper end of the distribution – those with the highest lifetime gains. Due to the lack of data, assumptions are required to model the affected population. The costing is highly sensitive to changes in these assumptions;

- 'disguised remuneration: tackling historic and new schemes' – this measure receives a 'very high' uncertainty rating. Each component of it is highly uncertain. The measure tackles the use of tax avoidance schemes – often through the use of employee benefit trusts – that affect income tax and national insurance contributions. There is very limited data from which to estimate the size of the tax base, so some unverifiable assumptions are needed to derive it. The behavioural response is arguably even more uncertain, as the measure is targeted at quite aggressive tax avoiders, who can be expected to seek alternative avoidance options. There is also uncertainty over the modelling, which has multiple stages;

- 'stamp duty land tax on additional properties: exemptions' – this measure receives a 'high' uncertainty rating. It makes a number of changes to the Autumn Statement 2015 measure 'stamp duty land tax: higher rates on additional property', which also received a 'high' uncertainty rating. The original costing was based on a highly uncertain tax base and behavioural impact. This means identifying the taxpayers affected by the changes in exemptions cannot be done with any degree of certainty. The costing relies on a number of difficult to verify assumptions and judgements;

- 'value added tax: tackling overseas trader evasion' – this measure receives a 'high' uncertainty rating. It tackles the unpaid VAT from purchases through online marketplaces sourced from outside the European Union. There are two particular

uncertainties. Some elements of the costing have a very high behavioural response. Many of the suppliers that are caught are likely to be replaced by others, while some will restructure their operations through alternative countries or set up as new companies. As with all measures targeting uncollected tax, there is significant data uncertainty. The tax base cannot be precisely estimated and is derived from import data using assumptions and judgement;

- **'off-payroll working: transfer liability to public sector employers'** – this measure receives a 'high' uncertainty rating. The measure targets workers in the public sector engaged through an intermediary, usually a personal service company, which enables them to pay less tax and national insurance contributions. The main source of uncertainty is behaviour, but there is also a lack of good data and some complex modelling. There are a variety of potential behavioural responses, which depend on a number of factors. These are estimated using assumptions and judgement. The uncertainty around data makes it difficult to identify the affected population;

- **'border force: illicit tobacco strategy'** – this measure receives a 'high' uncertainty rating. It provides the Home Office with additional resources. The yield depends on how effective the additional resource will be at stopping illicit tobacco entering the UK. The most uncertain part of the costing is the behavioural element. This includes both a displacement effect, as criminals learn how to circumvent the new strategy, and the response of individuals who will now be forced to buy higher priced duty paid goods. Combined, these effects significantly reduce the estimated yield of the measure;

- **'corporation tax: reform loss relief'** – this measure receives a 'high' uncertainty rating. The measure restricts the amount of brought forward losses a business is able to offset against taxable profits, but it also widens the use of losses from different types of income streams for the same purpose. The yield from this measure is based on uncertain assumptions around the profitability of companies over the scorecard period. In particular, we consider the modelling to be both complex and important for the costing. If companies make higher or lower than expected gross profits over the next few years then the yield from this measure could be considerably higher or lower;

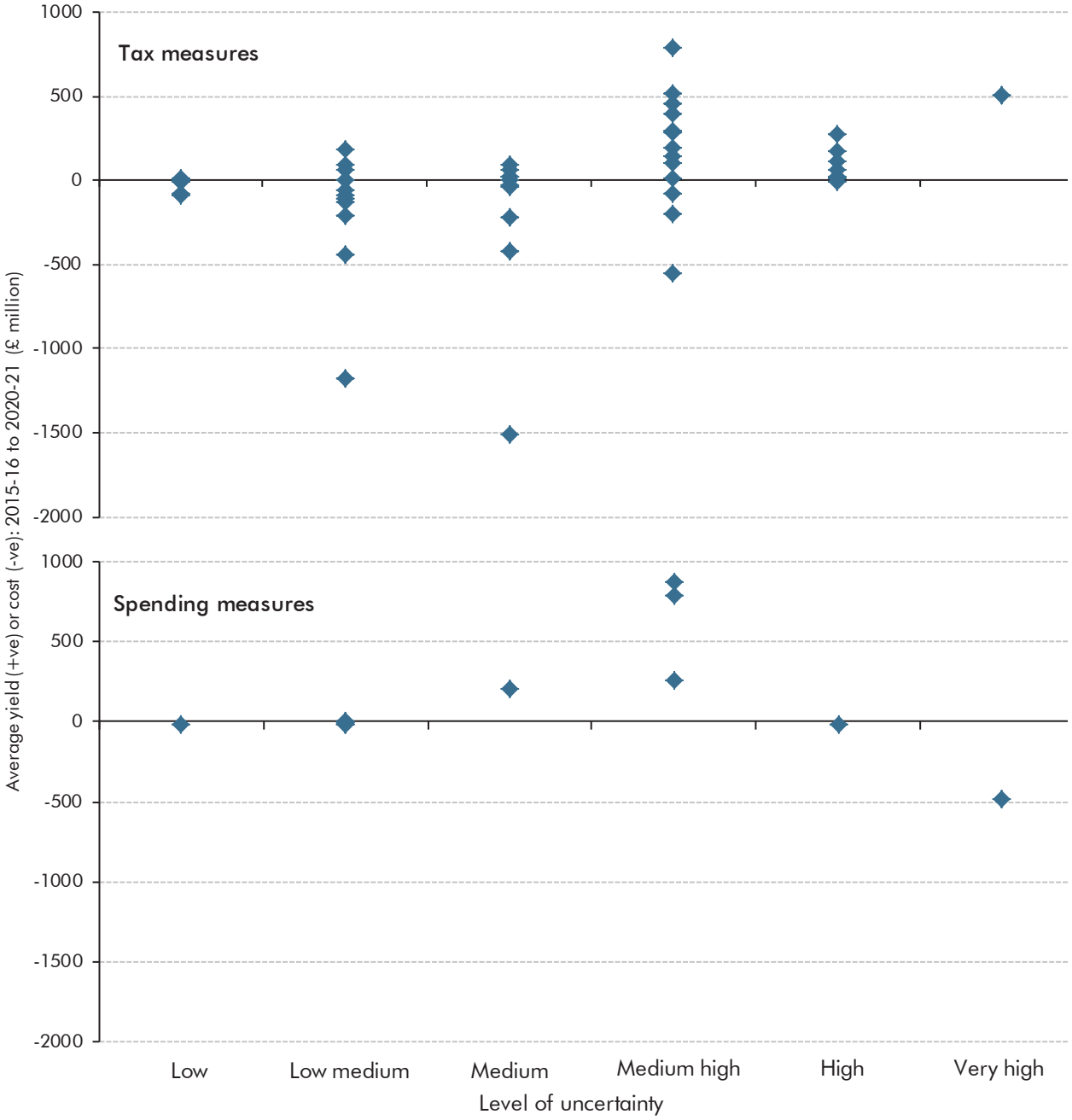
- '**help to save'** – this measure receives a 'high' uncertainty rating. The measure and the sources of uncertainty around it are described from paragraph A.10.

A.16 We have judged 43 scorecard measures to have between 'medium-low' and 'medium-high' uncertainty around the central costing, with a further 9 having 'low' uncertainty. That means that 55.8 per cent of the Budget scorecard measures have been placed in the medium range (79.7 per cent by absolute value) and 11.7 per cent have been rated as low (just 1.2 per cent by absolute value).

A.17 Chart A.1 plots these uncertainty ratings relative to the amount each policy measure is expected to raise or cost. One feature of the distribution of measures by uncertainty is that the spending measures are typically assigned lower uncertainty ratings, while the tax raising measures typically have higher uncertainty ratings than the tax cuts. This is particularly true

for the measures that aim to raise money from companies and from high income and wealth individuals that are already actively planning their affairs to reduce their tax liabilities. This pattern has been apparent in most recent Budgets and Autumn Statements.

Chart A.1: OBR assessment of the uncertainty of scorecard costings



Longer-term uncertainties

A.18 For most policy costings, the five-year scorecard period is sufficient to give a representative view of the long-term cost or yield of a policy change. Typically, that effect is either zero – because the policy has only a short-term impact that has passed by the end of the scorecard period – or it would be reasonable to expect the impact at the end of the forecast to rise broadly in line with nominal growth in the economy thereafter. In this Budget, the final year effects of most scorecard measures are representative of the longer-term cost or yield.

A.19 However, there are six measures where the scorecard costing is not representative of the longer term and where the long-term effects are particularly uncertain. These are:

- '**corporation tax: defer bringing forward payment for large groups for two years**' – this measure changes the start date of a measure announced in the July 2015 Budget. It alters the timing of when large companies pay quarterly corporation tax (CT) instalments. As it has no effect on CT liability, the long-term yield would in effect be zero. Moreover, if CT receipts were recorded in the public finances data in accruals terms – aligned with the timing of the economic activity that gave rise to the liability – rather than cash terms (when the tax is paid) our baseline forecast would change and the yield from this measure within the forecast period would also in effect be zero;

- **'capital gains tax: lifetime limit under employee shareholder status'** – this introduces a lifetime limit on the gains that individuals entering employee shareholder status arrangements can accumulate before being liable to pay CGT. It is expected to raise £35 million in 2020-21. Beyond the scorecard period, the yield is expected to continue rising as gains are realised over time. By the end of the 2020s this could rise to around £200 million a year;

- **'oil and gas: abolish petroleum revenue tax and reduce supplementary charge to 10%'** – this measure reduces the rate of petroleum revenue tax (PRT) from 35 per cent to 0 per cent and the corporation tax supplementary charge from 20 per cent to 10 per cent. Within the scorecard period the cuts in tax rates reduce receipts by an average of £200 million a year. In the longer term, we would expect there to be a yield from the PRT measure when the field is decommissioned since losses are carried back against PRT paid on previous profits. With less PRT paid because of the rate cut, there will be less PRT to be claimed back once fields are decommissioned. Indicative modelling suggests a yield peaking at less than £½ billion in the early 2030s;

- **'corporation tax: reform loss relief'** – this measure restricts the amount of brought forward losses a business can offset against taxable profits, but it also widens the use of losses from different types of income streams for the same purpose. The first element raises yield in the short term by raising taxable profit, but since no losses will actually be disallowed against future use, the long-term yield will erode over time. The second element reduces firms' tax liability, so while the measure raises yield during the scorecard period, by the late 2020s it is expected to generate a cost to the Exchequer;

- **'corporation tax: further restrict use of banks' pre-2015 losses'** – this measure alters the existing bank-specific loss-relief restriction so that the proportion of profits in a year against which losses brought forward by banking companies can be set is reduced from 50 to 25 per cent. This raises around £400 million a year during the scorecard period since banks will be able to use less of their accumulated stock of losses. However, this policy does not disallow losses, so these can still be set against future profit beyond the scorecard period. This policy should be broadly revenue neutral on a company-by-company basis in the long run;

- **'help to save'** – this measure introduces a regular saver account with a government top-up of 50 per cent on monthly balances, a maximum monthly contribution limit of £50, and a 2-year term until maturity. Second term accounts begin to mature beyond the scorecard period, so the cost peaks at around £100 million in 2022-23 when the first group of second term accounts begin to mature. A steady state cost of around £80 million is expected from 2023-24.

