

Fiscal Assessment Report

November 2016

© Irish Fiscal Advisory Council 2016

ISBN 978-0-9933976-2-2 This report can be downloaded at <u>www.fiscalcouncil.ie</u>

TABLE OF CONTENTS

Cor	N T E N	TS						
FOR	EWC	DRD						
Sun	SUMMARY ASSESSMENT2							
1.	. ASSESSMENT OF THE FISCAL STANCE							
	Key Messages							
	1.1	INTRODUCTION						
	1.2	THE MACROECONOMIC AND FISCAL CONTEXT FOR BUDGET 2017						
	1.3	Assessment of the Fiscal Stance in 2016 and 201714						
	1.4	THE MEDIUM-TERM FISCAL STANCE						
2.	END	OORSEMENT AND ASSESSMENT OF MACROECONOMIC FORECASTS						
	Key	Messages						
	2.1	INTRODUCTION						
	2.2	ENDORSEMENT OF THE BUDGET 2017 PROJECTIONS						
	2.3	AN ASSESSMENT OF THE MACROECONOMIC FORECASTS IN BUDGET 2017						
	2.4	Rısкs						
3.	Ass	ESSMENT OF BUDGETARY FORECASTS						
	Key	Messages						
	3.1	INTRODUCTION						
	3.2	BUDGETARY PROJECTIONS FOR 2016						
	3.3	BUDGET 2017 FORECASTS FOR 2017 ONWARDS						
	3.4	Rısks						
4.	Ass	ESSMENT OF COMPLIANCE WITH FISCAL RULES						
	Key	Messages						
	4.1	INTRODUCTION						
	4.2	Ex Post Assessment for 2015						
	4.3	IN-YEAR ASSESSMENT FOR 201669						
	4.4	Ex Ante Assessment of 2017 to 202177						
	4.5	THE MEDIUM-TERM EXPENDITURE FRAMEWORK (MTEF)81						

BOXES

BOX A: THE EVOLUTION OF THE BUDGETARY PROCESS.	25
BOX B: BREXIT: LATEST INDICATORS AND POSSIBLE IMPLICATIONS FOR THE IRISH ECONOMY	37
Box C: The Disproportionate Impact of Corporation Taxes	52
Box D: Stand-Still Expenditure Scenario	60
Box E: Assessment of Compliance with the Budgetary Rule	76
BOX F: WHAT IS FISCAL SPACE?	79
Box G: IMPLICATIONS OF 2015 GDP OUTTURN FOR FISCAL RULES	86

APPENDICES

APPENDIX A: FISCAL COUNCIL BENCHMARK PROJECTIONS 22 SEPTEMBER	89
APPENDIX B: TIMELINE FOR ENDORSEMENT OF BUDGET 2017 PROJECTIONS	90
APPENDIX C: SUMMARY INDICATORS OF ECONOMIC IMBALANCES	91
APPENDIX D: CHANGES TO POTENTIAL OUTPUT FOLLOWING 26% GDP GROWTH IN 2015	98
APPENDIX E: THE GENERAL GOVERNMENT SECTOR	102
APPENDIX F: EXCHEQUER TAX REVENUE FORECASTS	107
APPENDIX G: CHAPTER 4 FIGURES	110

GLOSSARY	
BIBLIOGRAPHY	

FOREWORD

The Irish Fiscal Advisory Council was established as part of a wider agenda of reform of Ireland's budgetary architecture as envisaged in the *Programme for Government 2011*. The Council was initially set up on an administrative basis in July 2011, and was formally established as a statutory body in December 2012 under the *Fiscal Responsibility Act (FRA)*. The Council is a public body funded from the Central Fund. The terms of its funding are set out in the *FRA*.

The mandate of the Irish Fiscal Advisory Council is:

- To endorse, as it considers appropriate, the macroeconomic forecasts prepared by the Department of Finance on which the Budget and Stability Programme Update are based;
- To assess the official forecasts produced by the Department of Finance;
- To assess government compliance with the Budgetary Rule as set out in the FRA;
- To assess whether the fiscal stance of the Government in each Budget and Stability Programme Update (SPU) is conducive to prudent economic and budgetary management, including with reference to the provisions of the *Stability and Growth Pact*.

The Council submits its *Fiscal Assessment Reports* to the Minister for Finance and within ten days releases them publicly.

The Council is chaired by Professor John McHale (Whitaker Institute, National University of Ireland, Galway). Other Council members are Mr Sebastian Barnes (Organisation for Economic Co-operation and Development); Mr Seamus Coffey (University College Cork), Dr Íde Kearney (Dutch Central Bank, De Nederlandsche Bank) and Mr Michael G. Tutty.

The IFAC secretariat consists of Eddie Casey, Thomas Conefrey, Niall Conroy and Andrew Kennedy.

The Council would like to acknowledge the help of the staff of the Central Statistics Office. The Council would also like to thank Anna de Courcy for copy editing the report.

This report was finalised on 24 November 2016. More information on the Irish Fiscal Advisory Council can be found at <u>www.fiscalcouncil.ie</u>

SUMMARY ASSESSMENT

Estimates of domestic economic activity suggest that the economy continues to grow at a reasonably solid rate, although high-frequency data indicate the pace of growth may have slowed in 2016. A range of data on domestic output, expenditure and employment show that the economy continues to grow in 2016, but there is some evidence of a loss of momentum as the year has progressed. While the Department of Finance's central projection is for real GDP growth of 3.5 per cent in 2017 and an average of around 3 per cent for the years 2018 to 2021, these growth prospects are far from assured as the Irish economy remains vulnerable to numerous domestic and international risks. A GDP growth rate just ½ a percentage point lower than currently forecast each year would mean the public finances would remain in deficit out to 2021. To protect the public finances in the face of risks and to lay the foundations for sustainable growth, reducing Ireland's high debt to safer levels should remain a priority.

Incomplete implementation of Ireland's new budgetary framework leaves the economy and public finances more exposed in the face of adverse events. Successive governments have achieved considerable success in stabilising the public finances since the crisis. In addition, a new budgetary framework has been put in place to help achieve a phased reduction in the debt to safer levels and to ensure that there is sufficient fiscal credibility to avoid forced austerity in bad times. However, incomplete implementation of the new framework leaves the economy and public finances more exposed to severe shocks such as a "hard Brexit".

The projections in *Budget 2017* show a marked slowdown in the pace of improvement in the public finances in 2016. The forecasts do not fully comply with the requirements of the Budgetary Rule of the domestic *Fiscal Responsibility Act* or the Preventive Arm of the EU *Stability and Growth Pact (SGP)* in 2016. Despite continued revenue growth and savings from falling unemployment and debt interest costs, the projected improvement in the General Government balance (stripping out financial sector measures) is just 0.1 percentage point of GDP in 2016, while the primary balance (i.e. the balance excluding debt interest spending) is forecast to deteriorate in 2016. The projected fall in the structural balance in 2016 is just 0.3 percentage points, thus falling short of the requirement under the fiscal rules to reduce it by 0.6 percentage points. Excluding a technical one-off transaction involving AIB in 2015, the Expenditure Benchmark rule would also not be complied with in 2016. These compliance problems are a source of concern, coming in the first full year of the normal operation of the domestic Budgetary Rule and the Preventive Arm of the EU *SGP*.

Summary Assessment

Taking 2016 and 2017 together, the size of the overall package of measures announced by the Government goes beyond the limit considered prudent by the Council. Combining within-year expenditure increases for 2016 with the \leq 1.3 billion expansion for 2017 and some pre-committed spending for next year, gives an overall package of measures amounting to \leq 3 billion (or \leq 3.7 billion in a full year), a more expansionary stance than planned in the July 2016 *Summer Economic Statement*. Within-year expenditure increases over the course of 2016 absorb the majority of the better than expected tax revenues, which are mainly due to corporation tax. Using unexpected tax revenue for difficult to reverse spending increases goes against the spirit of the new budgetary framework and is especially risky when the source of the additional revenue is corporation tax. A repeat of the pattern evident in 2016 over several years has the potential to undermine the public finances and would not be conducive to prudent economic and budgetary management.

Current fiscal projections for 2017 and 2018 are consistent with the deficit and debt remaining on a downward path, but the scope for any slippage from the current plans is limited. The *Budget 2017* forecasts for 2017 show compliance with structural balance rule; however, the projections indicate a €200 million breach of the Expenditure Benchmark (EB). It is important for the credibility of the budgetary process that the Government's fiscal plans show full compliance with the domestic and EU fiscal rules based on the Department of Finance's own forecasts. A repeat of the pattern of within-year increases in expenditure in 2017, as has occurred in 2015 and 2016, would not be appropriate and would widen the deviation from the EB.

Under the new budgetary framework, current projections indicate that any further increases in expenditure in 2017 for higher public sector pay will have to be offset by lower spending in other areas or higher taxes. To help keep the public finances on a sustainable path, the fiscal rules effectively set limits on the size of the deficit and expenditure growth net of discretionary revenue measures. For 2017, the available fiscal space under the rules has already been allocated in *Budget* 2017 for tax cuts and expenditure increases. As a consequence, any new increases in expenditure – such as to fund higher public sector pay – imply lower spending in other areas unless offset by compensatory tax changes. In 2018, \in 0.7 billion will be required to meet the carry-over cost of tax cuts and expenditure increases introduced in *Budget 2017*. On current estimates, this absorbs over half of the fiscal space for 2018, implying very limited scope for new initiatives in the absence of offsetting savings or new revenue raising measures.

The quality of the medium-term budgetary forecasts published by the Department of Finance has improved. The Department of Finance has published forecasts for total revenue, expenditure, the deficit and the debt that include the use of the estimated fiscal space in *Budget 2017*. These forecasts

are more meaningful and realistic than the medium-term projections published previously which were purely technical and did not show the path of the public finances consistent with the Government's stated policy intention to use the available fiscal space.

The system of multi-year expenditure ceilings – a core component of the Government's budgetary framework – is not working effectively due to continuous upward revisions to spending. Every expenditure report since 2012 contained upward revisions to the previously published ceilings. The idea of the multi-annual expenditure ceilings is to move away from short-term year-to-year budgeting to a more strategic approach to resource allocation that provides clarity to Departments on the resources that will be available over several years. The limited implementation of the system of expenditure ceilings impedes such expenditure planning and raises the risk of increases in expenditure being funded from windfall revenue sources.

An essential input into good expenditure planning is an estimate of the cost of continuing to provide existing services and real benefit levels. As an input to the expenditure planning process, a useful starting point is an estimate of the cost of providing today's level of public services and benefits in future years, accounting for price and demographic pressures. This is the idea behind the "stand-still" scenario developed by the Council. Contrary to some portrayals of the Council's approach, this exercise is not intended as a forecast or recommendation for automatic indexation, but rather as a means of informing decision makers of the portion of available fiscal space that would be required to maintain the existing provision of public services and preserve the purchasing power of social protection benefits. The results of the analysis in this Report indicate that accommodating estimated demographic pressures and the cost of maintaining real public services and benefits would absorb almost the full amount currently budgeted for expenditure increases from 2017-2021.

1. Assessment of the Fiscal Stance

KEY MESSAGES

- Signals from a range of data sources point to solid growth in the economy this year, although
 there is evidence that the pace of growth may have slowed. Following strong growth in 2014
 and 2015, along with falling unemployment, the Irish economy appears to be operating close to
 capacity in 2016. Ireland's level of debt remains elevated following the crisis and reducing it to
 safer levels must remain a key policy priority. This would help protect the public finances from
 numerous risks from Brexit and other internal and external sources.
- Across several measures, there is evidence of only marginal improvement in the public finances in 2016. The General Government deficit (excluding some financial sector measures) is projected to fall by just 0.1 percentage point of GDP. *Budget 2017* projects a 0.3 percentage point improvement in the estimated structural budget deficit in 2016, short of the 0.6 required under the fiscal rules. Excluding a technical one-off transaction involving AIB in 2015, the Expenditure Benchmark rule would also not be complied with in 2016. The failure to fully comply with the new budgetary framework is a source of concern, coming in the first year following the successful exit from the Excessive Deficit Procedure (EDP).
- The €3 billion package of new tax and expenditure measures for both 2016 and 2017, which has been announced over the course of 2016 to date, goes beyond the limit considered prudent by the Council. A smaller package in line with the SES plan would have been more appropriate given the need to eliminate the deficit and reduce the debt to safer levels. A repeat of the type of poor budgetary management evident in 2015 and 2016 over several years would not be conducive to prudent economic and budgetary management. The Government's projections indicate a breach of the Expenditure Benchmark rule in 2017. In 2018, the carry-over cost of measures introduced in *Budget 2017* is €650 million. This will absorb over half of the estimated fiscal space for 2018. This implies limited resources for new tax and spending initiatives without offsetting savings or new revenue raising measures.
- There has been an improvement in the medium-term budgetary forecasts presented by the Department of Finance. The projections for revenue, expenditure and the overall debt and deficit now include the use of the estimated fiscal space over the medium term. However, there are serious on-going problems with expenditure planning and management as the expenditure ceilings are not being implemented effectively. The persistent upward revisions to the ceilings represents a continuation of short-term year-to-year budgeting.

1.1 INTRODUCTION

The Fiscal Council has a mandate under the *Fiscal Responsibility Act 2012* to assess the Government's fiscal policy stance, including with reference to the requirements of the *Stability and Growth Pact (SGP)*. The sections below draw on the analysis in later chapters in assessing the fiscal stance outlined in *Budget 2017*. The Council's assessment is informed by the extent of compliance with the fiscal rules along with a complementary economic assessment that takes into account the state of the public finances, the stage of the economic cycle and the growth prospects for the economy. Section 1.2 reviews the current cyclical position of the economy along with recent developments in the public finances. Section 1.3 reviews the short-run fiscal stance in 2016 and 2017 as set out in *Budget 2017*, while issues relating to the medium-term fiscal stance are discussed in Section 1.4.

1.2 THE MACROECONOMIC AND FISCAL CONTEXT FOR BUDGET 2017

TABLE 1.1: SUMMARY OF MAIN FISCAL AGGREGATES IN BUDGET 2017 (GENERAL GOVERNMENT BASIS)

% of GDP unless otherwise stated	2015	2016	2017	2018	2019	2020	2021
General Government Balance	-1.9	-0.9	-0.4	-0.3	0.2	0.7	1.1
General Government Balance (excluding financial sector measures)*	-1.0	-0.9	-0.4	-0.3	0.2	0.7	1.1
Interest expenditure	2.6	2.4	2.2	2.1	1.9	1.7	1.5
Primary Balance	0.7	1.4	1.8	1.8	2.1	2.4	2.6
Primary Balance (excluding financial sector measures)*	1.6	1.4	1.8	1.8	2.1	2.4	2.6
GDP growth (real annual % change)	26.3	4.2	3.5	3.8	3.6	3.0	2.8
Potential Output (% change, CAM-based)	24.6	4.0	4.2	4.5	3.7	3.2	3.0
Output Gap (CAM-based), % of potential GDP	1.6	1.8	1.1	0.5	0.3	0.2	0.0
Structural balance (CAM-based), % of potential GDP	-2.2	-1.9	-1.1	-0.5	0.0	0.6	1.1
Change in Structural Balance**	1.9	0.3	0.8	0.6	0.5	0.6	0.5
Structural Primary Balance (CAM- based)	0.4	0.5	1.1	1.5	1.9	2.3	2.6
Change in Structural Primary Balance (p.p.)	0.7	0.0	0.6	0.4	0.4	0.4	0.4
General Government Debt	78.6	76.0	74.3	72.7	70.2	65.8	63.0

Source: Department of Finance (Budget 2017).

Notes: * The General Government balance and primary balance exclude the impact of some financial sector measures in 2015. In late 2015, the Government redeemed and converted its remaining preference shares in AIB to ordinary shares. The conversion of these preference shares is classified as an expenditure of government that increases the deficit in 2015.

**One-off factors are removed in calculating the change in the structural balance for the purposes of assessing compliance with the fiscal rules. For 2015, the Department of Finance estimates that one-off factors relevant for calculating the change in the structural balance amount to 0.5 per cent of GDP. Rounding may affect totals.

As discussed in the Council's September 2016 *Pre-Budget Statement* (IFAC, 2016b) and by the ESRI, Department of Finance and others, deciphering the pattern of growth in the Irish economy is difficult due to the distortions affecting Ireland's National Accounts data. This creates challenges for the Council in respect of all elements of the mandate: endorsement of the Government's macroeconomic forecasts, assessment of the macroeconomic and budgetary forecasts, assessment of compliance with fiscal rules and assessment of the appropriateness of the fiscal stance. Alternative presentations of existing data and/or the publication of new data by the CSO may help overcome some of the current difficulties in assessing the state of the economy. In the meantime, careful examination of a range of data sources must be used to help identify trends in domestic economic activity.







Figure 1.1 above shows a number of indicators of economic activity. Employment is a reliable indicator of economic developments currently and the latest QNHS data point to continued strong growth in the number at work in 2016 (Figure 1.1A). In the first half of 2016, employment has increased by 2.7 per cent, similar to the growth recorded in 2015. Other indicators suggest some slowdown in the pace of economic activity as 2016 has progressed. The year-on-year growth in underlying domestic demand is shown in Figure 1.1B. In 2015 this grew by 5.4 per cent following growth of 4.2 per in 2014. Led by consumption and building and construction domestic demand has continued to grow in 2016, but at a more moderate pace than in the previous two years. For the first half of 2016, underlying domestic demand is 2.3 per cent higher than for the same period in 2015.

Figure 1.1C shows annual growth in output of the traditional sector (as defined by the CSO) which has slowed sharply since mid-2015, turning negative in the second quarter of this year. The UK is an important destination for the exports of this sector and the recent weakening in activity has coincided with the depreciation of Sterling against the Euro in 2016. This sector includes industries such as agriculture and food, which are particularly employment intensive. As the recent poor performance may partially reflect the impact of the UK vote to leave the EU, and given the continued weakness of Sterling against the Euro, it will be important to monitor whether the recent decline in output in the traditional sector persists over the coming months. Evidence of a loss in growth momentum can be seen in Figure 1.1D, which shows annual growth in real personal consumption expenditure. In 2015 consumption grew by 4.5 per cent, but annual growth has slowed to 3.5 per cent on average in the first half of 2016.¹

Overall, while the data shown in Figure 1.1 present a somewhat mixed picture, the evidence suggests that the economy continues to grow in 2016 but with some signs of weakness as the year has progressed. The Council will continue to closely monitor the incoming data in the coming months for any signs of a more pronounced slowdown.

In assessing the fiscal stance, it is necessary to consider the implications of the recent economic growth for the estimated size of the economy's output gap. The output gap is defined as the difference between actual and potential GDP, expressed as a share of potential GDP. Estimates of the output gap are subject to much uncertainty as they require knowledge of the economy's potential growth rate, which is unobservable and must be estimated. The openness of the Irish labour market and the importance of migration mean that estimates of the output gap for Ireland are subject to particular uncertainty.

¹ Services consumption, as measures in the Quarterly National Accounts, has been weak in the first half of 2016 and is acting as a drag on overall consumption growth. As discussed in Chapter 2, the quarterly data for services consumption are prone to revision and should be interpreted with caution.





Sources: Department of Finance, *Budget 2017;* IMF *WEO* (October 2016); OECD *EO* (June 2016); internal IFAC calculations.

Sources: Department of Finance, *Budget 2017;* IMF *WEO* (October 2016); OECD *EO* (June 2016); internal IFAC calculations.

As illustrated in Figure 1.2A, a range of estimates indicate that a large negative output gap opened up from 2008 as the actual level of output in the economy fell well below what could be sustainably produced if all resources in the economy – human and capital – were fully utilised. Since 2013, the size of this negative output gap has reduced gradually due to the pick-up in economic growth (Figure 1.2B). Official estimates of the output gap based on the EU Commonly Agreed Methodology indicate a positive output gap of close to 2 per cent in 2016. This appears to overstate the size of any positive output gap and is inconsistent with other indicators of imbalances in the economy, such as the unemployment rate (see Chapter 2 and Appendix C). Other estimates from the IMF and based on models used by the Council, which exclude the activities of multinational enterprises so as to focus on the domestic economy, suggest that a small negative output gap may still exist in 2016, although it is closing quickly as shown in Figure 1.2A and Figure 1.2B.

Taken together, while economic growth in 2016 is likely to be slower than in recent years, it follows very robust growth in 2014 and 2015. As a result, by the end of 2016 there is unlikely to be a significant demand shortfall in the Irish economy. In these circumstances, from a demand-management perspective, a stimulus from fiscal policy is not needed at this time.

The overall position of the public finances and the sustainability of the debt is a second important consideration in determining the appropriate fiscal stance. It is important to recognise that Ireland's debt sustainability position has improved considerably since 2010 due to a number of favourable developments. Reflecting Ireland's adherence to a credible fiscal adjustment programme as well as initiatives at a European level, such as the ECB's Outright Monetary

Transactions (OMT) and Public Sector Purchase programmes, the cost of borrowing for the State has fallen dramatically (Figure 1.3). This is reflected by the fact that although Ireland's stock of debt is almost five times larger than before the crisis, the State's cost of borrowing is at a historic low. This low interest rate environment has allowed the NTMA to finance new and maturing Irish debt at comparatively favourable rates.



Notes: Ten-year Irish yields partly interpolated in 2011-2013.

Figure 1.4 shows national debt interest payments as a share of General Government revenue. Although the interest burden on Irish debt is lower now than during the fiscal crisis in the 1980s (Figure 1.4), it is still significant with interest costs amounting to just under one-tenth of government revenue in 2016. In addition, while the current low interest rates make the cost of servicing the government debt more manageable, Ireland's overall debt sustainability position remains fragile and vulnerable to numerous potential downside risks (see Chapter 3, Section 3.4). Interest rates are unlikely to remain at their current exceptionally low levels over the longer term and rates can be expected to eventually increase, even though there is uncertainty over when this will occur.



Ireland's overall stock of government debt remains at an elevated level following the crisis. The well-known problems with Ireland's GDP figures mean that the debt ratios expressed as a share of GDP or GNP give a seriously distorted picture of the fiscal position. Until a better estimate of the size of the economy is published, as an interim response, the Council has found it useful to focus directly on fiscal ratios expressed as a share of General Government revenue. As discussed in the Council's September 2016 *Pre-Budget Statement*, this approach is not unproblematic as the ratio captures actual revenue (including the recent buoyant corporation tax receipts) rather than the potential revenue base. However, the ratios based on government revenue give a more informative picture of the fiscal position than those based on the distorted GDP data.



FIGURE 1.5: GENERAL GOVERNMENT GROSS DEBT TO SCALED REVENUE BASE

Source: CSO and internal IFAC calculations. Notes: Chart shows the GG gross debt expressed as a proportion of a scaled GG revenue base.

The scaled base is calculated by multiplying the actual GG revenue by the ratio of GDP to revenue in 2014.

As the revenue-to-GDP ratio was reasonably constant at 33-34 per cent between 2011 and 2014, the revenue-based debt ratio can be adjusted to make it more comparable to standard GDP ratios

based on the revenue share in 2014.² Figure 1.5 shows the adjusted ratio. The adjusted debt ratio improves from 105 per cent in 2014 to 97 per cent in 2015, a fall of eight percentage points compared to the 27 percentage point fall in the unadjusted debt-to-GDP ratio.³ Thus the adjusted data point to a continuing reduction in the State's debt burden, although the overall level of debt remains high. An international comparison of gross and net debt-to-government revenue is shown in Figure 1.6. As of Q1 2016, Ireland's gross debt ratio based on this measure was the third highest in the EU.



Note: Net debt from Eurostat Government Finance Statistics calculated as Gross Consolidated Debt less EDP debt instrument assets (F2: Currency and Deposits; F3: Debt securities; and F4: Loan assets). Total General Government Revenue = 4 quarter sum.

Ireland's elevated debt level means that the public finances are more exposed to an adverse shock that could trigger debt sustainability concerns and threaten the State's access to market funding at affordable rates. As discussed further in Chapter 2 and Chapter 3, while the central projections for the economy contained in *Budget 2017* are positive, numerous risks surround the outlook for Irish growth, including those related to Brexit and the concentrated nature of production in the Irish economy. If one or more of these risks were to materialise, the economy could be derailed from the current favourable growth trajectory with lower GDP growth and higher unemployment than

² The ratio of GDP to General Government revenue in 2014 was 2.94. The adjusted revenue base is calculated by multiplying actual General Government revenue by this ratio in each year. The nominal deficit and debt are then divided by this scaled revenue base to arrive at the adjusted debt and deficit ratios shown in Figure 5a and Figure 5b.

³ Taking the range of alternative indicators of economic activity discussed in this section and shown in Figure 1 and Table 1, a plausible estimate of the real growth in the economy in 2015 is around 6 per cent - excluding distortionary factors related to MNEs. Assuming growth in the GDP deflator of 2 per cent, this gives assumed nominal GDP growth of 8 per cent for 2015, instead of the 32 per cent nominal growth in the official CSO data. Based on 8 per cent nominal GDP growth in 2015, the debt ratio would have been 96.5 per cent last year, similar to the 97 per cent figure based on the adjusted debt-to-government revenue ratio and higher than the 78 per cent number based on the distorted GDP data.

forecast in *Budget 2017*. A weaker growth performance than currently projected would result in a higher deficit and debt ratio (either debt-to-GDP or debt-to-revenue) and there is a risk that the debt ratio could start rising again.

