

Office for  
**Budget  
Responsibility**

## **Devolved tax and spending forecasts**

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March 2019

# 1 Introduction and summary

## Introduction

- 1.1 The Office for Budget Responsibility (OBR) was established in 2010 to provide independent and authoritative analysis of the UK's public finances. Alongside the UK Government's Budgets and other fiscal statements, we produce forecasts for the economy and the public finances. We publish these in our *Economic and fiscal outlook (EFO)*.
- 1.2 Since 2012, we have forecast some tax streams that are devolved to the Scottish Parliament. Since 2014, we have also produced forecasts of taxes that are being devolved to the National Assembly for Wales. In November 2017 we produced an illustrative forecast for carer's allowance in Scotland, which was devolved in September 2018. In this document we produce illustrative projections for Scottish VAT assignment, attendance allowance (AA), disability living allowance (DLA) and personal independence payment (PIP). We have not yet produced forecasts for any devolved taxes in Northern Ireland.
- 1.3 Our devolved tax and spending forecasts are published alongside each *EFO* and are consistent with our main UK forecasts. Further information on fiscal devolution in the UK and our role is available in the *Scotland, Wales and Northern Ireland* section of our website.
- 1.4 The Treasury draws on our tax forecasts when making spending settlements for the Scottish and Welsh Governments in accordance with their respective fiscal frameworks. The OBR has no direct involvement in these spending decisions or block grant negotiations. But we do use our tax forecasts to inform our forecast for Scottish Government expenditure, which we discuss in Chapter 5 of this document and in our *EFO*.

## Our approach

### Forecast methodology

- 1.5 It is not possible to replicate in full the methodology we use to produce our UK-wide forecasts when producing devolved tax and spending forecasts. In particular, the macroeconomic data that we would need to produce a full Scottish or Welsh economic forecast and the associated determinants of tax and spending are either not available at this level or are only available with a long lag. We are therefore not able to produce a Scottish or Welsh macroeconomic forecast to drive the relevant tax and spending forecasts. These challenges would apply equally to any future forecast of Northern Ireland taxes.
- 1.6 Given these challenges, the methodologies we use are generally based on estimating and projecting Scottish and Welsh shares of relevant UK Government tax or social security

spending streams. We typically assume that the shares will remain close to recent levels, unless available evidence suggests we should adjust them to ensure our forecasts are central. For example, if a newly announced policy was expected to have a disproportionate impact on a particular tax in Scotland or Wales, or there was evidence pointing to different trends in an underlying tax base. We typically adjust for differences in population growth. The exception to this approach is where taxes have been fully devolved and we are able to take account of outturns and build tax-specific models.

- 1.7 As with our UK forecasts, the methodology and the forecasts represent the collective view of the three independent members of the OBR's Budget Responsibility Committee (BRC). The BRC takes full responsibility for the judgements that underpin them.

## Policy costings

- 1.8 The *Charter for Budget Responsibility* requires the OBR's forecasts to reflect the impact of "all Government decisions and all other circumstances that may have a material impact on the fiscal outlook. In particular where the fiscal impact of these decisions and circumstances can be quantified with reasonable accuracy." The Treasury is responsible for the costing of UK Government policies, which it does by coordinating a process that delegates the analysis to the departments responsible for implementing the policy. Our role is to state publicly whether we believe each costing to be reasonable and central. This involves a detailed process of scrutiny and discussion with the Treasury and relevant departments. We then incorporate these costings (or our preferred alternative) in our forecasts.<sup>1</sup>
- 1.9 The *Charter* also states that "where the fiscal impact of these decisions and circumstances cannot be quantified with reasonable accuracy, these impacts should be noted as specific fiscal risks". Where the UK Government has voiced a policy aspiration or ambition but not supported it with precise details, such as the timetable for implementation, we would not include it in our central forecast, but would instead note it as a fiscal risk in our *EFO*. We ask the Treasury to confirm whether or not such aspirations reflect firm Government policy.
- 1.10 We follow the same approach for our devolved tax and spending forecasts. For UK Government policies that affect a devolved tax, we ask that the relevant effect is estimated with supporting evidence. For policy changes to the devolved taxes themselves, we scrutinise the costing and only include it in our forecast if we consider it reasonable and central. We would not include the effects of a devolved tax policy if it was not deemed a firm commitment – for example before it had been presented in sufficient detail to the relevant legislature as part of a formal budget process. We would also not include the effects of a policy until we had sufficient detail on its operation in each year of the forecast. Where we cannot include the effects in our central forecast, we note them as a fiscal risk.

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<sup>1</sup> See *Briefing paper No.6: Policy costings and our forecast* for a detailed description of this process.

## Forecast process

- 1.11 The process for producing these devolved tax forecasts has been as follows:
- **Analysts in HMRC, the Welsh Government and the OBR produced draft Scottish and Welsh tax forecasts** using our preliminary UK economy and fiscal forecasts. These took the latest information on the fully-devolved taxes into account. The BRC scrutinised these forecasts with officials from HMRC, the Scottish Fiscal Commission (SFC) and the Scottish and Welsh Governments at meetings held on 28 January and 19 February.
  - **Eight days before the Spring Statement, a final set of pre-measures Scottish and Welsh tax forecasts** were produced using our final pre-measures UK-wide forecasts.
- 1.12 The SFC produced its latest five-year fiscal forecasts in December 2018. The Welsh Government also produced its most recent receipts forecasts in December, with external scrutiny provided by academics at the University of Bangor. The forecasts we present in this document are our own. Differences between our forecasts and those of the SFC and the Welsh Government are discussed in the relevant chapters.
- 1.13 Our respective forecasts are produced independently so they should not be expected to be the same. They may converge or diverge in future. Differences between them will reflect the fact that they are produced at different times of the year – with potentially different data and policies being included – and that even with the same information we may come to different judgements about its forecast implications. But we work with the SFC and the Welsh Government to ensure that we bring all relevant evidence to bear and that, as best we can, we understand the reasons for any differences that remain between our respective forecasts.

## UK-level economic determinants

- 1.14 Our fiscal forecasts are based on the economy forecasts presented in Chapter 3 of our *EFO*. Most economic forecasts focus on the outlook for real GDP, but it is nominal GDP – affected both by the volume of economic activity and prices – that matters most when forecasting the public finances. Tax forecasts are particularly dependent on the profile and composition of economic activity. Tables 1.1 and 1.2 set out the key economic determinants of the devolved taxes forecast and how they have changed since our October forecast.

Table 1.1: Key determinants of the devolved taxes forecast

	Percentage change on previous year, unless otherwise specified						
	Outturn	Forecast					
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
<b>GDP</b>							
Real GDP	1.7	1.4	1.2	1.5	1.6	1.6	1.6
Nominal GDP	3.9	3.1	3.2	3.4	3.5	3.6	3.6
<b>Inflation</b>							
RPI	3.7	3.1	2.9	2.8	3.1	3.1	3.1
CPI	2.8	2.3	2.0	1.9	2.0	2.0	2.0
<b>Income tax</b>							
Average earnings	2.7	2.9	3.0	3.1	3.1	3.2	3.3
Employment (millions)	32.2	32.5	32.6	32.8	32.9	33.1	33.2
<b>Property</b>							
Residential property prices	4.5	2.8	0.2	2.2	3.9	4.1	4.2
Residential property transactions (000s)	1208	1194	1180	1247	1291	1328	1362
Commercial property prices	-7.0	3.6	-1.6	-0.9	1.9	2.0	2.0
Commercial property transactions	-0.8	-1.4	1.2	1.5	1.6	1.6	1.6

Table 1.2: Changes in key determinants of the devolved taxes forecast

	Percentage change on previous year, unless otherwise specified					
	Forecast					
	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
<b>GDP</b>						
Real GDP	0.0	-0.3	0.1	0.1	0.1	0.0
Nominal GDP	-0.1	-0.1	0.0	0.1	0.1	0.1
<b>Inflation</b>						
RPI	-0.3	-0.1	-0.3	-0.1	0.0	0.0
CPI	-0.2	0.1	-0.2	-0.1	-0.1	0.0
<b>Income tax</b>						
Average earnings	0.6	0.4	0.2	0.1	0.0	0.1
Employment (millions)	0.0	-0.1	-0.1	-0.1	-0.1	0.0
<b>Property</b>						
Residential property prices	-0.3	-2.9	-0.9	0.6	0.6	0.3
Residential property transactions (000s)	6.7	-30.8	3.1	13.0	13.3	13.0
Commercial property prices	0.7	-0.1	-0.2	0.2	0.2	0.1
Commercial property transactions	2.6	0.1	0.1	0.0	0.0	0.0

## Summary of tax and spending forecasts

1.15 Tables 1.3 and 1.4 detail our forecasts for the Scottish and Welsh taxes and spending.

Table 1.3: Summary of March 2019 Scottish tax forecasts

	£ million (unless otherwise stated)						
	Outturn estimate	Forecast					
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
Full income tax	11,077	11,828	12,037	12,708	13,190	13,679	14,197
LBTT	558	566	592	631	693	754	826
Scottish landfill tax	147	146	111	90	20	21	22
Aggregates levy	55	57	58	60	63	66	69
Air passenger duty	299	319	334	347	361	378	396
<b>Total</b>	<b>12,136</b>	<b>12,915</b>	<b>13,133</b>	<b>13,836</b>	<b>14,326</b>	<b>14,899</b>	<b>15,510</b>
October total	12,180	12,937	13,031	13,680	14,167	14,742	15,384
Difference	-44	-21	102	155	159	157	126
Difference (per cent)	-0.4	-0.2	0.8	1.1	1.1	1.1	0.8

*Shaded cells represent notional estimates for years when tax devolution has not occurred or been confirmed.*

Table 1.4: Summary of March 2019 Welsh Government tax forecasts

	£ million (unless otherwise stated)						
	Outturn estimate	Forecast					
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
Income tax	1,999	2,094	2,101	2,229	2,313	2,398	2,487
SDLT/ LTT	258	234	234	247	270	296	323
Landfill tax / LDT	29	45	41	38	35	33	32
Aggregates levy	36	37	38	40	42	44	45
<b>Total</b>	<b>2,322</b>	<b>2,411</b>	<b>2,415</b>	<b>2,553</b>	<b>2,660</b>	<b>2,770</b>	<b>2,887</b>
October total	2,306	2,381	2,391	2,507	2,597	2,706	2,829
Difference	17	30	24	46	63	64	58
Difference (per cent)	0.7	1.3	1.0	1.8	2.4	2.4	2.1

*Shaded cells represent notional estimates for years when tax devolution has not occurred or been confirmed.*

## Tax forecasts

1.16 Tables 1.5 to 1.10 summarise each of our tax forecasts and changes since October.

1.17 In its report on the 2019-20 Scottish Budget, the Scottish Parliament's Finance and Constitution Committee asked that we provide further information on the year-on-year changes in tax forecasts that affect block grant adjustments made by the Treasury and devolved administrations.<sup>2</sup> The relevant growth rates are reported in Tables 1.5 and 1.7. More detail on these forecasts is available in Chapters 2 and 3.

1.18 The differences between growth rates forecast in Scotland and Wales and those in the rest of the UK are generally modest in most years, but some are more noteworthy:

- As regards **income tax** (Table 1.5), near-term differences largely reflect different policy settings in Scotland versus the rest of the UK – in particular in respect of the higher rate threshold. In the longer term, growth rates are similar across countries, with the remaining differences largely down to assumptions about relative population growth.

<sup>2</sup> Finance and Constitution Committee, Scottish Parliament, *Report on Scottish Government Budget 2019-20*, 25 January 2019.

- As regards **property transaction taxes** (Table 1.7), differences in near-term growth rates are heavily influenced by the strength or weakness of the latest receipts data. In the later years of the forecast, growth rates are expected to be higher in Scotland and Wales than for the equivalent UK Government tax in England and Northern Ireland. As we set out in Chapter 3, this reflects the more progressive structure of these taxes in Scotland and Wales, which generates greater fiscal drag.

Table 1.5: Income tax on non-savings, non-dividend income

	£ billion							
	Outturn				Forecast			
	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
Whole UK NSND income tax	160.4	166.9	175.6	176.8	187.4	194.6	202.3	210.4
of which:								
Scottish income tax (full NSND basis)	10.7	11.1	11.8	12.0	12.7	13.2	13.7	14.2
Welsh Government income tax (WRIT basis)	1.9	2.0	2.1	2.1	2.2	2.3	2.4	2.5
UK Government income tax from Wales	2.5	2.6	2.7	2.7	2.9	3.0	3.1	3.2
UK excluding Scottish Govt income tax	149.7	155.8	163.7	164.7	174.7	181.4	188.6	196.2
England and Northern Ireland	145.3	151.2	158.9	159.9	169.6	176.1	183.1	190.5
	Percentage change on a year earlier							
Whole UK NSND income tax		4.0	5.2	0.7	6.0	3.9	3.9	4.0
of which:								
Scottish income tax (full NSND basis)		3.3	6.8	1.8	5.6	3.8	3.7	3.8
Welsh Government income tax (WRIT basis)		3.4	4.8	0.3	6.1	3.8	3.7	3.7
UK excluding Scottish Govt income tax		4.1	5.1	0.6	6.0	3.9	4.0	4.1
England and Northern Ireland		4.1	5.1	0.6	6.0	3.9	4.0	4.1

Shaded cells represent notional estimates for years when tax devolution has not occurred.

Table 1.6: England and Northern Ireland non-savings, non-dividend income tax by tax band WRIT equivalent

	£ billion								
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
March forecast	52.0	53.9	56.2	58.9	59.6	63.1	65.5	68.1	70.8
of which:									
Basic rate	35.9	36.8	38.3	40.2	41.1	43.4	45.0	46.8	48.6
Higher rate	10.6	11.1	11.2	11.6	11.0	11.8	12.2	12.6	13.0
Additional rate	5.4	6.1	6.6	7.1	7.5	7.9	8.3	8.7	9.2

Shaded cells represent notional estimates for years when tax devolution has not occurred.

Table 1.7: Property transactions taxes

	£ million						
	Outturn	Forecast					
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
<b>Whole UK property transaction taxes</b>	<b>13,463</b>	<b>12,684</b>	<b>12,474</b>	<b>13,270</b>	<b>14,326</b>	<b>15,331</b>	<b>16,647</b>
of which:							
Scottish LBTT	558	566	592	631	693	754	826
Welsh SDLT / LTT	258	234	234	247	270	296	323
UK excluding Scottish LBTT	12,905	12,119	11,882	12,639	13,634	14,577	15,821
SDLT England and Northern Ireland	12,647	11,885	11,648	12,392	13,363	14,282	15,498
		Percentage change on a year earlier					
<b>Whole UK property transaction taxes</b>		<b>-5.8</b>	<b>-1.7</b>	<b>6.4</b>	<b>8.0</b>	<b>7.0</b>	<b>8.6</b>
of which:							
Scottish LBTT		1.4	4.6	6.6	9.8	8.9	9.5
Welsh SDLT / LTT		-9.4	0.3	5.3	9.5	9.3	9.2
UK excluding Scottish LBTT		-6.1	-1.9	6.4	7.9	6.9	8.5
SDLT England and Northern Ireland		-6.0	-2.0	6.4	7.8	6.9	8.5

Shaded cells represent notional estimates for years when tax devolution has not occurred.

Table 1.8: Landfill taxes

	£ million						
	Outturn	Forecast					
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
<b>Whole UK landfill taxes</b>	<b>893</b>	<b>872</b>	<b>750</b>	<b>689</b>	<b>657</b>	<b>607</b>	<b>525</b>
of which:							
Scottish landfill tax	147	146	111	90	20	21	22
Welsh landfill tax / LDT	29	45	41	38	35	33	32
UK excluding Scottish landfill tax	746	727	639	599	636	586	503
UK excluding Scottish and Welsh landfill taxes	717	681	598	562	601	552	472

Shaded cells represent notional estimates for years when tax devolution has not occurred or been confirmed.

Table 1.9: Aggregates levy

	£ million						
	Outturn	Forecast					
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
<b>Whole UK aggregates levy</b>	<b>372</b>	<b>385</b>	<b>394</b>	<b>407</b>	<b>426</b>	<b>447</b>	<b>467</b>
of which:							
Scottish aggregates levy	55	57	58	60	63	66	69
Welsh aggregates levy	36	37	38	40	42	44	45
UK excluding Scottish aggregates levy	317	328	336	347	363	381	398
UK excluding Scottish and Welsh aggregates levy	281	290	297	307	322	337	352

Shaded cells represent notional estimates for years when tax devolution has not occurred or been confirmed.

Table 1.10: Air passenger duty

	£ million						
	Outturn	Forecast					
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
<b>Whole UK air passenger duty</b>	<b>3,360</b>	<b>3,584</b>	<b>3,749</b>	<b>3,891</b>	<b>4,045</b>	<b>4,244</b>	<b>4,448</b>
<i>of which:</i>							
Scottish duty	299	319	334	347	361	378	396
UK excluding Scottish duty	3,060	3,265	3,415	3,544	3,685	3,866	4,052

*Shaded represent notional estimates for years when tax devolution has not occurred or been confirmed.*

## Spending forecast

1.19 Table 1.11 contains our Great Britain and Scotland carer's allowance forecasts.

Table 1.11: Carer's allowance

	£ million					
	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
<b>GB carer's allowance</b>	<b>3,034</b>	<b>3,269</b>	<b>3,481</b>	<b>3,723</b>	<b>4,074</b>	<b>4,433</b>
<i>of which:</i>						
Scottish expenditure	267	287	305	326	355	385
England and Wales	2,768	2,982	3,176	3,398	3,719	4,048

## Structure of the document

1.20 The rest of this document is structured as follows:

- **Chapter 2:** income tax on non-savings non-dividend income in Scotland and Wales.
- **Chapter 3:** property taxes in Scotland (LBTT) and Wales (LTT).
- **Chapter 4:** landfill taxes in Scotland and Wales, Scottish and Welsh shares of UK aggregates levy and the Scottish share of UK air passenger duty.
- **Chapter 5:** Scotland Government expenditure.
- **Annex A:** illustrative projection for assigned VAT.

## 2 Income tax

### Scottish income tax

- 2.1 The Scottish Parliament's income tax is levied on non-savings, non-dividend (NSND) income, and is assessed on a liabilities basis rather than a receipts basis. This includes earnings from employment, self-employment, pensions and property. Tax liabilities for a particular year include both PAYE (pay-as-you-earn income tax, which is largely paid in the same year as the taxable activity) and self-assessment (where returns are submitted in the year after the activity). Income tax revenues from savings and dividends are reserved to the UK Government and account for around 10 per cent of total income tax revenue at the UK level, and somewhat smaller percentages in Scotland and Wales.
- 2.2 An individual's taxpayer status is determined by the location of their main place of residence for the majority of the tax year. If this is in Scotland, they are defined as a Scottish taxpayer. It is the taxpayer's responsibility to tell HMRC their correct address. For those with residences in both Scotland and elsewhere in the UK, it is their responsibility to report the address at which they reside for the majority of the year.
- 2.3 The Scottish Parliament has the power to vary rates and thresholds separately, as well as creating new bands paying different rates. It does not have the power over what is classed as NSND income or to change the income tax personal allowance, but it could create a similar effect to increasing the allowance by introducing a zero-rate band. Since 2017-18, the Scottish Government has received full NSND income tax liabilities from taxpayers in Scotland. The Scottish and UK Governments have implemented several policies that lead to differences in the amount of tax paid by Scottish residents versus those in the rest of the UK.

### Welsh rate of income tax

- 2.4 The Wales Act 2014 gave the Welsh Assembly the power to set Welsh rates of income tax (WRIT), as levied on NSND income liabilities, subject to a referendum. The Wales Act 2017 removed the need for a referendum. Following publication of the Welsh Government's fiscal framework in December 2016, Welsh rates of income tax will be devolved from April 2019. The existing basic, higher and additional rates of income tax levied by the UK Government will be reduced by 10p in the pound for those individuals defined as Welsh taxpayers. The National Assembly for Wales has passed a resolution setting the Welsh rates for each band of income tax at 10p to keep income tax at the same level as the rest of the UK in 2019-20. An individual will be defined as a Welsh taxpayer if their main residence is in Wales for the majority of the tax year. The forecasts presented in this document assume that the Welsh Assembly continues to levy a 10p rate across all the income tax bands in each of the next five years.

2.5 The Welsh Government's fiscal framework agreement places an obligation on the OBR to forecast income tax liabilities associated with each band of income tax.<sup>1</sup>

## Methodology

2.6 We generate a UK forecast for NSND income tax liabilities from the full UK income tax forecast published in our *Economic and fiscal outlook (EFO)*. The forecast models we use are operated on our behalf by officials in HMRC. The key components are:

- Total **pay-as-you-earn (PAYE)** liabilities.
- **Self-assessment (SA)** liabilities on NSND income. For this forecast we exclude savings and dividends elements of SA income tax and adjust it to be on a liabilities basis (i.e. when the activity occurred). The full UK forecast is on a receipts basis (i.e. when the cash is received), consistent with the treatment of SA receipts in the National Accounts.
- **PAYE repayments and repayments to pension providers**, from our income tax repayments forecast.