Small measures

A.20 The BRC has agreed a set of conditions that, if met, allow OBR staff to put an individual policy measure through a streamlined scrutiny process. These conditions are:

- the expected cost or yield does not exceed £40 million in any year;
- there is a good degree of certainty over the tax base;
- it is analytically straightforward;
- there is a limited, well-defined behavioural response; and
- it is not a contentious measure.

A.21 A good example of a small measure announced in this Budget is the 'aggregates levy: freeze rates'. The aggregates levy is usually increased in line with the retail prices index (RPI). This measure freezes the aggregates levy rate in 2016-17. The yield of this costing is around £5 million a year, and the data used to estimate the tax base are of high quality. The modelling is straightforward as it is a simple change in the levy rates in 2016-17 only. The behavioural effect is negligible as demand for aggregates will not change by a significant amount in response to such a small levy change. It is not considered to be a contentious measure.

A.22 By definition, any costings that meet all these conditions will have a maximum uncertainty rating of 'medium'.

Update on previous measures

A.23 We cannot review and re-cost all previous measures at each fiscal event (the volume of them being simply too great), but we do look at any where we are informed that the original (or revised) costings are under- or over-performing, and at costings that we have previously identified as subject to particular uncertainty. For this forecast we have considered:

- '**tax repatriation from Jersey, Guernsey, and Isle of Man**' – this Budget 2013 measure announced a disclosure facility with the crown dependencies and was originally costed to raise £1,050 million from 2013-14 to 2017-18. This was made up of two main elements: the voluntary disclosure of unpaid past tax liability (which would run from 2013-14 to 2016-17) and an information exchange agreement whereby from 2016 onwards HMRC would receive annual information on UK resident account holders that would generate future compliance yield. We lowered our forecast of the total yield to £800 million in November, but also changed the profile having considered evidence from HMRC on the extent to which any initial yield lost through lower disclosures would be recouped through additional compliance activity in later years. The disclosure facility closed on 31 December 2015 and HMRC has informed us that there were far fewer disclosures than expected. They believe this is due to a number of factors, including HMRC campaigns being less effective and with less coverage than expected and a perceived lack of awareness from those targeted. HMRC is also now less optimistic about how much of the lost yield can be recouped through additional compliance activity, on the basis that they are unlikely to be able to work the higher number of additional cases on top of existing workloads. Taking both factors into account, we have lowered the costing for this measure by a further £530 million;

- '**income tax: transferable marriage allowance**' – take-up for this Autumn Statement 2013 measure has been much lower than initially assumed. We have incorporated a take-up rate of 12 per cent for 2015-16 compared with over 70 per cent in the original costing. We assume that take-up eventually rises to around 50 per cent by the end of the forecast period. Lower take-up is likely to reflect issues with HMRC's IT systems, a lack of awareness of the allowance (e.g. reflecting limited initial advertising) and possibly a reluctance by those eligible to engage with HMRC. The lower take-up rate has boosted receipts by £400 million in 2015-16. The improvement in receipts is smaller in future years, because taxpayers will be able to claim for previous years as take-up increases;

- '**voluntary national insurance contributions**' – the yield from this Budget 2014 measure has been much lower than expected. This measure enabled pensioners to acquire additional state pension in exchange for a lump sum national insurance payment at an actuarially fair price. Take-up has been much lower than expected, although the average amount contributed has been higher. We now expect receipts of around £65 million in both 2015-16 and 2016-17, compared with original estimates of £435 million in both years;

- **pensions flexibility** – receipts from pension withdrawals relating to this Budget 2014 measure are expected to be around £900 million for the whole of 2015-16, around £200 million higher than assumed in the original costing;

- **HMRC digital** – HMRC has announced a number of measures in this area. The Autumn Statement 2013 measure 'HMRC: extending online services' had two elements: putting inheritance tax (IHT) online for customers and agents and a new system allowing charities to register jointly with HMRC and the Charity Commission. The IHT element was originally expected to go live in October 2015, with full coverage from March 2016. We have been told that it will not be fully operational until March 2017. The charities element was due to be implemented from 2015-16, but this has been delayed to April 2017. The Autumn Statement 2014 measure announcing the capital gains tax digital calculator – part of the 'HMRC: operational measures' package – was scheduled for an August 2015 implementation date. HMRC has informed us that this is currently on track. The Autumn Statement 2015 measure 'making tax digital' also remains on track;

- **HMRC compliance** – the large July 2015 Budget package also remains largely on track, although it is too early to assess the effectiveness of the individual measures;

- **tax free childcare** – this was announced as 'additional funding for childcare' at Budget 2014 with a September 2015 start date. It was delayed by 18 months following a legal challenge to the Government's decision to deliver the scheme through National Savings and Investments. A further change to rollout has been announced at this Budget. This keeps the February 2017 start date, but rolls the policy out more gradually between February and September 2017;

- **'error and fraud: additional capacity'** – this measure sought to bring in private sector support for HMRC tax credits compliance activity. It was part of the Autumn Statement 2013 measure 'tax credits: improving collection and administration'. Overall savings from the measure are now around £400 million compared to the original costing of £1.1 billion. This is the same as we estimated in November, reflecting two offsetting factors. Monitoring information shows that actual performance in 2015-16 has been lower than expected, but this is offset by the November reversal in July's tax credits cuts, which increased the tax credits spending forecast and therefore the amount of error and fraud that will be within scope of the measure;

- **Royal Bank of Scotland** – the Government announced that it would raise £5.8 billion in 2020-21 from the sale of RBS shares. The sharp fall in the RBS share price since then means we now expect no sale proceeds in 2020-21;

- **'diverted profits tax'** – this Autumn Statement 2014 measure targeted multinationals that used contrived tax arrangements and was expected to raise around £300 million a year from 2016-17 onwards. Our forecast assumes that yield from the measure will be close to that scored when the measure was announced. However, we now expect that around two-thirds of the yield will come through higher CT payments (as firms

restructure their tax affairs) rather than via the diverted profits tax itself. Yield from multinationals using such tax arrangements is highly uncertain, so we will need to look again at the yield and the split between CT and diverted profits tax in each forecast;

- **partnerships** – the Budget 2013 and Autumn Statement 2013 anti-avoidance measures on partnerships were due to yield £1 billion in 2015-16. Preliminary data from January income tax self-assessment returns suggest partnership income did not grow as strongly as expected. We will return to this in our next forecast.

Departmental spending

A.24 We do not scrutinise costings of policies that reallocate spending within departmental expenditure limits (DELs) or the DEL implications of measures that affect receipts or AME spending. Instead, we include the overall DEL envelopes for current and capital spending in our forecasts, plus judgements on the extent to which we expect them to be over- or underspent in aggregate. DEL totals were set in November's Spending Review, and have been adjusted in this Budget. We have assumed underspending relative to those totals across the forecast.

A.25 We also discussed with the Treasury the process by which it would cut departmental spending in 2019-20 relative to the firm plans that were set in November's Spending Review, given the role that those cuts would play in the Government achieving its desired budget surplus in that year.

A.26 In the July Budget and November Autumn Statement, we asked the Treasury to provide assurance on the funding of a number of HMRC and DWP operational measures. For this forecast, we checked again that these had been fully funded.

A.27 For this Budget, we have sought assurance from the Treasury on the funding of a number of measures. It has confirmed that the measures below have been funded on the scorecard up to and including 2018-19 (2019-20 for 'border force: illicit tobacco strategy'). It has also confirmed that from 2019-20 onwards, funding for these measures will be prioritised in the next Spending Review. The measures are:

- **'value added tax: tackling overseas trader evasion'**: £24 million to HMRC to recruit staff in 2017-18 to support the collection of unpaid VAT from online purchases;

- **'disguised remuneration: tackling historic and new schemes'**: £19 million to HMRC to recruit staff across 2018-19 to 2020-21 to support legislation tackling disguised remuneration tax avoidance schemes;

- **'offshore property developers: tackle avoidance and evasion'**: £7 million to HMRC to recruit staff in 2016-17 for operational activity against property-related tax avoidance and evasion using offshore structures;

- **'DWP and HMRC operational and policy measures'**: £22 million to DWP to recruit presenting officers across 2016-17 to 2017-18 to support the department in personal independent payments and employment and support allowance tribunals;

- **'border force: illicit tobacco strategy'**: £31 million to Border Force to recruit officers to improve the seizure of illicit tobacco at customs ports; and

- **'landfill tax: tackling waste crime'**: £2 million to HMRC to recruit operational staff from 2016-17 to work on landfill tax evasion.