As shown in Figure 1.7 and Figure 1.8, a negative shock which lowered GDP growth by 1.5 percentage points below the *Budget 2017* baseline each year would result in the deficit being over 4 percentage points of GDP higher by 2021. All else being equal, this means that the public finances would remain in deficit out to 2021, compared to *Budget 2017* forecast of a 1.1 per cent budget surplus. The debt-to-GDP ratio would stagnate at its current high level before rising by the end of the decade, in the absence of corrective policy action. A shock of this magnitude would not be exceptional given the historic volatility of Irish GDP growth.



Source: Internal IFAC calculations using Fiscal Feedbacks Model.

Note: Lines depict how far the deficit would be pushed away from the *Budget 2017* forecast for the General Government balance under different shocks to growth in each year. The solid red line ("Central") corresponds to the forecast from *Budget 2017*. The scenarios assume no change to the fiscal policy stance as set out in *Budget 2017*.





Source: Internal IFAC calculations using Fiscal Feedbacks Model.

Note: Lines depict how far the debt would be pushed away from the *Budget 2017* forecast for the General Government debt under different shocks to growth in each year. The solid red line ("Central") corresponds to the forecast from *Budget 2017*. The scenarios in the chart assume no change to the fiscal policy stance as set out in *Budget 2017*.

As discussed further in Chapter 2, output in the Irish economy is highly concentrated in a small number of sectors such as IT and pharmaceuticals. This leaves the economy and the public finances particularly exposed as an idiosyncratic shock impacting one of these sectors has the potential to significantly reduce growth in the Irish economy. The concentration of output in these highly globalised sectors means there is large uncertainty around forecasts for growth in the Irish economy. This provides another reason for exercising caution in framing budgetary policy.

To sum up, a cross-check of the analysis of the current cyclical position of the economy with the debt sustainability considerations confirms the need to prioritise reducing Ireland's high debt to safer levels over using an expansionary fiscal stance to stimulate an economy with solid growth and falling unemployment.

1.3 ASSESSMENT OF THE FISCAL STANCE IN 2016 AND 2017

The Council's assessment of the fiscal stance in *Budget 2017* covers the years 2016 and 2017. The package of measures announced in *Budget 2017* on Tuesday, 11 October contained a number of changes compared with the Government's earlier plans as published in the April 2016 *Stability Programme Update (SPU)* and the July 2016 *Summer Economic Statement (SES)* and *Mid-Year Expenditure Report.* For 2016, additional current and capital spending of €0.3 billion was announced compared to estimates in the *Mid-Year Expenditure Report.* This followed the €0.5 billion increase in spending for the Health and Justice areas announced in June. For 2017, the Budget contained an overall package of tax reductions and expenditure increases amounting to €1.3 billion. As shown in Table 1.2, when the previously announced spending increases for 2016 and 2017 are added in, this gives a total package of fiscal measures of €3 billion. As discussed in Chapter 3, the expenditure and tax measures introduced in *Budget 2017* have a full-year carryover cost of just under €0.7 billion. Adding in the full-year cost of the *Budget 2017* measures increases the overall cost of the package to €3.7 billion.

TABLE 1.2: DISCRETIONARY MEASURES IMPACTING THE FISCAL STANCE IN 2016 AND 2017

Measure	Date and Publication	Details	Amount (€bn)
Pre-Committed Expenditure for 2017	April 2016, SPU 2016	Before any changes in <i>Budget 2017</i> , gross voted current and capital spending is projected to increase by around €0.9 billion in 2017. This pre-committed spending includes provisions for demographic pressures (€0.4 billion), the Lansdowne Road Agreement (€0.3 billion), the Public Capital Programme (€0.2 billion) and certain other policies.	0.9
Additional Voted Spending for 2016	June 2016, SES	April's <i>Stability Programme Update</i> signalled potential spending pressures, which were addressed by including an additional €540 million voted expenditure in the 2016 Revised Estimates Volume published in June 2016. This allocated an additional €500 million for Health and €40 million to the Department of Justice. This additional expenditure is carried forward into the expenditure base for 2017.	0.5
Additional spending for 2016	October 2016, Budget 2017	An additional €300 million in expenditure for 2016 was announced in <i>Budget 2017,</i> on top of the €0.5 billion announced in June 2016. €200 million of the additional expenditure was allocated to capital with current spending increased by €100 million. The additional current spending is to cover part of the cost of the payment of the Christmas bonus in 2016.	0.3
New measures announced in Budget 2017	October 2016, Budget 2017	Budget 2017 contained a package of measures for 2017 of \leq 1.3 billion, comprising tax reductions of \leq 0.3 billion and expenditure increases of \leq 1 billion (\leq 0.8 billion in current and \leq 0.2 billion in capital).	1.3
Total (new measures in 2016 and 2017)			3.0
Full-year cost of <i>Budget 2017</i> measures in 2018	October 2016, Expenditure Report 2017 and Budget 2017	According to the <i>Expenditure Report 2017</i> (Table 9, page 36), spending measures for 2017 introduced in <i>Budget 2017</i> have a full-year carryover cost of just under \pounds 0.5 billion in 2018. In addition, the carryover cost of the tax cuts in <i>Budget 2017</i> is approximately \pounds 0.2 billion in 2018. The total full-year cost (\pounds 0.7 billion) will have to be met from the available net fiscal space in 2018, currently estimated at \pounds 1.2 billion.	0.7
Total			3.7

Sources: Department of Finance and Department of Public Expenditure and Reform *Summer Economic Statement* (2016), *Stability Programme Update* (2016) and *Budget 2017*.

Notes: Data are on an Exchequer basis. Rounding may affect totals.

In June 2016, the Government revised up its forecast of tax revenue for 2016 by €1 billion compared to its *Budget 2016* forecast, and the Department of Finance maintained this June forecast in *Budget 2017*. If this additional revenue materialises as forecast by the Department of Finance, it will not contribute to a significant reduction in the deficit as additional spending increases for 2016 detailed in Table 2 will absorb the majority of the additional tax revenue (Figure 1.9). This repeats what occurred in 2015 when the Government announced a €1.5 billion increase in spending for 2015, in line with an upward revision to corporation tax of close to the same amount. Using unexpected revenues to fund increases in expenditure goes against the spirit of the new budgetary framework and is reminiscent of past fiscal policy errors made in Ireland. The use of positive revenue surprises to fund permanent spending increases carries particular risks when the revenue surprise is largely due to a single, and relatively uncertain, revenue stream – in this case corporation tax. Instead of using the additional corporation tax revenue for permanent expenditure, a more appropriate policy would have been to use this revenue to reduce the deficit. As the sustainability of recent corporation tax increases has yet to be verified, this would have left the public finances less exposed in the event of a reversal in corporation tax receipts in the coming years. Based on the Council's Fiscal Feedbacks Model, had all of the unexpected CT revenue in 2015 and 2016 been used for deficit reduction, the budget would have been close to balance in 2016 and the government accounts would move into surplus in 2017, two years earlier than projected by the Government in *Budget 2017*.



FIGURE 1.9: REVISIONS TO EXCHEQUER EXPENDITURE AND TAX REVENUE FOR 2016

Increase in tax revenue, Budget 2016 to Budget Increase in expenditure, Budget 2016 to Budget 2017 2017

Source: Department of Finance and internal IFAC calculations. *Note:* The increase in expenditure between *Budget 2016 and Budget 2017* (right-hand column) refers to total gross voted current and capital expenditure on an Exchequer basis. Tax revenue (left-hand column) is the sum of Exchequer tax revenue plus PRSI.

Looking at 2016 more broadly, the *Budget 2017* projections show that progress in reducing the deficit in 2016 is likely to stall despite strong economic growth and savings from falling unemployment and debt interest costs. Figure 1.10A and Figure 1.10B show the estimated change in the General Government balance and primary balance respectively, excluding some financial

sector measures.⁴ The improvement in the General Government balance is projected to be just 0.1 percentage points of GDP in 2016. This improvement is aided by a fall in national debt interest payments. The primary balance, the General Government balance excluding debt interest payments, deteriorates by 0.1 percentage points of GDP in 2016, the first worsening since 2009. This results in an unwinding of some of the improvements made between 2013 and 2015 and reduces the level of the overall primary surplus to 1.4 per cent in 2016. Given the relatively favourable economic conditions in 2016, this marks a missed opportunity to continue to move the budget towards balance.



The fiscal stance in the *Fiscal Responsibility Act (FRA)* 2012 is defined in terms of the change in the structural primary balance. The structural primary balance is an appropriate measure of the fiscal stance as it provides an estimate of the budget surplus or deficit adjusting for the cyclical position of the economy. While there is uncertainty around the level of the structural primary deficit or surplus at a point in time, estimates of the change in this measure provides a more robust indicator of changes in the fiscal position. Consistent with the signals from the overall General Government balance and primary balance measures, the projections in *Budget 2017* indicate no improvement in the structural primary balance in 2016 (Table 1.1).

As discussed in Chapter 4, the Preventive Arm of the *SGP* applies to Ireland from 2016. Under the Preventive Arm, the Government is required to ensure that the budgetary position is at, or moving

⁴ The General Government balance and primary balance data in Figure 1.10A and Figure 1.10B are adjusted for the impact of financial sector measures such as the AIB preference share transaction in 2015.

at a sufficient pace towards, the Medium-Term Budgetary Objective (MTO). Ireland's MTO is for a General Government deficit of 0.5 per cent of GDP in structural terms.

Based on estimates of the structural deficit using the EU Commonly Agreed Methodology (CAM), Ireland is currently not meeting its MTO of a budget deficit of 0.5 per cent of GDP in structural terms. The structural deficit refers to that part of the deficit which will not be eroded by the cyclical upswing in economic growth. The forecasts in *Budget 2017* indicate that the MTO will be reached in 2018. Until then, the country must meet a required minimum adjustment path to the MTO in terms of an annual reduction in the structural deficit which for 2016 has been set at 0.6 percentage points of GDP.⁵ To support this requirement, the Preventive Arm of the *SGP* places limits on the rate of growth of government spending through the Expenditure Benchmark. The Expenditure Benchmark essentially says that annual expenditure growth should not exceed the medium-term rate of potential GDP growth, unless the excess is matched by discretionary revenue measures.⁶

Compliance with the fiscal rules is consistent with reducing the budget deficit and gradually lowering the debt to safer levels. Strong adherence to the framework can help avoid a repeat of past mistakes when fiscal policy was strongly pro-cyclical. To avoid undermining the integrity of the new framework, the Council is strongly of the view that the plan outlined in the budget should be consistent with meeting all of the rules in 2016 and later years.

In this context, the Council is concerned by planned breaches in the fiscal rules in both 2016 and 2017 signalled in *Budget 2017*. As discussed in detail in Chapter 4, the expected improvement in the structural balance in 2016 of 0.3 percentage points of GDP falls short of the 0.6 percentage point of GDP improvement required. The Expenditure Benchmark is complied with in 2016 but only with the inclusion of a technical one-off transaction involving AIB in 2015. This transaction is explicitly treated as a one-off for the purpose of calculating compliance with the structural balance pillar but an anomaly in the fiscal rules means that the same transaction is not deemed a one-off in assessing compliance with the Expenditure Benchmark. Excluding the AIB transaction, the spending limit set by the Expenditure Benchmark would also be exceeded in 2016. As 2016 is the first year the *SGP* Preventive Arm and domestic Budgetary Rules apply following the closing of the Excessive Deficit Procedure, the failure to fully comply with all rules is a source of concern.

⁵ As Ireland has a debt ratio of greater than 60 per cent of GDP, under the terms of the *SGP*, the annual change in the structural balance must be greater than 0.5 percentage points of GDP to comply with the adjustment path condition. It has been decided at EC level that 0.6 percentage points of GDP is an appropriate minimum pace of adjustment. As discussed in Chapter 4, the current projected deviation from the required structural balance adjustment in 2016 would not be considered "significant" under the rules.

⁶ For countries not at their MTO, a convergence margin is applied when setting the EB to ensure that expenditure growth is kept in line with the required change in the structural balance.

Assessment of the Fiscal Stance

Potential compliance issues are also signalled in the Government's projections for 2017. The *Budget 2017* forecasts show compliance with structural balance rule; however, the forecasts indicate a breach of the Expenditure Benchmark.

It is important for the credibility of the budgetary process that the Government's fiscal plans show full compliance with the domestic and EU fiscal rules based on the Department of Finance's own estimates of the structural improvement. The Council's *ex post* assessment of the fiscal stance will take into account whether the Government has met both the structural balance and Expenditure Benchmark requirements. In a scenario where the Government complies with one rule (for example, the structural balance rule) but shows limited compliance or fails to comply with another (for example, the Expenditure Benchmark), the Council will examine the particular reasons causing the differing signals as well as the amount of structural fiscal effort undertaken by the Government.⁷ In circumstances where the Government set out in advance a plan which envisages non-compliance with one of the two rules, this could make it difficult to demonstrate *ex post* that sufficient fiscal effort had been undertaken to merit an overall conclusion of compliance.

The Council has a responsibility under the *Fiscal Responsibility Act (2012)* to assess whether "...the fiscal stance for the year or years concerned is....conducive to prudent economic and budgetary management" [*FRA* 8(4)(b)]. This assessment covers both 2016 and 2017. As stated in the Council's *Pre-Budget Statement*, the strong pace of economic growth in 2016 which is projected to continue in 2017, along with falling unemployment, meant that there was a limited economic case for a larger budgetary package than was planned by the Government in its July *SES*. Moreover, the debt level remains high leaving the economy more vulnerable to numerous domestic and external risks.

Despite these considerations, the Government went beyond the plan outlined in the SES with additional expenditure in 2016 and 2017 bringing the overall package of tax cuts and expenditure increases to €3 billion. The additional expenditure in 2016 – two upward revisions to spending within the same year – means there is almost no improvement in the deficit in 2016 when the oneoff AIB transaction in 2015 is excluded. Using better than expected incoming revenues to increase spending within the same year goes against the spirit of the rules and has echoes of the poor fiscal management evident in Ireland prior to the crisis. Funding permanent spending increases from volatile and potentially reversible corporation tax receipts could undermine the sustainability of the public finances. In addition, the Department of Finance forecasts show expected non-

⁷ This is in line with the approach under the Preventive Arm whereby, in the event of conflicting signals from the structural balance and Expenditure Benchmark rules, an "overall assessment" is carried out. This assessment examines the reasons for non-compliance as well as the amount of structural effort undertaken by the Government.

compliance with the structural balance rule in 2016 and the EB would also not be complied with in 2016 except for the inclusion in the 2015 expenditure base of a technical AIB transaction.

Putting these different elements together, the combined €3 billion package of tax reductions and expenditure increases for 2016 and 2017 goes beyond the limit considered prudent by the Council. Compared to the plan outlined in the July 2016 *SES*, the fiscal stance in *Budget 2017* leaves the public finances more exposed to risks than would have been the case if earlier plans had been adhered to. In 2016, unexpected corporation tax revenue was again used to fund within-year increases in expenditure, a recurrence of the actions seen in 2015. Viewed in isolation, the deviation from what could be considered a prudent stance in *Budget 2017* is not large but a repeat of the type of poor budgetary management evident in 2015 and 2016 over several years would not be conducive to prudent economic and budgetary management. As the current projections for 2017 already imply a breach of the Expenditure Benchmark in 2017, the scope for any further slippage is limited.

From 2017 onwards, the Government's projected fiscal stance and intention to comply with the EU fiscal rules is consistent with the deficit and debt remaining on a downward path. Provided the economy is growing at a sustainable rate, the use of the available fiscal space as envisaged in the current forecasts would be consistent with prudent policy. As discussed in Chapter 3, the growth in government spending (excluding interest expenditure) in nominal terms is expected to average around 3 per cent per annum from 2018-2021, which is below the estimated nominal potential growth rate of the economy.

1.4 THE MEDIUM-TERM FISCAL STANCE

1.4.1 MEDIUM-TERM EXPENDITURE PLANNING AND MANAGEMENT

A recurring theme in the Council's *Fiscal Assessment Reports* has been the need to improve the quality of the medium-term projections for the public finances presented in the budget and Stability Programme Update. It is important to recognise that some progress has been made in improving the quality of the medium-term budgetary forecasts. In particular, in the *Summer Economic Statement 2016* and in *Budget 2017*, the Department of Finance published forecasts for overall revenue, expenditure, the deficit and the debt that include the planned use of the estimated fiscal space. These forecasts are more meaningful and realistic than the medium-term projections published previously which were purely technical and did not show the path of the public finances consistent with the Government's stated policy intention to use the available fiscal space. Box A describes recent changes to the budgetary process in Ireland and the presentation of budgetary data.

As noted previously by the Council, Article 9 of the Directive on Medium-Term Budgetary Frameworks (MTBF) requires that Member States provide forecasts for major items of expenditure based on unchanged policies and on the basis of policies envisaged. The publication of the *ex post* forecasts in the *SES* and *Budget 2017* go some way towards meeting this latter requirement. The fiscal forecasts in *Budget 2017* improve on the previous purely technical projections by showing the path of the main budgetary aggregates consistent with the Government's intended policy of following minimum compliance with the fiscal rules.

While there has been some progress, the Government's medium-term fiscal projections still fall short of fully meeting the requirements of the Directive.⁸ By providing forecasts on the basis of both unchanged policies and on the basis of intended policies, this would facilitate an assessment of the long-term impact of envisaged policies on the sustainability of the public finances. An expenditure scenario which estimates the cost of maintaining the current level of public services and benefits in real terms in future years would be one useful input into the process of producing the type of expenditure forecasts envisaged under the Directive.

This is the idea behind the Council's stand-still scenario developed and published in recent reports. It is important to stress that this estimate is not intended as a forecast of future government expenditure but is instead designed to provide an estimate of the future path of spending allowing for demographic pressures and the cost of maintaining the real value of public services and benefits over the medium term. There is no suggestion from the Council that automatic indexation of future expenditure should be followed. The purpose of the stand-still expenditure estimate is not to recommend automatic indexation but rather to provide an illustrative estimate of the cost of maintaining the real value of public services and benefits in an environment where the Department of Finance is forecasting increases in inflation over the medium term, albeit at a modest rate.

⁸ Article 9 of the Directive on Medium-Term Budgetary Frameworks (MTBF) states that Member States must adopt MTBFs that provide for a fiscal planning horizon of at least three years and that these multiannual frameworks should include the following: (a) comprehensive and transparent multiannual budgetary objectives in terms of the General Government deficit, debt and any other summary fiscal indicator such as expenditure, ensuring that these are consistent with any numerical fiscal rules as provided for in Chapter IV in force; (b) projections of each major expenditure and revenue item of the General Government with more specifications on the central government and social security level, for the budget year and beyond, based on unchanged policies; (c) a description of medium-term policies envisaged with an impact on General Government finances, broken down by major revenue and expenditure item, showing how the adjustment towards the Medium-Term Budgetary Objectives is achieved compared to projections under unchanged policies; (d) an assessment as to how in the light of their direct long-term impact on General Government finances, the policies envisaged are likely to affect the long-term sustainability of the public finances. The Council's stand-still scenario is updated in Chapter 3 from the June 2016 *Fiscal Assessment Report.* On top of some pre-committed spending, the Government has allocated a total of €4.4 billion of the estimated net fiscal space from 2017 to 2021 to current expenditure increases. The analysis in Chapter 3 shows that accommodating estimated demographic pressures and the cost of maintaining real public services and benefits would absorb almost the full amount currently budgeted for current expenditure increases from 2017-2021. An estimate of the cost of standing still is an important input into good expenditure planning as it helps inform policymakers of the scope for new spending or tax initiatives, in the absence of efficiency gains or cuts to real benefits. Along with the approach developed by the Council, alternative methodologies could be used to estimate a stand-still scenario.

Related to this, it is worth noting that the overall amount of net fiscal space available for expenditure increases, tax reductions and the proposed Rainy Day Fund from 2018-2021 was revised down by ≤ 1 billion in *Budget 2017* compared to *SES 2016* published in June (see Box F in Chapter 4 for a discussion of the concept of fiscal space as used by the Department of Finance). The downward revision to the estimated net fiscal space was mainly caused by lower forecasts for the economy's potential growth rate over the medium term in *Budget 2017*. Despite the reduction in overall net fiscal space of ≤ 1 billion in *Budget 2017*, the expenditure allocations in the Budget are set relative to the higher fiscal space estimates from the *SES*. Similarly, the amount of fiscal space allocated to the proposed Rainy Day Fund is also unchanged from the *SES*. This would imply that the effect of the overall ≤ 1 billion reduction in net fiscal space in *Budget 2017* has been to reduce the amount of resources available for tax reductions.

TABLE 1.3. ESTIMATES OF NET FISCHE STACE. BOBOLT 2017 AND SES 2010, C BILLION							
Net Fiscal Space	2018	2019	2020	2021	Total		
SES 2016	1.2	3.0	3.1	3.0	10.3		
Budget 2017	1.2	2.7	2.7	2.7	9.3		
Difference (Budget 2017 - SES 2016)	0.0	-0.3	-0.4	-0.3	-1.0		

TABLE 1 2.	Formates or	NET FICON	CRACE	DUD 057 2017	AND CEC 2010	£ BULLON
TABLE 1.3.	ESTIMATES OF	INEL FISCAL	SPACE.	DUDGEI ZUI/	AND SES ZUID	, E BILLION

Sources: Department of Finance, SES 2016 and Budget 2017. Rounding may affect totals.

As discussed in Chapter 3 and Chapter 4, on-going problems with expenditure planning and management are evident again in the *Expenditure Report 2017*. If properly implemented, the Medium-Term Expenditure Framework should work to provide an anchor for policymakers' planning. Since 2011, however, a pattern of persistent upward revisions to planned expenditure has become established. Every expenditure report since 2012 has contained upward revisions to ceilings. In 2016, the expenditure ceilings in the *Mid-Year Expenditure Report* published in July were revised up in the space of four months with the publication of higher ceilings in the *Expenditure Report 2017* released on Budget day. Repeated upward revisions undermine the usefulness of the

expenditure ceilings as a tool for medium-term expenditure planning and management and increase the risk that incoming cyclical revenues will be spent rather than saved, potentially undermining the sustainability of the public finances over the medium term. The operation of the Medium-Term Budgetary Framework is discussed in more detail in Chapter 4.

1.4.2 MANAGING DEMANDS ON THE PUBLIC FINANCES WITH FINITE RESOURCES

As noted above and in Chapter 3, in 2017 and 2018 the available resources for tax reductions and/or expenditure increases is very limited while complying with the fiscal rules. The estimated fiscal space for 2018 in *Budget 2017* is €1.2 billion. Deducting the cost of funding the expenditure increases and tax cuts introduced in *Budget 2017* on a full year basis in 2018 reduces the fiscal space for any new initiatives or maintaining the real value of public expenditure to below €600 million.

In framing future budgets, the reality of the relatively limited resources available for new measures under the fiscal rules in the short term will have to be reconciled with the many competing demands for additional pay and non-pay expenditure across a range of areas. The projections in *Budget 2017* show the budget deficit being eliminated in 2018 with the budget moving into a small surplus in 2019. This path for the public finances is consistent with minimum compliance with the fiscal rules. Accepting that this overall target for the deficit is appropriate in the coming years, it is worth noting a simple reality of budgetary arithmetic. Higher expenditure in one area means fewer resources are available for additional spending in another area, unless savings or new revenue raising measures are identified. Similarly, discretionary tax cuts limit the room for expenditure increases.

It is important to note that a key reason for the relatively constrained budgetary position in the near term is that Ireland is still adjusting its budget deficit downwards towards its medium-term objective. This requires that spending growth, net of discretionary revenue measures, is kept below the potential growth of the economy. Once the medium-term objective is achieved – a structural deficit of less than 0.5 per cent of GDP is reached – spending growth (again, net of discretionary revenue measures) is allowed under the rules to grow at the underlying potential growth rate of the economy. This will allow more resources to be available to meet important societal needs. Moreover, in both the near and longer terms, there is no restriction on faster spending growth provided that the necessary additional revenues are raised.

An issue which has raised considerable debate in recent years, not least in view of historically low global interest rates, is the treatment of investment under the fiscal rules and the question of whether the fiscal rules are too constraining on capital investment. The issue has been especially

prominent in Ireland given the very low level of capital spending in recent years as documented in Kennedy (2016). In addressing this issue, it is worth noting at the outset the objectives which the current fiscal rules are trying to achieve. One of the objectives the current rules try to achieve is to avoid "deficit bias" – the tendency of governments to allow deficit and public debt levels to increase – and procyclicality in fiscal policymaking. Procyclicality has been a particular problem in Ireland in the past when in good times, with strong economic growth and revenue surges, tax cuts and spending increases were introduced which were very difficult to reverse once the revenue surges reversed. There is a risk of this re-occurring with corporation tax. One aspect of the fiscal rules that is very beneficial in potentially helping to avoid temporary revenue surges being used for permanent spending increases is the Expenditure Benchmark (EB). The Expenditure Benchmark is designed to ensure that overall expenditure growth, net of discretionary tax changes, is in line with the underlying sustainable growth rate of the economy. Fiscal rules also serve the function of initiating corrective action when the deficit is getting too large or debt levels are too high, helping to move the public finances on to a more sustainable path for the long term.

A concern exists, however, that the treatment of investment in the current fiscal rules may not be satisfactory. As discussed in Mintz and Smart (2006), a potential concern with the rules is that they reduce the incentive for public investment since capital expenditure tends to provide benefits in the future. Faced with binding fiscal rules, governments may be more reluctant to invest in capital which yields longer-term benefits versus the immediate gains attainable from current spending. Various studies have proposed a "golden rule" which would exclude net investment – the part of investment over and above estimated depreciation that increases the capital stock – from the overall calculation of the deficit target (see Blanchard and Giavazzi, 2003). At a European level, there have been discussions to examine possible modifications of the rules to exclude at least certain categories of net investment. The current fiscal rules make some allowance for possible lumpiness in capital spending by smoothing investment costs over a four-year period in calculating allowable spending growth under the Expenditure Benchmark.