2.7 We apply the latest estimated Scottish and Welsh shares to the UK total of these forecast components. These historically derived shares are adjusted for factors that can be forecast, such as asymmetric effects of previous policy measures and relative population growth. In this forecast we have changed our methodology for estimating the starting point of our Scottish income tax forecast, adjusting it in line with the share of total employee earnings as reported in HMRC's real-time information (RTI) from the PAYE system. We also include deductions in respect of the Scottish and Welsh shares of gift aid repayments.

2.8 Finally, we add estimates of the Scottish and Welsh income tax elements of new policies announced since our previous forecast.

## Scottish and Welsh shares of income tax

### HMRC outturn data for Scottish liabilities in 2016-17

2.9 In all forecasts prior to last October we based the Scottish and Welsh shares of UK income tax on historical information from HMRC's Survey of Personal Incomes (SPI), an annual sample of around 730,000 individuals in contact with HMRC during a year through the PAYE, SA or repayment claim systems. The SPI data are published with a long lag.

2.10 In July 2018, HMRC published NSND liabilities outturn for Scotland and the rest of the UK for 2016-17 that was £700 million lower than our March 2018 SPI-based 'forecast' for 2016-17 liabilities, which was based on the 2015-16 SPI. This implied an over-estimate of the Scottish share of 0.4 percentage points (6.68 versus a forecast of 7.08, relative to the

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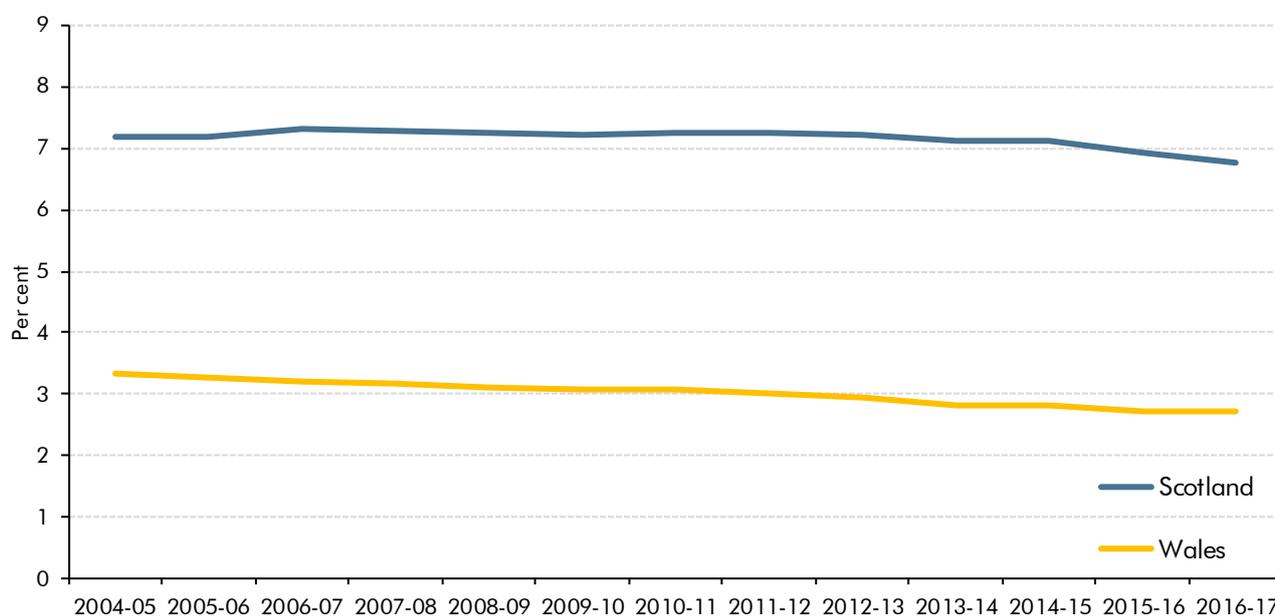
<sup>1</sup> We set out the methodology that we employ to meet this obligation in our working paper: Mathews (2018) Working paper No.14 *Devolved income tax: forecasting by tax bands*.

2015-16 SPI share on a postcode basis of 7.11). In October we calibrated our forecast to the outturn – in effect subtracting a constant percentage from all years. The Scottish Fiscal Commission (SFC) also over-estimated the 2016-17 share, but by slightly less than we did.

## HMRC's Survey of Personal Incomes for 2016-17

2.11 HMRC has now published the 2016-17 SPI, which allows us to investigate more fully why our 2015-16-based projection of 2016-17 liabilities from March 2018 proved so optimistic. Chart 2.1 shows the latest SPI-based estimates of the Scottish and Welsh shares of total income tax.<sup>2</sup> It shows them gradually declining in both Wales and Scotland, but since 2014-15 the rate of decline has noticeably greater in Scotland than in Wales.

Chart 2.1: Scottish and Welsh historic share of all income tax liabilities



Note: Data unavailable for 2008-09 so the proportional shares are based on interpolation from the adjacent years.

Source: HMRC National Statistics table 3.11

2.12 The new SPI data also allow us to compare the HMRC outturn estimate to the individual-level SPI data. For Scottish taxpayers, there are now two geographic identifiers in the SPI: one based on the postcode recorded in its administrative data, which we previously used as a proxy for Scottish taxpayers; the other based on whether or not the taxpayer had an 'S flag' that was used to assign the tax. Comparing these reveals the extent to which the postcode proxy not matching the 'S flag' population was a source of our over-estimate of the Scottish share.

2.13 As Table 2.1 shows, this 'identification error' explained only an eighth of the overall forecast error. Half the error was down to 'projection error' – i.e. on a like-for-like basis the 2016-17 SPI showed a considerably lower Scottish share than we expected. But that leaves a considerable proportion that is unexplained by quantifiable factors.

<sup>2</sup> For consistency across years, this includes tax on savings and dividends, and the Scottish share in the final year is on a postcode basis.

Table 2.1: Scottish share of NSND income tax

	Scottish share in 2016-17 (per cent)
a) SPI 2015-16 (postcode-based, no adjustment )	7.11
b) SPI 2015-16 (postcode-based, adjusted for population change, used in March 2018 forecast)	7.08
c) SPI 2016-17 (postcode-based)	6.88
d) SPI 2016-17 ('S' flag)	6.83
<b>e) 2016-17 Outturn (used in October 2018 forecast)</b>	<b>6.68</b>
<i>Memo: Projection error (c - b)</i>	-0.20
<i>Memo: Identification error (d - c)</i>	-0.05
<i>Memo: Unknown remaining error (e - d)</i>	-0.15
<b><i>Memo: Total forecast error (e - b)</i></b>	<b>-0.40</b>

2.14 Table 2.2 breaks down tax paid on NSND income by the marginal tax band of the taxpayer on three different SPI bases: 2015-16 and 2016-17 on a like-for-like postcode basis, and 2016-17 on an 'S' flag basis. Table 2.3 shows that growth in tax liabilities in Scotland was slower than that in the rest of the UK across the tax bands, with the largest shortfall being among additional rate taxpayers, where growth was particularly strong outside Scotland. It also shows that the difference between generating the Scottish share from postcodes versus 'S flags' is just under 1 per cent for Scottish liabilities, but negligible for the rest of the UK.

Table 2.2: Estimated NSND income tax by tax band of the taxpayer

	SPI 2015-16 (postcode)	SPI 2016-17 (postcode)	SPI 2016-17 (S flag indicator)
	Tax paid (£ billion)		
<b>Non-Scottish taxpayers (rUK)</b>			
Basic rate	51.8	52.8	52.8
Higher rate	53.9	55.3	55.3
Additional rate	39.5	43.9	43.9
All	145.2	152.0	152.1
<b>Scottish taxpayers</b>			
Basic rate	5.0	5.0	5.0
Higher rate	4.4	4.4	4.3
Additional rate	1.8	1.8	1.8
All	11.1	11.2	11.1
<b>Scottish taxpayers share of total UK (per cent)</b>			
Basic rate	8.83	8.67	8.59
Higher rate	7.46	7.34	7.27
Additional rate	4.24	4.02	4.02
All	7.11	6.88	6.83

Note: Figures for 2016-17 may differ slightly to those shown in tables 3.16 and 3.17 in HMRC's Personal Incomes Statistics 2016-17 due to the treatment of missing postcodes.

Table 2.3: Differences between the amount of tax paid by SPI distributions

	Percentage difference	
	Year-on-year growth (SPI postcode basis) 2015-16 to 2016-17	Difference in 2016-17 between postcode and S flag indicator
<b>Non-Scottish taxpayers (rUK)</b>		
Basic rate	1.9	0.1
Higher rate	2.5	0.1
Additional rate	11.1	0.0
All	4.7	0.1
<b>Scottish taxpayers</b>		
Basic rate	-0.2	-0.9
Higher rate	0.7	-0.9
Additional rate	5.1	0.0
All	1.0	-0.8

## Understanding the shortfall between forecast and outturn in 2016-17

2.15 The following sections consider possible reasons for each source of error shown in Table 2.1.

### Projection error: like-for-like difference between forecast and 2016-17 SPI

2.16 The largest source of difference between our March 2018 forecast and the full HMRC outturn was due to the assumptions we made in projecting from the 2015-16 SPI base year to 2016-17. We adjust for differences in population growth and the asymmetric effects of policy measures, although in practice for 2016-17 it was the population growth adjustment that dominated. On this basis, we expected the Scottish share to have fallen by 0.04 percentage points between 2015-16 and 2016-17, but on a like-for-like 'postcode' basis it actually fell 0.24 percentage points.

2.17 Some of the error is likely to be due to differences in economic performance between Scotland and the UK as a whole that were not reflected in our projection. Our methodology implies that the NSND income tax base moves in line with the rest of the UK on a per person basis (except where policy measures are assumed to affect that). In reality it seems that growth in income per person was lower in Scotland than in the rest of the UK. The SFC has pointed to relative weakness in productivity growth as one factor that could have weighed on average earnings growth in Scotland. Scotland is also proportionately much more exposed than other parts of the UK to changes in the fortunes of the oil and gas sector. Lower oil prices from late 2014 through to mid-2017 are likely to have hit Scottish incomes proportionately harder than in the rest of the UK, particularly at the top end. (As discussed below, using RTI as a guide to the relative performance of wages and salaries growth in Scotland would have reduced the extent of this error.)

2.18 As well as these potential sources of difference in underlying tax base growth, some of the drop in the Scottish share could have resulted from taxpayers moving their main residence from Scotland to elsewhere in the UK in anticipation of future tax increases once powers over rate-setting had been devolved. This would also be consistent with a greater shortfall relative to the rest of the UK being among additional rate taxpayers.

### Identification error: postcodes versus 'S flags'

- 2.19 A relatively small part of the error was due to incorrect identification of Scottish taxpayers within the SPI. The SPI location marker in 2015-16 that formed the basis of our March 2018 Scottish share projection was based on the taxpayer's postcode, rather than the legally defined main residence used for the outturn. Most of this identification error occurred among basic and higher rate taxpayers.

### Unexplained error

- 2.20 Around a third of the overall difference between our March 2018 projection and the HMRC outturn cannot be explained at this stage. Sampling error in the SPI is likely to play some part, although it draws on a large sample. At the UK level we can test how representative the SPI is by comparing the total receipts estimated via the SPI (grossed up using the sampling fraction) to actual receipts received by HMRC. Over the past three years errors have been below 2 per cent and in both directions, both under- and over-estimating receipts. It is possible that either the 2015-16 or 2016-17 SPI were subject to unusually high degrees of sampling error or that this was concentrated among Scottish taxpayers.
- 2.21 The SPI contains some information on tax reliefs but does not cover all reliefs. We include an explicit estimate of gift aid repayments in our forecasts, but assume all other tax reliefs net off proportionately to the tax liability in each tax band. This is clearly a simplification, but it is not obvious why the extent to which it differs from reality should have changed materially between 2015-16 and 2016-17. The SPI also does not take into account uncollected amounts which are reflected in the outturn estimate.
- 2.22 It is also possible that the true amount of Scottish NSND liabilities in 2016-17 could be higher than HMRC's outturn estimate. The system is new, so it is likely to be subject to some uncertainty until it beds in. It seems more likely that if this were a source of error, it would understate true liabilities by missing some taxpayers that should be identified rather than wrongly classifying some non-Scottish taxpayers as Scottish. HMRC has not released information that would allow us to identify where in the earnings distribution the difference between SPI-based liabilities and outturn lies, but as we noted in October HMRC did provide information on taxpayer numbers that suggested these were much lower than expected for higher and additional rate taxpayers, which is likely to be the case for liabilities too.

### Our latest forecasts for the Scottish and Welsh shares

- 2.23 As the new SPI does not fully match to outturn we continue to calibrate our Scottish forecast to the 6.7 per cent share implied by the 2016-17 outturn. Our March UK-wide NSND forecast over-forecast outturn too, but by a smaller margin, so we calibrate this element too.
- 2.24 It is possible that some of the factors that led us to over-forecast the Scottish share of NSND liabilities in 2016-17 could also be relevant to our estimate of the Welsh share, but many appear to be Scotland-specific – such the oil and gas sector's role or any anticipatory behaviour on the part of taxpayers expecting income tax rates to rise in the future. On this basis, we have decided against revising the Welsh share down in this forecast.

- 2.25 When forecasting the share for both Scotland and Wales we expect the broad trends set out in Chart 2.1 to continue in the absence of policy changes by the devolved administrations. The downward trends reflect four main factors discussed below: population growth; labour market trends; differing trends in the distribution of income; and policy decisions.

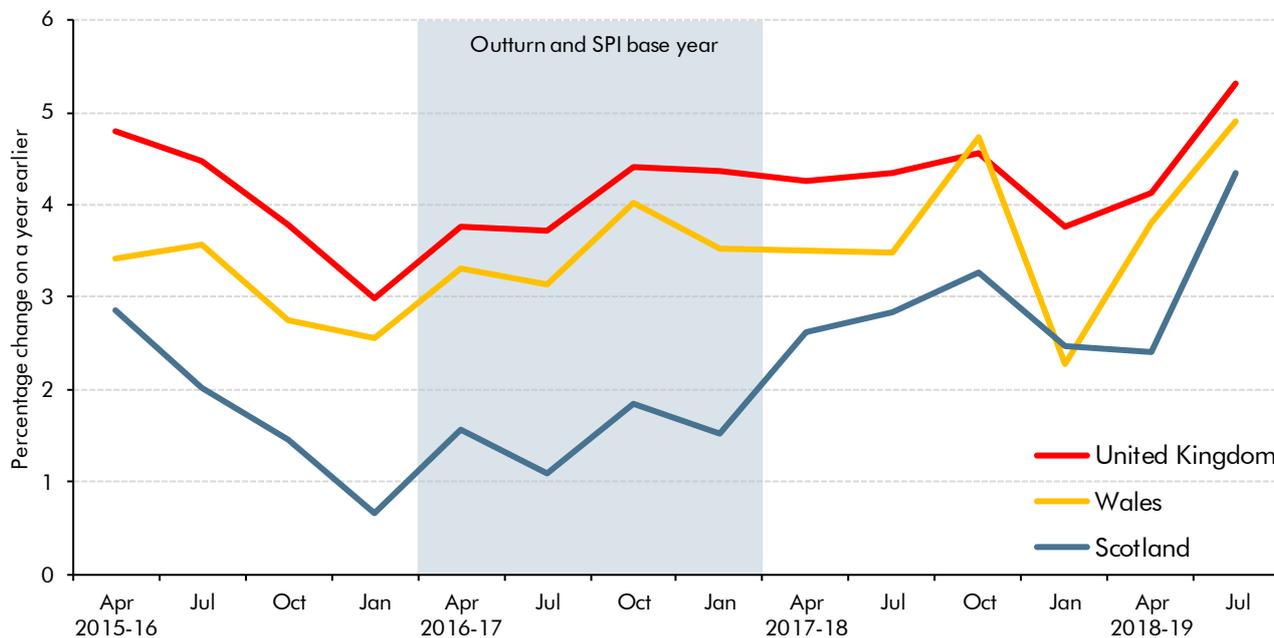
## Population trends

- 2.26 Trends in population differ across the countries of the UK, with the Scottish and Welsh populations assumed to grow more slowly than the UK as a whole. This is explained by lower life expectancy, fertility and net international migration. We base our forecasts on the 2016-based ONS principal population projections that were published in October 2017, which we use to adjust the projected Scottish and Welsh shares of income tax. We use the projected share of 'adults aged 16 and over' for this adjustment. It is not sensitive to using the 'total' or 'working-age' populations. The respective adult population projections were set out in Table 2.1 of our November 2017 *Devolved taxes forecast* document.
- 2.27 We have not changed our methodology for this forecast, but we have rebased our Scottish forecast to 2017-18 to account for labour market differences that we describe below.

## Labour market trends

- 2.28 After considering the overall size of the population, the proportion of the population in employment and their productivity will also be key influences on the relative share of NSND income. We had implicitly assumed that the employment rate and output-per-worker in Scotland and Wales follows the UK as a whole, neither converging nor diverging. We now include an adjustment to the starting point of the Scottish tax forecast.
- 2.29 Chart 2.2 shows the path of total employee earnings growth (i.e. combining the effect of growth in employee numbers and average earnings per employee) in the UK, Wales and Scotland, as recorded in HMRC's RTI system. It shows that growth in Scotland has been consistently slower than the UK average, particularly in 2015-16 and 2016-17.

Chart 2.2: Quarter-on-quarter total earnings growth



Source: HMRC

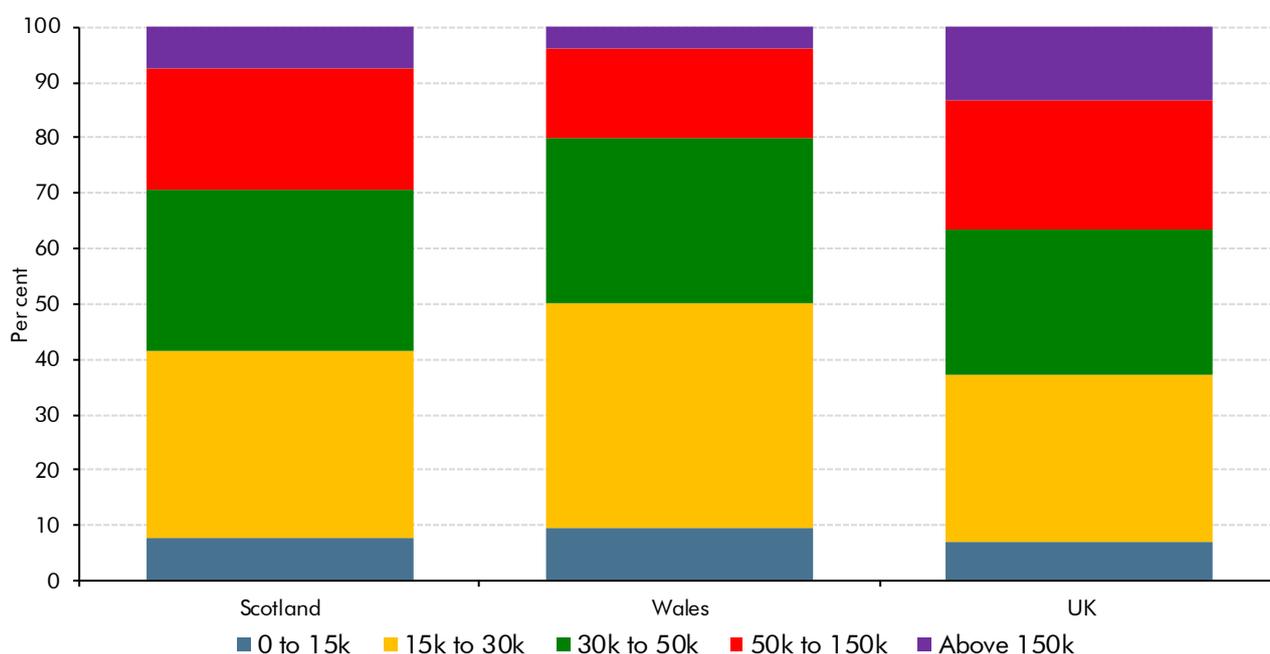
- 2.30** If we had incorporated the information in Chart 2.2 in our March 2018 forecast, it would have reduced the 'projection error' element of our over-forecast of the Scottish share from 0.20 to 0.06 percentage points. We have therefore used the information in respect of 2017-18 to calibrate our forecast for the Scottish share. Specifically, Scotland's share of total earnings fell from 7.90 per cent in 2016-17 to 7.79 per cent in 2017-18, so we have reduced our 2017-18 assumption for the tax share proportionally. Thereafter, we assume that Scotland's share only decreases in line with Scotland's population share. The earnings change in 2017-18 may in part be due to behavioural effects associated with the Scottish Government's decision to freeze the higher rate threshold in cash terms in 2017-18, so we also remove an estimate of this behavioural effect from our forecast.
- 2.31** There are uncertainties around this new judgement. RTI is a relatively new statistical series and it only reflects earnings on which tax is paid via PAYE. We assume that the Scottish share of self-employed earnings follows the same relative trajectory. The change implies a linear relationship with the size of the tax base (total earnings) and the level of tax. As we discuss below, the distribution of income and policy parameters will also affect this relationship.
- 2.32** The RTI data suggest that Scotland's share of total earnings has continued to fall in the first half of 2018-19. We have not adjusted for this as we believe these earnings data will be more distorted by the Scottish Government's larger policy changes in this year. These are already reflected in our forecast, so to adjust further would be to risk double-counting these policies' effects. From 2019-20 onwards we assume that Scottish earnings growth follows the path that we assume for the UK as a whole.