Indirect effects on the economy

A.28 This Budget contains a number of policy changes that we have judged to be sufficiently large to justify adjustments to our central economic forecast. These include:

- **fiscal policy** – the Government has loosened fiscal policy in the short term, reflecting net tax reductions and increases in DELs, both current and capital. The Government has then increased the pace of fiscal tightening significantly in 2019-20, accounted for by net tax increases and lower spending on welfare, public services and capital investment. To reflect these changes in our economy forecast we have applied the same 'multipliers' we have used in previous forecasts. These are larger the shorter the period is between a policy being announced and implemented. They imply a 0.1 per cent point boost to real GDP growth in 2017-18 and 0.1 per cent point reductions in both 2018-19 and 2019-20. These effects are sufficient to push the economy slightly above its potential level in 2017 and 2018 and slightly below in 2019, with the output gap closing by the end of 2020. The Government adjusted its plans for capital investment in 2020-21 after we closed our economic forecast. At this horizon we would assume that the multiplier has tapered to zero, so incorporating this adjustment would have no effect on our forecast for real GDP, although it would have had a small effect on the composition of expenditure;

- '**corporation tax: reduce to 17% in April 2020**' and '**corporation tax: restrict relief for interest**' – these two measures are expected to affect the cost of capital faced by firms and therefore business investment. The first is expected to lower the cost of capital but the second – which restricts the amount of corporate interest payments that affected groups will be allowed to offset against corporation tax liability – will raise the cost of capital. We also adjusted our forecast to reflect one additional measure, but the Government informed us that it would not be going ahead after our final economy forecast had been closed. As a result, our business investment forecast is around 0.5 per cent higher in 2020-21 than would be consistent with the final policy package announced in the Budget;

- '**removing employer tax advantage of different forms of remuneration: pay-offs over £30,000**' – this will impose employer National Insurance Contributions on termination payments over £30,000. In the near term we expect the additional cost to employers to be reflected in lower wages and profit margins, with the majority of the cost passed

through to wages by the end of the forecast period. This implies a reduction in total wages and salaries of 0.1 per cent by 2020-21;

- '**lifetime ISA and raise ISA limit to £20,000**' – this introduces a new ISA product for the under-40s, described above. Holders of lifetime ISAs will be allowed to make 100 per cent withdrawals for first-time house purchases up to £450,000. This is more likely than not to lead to higher demand for the relatively fixed supply of housing in the UK, and so to higher prices. We have therefore added 0.3 per cent to the level of house prices by the end of the forecast, although the effect of this policy is highly uncertain;

- '**soft drinks industry levy**' – on the basis of the Government's revenue target for this levy, this implies rates of 18 pence or 24 pence per litre unit charge according to sugar content, which we expect to be passed entirely onto the price paid by consumers. It is expected to add around a quarter of a percentage point to CPI and RPI inflation in 2018-19;

- **other measures affecting inflation** – we have also made small adjustments for several other policies. The effects of these measures are small and broadly offsetting, and taken together imply almost no change to our CPI forecast. Measures that are expected slightly to increase CPI inflation across the forecast period include 'hand-rolling tobacco: increase by RPI plus 5%' and 'insurance premium tax: increase by 0.5% in September 2016', 'value added tax: tackling overseas trader evasion' and 'value added tax: extend reverse charge to electronic communications services'. Other policies are expected to reduce CPI inflation slightly, including 'fuel duty: freeze in April 2016' and 'alcohol duty: freeze for beer, spirits and cider'. The 'business energy: abolish carbon reduction commitment and offsetting increase to climate change levy' measure is also expected to lower inflation: while the net effect of these energy policies is to increase costs for medium sized companies, they reduce costs for large companies that make up a higher proportion of turnover. We expect this fall in costs to be passed through to consumers; and

- **measures affecting housing associations' finances.** We expect these measures to affect housing associations' future housebuilding decisions, reducing total residential investment by 0.7 per cent by 2020-21.

B Fiscal forecast revisions

Introduction

B.1 Much of the material we present in each *Economic and fiscal outlook (EFO)* discusses how and why our forecasts have changed since the previous *EFO*. In this annex, we:

- describe the **approach we take to breaking down changes in our fiscal forecast** between classification changes, the results of our own forecast judgements and the consequences of decisions taken by the Government (from paragraph B.3);
- review the **average size and direction of our underlying fiscal forecast revisions** since 2010, and explore the main drivers of those changes and their composition (from paragraph B.16); and
- summarise **how the Government has responded** when we have presented different changes in the underlying fiscal forecast that forms the basis of decisions taken at each Budget and Autumn Statement (from paragraph B.29).

B.2 The analysis presented in this annex draws on a new database that we have compiled, which decomposes all our fiscal forecast revisions since 2010. We will update it after each forecast and it will be available on our website.

Decomposing changes between forecasts

B.3 The starting point for this annex is the diagnostic tables that we have included in each of our *EFOs* since November 2010. These decompose changes in receipts, spending and borrowing forecasts since the previous *EFO*. The tables are built from individual forecasts: the sources of changes to public sector net borrowing (PSNB) are derived from the receipts and spending tables, which are in turn compiled from the individual receipts and spending lines that make up each total. Where changes to an individual receipt or spending line are large or unusual, we present a dedicated table for that item. These 'forecast diagnostics' form an integral part of the scrutiny process that we undertake when producing each fiscal forecast – they often provide the initial signal that there is an issue in a forecast model or that a forecast judgement needs to be reviewed.

Methodology

B.4 To construct the new database, we have aggregated the information contained in the diagnostic tables from past forecasts into three categories:

- **classification changes**: these are typically the result of decisions taken by the Office for National Statistics (ONS) since the previous forecast;

- **underlying forecast changes**: these are the result of our own judgements about how our forecasts should change in light of new information since the previous forecast; and

- **policy changes**: the results of Government decisions that are announced in each Budget and Autumn Statement, or in the period since the previous fiscal event.

Classification changes

B.5 When discussing forecast changes, we try to isolate the effect of classification changes and significant one-off factors in order to present a 'like-for-like' picture of how the public finances have evolved. This is usually the first step in the process – for example, our November 2015 *EFO* focused on underlying forecast changes since the previous forecast in July, after first stripping out the effect of a reclassification of housing associations from the private to the public sector. In our new database, we have removed the effects of major classification changes and other one-offs (for example, the changing treatment of the Asset Purchase Facility) from each forecast-to-forecast change. But we have not attempted to restate all our previous forecasts on the basis of current definitions and classifications, which would be a much bigger task.

B.6 Table B.1 details the classification and other one-off effects that have been accounted for explicitly in this analysis. The biggest items relate to transfers from the Royal Mail Pension Plan and Asset Purchase Facility in 2012, the major overhaul of economy and public finances data in 2014 (which affected both receipts and spending, but with only a small net effect on PSNB) and the reclassification of housing associations to the public sector last year. More detail on each can be found in the relevant *EFO*. It should be noted that while this analysis captures all the material classification changes and one-offs, we have not identified all the smaller changes that have taken place over the past six years. The effect of these changes will therefore be included in the underlying forecast changes.[1]

[1] We have focused on headline measures of the deficit as defined by the ONS. From November 2010 to March 2014, this was 'public sector net borrowing excluding financial interventions'. From December 2014 onwards, it has been 'public sector net borrowing excluding public sector banks'. Between March 2013 and March 2014, our *Economic and fiscal outlooks* focused on an 'underlying' measure of PSNB that removed the effect of APF and Royal Mail transactions that were particularly large and uneven from year to year. The treatment of these changed following the ONS 2014 review of the public sector finances statistics and the introduction of the 2010 European System of Accounts. In this annex and the database on our website all changes are shown on the basis of the headline PSNB measures.

Table B.1: Classification changes and one-offs factored into the revisions analysis

Fiscal event	Headline PSNB effect over the last five years of the forecast (£ billion)	Headline average PSNB effect (per cent of GDP)	Classification effects and one-off adjustments
November 2011	5.0	0.1	3G spectrum auction proceeds classification change.
March 2012	-28.0	-0.3	Royal Mail Pension Plan transferred to the public sector (ESA95 treatment).
December 2012	-52.2	-0.6	Reclassification of B&B and NRAM into the public sector and transfers from the APF to the Exchequer.
December 2013	0.0	0.0	Changes to ROCs methodology affecting receipts and spending.
December 2014	-2.1	0.0	ESA10 and PSF review classification changes.
March 2015	6.6	0.1	Multilateral development bank subscriptions added to spending, plus various other changes.
July 2015	0.0	0.0	Tax litigation provision switched from receipts to negative spending.
November 2015	10.6	0.1	Reclassification of housing associations into the public sector and other small changes.

Underlying forecast changes

B.7 When producing our forecasts, we start by producing a 'pre-measures' forecast, to which the effects of the Government's policy decisions are added. In compiling the database the process was reversed, so that after accounting for the effects classification and policy changes, we are left with the underlying forecast change. These are the changes that reflect our own forecast judgements. They include the effects of changes in outturn data, revisions to our economy forecast, and judgements about how the public finances will perform in a given state of the economy, which we typically refer to as fiscal modelling changes.

B.8 Underlying forecast changes also include the effects of any revisions to the amount policy measures announced at previous fiscal events are expected to cost or yield. So, for example, the shortfall in receipts from the Swiss capital tax announced in Autumn Statement 2012 contributes to downward revisions to underlying receipts in subsequent forecasts while the lower-than-expected cost of the marriage tax allowance announced in Autumn Statement 2013 and amended in Budget 2014 has contributed positively to receipts in this forecast.

Policy changes

B.9 In order to isolate the effect of Government decisions on our forecast, we need first to define a 'decision'. In some cases this is simple, but in others there are different options. In this annex, we define 'policy changes' as:

- **scorecard measures**: changes to receipts and annually managed expenditure (AME) that result from policy measures presented on the Treasury's 'scorecard' table of policy decisions. We reproduce the scorecard in Annex A of each *EFO*;

- **non-scorecard measures**: changes to receipts and AME spending that we have identified as policy changes in an *EFO* despite the Treasury choosing not to present them on the scorecard. The Treasury sometimes tries to justify this because the policy measure raises or reduces spending and receipts in equal measure, and therefore has no net effect on PSNB. One example is when additions to council tax were announced in November 2015 to finance higher local authority spending on social care;

- **changes to departmental expenditure limits** (DELs): these include all changes that do not reflect our own judgements about underspending against plans or neutral switches of spending between DEL and AME within total managed expenditure (TME). As discussed below, this definition is consistent with how we now present DEL changes, but differs from the presentation in our earlier forecasts; and

- **the indirect effects of Government decisions**: for example, how changes in departmental spending affect our assumptions about workforce growth and so net public service pensions spending. We have identified these explicitly since March 2015, but have not gone back to estimate such effects in previous forecasts.

B.10 Within TME, DEL spending is the element over which the Government has the greatest discretion. It is typically set out in multi-year spending plans – as in last November's Spending Review, which set plans up to 2019-20 and in some cases 2020-21. So one would expect most changes in DELs to be the result of Government decisions.