It is possible that modifications that may be agreed in future at a European level could result in a more satisfactory treatment of public investment in the current fiscal rules. At the same time, even if the rules were to make more of a distinction between current and capital spending, it is necessary to ask whether a higher overall deficit path than currently being projected in *Budget 2017* to accommodate higher investment would be appropriate given the expected cyclical position of the economy and the public finances, even taking into account potential long-run benefits for potential output and the government's stock of physical assets.⁹ In this context, it is also important

⁹ See Barnes and Smyth (2013) for an analysis of the Government's balance sheet.

to consider that Ireland has a very high gross debt which needs to be brought down to safer levels. A key step in reducing the debt is to lower the deficit towards a balanced budget position. As noted earlier, this is what is projected in the current Department of Finance forecasts which envisage a balanced budget by 2018. Moreover, based on current forecasts, a looser fiscal stance over the medium term than already planned by the Government would not be warranted given the economy is likely to be operating close to capacity in 2016 and with further solid growth forecast for 2017 and later years.

Therefore, even though there may be concerns that the rules overly constrain capital spending, the current forecasts for the overall budget balance are likely to be close to what should be targeted in the coming years, given the need to bring the debt down and to provision for future demographic pressures. To address the concern that capital spending could be squeezed in the process of achieving the objectives for the overall budget balance, one solution is to supplement the main fiscal rule with a separate target for public investment (See Portes and Wren Lewis, 2015). For example, the Government could aim to achieve an overall level of public investment equal to a certain percentage of economic output. A separate target for public investment could help ensure that viable public investment projects with positive long-term effects are undertaken, while preserving the advantages of the current fiscal rules in helping to avoid deficit bias and procyclicality in setting budgetary policy.

BOX A: THE EVOLUTION OF THE BUDGETARY PROCESS

A number of innovations to the budgetary process have been introduced in Ireland in recent years. The reforms are designed to enhance Oireachtas engagement with the budgetary process and aim to address some of the shortcomings identified in the OECD *"Review of Budgetary Oversight by Parliament in Ireland"* published in 2015. In addition to the budget (published in October) and Stability Programme Update (published in April), the Government has published a *Spring/Summer Economic Statement* since 2015. In 2016, reflecting the fact that negotiations on the formation of Government were on-going at the time of the *SPU* publication in April, the *Summer Economic Statement* was published in June 2016 rather than at the same time as the *SPU*. The *SES* provides the macroeconomic and fiscal context for the discussions at the National Economic Dialogue held in June.

The *Summer Economic Statement 2016* saw a change to the way key budgetary data are presented compared to previous publications. *SES 2016* contained forecasts for key fiscal aggregates (revenue, expenditure, the deficit and the debt) on both an *ex ante* and *ex post* basis:

• The *ex ante* forecasts mirrored the purely technical projections contained in previous budgets and *SPUs*. For example, the medium-term expenditure projections made provision for pure demographic pressures and the impact of the Lansdowne Road Agreement until 2018. The use of the available fiscal space under the domestic and EU fiscal rules for tax reductions and expenditure increases was not factored into the *ex ante* forecasts.

• The *ex post* medium-term forecasts for overall tax revenue and expenditure and other main fiscal aggregates include the allocation of fiscal space for revenue and expenditure measures over the medium term.

The *ex post* forecasts are more realistic than the technical *ex ante* projections published previously as they show the path of the public finances over the medium term consistent with the Government's stated policy to use the estimated fiscal space for tax cuts and spending increases. *Budget 2017* also published forecasts on an *ex post* basis. This is an improvement on past practice as the forecasts take into account more of the known information about the Government's likely future fiscal stance, in contrast to the purely technical projections published previously.

The first *Mid-Year Expenditure Report (MYER)* was published in July 2016. This report contained details on expenditure trends to end-June 2016 across spending programmes and a revised end-year outturn. The revised end-year outturn for 2016 in the *MYER* included the additional €540 million expenditure for the Department of Health and Department of Justice that was previously included in the estimate for 2016 presented to the Dáil in June.

Another new development in the budgetary process in 2016 was the hearings held by the Oireachtas Budgetary Oversight Committee. Although the work of the Committee was truncated for *Budget 2017*, the Committee took evidence from a number of witnesses including the Minister for Finance and Minister for Public Expenditure and Reform, Central Bank, ESRI, IFAC and others. The Committee published a report in advance of the Budget outlining some of the common themes that emerged during the hearings.

If used effectively to provide relevant information for fiscal planning, including detailed medium-term fiscal projections, the new additions to the annual budget cycle such as the *Summer Economic Statement* and *Mid-Year Expenditure Report* have the potential to enhance the budgetary process and increase transparency. As the new budgetary process becomes embedded, however, it will be important to ensure that the *SES* and *MYER* are not viewed as opportunities to make incremental within-year adjustments to the Government's spending plans as announced in the previous October's budget. If this scenario materialised, it could undermine the budgetary process and further weaken the system of expenditure ceilings.

One practical step which would facilitate consistency between the Government's fiscal plans would be to align the timing of the *SPU* with the *SES* as was the case with the first *SES* published in 2015. This would avoid the scenario where one medium-term fiscal and macroeconomic plan announced in April (the *SPU*) is superseded by a new plan published two months later in June (the *SES*).

2. ENDORSEMENT AND ASSESSMENT OF MACROECONOMIC FORECASTS

KEY MESSAGES

- The Council endorsed the *Budget 2017* macroeconomic forecasts to 2017. Taking into account the uncertainties and judgemental elements involved, including the possibility of a slowdown in growth this year, it was satisfied that these forecasts were within an endorsable range.
- While the forecasts for growth beyond 2017 are within a plausible range, the Council assesses that the composition of growth is overly weighted towards net exports relative to domestic demand. Larger competitiveness losses than are allowed for in the Department's forecasts are likely from 2017 onwards as the labour market tightens.
- The main risk to the macroeconomic forecasts comes from the adverse effects of Brexit. In addition to the short run impacts from exchange rates and uncertainty, the main effects will be felt in later years after the terms of exit are agreed. A "hard Brexit" would likely have a significant negative long-run impact on the Irish economy.
- Notwithstanding that the main risks centre on external conditions, important domestic risks
 also exist. The high degree of concentration in the Irish industrial base means that sector- or
 firm-level shocks could have a significant effect on future growth prospects. In addition, supply
 constraints in the housing sector could continue to push up prices and erode competitiveness.
- Although Brexit-related concerns have underlined the downside risks to growth, past experience also cautions against the risk of overheating. Near-term prospects are positive, despite forecasts of a moderation in growth rates from their recent high levels. If high growth rates were to continue, there is a risk of an unsustainable path for the Irish economy.
- To avoid a repeat of past failures of macroeconomic management, it is essential that the Government's forecasts for the medium term are well-founded. This requires an augmentation of the Department of Finance's current toolkit for medium-term macroeconomic forecasting. There are risks that signs of overheating will be missed if the Department continues to rely so heavily on the Commonly Agreed Methodology (CAM) for estimating potential output. While the Council recognises that work on alternative supply-side estimates has been interrupted due to the challenges posed by the recent National Accounts, further progress on developing and reporting alternatives to the CAM is necessary to improve the quality of the Department's supply-side forecasts.

2.1 INTRODUCTION

The Council's seventh endorsement exercise covers the set of macroeconomic projections in *Budget 2017*. Although the forecasts published in the Budget cover the same time horizon as *SPU 2016* (2016-2021), the focus of the endorsement exercise for *Budget 2017* is on the macroeconomic forecasts for 2016 and 2017. The timeline for the endorsement process is detailed in Appendix B.

To support the endorsement and assessment functions, the Council has continued to develop and update its suite of models, with an expanded set of tools used for both short-term and mediumterm forecasting. These are essential for assessing the cyclical position of the economy as well as for understanding the economy's medium-term supply-side potential.

Section 2.2 outlines the endorsement process as it applied to the *Budget 2017* projections. Section 2.3 assesses the *Budget 2017* forecasts. Section 2.4 provides an assessment of the risks surrounding the economic outlook. A box examines some of the latest indicators and possible implications of Brexit for the Irish economy. Appendix D focuses on the implications of the 2015 National Accounts on the estimation of potential output and the output gap using the Commonly Agreed Methodology (CAM).

2.2 ENDORSEMENT OF THE BUDGET 2017 PROJECTIONS

This section details the seventh endorsement exercise undertaken by the Council covering *Budget* 2017, outlining the Council's considerations around the time of the endorsement and the process itself (Appendix B details the timeline). Data available at the time differs from that now available for the purposes of the assessment. Additional spending on transfers of ≤ 100 million in 2016 and the larger-than-initially assumed budgetary package for 2017 (≤ 140 million) impact on personal consumption forecasts, increasing them by 0.1 per cent in each year as set out in the Department's reconciliation table. Detailed forecasts in line with those in Annex 3 of *Budget 2017* were the basis for the endorsement exercise.

The endorsed forecasts were on a no-policy-change basis and hence did not include the impact of using the available fiscal space beyond 2017. Given that the fiscal projections in *Budget 2017* are based on using the estimated fiscal space out to 2021, having a full set of macroeconomic forecasts on the same basis would be desirable. Only forecasts for real GDP were published on an *ex post* basis in *Budget 2017* (in Tables 12 and 17).

The Council endorsed the *Budget 2017* macroeconomic projections to 2017. It was satisfied that the central scenario outlined was within its endorsable range, taking into account the methodology

and the plausibility of the judgements made. The endorsement process focuses on several key dimensions: the plausibility of the methodology used; the pattern of recent forecast errors; and comparisons with the Council's Benchmark and other projections.¹⁰

First, focusing on the methodology used by the Department of Finance, the Council is satisfied that short-term projections broadly conform to standards set by other forecasting agencies and good practice. The Department provides detailed information on models used in the development of its forecasts for assessment by the Council. In relation to medium-term projections, significant challenges were posed by the 2015 National Accounts. If left unadjusted, using the Commonly Agreed Methodology (CAM) had the potential to give very misleading signals as to the cyclical position of the economy, which would have impacted on the application of the fiscal rules. The Council has reviewed the technical adjustments to the CAM applied by the Department of Finance following engagement with the European Commission. The Council is satisfied that they reflect an appropriate response to the challenges caused by the revised National Accounts data. The Council notes that work on alternative supply-side estimates may have been interrupted due to the challenges raised by the recent National Accounts. Further progress on developing and reporting alternatives to the CAM is necessary to improve the quality of the Department's supply-side forecasts.

Second, in terms of the pattern of errors in recent Department of Finance forecasts, the Council has in previous reports highlighted some evidence of systematic bias related to the domestic and external split of aggregate demand. As detailed in the June *Fiscal Assessment Report*, the previously observed systematic bias appears to have diminished in more recent periods. The Council will continue to monitor the Department's forecast errors in future for the presence of any such bias.

Third, comparisons with the full set of IFAC Benchmark projections showed a larger deviation from the Department's forecasts than in previous endorsement rounds, both in aggregate and across the components of growth. The Department's estimates for growth in 2016 and 2017 were assessed to be within an endorsable range, despite being somewhat higher than the IFAC Benchmark projections. Most of this difference can be accounted for by the difference in forecasts for net exports, although it can also be seen as reflecting the Council's somewhat greater emphasis on the use of information from quarterly data. The Department's forecasts were in line with consensus forecasts available at the time. In terms of composition, the Council's Benchmark forecasts projected a larger contribution to growth from domestic demand from 2018-2021 than in the

¹⁰ The IFAC Benchmark projections are prepared by the Secretariat for the endorsement exercise.

Department of Finance forecasts. The Department's projections for the GDP deflator were also somewhat lower than IFAC's Benchmarks.

2.3 AN ASSESSMENT OF THE MACROECONOMIC FORECASTS IN BUDGET 2017

2.3.1 MACROECONOMIC CONTEXT

Official estimates of GDP and GNP growth overstate the true rate of improvement in the Irish economy for 2015. More informative indicators suggest that the economy grew by 5-6 per cent last year, much slower than the measured growth in GDP and GNP. Growth appears to have slowed somewhat in the year to date with underlying investment¹¹ acting as a drag on growth.

Figure 2.1 uses several indicators to examine the Irish recession and subsequent recovery. In each case, the base level is the peak of Irish output (2007). It is worth noting, however, that this level was not sustainable with one estimate putting the output gap at 10 per cent of potential GDP in 2007 (IMF, 2016).



FIGURE 2.1: INDICATORS OF ECONOMIC ACTIVITY (CONSTANT PRICES)

¹¹ Underlying investment refers to all investment apart from that in aircraft and intangible assets, which are mainly imported and hence GDP neutral.

Looking at the four indicators, it is clear that there are conflicting signals with regard to the recent performance of the economy. Panel A shows real consumption per capita. This metric only captures one part of the economy, but does give some indication of the evolution of living standards. Another useful indicator, shown in panel B, is Net National Product (NNP) per capita. This measure includes most activities in the economy, and it is less distorted for Ireland in 2015 than GDP and GNP. This is because it excludes depreciation (which jumped in 2015, linked to the dramatic increase in the capital stock). Both of these measures show severe losses in consumption/output in the crisis with recoveries taking place in the past couple of years. Despite the recent growth, both measures still lie below their pre-crisis peaks. Looking at GDP and GNP per capita, there were significant falls in both of these measures after 2007. In 2014 the per capita level of both remained below their pre-crisis peaks. Distortions in the National Accounts mean that both GDP and GNP per head are now well above their 2007 levels and do not accurately portray the recent recovery.

To examine how the Irish recession/recovery stands internationally, Figure 2.2 shows consumption per capita for Ireland, compared to the UK and US. We can see that consumption per capita fell further than the UK or US post-crisis and has performed worse overall in this period. The relatively poor performance of Irish consumption over this period may be partially due to deleveraging, with households prioritising debt reduction rather than increased consumption.



Previous *Fiscal Assessment Reports* have noted the role played by favourable external conditions in driving much of the recovery in the Irish economy from 2012-2015. In particular, 2015 saw

reasonable growth in Ireland's key trading partners, favourable exchange rates,¹² low oil prices and accommodative monetary policy. These factors led to strong contributions from trade (abstracting from the exaggerated effects of the activities of some multinational enterprises (MNEs)). In the aftermath of the UK's vote to leave the European Union and developments in the United States, future external conditions look both more uncertain and unfavourable than previously assumed. There has already been a significant appreciation of the Euro against Sterling, while future growth prospects for the UK have been revised down substantially (see Box B for details). Although neither are key export markets for Ireland, growth in Japan remains subdued and concerns remain over credit growth in China.¹³ More generally, global trade growth has slowed in recent years, only barely keeping pace with economic growth.

2.3.2 BUDGET 2017 SHORT-TERM FORECASTS, 2016-2017

The *Budget 2017* forecasts indicate that last year's strong **personal consumption** growth is expected to moderate somewhat in 2016 and 2017 (see Table 2.1 for a summary of *Budget 2017* forecasts). Models based on disposable income (as used by the Council to produce its Benchmark forecasts) would suggest the Budget forecasts are reasonable. In addition, given the pattern of revisions in previous years, there may be upward revisions to previous quarters which would bring consumption into closer alignment with employment and income data seen this year. The high-frequency data on retail sales and car sales are also broadly supportive of a positive outlook, despite some recent weakening.

Notwithstanding that the trend of **investment** growth was overstated in the headline figures for 2015 due to strong growth in intangibles, there was also strong underlying growth.¹⁴ This was mostly driven by machinery and equipment (excludes aircraft) and commercial construction. In previous *Fiscal Assessment Reports*, the underlying investment to GDP or GNP ratio was examined as a yardstick of current investment levels relative to historical standards. Using GDP or GNP is less informative due to the step change in the National Accounts for 2015. With this in mind, Figure 2.3 shows underlying investment as a percentage of underlying domestic demand. When using this denominator, the Department of Finance forecasts indicate that underlying investment will return to its historical average only at the end of the forecast horizon.

¹² The Euro depreciated by 16.5 per cent against the Dollar and 10 per cent against the Pound Sterling compared to 2014.

¹³ IMF (2016) notes that "the [Chinese] economy's dependence on credit is increasing at a dangerous pace". pg 33

¹⁴ Much of this is accounted for by imported patents, although in some instances intangible investment takes the form of R&D services.
The building and construction sector is forecast to grow substantially this year, albeit still from a relatively low base. Byrne *et al.* (2014) estimate 25,000 dwellings per annum are required to meet demand due to demographics and new household formation. The level of housing completions has been around half the estimated requirement since 2010.¹⁵ There is now a significant amount of pent-up demand, but there has been a limited supply response thus far. This suggests that structural factors are impairing the supply side of the market. If these factors were removed (credit availability for builders, planning regulations, etc.) there could be a faster pick-up in completions to meet demand. On balance, however, the Council assesses that the Department's forecast of 25,000 completions in 2019 is optimistic given the limited observed supply response.



Note: Both Underlying measures exclude investment in aircraft and intangibles. There is limited reliable data on aircraft investment pre-1997, it is likely to be small and is assumed to be zero here for illustrative purposes. For intangibles, there are no data for R&D investment pre-1995, so this aspect of intangible investment is also assumed to be zero pre-1995. Dashed line represents *Budget 2017* forecasts. *Sources: CSO, Budget 2017* and internal IFAC calculations.

Government consumption has grown much faster than anticipated in the first half of this year, up 5 per cent on the same period last year. *Budget 2017* forecasts a 5.9 per cent expansion in government consumption for the year. This implies strong growth in the second half of the year, albeit this is made more likely by the €540 million increase in voted spending which will be accounted for in the second half of the year.¹⁶

Export growth was mainly responsible for the large upward shift in GDP for 2015. While goods exports in the National Accounts rose by 71 per cent, those recorded in the monthly trade data

¹⁵ *Budget 2017* forecasts completions to reach 25,000 in 2019.

¹⁶ This is made up of €500 million for the Department of Health and €40 million for the Department of Justice.

increased by 21 per cent.¹⁷ The forecasts in *Budget 2017* are for exports to grow in line with external demand from Ireland's main trading partners. This approach is sensible and is in line with the Council's application of its suite of models in this forecasting round. However, it should be noted that the base incorporates the surge in contract manufacturing-related exports in 2015 and this base is carried forward into the forecast years without assuming any increase or decrease. While external conditions were very favourable last year, the outlook is now both more uncertain and more negative, primarily due to Brexit. There has already been a substantial appreciation of the Euro against Sterling this year. In addition, expected trading partner growth has been impacted by downward revisions to UK growth forecasts. **Import** growth is also set to slow significantly in the Department's projections, from a very high base.

% change in volumes unless stated	2014	2015	2016	2017
GDP	8.5	26.3	4.2	3.5
GDP Deflator	-1.2	4.9	-1.3	1.0
Nominal GDP	7.2	32.4	2.8	4.5
GNP	9.2	18.7	7.5	3.3
Consumption	1.7	4.5	3.3	2.9
Investment	18.2	32.7	15.8	6.0
Government	5.4	1.2	5.9	2.4
Exports	14.4	34.4	3.6	4.5
Imports	15.3	21.7	5.9	5.1
Stock Changes (pp contribution)	1.3	-0.8	0.1	0.0
Current Account (% of GDP)	1.7	10.2	9.4	8.2
Employment	1.7	2.6	2.6	2.1
Unemployment Rate	11.3	9.5	8.3	7.7
Inflation Rate (HICP)	0.3	0.0	-0.1	1.3
Nominal GDP (€ billions)	193.2	255.8	263.1	275.1

TABLE 2.1: BUDGE	т 2017	MACROECONOMIC	FORECASTS	(TO 2017)
------------------	--------	---------------	-----------	-----------

Sources: CSO and Department of Finance (Budget 2017).

Budget 2017 forecasts real **GDP** growth of 4.2 per cent this year, followed by a 3.5 per cent expansion in 2017. While the first half of 2016 saw GDP 4 per cent higher than the first half of 2015, the quarterly pattern of growth is less encouraging. The carryover¹⁸ for 2016 now stands at only 2.1 per cent, reflecting the weak quarter-on-quarter growth recorded in the first half of this year and the strong growth recorded in the second half of 2015. With this in mind, an average quarter-on-quarter growth rate of 2.8 per cent would be needed in the second half of the year to

¹⁷ Both are in nominal terms. While there has often been a substantial gap between goods exports in the National Accounts and those recorded in the merchandise trade data, up until recently these differences had been broadly GDP neutral, as there had been corresponding increases in imports of royalties (see Box A, IFAC (2016b)).

¹⁸ The carryover effect refers to the annual 2016 growth rate that would be observed if seasonally adjusted real GDP remained unchanged at its Q2 2016 level for the remaining two quarters of this year.

be consistent with the Department's 4.2 per cent forecast for annual GDP growth in 2016 (Table 2.1). Conversely, the forecasts also imply that there would be no quarter-on-quarter growth in 2017 needed to achieve the 3.5 per cent growth forecast in *Budget 2017*. Despite the Quarterly National Accounts being highly volatile, it seems unlikely that there would be such a dramatic change in the quarterly pace of growth¹⁹. The Council note that the Quarterly National Accounts are subject to heavy revision and hence are a noisy indicator. However, useful information in the quarterly data should be used help inform forecast judgment.

TABLE 2.2: IMPLIED AVERAGE QUARTER ON QUARTER GROWTH RATES

	2014	2015	2016	2017			
Budget 2017	2.6	6.6	2.8	0.0			
Source: Budget 2017 and Internal IFAC calculations.							

Notes: 2014 and 2015 figures refer to the average quarter-on-quarter growth rate in those years. 2016 refers to the

growth rate required in the final two quarters of 2016 needed to achieve the 4.2 per cent growth forecast in Budget 2017. The 2017 figure refers to the average quarter-on-quarter growth needed to achieve the forecast 3.5 per cent growth assuming constant growth in the second half of 2016.

There is a much stronger forecast for growth in **GNP**, with 7.5 per cent growth this year and 3.3 per cent in 2017. This reflects that net factor flows are forecast to contract this year (in absolute terms) and expand again in 2017.

The GDP deflator grew strongly in 2015, driven by terms of trade effects. These effects were mainly as a result of the depreciation of the Euro, most importantly against the Dollar and Sterling. In 2016 there have already been strong reversals of these terms of trade effects, with the appreciation of the Euro against Sterling having a considerable impact. With this in mind, Budget 2017 forecasts of negative growth for the GDP deflator this year seem reasonable. With limited exchange rate movements assumed thereafter, in accordance with standard practices, the deflator is driven by domestic elements from 2017-2021.

2.3.3 ANALYSIS OF CONTRIBUTIONS TO GROWTH IN BUDGET 2017

Figure 2.4 shows the underlying contributions to GDP growth in Budget 2017. For 2016, growth is driven by underlying net exports along with personal and government consumption, with a negative contribution from underlying investment. For 2017, the lower forecast growth rate is mainly due to a falling contribution from underlying net exports²⁰. In the outer years of the forecast, underlying net exports continue to make sizeable contributions to growth. The declining growth rates in 2019-2021 are mainly due to falling contributions from the domestic sector.

¹⁹ It may also be that data for past quarters are revised and hence the forecast annual growth rates are achieved with a different quarterly profile.

²⁰ See Box C in IFAC (2016A) for details on underlying net exports and domestic demand contributions.



FIGURE 2.4 BUDGET 2017 UNDERLYING CONTRIBUTIONS

Notes: "Underlying" measures of investment and net exports strip out intangibles and aircraft purchases in full as these are, in the main, imported, with little impact on real GDP.

Figure 2.5 examines the revisions in the forecasts of these underlying contributions since *SPU 2016* in April. The largest revisions are for this year, with the contribution from underlying domestic demand revised down sharply. Underlying net exports are now forecast to contribute slightly more strongly this year. The increased base of underlying net exports in 2015 is partially responsible for this.²¹ In the other years, the revisions are much smaller with the contribution from underlying domestic demand revised down in every year. In contrast, the contribution from underlying net exports has been revised up marginally in the final three years of the forecast.



²¹ Arithmetically, if one increases a base level of a component of GDP and maintains the projected growth rate, then the contribution to growth from that component will increase.

BOX B: BREXIT: LATEST INDICATORS AND POSSIBLE IMPLICATIONS FOR THE IRISH ECONOMY

The UK vote to leave the EU is set to have a significant impact on the Irish economy given the extent of the trade links between Ireland and the UK. While the longer term issues surrounding the terms of a UK exit from the EU will remain unknown for some time, this Box collates some of the early indications of the impact of Brexit on the UK and Irish economies. The Box draws on analysis of the potential impact of Brexit on the Irish economy published in the Council's September 2016 *Pre-Budget Statement*.

It will take some time to accurately see the impact the vote to leave the EU has on the UK economy; however some early indicators of the short run impacts are available. The most recent quarterly data from the Office of National Statistics (ONS) show that growth slowed in the third quarter of this year, from 0.7 per cent to 0.5 per cent. Growth was entirely driven by the services sector, with the other three sectors (construction, agriculture and production) all registering declines. While there is no evidence of significant immediate falls in GDP, the main effects of Brexit are expected to take hold from 2017 and beyond. The significant depreciation of Sterling is cushioning the fall in UK output, at least in the short term.