2.33 Total earnings growth in Wales, as captured via RTI, has been much closer to the UK average, so we have not made any additional adjustments to our forecast at this stage.

## The income distribution

2.34 The income distribution differs between Scotland, Wales and the UK as a whole. While income tax rates and thresholds have varied over time, those on higher incomes have always been subject to higher marginal tax rates. Chart 2.3 shows the comparable proportion of taxpayer income by income bands in the 2016-17 SPI.

Chart 2.3: Proportion of total taxpayer income by taxpayer income bands



Source: HMRC

2.35 While the new SPI shows some changes in the distribution relative to 2015-16, the broad picture remains: compared to the UK the proportion of taxpayer income attributable to individuals with incomes below £30,000 is higher in Scotland, and more so in Wales; that pattern is reversed for incomes over £50,000 – and particularly for those over £150,000.

2.36 The starting distribution has consequences for the forecast, because the more that the distribution is concentrated in the higher marginal tax brackets, the faster income tax receipts will grow for a given increase in average earnings, all else equal. The distribution affects the numbers of taxpayers who cross tax thresholds and start paying higher marginal rates. This effect is known as ‘fiscal drag’.

2.37 Higher income individuals have a stronger incentive for tax-motivated incorporation (TMI), given the greater differential between their effective income tax rate and the rate of corporation tax. Over recent years TMIs have been increasing and we include a TMI adjustment in our Scottish and Welsh forecasts to account for this. There was not sufficient time to update our TMI model for the 2016-17 SPI, but the sensitivity of our forecasts for the Scottish and Welsh shares to updating these assumptions is likely to be small.

## Policy changes since 2016-17

- 2.38 Changes to tax policy can have different effects in Scotland or Wales relative to the rest of the UK. We have adjusted the Scottish and Welsh shares used in our forecast to reflect the asymmetric effect of policies that have been implemented since 2016-17, and whose effects are therefore not captured in outturn or the latest available SPI. We use HMRC's Personal Tax Model (PTM), which incorporates 2016-17 SPI base data, to estimate these effects.
- 2.39 In October we revised down our estimate of the revenue generated by the Scottish Government's increases to the higher and additional/top rates by around £30 million a year to account for the weaker-than-expected growth at the top-end of the distribution implied by the outturn tax liabilities data. We retain this assumption, but as these measures still raise money, they offset the downward trend in the Scottish share.

## UK forecast

- 2.40 Table 2.4 shows our UK forecast of tax liabilities on NSND income prior to including the effects of the Scottish Government's policy measures announced since our October forecast. Compared to October we have revised up liabilities in all years from 2017-18 onwards.

Table 2.4: Whole UK forecast of tax liabilities on non-savings, non-dividend income

	£ billion							
	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
October forecast <sup>1</sup> (a)	160.4	165.8	173.2	177.4	183.7	190.2	198.1	207.0
March forecast <sup>2</sup>	160.4	166.9	175.6	176.7	187.3	194.5	202.2	210.4
March forecast <sup>1</sup> (b)	160.4	166.9	175.6	180.4	187.9	195.1	202.8	211.0
Forecast revision (b-a)	0.0	1.1	2.3	3.0	4.1	4.9	4.7	4.0
<b>March post-measures forecast</b>	<b>160.4</b>	<b>166.9</b>	<b>175.6</b>	<b>176.8</b>	<b>187.4</b>	<b>194.6</b>	<b>202.3</b>	<b>210.4</b>

<sup>1</sup> Excluding October measures.

<sup>2</sup> Including October measures.

- 2.41 Our PAYE income tax forecast has been revised upwards to reflect both strong in-year receipts and earnings growth since October. RTI analysis at the UK-level has suggested that earnings growth has been particularly strong at the tax-rich top of the earnings distribution.
- 2.42 January is a peak month for SA income tax receipts and in light of this year's receipts we forecast total SA income tax receipts to be £1 billion higher in 2018-19 than we did in October. In recent years, surprises in SA receipts have been dominated by those related to dividend income, so have not been relevant to our devolved NSND income forecasts. Initial HMRC analysis of this year's tax returns suggests that the strength is broadly based across the different income streams. This points to higher than previously assumed NSND liabilities in 2017-18. This strength is pushed through to future years of the forecast.<sup>3</sup>

<sup>3</sup> See Chapter 4 of our *EFO* for more information.

## Scottish forecast

### Pre-measures forecast

2.43 Our pre-measures Scottish income tax forecast is generated by applying assumed Scottish shares to our UK NSND liabilities forecast. Table 2.5 shows that the largest source of revision relative to October is the adjustment we make to account for RTI-based relative earnings performance in 2017-18. Factoring in the UK Government's Budget decisions from October (which was done separately in our October forecast) increases the Scottish share. This latest estimate does not account for the Scottish Government's higher rate threshold freeze in 2019-20, the effect of which is added at the end of the forecast process.

Table 2.5: Pre-measures Scottish share of NSND income tax

	Per cent of UK total for non-savings, non-dividend liabilities							
	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
October forecast	6.68	6.71	6.82	6.81	6.80	6.79	6.78	6.76
March forecast	6.68	6.64	6.74	6.77	6.74	6.74	6.72	6.71
<b>Change</b>	<b>0.00</b>	<b>-0.07</b>	<b>-0.09</b>	<b>-0.04</b>	<b>-0.05</b>	<b>-0.05</b>	<b>-0.06</b>	<b>-0.05</b>
<i>of which:</i>								
Scottish share of 2017-18 RTI earnings		-0.08	-0.08	-0.08	-0.08	-0.08	-0.08	-0.08
Other factors including previous announced measures		0.01	-0.01	0.04	0.03	0.03	0.02	0.03
<i>Index earnings 2017-18</i>	<i>100.00</i>	<i>98.65</i>						
<i>Index population share 2018-19 onwards</i>		<i>100.00</i>	<i>99.87</i>	<i>99.69</i>	<i>99.51</i>	<i>99.33</i>	<i>99.07</i>	<i>98.81</i>
<i>Combined index</i>	<i>100.00</i>	<i>98.65</i>	<i>98.52</i>	<i>98.35</i>	<i>98.17</i>	<i>97.99</i>	<i>97.73</i>	<i>97.48</i>

### Policy measures

2.44 There are now several differences in the tax schedule for NSND income between Scotland and the rest of the UK. In 2017-18 the Scottish Government froze the higher rate threshold (HRT) in cash terms whereas it increased in line with CPI inflation in the rest of the UK. In 2018-19 the Scottish Government introduced more substantial changes to rates and thresholds applied in Scotland, the key features being:

- **the introduction of two new bands within the basic rate** – a starter rate of 19 per cent and an intermediate rate of 21 per cent;
- **limiting the increase in the HRT** to below inflation; and
- **increasing the higher and the additional/top rate** by one percentage point to 41 per cent and 46 per cent respectively.

2.45 This resulted in very small cash giveaways to just over half of Scottish taxpayers, but larger cash takeaways from those higher up the income distribution, raising revenue overall.

2.46 In the Scottish Government's draft Budget in December 2018, it announced that the HRT would be frozen in cash terms in 2019-20.

2.47 Table 2.5 shows the UK and Scottish income tax rates and thresholds that we have used in this forecast. Most UK parameters from 2021-22 onwards rise in line with CPI inflation, while the additional rate threshold remains fixed in cash terms. For the Scottish parameters we also assume the additional/top rate threshold remains constant in cash terms, while the HRT increases in line with CPI inflation from its 2019-20 level. Powers over the personal allowance (PA) have not been devolved so it increases in line with the UK Government's policy settings. The Scottish Government could introduce a zero-rate band and has a stated policy intention to do this to raise the 'effective' PA to £12,750 in 2021-22 if it has not already reached this level. Our current forecast for CPI inflation suggests it will reach £12,740 in that year.

Table 2.6: NSND income tax parameters

	Per cent					
	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
<b>UK Government tax rates</b>						
Basic rate	20	20	20	20	20	20
Higher rate	40	40	40	40	40	40
Additional rate	45	45	45	45	45	45
<b>Scottish Government tax rates</b>						
Starter rate	n/a	19	19	19	19	19
Basic rate	20	20	20	20	20	20
Intermediate rate	n/a	21	21	21	21	21
Higher rate	40	41	41	41	41	41
Additional/ top rate	45	46	46	46	46	46
£						
<b>UK Government tax thresholds</b>						
Personal allowance	11,850	12,500	12,500	12,740	13,000	13,260
Higher rate	46,350	50,000	50,000	51,040	52,100	53,160
Additional rate	150,000	150,000	150,000	150,000	150,000	150,000
<b>Scottish Government tax thresholds</b>						
Personal allowance	11,850	12,500	12,500	12,740	13,000	13,260
Basic rate	13,850	14,549	14,593	14,873	15,176	15,480
Intermediate rate	24,000	24,944	25,206	25,686	26,205	26,730
Higher rate (OBR October 2018)	43,430	44,539	45,410	46,328	47,308	48,291
Higher rate (Baseline)	43,430	44,481	45,417	46,272	47,197	48,141
Higher rate (SG policy)	43,430	43,430	44,344	45,179	46,082	47,004
Additional/ top rate	150,000	150,000	150,000	150,000	150,000	150,000

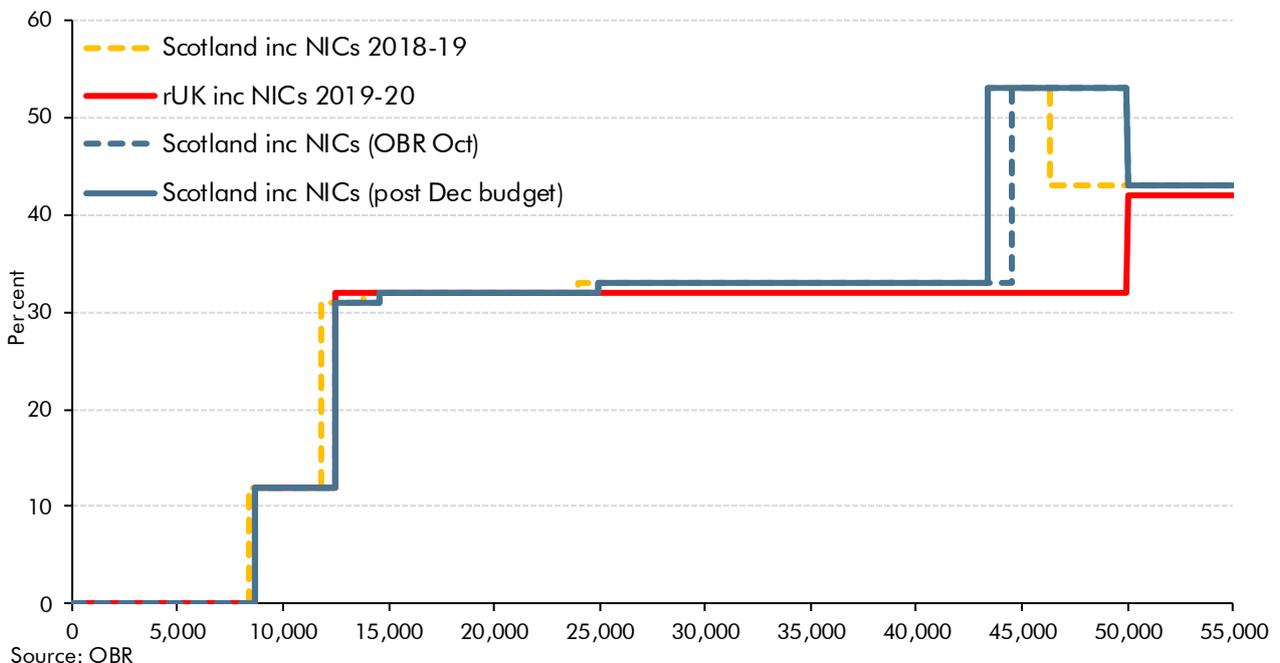
*Shaded cells represent estimated policy assumptions needed for forecasting purposes. For Scotland we have assumed that all tax band thresholds rise in line with CPI inflation except the additional/ top rate, which remains constant in cash terms.*

2.48 Charts 2.4 and 2.5 compare the income tax schedules in Scotland and the rest of the UK in 2018-19 and 2019-20, including National Insurance contributions (NICs). Chart 2.4 shows the respective income tax and NICs schedules on NSND income up to £55,000 – just beyond the higher rate threshold. The marginal rate in Scotland is lower on the first £2,049 of income above the personal allowance; equal on the next £10,395 of taxable income;

and higher thereafter (on all income above £24,944). The largest difference in marginal tax rates is on incomes between the two higher-rate thresholds (from £43,430 to £50,000) where the rate in Scotland will be 21 percentage points higher than in the rest of the UK. The width of the band between the two higher rate thresholds more than doubles in 2019-20, thanks to the threshold rising much faster than inflation outside Scotland but remaining fixed in cash terms in Scotland. The UK Government's decision to freeze the HRT at £50,000 in 2020-21 means the difference narrows somewhat in that year.

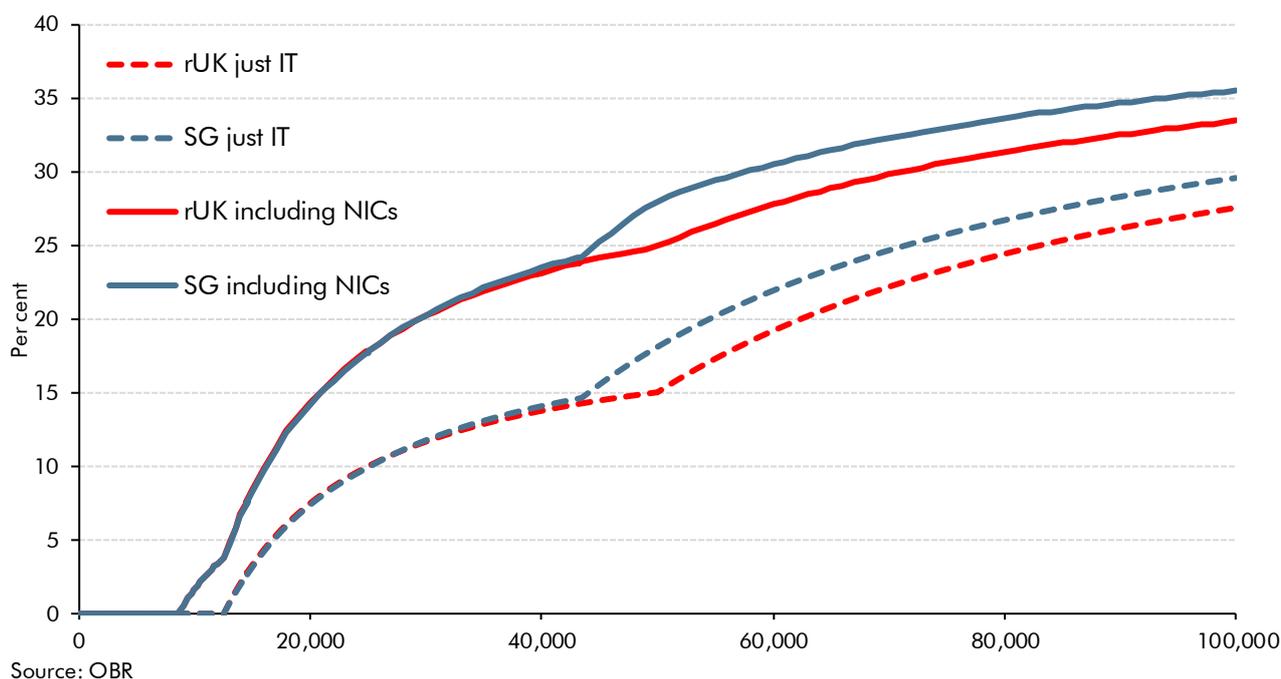
- 2.49 We have used HMRC's PTM to estimate the 'static' cost of these changes – i.e. before considering any behavioural response from taxpayers. As the static effect of the Scottish Government's latest change is dominated by the £210 per taxpayer raised from those earning above £44,481, we have adjusted the raw model output down to calibrate it to the lower number of Scottish higher and additional/top rate taxpayers reported in the HMRC outturn.
- 2.50 For the behavioural response to the Scottish Government policy change we use our standard estimates of taxable income elasticities. These suggest modest behavioural responses for changes in this part of the income distribution, particularly when marginal rates for most taxpayers do not change. Other possible behavioural effects – including on TMI or cross-border migration – are assumed to be very small given the small cash amounts involved for those affected.

Chart 2.4: Marginal tax rates on NSND earnings in Scotland and the rest of the UK



- 2.51 Chart 2.5 shows the average tax rates on employee earnings that result from the respective tax schedules. These are very similar at the lower end of the income distribution, but then diverge on incomes above the Scottish HRT.

Chart 2.5: Effective tax rates on NSND employee earnings in 2019-20



## Final post-measures Scottish income tax forecast

2.52 Table 2.6 sets out our new forecast for Scottish income tax liabilities, reflecting pre-measures revisions to the Scottish share and announced policy measures. It shows that the lower Scottish share resulting from the RTI adjustment has reduced the forecast but that this has been more than offset by upward revisions to our UK-wide NSND income tax forecast and by the HRT freeze in Scotland, which raises revenue.

Table 2.7: Changes in full Scottish NSND income tax since October

	£ million							
	Outturn		Forecast					
	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
October forecast	10,719	11,122	11,817	11,898	12,495	12,926	13,430	13,988
March forecast	10,719	11,077	11,828	12,037	12,708	13,190	13,679	14,197
<b>Change</b>		<b>-45</b>	<b>11</b>	<b>140</b>	<b>212</b>	<b>264</b>	<b>249</b>	<b>209</b>
of which:								
Adjusting for Scottish share of RTI 2017-18 earnings		-132	-142	-128	-140	-148	-154	-161
Scottish Govt policy costings				74	78	81	85	89
UK NSND forecast		61	148	192	270	325	310	258
Other <sup>1</sup>		25	6	2	5	6	8	23

<sup>1</sup> Includes gift aid estimates and recosting of previous measures.

## Comparison with Scottish Fiscal Commission forecasts

2.53 The SFC's latest tax forecast, published in December, is now closer to ours than was the case for the comparison between our October forecast and the SFC's May one. This is because both forecasts now reflect the surprisingly weak HMRC outturn estimate for 2016-

17. The SFC's latest forecast also reflects the UK Government's Budget income tax cuts. Remaining differences show that we are slightly more optimistic than the SFC in 2018-19, with the difference then fairly constant across the forecast. This is likely to reflect the strength in January's self-assessment receipts, which post-date the SFC's forecast.

Table 2.8: Income tax forecast comparison

	£ billion, unless otherwise stated							
	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
SFC December forecast	10.7	11.0	11.5	11.7	12.3	12.7	13.2	13.8
OBR March forecast	10.7	11.1	11.8	12.0	12.7	13.2	13.7	14.2
<b>Difference</b>		<b>0.1</b>	<b>0.4</b>	<b>0.4</b>	<b>0.4</b>	<b>0.4</b>	<b>0.4</b>	<b>0.4</b>
<i>Difference (per cent)</i>		<i>0.6</i>	<i>3.3</i>	<i>3.0</i>	<i>3.4</i>	<i>3.5</i>	<i>3.3</i>	<i>2.8</i>

## Welsh forecast

- 2.54 Our October estimate of the WRIT share of UK income tax in 2016-17 has proven to be relatively accurate, only slightly over-estimating the share. Our forecast for subsequent years is therefore little changed since October.
- 2.55 The share is slightly lower in the short term, reflecting the new SPI data, but the effect of the UK Government's Budget income tax cuts when applied to the income distribution drawn from the latest SPI leads to the Welsh share falling less quickly towards the end of the forecast than previously assumed. These changes are all very small in absolute terms.
- 2.56 As noted in paragraph 2.24, some of the factors that contributed to the downside surprise in the Scottish outturn for 2016-17 could be relevant to our estimate of the Welsh share, but many seem to be Scotland-specific. There is clearly uncertainty over SPI-derived estimates of the Welsh share. The 2019-20 WRIT liabilities outturn will not be available until 2021.