B.11 During the last Parliament, the Coalition Government initially set DEL plans to 2014-15 and then extended them to 2015-16. But by the final forecast of the Coalition's term, the forecast period extended to 2019-20, so DELs in four of the five years of the forecast were set by Government assumption rather than detailed plans. The Coalition deployed an increasingly complicated assumption – first described as a 'spending assumption', then as a 'fiscal assumption expressed in terms of TME' – from which the future path of Resource DEL (RDEL) was inferred.[2] A separate – and also complicated – rule determined Capital DEL (CDEL) spending.

B.12 In our *EFOs*, we described the roundabout way in which the Government changed its spending assumption to set the overall level of TME, and what that implied for RDEL after subtracting our forecast for AME spending and the CDEL spending determined by the Government's rule. It meant, for example, that if applying our new GDP deflator forecast to the previous formulation of the spending rule changed the level of implied RDEL spending, we described that as a forecast change. While that was a true reflection of the process, it ignored the fact that all the information was available to the Government when setting the rules, so in effect the rules were just a presentational device for telling us what it assumed it would wish to spend on DELs beyond the years covered by detailed plans.

[2] In March 2015 we published a compendium of the spending assumptions that had been used between 2011 and 2015, which is available on our website.

B.13 Since July 2015, we have adopted a more transparent approach of showing all changes in DELs in our forecast as the result of Government policy decisions, except where they are the consequence of our own judgements about the extent to which departments will underspend the limits set for them by the Treasury. In the database produced for this annex, we have derived DEL policy changes in all forecasts on this basis: removing from total DEL changes any movements in our underspend assumptions and any switches with AME spending.

Measuring changes over a multi-year forecast period

B.14 Before turning to the analysis, we need to make one more decision: how to express overall changes in our forecast over a multi-year period. Should we average the changes across years? Sum them? Express them as a percentage of spending or receipts, or of national income? Since the factors driving those changes may vary from year to year, a single metric may not always be the most appropriate. In the database and this annex, we have focused on two:

- the **change as a percentage of GDP** over the forecast period. This is our preferred metric as it corrects for the upward trend in cash revisions over time and through each forecast period that results from nominal GDP growth. To abstract from changes in nominal GDP between forecasts – and the fact that the receipts forecast tends to move with GDP – this is calculated by summing total cash changes then expressing that total as a percentage of total GDP produced over the forecast period. It is not equivalent to averaging the changes in receipts and spending as a share of GDP; and

- the **cumulative cash revision** over the forecast period. This is perhaps the simplest metric and can be useful when revisions are uneven across years, meaning that an average or the final year of the forecast can be misinterpreted or may not be representative. But it does have the drawback of generating numbers that appear large when not placed in the context of the UK's £2 trillion economy or the Government's £¾ trillion annual spending. That was apparent in the discussion of the £27 billion cumulative downward revision to our PSNB forecast last November, which as this annex shows was in fact one of the smaller revisions we have made.

B.15 For both metrics, we focus on changes over the 5-year forecast period, excluding any revisions to the current year forecast. As our *Forecast evaluation reports* have shown, revisions to current year forecasts can also be material, but they are less comparable across all our forecasts. When producing a forecast alongside an Autumn Statement, we typically have information about seven or eight months of the fiscal year. At Budget time, we have ten months of official data and some administrative data for the eleventh month of the year.

Summary of underlying fiscal forecast revisions since 2010

B.16 We have published 15 forecasts since the OBR was established in June 2010, including the interim OBR's pre- and post-Budget forecasts in June 2010 itself. In this section, we analyse the underlying fiscal forecast revisions in the 13 forecasts published since that final June 2010 forecast, including our latest forecast described in this *EFO*. We start by looking at the average size of revisions, abstracting from their direction. We turn to that question next, before considering how they relate to changes in our economy forecast.

The average size of fiscal forecast revisions

B.17 The two panels of Chart B.1 present our underlying pre-policy-measures forecast revisions in absolute terms – ignoring whether the revision was up or down. The top panel presents revisions on our preferred metric as a percentage of GDP and the bottom in cumulative cash terms. Past spring and summer budget forecast revisions are shown in light blue, autumn statement revisions in dark blue and the latest forecast in yellow. They show that:

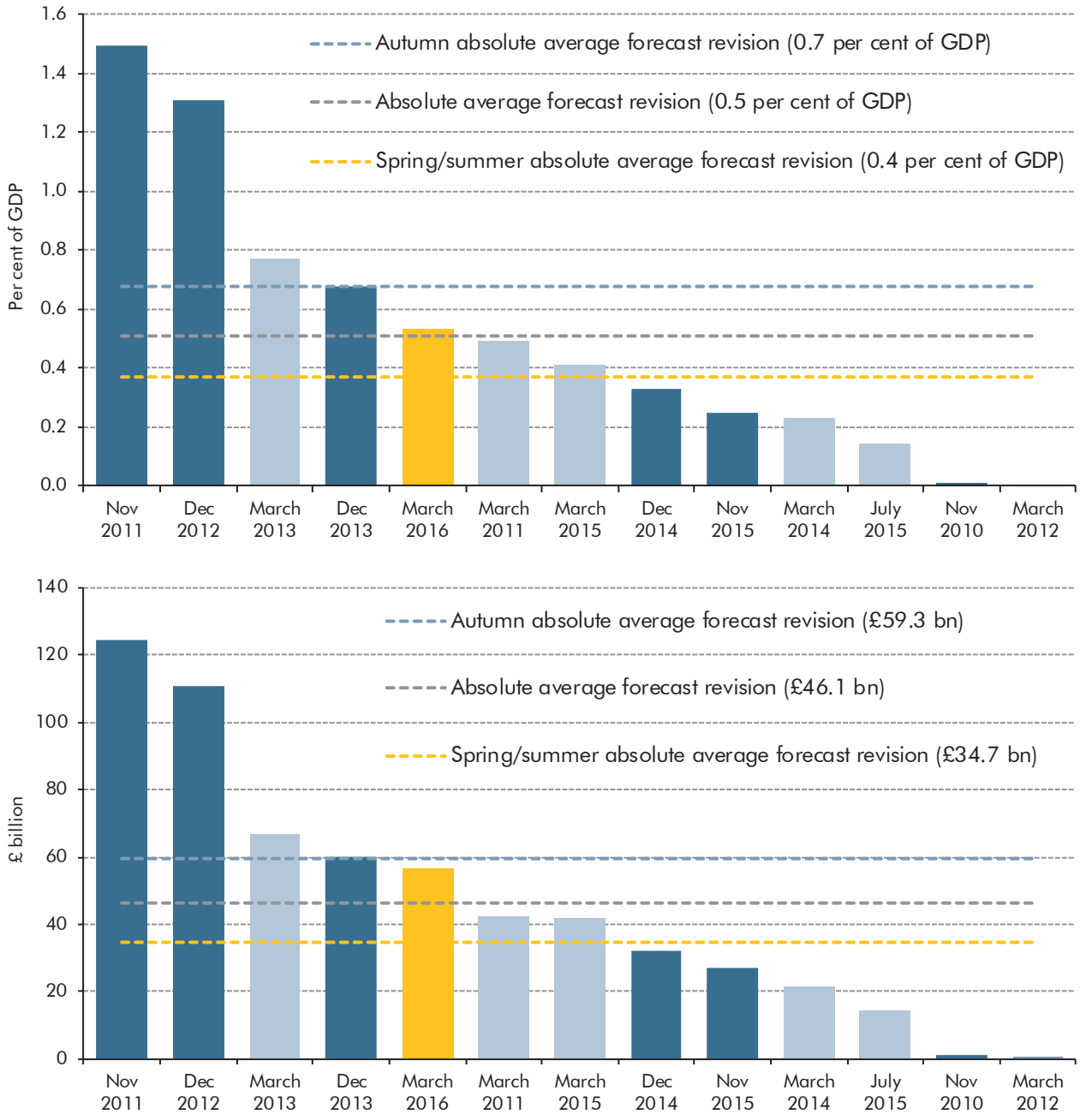
- on average, we have **revised our underlying borrowing forecast** by 0.5 per cent of GDP over the five years of the forecast period at each fiscal event. In cumulative cash terms, the average revision has been £46.1 billion;

- **revisions to Autumn forecasts are typically bigger than those at the time of Budgets.** One reason is that more time has passed since the previous forecast, during which news about the economy and public finances accumulates. The average revision to Autumn forecasts is 0.7 per cent of GDP (or £59.3 billion in cumulative cash terms), compared to 0.4 per cent of GDP (or £34.7 billion) for Budget forecasts;

- **changes in the November 2010 and November 2015 forecasts were small relative to other Autumn forecasts**, partly because both followed a post-election Summer Budget which meant that less time had elapsed since the previous forecast. If we control for that effect by dividing the revisions by the number of months since the previous forecast, Budget and Autumn forecasts both show average revisions per month that has passed of almost £10 billion cumulatively over the forecast period; and

- the **underlying revision in our current forecast is close to the average size** of all past forecasts, although it is the second biggest revision in a Budget forecast.