The most obvious and immediate impact of Brexit on the Irish economy has come via exchange rates. There was some weakening of Sterling in the first half of this year in advance of the referendum. This was followed by a 6 per cent fall the day after the referendum and there have been significant falls since, particularly after the UK Prime Minister announced that Article 50 would be invoked by the end of March 2017 (Figure B1). The current rate implies an almost 20 per cent appreciation of the Euro against Sterling compared to the average value in 2015.²² If the exchange rate were to stay near this level for a prolonged period, this would imply a significant competitiveness loss for Irish firms. Keeping all other factors constant, it would be expected that Irish imports rise and exports fall as a result of these exchange rate movements. Future changes in the exchange rate are difficult to forecast, although it seems likely that the exchange rate will be significantly more volatile over the next couple of years as negotiations over the terms of Brexit take place. In addition to the competitiveness difficulties caused for Irish firms, a more volatile exchange rate will also be problematic for Irish firms.

²² The current rate is taken at 15 November 2016.



Prior to the referendum, forecasting agencies had warned that the growth prospects of the UK would deteriorate significantly if it were to leave the EU. Recent forecasts have reaffirmed this, with the IMF (2016) cutting its forecast of growth in 2017 by more than a percentage point, with reductions between 0.5pp and 0.2pp thereafter out to 2021. Cumulatively, these revisions would imply UK economic output being 2.5 per cent lower than previously forecast. Significantly for the Irish economy, the forecast growth in imports of goods and services was revised down to a much greater extent than the forecast for overall GDP, with imports into the UK in 2021 forecast to be 11 per cent lower than was forecast in April 2016. Most of this downward revision comes in 2017. Given that 17 per cent of Irish exports go to the UK, this reduced demand for imports into the UK, combined with a less favourable exchange rate would have a significant impact on the Irish economy.

While the central forecast scenarios of agencies such as the IMF and Bank of England are a useful guide as to what the potential impacts of Brexit could be, the ultimate effect is uncertain and hence alternative scenarios are considered. The Council previously presented (IFAC 2016b) two scenarios illustrating the potential impact of Brexit on the Irish economy. The first scenario (Baseline) considered the short-run impact of subdued demand from the UK, exchange rate effects and uncertainty on the Irish economy. These factors combined would see growth reduced by 0.7 percentage points in 2017 and 0.3 percentage points in 2018. As discussed above, compared to *SPU 2016* forecasts, the Department of Finance revised down growth in *Budget 2017* by a similar magnitude for 2017 and 2018.

The Baseline scenario was based on forecasts for the UK economy published by the National Institute for Economic and Social Research in August 2016. The latest NIESR forecasts published in early November 2016 do not contain any major changes to the outlook for 2017 and 2018 compared to the August forecasts and so the Council's Baseline scenario remains unchanged.

Brexit could have significant implications for medium-term growth in the UK economy. The most likely channels through which this would occur would be reduced FDI and trade, both

of which would contribute to lower productivity growth. Permanently lower UK output growth would be expected to give rise to persistently lower demand for Irish. In addition, smaller trade flows between Ireland and the UK could reduce potential supply in the Irish economy by lowering aggregate productivity. This would in turn reduce Irish potential growth rates.

Prior to the referendum, HM Treasury (2016) estimated the long run impact of different post-Brexit trade arrangements on the UK economy. The most adverse scenario shown is a WTO arrangement. Under this scenario, UK GDP would be 7.5 per cent lower after 15 years compared to a baseline where the UK remained in the EU. Similarly, NIESR (2016a) show a number of different scenarios for how Brexit could impact the UK economy out to 2030. Similar to the HM Treasury result, the most adverse NIESR scenario (WTO and an associated loss in productivity) has GDP 7.8 per cent lower by 2030 compared to the baseline. Output losses of this magnitude would clearly have a significant impact on Irish growth prospects.

The second scenario presented in the *Pre-Budget Statement* considered an adverse case where Brexit resulted in a persistent reduction in the potential growth rate of the Irish economy of 0.5 percentage points per annum over a ten-year period. While not a forecast, it is possible that such a scenario could come about if the UK opts for a "hard Brexit" outcome along the lines of a WTO arrangement, with particularly adverse effects for the Irish indigenous sector. Chapter 3 includes a discussion of the implications of these macroeconomic impacts on the public finances.

In a recent ESRI working paper, Bergin *et al.* (2016) model the medium- to long-term impacts various Brexit scenarios could have on the Irish economy. The three scenarios used are taken from NIESR: firstly, an EEA arrangement similar to that applying between Norway and the EU; secondly, a free trade agreement along the lines of that between Switzerland and the EU; and finally, a WTO arrangement. In each case, growth in the UK (and other economies which are indirectly affected by Brexit) is lower than would otherwise be the case, leading to lower demand for Irish exports. Each of these scenarios is then used as exogenous inputs into COSMO. In the most severe case presented (WTO), Irish output is 3.8 per cent lower than would otherwise be the case ten years after the UK leaves the EU. This estimate is somewhat more benign than the IFAC adverse scenario presented above. This is mainly because the ESRI scenario is only taking into account the reduced demand for Irish exports, with no formal role for trade disruption in excess of that caused by lower growth externally or for domestic uncertainty effects.

2.3.4 BUDGET 2017 MEDIUM-TERM FORECASTS, 2018-2021

Given the scale of the revisions to the National Accounts since *SPU 2016*, the estimation of potential output is now more difficult. This is because the key input data (such as GDP growth and the level of the capital stock) used in estimation of potential output are distorted as a measure of underlying activity. It is of little surprise that there have been substantial revisions to estimates of potential output growth and, to a lesser degree, the output gap in *Budget 2017* relative to *SPU 2016* (Figure 2.6 and Table 2.3). The approaches employed by the Department of Finance in *Budget 2017* to deal with these issues (as described in Appendix D) are designed to minimise the effect of

the revised National Accounts on estimates of the output gap. The approach taken leads to a spike in potential output growth in 2015 to match that of real GDP, in order to keep the output gap similar to the previous estimate published in *SPU 2016*. Revisions to the implementation of the methodology succeed in producing an output gap which is largely unchanged from *SPU 2016*. There are substantial differences in the output gap produced for 2014; but the differences in the later years - which are important in terms of guiding future policy decisions - are relatively minor.

While the focus in this *Budget* forecasting round has been on dealing with the large revision to the National Accounts, it is worth examining the plausibility of the estimates of potential output growth and the output gap as they now stand. A positive output gap (1.9pp) is estimated for this year, gradually falling to zero in 2021. Looking at a range of imbalance indicators and alternative models of potential output, it seems unlikely that there is substantial overheating in the Irish economy as suggested by this positive output gap.

Although not very apparent from Figure 2.6, potential output growth has been revised down considerably from *SPU 2016*, particularly in 2016, 2017 and 2020.²³ There may be good reasons to think the potential growth rate of the Irish economy in these years is now lower than estimated in April (due to Brexit or other events). However, this downward revision is mainly due to lower forecasts of actual real GDP growth. This again highlights an undesirable feature of the CAM; it tracks actual growth (or forecast actual growth) very closely, rather than providing a robust measure of potential output.

Despite being the official methodology for fiscal surveillance by the European Commission, the CAM has many problems in estimating the cyclical position of the Irish economy, which have been highlighted both in previous *Fiscal Assessment Reports* and by the Department of Finance itself. As a result of this, previous *Fiscal Assessment Reports* have emphasised the need for complementary supply-side methodologies to be developed by the Department. The Council recognises that the scale of the challenges created by the revised National Accounts data has interrupted work on alternative supply-side estimates. Despite this, further progress on developing and reporting alternatives to the CAM is necessary to improve the quality of the Department's supply-side forecasts.

²³ Table 2.3 shows that growth in potential has been revised down by 1.1pp in 2016, 0.8pp in 2017 and 0.4pp in 2020. Forecasts of real GDP have been revised down by 0.7, 0.4 and 0.3 percentage points respectively.



FIGURE 2.6: VINTAGES OF MEDIUM-TERM PROJECTIONS



Source: Budget 2017, SPU 2016 and internal IFAC calculations.

	% change	2015	2016	2017	2018	2019	2020	2021
Budget 2017	Real GDP Growth	26.3	4.2	3.5	3.4	3.2	2.8	2.6
	Potential GDP Growth	24.5	3.9	4.2	4.3	3.4	2.9	2.8
	Output Gap (% potential GDP)	1.6	1.9	1.3	0.5	0.3	0.2	0.0
SPU 2016	Real GDP Growth	7.8	4.9	3.9	3.9	3.3	3.1	2.9
	Potential GDP Growth	4.4	5.0	5.0	4.2	3.5	3.3	2.8
	Output Gap (% potential GDP)	1.7	1.7	0.7	0.4	0.2	0.0	0.0

TABLE 2.3: MEDIUM-TERM DEMAND AND SUPPLY-SIDE FORECASTS

Source: Department of Finance.

Notes: The forecasts for *Budget 2017* are on an *ex ante* basis, taken from Annex 3.

While the medium-term outlook for overall GDP growth is within a plausible range, the balance of domestic and external sources of growth in the outer years of the forecast is problematic. Underlying net exports are forecast to continue contributing substantially to growth throughout the forecast period. By contrast, contributions from underlying domestic demand shrink somewhat from 2017 onward (see Figure 2.4).²⁴

Given that the unemployment rate is forecast to fall substantially, the forecast wage growth is rather modest. This modest wage and consumption growth means that consumption per capita in

²⁴ These forecasts are taken from Annex 3 of *Budget 2017* and are on a no-policy-change basis. *Ex post* forecasts are published in Table 12 and Table 17 of the Budget for GDP but none of its components.

2021 is forecast to remain below its peak (2007) level. Real wage growth is forecast to be slightly below productivity growth from 2018 to 2021. Given that the labour market is forecast to tighten throughout the forecast period, one might expect that wage growth would accelerate, rather than remain largely flat, as forecast by the Department of Finance. Historically, it has been the case that lower unemployment rates are associated with stronger wage growth (Figure 2.7), but this does not appear to be the case in *Budget 2017* forecasts.



An alternative view of the medium term to that in *Budget 2017* might see the overall balance of growth weighted more towards underlying domestic demand with underlying net exports making smaller, albeit still significant, contributions to growth out to 2021. This would also be consistent with stronger wage growth as the labour market tightens, leading to some erosion of competitiveness. Such growth would also reflect considerable pent-up demand following prolonged low investment and subdued consumption growth as evident during the crisis. This would lead to an increase in the labour share in the economy. By contrast, *Budget 2017* forecasts the labour share to remain largely flat at historically low levels (Figure 2.8).

42



While ascertaining the current cyclical position of the economy is difficult, a broad range of indicators can be used to look for signs of overheating or unsustainability (see Appendix C). The Budget forecasts unemployment to be over 8 per cent on average this year. It is not clear what unemployment rate is consistent with stable inflationary pressures in Ireland. The Department's only anchor in this regard is the CAM-based NAWRU²⁵ estimates, which tend to track actual unemployment quite closely. Despite this uncertainty, there are grounds to believe that the NAWRU lies below both the current unemployment rate of 8 per cent and the current CAM estimate of 9.2 per cent. The year to April 2016 saw net inward migration for the first time since 2009, which could significantly boost labour supply in future years.

Traditionally, the current account has been a key metric to monitor for signs of imbalance in the Irish economy. Previously there were issues with the current account surplus being artificially inflated due to the redomiciling of PLCs; however it was possible to correct for this distortion and report an underlying measure. Along with the publication of the 2015 National Accounts, there were substantial revisions to the current account, with the surplus being revised up substantially in line with the headline trade balance. These distortions appear more severe than was previously the case and are not only confined to redomiciled PLCs. Unfortunately, these distortions are not easily corrected for, and as such it is impossible to assess with certainty if the "true" current position.

Looking at domestic factors for imbalances, investment ratios are shown in Figure C.3. Although headline investment appears to be above its historical average as a percentage of GDP, this is mainly

²⁵ NAWRU stands for non-accelerating wage rate of unemployment and is a measure intended to capture the unemployment rate at which wage growth is stable.

driven by investment in aircraft and intangible assets. A more useful indicator of potential imbalance from investment would be evident from an analysis of building and construction activity. Despite some modest increases in the last few years, output in this sector remains well below historical averages and the unsustainable pre-crisis highs.²⁶ Looking at credit indicators, very different pictures emerge when looking at the adjusted and unadjusted credit-to-GDP levels.²⁷ The adjusted credit-to-GDP level has continued to fall, reflecting continued deleveraging by Irish households and firms. The investment and credit ratios must be interpreted with caution given the problems with measured GDP.

Taking all these factors into account and keeping in mind the uncertainties surrounding the cyclical position of the economy, it would appear that the economy is currently operating fairly close to its potential level. This situation could change quite rapidly, however, with economic activity forecast to grow relatively strongly in coming years and unemployment continuing to fall.

2.3.5 FORECASTS OF OTHER AGENCIES

Most forecasting agencies envisage real GDP growth slowing down significantly as forecast in Budget 2017 over the near term. For 2016, all agencies forecast growth to be mainly due to domestic demand. There are some compositional differences for 2017, with the ESRI forecasting a negative net export contribution (Figure 2.9).



FIGURE 2.9: COMPARATIVE REAL GDP GROWTH CONTRIBUTIONS (PERCENTAGE POINTS)

Sources: Budget 2017; ESRI (Quarterly Commentary Autumn 2016); IMF (World Economic Outlook, October 2016); Central Bank Quarterly Bulletin 4, October 2016; and European Commission (European Economic Forecast, Autumn 2016).

Note: All contributions are on a headline basis to ensure comparability across institutions.

²⁶ Even when using alternative denominators, investment in building and construction remains low by historical standards.

²⁷ The adjusted series excludes firms engaged in financial intermediation activities, and only includes Irish resident private sector enterprises as well as households.

2.4 RISKS

While the near term prospects for the Irish economy remain relatively positive, substantial risks surround this central forecast. In 2013 and 2014 in particular, a number of external factors became more favourable. Exchange rates boosted competitiveness; a looser monetary policy stance helped a strained credit environment; oil prices remained low; and there was some demand growth in Ireland's major trading partners. Over the coming years many of these factors may reverse. Given the open nature of the Irish economy, each of these changes to the external environment could have a sizeable impact on the economy.

Table 2.4 below shows the macroeconomic risks identified in *Budget 2017* along with the Department's assessments of relative likelihoods and impacts. This table also includes an assessment from IFAC on each of the risks identified. Overall, the *Budget 2017* risk matrix presents a comprehensive list of the main macroeconomic risks. *Budget 2017* notes that "the balance of risk to the baseline forecast are firmly tilted to the downside". This is consistent with the Council's assessment.

A risk which is not identified in *Budget 2017* is that monetary policy could be inappropriate for Ireland. With output growth and inflation in the Euro Area remaining subdued, accommodative monetary policy looks set to continue.²⁸ While this loose monetary policy stance has been helpful for Ireland in recovering from a deep recession, there is a risk that monetary policy could soon be looser than would be ideal for Ireland. The recent crisis showed the impact that inappropriate monetary policy can play in amplifying the business cycle. With this in mind, domestic policy (fiscal and macroprudential) may need to play an active role to prevent overheating in the economy (see FitzGerald, 2010).

²⁸ Forecasts for inflation were revised down while forecasts for output were relatively unchanged in the recent World Economic Outlook of the IMF.

TABLE 2.4: ASSESSING BUDGET 2017 RISK MATRIX

Risk	Likelihood	Impact	IFAC Assessment
External Demand Shocks	Μ	Н	Ireland has benefited from its main trading partners performing relatively well recently. The slow pace of growth in world trade is concerning, as well as potential imbalances in China. Second round impacts of Brexit could also be significant here.
Geopolitical Risks	Μ	н	While the direct impacts from geopolitical tensions may be limited, second round effects could be significant, particularly if trade linkages are disrupted or there is a negative financial market reaction.
Persistence of low inflation	Μ	Μ	"Secular stagnation" and associated low inflation could have adverse impacts on demand for Irish exports. In addition, countries with high debt burdens (private and public) would welcome higher inflation as a means to reduce the real value of those debt burdens.
Currency Developments	Н	Η	Last year saw a significant depreciation of the Euro against the Dollar and Sterling. This year has already seen a dramatic appreciation against Sterling. In addition to the less favourable exchange rate, there is also the possibility of heightened volatility in the Euro-Sterling exchange rate in the coming years.
Rapid rebound in oil prices	L	М	As an importer, higher oil prices would reduce the purchasing power of Irish consumers and increase costs for businesses here, while weaker oil prices would be supportive of consumption.
Global financial market conditions	М	Μ	With continued low interest rates, a "search for yield" could raise financial stability concerns.
"Hard Brexit"	Н	Н	A WTO style arrangement would appear to have the most significant economic implications for both the UK and its trading partners. This scenario appears to be increasingly likely and could have significant implications for medium term growth prospects in Ireland.
Concentrated industrial base	L	Н	Ireland's industrial base is quite concentrated in a small number of sectors. As a result of this, some sector-or firm- specific shocks could have a disproportionately large impact on the Irish economy. Changes to the US corporation tax code could be one such shock which could have implications for inward FDI. Likelihood is medium.
Loss of competitiveness	Μ	Н	Given the extremely open nature of the Irish economy, any losses in competitiveness could have significant implications for growth. There are several possible sources that could lead to an erosion of competitiveness, such as wage pressures and residential/commercial property inflation.
Private sector deleveraging	L	Μ	As noted in Section 2.3, consumption per capita remains below its peak (2007) levels. This is partially driven by the high levels of household debt post-crisis. Although falling, it is high at 150 per cent of disposable income. If households were to prioritise income gains for paying down debt rather than consumption, this would imply a downside risk to the consumption forecasts.

Risk	Likelihood	Impact	IFAC Assessment
Housing supply pressures	Η	Μ	The lack of a supply response to the excess demand in the property market has seen escalating residential and commercial property prices. These both have negative implications for competitiveness, with compensating upward pressure on wages likely. While a stronger supply response is needed to keep prices and rents down, there are countervailing risks of the economy overheating if there were to be substantial increases in construction while other sectors continue to grow strongly. Policy measures which stimulate demand are likely to make these problems worse.

Note: Likelihood and impacts from *Budget 2017*: H= High; M = Medium; L = Low.

As has been highlighted in previous *Fiscal Assessment Reports* the Irish economy has historically been one of the most volatile in the OECD, along with a tendency towards large revisions to historic data. With this in mind Figure 2.10 shows the historic data and budget forecasts with fans based on historical revisions and forecast errors.



Note: Distributions or 'fans' around historical growth estimates are based on previous revisions to real GDP data. Forecast errors based on 1999-2007; 2010-2015 sample. The Y axis has been adjusted to keep 2016 and 2017 fans legible.

3. Assessment of Budgetary Forecasts

KEY MESSAGES

- Budget 2017 projections for the General Government deficit in 2016 show an improvement on a headline basis of 1 percentage point of GDP. However, excluding the one-off AIB transaction in 2015 the deficit shows an improvement of just 0.1 percentage point. The primary balance (excluding the AIB transaction) is forecast to deteriorate by 0.1 percentage point in 2016 as rising non-interest expenditure is expected to exceed revenue increases.
- The Summer Economic Statement revised up the Exchequer tax revenue forecast for 2016 by €0.9 billion, mainly due to an upward revision to corporation tax receipts. Within-year expenditure increases for 2016 of €0.85 billion see most of the upward revision to corporation taxes in 2016 spent within the year. Given the volatility and unpredictability of corporation tax receipts, care should be taken in using unanticipated revenues from this source to fund difficult to reverse current expenditure and taxation measures.
- Increases in current expenditure for 2017 in *Budget 2017* mainly in Social Protection, Health and Education are estimated to have additional carryover costs for 2018 of €0.47 billion. Moreover, tax cuts introduced for 2017 have a further estimated carryover cost of €0.17 billion in 2018. The total carryover cost of €0.65 billion will have to be met from the estimated net fiscal space of €1.2 billion for 2018, leaving limited scope for new tax reductions and spending increases.
- The Council's stand-still expenditure analysis suggests that accommodating estimated demographic pressures and the cost of maintaining real public services and benefits would absorb almost the full amount currently budgeted for expenditure increases from 2017-2021. This analysis is a useful input for helping to inform policymakers of the scope for new spending or tax initiatives, in the absence of efficiency gains or cuts to services and real benefits.
- The medium-term fiscal forecasts in *Budget 2017* take account of the planned use of the available fiscal space over the medium term. This welcome improvement makes the projections for expenditure and tax revenue more realistic than previous purely technical projections published by the Department of Finance by aligning them to the Government's stated policy. Nonetheless, serious issues with expenditure management and planning remain to be resolved. The limited implementation of the system of expenditure ceilings impedes expenditure planning and raises the risk of funding increases in expenditure from windfall revenue sources.

3.1 INTRODUCTION

This Chapter assesses the latest set of budgetary projections published in *Budget 2017*. Section 3.2 examines developments in the main fiscal aggregates in 2016. Section 3.3 assesses the projections for revenue and expenditure contained in *Budget 2017* for 2017 to 2021, and provides an update of the Council's stand-still expenditure scenario. The final section provides an analysis of the sensitivity of the budgetary projections to changes in macroeconomic conditions, as well as providing an assessment of the key risks to the public finances.

3.2 BUDGETARY PROJECTIONS FOR 2016

3.2.1 EXCHEQUER REVENUE IN 2016

Projections for Exchequer tax revenues set out in *Budget 2017* for 2016 remain unchanged from the June *SES* forecast of \notin 48.1 billion, which itself represented an upward revision to the *Budget 2016* forecast of \notin 0.9 billion. The expected tax take for this year represents a 5.6 per cent increase on the 2015 outturn. The upward revision to tax revenue between *Budget 2016* and *Budget 2017* was made up mostly of corporation tax. Income tax and PRSI receipts for 2016 were also revised up compared to the *Budget 2016* forecast, though forecast VAT receipts were revised down following a weak performance early in the year.

Corporation tax (CT) receipts in 2015 were €6.9 billion, exceeding the prior year's receipts by 49 per cent as well as the forecast (by 50 per cent). CT receipts to end-October 2016 continue to perform strongly and are likely to at least match the 2015 outturn, suggesting that there has been no unwinding of the exceptional increase in receipts in 2015. However, as highlighted in previous *FARs* and in analytical work by Casey and Hannon (2016),²⁹ the volatility and unpredictability of CT receipts represents a significant risk. Some 41 per cent of CT in 2015 was paid by only ten companies. Furthermore, CT is expected to account for 16 per cent of total tax revenue in 2016, while also accounting for a disproportionate share of overall tax revenue volatility (See Box C below) as well as some 70 per cent of the overperformance of total tax revenue in 2015. The concentration of CT receipts is one of the fiscal risks identified by the Department of Finance in *Budget 2017* (see Table 3.1). For these reasons, care should be taken in using unanticipated revenues from this source to fund difficult to reverse current expenditure and taxation measures.

²⁹ Casey, E. and Hannon, A. (2016). "Challenges Forecasting Irish Corporation Tax". IFAC Analytical Note No. 10



On a cumulative basis to end-October (Figure 3.1), income tax and VAT are below expectations. VAT receipts are below the forecast in *Budget 2016* by ≤ 280 million and are expected to fall short of this forecast by ≤ 230 million by end-December primarily due to weaker price inflation than forecast in *Budget 2016*.³⁰ Income tax was largely on profile up to July 2016. In August, receipts fell short of the *Budget 2016* forecast but have been close to the monthly profile in September and October. Stamp duties are also marginally below profile. However, this underperformance is more than offset by strong CT receipts, which are a cumulative ≤ 820 million above profile at the end of October. Excise receipts are up by ≤ 220 million against the cumulative profile to the end of October. The Department of Finance has noted the front-loading of receipts ahead of plain tobacco packaging legislation. This process peaked in June, and is expected to continue to unwind over the coming months, with overall excise duty receipts projected to come in on profile by the end of the year according to *Budget 2017*.

Assessing Exchequer tax revenues relative to the published profiles offers limited insights given that these profiles do not reflect the Department of Finance's most recent forecast for overall tax revenue from *Budget 2017*. Therefore, Figure 3.2 shows the cumulative growth in tax receipts (in millions of Euro) in each month to end-October 2016 relative to the same period in 2015. On this basis, taxes generally show an excess over 2015 in the year to date. Figure 3.3 shows total

³⁰ See *Budget 2017,* page C.20

Exchequer tax revenue in the first ten months of 2016 compared to the same period in 2015. There is some evidence of a slowdown in tax revenue growth in 2016. Overall tax revenue for the first ten months of the year grew by 4.7 per cent compared to 9.6 per cent growth for the same period in 2015. This is due to the slower growth in CT revenue in 2016. Excluding corporation tax, the growth of Exchequer Tax revenues is marginally higher in 2016 compared to 2015.

Despite continued employment growth this year, income taxes receipts to end-October 2016 have grown at a slower rate than in 2015. Moreover, the forecasts for the macroeconomic drivers of income taxes, namely non-agricultural wages and earnings, are broadly unchanged in *Budget 2017* relative to those contained in the previous budget. *Budget 2017* refers to an underperformance of DIRT and an underestimation of the first-year cost of the reductions in the USC in *Budget 2016* as the main source of the underperformance. ³¹ For *Budget 2017*, the Revenue Commissioners published revised estimates of the impact of reductions to income tax and USC that allocate more of the cost of reductions in these taxes to the first year rather than to a full-year impact.



Note: "Other" is the sum of Stamp Duties, Local Property Tax, Customs, Capital Gains, Capital Acquisitions and other taxes.