Table 2.9: Pre-measures WRIT share of income tax

	Per cent of UK total for non-savings, non-dividend liabilities							
	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
October forecast	1.22	1.21	1.20	1.20	1.19	1.19	1.18	1.18
March forecast	1.21	1.20	1.20	1.19	1.20	1.19	1.19	1.19
<b>Change</b>	<b>-0.01</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.01</b>	<b>0.01</b>	<b>0.01</b>
<i>Index relative population growth (2016-17=100)</i>	<i>100.0</i>	<i>99.9</i>	<i>99.7</i>	<i>99.6</i>	<i>99.3</i>	<i>99.1</i>	<i>98.9</i>	<i>98.6</i>

- 2.57 Table 2.10 shows our latest Welsh income tax forecast and provides a breakdown of the changes since October. The forecast is marginally higher from 2017-18 onwards, largely reflecting our higher UK-wide NSND liabilities forecast.

Table 2.10: Changes in Welsh income tax since October

	£ million							
	Estimated		Forecast					
	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
October forecast	1,935	1,983	2,062	2,059	2,163	2,232	2,315	2,406
March forecast	1,933	1,999	2,094	2,101	2,229	2,313	2,398	2,487
<b>Change</b>	<b>-2</b>	<b>16</b>	<b>32</b>	<b>42</b>	<b>66</b>	<b>80</b>	<b>83</b>	<b>81</b>
of which:								
Welsh share	-10	-8	-5	-2	2	5	9	12
UK NSND forecast	-2	11	25	33	46	56	53	44
Other <sup>1</sup>	10	14	12	11	18	20	21	24

<sup>1</sup> Includes gift aid estimates and recosting of previous measures.

2.58 The Welsh Government published its own forecasts in December. These were independently scrutinised by academics at Bangor University. There are many potential reasons for the differences between our forecast and the Welsh Government's. Notably, the Welsh Government uses a different model and economy forecast and does not reflect the recent receipts outturn. But overall our forecast is a little higher than the Welsh Government's, which is likely to reflect us factoring in the strong January self-assessment receipts.

Table 2.11: Comparison between Welsh Government and OBR forecasts

	£ million, unless otherwise stated			
	2019-20	2020-21	2021-22	2022-23
OBR forecast (October)	2,059	2,163	2,232	2,315
WG forecast (December)	2,059	2,166	2,248	2,335
OBR forecast (March)	2,101	2,229	2,313	2,398
<b>Difference</b>	<b>42</b>	<b>63</b>	<b>65</b>	<b>63</b>
<i>Difference (per cent)</i>	<i>2.0</i>	<i>2.9</i>	<i>2.9</i>	<i>2.7</i>

2.59 As required by the Welsh Government's fiscal framework, we have also split our WRIT, and England and Northern Ireland forecasts by tax band. This is set out in Tables 2.12 and 2.14 and uses the methodology we set out in September. Note that these tables are not comparable with Table 2.2, which splits all liabilities by taxpayers' marginal rate bands.

Table 2.12: WRIT forecast of tax liabilities on non-savings, non-dividend income by tax band

	£ million									
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24	
March forecast	1,891	1,933	1,999	2,094	2,101	2,229	2,313	2,398	2,487	
of which:										
Basic rate	1,615	1,654	1,716	1,797	1,818	1,922	1,993	2,064	2,139	
Higher rate	244	239	238	248	229	250	259	268	279	
Additional rate	32	40	45	49	53	57	61	65	69	
	Per cent									
Basic rate	85.4	85.6	85.8	85.8	86.6	86.2	86.2	86.1	86.0	
Higher rate	12.9	12.3	11.9	11.8	10.9	11.2	11.2	11.2	11.2	
Additional rate	1.7	2.1	2.2	2.4	2.5	2.6	2.7	2.7	2.8	

Shaded cells represent notional estimates for years when tax devolution has not occurred.

Table 2.13: England and Northern Ireland forecast of tax liabilities on non-savings, non-dividend income by tax band

	£ billion									
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24	
March forecast	138.9	145.3	151.2	158.9	159.9	169.6	176.1	183.1	190.5	
of which:										
Basic rate	71.9	73.5	76.7	80.4	82.3	86.7	90.1	93.5	97.2	
Higher rate	42.6	44.5	45.0	46.6	44.1	47.3	48.7	50.2	52.0	
Additional rate	24.5	27.3	29.6	32.0	33.5	35.6	37.4	39.3	41.4	
	Per cent									
Basic rate	51.8	50.6	50.7	50.6	51.4	51.2	51.1	51.1	51.0	
Higher rate	30.6	30.6	29.7	29.3	27.6	27.9	27.6	27.4	27.3	
Additional rate	17.6	18.8	19.6	20.1	21.0	21.0	21.2	21.5	21.7	

Shaded cells represent notional estimates for years when tax devolution has not occurred.

Table 2.14: England and Northern Ireland forecast of tax liabilities on non-savings, non-dividend income by tax band WRIT equivalent

	£ billion									
	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24	
March forecast	52.0	53.9	56.2	58.9	59.6	63.1	65.5	68.1	70.8	
of which:										
Basic rate	35.9	36.8	38.3	40.2	41.1	43.4	45.0	46.8	48.6	
Higher rate	10.6	11.1	11.2	11.6	11.0	11.8	12.2	12.6	13.0	
Additional rate	5.4	6.1	6.6	7.1	7.5	7.9	8.3	8.7	9.2	
	Per cent									
Basic rate	69.1	68.1	68.3	68.2	69.0	68.7	68.7	68.7	68.6	
Higher rate	20.5	20.6	20.0	19.8	18.5	18.7	18.6	18.4	18.4	
Additional rate	10.4	11.2	11.7	12.0	12.5	12.5	12.7	12.8	13.0	

Shaded cells represent notional estimates for years when tax devolution has not occurred.



# 3 Taxes on property transactions

## Introduction

- 3.1 There are three different property transaction tax systems operating in the UK: stamp duty land tax (SDLT) in England and Northern Ireland; land and buildings transaction tax (LBTT) in Scotland and land transaction tax (LTT) in Wales. This chapter compares their structures and sets out our latest forecast for each.

### Scottish land and buildings transaction tax

In April 2015 LBTT replaced SDLT in Scotland. LBTT is similar to SDLT in terms of surcharges, reliefs and exemptions, and different treatment for residential and commercial transactions. In April 2016, the Scottish Government introduced a 3 per cent additional dwelling supplement (ADS), similar to that introduced into SDLT at the same time. It applies to purchases of second homes and buy-to-let properties. On 30 June 2018, an LBTT first-time buyers' relief came into effect, raising the starting threshold for first-time buyers from £145,000 to £175,000. This is lower than the threshold in SDLT, but it applies to all first-time buyers unlike the SDLT version, which is only available for properties costing less than £500,000. LBTT is collected by Revenue Scotland rather than by HMRC.

- 3.4 On 12 December 2018 the Scottish Government announced as part of its draft budget two revenue raising LBTT changes, which came into force on 25 January 2019. First, the ADS rate increased from 3 to 4 per cent. Second, a new tax structure for commercial LBTT, raising the upper rate from 4.5 to 5 per cent, lowering the threshold at which the upper rate applies from £350,000 to £250,000 and lowering the starting rate from 3 to 1 per cent. The net effect increases tax paid on transactions over £350,000, which more than offsets the reduction in tax paid on transactions below £350,000.

### Welsh land transaction tax

- 3.5 In April 2018 LTT replaced SDLT in Wales. It also maintains broadly the same features as SDLT, including a 3 per cent additional properties surcharge, but it does not include a first-time buyers' relief. It is collected by the Welsh Revenue Authority rather than by HMRC.

## Comparison of the tax regimes

- 3.6 Chart 3.1 shows the marginal tax rates on residential property in SDLT, LBTT and LTT, excluding supplements and reliefs. Chart 3.2 shows the corresponding average effective tax rates. Compared with SDLT, both LTT and LBTT are more progressive, with lower rates on lower value transactions, and higher rates on more expensive ones. The effect of this on receipts is compounded by the distribution of transactions, with around two-thirds of those in Wales being below the first LTT threshold of £180,000, half of those in Scotland being

below the first LBTT threshold of £145,000, but just a quarter of those in the rest of the UK being below the first SDLT threshold of £125,000.

3.7 Since the thresholds for all three are fixed in cash terms, house price inflation over time will lead to increases in the share of transactions in the higher tax bands, increasing the average effective tax rate. This is known as ‘fiscal drag’, which results in receipts rising faster than house prices over time. When compared to SDLT, the more progressive nature of LTT and LBTT could lead to greater fiscal drag as higher marginal rates apply at lower prices.

Chart 3.1: Residential property marginal tax rates: main rates

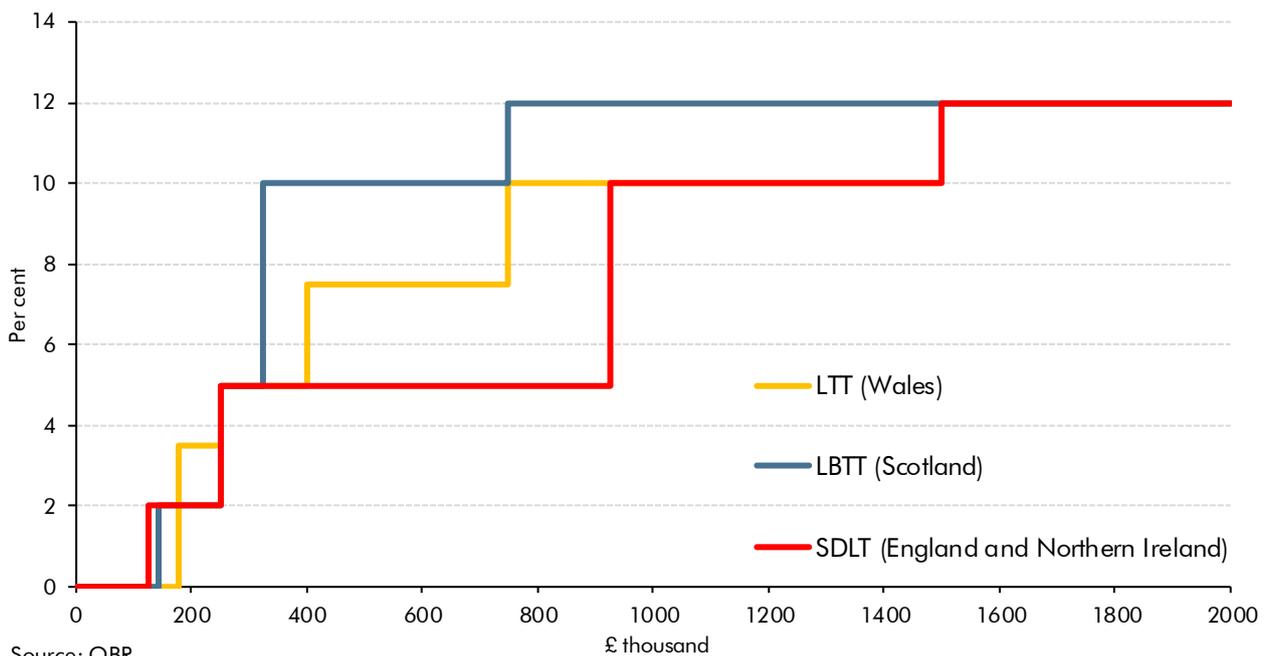
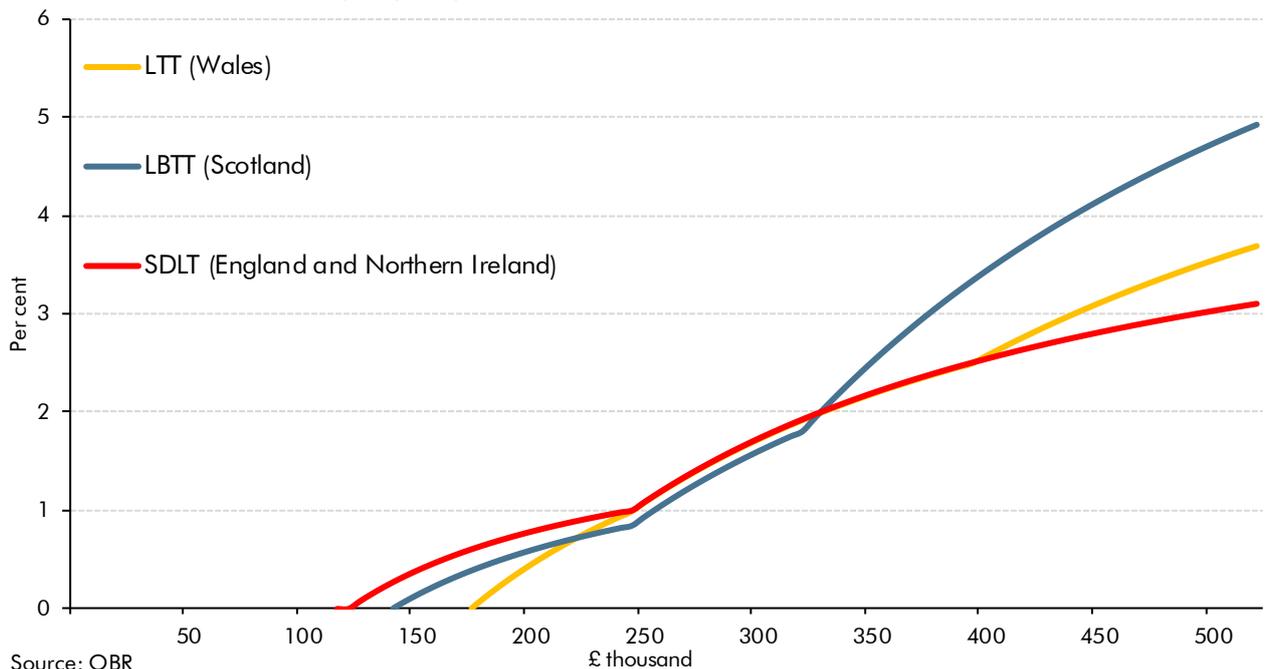
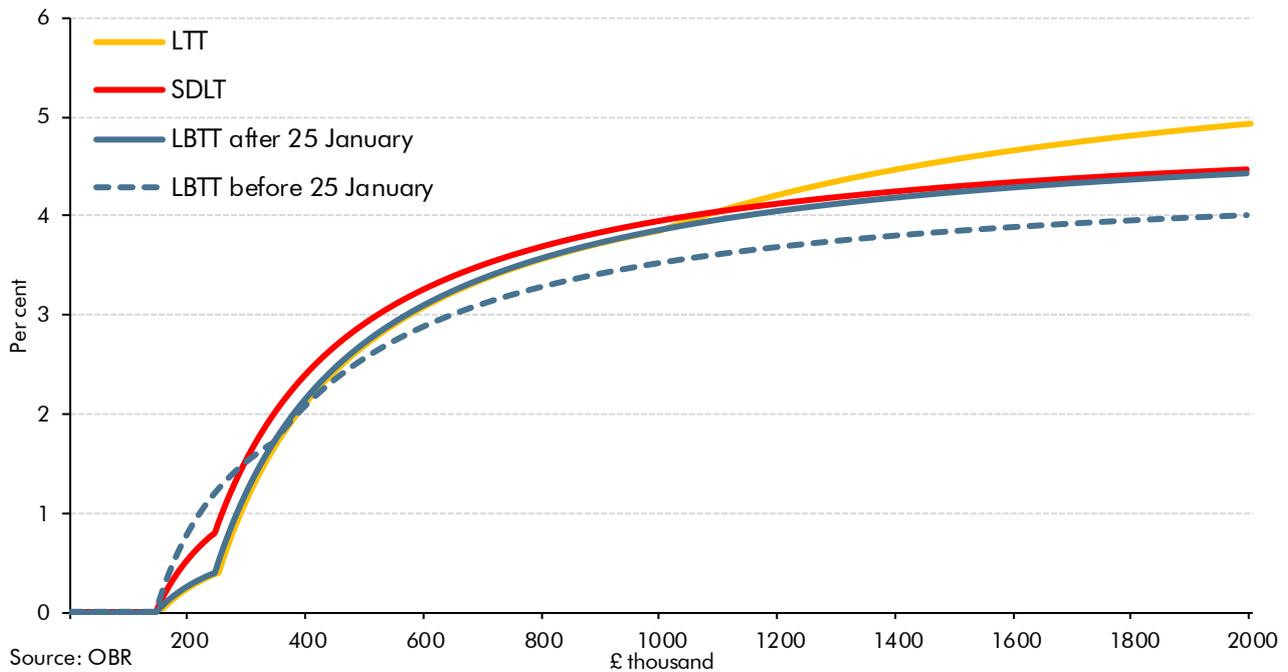


Chart 3.2: Residential property effective tax rates: main rates



- 3.8 Chart 3.3 shows the effective tax rates for commercial property, where the differences are considerably smaller at a given price point across the three tax regimes. It includes a comparison of the effective tax rates for Scotland before and after the rate changes that took effect in January. LBTT and LTT rates are now the same for purchases up to £1 million.

Chart 3.3: Commercial property effective tax rates: main rates



## Methodology

- 3.9 We use different models for each of the property tax forecasts. For SDLT we use a microsimulation based on a full sample of individual transactions from a given base year, which are grown in line with our property price and transactions forecasts, before appropriate tax schedules are applied to calculate revenue. This model is run on our behalf by HMRC. The base years used are quarter four 2016 to quarter three 2017 for the main residential rates, calendar year 2018 for first-time buyers' relief and the 2017-18 fiscal year for commercial SDLT. These choices each reflect the search for a base period that is affected as little as possible by policy changes.
- 3.10 Our approach to forecasting LBTT and LTT is unchanged from October. Our LBTT model for the main residential rates uses mean and median price data for 2017-18 from Registers of Scotland to calculate a log-normal distribution for the Scottish market. The distribution is then grown by our house price and transactions forecast before applying the tax schedule. We assume the ratio of mean to median prices remains constant. The Scottish Fiscal Commission (SFC) uses a similar method. We have used the SFC's models to cost the effect of the Scottish Government policy changes to the ADS and commercial rates and thresholds.
- 3.11 Our Welsh LTT model uses a 'price-bins' methodology and is operated on our behalf by the Welsh Government. It is conceptually similar to a microsimulation except that it models

aggregate transactions within relatively small ‘bins’ rather than individual transactions, calculating the tax due on the average price in the bin, and then projecting that forward in line with our forecasts for prices and transactions. There are separate models for residential and commercial properties. The price-bins model is based on data from 2017.

- 3.12 We assume that Scottish and Welsh prices and transactions rise in line with those for the UK as a whole. While house prices start at different levels, we assume that prices neither converge nor diverge any further, either between countries or within them. We add any additional effects from new policy measures to produce the post-measures forecasts.

## Stamp duty land tax forecast

- 3.13 We have revised down our SDLT forecast since October. This is set out in Tables 3.1 and 3.2. Residential receipts have been stronger than expected but both our house price inflation and housing transactions forecasts are significantly weaker in the short term, with lower average house prices throughout the forecast. Our commercial property market forecast is slightly stronger, but the effect of that is more than offset by much weaker-than-expected in-year receipts.
- 3.14 Based on the latest data we have revised up the expected cost of the first-time buyers’ relief a little. We have also revised down the proportion of initial additional dwellings surcharge payments that will ultimately be refunded from 20 to 18 per cent. Steady-state outturns will still not be known for some time due to the 36-month window for claims.