Chart B.1: Absolute underlying forecast revisions



Source: OBR

The direction of underlying fiscal forecast revisions

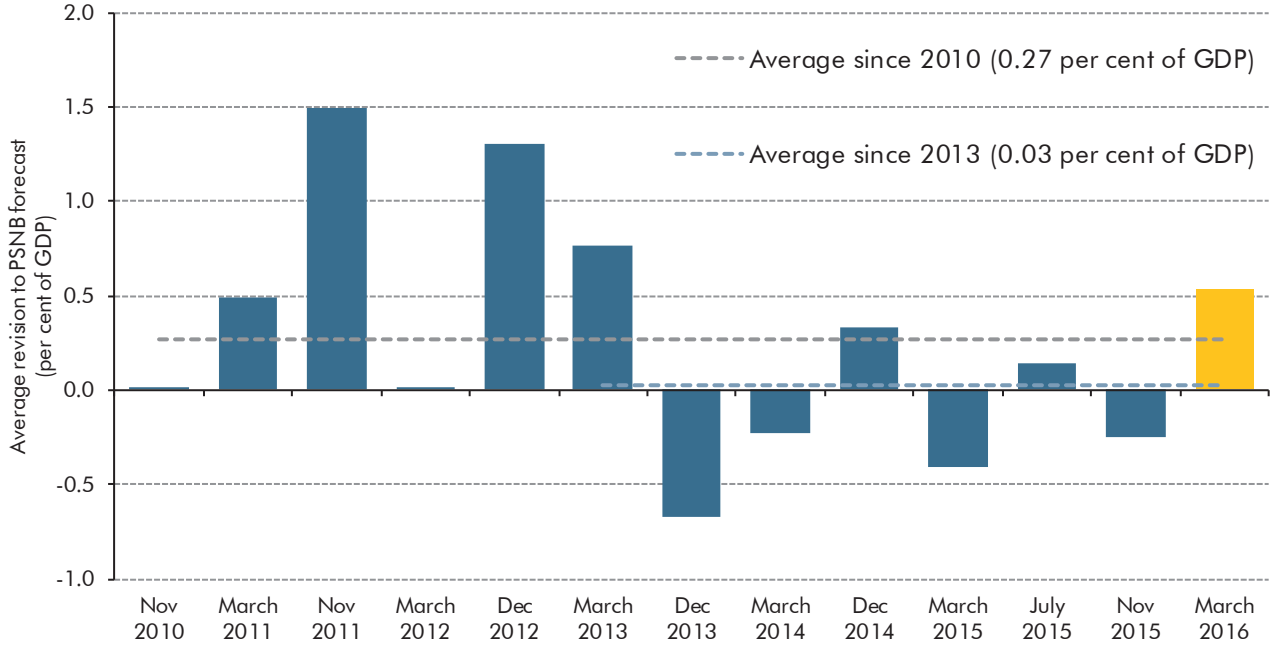
B.18 We aim to produce central forecasts, so over the long term we should expect upward revisions about as often as downward revisions, and the scale of those changes should be broadly offsetting. Over the relatively short period covered by Chart B.2:

- we have **revised our borrowing forecast up on average** by 0.3 per cent of GDP (or £23.0 billion in cumulative cash terms) in each forecast since November 2010. Nine forecasts have included upward revisions and four downward revisions;

- **our average upward revision** of 0.6 per cent of GDP (£49.9 billion) has been around 50 per cent **bigger than our average downward revision** of 0.4 per cent of GDP (£37.6 billion); and

- **the biggest upward revisions came in our earlier forecasts**, in particular those published alongside the Autumn Statements in 2011 and 2012. Since 2013, our forecast revisions have averaged close to zero, with upward revisions (including in this forecast) broadly offsetting downward revisions.

Chart B.2: Underlying revisions to borrowing forecasts



Source: OBR

What drives our fiscal forecast revisions?

B.19 Having reviewed the average size and direction of our underlying fiscal forecast revisions, we now consider the factors that have led to those revisions. By far the most important driver is changes to our economy forecast. But we also make a number of judgements about how the public finances will evolve for a given state of the economy. Changes in these judgements can sometimes have a material effect on our fiscal forecasts.

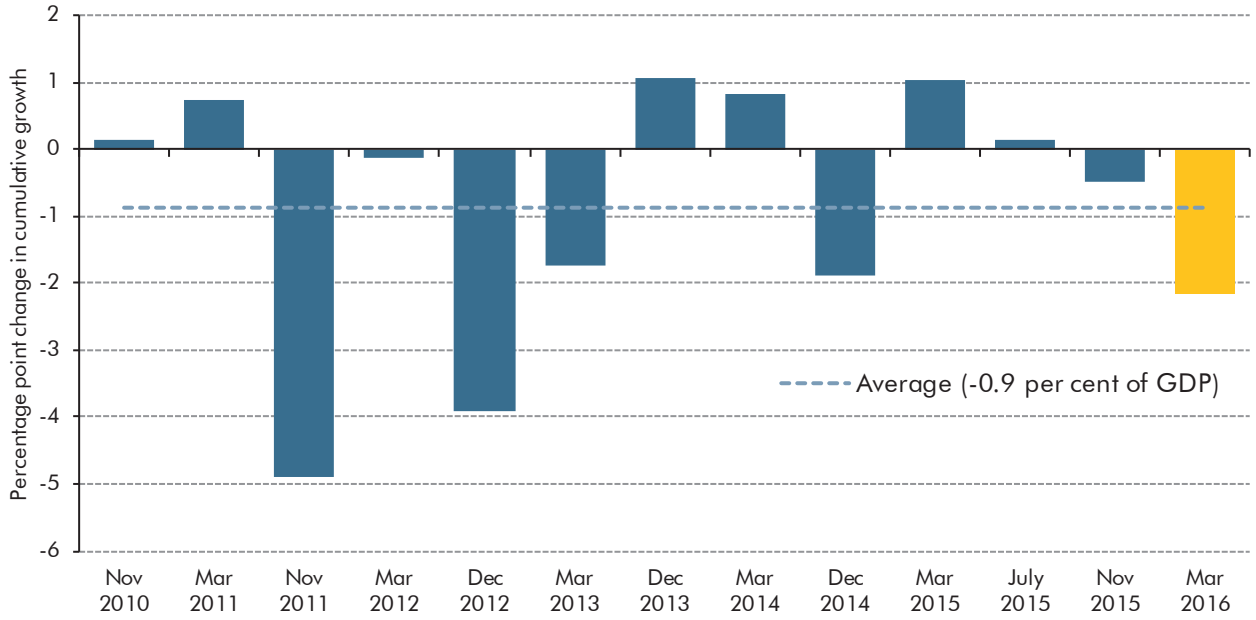
Economy forecast changes

B.20 Most economic forecasts focus on the outlook for real GDP, but it is nominal GDP that matters most when forecasting the public finances. Forecasts of tax receipts are particularly dependent on the profile and composition of economic activity. On the income side, labour income is generally taxed more heavily than company profits. On the expenditure side, consumer spending is subject to VAT and other indirect taxes while business investment attracts capital allowances that reduce corporation tax receipts in the short term. And while around half of public sector expenditure is set out in multi-year plans, large elements (such

as social security and debt interest payments) are linked to developments in the economy – notably inflation, market interest rates and the labour market.

B.21 Chart B.3 shows the revisions to our nominal GDP growth forecasts. In absolute terms, the average revision to cumulative nominal GDP growth over each 5-year forecast horizon has been 1.5 percentage points. We have made downward revisions more often than upward ones, and also by bigger margins, so that the average revision has been down by 0.9 percentage points. It is also apparent that the pattern of upward and downward revisions across forecasts is similar to that of the PSNB forecasts shown in Chart B.2. That relationship is shown more clearly in Chart B.5 below.

Chart B.3: Revisions to nominal GDP forecasts



Source: OBR

B.22 Chart B.4 decomposes these revisions into real GDP (which in turn reflects our estimates of the economy's underlying output potential and the amount of spare capacity – the 'output gap' – relative to that potential) and whole economy prices. It shows that:

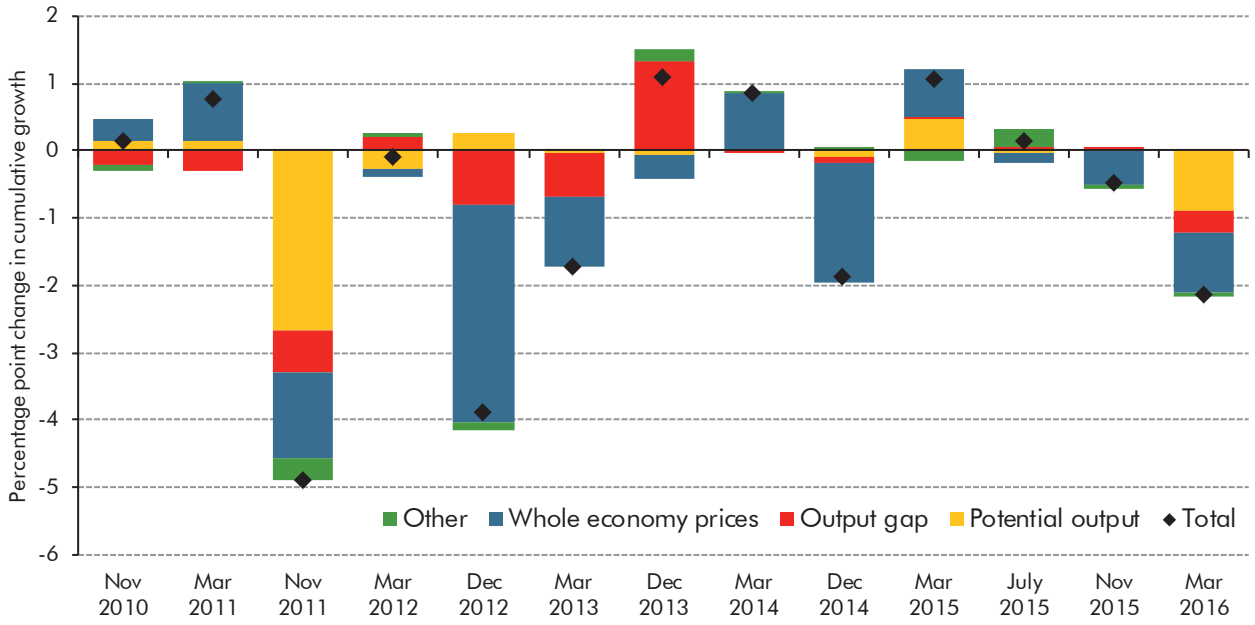
- revisions to **potential output growth** and the contribution from changes in the **output gap** have generally been small. Both average 0.4 percentage points in absolute terms since November 2010. For potential output in particular, we have tended to make discrete changes when sufficient evidence has built. That includes the big downward revisions to underlying productivity growth in November 2011 and (to a lesser extent) in this forecast, and the migration-driven upward revision in March 2015. Revisions to the output gap profile were most important between December 2012 and December 2013, when we initially assumed that a large negative output gap would persist at the end of the forecast period, then revised that judgement away in December 2013;

- revisions to **whole economy prices**, as measured by GDP deflator growth, have been a bigger source of revision to our nominal GDP growth forecasts, averaging 0.9

percentage points in absolute terms. Some of these revisions have followed changes to our forecast assumptions and methods, including the big downward revisions in December 2012 (a re-evaluation of our medium-term assumptions for the GDP deflator) and December 2014 (changes to how we forecast the government consumption deflator as well as a revision to our CPI inflation forecast); and

- **other factors** in this chart relate to oil production – since we estimate potential output on a non-oil basis – and the treatment of the 'basic price adjustment' and 'statistical discrepancy' in each forecast.