³¹ The Revenue Commission used fixed proportions of first year splits for PAYE and self assessed individuals going back a number of years. Based on an assessment of payment data earlier in the year, Revenue decided to update these proportions, resulting in change in the USC estimate. A tax change has both a first year cost in the year a measure is introduced and a carry-over cost in the following year, which together account for the 'full year' cost of a measure. In recent years the first and full year costs of a measure have been apportioned as follows: PAYE – 78 per cent first year; self-employed – 30 per cent first year. However following analysis of recent trends, the first year costs was increased to the following: PAYE – 89 per cent; and self-employed – 56 per cent. It should be noted that this revision does not impact on the total cost/yield of a measure. It only changes the apportionment of the Exchequer impact over the first and second years in which it comes into effect. A summary of the changes is available here (see page 42): http://www.finance.gov.ie/what-we-do/tax-policy/publications/reports-research/income-tax-reform-plan

On VAT, *Budget 2017* cites lower than anticipated inflation as the cause of the weaker VAT receipts in 2016 (both on an annual basis and relative to the forecast in *Budget 2016*). This is reflected in the *Budget 2017* forecast for growth in the personal consumption deflator for 2016 of 1.1 per cent, which compares to an initial forecast of 1.8 per cent in *Budget 2016*.

In terms of other revenue sources, *Budget 2017* forecasts indicate that non-tax revenues for 2016 will be €635 million lower than predicted in the June *SES. Budget 2017* notes that this predominantly relates to lower-than-anticipated dividends from semi-state bodies and financial institutions and lower transfer payments from the Local Government Fund to the Exchequer. Lower non-tax revenue from these sources is expected to be partially offset by offset by higher than expected capital receipts of €0.3 billion, the bulk of which relates to a loan repayment from the IBRC special liquidators. In 2016, €1.6 billion was realised from the redemption of Contingent Convertible capital notes (CoCos) in AIB. As a financial transaction, the bulk of the proceeds from the CoCo redemption have no effect on the General Government position, with only the interest earned on the notes improving the GG balance. See Appendix E for a more detailed examination of the GG sector.

BOX C: THE DISPROPORTIONATE IMPACT OF CORPORATION TAXES

Corporation tax receipts average close to one in every eight Euro of Exchequer tax revenues each year (Table C1). This Box highlights how Corporation Tax (CT) receipts have also had a disproportionately large impact on recent developments in overall Exchequer tax revenues.

	% Total Exchequer Tax (2001-2015)	% Total GG Revenue (2001-2015)
Customs	0.6	0.4
Excise Duty	13.3	8.4
Capital Taxes	3.9	2.4
Stamps	4.7	3.0
Income Tax	34.4	21.8
Corporation Tax	13.3	8.5
Valued Added Tax	29.5	18.8
Other	0.2	0.2
Total Exchequer Tax	100.0	63.5
Total GG Revenue	_	100.0

TABLE C1: THE SHARE OF EXCHEQUER TAX AND GENERAL GOVERNMENT (GG) REVENUES ACCOUNTED FOR BY MAIN TAX HEADS, 2001-2015

Sources: Department of Finance; CSO; and internal IFAC calculations.

VARIANCE DECOMPOSITION

A simple decomposition of tax revenues shows that the volatility of CT receipts has resulted in large contributions to the variability of total Exchequer tax receipts in recent years. In order to examine the influence of individual tax heads on the variability of total tax returns, we consider a simple portfolio variance decomposition of the form:

$$PCV_{ip} = \frac{x_i C_{ip}}{V_p}$$

where PCV_{ip} is the Percentage Contribution to the Variance of total tax changes (or portfolio "p" returns) attributable to a given tax head "i"; x_i is the share of the tax head of interest; C_{ip} is the Covariance of tax head i changes with total tax changes; and V_p is the Variance of total tax changes.³²



Sources: Department of Finance; and internal IFAC calculations.

Figure C1 shows the decomposition of the variance of total annual Exchequer tax changes. Notwithstanding their relatively smaller size, CT receipts have tended to account for relatively larger shares of annual variance in tax revenues over the past three decades. For the most recent period assessed here, 2001-2015, CT accounted for 16 per cent of total tax variation, whereas VAT and income tax (the largest tax heads) accounted for 24 per cent and 20 per cent, respectively. Capital taxes and stamps represented a combined 23 per cent of the variance of tax returns during the same period reflecting the impact of the property bubble.

FORECAST ERROR DECOMPOSITION

It is not just the scale of the variation in CT receipts that causes difficulties, but the unpredictability of these changes. The typical errors on tax forecasts for CT receipts are disproportionately large.

Figure C2 decomposes total tax forecast errors one year ahead (comparing forecasts from Budget day of the previous year to final outturns) since 1981. Excluding the crisis years 2008-2009 when unusually large forecast errors were seen across most tax heads, CT represents the largest mean absolute error on forecast revenues at €246 million on average as compared to €234 million for income tax and €193 million for VAT. The two latter tax heads, however, have accounted for typically 2-3 times more of the share of annual revenues when compared to CT over the past three decades. Even if the 2015 outturn is also excluded, the typical error observed is still as large as that evident for VAT.

³² Changes refer to year-on-year percentage changes of annual tax receipts.



3.2.2 EXPENDITURE IN 2016

For 2016, total gross voted expenditure on an Exchequer basis is expected to be ξ 56.1 billion, ξ 0.31 billion (0.6 per cent) higher than projected in the June *SES*. Of this, ξ 0.2 billion in additional capital expenditure has been allocated for education and the repair of infrastructure damaged in flooding earlier this year, and a further ξ 0.11 billion for an 85 per cent payment of the Christmas bonus for long-term social welfare recipients.³³ Coupled with the additional ξ 0.54 billion increase in expenditure announced in June, total gross voted expenditure for 2016 is to exceed the initial *Budget 2016* forecast by ξ 0.85 billion. Figure 3.4 below shows the deviation of actual expenditure from the initial Budget estimate in percentage terms. Although the deviation in 2016 is smaller than last year (the 2015 deviation was the largest in over a decade) and overall spending growth in 2015 and 2016 is modest, a pattern of expenditure overruns has re-emerged since the ending of the EU/IMF Programme in 2013. The overruns since 2013 are mainly due to higher spending in the health area than initially budgeted for.

³³ The total cost of this measure is $\notin 0.22$ billion; however, half of the cost is expected to be met from savings in other Departments by the end of 2016.



Note: The figure compares the budgeted gross voted current spending on an Exchequer basis to the actual outturn. The *Budget 2015* gross voted spending figure is adjusted to reflect the disestablishment of the HSE Vote.

Figure 3.5 shows year-on-year growth in gross voted current expenditure in 2015 and 2016 by the main Departments. Expenditure growth in the Department of Health in 2016 is expected to be higher than in 2015, largely reflecting the additional allocation of €500 million made in June 2016. Elsewhere, reflecting falling unemployment, expenditure in Social Protection is expected to be down slightly in annual terms. The main increases in expenditure in the "other" category come from higher spending in the Department of Housing, Planning, Community and Local Government (€340 million), with smaller increases in Justice, Agriculture and Arts. Overall current expenditure growth is projected at 2.3 per cent in 2016, marginally lower than the 2.8 per cent recorded in 2015.



the HSE Vote.

On non-voted expenditure, debt interest costs in 2016 are €0.2 billion lower than forecast in *Budget 2016*. The estimate of Ireland's EU budget contribution for 2017 has increased, mainly due to the measured increase in Ireland's Gross National Income (GNI) in the National Accounts published in July. The estimated EU Budget contribution is €2.1 billion in 2016 and €2.4 billion in 2017. The EU budget contribution increased relative to the *SPU* outlook by €70 million and €280 million in 2016 and 2017, respectively.

3.2.3 GENERAL GOVERNMENT BALANCE IN 2016

Budget 2017 forecasts a headline deficit of 0.9 per cent of GDP, a one percentage point improvement over the outturn for 2015. However, stripping out the 2015 one-off AIB preference share transaction shows an improvement in the deficit of only 0.1 percentage point of GDP 2016, and a worsening of the primary balance (excluding some financial sector measures) by 0.1 percentage points of GDP.³⁴ The deterioration in the primary balance in 2016 reflects a projected increase in non-interest government spending that exceeds the increase in General Government revenue in 2016. General Government revenue in 2016 is negatively impacted by a decline in property income of \pounds 0.7 billion. This is mainly due to lower dividend payments from semi-state bodies and from AIB. Figure 3.6 below shows the evolution of the forecasts for the General Government headline and primary balances as shares of nominal GDP. As noted, tax and PRSI revenue was revised up by \pounds 1 billion in the July 2016 *SES*. Despite this, Figure 3.6 shows that *Budget 2017* forecasts a smaller primary budget surplus than in *Budget 2016*.



FIGURE 3.6: GENERAL GOVERNMENT BALANCE FORECASTS FOR 2016, (% GDP)

³⁴ Assuming the €850 million increase in current and capital expenditure announced during 2016 had not taken place, the General Government balance would have been 0.2 percentage points of GDP lower in both 2016 and 2017. This is based on the Council's Fiscal Feedbacks Model.

3.3 BUDGET 2017 FORECASTS FOR 2017 ONWARDS

3.3.1 EXPENDITURE

Budget 2017 introduced certain expenditure increases for 2017 in the areas of Health, Education, Social Protection, Housing, and Children and Youth Affairs. The Department of Public Expenditure and Reform calculates that to fund these increases in expenditure on a full-year basis in 2018, an additional €473 million will be required over and above the cost in 2017.³⁵ The estimated fiscal space for 2018 in *Budget 2017* is €1.2 billion. While this amount is subject to revision as the horizon shortens, the approximately €0.5 billion cost will have to be met from the fiscal space before any new measures are announced unless savings are found elsewhere. Furthermore, these known future costs are not included in the Ministerial Expenditure Ceilings (MECs) for 2018 and later years. Instead, the projections in the *Expenditure Report* include an aggregate category labelled "unallocated resources".³⁶ It is not clear why the full-year cost of the expenditure increases in *Budget 2017* has not been factored into the expenditure ceilings for 2018 and later years.

As noted earlier, *Budget 2017* allocated an additional €0.31 billion in expenditure for 2016 for capital spending and the Christmas bonus for social welfare recipients. While the capital expenditure has been included in the detailed expenditure estimates for 2017, it appears that the remaining €0.11 billion for the Christmas Bonus is not included in the expenditure estimates for 2017. Having been abolished in 2009, the Christmas bonus was partially reintroduced in 2014 with the payment of a 25 per cent bonus. A 75 per cent bonus was paid in December 2015 and *Budget 2017* increased the payment to 85 per cent in 2016. Given the phased reintroduction of the payment since 2014, spending estimates should make an allowance for this, except if the Government does not intend to pay it in the future.

Over recent years, the public finances have benefitted from falling interest costs on government debt. Figure 3.7 below shows how interest costs have progressively improved amid the low interest rate environment globally, but also as the economy improves, debt is restructured and IMF loans were repaid. While debt costs are projected to fall over the forecast horizon in *Budget 2017*, there are risks from potential exogenous shocks to the Irish economy. These could arise, for example, from Brexit, changes in US monetary policy or another recession in the Euro Area, any of which could have a substantial negative impact on Irish government borrowing costs. The Department of Finance attaches a low likelihood to the risk of less favourable bond market conditions. Given the

³⁵ Budgetary measures often have both a first year cost in the year they are introduced and a carryover cost in the following year, which together account for the 'full year' cost of a measure. Table 9 of the *Expenditure Report* shows a carryover impact of \notin 473 million for current expenditure measures introduced in *Budget 2017*.

³⁶ *Expenditure Report 2017* (page 36) states that the carryover cost of the *Budget 2017* expenditure measures would need to be met from the unallocated resources in 2018 or savings/reprioritisation of expenditure identified during the spending review in 2017.

exceptionally low level of interest rates currently and the likelihood that rates will eventually increase, a medium likelihood would be more appropriate. The relatively long maturities on much of the outstanding stock of government debt, the vast majority of which is held at fixed interest rates, should insulate somewhat against a mild interest rate shock.³⁷ However, given that the stock of debt remains high, and there are still substantial maturities of existing debt expected in coming years that will have to be rolled over, a more substantial interest rate shock could have serious implications for the public finances.



In previous budget and SPU publications, the medium-term fiscal projections were purely technical in nature, with expenditure and tax revenue forecasts not incorporating the planned use of the estimated available fiscal space under the Government's stated policy. As argued by the Council, the Government's forecasts for the debt and deficit therefore did not present a realistic estimate of the likely path of the public finances over the medium term, showing a more favourable fiscal position than planned by not allowing for spending and tax measures. In *SES 2016,* the Department of Finance improved the presentation of the budgetary forecasts by publishing *ex post* fiscal projections which show the path for revenue, expenditure and the overall debt and deficit assuming the estimated fiscal space is allocated to tax and expenditure measures and the proposed Rainy Day Fund, as envisaged by the Government. The forecasts for expenditure in *Budget 2017* continued the progress made in the *SES* by publishing updated *ex post* forecasts for 2017-2021 (see Chapter 1, Box A).

³⁷ At end-June 2016, around 92.5 per cent of gross national debt was at fixed rates, including debt where hedging had been undertaken (Office of the Comptroller and Auditor General, 2016), while the weighted average maturity on outstanding Irish Government bonds and programme funding is estimated at 11.7 years (NTMA, 2016).

While the recent progress is welcome, further improvements are needed to enhance the quality of the medium-term expenditure forecasts presented in the budget and in expenditure reports. In particular, the Department of Finance/Department of Public Expenditure and Reform continue to present a single forecast for Government expenditure over the medium term. As argued by the Council in previous *Fiscal Assessment Reports*, an estimate of the cost of maintaining today's level of public services and benefits in real terms in future years should be an important input into the expenditure planning process.

The Council's stand-still expenditure scenario (Box D) aims to provide an estimate of these bottomup pressures given a full accounting for demographics, inflation and the Lansdowne Road Agreement. Including the *Budget 2017* package for 2017, the total amount of net fiscal space from 2017-2021 is estimated at €10.5 billion in the budget. Of this, €4.4 billion has been allocated to current expenditure increases, with €3 billion for the proposed Rainy Day Fund and the remainder to be split between capital spending and tax reductions. The stand-still analysis suggests that accommodating estimated demographic pressures and the cost of maintaining real public services and benefits would absorb almost the full amount currently budgeted for expenditure increases from 2017-2021 (Figure D1).

As shown in Table D1, under the stand-still scenario, total current spending would rise by $\in 6.8$ billion from 2017 to 2021 accounting for demographic pressures and increases in expenditure in line with inflation as forecast by the Department of Finance. The Government has pre-committed expenditure increases amounting to ≤ 2.6 billion for the Lansdowne Road Agreement (2017 and 2018) and to meet demographic pressures (2017-2021). Subtracting the ≤ 2.6 billion pre-committed spending from the ≤ 6.8 billion estimated stand-still cost implies that ≤ 4.2 billion of the available net fiscal space would be needed to fully account for demographic pressures and the additional cost of maintaining real services and benefits. The amount of overall net fiscal space allocated to expenditure increases from 2017-2021 (≤ 4.4 billion) is close to the estimated stand-still cost (≤ 4.2 billion).

59

BOX D: STAND-STILL EXPENDITURE SCENARIO

This Box updates the medium-term scenario for government expenditure contained in IFAC's June 2016 *Fiscal Assessment Report*. A description of the methodology used to produce the scenario is provided in Box E of the June *FAR*.

It is important to note that the stand-still scenario is not intended as an alternative expenditure forecast to that outlined in *Budget 2017*. Rather, the stand-still approach serves as an illustrative exercise which projects the cost of maintaining today's level of public services and benefits in real terms given demographic costs and price changes. Such information should provide a crucial input into the ultimate expenditure forecasts which are produced for policy purposes. It is important to stress that while the stand-still allows for price and wage changes, there is no suggestion on the Council's part that automatic indexation should be adopted as policy.

IFAC's stand-still analysis does not take into account possible efficiency gains or Government policy changes that could deliver expenditure savings over time.³⁸ Along with the approach developed by the Council, alternative methodologies could be used to estimate a stand-still scenario.

The current expenditure projections in *Budget 2017* make allowance for certain pre-committed nominal spending for demographic pressures in Health, Education and Social Protection and the Lansdowne Road Agreement (until 2018). Additional current spending for new programmes or to maintain the real value of existing services would need to be funded out of the estimated net fiscal space.

		2017	2018	2019	2020	2021	Total (2017- 2021)
Gross voted current spending - IFAC Stand- still (A)	Annual change, € billion	1.2	1.2	1.4	1.5	1.5	6.8
of which: Demographics	€ billion	0.6	0.4	0.6	0.6	0.6	2.7
Prices	€ billion	0.6	0.8	0.9	0.9	0.9	4.1
Budget 2017 pre-committed gross voted current expenditure (B)	€ billion	0.7	0.6	0.4	0.4	0.5	2.6
of which: Demographics	€ billion	0.4	0.3	0.4	0.4	0.5	2.0
Lansdowne Road Agreement	€ billion	0.3	0.3	0.0	0.0	0.0	0.6
Amount of net fiscal space needed to stand still C=(A-B)	€ billion	0.5	0.6	1.0	1.1	1.0	4.2
Net fiscal space allocated to current expenditure (<i>Budget 2017/SES 2016</i>) (D)	€ billion	0.8	0.6	1.0	1.0	1.0	4.4
Difference Between Net Fiscal Space Needed to Stand still and Net Fiscal Space Allocated to Current Expenditure Increases E=(D-C)	€ billion	0.3	0.0	0.0	-0.1	0.0	0.2

TABLE D1: COMPARISON OF ESTIMATED STAND-STILL CURRENT EXPENDITURE AND ALLOCATED FISCAL SPACE

Notes: Rounding may affect totals.

Table D1 below shows a comparison between the annual increases in current expenditure in the stand-still scenario, the pre-committed spending in *Budget 2017* and the overall amount of net fiscal space allocated to spending in *SES 2016*. Taking 2018 as an example, in the stand-still scenario the increase in spending required in that year to maintain real benefits and services is estimated at ≤ 1.2 billion (A). The Government has included ≤ 0.6 billion of pre-committed spending, half for the

³⁸ For example, industry agreements such as the recent agreement on drug pricing could limit the direct impact of price increases on public service costs.

Lansdowne Road Agreement and half for demographics (B). Deducting this ≤ 0.6 billion precommitted spending from the ≤ 1.2 billion estimated increase in the stand-still scenario means that ≤ 0.6 billion of the net fiscal space would be needed in 2018 to stand still (C). The 2017 *Expenditure Report* allocates ≤ 0.6 billion of the net fiscal space to current spending, almost exactly matching the estimated additional expenditure identified in the stand-still scenario (E).

From 2019-2021, the estimated additional expenditure in the stand-still scenario is close to the current allocation of net fiscal space for spending (Figure D1). This illustrates that fully accommodating estimated demographic pressures and the cost of maintaining real public services and benefits would absorb all of the net fiscal space currently budgeted for expenditure increases from 2019-2021.

In the Mid-Year Expenditure Report, the Department of Public Expenditure and Reform states that work is underway to develop a methodology that "will separately model the evolution of volume / demand and price impact" on public expenditure. The stand-still analysis presented here highlights the potential usefulness of developing this work. Starting from an estimate of the cost of standing still is an important basic input into good expenditure planning and would help inform policymakers of the scope for new spending or tax initiatives, in the absence of efficiency gains or cuts to services and real benefits.



Source: Budget 2017, Mid-Year Expenditure Report 2016, internal IFAC calculations.

3.3.2 REVENUE FORECASTS FOR 2017-2021

On an Exchequer basis, *Budget 2017* revised up the *SES* Exchequer tax forecast for 2017 by nearly €1 billion, implying growth of 5.2 per cent in year-on-year terms in 2017, slightly ahead of forecasted nominal GDP growth of 4.5 per cent.³⁹ Excise, income tax, and VAT are expected to grow

³⁹ While the 2017 tax forecast was revised up by ≤ 1 billion, *Budget 2017* revised down the *SES* tax forecast for 2018 by roughly ≤ 1 billion. This was due to the correction of a timing issue related to Single European Payments Area (SEPA) transactions. These payments had previously been booked for early 2018; however, they will now accrue in 2017. While this affects the Exchequer position, it will not impact the General Government balance as the tax receipts for the first two months of the year accrue to the previous year.

strongly in 2017, while corporation tax is expected to grow more slowly at 2.7 per cent, down from 9.4 per cent in 2016. In addition, a number of one-off adjustments are expected in 2017, resulting in a net negative effect of c. ≤ 0.4 billion to revenues in 2017.

Over the forecast horizon, current projections indicate annual Exchequer tax revenue growth of 5.4 per cent on average over the period 2016-2021. One issue which arises in 2018 relates to the estimated €0.17 billion carryover from the *Budget 2017* tax reductions. Similar to the carryover for new expenditure measures in 2018 mentioned above, this cost will have to be met out of the net fiscal space in 2018.

Appendix F describes the important factors influencing the *Budget 2017* forecasts for the four main tax heads over the period 2016-2021.



With regard to non-tax revenue sources in 2017, *Budget 2017* has revised up the forecast for nontax revenue by €440 million and capital resources by €275 million relative to the *SES 2016*. This is primarily due to higher forecasts for Central Bank surplus income. Figure 3.9 shows that since the onset of the crisis, CBI surplus Income has increased substantially. Over the coming years, the positive contribution of CBI surplus income to the public finances is expected to decline as the Central Bank reduces its holdings of government bonds. *Ex post* budgetary forecasts (forecasts which incorporate policy decisions to use the available fiscal space) indicate that non-tax revenues will decline from 3.5 per cent of GDP in 2015 to 0.9 per cent in 2021. This is mainly due to a projected decline in capital resources, which in recent years was boosted by financial transactions related to the State's investments in the financial sector. The forecasts for non-tax revenue do not include any potential proceeds from the sale of the State's remaining investments in the banks.

3.3.3 GENERAL GOVERNMENT TOTAL REVENUE AND EXPENDITURE

While the majority of the analysis presented in this chapter relates to revenues, expenditures and balances on an Exchequer basis, the Council also monitors public finances on a General Government (GG) basis (see Appendix E for an overview of the GG accounts). The domestic and EU fiscal rules are also defined on a GG basis. Figure 3.10 shows total revenue and total expenditure on a GG basis from 2000 to 2021 as a share of underlying domestic demand (UDD). ⁴⁰ Given that GDP and GNP no longer reliably reflect domestic activity in the Irish economy, using these metrics as denominators to assess fiscal metrics could be misleading. UDD is a measure of the domestic economy, and excludes the distorting effects of aircraft leasing and intangible assets.



As the chart shows, total revenue as a share of underlying domestic demand is projected to increase gradually over the forecast horizon from 49 per cent in 2016 to 52 per cent in 2021. Total expenditure shows a slight decline over the forecast horizon; however, stripping out debt interest costs which are projected to fall, primary spending is forecast to be broadly flat over the 2016 to 2021 period. Figure 3.11 shows the growth in nominal primary expenditure, revenue and potential

⁴⁰ Expenditure in this instance excludes capital transfers to remove the distorting effects of the banking crisis.

output (based on the CAM). Nominal primary expenditure is projected to grow at a slower pace than both revenue and the economy's estimated potential growth rate over the forecast horizon.

3.3.4 GENERAL GOVERNMENT BALANCE

Figure 3.12 shows the General Government balance path as set out in *Budget 2017*. Given the difficulties with using GDP as a denominator, the balance is shown in nominal Euro amounts instead.⁴¹ As Figure 3.12 shows, the pace of adjustment in the deficit is relatively slow between 2016 and 2018. Thereafter, the government accounts are projected to move into surplus at a slightly faster pace in the outer years.





Source: Department of Finance, Budget 2017.

3.3.5 GENERAL GOVERNMENT DEBT

The large revision to GDP in 2015 resulted in a drop in the debt-to-GDP ratio from 105 per cent in 2014 to 78 per cent in 2015 (see Figure 3.13). Such a decrease is misleading and overstates the reduction in the debt burden, as shown in Chapter 1.

Under the debt rule in the *SGP*, Ireland is required to gradually reduce the debt-to-GDP ratio to 60 per cent. On Budget day, the Minister for Finance announced a lower debt target of 45 per cent to be reached "by the middle to late part of the next decade". The fiscal rules require that the Government maintains a structural deficit of 0.5 per cent of GDP over the medium term. Assuming nominal GDP growth of 5 per cent per annum and compliance with the fiscal rules, this would see the debt-to-GDP ratio fall to below the Government's new 45 per cent target before 2030, based on estimates using the Council's Fiscal Feedbacks Model.

⁴¹ At the time of writing this Report, an expert group involving the CSO and representatives from numerous Irish and international Economic and Statistical agencies (including IFAC) is working towards producing new indicators of Irish economic activity. It is expected that this group will report its findings in early 2017.



FIGURE 3.13: GENERAL GOVERNMENT GROSS DEBT (%GDP)

3.4 RISKS

Table 3.1 below shows the fiscal risks identified in *Budget 2017* along with the Department of Finance's assessments of relative likelihoods and impacts. This table also includes the Council's assessment of each of the risks.