Table 3.1: Changes in the SDLT forecast

	£ billion						
	Outturn		Forecast				
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
<b>Total SDLT</b>							
October forecast	12.9	11.9	12.3	13.0	13.8	14.6	15.9
March forecast	12.9	11.9	11.6	12.4	13.4	14.3	15.5
<b>Change</b>		<b>0.0</b>	<b>-0.7</b>	<b>-0.6</b>	<b>-0.5</b>	<b>-0.4</b>	<b>-0.4</b>
<i>of which:</i>							
Residential receipts		0.2	0.2	0.3	0.3	0.3	0.3
House prices		0.0	-0.5	-0.7	-0.6	-0.5	-0.5
Residential transactions		0.0	-0.3	0.0	0.1	0.1	0.1
Commercial receipts		-0.3	-0.3	-0.3	-0.4	-0.4	-0.4
Commercial property market		0.1	0.1	0.1	0.1	0.1	0.1
Other		0.0	0.0	0.0	0.0	0.0	-0.1

Table 3.2: Composition of the SDLT forecast

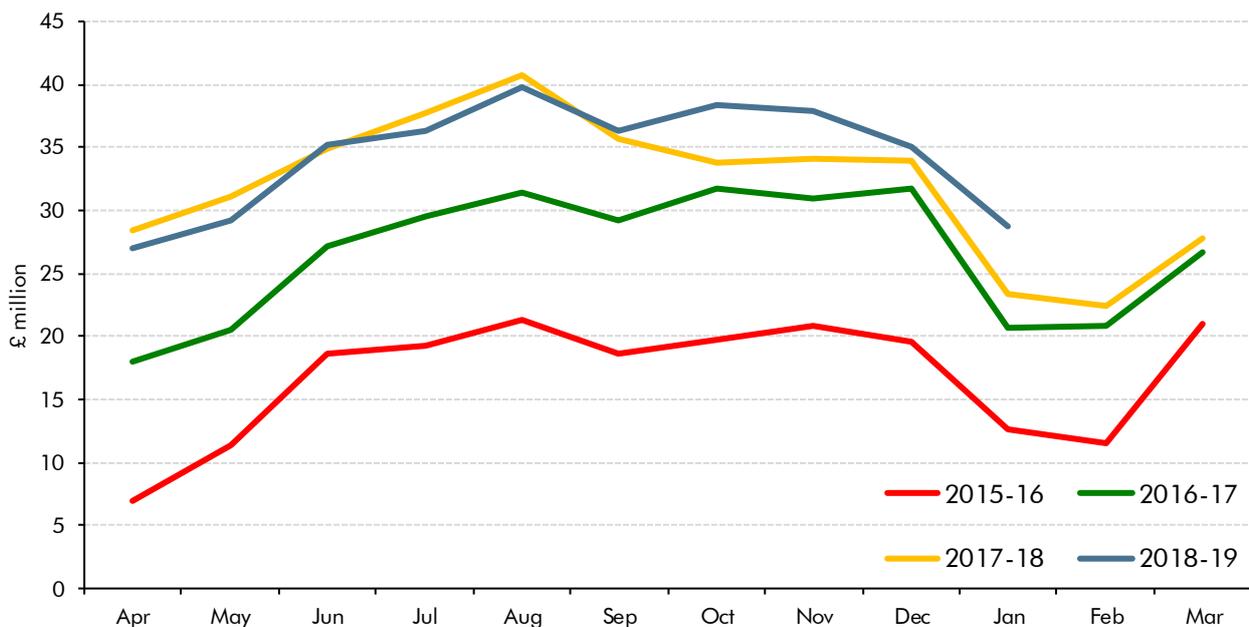
	£ billion						
	Outturn 2017-18	2018-19	2019-20	Forecast 2020-21 2021-22 2022-23 2023-24			
<b>Residential SDLT (excluding additional properties)</b>							
Autumn forecast	7.4	6.6	7.0	7.5	8.1	8.7	9.6
March forecast	7.4	6.8	6.6	7.2	7.9	8.6	9.5
<b>Change</b>		<b>0.2</b>	<b>-0.4</b>	<b>-0.3</b>	<b>-0.2</b>	<b>-0.1</b>	<b>-0.1</b>
<b>Higher rates on additional dwellings (HRAD)</b>							
Autumn forecast	1.9	1.7	1.7	1.9	2.0	2.1	2.3
March forecast	1.9	1.7	1.6	1.8	1.9	2.1	2.2
<b>Change</b>		<b>0.0</b>	<b>-0.1</b>	<b>-0.1</b>	<b>0.0</b>	<b>0.0</b>	<b>0.0</b>
<b>Commercial SDLT</b>							
Autumn forecast	3.6	3.6	3.6	3.7	3.8	3.9	4.0
March forecast	3.6	3.4	3.4	3.4	3.5	3.7	3.8
<b>Change</b>		<b>-0.2</b>	<b>-0.2</b>	<b>-0.2</b>	<b>-0.2</b>	<b>-0.2</b>	<b>-0.2</b>

## Land and buildings transaction tax forecast

### Latest LBTT outturn data

3.15 The latest LBTT monthly tax data published by Revenue Scotland are presented in Charts 3.4 and 3.5.<sup>1</sup> Chart 3.4 shows the monthly profile of residential receipts. Compared to 2017-18, residential receipts in 2018-19 had followed a similar trend up to September, but since our October forecast receipts have been up on the previous year. January 2019 receipts may have been distorted by forestalling ahead of the increase in the ADS rate.

Chart 3.4: Residential LBTT including initial ADS payments but excluding refunds

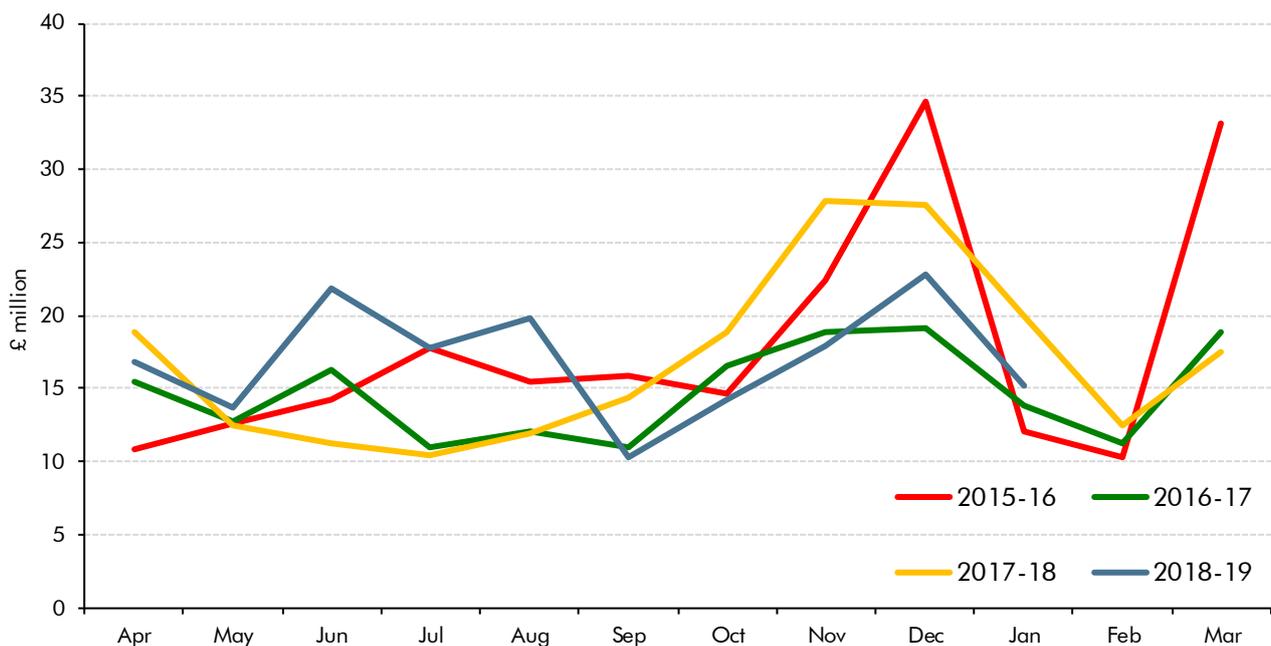


Source: Revenue Scotland

<sup>1</sup> A small amount of revenue from the additional dwelling supplement is reported in Revenue Scotland statistics as occurring from commercial transactions. We include this revenue within commercial outturn for these charts, but it is contained within residential transactions for our forecast. Throughout we use information from Revenue Scotland's monthly statistics publication.

3.16 Chart 3.5 shows the monthly profile of commercial LBTT receipts. Receipts over the summer were stronger than in previous years, with June receipts almost double last year's outturn. August was the last month of receipts available when we closed our October forecast. Since then receipts have shown less of a pick-up than previously seen in these months. January receipts again may have been distorted due to the policy change. The monthly profile for commercial LBTT can be distorted by a small number of large transactions.

Chart 3.5: Commercial LBTT receipts



Source: Revenue Scotland

## LBTT policy costings

- 3.17 In December 2018 the Scottish Government announced two policies that increase LBTT, restructuring the rate and thresholds of commercial LBTT and increasing the ADS rate from 3 to 4 per cent.
- 3.18 The SFC produced costings for both and we have to a large extent used the same methodology. We are grateful to SFC colleagues for costing the measures for us using our latest property market determinants.
- 3.19 In both cases the SFC costings use a relatively well-defined tax base and apply standard long-run behavioural effects. These suggest higher transaction taxes lead to fewer transactions with the tax also lowering prices (and vice versa).<sup>2</sup> As the changes were pre-announced, some taxpayers are likely to have avoided the tax increases by accelerating their transactions, an effect known as forestalling.<sup>3</sup>

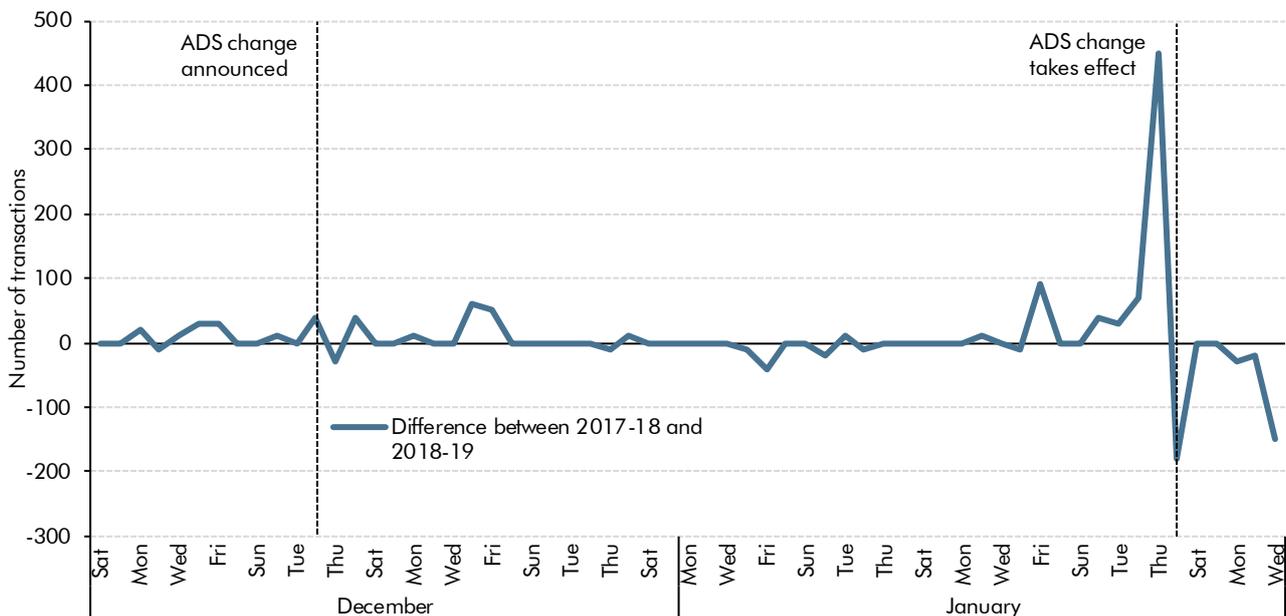
<sup>2</sup> Our standard elasticities are set out in supplementary material published alongside our 2017 *Forecast evaluation report*.

<sup>3</sup> For more information on previous historical examples see our working paper Mathews (2016) *Working Paper No.10: Forestalling ahead of property tax changes*.

3.20 As well as updating for the latest determinants we have made two adjustments to the SFC ADS costing that slightly reduce the expected yield from the rate increase:

- First, the SFC assumes **some of the ADS transactions ‘lost’ due to long-run behavioural elasticities will be displaced to first-time buyers and owner-occupiers.** We have assumed that this effect will be slightly smaller than the SFC did. We assume there is no displacement effect in 2018-19, 25 per cent in 2019-20, 50 per cent in 2020-21 before reaching the same 75 per cent steady-state as the SFC assumes from 2021-22 onwards. The SFC assumes that the displacement effect will be 50 per cent in 2018-19 and 2019-20, rising to 75 per cent thereafter.
- Second, Revenue Scotland has provided information on the daily number of transactions, so we are able to reflect actual outturns around the implementation date. Chart 3.6 shows the difference in the number of transactions on a given day of the week between 2017-18 and 2018-19. **Forestalling** can clearly be seen from the large increase in transactions on Thursday 24 January 2019 compared to the equivalent Thursday (25 January) in 2018. The SFC costing did include a forestalling effect, but on this basis we have assumed a slightly larger effect in 2018-19.

Chart 3.6: Forestalling before ADS policy change



Source: Revenue Scotland

3.21 The commercial LBTT changes represent a small giveaway for low-value transactions but this is more than offset from the higher rates that will be paid by higher-value transactions. This costing is relatively straightforward in applying the new tax parameters to the existing distribution of transactions in the SFC’s forecast model. There are too few transactions each day to estimate commercial LBTT forestalling.

## LBTT forecast

3.22 Table 3.3 shows our latest forecasts for residential and commercial LBTT. Relative to October the forecast is slightly lower, with the weakness in commercial receipts outweighing the boost to ADS receipts from the higher rate.

Table 3.3: Land and buildings transaction tax forecast

	£ million						
	Outturn 2017-18	2018-19	2019-20	Forecast			
				2020-21	2021-22	2022-23	2023-24
<b>Total LBTT</b>							
October forecast	558	591	617	652	696	747	808
March forecast	558	566	592	631	693	754	826
<b>Change</b>		<b>-31</b>	<b>-33</b>	<b>-28</b>	<b>-10</b>	<b>0</b>	<b>10</b>
<b>Residential LBTT (excluding ADS)</b>							
October forecast	260	251	273	300	331	367	412
March forecast	260	263	252	285	330	375	428
<b>Change</b>		<b>7</b>	<b>-28</b>	<b>-22</b>	<b>-7</b>	<b>0</b>	<b>8</b>
<b>Additional dwellings supplement (ADS)</b>							
October forecast	95	93	98	104	110	117	125
March forecast	95	97	125	129	138	147	157
<b>Change</b>		<b>4</b>	<b>27</b>	<b>25</b>	<b>27</b>	<b>29</b>	<b>31</b>
<b>Commercial LBTT</b>							
October forecast	203	247	246	248	255	262	271
March forecast	203	206	215	217	225	233	241
<b>Change</b>		<b>-41</b>	<b>-31</b>	<b>-31</b>	<b>-30</b>	<b>-30</b>	<b>-29</b>

3.23 Table 3.4 breaks down the changes in our residential LBTT forecast since October. The increase in the forecast is due to receipts data and the rise in the ADS rate, more than offsetting the effect of weaker house price inflation.

Table 3.4: Changes in residential LBTT since October

	£ million						
	Outturn 2017-18	2018-19	2019-20	Forecast			
				2020-21	2021-22	2022-23	2023-24
October forecast	355	344	371	404	441	485	538
March forecast	355	360	376	414	468	522	584
<b>Change</b>		<b>16</b>	<b>5</b>	<b>10</b>	<b>27</b>	<b>37</b>	<b>47</b>
<i>of which:</i>							
Receipts outturn		15	14	16	23	31	42
House prices		-1	-22	-32	-29	-27	-28
Property transactions		2	-9	1	4	5	4
Policy: ADS rate rise		1	23	25	29	28	29

3.24 Table 3.5 breaks down the revisions to our commercial LBTT forecast since October. The main changes are from the weakness in receipts late last year. Receipts in the first half of 2018-19 were exceptionally strong, but they were then very weak from September to November. We have revised down our estimate for 2018-19, lowering future years too. The policy change and a slightly stronger commercial property market forecast slightly offset the weakness from in-year receipts.

Table 3.5: Changes in commercial LBTT since October

	£ million						
	Outturn	Forecast					
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
October forecast	203	247	246	248	255	262	271
March forecast	203	206	215	217	225	233	241
<b>Change</b>		<b>-41</b>	<b>-31</b>	<b>-31</b>	<b>-30</b>	<b>-30</b>	<b>-29</b>
of which:							
Receipts outturn		-45	-45	-45	-45	-45	-46
Property market determinants		1	1	1	1	2	2
Policy changes		2	13	13	14	14	15

## Comparison with SFC forecasts

3.25 The SFC published its latest LBTT forecast in December 2018. Our latest forecast, as shown in Table 3.6, is lower than the SFC's in the near-term but higher towards the end of the forecast period. This is primarily caused by our residential forecast. Property transaction taxes are one of the most volatile revenue streams, so forecasts for them are subject to considerable uncertainty.<sup>4</sup> The net effect of the policy costings is similar, though slightly lower in the short run in our forecast.

Table 3.6: Comparison between Scottish Fiscal Commission and OBR forecasts

	£ million					
	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
SFC December 2018	569	643	680	716	751	787
OBR March 2019	566	592	631	693	754	826
<b>Difference</b>	<b>-4</b>	<b>-51</b>	<b>-50</b>	<b>-23</b>	<b>4</b>	<b>39</b>
of which:						
Residential	-1	-41	-33	-8	18	53
Commercial	-3	-11	-17	-15	-14	-14

## Land transaction tax forecast

3.26 Our Welsh LTT forecasts are produced on our behalf by Welsh Government analysts using price-bins models for residential and commercial transactions, consistent with our UK-wide property price and transactions forecasts. There have been no new policy changes that affect LTT included in this forecast.

3.27 The first ten months of receipts data have been published by the Welsh Revenue Authority. Despite being close to the end of the fiscal year, our forecasts for 2018-19 are still subject to uncertainty. As a new tax it is difficult to predict the monthly path of receipts across the year and this is particularly the case for LTT as forestalling ahead of its introduction will have distorted the profile.

<sup>4</sup> See Box 3.1 of our 2016 *Forecast evaluation report* for more information on forecasting property transaction taxes.

3.28 Our forecasts for Welsh LTT are set out in Table 3.7, with the last year of Welsh SDLT shown for comparison. Both our residential and commercial forecasts are lower than in October.

Table 3.7: Welsh LTT forecasts

	£ million						
	Outturn	Forecast					
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
<b>Total SDLT / LTT</b>							
October forecast	258	238	255	269	290	316	348
March forecast	258	234	234	247	270	296	323
<b>Change</b>		-4	-21	-22	-20	-21	-25
<b>Residential (excluding additional properties)</b>							
October forecast	101	97	112	125	140	159	182
March forecast	101	96	98	110	125	143	162
<b>Change</b>		-1	-13	-15	-15	-16	-20
<b>Additional properties</b>							
October forecast	58	65	64	64	68	72	77
March forecast	58	63	58	59	64	68	73
<b>Change</b>		-2	-6	-5	-4	-4	-4
<b>Commercial</b>							
October forecast	99	76	79	80	83	86	89
March forecast	99	75	78	78	81	85	88
<b>Change</b>		-1	-1	-1	-1	-1	-1

Shaded cells represent national estimates for years when SDLT devolution has not occurred.

3.29 Table 3.8 breaks down the changes in our residential forecast since October. Residential LTT is weaker in all years due to lower-than-expected receipts and weaker house prices. We have adjusted our receipts and fiscal drag modelling, so that the downward effect compounds across the forecast period.

Table 3.8: Changes in residential Welsh SDLT and LTT since October

	£ million						
	Outturn	Forecast					
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
October forecast	159	162	176	189	208	231	259
March forecast	159	159	156	169	189	211	235
<b>Change</b>		-3	-19	-20	-19	-20	-24
<i>of which:</i>							
Receipts outturn		-4	-4	-6	-8	-11	-14
House prices		-1	-10	-15	-13	-12	-13
Property transactions		1	-5	1	3	3	2

Shaded cells represent estimates for years when SDLT devolution has not occurred.

3.30 Table 3.9 shows the changes in our Welsh commercial LTT forecast since October. Our forecast remains considerably lower than 2017-18, which may have been an outlier year for commercial property transactions in Wales, with SDLT receipts of nearly £100 million. Year-to-date receipts suggest they are likely to come in close to our October forecast and close to receipts in the previous two years.

Table 3.9: Changes in commercial Welsh SDLT and LTT since October

	£ million						
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
October forecast	99	76	79	80	83	86	89
March forecast	99	75	78	78	81	85	88
<b>Change</b>		-1	-1	-1	-1	-1	-1
of which:							
Receipts outturn		-4	-4	-4	-4	-4	-4
Property market determinants		3	3	3	3	3	4

Shaded cells represent national estimates for years when SDLT devolution has not occurred.

### Comparison with the Welsh Government LTT forecast

3.31 The Welsh Government published its own forecasts in December. These were independently scrutinised by academics at Bangor University. The difference between our latest forecast and the Welsh Government's is largely driven by our weaker residential receipts forecast.

Table 3.10: Comparison between Welsh Government and OBR LTT forecasts

	£ million					
	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
WG December 2018	239	256	270	292	318	349
OBR March 2019	234	234	247	270	296	323
<b>Difference</b>	-6	-22	-23	-21	-22	-26
of which:						
Residential	-4	-20	-21	-19	-20	-24
Commercial	-2	-2	-2	-2	-2	-2



# 4 Environmental and transport taxes

## Landfill taxes

### Background

- 4.1 Landfill tax applies to waste disposed of at a landfill site unless the waste is specifically exempt. Our forecast is driven by the tax base (the amount of waste sent to landfill) and the effective tax rate that will be paid (largely driven by policy decisions on rates, but also by the composition of waste sent to landfill as there are two different rates). Both elements represent sources of uncertainty. The volume of waste sent to landfill has been on a downward trend, both in absolute terms and relative to the size of the economy.
- 4.2 Scottish landfill tax replaced the UK equivalent with effect from April 2015. Landfill tax in Wales was replaced with landfill disposals tax (LDT) from April 2018. The Scottish and Welsh Governments have so far both set rates that match those in the rest of the UK. Other than the treatment of payments to respective communities funds in lieu of tax, which have small fiscal effects, landfill taxation is very similar across the UK. We have set out more information on our landfill taxes forecasts in the 'forecasts in-depth' pages on our website.