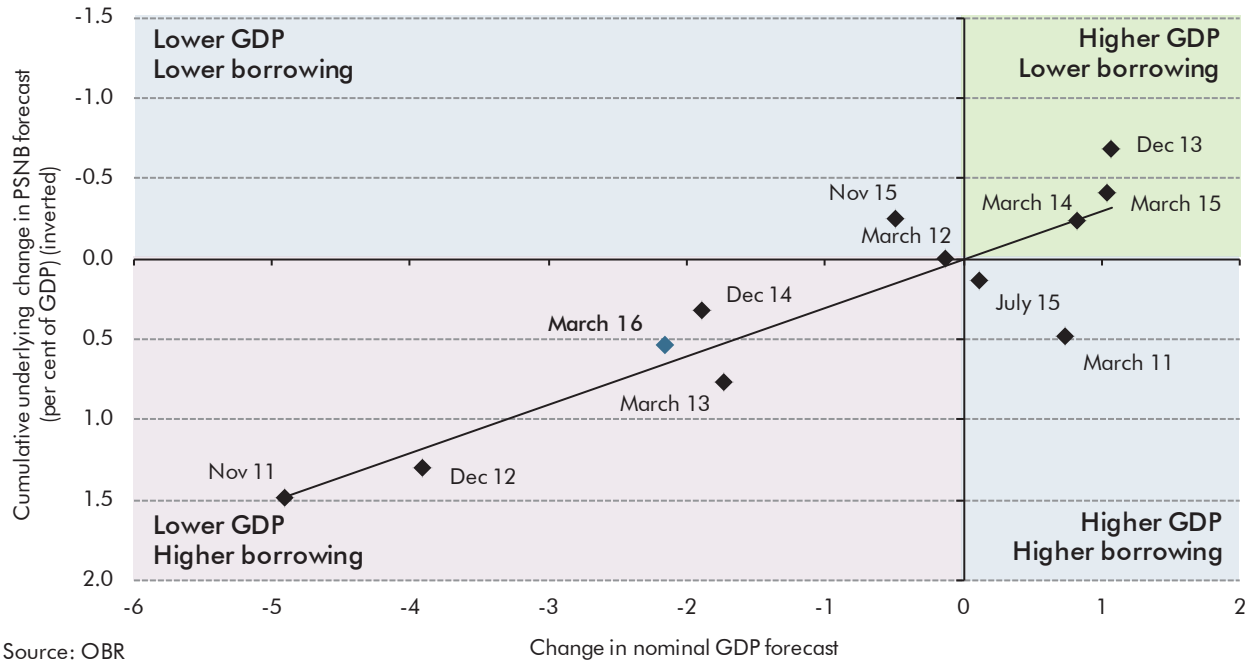
Chart B.4: Sources of revisions to successive nominal GDP forecasts



Note: Our November 2011 forecast incorporated the effects of an ONS methodological change to estimating the GDP deflator, which meant that all else equal real GDP growth was 0.2 percentage points higher for a given rate of nominal GDP growth. We have adjusted the decomposition of that forecast revision to show it on a like-for-like basis.
Source: OBR

B.23 Chart B.5 shows the close correlation between our economy and fiscal forecast revisions. When we revise down prospective GDP growth, we tend to revise up our borrowing forecast, and vice versa. In statistical terms, around 80 per cent of the variation in revisions to our borrowing forecasts is explained by variation in those to our nominal GDP forecasts. That falls to around two-thirds when compared with revisions to our real GDP forecasts, on which most people focus. That said, we have produced three forecasts in which the revisions to borrowing and nominal GDP have moved in the same direction rather than in opposite directions.

Chart B.5: Underlying changes in borrowing and nominal GDP revisions



Source: OBR

Modelling changes and other forecast judgements

B.24 While economy forecast judgements are usually the biggest driver of changes in our fiscal forecast, the judgements we make about how receipts and spending will perform in a given state of the economy can also be important. For example, judgements about the distribution of labour income will affect our receipts forecast, since higher earners pay a higher effective tax rate per pound of earnings, while judgements about the performance of ongoing reforms to the welfare system will affect our spending forecast. Changes of this sort are sometimes previewed when we present related analysis in our other documents, in particular the annual *Forecast evaluation report (FER)* and *Welfare trends report (WTR)*.

B.25 Modelling changes and other forecast judgements can lead us to raise or lower our borrowing forecasts. Some of the bigger changes that increased borrowing include:

- in December 2014, we revised our forecasts for the **PAYE and NICs effective tax rates** down, lowering receipts by £17.0 billion over the forecast period. That reflected weaker-than-expected receipts in 2014-15 (implying a lower effective tax rate for a given amount of labour income) as well as the incorporation of analysis from our October 2014 *FER*, which highlighted that employment driven income growth (which is less tax rich) had been a source of forecast error in previous years;

- also in December 2014, we revised up our forecast for spending on **disability benefits**. That followed analysis presented in our October 2014 *WTR* of how the reforms replacing disability living allowance with the new personal independence payment had continued to disappoint against the savings factored into our forecast. That increased spending by £3.7 billion over the forecast period. We revised disability benefits spending up again in November 2015, adding a further £7.0 billion over the forecast

period, and have done so once more in this forecast, increasing spending by £5.4 billion over the forecast period. The effect of these revisions on successive forecasts are shown in Chart 4.10 in Chapter 4;

- in a similar vein, expected savings associated with reforms to **incapacity benefits** also fell short of initial forecasts. We revised up spending on incapacity benefits by £8.0 billion over the forecast period in December 2013. In March 2014, it was revised up again, by a smaller £2.6 billion over the forecast period. Then in December 2014, we revised our forecast up once more, increasing spending by £3.1 billion over the forecast period;

- in July 2015, we changed the methodology we use to forecast **net spending on public sector pensions**. Previously, for years beyond the existing Spending Review period, we had assumed no change in the workforce since no plans had existed. We felt that it would be more consistent with the rest of our forecast if we linked workforce assumptions in the public sector pensions forecast to the general government employment path derived from departmental spending totals and public sector pay policy. Since that implied falling workforce numbers and lower contributions to pensions schemes, it pushed net spending up by £11.1 billion; and

- in December 2014, we revised our assumption for the underlying downward trend in tobacco clearances from 2 per cent to 4 per cent a year, reflecting weakness in tobacco receipts and the effects of the EU tobacco products directive. This change reduced **tobacco duty receipts** by £4 billion over the forecast.

B.26 Some of the bigger changes that reduced borrowing include:

- in December 2012, we introduced an assumption of **underspending against DELs**. That followed analysis presented in our October 2012 *FER*, which showed that a significant source of error in our previous spending forecasts had been to underestimate the extent of underspending against plans. The underspending assumptions only applied to years in which plans had been set (up to 2014-15, the end of the 2010 Spending Review period). Over the 2012-13 to 2014-15 period, the new assumptions reduced borrowing by £12.7 billion;

- also in December 2012, we revised up the extent of expected **net additions to local authorities' current reserves**, which our 2012 *FER* analysis identified as another significant source of error in our spending forecasts. We had previously expected tighter budgets to prompt local authorities to draw on their reserves, but in fact the uncertainty over future budget cuts appeared to have prompted additions to reserves. That change reduced borrowing by £6.2 billion over the forecast period;

- in preparing our October 2015 *FER*, we discovered an error in our historic VAT forecasts relating to **VAT deductions to the government sector**, which meant that previous *EFO*s had been over-forecasting those deductions. We corrected this error in our November 2015 forecast, which boosted VAT receipts and therefore reduced

borrowing by £11.1 billion over the forecast period. We have retained this corrected forecast methodology in our latest forecast; and

- also in November 2015, we switched our **NICs forecast** to an improved forecasting model. The new model is more transparent, allowing us to scrutinise forecast changes more effectively, and produced a more plausible forecast for the amount of income being taxed above the upper earnings limit. That change boosted NICs receipts and therefore reduced borrowing by £6.6 billion over the forecast. We have continued to use this improved NICs forecast model in our latest forecast.

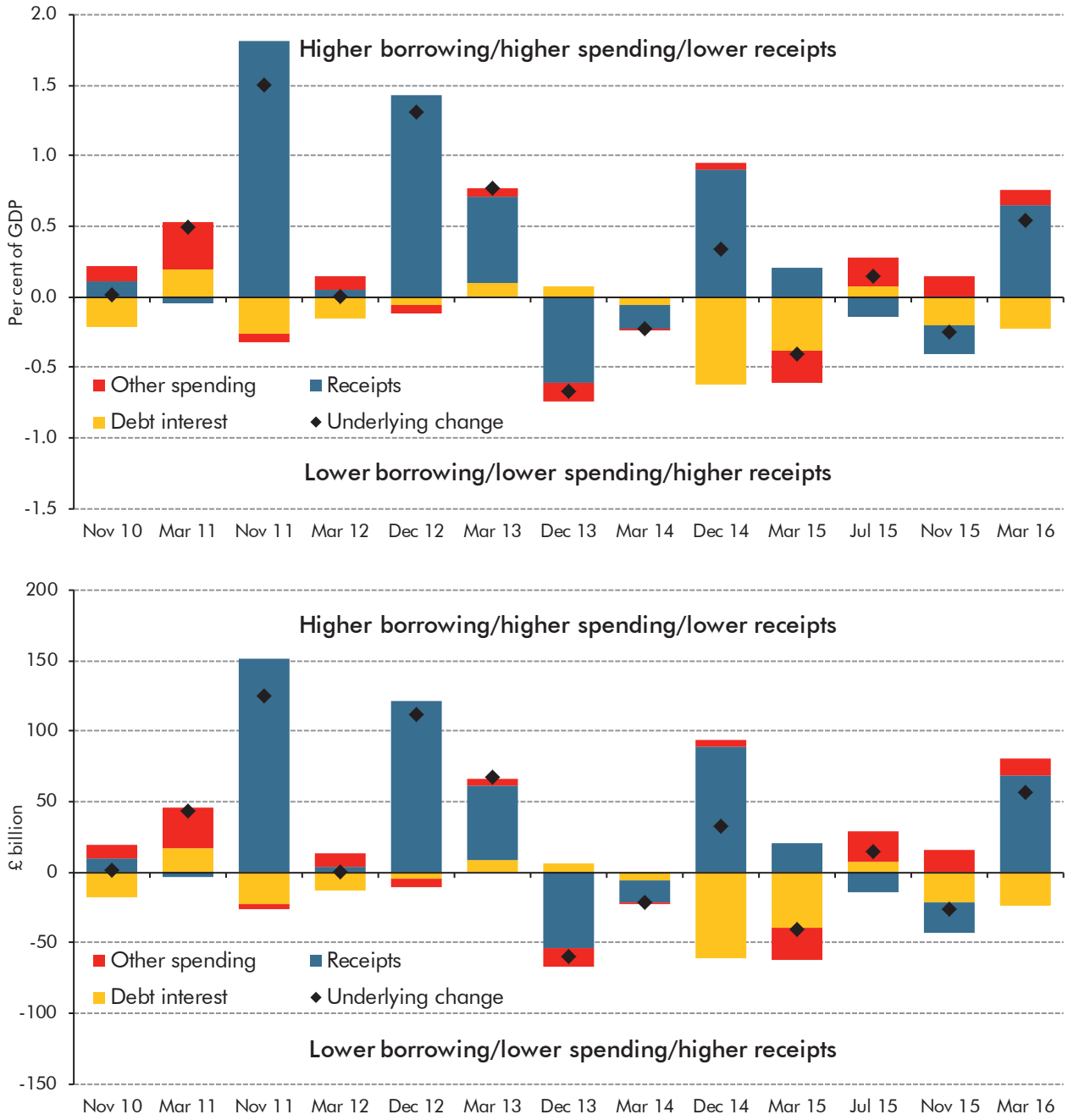
The composition of underlying fiscal forecast revisions