TABLE 3.1: ASSESSING BUDGET 2017 RISK MATRIX

Risk	Likelihood	Impact	IFAC Assessment
Tax forecast and payment timeline asymmetry	М	М	This risk refers primarily to corporation taxes, a large proportion of which accrues in November of each year. These highly volatile receipts are difficult to forecast. For 2016, strong growth in tax revenue, particularly from CT, is needed in order to achieve the Department of Finance's forecast for overall revenue for the year.
Corporation tax concentration risks	н	М	The Council continues to highlight concentration risks in CT. Both the likelihood and potential impact should be considered high, given that CT receipts account for 15 per cent of Exchequer tax revenues.
Financial sector developments	L	М	The State still holds substantial assets in the banking sector. Lower-than- expected proceeds from the sales of these assets over the medium-term could reduce the eventual potential gain to the State.
Receipts from resolution of financial sector crisis	L	М	Related to the previous risk. High levels of uncertainty surround the timing, prevailing market conditions and potential return arising from the sale of State held assets. It should be noted that potential upsides exist here also, with official debt projections excluding the bulk of expected disposal proceeds.
EU Budget Contributions	Н	L	This risk has been realised in the wake of the revisions to the NIE 2015 accounts. Since the revisions represent level shifts in each series, higher contributions will persist into the future.
Contingent liabilities	L	М	Although still large, contingent liabilities are declining, with NAMA-related liabilities standing at less than 20 per cent of their peak value.
Bond market conditions	L	М	Given the large stock of outstanding debt still remaining, an interest rate shock could have serious implications. However, as noted above, the long maturities and fixed nature of much of the debt should insulate against moderate rate shocks. Notwithstanding this, the Council is of the view that this risk should carry a medium likelihood reflecting the pace at which bond market conditions can change in the wake of external shocks (e.g., a hard Brexit).
Changes to tax 'drivers'	М	М	This risk is exemplified by recent CT developments. The principal macroeconomic driver of CT receipts for forecasting purposes is taken to be Gross Operating Surplus by the Department of Finance. In the wake of the NIE 2015 revisions, this relationship may have weakened.
EU-level climate change and energy developments	н	Н	Ireland is in danger of missing its 2020 emissions targets (see first report of the Climate Change Advisory Council, 2016). In order to meet existing obligations by 2020, additional allowances may need to be purchased. This could represent a substantial cost to the State.

4. Assessment of Compliance with Fiscal Rules

KEY MESSAGES

- Ireland's deficit for 2015 met the minimum deficit requirement (below 3 per cent of GDP) under the Excessive Deficit Procedure, while forecasts suggest that this achievement will be sustained. This has led to the abrogation of (i.e., exit from) the Excessive Deficit Procedure.
- *Budget 2017* plans show non-compliance with the Budgetary Rule requirements of the domestic *Fiscal Responsibility Act* and EU Preventive Arm for 2016 and 2017. These are the first two years in which the requirements of both sets of rules will apply following the closing of the excessive deficit. In both years, however, the planned non-compliance does not exceed the threshold of a "significant deviation" in the EU framework, which can trigger sanctions.
- The first pillar of the domestic Budgetary Rule and the EU Preventive Arm relates to the structural balance. The Department's projected reduction of 0.3 percentage points of GDP in the structural deficit for 2016 falls short of the minimum adjustment of 0.6 percentage points required under both rules, though the deviation is not considered a significant deviation. The rule is met on an *ex ante* basis for 2017.
- The second pillar is the Expenditure Benchmark. The expected growth rate of government spending in 2016 looks set to be lower than the maximum permitted under this rule. However, compliance is facilitated by a temporary, one-off boost to the spending base in 2015 that results from the conversion of AIB preference shares held by the State. Had this transaction been excluded from 2015 spending, the Department's projections for 2016 would imply a breach of the Expenditure Benchmark rule this year of close to €1.4 billion (0.5 per cent of GDP). This breach would amount to a significant deviation in the EU framework. For 2017, official projections show expenditure exceeding the maximum permitted under the Expenditure Benchmark by €0.2 billion, albeit the excess does not currently represent a significant deviation.
- Budget 2017 currently indicates compliance with the fiscal rules for 2018 onwards. In part, this achievement hinges on expenditure plans being consistent with ceilings set for 2017-2021. However, there are risks that a well-documented pattern of upward revisions to spending in 2016 and previous years, if continued, could undermine compliance. Effective implementation of the domestic budgetary framework would help support the design and execution of medium-term expenditure plans.

67

4.1 INTRODUCTION

The Council's mandate includes reporting on compliance with Ireland's domestic Budgetary Rule and also monitoring compliance with the full range of EU fiscal rules as part of the broader assessment of the fiscal stance.⁴² This Chapter examines the consistency of the projections contained in *Budget 2017* with these fiscal rules.

Since 2009, the primary target of fiscal policy has been the correction of the excessive deficit within the Corrective Arm of the *Stability and Growth Pact* (*SGP*) by 2015. This correction was completed in 2015, ensuring that the requirements of both the domestic and European frameworks are met (Section 4.2). The focus for Ireland now shifts to measures that seek to prevent fiscal policy from entering unsustainable territory, including requirements set under the domestic Budgetary Rule and the Preventive Arm of the *SGP*. These apply for 2016 (Section 4.3) and for all subsequent years (Section 4.4).⁴³ The Medium-Term Expenditure Framework (MTEF) is designed to support the achievement of these requirements, and includes aggregate ceilings for departmental expenditure (Section 4.5). Three boxes are included in this Chapter: the first outlines the assessment of compliance with the Budgetary Rule (Box E); the second examines the definition of fiscal space that has emerged in the Irish context (Box F); and the third explores the impact of the revised 2015 National Accounts outturns on the fiscal rules (Box G).

4.2 Ex Post Assessment for 2015

The assessment of the fiscal rules for 2015 covers Ireland's requirements under the Excessive Deficit Procedure (EDP) for a General Government deficit below 3 per cent of GDP in 2015. This correction should be deemed sustainable such that the deficit could be expected to remain below this level into the medium term.

The excessive deficit was closed with a buffer, with a deficit outturn of 1.9 per cent of GDP estimated for 2015. Excluding a one-off AIB transaction, which boosted total expenditure in 2015,

⁴² The Budgetary Rule is a key pillar of the domestic fiscal framework, mirroring *SGP* Preventive Arm requirements for the Medium-Term Budgetary Objective (MTO) that sets a target for the structural balance (set at -0.5 per cent of GDP for 2017-2019). The *Fiscal Responsibility Act 2012* defines two ways of meeting Budgetary Rule requirements: (i) when the structural balance is at or exceeding the MTO (the 'budget condition'); (ii) when the structural balance is on an appropriate path towards the MTO (the 'adjustment path condition'). The assessment of the Budgetary Rule focuses on the change in the structural balance but also considers expenditure growth by reference to the Expenditure Benchmark.

⁴³ While the Council's formal requirement to assess (*ex post*) compliance with the Budgetary Rule is backward-looking in nature, the Council's mandate to assess the fiscal stance suggests considering compliance on a forward-looking basis.
the deficit outturn is lower again at 1 per cent.^{44, 45} The EDP was formally abrogated (i.e., ended) in June 2016 and *Budget 2017* forecasts show an expected sustainable correction.⁴⁶

The closure of the excessive deficit in 2015 is sufficient to comply with the domestic Budgetary Rule and EU Corrective Arm rules in the same year. However, the significant upward revisions to spending in late 2015 set out just ahead of *Budget 2016* would have led to excess expenditure almost twice the amount considered "significant" under the Preventive Arm rules that were in force for the following year.⁴⁷

4.3 IN-YEAR ASSESSMENT FOR 2016

With the government deficit no longer considered excessive, the focus shifts to preventive measures and ensuring the medium-term sustainability of the public finances. This is the first year that both the domestic Budgetary Rule and the EU Preventive Arm rules apply following the closing of the excessive deficit. Final (*ex post*) assessments of compliance with the fiscal rules will only be determined in each subsequent spring when outturn data for the preceding year become available (Box E outlines the assessment of compliance with the Budgetary Rule).

Budget 2017 plans indicate that the domestic Budgetary Rule and the structural balance pillar of the EU fiscal rules are not expected to be complied with in 2016. While the second pillar of the EU fiscal rules – the Expenditure Benchmark – is technically complied with, the plans show that this is facilitated primarily by significant one-offs, which artificially boost the previous year's base. Table 4.1 summarises the fiscal rule requirements and the detailed calculations underpinning the Expenditure Benchmark on the basis of the *ex post Budget 2017* fiscal projections, which incorporate the use of estimated net fiscal space available over the forecast period.

⁴⁴ A temporary, one-off increase in the 2015 spending base stems from the conversion of ≤ 2.1 billion of AIB preference shares into ordinary shares. The transaction is treated by Eurostat as a capital transfer owing primarily to the increased risk associated with potential returns on ordinary shares as opposed to preference shares.

⁴⁵ An alternative denominator to scale the deficit against would be the preliminary, unrevised Q4 2015 GDP estimates. These estimates, which show GDP growth of 13.5 per cent for 2015, have the advantage of excluding MNE-related distortions in 2015, yet fail to account for other important unrelated revisions. On the basis of the unrevised nominal GDP level, the deficit for 2015 would have been 2.2 per cent (or 1.2 per cent excluding the AIB transaction).

⁴⁶ The Council decision reflected the correction of the deficit to below 3 per cent of GDP in 2015 and Commission Spring 2016 Forecasts which showed the deficit remaining below the EDP ceiling for 2016-2017 on a no-policy-change assumption.

⁴⁷ Compliance with the annual structural balance adjustment requirement and the Expenditure Benchmark was not required prior to 2016, but both rules are assessed as part of the wider analysis of the fiscal stance for 2015. Recent *SGP* reforms mean that the Corrective Arm structural balance path must also be consistent with any Preventive Arm requirements. The reform is intended to smooth transitions between both arms, while also avoiding pro-cyclical policies when a Member State is experiencing strong growth during an EDP. As Ireland entered an EDP prior to these reforms, a consistent structural balance path was not required.

TABLE 4.1: SUMMARY ASSESSMENT OF COMPLIANCE WITH RULES (% GDP UNLESS STATED)

	Code	2015	2016	2017	2018	2019	2020	2021
Corrective Arm:								
General Government Balance	GGB	-1.9	-0.9	-0.4	-0.3	0.2	0.7	1.1
General Government Debt	GGD	78.6	76.0	74.3	72.7	70.2	65.8	63.0
Debt Rule Benchmark ¹		109.2	96.5	83.6	74.7	72.9	71.2	68.5
Preventive Arm & Domestic Budgetary Rule:								
I. Minimum Structural Balance Adjustment Requirement								
Cyclical Budgetary Component = $\beta^*(OG)$ where β =0.53	CGGB	0.8	1.0	0.6	0.3	0.2	0.1	0.0
One-Off Temporary Measures	v	-0.5	0.0	0.0	0.0	0.0	0.0	0.0
Structural Balance = GGB - CGGB - v	SB	-2.2	-1.9	-1.1	-0.5	0.0	0.6	1.1
Annual Change in Structural Balance	ΔSB	1.9	0.3	0.8	0.6	0.5	0.6	0.5
Minimum Annual Adjustment Requirement ²	REQ	n.a.	0.6	0.6	0.6	0.0	n.a.	n.a.
Deviation (p.p.) = Δ SB - REQ negative = non-compliance		n.a.	-0.3	0.2	0.0	0.5	n.a.	n.a.
II. Expenditure Benchmark								
Reference Rate of Potential Growth (% y/y) 3	R		1.9	3.3	3.3	3.5	3.6	3.5
Convergence Margin (p.p.) = (0.5/(TE-i))*(REQ/0.5) ³	С		1.8	2.0	1.6	0.1	0.0	0.0
Real Corrected Expenditure Growth Limit 2 (% y/y) = R _t - C _t	EB	n.a.	0.1	1.3	1.6	3.3	3.6	3.5
General Government Expenditure (€bn)	TE	75.3	74.5	76.6	78.7	80.9	82.5	84.3
Interest Expenditure (€bn)	i	6.7	6.2	6.1	6.0	5.7	5.4	5.0
Gross Fixed Capital Formation (€bn)	GFCF	4.3	4.6	5.1	5.8	6.6	6.8	7.2
Gross Fixed Capital Formation 4yr-average (€bn)	GFCF _{4yr}	3.9	4.2	4.5	4.9	5.5	6.1	6.6
Gross Fixed Capital Formation Adjustment (ϵ bn) = GFCF _t -GFCF _{4yr}	inv	0.5	0.4	0.5	0.8	1.1	0.8	0.6
Cyclical Unemployment Expenditure (€bn) ⁴	u	-0.3	-0.4	-0.2	-0.2	-0.3	-0.6	-1.0
Government Expenditure Co-Financing EU Funding (€bn)	EU	0.4	0.4	0.5	0.5	0.5	0.5	0.6
Corrected Expenditure Aggregate = TE - i - inv - u - EU (€bn)	TE [*]	68.1	67.9	69.7	71.6	73.9	76.5	79.1
Net Discretionary Revenue Measures, "DRM" (€bn)	DRM	-0.9	-0.7	0.0	0.1	-0.1	-0.2	-0.2
Nominal Corrected Expenditure less DRM (ϵ bn) = TE [*] - DRM _t	${\sf TE}_t^{*\sf DRM}$	69.0	68.6	69.7	71.5	74.0	76.6	79.2
Nominal Growth (% y/y) = $(TE_t^{*DRM}/TE_{t-1}^{*}-1)*100$	е	6.9	0.7	2.7	2.6	3.4	3.7	3.6
Real Growth (% y/y) = ((1+e/100)/(1+p/100)-1)*100	er	5.9	-0.9	1.6	1.4	2.1	2.3	2.0
Real Corrected Expenditure Growth Limit 2 (% y/y) = R _t - C _t	EB	n.a.	0.1	1.3	1.6	3.3	3.6	3.5
Deviation (p.p.) = $er - EB_t$ positive = non-compliance	d	n.a.	-1.0	0.3	-0.2	-1.3	-1.3	-1.6
Deviation (\in bn) = d*TE _{t-1} *DRMpositive = non-compliance		n.a.	-0.7	0.2	-0.1	-0.9	-1.0	-1.2
Deviation (% GDP)positive = non-compliance		n.a.	-0.3	0.1	0.0	-0.3	-0.3	-0.4
Relevant Macroeconomic Aggregates:								
Real GDP Growth (% y/y)	у	26.3	4.2	3.5	3.8	3.6	3.0	2.8
Potential GDP Growth (% y/y)	у [*]	24.6	4.0	4.2	4.5	3.7	3.2	3.0
Output Gap	OG	1.6	1.8	1.1	0.5	0.3	0.2	0.0
GDP Deflator Applicable (% y/y) ⁵	р	0.9	1.7	1.1	1.2	1.3	1.5	1.6

Sources: Budget 2017 (ex post projections including expected allocation of fiscal space); and internal IFAC calculations. ¹ The Backward- and Forward-Looking Benchmark are calculated on the same basis but the assessment relates to

different years (the assessment of the former is for year "t", while the latter is for two years later, i.e. year "t+2").

² Annual adjustment requirements (determined by EC Matrix, Appendix G) and real Corrected Expenditure Growth Limit for year "t" are frozen in spring of the previous year. Requirements for outer years are therefore indicative only.

CAM-based potential output estimates from Budget 2017 averaged over t-5 to t+4. EC Reference Rate and Convergence Margin estimates apply for Preventive Arm requirements.

⁴ Cyclical unemployment expenditures based on average benefits, unemployment rates and CAM-based NAWRU.

⁵ The updated EC deflator is frozen at 1.2 per cent for 2017, implying a €0.1 billion (0.05 per cent of GDP) deviation.

4.3.1 MTO AND STRUCTURAL BALANCE ADJUSTMENT REQUIREMENTS

The Government's structural budget balance is projected not to meet the Medium-Term Objective (MTO) in 2016, thus not fulfilling the domestic Budgetary Rule's "Budget Condition". Both the domestic Budgetary Rule and the EU rules require that appropriate adjustments are made towards the MTO of a structural balance of -0.5 per cent of GDP.⁴⁸ The current CAM-based estimate of the structural balance for 2016 is -1.9 per cent of GDP.⁴⁹

The Department of Finance's official budgetary projections show that the adjustments toward the structural balance target falls short of requirements under the domestic Budgetary Rule and the EU rules for 2016. Requirements for an adjustment in the structural balance of +0.6 percentage points of GDP were set in spring 2015. However, the Department is currently forecasting a change in the balance (adjusted for one-offs and cyclical developments) of just +0.3 percentage points (Figure 4.1), which falls to +0.1 percentage points when the estimates of one-offs from the European Commission for 2015 are applied (Table 4.2). This represents a deterioration in the size of the adjustment that had been expected in April, when the Department's *SPU* projections also showed a deviation from the minimum requirements (a change of +0.4 percentage points was indicated at the time). The smaller structural adjustment is due to: (i) a smaller improvement in the headline deficit and (ii) more of the recovery in the economy being judged as cyclical following revisions to output gap estimates that show a larger cyclical recovery in 2016.⁵⁰ These factors are offset to some extent by a reduced level of one-off/temporary measures estimated for 2015.

		2015	2016	2017
Department of Finance	One-off/temp measures	-0.5	0.0	0.0
Estimates of One-Off/Temp	Structural Balance Implied	-2.2	-1.9	-1.1
Measures	Change in Structural Balance Implied		0.3	0.8
European Commission	One-off/temp measures	-0.8	-0.1	0.0
Estimates of One-Off/Temp	Structural Balance Implied	-1.9	-1.8	-1.1
Measures	Change in Structural Balance Implied		0.1	0.8

TABLE 4.2: S	TRUCTURAL	BALANCE	CHANGES	IN	BUDGET	2017	USING	DIFFERENT	ESTIMATES	OF
ONE-OFF/TEN	APORARY ME	ASURES (9	% GDP)							

Sources: Department of Finance; EU Commission.

⁴⁸ Ireland's minimum MTO was revised in February 2016 and is now set as a structural deficit of 0.5 per cent of GDP for the period 2017-2019, though the previous requirement set at 0.0 per cent still applies for 2016.

⁴⁹ As noted in previous *Fiscal Assessment Reports*, structural balance estimates derived from output gaps on the basis of the CAM may be inappropriate for Ireland (Chapter 2). The structural balance comprises the General Government Balance of -0.9 per cent of GDP in 2016, minus half the output gap level (based on a 0.53 semi-elasticity), minus one-offs.

⁵⁰ The European Commission (2016d) also indicated in spring that a breach was likely for 2016 in the absence of further measures. Based on their own projections, the estimated change in the structural balance relevant for assessing *ex ante* compliance was 0.2 percentage points for 2016. A subsequent recommendation noted that Ireland was "…expected to broadly comply with the provisions of the Stability and Growth Pact," but that "…further measures will be needed to ensure compliance in 2016".

The Department of Finance forecasts reflect different levels of one-off/temporary measures in Budget 2017 than those considered by the European Commission, leading to a larger structural balance adjustment under the Department's figures (Table 4.2). The only one-off included by the EU Commission for 2015 is the €2.1 billion adjustment for the AIB transaction. The Department, however, factors in other one-offs in 2015 including amounts related to dividends received from the ESB and pension levy receipts. The removal of these revenues worsens the structural balance position in 2015, which has the effect of improving the change in the structural balance between 2015 and 2016 - the period over which a deviation from the fiscal requirement is indicated in Budget 2017. Applying the same one-off estimates for 2015 as used in the Commission's autumn assessment to Budget 2017 plans would see the projected 0.3 percentage point improvement in the structural balance for 2016 fall to 0.1 percentage points. This would represent a significant deviation from the fiscal requirement. This also highlights how differences between assessments by the European Commission and Department depend not only on the CAM, but also on the definition of one-offs and other issues. The Council has previously noted that the identification of one-off/ temporary measures can be somewhat subjective. There is also international evidence that the introduction of a fiscal rules framework based on numerical targets for fiscal metrics can create incentives for governments to use one-off measures strategically.⁵¹



FIGURE 4.1: ASSESSMENT OF COMPLIANCE WITH THE BUDGETARY RULE

There are important implications if the structural balance adjustment for 2016 falls short of the required 0.6 percentage points of GDP in the *ex post* assessment by a wide margin. For instance, if

Sources: Budget 2017 (ex post projections including expected allocation of fiscal space); internal IFAC calculations. Note: The minimum MTO for Ireland was revised to -0.5 for 2017-2019 and is planned to be achieved in 2018 so that the adjustment path condition no longer applies thereafter. Required changes above are calculated based on the previous year's structural balance.

⁵¹ See Box D (IFAC, 2014b) on the treatment of one-off and temporary measures. Koen and Van den Noord (2005) demonstrate that as deficit rules become more binding, recourse to one-offs and other stratagems is more likely. Alt et al. (2012) offer a useful and more recent survey of the literature.

the shortfall exceeds 0.5 percentage points, then an overall assessment by the European Commission (Appendix G) could lead to a Significant Deviation Procedure being initiated, which would apply greater scrutiny to the other pillar of the rules, the Expenditure Benchmark.⁵² Indeed, the Commission's *ex ante* opinion notes that budget plans indicate a significant deviation from the structural balance adjustment requirements for 2016. The Commission therefore adjusts for the one-off AIB transaction as part of their Expenditure Benchmark assessment. This assessment points to 'broad compliance' on account of a breach of the threshold of significance still being marginally avoided (i.e., the breach is an amount "below but close to" the 0.5 per cent of GDP threshold).⁵³

4.3.2 EXPENDITURE BENCHMARK

The Expenditure Benchmark is intended to be consistent with requirements set for the structural balance, though the rules may give conflicting signals under certain circumstances.⁵⁴ While *Budget 2017* indicates non-compliance with the structural balance rule for 2016, the Expenditure Benchmark rule is complied with. The opposing signals regarding compliance highlights an anomaly in their application. This arises due to a differing treatment of one-off items. The Expenditure Benchmark, unlike the structural balance, fails to account for the same one-off or temporary items relevant for spending. Achieving compliance with the Expenditure Benchmark is therefore aided by the higher spending base in 2015 stemming from the conversion of the €2.1 billion of AIB preference shares into ordinary shares. This temporary, one-off increase in 2015 expenditure falls

⁵² See Box G (IFAC 2016a) for additional detail on the Preventive Arm assessment process.

⁵³ The European Commission (2016d) focuses upon the Expenditure Benchmark when it notes the risk of a deviation from adjustment requirements towards the MTO in 2016. It highlights how the structural balance adjustment indicates a significant deviation and how expenditure growth – when adjusted for the one-off AIB transaction as part of an overall assessment – exceeds the maximum growth rate permitted. The latter is currently noted as being close to but below a significant deviation, thus resulting in an overall assessment of broad compliance: "In 2016, whereas the improvement of the structural balance...significantly deviates from the required adjustment, the growth rate of government expenditure, net of discretionary revenue measures, is expected to be below the expenditure benchmark. Taking all factors into consideration, including a one-off transaction in 2015, the expenditure benchmark would point to a deviation from the requirement which is below but close to 0.5% of GDP. On that basis, the overall assessment points to a risk of some deviation from the required adjustment path towards the MTO in 2016...Overall, the Commission is of the opinion that the Draft Budgetary Plan of Ireland, which is currently under the preventive arm and subject to the transitional debt rule, is broadly compliant with the provisions of the SGP".

⁵⁴ While the EB is designed to support achieving the targeted structural balance improvement, there are a number of scenarios where they may give differing signals as to compliance with the rules (IFAC, 2015c). This is especially true if (i) there are one-offs or temporary measures, which are not captured in the EB as in the structural balance; (ii) if current year estimates of potential output growth diverge substantially from the ten-year average used in the calculation of the EB's reference rate; (iii) if a fall in the true structural balance is masked, for example, by revenue windfalls, or pro-cyclical adjustments to estimates of potential output, or (iv) if movements in interest expenditure are impacting the structural balance, while the EB is based on primary expenditure EB. In such cases, the estimated structural balance alone may fail to sufficiently capture underlying changes in the fiscal position. In the event of such conflicting signals, the Council will form a view on compliance with the Budgetary Rule based on an analysis of the particular reasons underlying any conflicts. In undertaking the assessment of rules, the Council will primarily refer to the Department's forecasts and estimates, with analysis and sensitivity tests of key assumptions and forecasts where appropriate and necessary.

out of the spending base in 2016. As a result, the growth rate in spending as assessed under the Expenditure Benchmark is artificially lowered.

It is possible to assess the implications for the Expenditure Benchmark of treating one-off items in the same manner as they are treated for the structural balance. Stripping out the AIB transaction in 2015 – thereby looking through the inconsistent treatment of one-offs – the Department's spending projections would imply non-compliance with the Expenditure Benchmark requirements. On the basis of current *Budget 2017* plans, the associated overspend for 2016 would amount to approximately €1.4 billion or 0.5 per cent of GDP (Figure 4.2). In June, the Council noted that weaknesses in expenditure management in recent years, including a pattern of overspending in Health, could lead to a widening of the already evident underlying breach of the Expenditure Benchmark (IFAC, 2016a). Since then, an additional €540 million voted expenditure for this year was announced in the 2016 Revised Estimates Volume published in June, together with a further €310 million in October as part of the *Budget 2017* estimates. While these amounts translate to additional spending under the Expenditure Benchmark of less than the nominal €850 million, they still boost spending well beyond the initial allocation.⁵⁵

4.3.3 DEBT RULE

Transitional arrangements under the Debt Rule apply until end-2018 before normal Debt Rule requirements take effect from 2019 onwards.⁵⁶ The requirements are less constraining in Ireland's case relative to the other fiscal rules.⁵⁷ Table 4.1 shows that the Department's debt ratio projections fall below the two main criteria of the Debt Rule (the "backward-" and "forward-looking benchmarks") in all forecast years.

⁵⁵ The principle of 'capital smoothing' applied under the Expenditure Benchmark rule means that investment expenditure is averaged over a four year period (year "t-3" to year "t") so that only the current year difference relative to this average is accounted for. This is intended to limit the extent to which large investment projects are penalised.

⁵⁶ The debt rule broadly requires debt in excess of 60 per cent GDP to be reduced by at least 1/20th per year on average. For a more detailed discussion, see IFAC *Analytical Note 5: Future Implications of the Debt Rule* (IFAC, 2014c).