### Methodology

- 4.3 We use a model for Scottish landfill tax developed by the Scottish Fiscal Commission (SFC). It is structured in a similar way to the model operated on our behalf by HMRC that forecasts landfill tax in England and Northern Ireland. Both start with assumptions about the growth in waste arising, then make reductions for recycling, incineration and other non-landfill waste treatment infrastructure. The remaining tonnage is assumed to enter landfill, to which forecasts for effective tax rates are applied. The SFC model uses more Scottish-specific information and assumptions. The HMRC model includes an explicit forecast for growth in waste exports, which is not explicitly adjusted for in the SFC model.
- 4.4 Our forecast for LDT has been produced for us by Welsh Government analysts. This model does not take into account trends in waste arising or recycling – implicitly assuming the net level remains constant across the forecast – but is able to take more explicit account of changes in Welsh infrastructure such as incineration capacity affecting the tax base.
- 4.5 The tax rates are assumed to rise in line with RPI inflation each year, consistent with each Government's default indexation assumptions.
- 4.6 We add the effect of any new policy measures to produce our post-measures forecast.

## Scottish Government ban on biodegradable municipal waste

- 4.7 The Scottish Government has legislated to ban the landfill of biodegradable municipal waste (BMW) from January 2021. In October we noted the ban as a policy risk, but did not include it in our central forecast pending sufficient evidence to understand the year-by-year profile of waste that would be diverted from landfill.
- 4.8 In December the SFC included the effect of the ban in its central forecast for the first time. This followed guidance from the Scottish Environment Protection Agency (SEPA), including implementation and enforcement details. The preliminary findings from a report for the Scottish Government have set out that viable routes existed for this waste to be diverted away from Scottish landfill, primarily through using English incinerators and landfill sites or by exporting it outside the UK<sup>1</sup>. On this basis we have included the effects of the ban in our central forecast too.
- 4.9 Our static costing of the ban uses the SFC's estimate of BMW currently paying Scottish landfill tax, based on European Waste Catalogue (EWC) data. Unlike the SFC we also need to estimate how much of the diverted waste leads to more landfill in England, about which there is little evidence. As there is a relatively large landfill tax gap<sup>2</sup>, we have assumed that the ban will not be fully complied with. We assume three types of responses:
- 89 per cent of BMW is directly or indirectly **diverted to landfill sites in England**. This figure is calibrated using the latest estimate of the UK landfill tax gap – it is a proxy for the proportion of waste that complies with the ban through geographical diversion strategies. It means around £70 million a year of receipts are diverted from the Scottish to the UK Government across the forecast. This occurs both from Scottish waste being landfilled in England, and from Scottish waste displacing English waste in incinerators or in export markets with this displaced waste in turn being landfilled in England.
  - 4 per cent of BMW continues to be landfilled in Scotland and **pay the full rate tax in Scotland**. This proxies for non-compliance. It could include, for example, waste that is correctly classified as biodegradable for tax purposes, but is misclassified as not being from a municipal source.
  - 7 per cent of the BMW is fully **diverted out of taxed landfill**. This could occur in several ways. First, there may be some spare capacity in English incinerators or in export markets. Unfortunately, the relevant analysts in DEFRA have been reallocated to Brexit work and we were therefore unable to update our waste treatment infrastructure forecast. Given the relatively high cost of landfill we assume most English incinerators are already operating at close to capacity. Second, biodegradable waste could still be landfilled in legal sites, but incorrectly declared as non-biodegradable and thus paying little or no tax. Third, waste could be illegally dumped and go untaxed. Finally, the

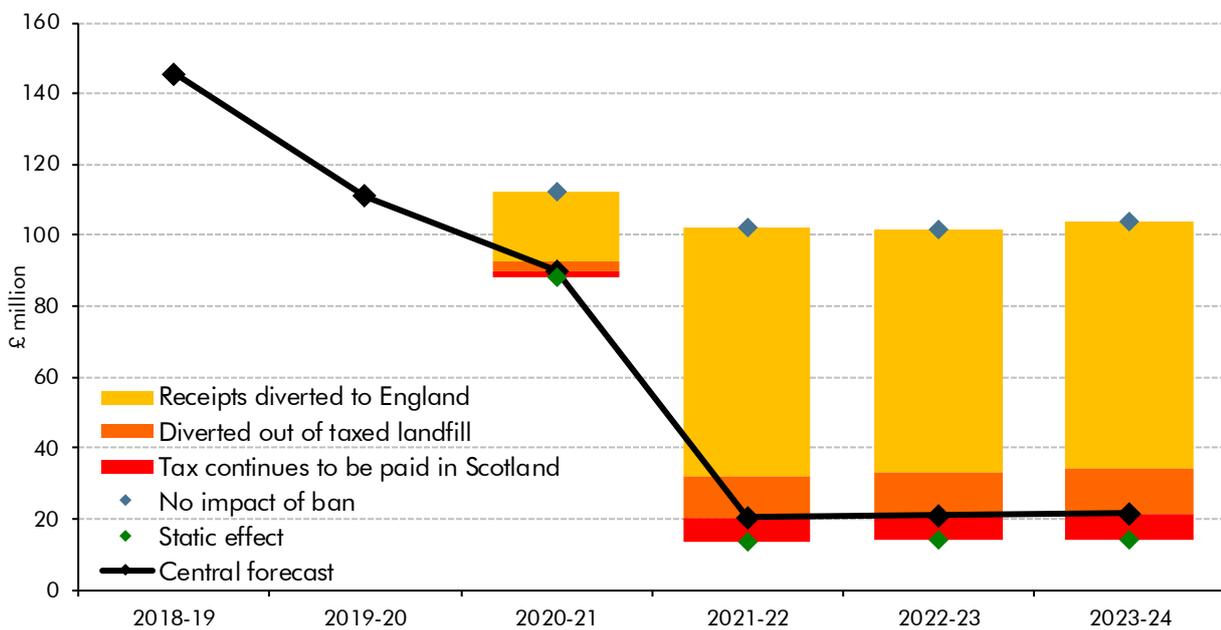
<sup>1</sup> The Scottish Government has told us the report will be published shortly.

<sup>2</sup> The latest estimate of the landfill tax gap is 11.3 per cent for England, Wales and Northern Ireland. HMRC (2019) *Measuring tax gaps 2018 edition: Tax gap estimates for 2016-17*.

higher costs could prompt less waste to be generated, increases in recycling, or faster construction of incinerators and other alternative treatment infrastructure. Our forecast already assumes waste falls relative to GDP and that more infrastructure will come into use, the latter drawing on the SFC’s forecast, which itself is based information from SEPA on its detailed site-specific infrastructure plans. We hold the recycling rate constant, since there has been very little change across the UK since 2014.

4.10 Chart 4.1 sets out the impact of BMW ban on our forecast. It shows the split between receipts diverted to England, those diverted out of landfill and those continuing to pay.

Chart 4.1: Effect of biodegradable municipal waste ban



Source: Revenue Scotland, OBR

### UK Government landfill tax forecast

4.11 Table 4.1 shows our latest forecast for landfill tax from disposals in England and Northern Ireland. The largest change relates to the Scottish Government’s ban on landfill of BMW causing Scottish waste to be diverted, directly or indirectly, to English sites.

4.12 Other than the ban, changes since our October forecast are fairly small. Receipts appear to have been stronger than expected this year, but this is slightly offset by stronger exports. The UK Government has announced no measures that directly affect landfill tax since October.

4.13 Unlike many other revenue streams, a major disruption to the UK’s trading relationship with the EU presents an upside risk to this forecast, as it would be expected to constrain waste exports and so increase the volume of waste that needs to be landfilled and taxed in the UK.

Table 4.1: England and Northern Ireland landfill tax forecast – liabilities basis

	£ million						
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
October forecast	717	672	591	538	527	482	404
March forecast	717	681	598	562	601	552	472
<b>Change</b>		<b>9</b>	<b>7</b>	<b>24</b>	<b>74</b>	<b>70</b>	<b>67</b>
<i>of which:</i>							
Effect of Scottish biodegradable waste ban		0	0	20	70	69	70
Other		9	7	5	4	2	-3

## Scottish landfill tax receipts in 2018-19

4.14 Revenue Scotland publishes quarterly data on the tax declared. Receipts data were available for the first quarter of 2018-19 when we closed our October forecast. Since then receipts for the second quarter have also been published and were close to the level we expected in October. Receipts from the third quarter of 2018-19 were published on 8 March, after we had closed our forecast. They were broadly in line with our forecast.

## Scottish landfill tax forecast

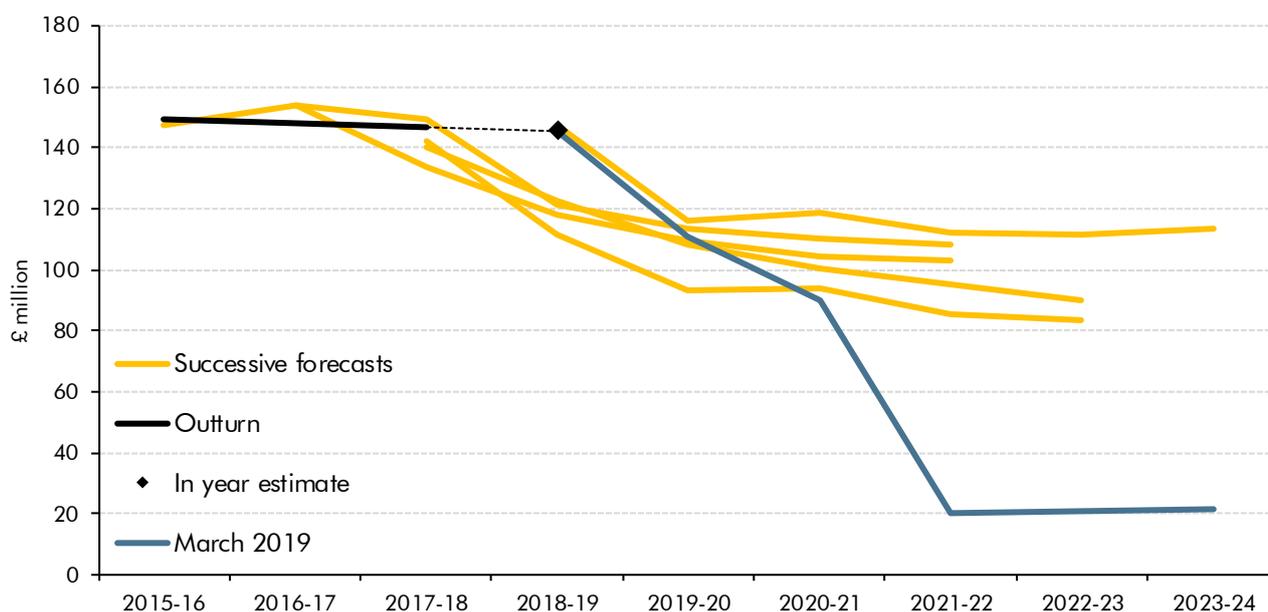
4.15 Table 4.2 sets out our forecast for Scottish landfill tax receipts. It has been revised down substantially since October. This is almost entirely due to the ban on landfilling BMW. We expect receipts to fall very sharply in 2021-22 once the ban has come into effect in January 2021. Other changes to the forecast are relatively modest. The decline in receipts between 2018-19 and 2019-20 is driven by an expected increase in incineration capacity.

Table 4.2: Scottish landfill tax forecast

	£ million						
	Outturn		Forecast				
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
October forecast	147	147	116	119	112	112	114
March forecast	147	146	111	90	20	21	22
<b>Change</b>		<b>-2</b>	<b>-5</b>	<b>-29</b>	<b>-92</b>	<b>-91</b>	<b>-92</b>
<i>of which:</i>							
Effect of Scottish biodegradable waste ban		0	0	-23	-82	-81	-82
Other		-2	-5	-6	-10	-10	-10

4.16 Chart 4.2 sets out successive OBR forecasts for Scottish landfill tax receipts. It shows that we have consistently forecast receipts to fall, reflecting assumed declines in Scottish landfilled waste, in part due to expectations about alternative treatment infrastructure coming online. These reductions have yet to be realised. Our latest forecast is subject to the same risks around delays in infrastructure capacity, but now includes more risk from the uncertain effects of the BMW ban from 2021 onwards.

Chart 4.2: Scottish landfill tax forecasts



Source: Revenue Scotland, OBR

4.17 The SFC published its most recent landfill tax forecast in December 2018. Table 4.3 compares the SFC's forecast with our own. In the short run ours is higher than the SFC's as we take a slightly more pessimistic view on new infrastructure. In later years, ours is higher as we assume some non-compliance with the BMW ban, reducing its effect on receipts.

Table 4.3: Comparison to Scottish Fiscal Commission forecast

	£ million						
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
SFC December 2018	148	136	104	83	13	13	14
OBR March 2018	147	146	111	90	20	21	22
<b>Difference</b>	<b>-1</b>	<b>10</b>	<b>7</b>	<b>7</b>	<b>8</b>	<b>8</b>	<b>8</b>

## Welsh LDT receipts in 2018-19

4.18 In October we forecast that Welsh LDT liabilities in 2018-19 would be substantially higher than estimated for 2017-18, but only based on one quarter of receipts data from the Welsh Revenue Authority (WRA). Since then two further quarters of data have been published showing receipts are broadly on track to meet our October full-year forecast.

## Welsh LDT forecast

4.19 Table 4.4 sets out our estimate of landfill tax receipts in Wales in 2017-18 and for LDT receipts thereafter. We have revised the forecast up marginally due to the latest in-year data. We have assumed no effect from the Scottish BMW ban, as we assume the cost associated with transporting waste from Scotland would be too high.

4.20 There are only small differences between our latest forecast and the latest Welsh Government forecast that was published in December 2018.

Table 4.4: Welsh share of landfill tax and LDT forecast

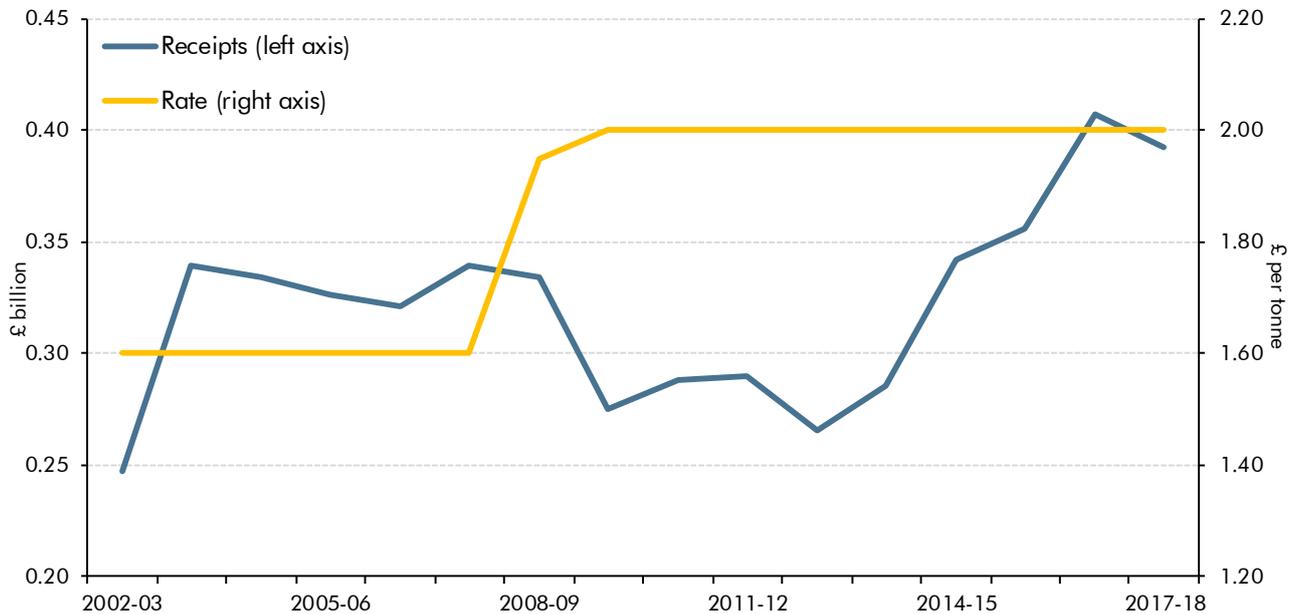
	£ million						
	Outturn		Forecast				
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
October forecast	29	44	40	36	34	32	31
March forecast	29	45	41	38	35	33	32
<b>Difference</b>		<b>2</b>	<b>1</b>	<b>1</b>	<b>1</b>	<b>1</b>	<b>1</b>

## Aggregates levy

### Background

- 4.21 The aggregates levy is a tax on the commercial exploitation of rock, sand and gravel. It is due from any business that quarries, dredges or imports these products. Our forecast for UK aggregates levy receipts is driven by the tax base (the volume of aggregates exploited) and the effective tax rate that will be paid (largely driven by policy decisions on the rates paid, but also by the composition of the tax base as some aggregates are relieved or exempt from the levy). The tax base represents the main source of uncertainty in the forecast, while the levy rate is subject to policy risk (as the UK Government tends not to raise it with inflation).
- 4.22 As Chart 4.3 shows, aggregates levy receipts fell significantly after 2008-09 but have been above their pre-crisis levels in cash terms since 2014-15. While the UK Government's stated indexation policy is to increase the aggregates levy rate each year by RPI inflation, it has actually been frozen at £2 per tonne since 2009-10. Indeed, in the 17 years since its inception the rate has only been increased twice.

Chart 4.3: UK aggregates levy rate and receipts



Source: HMRC, OBR

## Scottish and Welsh rates

**4.23** The UK Government has legislated to devolve the levy to Scotland and has committed to keeping devolution to Wales under review. In February longstanding litigation against the levy was concluded and the UK Government has announced a full review. Since we do not know the outcome of the review or when devolution will occur our forecasts are illustrative.

## Methodology

**4.24** The UK forecast is generated from a projection of the tax base, which broadly follows real GDP, and is multiplied by the tax rate. The rate is assumed to be updated by RPI inflation, consistent with the UK Government's default indexation policy. As noted, this represents a source of policy risk since the rate has in fact been frozen every year since 2009-10.

**4.25** The Scottish and Welsh shares of aggregates levy are not available from tax data, since taxpayers submit returns covering all their UK operations. We use HMRC's estimates of relevant aggregates production in Wales and Scotland, based on data from the 'UK minerals yearbook' (set out in Table 4.5). Unfortunately, the latest information relates to 2014-15 as the yearbook has not been published for several years.

**4.26** There are small differences between the total UK tonnage reported in the yearbook and that in HMRC's statistics based on tax returns. The Scottish Government bases its estimates on data from the yearbook in its 'Government Expenditure and Revenue Scotland' (GERS) publication. To produce the Scottish and Welsh forecasts, we apply the latest estimated share to the UK forecast.

Table 4.5: Aggregates tonnage in the UK

	Tonnes (million)							
	2007-08	2008-09	2009-10	2010-11	2011-12	2012-13	2013-14	2014-15
England	140.1	136.8	106.2	95.4	109.6	100.4	103.3	115.6
Scotland	37.2	32.3	28.4	28.6	28.8	25.9	23.2	25.4
Wales	20.8	18.0	12.2	12.6	14.3	12.8	13.6	16.7
Northern Ireland	29.5	23.0	20.4	16.2	13.3	12.2	12.2	13.8
UK	227.6	210.2	167.2	152.8	165.9	151.4	152.3	171.4
	Per cent of UK total							
Scotland	16.3	15.4	17.0	18.7	17.3	17.1	15.2	14.8
Wales	9.2	8.6	7.3	8.3	8.6	8.5	8.9	9.7

4.27 Finally, we add the Scottish and Welsh element of any policy measures to produce the post-measures forecast.

### UK, Scottish and Welsh forecasts.

4.28 Table 4.6 shows that our UK forecast is little changed since October, with small adjustments for the profile of recent receipts. No new measures that affect aggregates levy have been announced since our October forecast.

4.29 Table 4.5 showed that the Scottish share of UK aggregates tonnage is relatively high, but that it has been on a declining, if uneven, path, while the Welsh share decreased before rising above its 2007-08 share in 2014-15. We assume that the Scottish and Welsh shares remain constant at their most recent level, so both forecasts simply follow the UK forecast. The historical variability of these shares illustrates the uncertainty around each forecast.