B.27 The two panels of Chart B.6 decompose the underlying changes to successive PSNB forecasts into receipts, debt interest and other spending, on the two metrics used in this annex. The chart shows that:

- **revisions to receipts tend to be bigger than revisions to spending**. In absolute terms, receipts revisions have averaged 0.5 per cent of GDP (£48.1 billion cumulatively), more than twice the average spending revision of 0.2 per cent of GDP (£22.1 billion cumulatively). That is as one might expect, since most receipts are linked to the performance of the economy, whereas around half of public spending (i.e. DELs) is in effect fixed in cash terms. (We would reach a different conclusion if each forecast was specified as a percentage of GDP before decomposing the revisions. With receipts and GDP often moving in step, it is spending that moves most as a share of GDP when we change our GDP forecast, through a denominator effect: if we revise nominal GDP lower, the same spending is a higher percentage of that lower GDP); and

- **revisions to receipts are typically offset to some extent by revisions to debt interest spending**. There have only been three forecasts where changes in receipts and debt interest have contributed in the same direction to the overall revision to borrowing. The most notable of those was our last forecast in November 2015. Again, it should come as no surprise that receipts and debt interest forecast changes tend to offset each other since both are likely to be driven by the same underlying factors. In particular, market expectations of future interest rates, which drive our debt interest forecast, will tend to fall/rise when market participants' expectations of future growth prospects are lowered/raised. If we share that interpretation – as will often be the case – we are likely to revise down/up our nominal GDP growth and receipts forecasts.

Chart B.6: Sources of change in borrowing forecasts



Source: OBR

B.28 The story of the forecast revisions shown in Chart B.6 can be summarised as:

- in **November 2010**, underlying borrowing was virtually unchanged over the forecast period. Lower spending (on debt interest, social security and public service pensions) was offset by lower receipts. An upward revision to VAT receipts (driven by changes to modelling of the exempt sector and higher household consumption) was more than offset by lower outturn onshore CT, PAYE and NICs receipts;

- in **March 2011**, higher oil prices had a broadly neutral effect on the public finances. Higher revenues from the UK oil and gas sector (which were much higher then than they are now) were partly offset by lower fuel duty receipts (as higher oil prices reduced demand for fuel), higher spending on social security and debt interest (as higher inflation fed through to higher indexation) and lower income tax receipts (as higher inflation reduced real earnings growth). Higher inflation from other sources also raised debt interest and welfare spending further. Borrowing was revised up by 0.5 per cent of GDP on average over the forecast period (£42.4 billion cumulatively);

- in **November 2011** we revised down nominal GDP growth significantly. The lower labour income, company profits and household consumption associated with lower GDP explained most of the 1.8 per cent of GDP average downward revision to receipts. Lower debt interest spending (driven by lower gilt rates and lower inflation) provided a partly offsetting 0.3 per cent of GDP reduction in spending. The overall upward revision to PSNB was 1.5 per cent over the forecast period (£124.5 billion cumulatively). This was the largest underlying revision we have made;

- in **March 2012**, underlying borrowing was again virtually unchanged. Lower receipts and higher spending were offset by lower debt interest spending;

- in **December 2012** we once again revised down nominal GDP growth significantly. The weaker economic outlook explained around half the 1.4 per cent of GDP downward revision to tax receipts. Weak outturn income tax and NICs receipts – implying a lower effective tax rate – explained a further quarter of this revision. Spending was revised down by 0.1 per cent of GDP on average over the forecast, with the majority of this change explained by our decision to include estimates of departmental underspends in the forecast. The overall underlying revision to borrowing was 1.3 per cent of GDP on average over the forecast period (£111.0 billion cumulatively);

- in **March 2013**, underlying borrowing was revised up by 0.8 per cent of GDP on average over the forecast period (£66.6 billion cumulatively). Around half reflected weak outturn income tax and NICs receipts, again implying a weaker-than-expected effective tax rate. A further third reflected the weaker economy forecast, in particular lower average earnings growth. The remainder reflected higher debt interest payments (driven by higher interest rates and inflation) and other smaller changes to spending and receipts;

- in **December 2013** we reversed much of the downward revision from the previous forecast as the economy picked up more sharply than expected. Underlying borrowing was revised down by 0.7 per cent of GDP on average over the forecast (£60.2 billion cumulatively). Around two-thirds of this revision reflected higher receipts due to the stronger economy forecast, with the residential property market, consumer spending and company profits all boosting receipts. The remainder was explained by stronger-than-expected outturn receipts and the effect of a lower unemployment forecast on welfare spending;

- in **March 2014**, a relatively small cumulative reduction in borrowing of 0.2 per cent of GDP on average (£21.5 billion cumulatively) was mainly driven by lower public corporations' capital expenditure and lower spending on debt interest, as well as higher-than-expected receipts;

- **December 2014** involved a small upward revision of 0.3 per cent of GDP on average (£32.3 billion cumulatively). Even though this was a small overall revision, there were large offsetting changes in the fiscal forecast. A lower outlook for receipts – driven by a weaker nominal GDP forecast and judgements about the effective tax rate on labour income – was partly offset by much lower debt interest payments – driven by lower inflation, gilt rates and modelling changes;

- in **March 2015**, a fall in oil prices – feeding through to a lower inflation forecast – was the main driver of movements in the underlying fiscal forecast. Receipts were revised down by 0.2 per cent of GDP on average, with the largest changes coming from North Sea oil revenues (due to lower oil prices and production). Again, much lower debt interest spending (due to lower RPI inflation and interest rates) and lower welfare spending (due to lower CPI uprating from 2016-17) more than offset this receipts effect and led to an overall downward revision to borrowing of 0.4 per cent of GDP on average (£41.5 billion cumulatively);

- in **July 2015**, a change to how we modelled public service pensions spending was the main factor in the 0.3 per cent of GDP average upward revision to the spending forecast. This was partly offset by an upward revision to receipts, reflecting higher-than-expected outturn tax revenues. Overall, the borrowing forecast was increased by 0.1 per cent of GDP on average (£14.5 billion cumulatively);

- in **November 2015** we revised down many tax bases, including average earnings, consumer spending and equity prices. That was more than offset by changes to the modelling of VAT deductions and a new NICs model, leaving receipts higher by 0.2 per cent of GDP on average. Higher welfare spending (largely reflecting reduced savings from disability benefit reforms) was more than offset by lower debt interest spending (again reflecting a lower path for interest rates). Overall, higher spending was more than offset by higher receipts, leaving the underlying borrowing forecast down 0.2 per cent of GDP on average (£27 billion cumulatively); and

- in **this forecast**, we have revised borrowing up by 0.5 per cent of GDP on average over the forecast period (£56.3 billion cumulatively). The main driver has been the downward revision to our nominal GDP forecast due to lower expected underlying productivity growth. This has fed through to all the main tax bases, leaving the receipts forecast down by 0.7 per cent of GDP on average.

How did the Government respond?

B.29 The underlying forecast revisions and classification changes described above have provided the Government with the baseline pre-measures fiscal forecasts against which to take policy decisions. In aggregate, these decisions will reflect its legislated fiscal targets and other fiscal objectives. On some occasions, the Government has chosen to offset the effects of our underlying revisions – e.g. in November 2011, when they would otherwise have led to a target being missed. On others it has chosen to accommodate those changes – e.g. in December 2012, when despite our forecast revisions implying that the debt target was set to be missed, it decided not to offset their effect.

B.30 More generally, governments might decide that policy should act in the same direction as the underlying revision – e.g. if a cyclical improvement in the underlying forecast was felt to warrant a tighter fiscal policy – or in the opposite direction – e.g. if a structural deterioration in the fiscal position was judged to warrant tighter fiscal policy to restore the structural fiscal position. Table B.2 at the end of this section details the response to our previous underlying forecast revisions. We have grouped the discussion according to the presentation in Chart B.5, which showed how most pre-measures forecasts include lower borrowing when the economy forecast improves and vice versa.