⁵⁷ Given the starting debt-to-GDP ratio of 78.6 per cent at end-2015, the 1/20th rule approximates to, at minimum, a 20-year period over which the debt ratio would have to converge to 60 per cent.





Source: Budget 2017 (ex post figures incorporating allocated use of fiscal space) and EC Spring Economic Forecasts. Note: Real expenditure is the adjusted aggregate relevant for the assessment of the EB. It excludes interest spending, expenditure on EU programmes fully matched by EU funds revenue and cyclical elements of unemployment benefit expenditure. In addition, investment spending is averaged over a four-year window to smooth the impact of large investment projects The EB is complied with where the real expenditure aggregate grows slower than maximum limit permitted under the EB. This growth rate is adjusted to reflect discretionary revenue measures.

BOX E: ASSESSMENT OF COMPLIANCE WITH THE BUDGETARY RULE

Next year will be the first year in which the Council will make an *ex post* assessment of compliance with the Budgetary Rule. The assessment will be made with reference to the annual outturns and requirements for 2016. This Box outlines the procedural aspects of the assessment of compliance as specified under the *Fiscal Responsibility Act (FRA)*.

The *FRA* requires the Council to monitor and provide an assessment of compliance with obligations under the Budgetary Rule. This assessment specifically refers to:

- i. whether failure to comply with the Budgetary Rule constitutes a significant deviation;
- ii. whether the Government's own plans to secure compliance with the Budgetary Rule, as required under the Correction Mechanism, are being achieved, and
- iii. whether, in the Council's opinion, exceptional circumstances exist or have ceased to exist. ⁵⁸

Budgetary Rule: The Budgetary Rule consists of two elements: the "Budget Condition" and the adjustment path condition. The "Budget Condition" is a requirement that the budgetary position of the General Government is in balance or in surplus. ⁵⁹ The adjustment path condition applies when the MTO is not being met, and requires that the structural balance is converging towards this in accordance with the 1997 Surveillance and Coordination Regulation. Failure to meet the requirement is only permitted as a result of exceptional circumstances and the non-endangerment of medium-term fiscal sustainability.⁶⁰

Correction Mechanism: The FRA lays out specific requirements to initiate a "correction

 $^{^{58}}$ *FRA* Section 8(2) specifies the Council's role as to "monitor, and at least once in each year provide an assessment of, whether any obligation under section 2(1)(a) or 6(1), or to do things specified in a plan under section 6(1), is being complied with". Section 2(1)(a) relates to the Budgetary Rule and notes: "the Government shall endeavour to secure that—(*a*) the requirement imposed by *section 3* (the budgetary rule)...are complied with". Section 6(1) covers the "Correction Mechanism", that sets plans to secure compliance with the Budgetary Rule when not met: "if the Commission addresses a warning to the State under Article 6(2) of the 1997 surveillance and coordination Regulation or if the Government consider that there is a failure to comply with the budgetary rule which constitutes a significant deviation for the purposes of Article 6(3) of that Regulation, the Government shall, within 2 months, prepare and lay before Dáil Éireann a plan specifying what is required to be done for securing compliance with the budgetary rule".

⁵⁹ Based on legal clarifications, the Council is of the view that the budgetary position in this context refers to the structural balance. The *FRA* specifies that a failure to meet the requirement is only permitted as a result of exceptional circumstances and if it does not endanger medium-term fiscal sustainability. The Budget Condition is also deemed to be respected if the structural balance is at the Medium-Term Objective (MTO) as set under the Preventive Arm.

⁶⁰ As the *FRA* effectively translates *SGP* Preventive Arm requirements into domestic legislation following the Fiscal Stability Treaty, approved by referendum in 2012, the MTO, exceptional circumstances and significant deviations are interpreted as consistent with the former. The Council has clarified two elements in relation to how the Budgetary Rule is to be assessed: First, Budgetary Rule requirements, though legally applicable since December 2012, are legally satisfied by meeting EDP requirements to 2015. From 2016 on, the "Budget Condition" and the adjustment path condition operate in full. Second, assessment of compliance with the Budgetary Rule incorporates a dual assessment of requirements for both the structural balance and the Expenditure Benchmark. Regulation (EU) No. 1175/2011, 16 November 2011 and the *Vade Mecum* 2016 specify that significant deviations refer to deviations in structural balance adjustments net of discretionary revenue measures impacting on the government balance, where the deviation is at least 0.5 per cent of GDP in a single year or at least 0.25 per cent on average per year in two consecutive years.

mechanism" when the Government assesses that there is a failure to comply with the Budgetary Rule (which constitutes a "significant deviation") or when the European Commission issues a warning to the State under the 1997 Surveillance and Coordination Regulation relating to such a deviation. In such circumstances, the *FRA* requires that the Government lay before the Dáil, within two months, a plan specifying what is required to secure compliance with the Budgetary Rule. This should:

- a) specify the period over which compliance with the Budgetary Rule is to be achieved,
- b) if that period is longer than a year, specify annual targets to be met in moving towards such compliance,
- c) specify the size and nature of the revenue and expenditure measures that are to be taken to secure such compliance, and
- d) outline how any revenue and expenditure measures that are to be taken will relate to different subsectors of the General Government.

The plan must also be consistent with (i) the *SGP* rules, (ii) recommendations made to the State under the *SGP* in relation to the period over which compliance with the Budgetary Rule is to be achieved, and the size of measures to be taken to secure such compliance, and (iii) the current stability programme.

Subsequent to the Council making its assessment, the *FRA* also notes that IFAC will share this with the Minister, and then publish it within ten days. If the Government does not accept the Council's assessment in relation to compliance with the Budgetary Rule, the Minister is required to prepare and lay before Dáil Éireann a statement of the Government's reasons for not accepting it within two months of being given a copy of the assessment.⁶¹ If the Government accepts an assessment of non-compliance amounting to a significant deviation, the Correction Mechanism applies. These provisions are consistent with what is referred to as the "comply or explain" principle.

4.4 EX ANTE ASSESSMENT OF 2017 TO 2021

The *ex ante* assessment of compliance with the fiscal rules for 2017 and later years focuses on the pace of structural deficit adjustment towards meeting Ireland's updated MTO. This also includes an analysis of spending growth using the Expenditure Benchmark (EB). Box F explains the concept of "fiscal space" as used in an Irish context by the Department of Finance and how it is governed by the application of these rules over the period. The debt rule, though applicable, is not likely to present a binding constraint (Section 4.3).

⁶¹ *FRA* Section 8(5) and 8(6) note: "(5) The Fiscal Council shall, as soon as practicable after completing an assessment under this section, give a copy of the assessment to the Minister and publish the assessment within the period of 10 days beginning on the day on which the copy is so given. (6) If the Government do not accept an assessment of the Fiscal Council in relation to any of the matters referred to in subsection (3), the Minister shall, within 2 months of being given a copy of the assessment under subsection (5), prepare and lay before Dáil Éireann a statement of the Government's reasons for not accepting it".

4.4.1 MTO AND STRUCTURAL BALANCE ADJUSTMENT REQUIREMENTS

The Department currently projects a structural balance of -1.1 per cent of GDP for 2017. This represents an improvement of 0.8 percentage points on the previous year, and therefore exceeds the 0.6 percentage point adjustment required.⁶² If the structural balance path envisaged in *Budget 2017* plans were to be followed, then the projected 0.6 percentage point adjustment in 2018 would be sufficient to meet the MTO of -0.5 per cent of GDP. Once the MTO has been achieved, no further adjustments are required as long as the MTO is maintained. The *Vade Mecum* (EC, 2016c) also notes that, under the EU framework, countries exceeding their MTO "do not need to be assessed for compliance with the Expenditure Benchmark".⁶³

Unlike the *SPU 2016* projections, which are based on a no-policy change assumption for later years, the structural balance path outlined in *Budget 2017* is based on the assumption that the fiscal space available in 2017-2021 is used in accordance with the Government's stated intentions. This scenario accounts for stated commitments to use the available additional net fiscal space for new expenditure and revenue measures, as well as leaving some amounts unallocated. The *SES 2016* indicates that these unallocated amounts are to be directed to a Rainy Day Fund once the MTO is achieved. However, as *Budget 2017* proposes that these amounts be retained within an Exchequer contingency reserve, they would not reduce the net fiscal space available (i.e., because any allocations would remain as savings within General Government, they would not be treated as General Government expenditure). All else being equal, a decision to use these unallocated funds for expenditure rather than for maintaining savings in the Rainy Day Fund would reduce the projected overachievement of the MTO.

Figure 4.1 compares the projected structural balance path in *Budget 2017* to the expected annual requirements out to 2021.⁶⁴ Though 2016 and 2017 fiscal requirements are now set, some uncertainty remains for subsequent years. Requirements will depend on the degree of compliance for preceding years and on supply-side estimates underpinning the EC "matrix" (Appendix G).

⁶² The 0.6 percentage point structural balance adjustment requirement is set according to the EC "matrix" (Appendix F) on the basis that the Commission's output gap estimate for 2017 of 0.6 per cent falls within the "normal times" category (between +/- 1.5 per cent), and the debt-to-GDP ratio is set to remain above 60 per cent. The requirement is frozen in spring of the preceding year.

⁶³ The updated *Vade Mecum* (2016) notes that in the case of Member States exceeding their MTO, these "can deviate from the requirements of the Expenditure Benchmark without it being considered significant, as long as the MTO is maintained". The *Vade Mecum* also clarifies that revenue windfalls will be considered when judging whether these are partly responsible for the overachievement of the MTO in any *ex post* assessment.

⁶⁴ The path of minimum compliance is calculated on an annual basis by reference to the structural balance path published in *Budget 2017*. It assumes that the structural deficit of 2 per cent forecast in *Budget 2017* is met, 0.6 per cent adjustments are then required in 2017 and 2018, with a final 0.3 per cent adjustment applying in 2019.

4.4.2 EXPENDITURE BENCHMARK

For 2017, the maximum growth rate in spending permitted under the Expenditure Benchmark for 2017 has been set at 1.3 per cent in real terms. However, *Budget 2017* sets out plans that indicate real spending growth of 1.6 per cent – exceeding the maximum permitted limit. The excess over the limit amounts to ≤ 0.2 billion (or 0.1 per cent of GDP), which is not considered a significant deviation in the EU framework.⁶⁵

Recognising the projected breach in 2017, *Budget 2017* notes that expenditure in 2017 "includes €200 million in respect of EU budget contributions which may not be met within the benchmark ceiling". While the excess matches the increase in the EU budget contribution, the fact that planned expenditure was already set at the maximum limit permitted by the Expenditure Benchmark is a concern. The Expenditure Benchmark does not distinguish between EU budget contributions and other items of expenditure. Furthermore, this approach overlooks the value of maintaining reasonable buffers that are founded on the basis of realistic expenditure forecasts. The Council is of the view that – at minimum – official plans should aim to comply with the fiscal rules on an *ex ante* basis. Setting out forecasts that, *ex ante*, imply non-compliance increases the risk of a significant deviation subsequently materialising if expenditure overruns emerge or if rule parameters change unexpectedly (e.g., following revisions to input data for the Expenditure Benchmark).

BOX F: WHAT IS FISCAL SPACE?

This Box outlines the concept of 'fiscal space'. While the term is used to refer to several different concepts in the economic debate, in Ireland it has come to refer to the scope available for policy changes under the fiscal rules.⁶⁶ Given the complexity of the fiscal rules, the concept of fiscal space can serve as a potentially useful summary measure for policymakers and the public. When taken into consideration with estimates of stand-still costs (Box D) and policy changes envisioned, the measure can help to contribute to a more informed basis for budgetary planning. However, there remains much confusion around the concept of fiscal space and a clear definition is needed.

THE DEFINITION OF FISCAL SPACE USED IN IRELAND

In essence, the definition of fiscal space that has emerged in the Irish policy context is that of an *estimate* of the scope for future spending increases or tax cuts possible while

⁶⁵ Note that when the *Budget 2017* plans are updated to reflect the frozen GDP deflator estimate to be used by the European Commission in its assessment, the deviation falls to ≤ 0.1 billion or (0.05 per cent of GDP).

⁶⁶ For instance, Heller (2005) defines fiscal space as "...room in a government's budget that allows it to provide resources for a desired purpose without jeopardizing the sustainability of its financial position or the stability of the economy." Ostry et al. (2010) also refer to sustainability considerations when defining fiscal space as "...the difference between a country's current level of debt and the maximum level of debt, the latter implied by the country's historical record of fiscal adjustment". Such definitions rely on strong assumptions concerning estimates of sustainable thresholds outside of a rule-based framework.

complying with the domestic and EU fiscal rules. It can be further described in gross or net terms:

- 'Gross fiscal space' refers to the scope available before any relevant precommitted tax/spending changes are included;
- 'Net fiscal space' refers to the remaining scope available after these precommitments are included (e.g., after including expenditure increases to address demographic changes, agreed pay rises, etc.).

It is important to note that the definition that has evolved domestically is just one interpretation of the concept. Indeed, the usage of the term 'fiscal space' has been applied for quite different purposes elsewhere, with many uses of it focusing on broader concepts of the sustainability of the financial position or stability of the economy rather than specific limits imposed by fiscal rules.

Focusing on the Irish use of the concept, fiscal space first came to prominence in Ireland following the publication of estimates in *Budget 2016*. The Budget document (Table A8) identified what was referred to as "gross available fiscal space" for discretionary expenditure and taxation measures each year between 2016 and 2021 on the basis of the Department's interpretation of the maximum permitted spending under one of the fiscal rules – the Expenditure Benchmark (EB). In Table A9 of the Budget book, pre-committed spending increases (mainly relating to demographics and the Lansdowne Road Agreement) were deducted from the estimate of gross fiscal space to arrive at a net fiscal space figure.

UNCERTAINTIES AROUND ESTIMATES

There is regularly a significant amount of debate about fiscal space, which is not helped by the uncertainties involved in calculating the space expected to be available over a number of years. These uncertainties may arise in relation to:

- How the fiscal rules interact: this is particularly important with respect to the two key pillars, the Expenditure Benchmark and structural balance requirements.⁶⁷ For any given year, the most binding rule will be the one that sets the upper limit on the available fiscal space for that year.
- The actual budgetary stance adopted in later years: budgetary decisions made in one year will impact on subsequent years. Any over/under-compliance with the requirements of the fiscal rules in a given year could entail additional/reduced fiscal space for subsequent years.
- Revisions to relevant data: This applies to both historical and forward-looking estimates of observable inputs that are used as the basis for assessing the fiscal rules. These may include macroeconomic variables such as real GDP growth and economy-wide inflation,⁶⁸ as well as fiscal variables like General Government expenditure, revenue and debt interest costs. Also relevant are estimates of unobservable variables like potential output growth and the output gap, which need to be determined so as to set fiscal policy that appropriately considers the cyclical position of the economy.

⁶⁷ See Box G of IFAC (2016a) for an introduction to the key elements of the Preventive Arm of the *Stability and Growth Pact (SGP)* and the domestic Budgetary Rule. This covers the key rules that apply for the purposes of estimating fiscal space, including the Expenditure Benchmark and the structural balance requirements.

⁶⁸ As measured by the GDP deflator.

THE IMPORTANCE OF ASSESSING ALL PILLARS OF THE FISCAL RULES

The Department has to date focused on the Expenditure Benchmark (EB) as the basis for identifying available fiscal space in future years. The use of the EB is preferred by the Department over the structural balance rule due to the EB's advantage of being less subject to revision. This reflects the fact that the EB relies on smoothed, ten-year averages of potential output growth estimates, rather than the annual estimates used for the structural balance calculations. The preference for smoothed estimates reflects the tendency for the Commonly Agreed Methodology, which is used for monitoring and enforcing the EU fiscal rules, to produce highly variable, and often pro-cyclical potential output growth estimates for small, open economies like Ireland.⁶⁹

Although the Expenditure Benchmark has the advantage of being relatively more insulated from large revisions and is more intuitive to communicate than changes in the structural balance, fiscal space calculations should still be cognisant of all of the fiscal rules.⁷⁰ The interaction of the twin pillars of the fiscal rules is an important feature that can help to prevent unexpected anomalies leading to inappropriate guidance for the fiscal stance in a given period. A recent example of this is the AIB share transaction in 2015 which was treated as a one-off in the calculation of compliance with the structural balance rule but not in the case of the Expenditure Benchmark.

4.5 THE MEDIUM-TERM EXPENDITURE FRAMEWORK (MTEF)

A major domestic budgetary reform following the crisis has been the introduction of the MTEF. The MTEF requires the government to provide three-year-ahead expenditure ceilings for each Department, with upper limits on expenditure set in accordance with the Expenditure Benchmark.⁷¹ In theory, individual Ministerial ceilings are designed to control Departmental expenditure within these upper limits.⁷² The intention is to assist the planning and delivery of service reforms, while avoiding the expenditure management problems observed prior to the crisis.

⁶⁹ Criticisms of the approach are well-documented, including those of the Department itself (Department of Finance, 2003) and in a number of the Council's previous reports (IFAC, 2015a, Chapter 2; IFAC 2014a, Chapter 2 and Analytical Note 2; IFAC, 2013a; and IFAC, 2011 Box 3.1). Bergin and FitzGerald (2014) also provide a very useful discussion in the context of the structural balance.

⁷⁰ The *Vade Mecum* (EC, 2016e) notes that countries that have "...exceeded their MTO do not need to be assessed for compliance with the Expenditure Benchmark".

⁷¹ The MTEF is set out in the *Ministers and Secretaries (Amendment) Act 2013* and Departmental Circular 15/13.

⁷² See Medium-Term Budgetary Framework (Department of Finance, 2014b). The *Ministers and Secretaries* (*Amendment*) *Act 2013*, which legislated for the ceilings, provides for both an aggregate ceiling on gross Departmental expenditure, including the Social Insurance Fund - the Government Expenditure Ceiling - and for individual Ministerial ceilings. Furthermore, it requires that the aggregate of the Ministerial ceilings be no more than the overall Government Expenditure Ceiling. The legislation provides that where the Government has decided on a Government Expenditure Ceiling, they may make a further decision to revise the Government Expenditure Ceiling to a lesser or greater amount. Subject to such a revision the Government may revise the Ministerial Expenditure Ceilings.

4.5.1 PATTERN OF EXPENDITURE CEILING REVISIONS

Similar to the pre-crisis period, a pattern of revisions to expenditure ceilings has been evident since 2011 (Figure 4.3). The recent trend of underestimating spending pressures and addressing execution problems by relaxing overall government expenditure ceilings within the year, particularly in the Health area, has continued into 2016. Additional 2016 expenditure increases of €500 million for Health and €40 million for the Department of Justice were announced mid-year in the 2016 Revised Estimates Volume and were followed by another €310 million in October as part of the Budget 2017 estimates.



FIGURE 4.3: GROSS CURRENT EXPENDITURE FORECASTS

Source: Department of Finance; internal IFAC calculations. Note: Bars show forecasts from various Budgets followed by outturns (e.g., B'15 = expenditure forecasts in Budget 2015). Each set of coloured bars relates to forecast/outturn expenditure for year specified above. Grey shaded region covers crisis period 2009-2013.

There are reasonable concerns that this phenomenon could undermine future public spending management. Such adjustments, if continued, could risk a return to the pattern of pro-cyclical adjustments that marked the pre-crisis period. The adjustments also risk damaging expenditure control incentives and practices, which can perpetuate the cycle of upward revisions to ceilings.⁷³ While multi-annual ceilings should not be entirely inflexible to developing needs, a pattern of repeated upward revisions to overall expenditure ceilings reduces the incentive for individual Ministries to identify and implement savings. Such a pattern can, *ex ante*, suggest the availability of

⁷³ In introducing the MTEF, the *Comprehensive Expenditure Review 2012-2014* and subsequent Expenditure Reports, outlined the intention to move away from an approach where expenditure was determined by "...demands and bids from the spending Ministries...with little regard to medium-term plans or constraints upon overall allocations" to a multi-annual approach that "...provides clarity about the resources Departments will have available over a number of years and reinforces fiscal discipline" (Expenditure Report 2014).

extra resources above pre-determined ceilings and can reduce incentives to strategically allocate resources, thereby becoming subject to the problems of the 'soft budget constraint'.⁷⁴

Reflecting on the Council's concerns, the *Mid-Year Expenditure Report (MYER)* notes that recent expenditure revisions – unlike pre-crisis revisions – reflect flexibility required to meet deficit reduction targets while also allowing the Government to address social priorities and to support economic recovery. The *MYER* notes that the primary anchor up to 2015 was the target for the headline General Government deficit and that this allowed for flexibility in terms of adjusting expenditure when tax growth and interest costs were better than expected. With Preventive Arm requirements operating in full from 2016 onwards, however, the scope for long-lasting expenditure increases to follow positive short-term macroeconomic dynamics will be more limited. In particular, if spending is already at maximum levels permitted by the Expenditure Benchmark (i.e., consistent with a policy that uses available fiscal space in full) then revisions to overall Government Expenditure ceilings will only be possible in specific circumstances.⁷⁵

4.5.2 THE DESIGN OF EFFECTIVE EXPENDITURE CEILINGS

One possible way to address the operational features of the Preventive Arm would be to construct expenditure forecasts comprising: (1) realistic, credible ceilings at Ministerial level that fully incorporate expected spending plans; and (2) the setting of an appropriate buffer between the sum of Ministerial ceilings and the upper limit of total expenditure as permitted under the Expenditure Benchmark. This buffer could allow for revenue uncertainties and legitimate expenditure overruns, while being calibrated to allow for uncertainties in relation to the maximum aggregate expenditure level allowable under the Expenditure Benchmark given annual updates to this.

While official budgetary projections have moved towards a more realistic scenario that includes the use of estimated net fiscal space available for future years (i.e., the *ex post* projections), this policy is not applied effectively to the design of Ministerial Expenditure Ceilings. In particular, the Ministerial Expenditure Ceilings in the *Expenditure Report 2017* have two major drawbacks:

• For 2017, aggregate Ministerial Expenditure Ceilings are set exactly in line with the permitted expenditure level under the Expenditure Benchmark. This policy carries obvious risks. When set

⁷⁴ The soft budget constraint, as originally formulated (Kornai, 1992), posits that a budget constraint is soft where the decision maker in control of day-to-day expenditure anticipates that the constraint is likely to be relaxed *ex post* if the original constraint is not met, notwithstanding any *ex ante* threats to impose a hard constraint. Where the budget setting process is weak, this may further 'soften' the constraint as the manager – knowing plans are poorly set – has less of an incentive to adhere to them.

⁷⁵ The domestic MTEF framework permits revisions to ceilings: (i) under exceptional circumstances, as defined in the *FRA*, (ii) through the introduction of compensatory discretionary revenue measures, or (iii) where adjustments are related to spending on cyclically related unemployment spending or EU co-funded payments.

too close to permitted limits, unexpected spending pressures or downward revisions to the maximum permitted levels of spending could necessitate spending reductions or tax increases to ensure compliance with the fiscal rules (Figure 4.4).

For 2018 and 2019, currently planned expenditure already exceeds the ceilings, and therefore . upward revisions to the ceilings will likely be required. The 2018 and 2019 ceilings do not incorporate the anticipated use of estimated net fiscal space. Specifically, they exclude known carryover costs of measures introduced in Budget 2017 and they do not allocate resources to individual Ministries even though new measures are anticipated.⁷⁶ This approach effectively guarantees upward revisions to ceilings by setting unrealistically low planned expenditure levels and, correspondingly, unrealistically large buffers. The rationale for producing ceilings in such a way is to facilitate the strategic achievement of efficiency gains.⁷⁷ However, in cases where the upward revisions are already anticipated, the credibility and usefulness of the ceilings as a tool for expenditure planning and management is undermined, and the dangers related to soft budget constraints apply. These costs may well outweigh the benefits of an approach that sets very tight initial ceilings (essentially setting out large buffers and targeting incentives for efficiency gains). It should also be noted that allocating the estimated fiscal space to be used as buffers to individual Ministries in advance would not rule out the achievement of efficiency gains nor would it prevent reallocations between Departments in future years. It would, however, provide more realistic ceilings consistent with the overall forecasts for expenditure in Budget 2017.⁷⁸

Progress on improving systems of expenditure planning will be vital to ensuring that domestic expenditure ceilings and EU Preventive Arm requirements are complied with in coming years. To

⁷⁶ Tables 5 and 6 of the *Expenditure Report 2017* set out gross current and capital Ministerial Expenditure Ceilings, and include a category labelled "resources to be allocated" amounting to €1.1 billion in 2018 and €1.5 billion in 2019. The amounts are based on the indicative allocation of available net fiscal space from 2017 onwards. *Budget 2017* notes that, "beyond 2017, specific allocation by Vote will take place as decided on an annual basis to reflect policy decisions yet to be taken". According to *Expenditure Report 2017*, the Ministerial Expenditure Ceilings only take account of demographic pressures in Health, Education and Social Protection as well as additional expenditure in Agriculture from the roll-out of the rural development programme. The 2017 costs for the Lansdowne Road Agreement have been allocated to Departments as part of their 2017 ceilings. The Expenditure report, however, notes that unallocated resources for 2018 onwards are to be available to meet "the cost of new measures in 2018 and 2019 and the carryover cost of *Budget 2017* measures". They will therefore be allocated among Departments and added to their ceilings for those years.

⁷⁷ Ministerial expenditure is kept to a large extent fixed in nominal terms while pay rates are only adjusted to reflect new public service pay and pensions agreements decided by Government. The MYER notes that "the non-application of price increases...is a mechanism utilised in other jurisdictions to generate efficiency dividends and promote productivity where State bodies are effectively challenged to maintain the existing level of service with less resources".