Table 4.6: UK aggregates levy forecast

	£ million							
	Outturn estimate		Forecast					
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24	
October forecast	372	382	388	405	424	444	464	
March forecast	372	385	394	407	426	447	467	
<b>Change</b>		<b>3</b>	<b>6</b>	<b>2</b>	<b>2</b>	<b>3</b>	<b>3</b>	

Table 4.7: Scottish aggregates levy forecast

	£ million							
	Outturn estimate		Forecast					
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24	
October forecast	54	55	56	59	61	64	67	
March forecast	55	57	58	60	63	66	69	
<b>Change</b>	<b>1</b>	<b>1</b>	<b>2</b>	<b>1</b>	<b>2</b>	<b>2</b>	<b>2</b>	

Table 4.8: Welsh aggregates levy forecast

	£ million						
	Outturn estimate			Forecast			
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
October forecast	36	37	37	39	40	42	44
March forecast	36	37	38	40	42	44	45
<b>Change</b>		1	1	1	1	1	1

## Air passenger duty

### Background

- 4.30 APD is an excise duty that applies to passengers on flights leaving UK airports. Many passengers, including children or those connecting between flights, are exempt. The tax paid is determined by the final destination and class of travel. Destinations fall into two bands based on flight distance from London, with the higher duty rate applying to flights of more than 2,000 miles.
- 4.31 Our APD forecast assumes passenger numbers grow broadly in line with real GDP, with some adjustments for recent trends. Passenger numbers are multiplied by the duty rates in each financial year, which we assume will increase in line with RPI inflation, as the Government's default indexation assumptions stipulate. We have set out more information on our APD forecasts in the 'forecast in-depth' pages on our website.
- 4.32 Table 4.9 shows that UK receipts have increased steadily since the recession, although they fell in 2015-16 following a change to the long-haul bands that reduced the effective duty rate. The table also shows the estimated proportion of APD attributable to Scotland using methodologies developed by HMRC, the Scottish Government and the ONS:
- The **HMRC approach** uses unpublished data from the Civil Aviation Authority (CAA) on the number and destination of passengers departing from UK airports, adjusted to reflect CAA international air passenger route analysis and the ONS international passenger survey for flight bands and exemptions for interconnecting passengers. The Scottish share based on this approach has fluctuated – HMRC's latest estimates show an increase from 8.4 per cent in 2011-12 to 9.6 per cent in 2016-17.<sup>3</sup>
  - The **Scottish Government approach** is presented in its GERS publication. This uses published CAA data and different assumptions about the composition of flights by band and the number of interconnecting passengers.
  - The **ONS approach** is similar to the approach taken in GERS using CAA input data, but for the whole of the UK and with different assumptions used when applying the estimated number of passengers to the amount of tax paid.

<sup>3</sup> HMRC estimates in the two most recent years are lower than those in its 'Disaggregation of tax receipts' publication in October 2017. Analysis since publishing suggests a lower Scottish share to account for the exemption for child passengers.

4.33 Detailed Scottish data for 2018 are being collected by the CAA and it is hoped that this will resolve some of the differences between the three methods reported in Table 4.9.

Table 4.9: Estimates of air passenger duty receipts

	£ million								
	2009-10	2010-11	2011-12	2012-13	2013-14	2014-15	2015-16	2016-17	2017-18
<b>Total UK</b>	<b>1856</b>	<b>2155</b>	<b>2607</b>	<b>2791</b>	<b>3013</b>	<b>3175</b>	<b>3077</b>	<b>3157</b>	<b>3352</b>
<i>of which, Scotland:</i>									
HMRC	169	184	219	235	257	285	275	304	323
GERS	152	166	195	211	226	240	250	265	275
ONS	137	136	167	170	212	228	241	245	n/a
	Per cent of total UK								
HMRC	9.1	8.5	8.4	8.4	8.5	9.0	8.9	9.6	9.6
GERS	8.1	7.6	7.4	7.5	7.5	7.5	8.2	8.2	8.2
ONS	7.3	6.2	6.3	6.0	7.1	7.1	7.9	7.6	n/a

## Scottish tax rates

4.34 The Scotland Act 2016 includes provisions for the devolution of APD to Scotland. Our Scottish APD forecast is illustrative as the final timing of devolution has not been set.

4.35 When it is devolved, the Scottish Government has a stated policy intention to halve rates and eventually to abolish the tax. But we do not yet have specific details or a timescale for how and when these cuts will be implemented. For now, our forecast illustrates the potential revenue for Scotland on the basis of maintaining current APD rates. If rates in Scotland were to differ from those in the rest of the UK, estimating the effect on receipts would not be straightforward as there could be significant behavioural responses that we would need to take into account as passengers chose to use different airports and flight routes.

## Methodology

4.36 We continue to use the mid-point between the HMRC and Scottish Government approaches to estimate the Scottish share of APD receipts to produce our central forecast. Based on 2017-18 figures, the Scottish share used in the forecast is 8.9 per cent. There are risks to the forecast. On the downside, population growth in Scotland is projected to be slower than in the rest of the UK. This means that our forecast implies APD receipts per person increasing faster in Scotland than the rest of the UK, although not all passengers paying APD at Scottish airports will be Scottish residents. On the upside, Scottish airport capacity is less constrained than in some parts of the UK, which could lead to relatively faster growth in air passengers departing from Scottish airports, particularly on long-haul routes.

## UK and Scotland forecasts

4.37 Table 4.10 sets out our APD forecast for the UK, which we have revised down since October. This reflects weaker receipts so far in 2018-19, which is assumed to persist over the rest of the forecast.

4.38 There have been no new measures announced that directly affect air passenger duty since our October forecast.

Table 4.10: UK air passenger duty forecast

	£ million						
	Outturn		Forecast				
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
October forecast	3360	3659	3846	3987	4175	4361	4565
March forecast	3360	3584	3749	3891	4045	4244	4448
<b>Change</b>		<b>-75</b>	<b>-96</b>	<b>-96</b>	<b>-130</b>	<b>-117</b>	<b>-117</b>

4.39 Our methodology means the Scottish APD forecast moves in line with our UK-wide forecast, so it has been revised down as well.

Table 4.11: Scottish air passenger duty forecasts

	£ million						
	Outturn		Forecast				
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
October forecast	299	326	343	355	372	389	407
March forecast	299	319	334	347	361	378	396
<b>Change</b>		<b>-7</b>	<b>-9</b>	<b>-9</b>	<b>-12</b>	<b>-10</b>	<b>-10</b>

4.40 The SFC produced its most recent forecasts in December 2018, and these are lower than ours, as set out in Table 4.12. The main reason for the differences between our forecasts is because the SFC uses a lower share in line with the GERS historical estimate, whereas we use an average of the HMRC and GERS figures.

Table 4.12: Comparison between OBR and SFC forecasts

	£ million						
	Outturn		Forecast				
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
SFC December 2018	277	302	312	322	336	349	364
OBR March 2019	299	319	334	347	361	378	396
<b>Difference</b>	<b>23</b>	<b>17</b>	<b>23</b>	<b>24</b>	<b>25</b>	<b>29</b>	<b>32</b>



## 5 Scottish Government expenditure

### Scottish Government ‘annually managed expenditure’

- 5.1 Following the Scotland Act 2016, there are three main sources of funding for Scottish Government spending. First, the majority is currently funded from a (residual) block grant tightly linked to departmental expenditure limits (DELs) via the Barnett formula. Second, around 45 per cent of resource expenditure is self-financed from taxation. Finally, under the fiscal framework agreed between the Scottish and UK Governments, smaller amounts can be funded from Scottish reserves and borrowing.
- 5.2 In October 2018 the Treasury reclassified Scottish Government expenditure from central government DEL to ‘annually managed expenditure’ (AME), ostensibly because an increasing proportion of expenditure is self-financed from taxation and thus falls outside Treasury control. But we have not tried to forecast Scottish Government spending on public services by function – for example, we have not forecast education spending by forecasting how many school pupils there will be and the average cost of teaching them. Despite its reclassification as AME, we assume that this spending still remains largely under the control and discretion of the Scottish Government.
- 5.3 The Scottish Government announced its latest spending plans in December 2018. We have used these as the starting point to update our forecast, but have then adjusted each of the funding sources in line with our latest forecasts. First, we have increased expenditure funded from the residual block grant. DELs from 2020-21 onwards are outside the Spending Review period, so we have used the Treasury’s policy assumptions (in the same way we do for overall DEL spending). These show the Scottish residual block grant rising in line with overall DEL. They generate the largest change in our forecast since October. Further changes made in the Supplementary Estimates process have also increased our forecast. These include the Treasury granting flexibility to carry forward some of the additional funding into 2019-20 outside the normal operation of the Scotland Reserve, akin to the Budget Exchange process normally only used for spending managed under DEL budgets.
- 5.4 We have updated our self-financed expenditure forecast by applying the Scottish Fiscal Commission’s (SFC) 2019-20 income tax forecast, as this was used by the Scottish Government in its December budgeting plans. (The SFC’s forecast was more pessimistic than ours, which in effect reduced the Scottish Government’s planned expenditure in that year.) Over the Spending Review period we have updated our Scottish tax forecasts, increasing them largely due to stronger than expected income tax receipts (see Chapter 2). This has increased our forecast of expenditure in these years. Finally, we have reduced expenditure funded from the drawdown of the Scottish Government’s reserves by £200

million in 2018-19 and assumed a net addition to reserves of £50 million in 2019-20. We have made no changes to our Scottish Government borrowing forecasts.

Table 5.1: Scottish Government annually managed expenditure

	£ billion						
	Outturn	Forecast					
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
<b>Scottish Government's current expenditure</b>							
October forecast	26.5	27.6	28.1	29.3	30.2	31.1	32.2
March forecast	26.5	27.6	28.0	29.7	30.7	31.8	33.0
<b>Change</b>		<b>0.0</b>	<b>-0.1</b>	<b>0.4</b>	<b>0.5</b>	<b>0.7</b>	<b>0.8</b>
<b>Scottish Government's capital expenditure</b>							
October forecast	3.0	3.4	4.1	4.5	4.3	4.4	4.3
March forecast	3.0	3.4	4.2	4.5	5.0	5.1	5.2
<b>Change</b>		<b>0.0</b>	<b>0.0</b>	<b>0.0</b>	<b>0.6</b>	<b>0.7</b>	<b>0.9</b>

5.5 Social security benefits that have already been devolved are included in Scottish Government AME forecasts, whether originally part of DEL or AME. However, while most Scottish Government expenditure is more like relatively tightly controlled DEL, benefits are demand-led and must be paid to any claimant meeting the eligibility criteria. The resulting fluctuations in spending could affect decisions on, for example, the use of borrowing and reserves by the Scottish Government. In addition, some elements of DWP benefit and HMRC tax credit spending remain dependent, at present, on devolved benefits as qualifying criteria (and vice versa). As devolution of benefits progresses, we will produce forecasts of the larger of these benefits, in consultation with the Scottish Government and the SFC, to help inform our judgements on both the Scottish Government AME forecast, and our wider welfare spending forecasts. The rest of this chapter focuses on social security expenditure.

## Social security expenditure

5.6 The Scotland Act 2016 makes provision for several social security benefits to be devolved to the Scottish Government. The majority of these benefits support people who are disabled or in ill-health, or those who care for them.<sup>1</sup> The Scottish Parliament also has powers to create new benefits, top up reserved benefits and change some aspects of universal credit.

5.7 Most of the early benefits to be devolved in Scotland were smaller benefits included in the Department for Work and Pensions (DWP) DEL budget, so the planned funding was transferred to the Scottish Government block grant.<sup>2</sup> For these benefits, future changes to the block grant are determined by the Barnett formula. The first benefit included in AME to be devolved was carer's allowance, in September 2018. For this and other AME benefits to be devolved in future, a bespoke approach to block grant adjustments has been agreed

<sup>1</sup> The Scotland Act 2016 set out the following benefits to be devolved: attendance allowance, carer's allowance, disability living allowance, personal independence payment, industrial injuries disablement benefit, severe disablement allowance, cold weather payments, funeral expenses payment, sure start maternity grant, winter fuel payments and discretionary housing payments. The Act also provides for other areas to be devolved to the Scottish Government, including payments made under the Scottish welfare fund, the healthy start vouchers scheme and employability programmes.

<sup>2</sup> This covered funeral expenses payment, sure start maternity grant and discretionary housing payments.

between the Treasury and the Scottish Government. In broad terms it is based on trends in spending on the relevant benefits in England and Wales, adjusted for differences in population trends.<sup>3</sup> We are not responsible for determining these adjustments, but they can be mechanically calculated from our forecasts for England and Wales and the ONS population projections for the three countries.

- 5.8 The remaining social security benefits to be devolved under the Scotland Act 2016 will be transferred on 1 April 2020. The Scottish Government has issued a series of policy papers and consultations on the development of the system from that date, which will eventually see the administration of most benefits (or their replacements) transfer to Social Security Scotland (SSS). The sections below summarise the main proposals for Scottish benefits, but given that these represent aspirations subject to consultation rather than firm and sufficiently detailed policies, we have not adjusted our forecasts for them.

## Carer's allowance

### Background

- 5.9 Carer's allowance supports individuals providing full-time care for others. The rate for 2019-20 is £66.15 a week, with the rate for future years uprated in line with CPI inflation. Eligibility is contingent on both the carer and the recipient of care meeting several conditions. The recipient of care must already receive the relevant rate of a qualifying benefit.<sup>4</sup> The carer must provide care for at least 35 hours a week and earn less than £123 a week after deductions. Carer's allowance is also subject to various overlapping benefit rules. For example, claimants are not usually able to receive the state pension and carer's allowance at the same time, meaning that most claimants are of working age. Receipt of carer's allowance also means that the person being cared for cannot receive a severe disability premium in a means-tested benefit.

### Scottish carer's allowance

- 5.10 Carer's allowance in Scotland is currently administered by DWP on behalf of the Scottish Government. The Scottish Government has introduced a supplement for those who claim carer's allowance in Scotland, which will ensure they receive the same level of benefits as those claiming jobseeker's allowance if it had been increased in line with inflation. This was introduced in September 2018 (backdated to April 2018) and will be worth less than £10 a week over the forecast period. While the supplement seeks to support the same people, it is in effect a separate benefit rather than an increase in carer's allowance and will be subject to different operating procedures.<sup>5</sup> The increased generosity could raise take-up among those currently eligible but not claiming, including those receiving other benefits.

<sup>3</sup> The focus on England and Wales, rather than the rest of the UK, arises because DWP does not cover Northern Ireland, where benefits are administered separately (although almost always following DWP benefit rules).

<sup>4</sup> Disability living allowance highest or middle care, personal independence payment daily living component, attendance allowance, constant attendance allowance (subject to certain criteria) or armed forces independence payment.

<sup>5</sup> Carer's allowance supplement is paid as two lump sum payments covering six months each, based on qualifying dates in April and October each year. The cost of the supplement is met from the Scottish Government's existing block grant.

5.11 The Scottish Government intends to introduce its replacement benefit ‘carer’s assistance’ by the end of 2021, administered by SSS. It will open initially for new claimants only, but from spring 2022 it proposes to transfer existing carer’s allowance claimants from DWP, to complete by 2024. Initially carer’s assistance will be on broadly the same terms as the existing carer’s allowance, but with a stated aspiration to increase take-up and increase payments to people caring for more than one disabled child. At this stage, we have insufficient information on these changes to quantify the effects on our forecast.

## Trends in carer’s allowance expenditure

5.12 Table 5.2 sets out the caseload of carer’s allowance payments in Great Britain and Scotland in recent years (i.e. the caseload excluding those who are eligible but do not receive a payment due to the overlapping benefit rules). The caseload in Scotland has been relatively stable at 8.7 to 8.8 per cent of the Great Britain total since 2012-13. This is in line with Scotland’s 8.7 per cent share of Great Britain’s working-age population in 2016.

Table 5.2: Carer’s allowance payment caseload in Great Britain and Scotland

	Carer's allowance payment caseload (thousands)							
	2010-11	2011-12	2012-13	2013-14	2014-15	2015-16	2016-17	2017-18
Great Britain	521	553	584	618	653	698	760	798
Scotland	47	50	52	54	57	61	66	70
Per cent of Great Britain total								
Scotland	9.1	9.0	8.9	8.8	8.7	8.7	8.7	8.8

5.13 Table 5.3 shows DWP’s estimates of carer’s allowance expenditure, which also shows the Scottish share being relatively stable at 8.7 to 8.8 per cent in recent years.

Table 5.3: Carer’s allowance expenditure in Great Britain and Scotland

	Carer's allowance expenditure (£ millions)							
	2010-11	2011-12	2012-13	2013-14	2014-15	2015-16	2016-17	2017-18
Great Britain	1572	1733	1927	2088	2319	2545	2667	2830
Scotland	141	153	169	182	203	222	234	249
Per cent of Great Britain total								
Scotland	8.9	8.8	8.8	8.7	8.7	8.7	8.8	8.8

## Great Britain forecast

5.14 Since eligibility for carer’s allowance is related to receipt of other benefits, our forecasts are sensitive to changes in those related forecasts. Our carer’s allowance forecast has been affected by the upward revisions to our disability benefits forecasts in recent years. And since carer’s allowance is not usually received alongside state pension, spending has also risen as state pension age has been raised.<sup>6</sup> Our January 2019 *Welfare trends report (WTR)* described trends in the disability benefits caseload, which showed significant growth among

<sup>6</sup> Women’s state pension age rose from 60 to 65 between April 2010 and November 2018. State pension age for both men and women is now gradually rising further, and will reach 66 by October 2020.

children and working-age adults, as well as a general tendency for forecasts to be revised up over time. Around half of child disability benefit claimants have an associated carer’s allowance claimant, while around a fifth of working-age adult claims do. By contrast, fewer than 10 per cent of pensioners claiming disability benefits have a carer that receives carer’s allowance. These proportions are similar in Great Britain and in Scotland.

5.15 Table 5.4 shows our combined carer’s allowance forecast for Great Britain, for comparability with historical trends. The forecast is mostly lower than in October, which reflects three main changes. First, we have changed the forecast model that is operated on our behalf by DWP. It now generates a caseload forecast that links directly to our forecasts for the three key qualifying benefits: attendance allowance (AA), disability living allowance (DLA) and personal independence payment (PIP). This reduces the forecast in most years, but increases it in 2023-24. Second, increases in the forecasts for those qualifying benefits, and the rising proportion of PIP claimants with an associated carer, increases our forecast. Third, we allow for additional claims to carer’s allowance as a result of there being no severe disability premium in universal credit. Delays in the roll out of universal credit lower our forecast of this effect in the near term, partly offsetting increases from the updated qualifying benefit forecasts, but this effect diminishes over the forecast.

5.16 Our carer’s allowance forecast does not include any effects from measures announced since October, although we would expect there to be some consequences from the delay to rollout of PIP and the associated reduction in the number of scheduled award reviews being undertaken. For Scotland, the effect of this omission on spending is likely to be negligible.

Table 5.4: Great Britain carer’s allowance spending forecast (excluding Scottish Government supplement)

	£ million						
	Outturn		Forecast				
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
October forecast	2,830	3,038	3,304	3,511	3,757	3,999	4,134
March forecast	2,830	3,034	3,269	3,481	3,723	4,074	4,433
<b>Change</b>	<b>0</b>	<b>-3</b>	<b>-35</b>	<b>-31</b>	<b>-33</b>	<b>75</b>	<b>298</b>

### Scottish forecast

5.17 We use a very similar methodology as in October to produce the Scottish share of carer’s allowance spending, assuming that per capita spending follows the same profile as in England and Wales. We use the most recent outturn prior to devolution to adjust our forecast for England and Wales to cover the whole of the Great Britain. This allows for slower growth in Scotland’s working-age population relative to Great Britain as a whole. This is similar to the approach we take for our Scottish income and landfill tax forecasts. It results in the Scottish share decreasing slightly over time, with a modest effect on spending. Our forecast of carer’s allowance expenditure in Scotland is set out in Table 5.5. The main change is due to the revisions in our England and Wales carer’s allowance forecast.

Table 5.5: Scottish carer’s allowance spending (excluding Scottish Government supplement)

	£ million						
	Outturn		Forecast				
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
October forecast	249	267	290	308	329	349	359
March forecast	249	267	287	305	326	355	385
<b>Change</b>	<b>0</b>	<b>0</b>	<b>-3</b>	<b>-3</b>	<b>-3</b>	<b>7</b>	<b>26</b>
	Per cent of Great Britain total						
March forecast	8.8	8.8	8.8	8.8	8.7	8.7	8.7

5.18 Table 5.6 compares our forecast with that published by the SFC in December 2018. The SFC uses a different methodology to us.<sup>7</sup> But it produces a similar forecast in most years.

Table 5.6: Comparison between OBR and SFC forecasts

	£ million					
	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
SFC December forecast	266	283	305	324	344	364
OBR March forecast	267	287	305	326	355	385
<b>Difference</b>	<b>1</b>	<b>4</b>	<b>0</b>	<b>1</b>	<b>11</b>	<b>21</b>

5.19 There are some further refinements that we plan to investigate, such as any Scotland-specific trends that affect the qualifying benefit caseloads, the likelihood of a disabled claimant having a carer who meets the qualifying conditions, and the propensity of eligible individuals to take up their entitlement and whether we should take more account of changes in the age structure of the population.

## Disability benefits

### Background

5.20 The main disability benefits that will be devolved to Scotland from April 2020 are designed to support disabled people with the extra costs faced in daily life, as distinct from those designed to replace income lost from finding it harder to work. They comprise AA, DLA and PIP. Only one of these can be claimed at any one time, but their rates of payment are aligned in most ways. Eligibility for each is based on having a health condition or disability that results in a person having difficulty with daily living or getting around, though the detailed criteria and how they are assessed is different for each benefit.

5.21 The main features are:

- **Attendance allowance** can only be claimed by people aged over state pension age (or age 65 prior to November 2018), is available in respect of care needs only, and is paid at two rates – a higher rate and a lower rate.