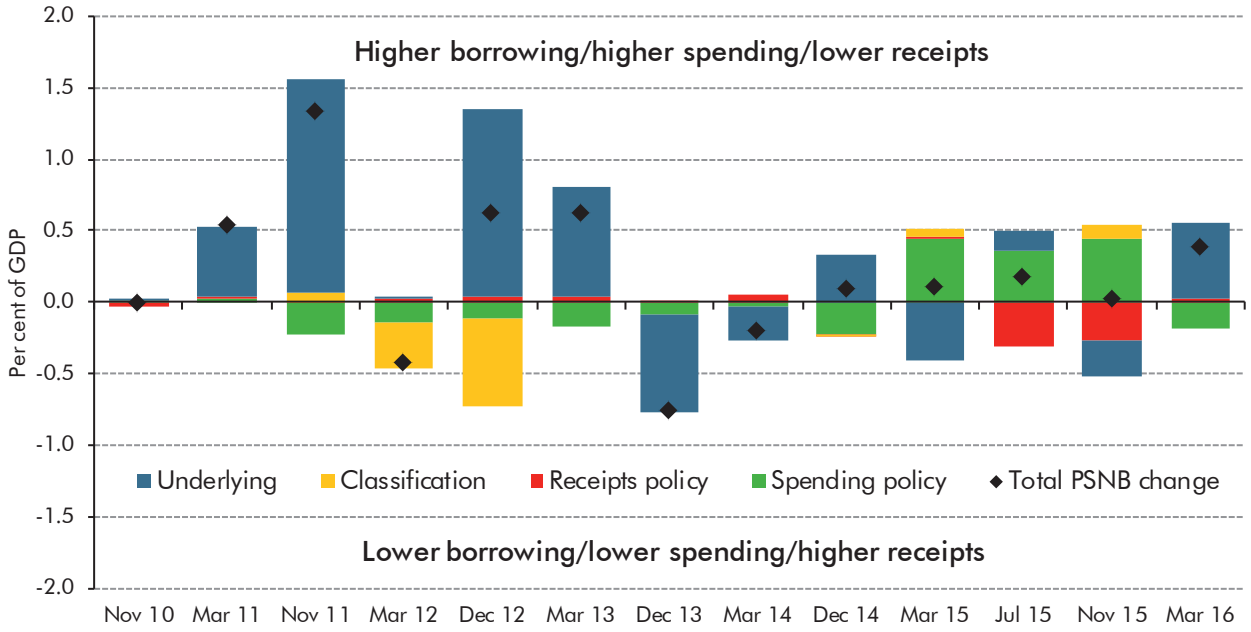
B.31 Chart B.7 puts these forecast changes and policy responses in context, illustrating the effect of all factors contributing to revisions in our fiscal forecasts. It shows that:

- **when our underlying forecast revisions have worsened the outlook** for the public finances, the Government has tended to respond by using policy to offset part of those changes over the forecast period. When presented with our largest upward revisions to expected borrowing in November 2011 and December 2012, the Coalition decided to add more years to the fiscal consolidation, with the policy tightening assumed to be borne almost entirely by lower departmental spending;

- **when our underlying forecast revisions have improved the outlook** for the public finances, the Government has responded either by banking the improvement (as in December 2013) or by reducing the squeeze on spending that had been pencilled in at previous fiscal events (as in March and November 2015); and

- **spending cuts pencilled in during the last Parliament were later reversed**. In the seven forecasts between November 2011 and December 2014, the Coalition's policy decisions involved cutting spending every time and a net tax giveaway in all but two. At the next three forecasts, the Coalition and then the new Conservative Government reversed much of that planned squeeze on spending in the run-up to setting detailed plans in last November's Spending Review.

Chart B.7: Post measures changes in borrowing forecasts

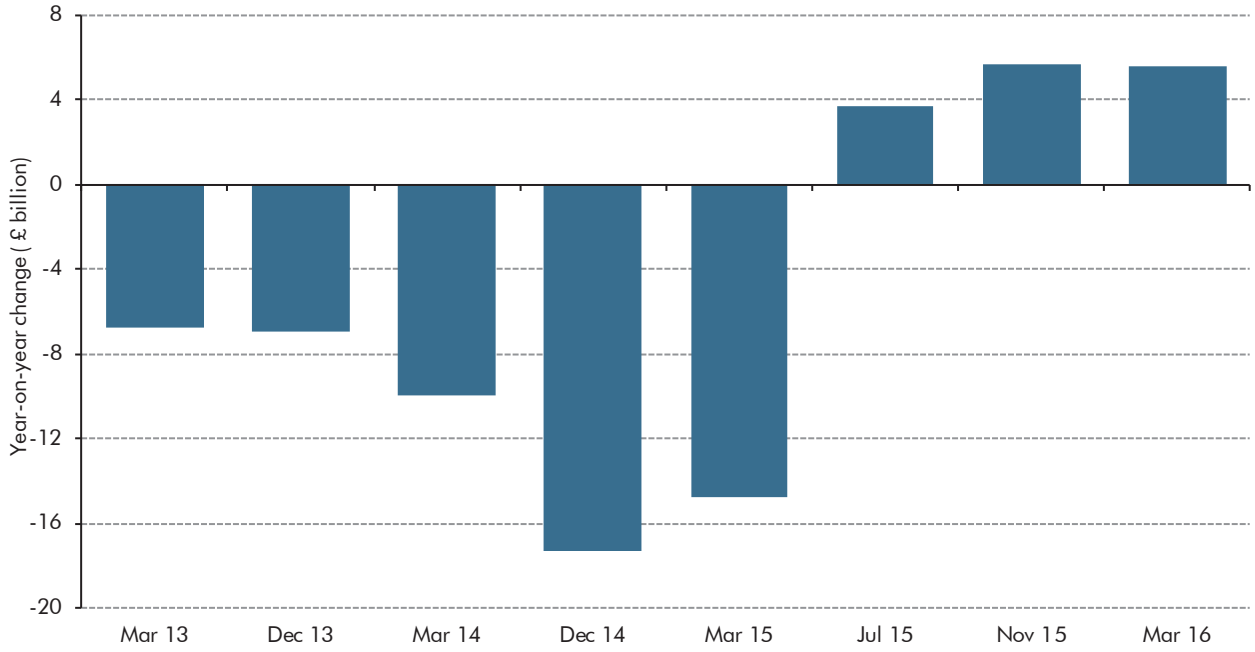


Source: OBR

B.32 One feature of recent fiscal events that is not captured by Chart B.7 is the way in which the profile of RDEL spending has evolved in response to changes in our underlying fiscal forecast and classification changes. The most striking example came in December 2014, when our fiscal forecast was subject to significant classification changes after the ONS adopted the 2010 European System of Accounts and implemented the conclusions of its Review of the Public Sector Finances statistics. These changes added to receipts and AME spending in roughly equal measure, so were neutral for borrowing. But the Coalition chose to offset the effect of the changes on AME spending by reducing RDEL.

B.33 That decision was carried out via its 'fiscal assumption expressed in terms of TME', so unfortunately it was not presented transparently in our *EFO* at the time. It meant that the year-on-year cut in cash RDEL in 2016-17 went from £10.0 billion in our March 2014 forecast to £17.3 billion in December 2014. Over the next three fiscal events, the Coalition and the new Government more than reversed that change, so that the plans set out in last November's Spending Review implied that RDEL would rise by £5.7 billion relative to 2015-16 (after allowing for expected underspending). Our latest forecast of RDEL spending in 2016-17 is £321.7 billion, £22.7 billion higher than the figure the Coalition had assumed in Autumn Statement 2014. These changes are shown in Chart B.8.

Chart B.8: Year-on-year change in RDEL in 2016-17 since March 2013



Source: OBR

Table B.2: Underlying forecast changes and Government responses since 2010

a) Economy forecast changes	b) Underlying borrowing forecast	c) Government decisions
Lower GDP, lower borrowing		
November 2015 a) Small downward revision to nominal GDP growth. b) Lower debt interest spending and receipts modelling changes reduce underlying borrowing. c) Looser fiscal policy: Higher departmental spending plans only partly offset by tax rises.		
Higher GDP, lower borrowing		
December 2013 a) Stronger outturn growth led to higher near-term GDP forecast. b) Stronger GDP and residential property forecasts boost tax receipts. c) Overall net takeaway driven by assumption-driven cuts to current departmental spending (RDEL). **March 2015** a) Lower oil prices and so a lower inflation forecast boost real incomes and consumer spending. b) A lower spending forecast (inflation effects on debt interest and welfare) more than offset a lower receipts forecast. c) Higher DEL spending plans in all years boosts borrowing, much higher in final year keeping TME above post-war low as share of GDP. **March 2014** a) Small upward revision to nominal GDP growth. b) Higher GDP boosts receipts forecast, reducing underlying borrowing. c) Broadly neutral policy changes.		
Lower GDP, higher borrowing		
March 2012 a) Small reduction in nominal GDP forecast. b) Underlying borrowing broadly unchanged. c) Overall tax cut more than offset by assumption-driven RDEL cuts. **December 2014** a) Downward revision to GDP forecast. b) Lower receipts (from lower GDP), partly offset by lower debt interest. c) Assumption-driven RDEL cuts partly offset higher underlying borrowing. **March 2016** a) Potential output growth revised down. b) Weaker GDP reduces the receipts forecast significantly, partly offset by lower debt interest spending. c) Spending cuts and tax rises to meet surplus target in 2019-20. **March 2013** a) Downward revision to near-term GDP growth forecast. b) Weaker-than-expected taxes on labour income and lower GDP reduce the receipts forecast. c) Assumption-driven RDEL cuts reduce borrowing. **December 2012** a) Large reduction in nominal GDP forecast. b) Upward revision to borrowing driven by lower receipts (weaker nominal GDP and weaker-than-expected taxes on labour income). c) Assumption-driven RDEL cuts reduce borrowing. **November 2011** a) Large downward revision to potential output and nominal GDP. b) Large economy-driven downward revision to receipts forecast. c) Large assumption-driven RDEL cuts in final two years to meet fiscal mandate for cyclically adjusted current surplus.		
Higher GDP, higher borrowing		
July 2015 a) Small upward revision to GDP forecast. b) Receipts boost due to stronger taxes on labour income, more than offset by a higher spending forecast (partly due to a change in public service pensions methodology). c) Tax rises and welfare cuts are more than offset by assumption-driven increase in RDEL ahead of Spending Review. Surplus pushed back a year. **March 2011** a) Higher outlook for inflation boosts nominal GDP forecast. b) Higher oil prices and inflation boost spending more than receipts, leaving underlying borrowing higher. c) Government decisions have a small effect on borrowing.		

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