<sup>7</sup> The SFC used a more complex age-specific ‘auto-regressive integrated moving average’ (ARIMA) model.

- **Disability living allowance** can now only be newly claimed by children aged under 16. It has two components: a ‘care’ component paid at three rates, of which the highest and middle rates are aligned with the two rates of AA; and a ‘mobility’ component that is paid at two rates. Before PIP was introduced in 2013, a new claim to DLA could be made by anyone under the age of 65, and anyone reaching age 65 could continue to receive DLA until they ceased to qualify. DLA claimants who turn 16 need to make a claim to PIP, while claimants aged under 65 when PIP was introduced are progressively being moved to PIP, a process that we now expect to be completed in February 2021. When this is complete, there will still be a large number of pensioners receiving DLA (those who were aged 65 or over in April 2013), as well as children. Whether pensioners receive help for mobility needs depends on whether they claimed a disability benefit before or after reaching state pension age<sup>8</sup> – a mobility component also cannot be added to a DLA claim after state pension age.
- **Personal independence payment** can be claimed by people aged between 16 and state pension age (or age 65 prior to November 2018), although claimants can continue to receive PIP when they reach state pension age. Like DLA it has two components: a daily living one and a mobility one, but unlike DLA there are only two daily living rates, which are equal to the highest and middle care rates of DLA (and the two rates of AA). As well as through new claims, claimants can come onto PIP from DLA when they reach 16 (though there will be some 16-year olds on DLA due to processing lags), when they have a relevant change of circumstance or as part of the managed reassessment that we expect to complete in February 2021.

5.22 The transition from DLA to PIP and the interactions between DLA/PIP and AA for pensioners mean that trends in these benefits are best considered together rather than in isolation. We looked at those trends in our January 2019 WTR.

## Scottish Government proposals

5.23 The Scottish Government recently issued a consultation<sup>9</sup> on its proposed replacements for AA, DLA and PIP, with an intention to introduce:

- disability assistance for children and young people (DACYP) in summer 2020;
- disability assistance for older people (DAOP) by the end of 2020; and
- disability assistance for working-age people (DAWAP) in early 2021.

5.24 Most changes being consulted on concern the administration of the benefit, with the Scottish Government Cabinet Secretary for Social Security and Older People stating: *“That means fewer face to face assessments, rolling awards with no set end points and those with fluctuating health conditions will not face additional reviews due to regular changes in needs*

<sup>8</sup> Until November 2018, the age limit for DLA and PIP was 65 for both men and women.

<sup>9</sup> *Social Security A Consultation on Disability Assistance in Scotland*, Scottish Government, March 2019

*related to their condition. If face to face assessments are necessary, they will be at a time and location that suits the person and carried out by suitably qualified assessors. We will also move the burden of collecting information from the client to Social Security Scotland.”<sup>10</sup>*

5.25 The only substantial structural changes proposed to date for disability benefits are to increase the upper age limit for child-related assistance to 18, for children who were in receipt of DACYP before their 16<sup>th</sup> birthday, and to change the definition of terminal illness.

5.26 In line with our usual practice for policy proposals that are subject to consultation, we do not include adjustments to our illustrative forecasts presented below. We will include them when the policy and administrative details are firmer. In doing so, we will be mindful of the lessons learned from the previous introduction of DLA and PIP by the UK Government, as we described in our *WTR*. The key lessons included:

- **The effects of major reforms on spending are hard to predict and subject to the risk of optimism bias.** Both major reforms cost more than expected. Two years after its introduction, DLA was costing around 25 per cent more than expected, while we estimate that PIP costs around 15 to 20 per cent more than a continuing DLA would have cost, rather than saving 20 per cent as originally intended.
- **Estimates of the prevalence of disability are substantially above those for the prevalence of disability benefit receipt,** suggesting there remains considerable scope for increases in take-up, even without system reform. But reforms that raise awareness of entitlement can themselves induce higher take-up among those that are eligible.
- **The full effects of reforms to the disability benefits system can take many years** to reach steady state, even decades in respect of continuing claims among pensioners.

## An illustrative projection

5.27 To produce our illustrative projection of spending on disability benefits in Scotland, we adopt a similar approach to that used for carer’s allowance. We assume that the share of spending in Scotland starts at the most recent outturn estimate (2017-18), then declines slowly in line with relative rates of population growth. Tables 5.7 and 5.8 show the recent trends in the caseloads for the three disability benefits in Great Britain and Scotland, and how the Scotland share has changed over time. They show that the share declined up to 2015-16, largely in line with slower population growth, but increased a little in 2016-17 and 2017-18, despite the Scottish population continuing to grow more slowly than in Great Britain as a whole.

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<sup>10</sup> *Building better Disability Assistance benefits*, Scottish Government news release, 5 March 2019.

Table 5.7: Disability benefits caseload in Great Britain and Scotland

	Disability benefits caseloads in payment (thousands)							
	2010-11	2011-12	2012-13	2013-14	2014-15	2015-16	2016-17	2017-18
<b>Disability living allowance (DLA) and personal independence payment (PIP)</b>								
Great Britain <sup>1</sup>	3,176	3,224	3,278	3,292	3,386	3,587	3,670	3,679
Scotland	343	346	349	349	357	376	387	392
<b>Attendance allowance (AA)</b>								
Great Britain <sup>1</sup>	1,619	1,597	1,553	1,491	1,462	1,459	1,445	1,435
Scotland	146	142	137	132	129	128	127	127
<b>Total</b>								
Great Britain <sup>1</sup>	4,795	4,821	4,830	4,783	4,848	5,046	5,115	5,114
Scotland	490	487	486	481	486	505	514	518
<b>Scotland as a percentage of Great Britain</b>								
DLA and PIP	10.8	10.7	10.6	10.6	10.5	10.5	10.5	10.6
AA	9.0	8.9	8.8	8.9	8.8	8.8	8.8	8.8
Total	10.2	10.1	10.1	10.1	10.0	10.0	10.0	10.1

<sup>1</sup> Great Britain caseloads include a small number of claimants resident overseas

Table 5.8: Disability benefits expenditure in Great Britain and Scotland

	Disability benefits expenditure (£ billion)							
	2010-11	2011-12	2012-13	2013-14	2014-15	2015-16	2016-17	2017-18
<b>Disability living allowance (DLA) and personal independence payment (PIP)</b>								
Great Britain	11.9	12.6	13.4	13.9	15.4	16.2	16.7	17.5
Scotland	1.3	1.4	1.4	1.5	1.6	1.7	1.8	1.9
<b>Attendance allowance (AA)</b>								
Great Britain	5.2	5.3	5.5	5.4	5.4	5.5	5.5	5.5
Scotland	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5
<b>Total</b>								
Great Britain	17.1	17.9	18.9	19.3	20.8	21.7	22.2	23.0
Scotland	1.8	1.9	1.9	2.0	2.1	2.2	2.3	2.4
<b>Scotland as a percentage of Great Britain</b>								
DLA and PIP	11.0	10.9	10.8	10.7	10.6	10.6	10.6	10.7
AA	9.2	9.0	8.9	9.0	8.9	8.9	8.9	8.9
Total	10.5	10.3	10.3	10.2	10.2	10.1	10.2	10.3

5.28 Table 5.9 shows an illustrative projection of spending in Scotland. There are many possible refinements to this, for example taking a more disaggregated approach to adjusting for population trends, and any Scotland-specific trends in the rate of claim per capita.

Table 5.9: Disability benefits spending

	£ billion						
	Outturn		Forecast				
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
<b>Disability living allowance (DLA) and personal independence payment (PIP)</b>							
Great Britain	17.5	18.8	20.5	21.3	22.4	23.6	25.0
Scotland	1.9	2.0	2.2	2.3	2.4	2.5	2.6
<b>Attendance allowance (AA)</b>							
Great Britain	5.5	5.7	5.9	6.1	6.3	6.5	6.8
Scotland	0.5	0.5	0.5	0.5	0.6	0.6	0.6
<b>Total</b>							
Great Britain	23.0	24.4	26.4	27.4	28.6	30.2	31.8
Scotland	2.4	2.5	2.7	2.8	2.9	3.1	3.2
<b>Scotland as a percentage of Great Britain</b>							
DLA and PIP	10.7	10.7	10.7	10.6	10.6	10.6	10.6
AA	8.9	8.9	8.9	8.8	8.8	8.8	8.8
Total	10.3	10.3	10.3	10.2	10.2	10.2	10.2

## Other benefits

### Winter fuel payments and cold weather payments

5.29 The main features of these two benefits are:

- **Winter fuel payments** are one-off annual payments made to people aged above state pension age.<sup>11</sup> They are paid at £200 per pensioner household or £300 if the household contains someone aged 80 or over. There are different rules for people living in care homes. Payments are usually made in November or December each year. In 2017-18, £176 million was paid to people resident in Scotland.
- The **cold weather payments** scheme runs from 1 November to 31 March each year. They are made to households in receipt of most means-tested benefits during prolonged periods of cold weather. Payments are made automatically when the average temperature is recorded or forecast to be zero degrees or below for seven consecutive days, which means it is highly integrated with the systems that deliver benefits that will continue to be reserved to the UK Government. The payment is set at a fixed amount of £25 for each seven-day period of cold weather. Payments are very volatile from year-to-year, as is the share accounted for by Scotland residents. Although Scotland contains many of the weather stations that are likely to 'trigger' a payment, these are mostly in sparsely populated areas. In the past nine years spending in Scotland has ranged from a high of £53 million (in 2009-10) to a lower of £1 million (in 2013-14 and 2016-17). It has also varied between a high of 89 per cent of the Great Britain total and a low of just 2 per cent.

<sup>11</sup> Previously this was women's state pension age, but for 2019 onwards this distinction is not relevant.

- 5.30 The Scottish Government plans to replace winter fuel payments with 'winter heating assistance', and cold weather payments with 'cold spell heating assistance'. At present the only proposed policy change is to extend winter heating assistance to families with a severely disabled child in receipt of the higher rate of child disability assistance, who would also receive £200 a year.
- 5.31 Under existing eligibility rules, the cost of winter fuel payments is almost wholly driven by the size and age structure of the population. It is therefore easy to forecast relatively accurately. By contrast, the significant annual variation in cold weather payments means that our Great Britain forecast is simply based on a 10-year average of spending.<sup>12</sup>

### Industrial injuries disablement benefit

- 5.32 The industrial injuries benefit scheme provides no-fault compensation for people who are disabled because of an accident at work, or who have one of certain prescribed diseases caused by their work. The main benefit in the scheme is industrial injuries disablement benefit (IIDB). The scheme is complex, and key policies related to the benefit remain reserved, such as in relation to employers' liability or health and safety. Its administration is clerical in nature. At present there are no proposals for reform, although it is to be renamed 'employment injury assistance' and SSS will take over delivery of new claims in autumn 2022. In 2017-18 around £82 million was spent on Scottish claimants, and without extensions to eligibility the caseload would be expected to decline over time.

### Severe disablement allowance

- 5.33 Severe disablement allowance (SDA) is an income-replacement benefit for people meeting certain qualifying criteria but who do not have sufficient National Insurance contributions to qualify for contributory incapacity benefits. Since it has not been open to new claims since 2001, and working-age claimants have been transferred to employment and support allowance (ESA), it has only been paid to a small number of pensioners that have relatively low (or no) entitlements to state pension. Spending in Scotland is likely to be less than £10 million a year, and declining, over the forecast period. The Scottish Government does not plan to make any changes to SDA, nor to take over its administration from DWP.

<sup>12</sup> This is adjusted for the weekly rate paid, although the rate has been £25 for the ten years currently included in the average, and is held at this level in the forecast.



# A Assignment of VAT receipts

## Devolution of VAT revenue

- A.1 The Scotland Act 2016 makes provision for the first 10 percentage points of standard rate, and the first 2.5 percentage points of reduced rate, VAT receipts generated in Scotland to be assigned to the Scottish Government. VAT will continue to be collected by HMRC and the Scottish Government will not have the power to change the collection or administration of the VAT regime in Scotland, or to change VAT rates or the VAT base.
- A.2 The UK and Scottish Governments have agreed in principle that VAT assignment will commence from 2019-20. This will be a transition year where the assignment methodology will be tested and there will be no effect on the Scottish Government's budget. Full implementation is then due to commence from 2020-21. Before it is fully implemented the Treasury has asked us to forecast the amount of VAT revenue in Scotland and the rest of the UK. In October we presented an illustrative projection. We are not yet in a position to produce a fully considered forecast, so this illustrative approach is repeated in this annex.

## Background

- A.3 VAT was introduced in 1973. In broad terms it is a tax on consumption and is levied on the purchase of most goods and services. It is collected from traders and reflected in the price paid when items are purchased. Unlike a simple sales tax, it is levied – as the name implies – on the amount of value added at each stage of production. Around half of household expenditure is subject to the standard rate of VAT at 20 per cent, with much of the rest being either exempt or zero-rated. Around three per cent of expenditure is subject to a reduced rate of 5 per cent, notably domestic fuel and power. Our VAT forecast is split into four main sectors: household, exempt, government and housing investment. The household sector is by far the largest. (For more information see the 'forecasts in-depth' page on our website.)

## Scottish VAT assignment methodology

- A.4 Unlike other devolved taxes and spending, VAT will continue to be collected on a UK basis, so taxpayers will not state on their VAT return the country in which the liabilities were generated. This means there is not – and never will be – any true 'outturn' VAT data available for Scottish-specific revenues. The amount of VAT assigned to the Scottish Government can therefore only be estimated using proxy analysis.
- A.5 A methodology for this assignment is being developed by HMRC, the Treasury and the Scottish Government. We have no role in validating or approving the chosen

methodology. Since our previous forecast the Treasury has published further information on the model that will be used, but has not published historical estimates of receipts.<sup>1</sup>

- A.6 The share of VAT that will be assigned to the Scottish Government will primarily be estimated from the relative spending of Scottish respondents to the Living Costs and Food Survey (LCF). The LCF samples around 12,000 households in the UK. The survey response rate has been decreasing and now stands at less than 50 per cent. Recently coverage of Scotland has been around 300 to 400 households. The Scottish sample has been doubled to 720 respondent households for the 2017-18 survey in preparation for it being used in the VAT assignment calculations (survey processing is not yet complete). Responses will be weighted to compensate for non-response and to match the population distribution in terms of country or region, age group and sex, according to ONS population estimates. This approach to assigning VAT receipts to the Scottish Government means that we will in effect need to forecast the share of expenditure of Scottish respondents in LCF.
- A.7 HMRC analysts shared initial workings and estimates with us in October. These continue to underpin the illustrative projections in this annex.
- A.8 The Scottish Fiscal Commission (SFC) published its first illustrative tax forecast of VAT revenue assigned to Scotland in December 2018.

## An illustrative projection

- A.9 HMRC's most recent estimate of the share of Scottish VAT that would be assigned to the Scottish Government under the proposed methodology relates to 2015-16 and was estimated to be 8.44 per cent of the UK total. This is a provisional estimate and is subject to change. As only the first 10 or 2.5 percentage points of the main and reduced VAT rates respectively will be assigned to the Scottish Government, this implies a share of 4.22 per cent would have applied in 2015-16.
- A.10 As well as this assignment methodology, HMRC, the Scottish Government and the ONS have published estimates of the historical shares of VAT paid in Scotland. The assignment methodology share is slightly higher than Scotland's share of the UK population, and higher than previous HMRC and Scottish Government estimates, but slightly lower than ONS estimates. There are definitional differences relating to each of these estimates, but like Scotland's share of the UK population all three show a downward trend in the Scottish share since 2010. This is set out in Table A.1.

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<sup>1</sup> HM Treasury (2018) *Scottish VAT Assignment: Summary of Assignment Model*.

Table A.1: Estimates of the historical share of net VAT generated in Scotland

	Per cent							
	2010-11	2011-12	2012-13	2013-14	2014-15	2015-16	2016-17	2017-18
GERS estimate (August 2018)	8.3	8.2	8.3	8.5	8.4	8.3	8.1	8.1
HMRC estimate (October 2017)	8.5	8.3	8.3	8.4	8.3	8.3	8.2	8.2
ONS (August 2018)	8.6	8.4	8.4	8.4	8.4	8.4	8.3	
<i>Memo: Scottish population share</i>	8.4	8.4	8.3	8.3	8.3	8.3	8.2	8.2

- A.11 To produce an illustrative projection for assigned VAT receipts in Scotland, we have assumed that the assignment methodology's latest share is a reasonable starting point. As in October we make a simple adjustment to allow for slower growth in Scotland's total population relative to the UK as a whole, based on the latest ONS principal population projection. It results in the Scottish share decreasing slightly over the forecast period.
- A.12 Our estimate of the share of Scottish VAT is then applied to our forecast of UK VAT liabilities. We remove the VAT retained by the UK Government, which on current rates would be half of Scottish VAT, before finally adjusting for the effect of any policy costings.
- A.13 There is relatively little change in our UK VAT forecast. We have revised down our forecast for 2018-19 due to weaker-than-expected receipts over recent months, partly reflecting weak retail sales over the Christmas period. This is offset in later years of the forecast due to modest upward revisions to our forecast for nominal household spending growth. We discuss this in more detail in Chapter 4 of our main *Economic and fiscal outlook (EFO)*.
- A.14 Our October forecast did not include any adjustments for past policy measures that would have an asymmetric effect on Scottish VAT receipts relative to the UK as a whole. We have now reviewed all relevant measures and include the asymmetric effect from the Autumn Budget 2017 measure providing VAT refunds to Scottish police and fire services. Including this effect slightly reduces the Scottish share of VAT. This affects receipts from the government sector, which are not subject to the LCF methodology that will dominate the assignment calculation.
- A.15 The UK Government has announced no policy measures in this Spring Statement that directly affect VAT revenues
- A.16 Our latest projection is shown in Table A.2 with changes since October shown in Table A.3.

Table A.2: Illustrative Scottish VAT projection

	£ billion							
	Estimated outturn			Projection				
	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
UK	121.6	125.4	131.7	136.6	141.5	146.3	150.9	155.6
of which:								
Assigned to Scottish Government	5.1	5.3	5.5	5.7	5.9	6.1	6.2	6.4
VAT from Scotland retained by UK Government	5.1	5.3	5.5	5.7	5.9	6.1	6.2	6.4
VAT from the rest of the UK	111.4	114.8	120.7	125.2	129.8	134.2	138.4	142.8
	Per cent							
Assigned to Scottish Government	4.2	4.2	4.2	4.2	4.2	4.2	4.2	4.1
Scottish population share	8.2	8.2	8.2	8.2	8.2	8.1	8.1	8.1
Memo: index Scottish population share 2015 = 100	99.8	99.5	99.3	99.1	98.9	98.7	98.5	98.3

Table A.3: Changes in Scottish Government assigned VAT projection since October

	£ million							
	Estimated outturn			Projection				
	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24
October forecast	5,123	5,266	5,546	5,740	5,926	6,100	6,270	6,442
March forecast	5,123	5,269	5,486	5,679	5,869	6,054	6,231	6,410
<b>Change</b>		<b>3</b>	<b>-60</b>	<b>-61</b>	<b>-57</b>	<b>-46</b>	<b>-39</b>	<b>-32</b>
of which:								
Previously announced measures		0	-39	-37	-41	-42	-44	-45
UK VAT forecast		3	-22	-24	-16	-4	4	13

A.17 While we have made only minor changes to our Scottish VAT projection since October, the reliance on the LCF sample means that we might expect the 'outturn' estimates and so our forecasts to fluctuate substantially from year to year solely as a result of updating the sample, on top of the usual forecast uncertainties that stem from real-world movements.

A.18 There are many refinements that we could make to the forecast methodology, which could also generate substantial changes. We could, for example, look to take into account the effect on VAT receipts of differences in the composition of population growth given the age profile of consumer spending reported in the LCF. We will review our methodology once information has been published from the larger LCF sample and the historical estimates, and will work closely with HMRC, the Scottish Government and the SFC in doing so.

## Comparison with Scottish Fiscal Commission forecasts

A.19 The SFC published its first illustrative forecast of VAT revenue assigned to Scotland in December 2018.

A.20 The SFC methodology makes use of Scotland-specific economic determinants, whereas we use UK-level ones and then attempt to capture Scottish trends via the percentage share

assumption. Our projections diverge in the period up to 2018-19, then converge slowly through the projection period. This reflects a methodological difference in generating a starting position for assigned receipts in 2018-19, with subsequent differences in growth rates relatively small. We will work with the SFC to review our respective starting-point methodologies before our next forecast.

Table A.4: Comparison to SFC forecast

	Estimated outturn			£ million				
	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24	
SFC December 2018	5,383	5,631	5,801	5,966	6,122	6,279	6,434	
OBR March 2019	5,269	5,486	5,679	5,869	6,054	6,231	6,410	
<b>Difference</b>	-114	-145	-121	-97	-68	-48	-24	
<i>Difference (per cent)</i>	-2.1	-2.6	-2.1	-1.6	-1.1	-0.8	-0.4	