⁷⁸ It could be expected that Departments would include some unallocated resources or buffer when setting their individual expenditure ceilings in order to accommodate unexpected expenditure increases which could arise over the medium term. The resources to be allocated category included in the *Expenditure Report 2017* differs from this idea of a buffer. It is a single aggregate category that corresponds to the total estimated fiscal space for expenditure increases in 2017 and 2018. The resources are not assigned to individual Departments.

this end, both the *MYER* and *Budget 2017* note that "work is currently underway to develop a common framework for modelling government spending that extends beyond an analysis of demographic drivers". The suggestion of going beyond the current analysis of demographic drivers and of using scenario analyses as a basis for developing appropriate buffers against uncertainty in later years is welcome. As the Council has argued in previous *Fiscal Assessment Reports*, realistic expenditure forecasts that take into account both volume and price effects are important to underpin effective expenditure planning and control. To this end, the Council has outlined an alternative broad approach to setting medium-term Ministerial expenditure ceilings that builds on the recent reforms to the budgetary process, while allowing for reasonable buffers (IFAC, 2016b).



FIGURE 4.4: GROSS VOTED EXPENDITURE VS EXPENDITURE CEILINGS

It is important to note that the identification of sustainable spending limits which guide the design of the MTEF is founded on the basis of CAM-based potential output growth rates. These estimates are prone to procyclicality themselves, producing measures of potential output growth rates that follow actual GDP growth rates quite closely (Appendix D shows how this tendency was mitigated following the 2015 sharp GDP growth outturn). This feature can constrain the scope for expenditure limits to be set in a manner that reflects cyclical developments as intended.

Sources: Department of Finance; and Department of Public Expenditure Reform. *Note:* The aggregate ministerial ceilings are compared to the *ex post* expenditure projections in *Budget 2017* which allocate available net fiscal space to expenditure for 2018 onwards.

BOX G: IMPLICATIONS OF 2015 GDP OUTTURN FOR FISCAL RULES

The exceptional 26.3 per cent real GDP growth rate for 2015 had numerous implications.⁷⁹ It made assessments of sustainability with respect to Ireland's debt and deficit levels less informative when using GDP as a measure of the potential tax base, and it created greater uncertainty as to the cyclical position of the economy. Both aspects had further knock-on effects for the operation of the fiscal rules. This Box explores the risks of potential distortions to the fiscal rules from the 2015 GDP outturn and how these were mitigated.

IMPORTANCE OF ACTUAL AND POTENTIAL GDP FOR THE FISCAL RULES

As a standard measure of the health of the economy, GDP forms a key input to the European and also domestic fiscal rules. Figure G1 summarises the fiscal rules, separating these into their domestic and European components. With Ireland having exited the Corrective Arm in 2015 on the basis of having a deficit level sustainably below 3 per cent of GDP and a debt ratio reducing at a sufficient pace, the main requirements of the European fiscal rules have shifted to those of the Preventive Arm, though Corrective Arm requirements are still relevant as defining entry into the an Excessive Deficit Procedure.



FIGURE G1: THE EUROPEAN AND DOMESTIC FISCAL RULES

Corrective Arm

Both the defined 60 per cent debt and 3 per cent deficit limits for the Corrective Arm are expressed as a share of GDP. As a result of the sharply higher 2015 GDP level, both the deficit and debt ratios are lower relative to a situation where GDP levels excluded any distortions. The margin between 2015 deficit levels and the 3 per cent limit has therefore widened, while the excess on the debt ratio to the 60 per cent level has narrowed sharply. Given that the debt rule effectively requires a one-twentieth annual reduction in the gap between the current debt ratio and a 60 per cent level, this requirement has become less constraining than it otherwise would have been. It is important to note, however, that the effect of these distortions is relatively limited. Other Preventive Arm requirements are more binding than the requirements of the debt rule alone and the deficit projected under

⁷⁹ Box A in the *Pre-Budget 2017 Statement* (IFAC 2016b) examines the National Accounts for 2015 in more detail. In particular, it highlights the distortions to real GDP/GNP caused by some activities of multinational enterprises. The output and exports produced by these can add to both GDP and GNP even though the production of the output may take place outside the state with little or no domestic labour used in the production process.

minimum compliance with the Preventive Arm is in any case consistent with a level not exceeding 3 per cent.

Preventive Arm

At the core of the EU Preventive Arm is a target for a country's structural balance and progress towards this is assessed on the basis of two pillars: (i) structural balance adjustment requirements, as complemented by (ii) the Expenditure Benchmark.⁸⁰ Given that the MTO for Ireland for 2017-2019 was already fixed at the minimum level permitted under the fiscal compact, -0.5 per cent of GDP, the GDP revisions have relatively limited bearing on this target.

The key channel through which the pillars of the Preventive Arm are affected by the 2015 GDP distortions is through the measurement of potential output. The structural balance is a measure of the underlying trend in the budget balance that attempts to abstract from cyclical developments. The cyclical component of the structural balance is identified by the gap between actual and potential GDP levels (i.e., the output gap), while the overall structural balance is also expressed as a share of estimated potential output levels. In a similar vein, the Expenditure Benchmark sets a maximum growth rate for government spending on the basis of assumed sustainable levels of long-run economic growth (this growth rate is set as the ten-year average of potential output growth).

The Domestic fiscal rules were also prone to the same GDP-related distortions. As the domestic Budgetary Rule mirrors the structural balance requirements under the Preventive Arm, this would have been subject to the same GDP-related distortions. Furthermore, the Government expenditure ceiling used to set a top-down maximum for departmental expenditure ceilings is set with reference to permitted expenditure levels under the Expenditure Benchmark.

Mitigating Risks to Fiscal Policy

Potential output estimates are clearly central to the fiscal rules. Revisions to the Commonly Agreed Methodology as applied to Ireland (Appendix D) were therefore necessary to ensure that implications for the fiscal rules were not radically revised. In the absence of these, persistent distortions to potential output growth could have arisen from the exceptional GDP growth rate in 2015. In particular, the 2015 distortions could have artificially inflated potential GDP growth rates across a number of years (with implications for the Expenditure Benchmark), while also leading to a drastically different path for the output gap (relevant for the structural balance).⁸¹ The adjustments to the Commonly Agreed Methodology have limited the effect of the exceptional growth rate in 2015 from distorting application of the fiscal rules in two ways:

(1) By ensuring that sharp increases in potential output are largely kept to 2015 and are prevented from feeding through to surrounding years.

⁸⁰ Box G (IFAC 2016a) provides an introductory guide to the Preventive Arm and the domestic Budgetary Rule, outlining the main features of these rules which become operational in full over the coming years.

⁸¹ Potential growth rates for surrounding years would have been distorted in particular by smoothed estimates of TFP, whereas changes in the output gap (relevant for the structural balance adjustment requirements) would have been influenced by widening the gap between forecast actual and potential GDP estimates.

(2) By leaving the initial output gap level and projected changes in this relatively unchanged compared to estimates prior to the sharp revisions to real GDP.

The adjustments help mitigate risks to fiscal policy from changes in the fiscal rules, though some issues remain. In particular, the 25 per cent potential output growth rate estimated for 2015 should be ignored when determining the relevant ten-year average growth rate for the Expenditure Benchmark as it is clearly not relevant for the identification of sustainable long-run growth rates.⁸² Furthermore, close monitoring of the adjustments will be required to ensure that subsequent estimates are not impacted by the recent changes.

⁸² The Department of Finance acknowledge this in *Budget 2017* when they interpolate an average value of 3.7 per cent for 2015 in their application of the Expenditure Benchmark.

APPENDIX A: FISCAL COUNCIL BENCHMARK PROJECTIONS 22 SEPTEMBER

% change in volumes unless otherwise stated	2016	2017	2018
GDP	3.6	3.3	3.2
Consumption	3.0	2.6	1.9
Investment	3.7	2.6	2.0
Government	5.9	2.4	1.3
Stock changes	17.1	-14.7	0.0
Exports	5.0	4.8	5.5
Imports	5.6	4.6	5.3
Net Exports (p.p. contribution)	0.9	1.6	1.9
Domestic Demand (p.p. contribution)	2.6	1.8	1.3
Stock Changes (p.p. contribution)	0.1	-0.1	0.0
Current Account (% GDP)	11.3	10.9	10.8
Employment	2.7	2.3	2.0
Unemployment Rate (%)	8.2	7.3	6.7
НІСР	0.0	1.2	2.0
GDP Deflator	0.6	1.1	1.4
Nominal GDP (€ billions)	266.5	278.3	291.2
Nominal GDP	4.2	4.4	4.6

APPENDIX TABLE A.1: BENCHMARK PROJECTIONS FOR 2016-2018

Source: Internal IFAC calculations.

Date	
14 September	CSO release Quarterly National Accounts estimates for Q2 2016.
16 September	The Secretariat and Department of Finance met the CSO to clarify technical details of latest <i>Quarterly National Accounts</i> estimates.
21 September	The Secretariat received Department of Finance technical assumptions underpinning <i>Budget 2017</i> forecasts. ⁸³
22 September	After consideration by the Council, Benchmark projections are finalised by the Secretariat prior to receiving preliminary forecasts from the Department of Finance.
22 September	The Council received preliminary forecasts from the Department in line with <i>Memorandum of Understanding</i> requirements.
26 September	The first endorsement meeting took place with the Department of Finance presenting their forecasts to the Secretariat. A number of clarifications of a factual nature were requested.
4 October	The Council met to discuss the Department of Finance forecasts. Following this, Department of Finance staff met with the full Council and Secretariat to present their latest forecasts and to answer questions. The Council sought information regarding a number of forecast components. The Council then finalised a decision on the endorsement.
6 October	The Chair of the Council wrote a letter to the Secretary General of the Department of Finance endorsing the set of macroeconomic forecasts underlying <i>Budget 2017</i> .
11 October	The Department's forecasts are published in <i>Budget 2017</i> together with the reconciliation of 2016 forecasts to account for the larger than assumed budgetary package.

APPENDIX B: TIMELINE FOR ENDORSEMENT OF BUDGET 2017 PROJECTIONS

⁸³ These included assumptions related to oil prices, exchange rates, Net expenditure by central and local government on current goods and services and sources of forecasts for major trading partners.

APPENDIX C: SUMMARY INDICATORS OF ECONOMIC IMBALANCES

As previously highlighted IFAC (2015b), the Council, as part of its toolkit for examining the cyclical position of the economy use a modular approach. While univariate filters and other potential output measures are useful, there is a danger that they may not reflect all available economic information which may point to possible imbalances in the economy. Specifically in response to the financial crisis, Borio et al (2014) developed methods of estimating potential output using financial indicators, which capture the effect of the financial sector on the business cycle. This approach can be applied to other variables which may provide useful information on the cyclical position of the economy. With this in mind, this appendix shows some potential sources of imbalances. Within each module, a number of indicators are examined.

While this modular approach ensures that many potential sources of imbalance are examined, there are difficulties in choosing/estimating weights for each of these imbalance indicators. Historical data may be a good guide to variables that explain previous business cycles, but not necessarily current or future ones. Five modules are shown here, namely the labour market, the external sector, investment indicators, credit ratios/gaps and housing indicators.



FIGURE C.1: LABOUR MARKET

Source: CSO; *Budget 2017* projections and internal IFAC calculations. *Note:* NIE compensation per QNHS employee hour is used as compensation measure.



Source: CSO; internal IFAC calculations. *Note:* Four quarter moving average of job vacancy rate shown.



Source: European Commission estimates (Commonly Agreed Methodology); CSO





Note: 4 quarter moving average shown.





Note: Positive net migration indicates immigration exceeded emigration.

FIGURE C.2: EXTERNAL BALANCES



Source: CSO; internal IFAC calculations.

Note: Adjusted measure excludes estimated impact of redomiciled PLCs.



B. NET INTERNATIONAL INVESTMENT POSITION (% GDP)

Source: CSO; Eurostat and internal IFAC calculations. *Note:* Adjusted measure excludes IFSC activities and NFC's.

FIGURE C.3: INVESTMENT INDICATORS



Sources: CSO; AMECO; Department of Finance. Notes: Horizontal lines = historical avg (1970-2015).





Source: CSO; Department of Finance projections & internal IFAC calculations.



Sources: Central Bank of Ireland; CSO; internal IFAC calculations.

Notes: The adjusted credit-to-GDP gap ratio is constructed as Irish resident private sector enterprise credit (ex fin. intermediation) plus total loan liabilities of Irish households. It is intended to adjust for the impact of multinational non-financial corporations on the aggregate ratio given that associated credit is often sourced outside of Ireland (for a similar approach, see Box 6: Macro-Financial Review 2015:I, Central Bank of Ireland). The ratio is calculated following a similar methodology to that in ESRB recommendation (18 June 2014) on guidance for setting counter-cyclical buffer rates (ESRB/2014/1). This specifies a credit ratio as: (CREDIT_t / (GDP_t + GDP_{t-1} + GDP_{t-2} + GDP_{t-3})) × 100%.



Sources: Central Bank of Ireland; CSO; ECB; internal IFAC calculations.

Notes: The adjusted credit gap is calculated following a similar methodology to that in ESRB recommendation (18 June 2014) on guidance for setting counter-cyclical buffer rates (ESRB/2014/1). For the underlying trend credit ratio, a recursive Hodrick-Prescott filtered trend ratio is specified, with smoothing parameter lambda = 400,000 to capture the long-term trend in the behaviour of the credit-to-GDP ratio. The credit-to-GDP gap is given by: $GAP_t = RATIO_t - TREND_t$.



Source: Central Bank Money, Credit and Banking and Quarterly Financial Accounts (transaction series used) and internal IFAC calculations









D. HOUSING VALUATION RATIOS



E. USER COST OF CAPITAL FOR HOUSING (UCCH)

Note: Completions cover rural + urban settlements;

requirements only cover settlements of 1,000.



2000 2002 2004 2006 2008 2010 2012 2014 2016

Sources: ESRI/PTSB; CSO





Note: Grey line indicates the equilibrium level of completions needed for new household

APPENDIX D: CHANGES TO POTENTIAL OUTPUT FOLLOWING 26% GDP GROWTH IN 2015

The sharp 26.3 per cent GDP growth rate in 2015 has a number of implications, one of which is the assessment of cyclical developments in the Irish economy. As the standard barometer of an economy's health, real GDP forms a fundamental part of the common approach to estimating potential output among EU member states. This Box examines the impact of the 2015 real GDP growth rate on Irish potential output estimates in the context of the EU Commonly Agreed Methodology (CAM) and explains why changes to the CAM as applied to Ireland were considered necessary.

IMPACT OF AN UNCHANGED APPLICATION OF THE CAM

To understand the impact of last year's National Accounts outturn on CAM-based estimates of Irish potential output, it is helpful to first consider the *SPU 2016* estimates that were based on the unrevised National Accounts data. Figure B.1 shows the potential output estimates using the unrevised GDP data and the contributions to the growth rate as computed under the CAM. Prior to the revised real GDP outturn, estimates of potential output growth gradually fell from near 5 per cent per annum in 2016 and 2017 to 3 per cent by 2021.



The revisions to the Irish National Accounts for 2015 are now reasonably well understood (see Box A of IFAC 2016c for an explanation). Real GDP growth of 26.3 per cent is currently estimated for 2015. This followed a preliminary estimate of 7.8 per cent. Much of the revision was attributable to an approximate €300 billion increase in the capital stock following the restructuring/relocation of company assets, which led to associated increases in net exports, measures of contract manufacturing, real GDP, and levels of measured depreciation.

Reflecting the rise in actual growth, an unchanged application of the CAM to Ireland would have had a number of undesirable features. Prospective estimates of potential output growth over the medium-term would have been artificially boosted by the level shift in GDP in 2015 and forecasts of the output gap would have been drastically altered. These features could also have had a distortionary impact on the operation of fiscal policy given their importance for the fiscal rules.

Given the underlying economics of the revisions, there was no evident reason why both historical and projected estimates of the output gap and potential output growth rates should be significantly affected or that implications for fiscal policy under the rules should be radically revised as a result of data distortions impacting 2015. In advance of *Budget 2017*, the Council held discussions with the Department of Finance and discussed a technical approach in an effort to limit the impact of these distortions on estimates of potential output growth and the output gap for Ireland to the year 2015 only.⁸⁴

A number of elements were outlined in the Council's proposal. These were intended to produce potential output measures consistent with an unchanged output gap when compared with pre-revision estimates and to limit the effect on long-run potential output estimates.⁸⁵ The proposal was shared with the Department on 2 September in advance of a presentation by the Department to the European Commission's Output Gap Working Group. Substantive work was undertaken by the Department of Finance to explore numerous possible alterations and options over the course of discussions with the Commission. These discussions and related work led to a decision on how to treat the distortions for the purposes of the CAM, which was finalised on 22 September.

CHANGES TO THE CAM AS APPLIED TO IRELAND

The changes agreed on comprised three main factors: (i) the inclusion of revised capital stock data for 2015; (ii) a structural break in trend Total Factor Productivity (TFP) from 2015 onwards; and (iii) a structural break in the Phillips curve relationship underpinning estimates of the natural rate of unemployment in 2015.

(i) Revised Capital Stock Data

The introduction of the revised capital stock data for 2015 – as yet unpublished – meant a greater consistency with the revised GDP data used as an input to the CAM. It also helped to explain a substantial portion of the sharp upward revision of GDP in 2015 so that less of this was allocated as a residual boost to total factor productivity (TFP).

⁸⁴ The Department had already identified concerns with a standard application of the CAM and had proposed a number of changes, including amendments to address the inconsistency with capital stock estimates. The Council was of the view, however, that these did not go far enough to address potential long-run impacts on fiscal policy, with trend TFP estimates in particular likely to be inflated over a number of years in the absence of further methodological changes.

⁸⁵ These included a proposal to include a proportionate adjustment to trend TFP *ex post* or, alternatively, that the 2015 growth rate be treated as an outlier or, more crudely, that a dummy variable be applied in 2015.

Appendix D

(ii) Trend TFP Break

On its own, the increase in capital would have been insufficient to explain the sharp rise in GDP growth in 2015.⁸⁶ As a result, a proportion of the 2015 growth rate is attributed to an upward shift in total factor productivity, which is defined as a residual.

To prevent the sharp rise in growth in 2015 from signalling an upward shift in the pace of trend productivity growth that could be expected in surrounding years (i.e., through the filtering process), the new trend TFP is estimated under the assumption of a level shift in trend TFP taking effect from 2015 on, with growth rates thereafter relatively unchanged.⁸⁷ One economic interpretation of the level shift in TFP is that the newly restructured/relocated company assets attract a higher rate of productivity on capital.

(iii) Phillips Curve Break

The final adjustment reflected the impact on unit labour costs stemming from changes in output (real GDP) in 2015. Unit labour costs enter the estimation of the natural rate of unemployment (the NAWRU) based on the usual Phillips curve relationship that assumes a negative relationship between cyclical unemployment and the expected growth rate of real unit labour costs. The sharp GDP growth rate led to much lower real unit labour costs in 2015, albeit the rise in labour output underpinning this was predominantly the result of a sharp rise in income from capital of multinational enterprises, with little relevance for wage setting dynamics in the Irish labour market. As such, the decision was taken to estimate the NAWRU under the assumption that the change in real unit labour costs experienced a one-off disturbance in 2015 (essentially amounting to a break in the usual Phillips curve relationship).

RESULT OF CHANGES

Figure B.2 shows that contributions to potential output growth in 2015 are radically different as a result of the inclusion of revised National Accounts data. Most of this is accounted for by the sharp rise in the capital stock, while a sizeable proportion is also accounted for by trend TFP. As a result of the changes to the CAM as applied to Ireland, however, the sharp jump in contributions to potential output growth is limited in the main to the year 2015 only, with surrounding years relatively unaffected. By extension, Figure B.3 shows that the path for the output gap over the forecast horizon is also relatively unchanged following these methodological adjustments.

⁸⁶ The assumed output elasticity of capital (0.35) would imply a capital contribution to GDP growth of approximately 19 per cent given the growth rate in the capital stock of roughly 54 per cent in 2015.

⁸⁷ A zero dummy variable is added taking the value of 1 from 2015 onwards. The dummy variable is assumed to be a part of trend TFP, such that the revisions to the TFP cycle (and the output gap) are minimised.

An example of why these changes are important can be discerned from the impact on estimates of trend TFP growth. Without the methodological changes, trend TFP growth would have been artificially boosted for all surrounding years such that the step-change in 2015 could have been mis-represented as a sustained rise in trend productivity growth rates with consequent impacts for the path of potential output growth and the output gap.

Although the adjustments were considered pivotal to ensure a consistent application of the fiscal rules, there are risks that the adjustments may lead to unintended consequences in future. There is also a risk that further step changes in actual GDP produce similar distortions in the future. As such, the Council will continue to monitor the application of the CAM closely. It is important to note that the technical modifications discussed here only address the problems created by the 2015 National Accounts data. Other long-standing problems with the CAM previously discussed by the Council remain, such as the procyclicality of its estimates of potential output. As a result, it is important for the Department of Finance to develop alternative potential output estimates outside the CAM.





Sources: SPU 2016; Budget 2017 (ex ante estimates without allocation of fiscal space).

101

APPENDIX E: THE GENERAL GOVERNMENT SECTOR

Government finances are measured and reported on the basis of different accounting aggregates. Typically, developments in the Irish public finances are monitored from month-to-month at the level of the Exchequer. However, the Exchequer represents only a portion of the total government financial position and as a result it is also important to track developments in the main fiscal aggregates on a General Government basis.

The main internationally recognised governmental accounting aggregate is the General Government – a much broader measure that covers the revenue and expenditure of all arms of government and of many state-owned independent organisations. Figure E.1 provides an overview of the split between Exchequer and non-Exchequer classifications under General Government in Ireland. The rest of this Box examines the two measures in more detail.

FIGURE E.1: ILLUSTRATION OF GENERAL GOVERNMENT COMPONENTS



Note: This typology ignores cash versus accrual and other accounting treatments differences.

THE EXCHEQUER

The Exchequer comprises the Central Fund, which is the Irish central government's main treasury account. It is held at the Central Bank of Ireland and is recorded on a cash basis.

Unless otherwise provided for by law, all government receipts and expenditure are accounted for by the Central Fund. Receipts into the Central Fund consist of Exchequer tax and non-tax revenues, EU receipts and other capital receipts, while expenditure out of the Central Fund includes Departmental/office spending, wages and pensions of the President, the C&AG, and the judiciary, running costs of the Oireachtas, debt servicing costs, and EU Budget payments. Non-Exchequer funds include semi-state bodies, the social insurance fund, the National Pension Reserve Fund (NPRF), the Irish Strategic Investment Fund (ISIF) and local authorities.

NON-EXCHEQUER

Exchequer revenues account for ¾ of total General Government revenue and expenditure, with the remaining ¼ of each accounted for by non-Exchequer funds.

Figures E.2A and E.2B show the gap between Exchequer expenditure/revenue and General Government expenditure/revenue as made up by non-Exchequer components. PRSI contributions to the Social Insurance Fund and other fund receipts account for the bulk of non-Exchequer revenues (approximately €12 billion in 2015).



Sources: Budget 2017 and CSO Government Finance Statistics; and Finance Accounts, 2000-2014. *Notes:* Expenditure excludes capital transfers.

GENERAL GOVERNMENT

The General Government classification is a standardised EU accounting aggregate compiled in accordance with the European System of Accounts (ESA) 2010.

In broad terms, the General Government sector can be understood as comprising the Central Government (which the Exchequer is part of), Local Government (county, town and city councils), and extra-budgetary funds such as the Social Insurance Fund (SIF), the National Training Fund

Appendix E

(NTF), the National Pension Reserve Fund (NPRF), the Ireland Strategic Investment Fund (ISIF) and non-commercial State sponsored bodies. Commercial State bodies and the Central Bank are not included.

Rather than simply being the sum of Exchequer and non-Exchequer components, General Government figures also comprise a number of important accounting treatments. In particular, General Government estimates are compiled on a mixed cash and accruals basis as compared to the Exchequer estimates which are solely produced on a cash basis. In addition, General Government accounting does not recognise financial transactions as revenue when they are simply the exchange of one asset (e.g., equity or securities) for cash or another form of financial asset.

The move between the Exchequer balance and the General Government balance is referred to as the 'walk', and is shown in Table E.1 on the basis of *Budget 2017* estimates. Generally speaking, the main drivers of the difference between the two balance measures are the result of any surpluses in the Social Insurance Fund⁸⁸, the impact of accruals and changes in the ISIF/NPRF funds. However, in years where large equity/loan transactions take place (such as in the case of disposal of stateowned bank assets), this can account for a large proportion of the difference. A notable example is the redemption of the AIB CoCos (some ≤ 1.6 billion) in 2016. This is excluded from the General Government balance. In later years, the majority of the amounts in item (b) relate to Central Bank surplus income.

Indicative amounts to be allocated in respect of the Government's proposed Rainy Day Fund are accounted for under row (k). The cumulative €3 billion RDF provision is provided for within the Exchequer envelope. However, the annual amounts indicated would not count as General Government expenditure unless amounts are actually drawn down and used for General Government expenditure purposes in the same year.

http://www.finance.gov.ie/sites/default/files/Methodological%20Note%20-%20Reconciliation%20Table_1.pdf

⁸⁸ The net lending of the Social Insurance Fund is added (item h). Any amounts not required to meet the current expenditure of the Fund are transferred to the Fund's investment account. Any shortfall in the current account in respect of liabilities is met from the investment account in the first instance, and otherwise by moneys provided by the Oireachtas from the Central Fund. This figure can be positive in a period when receipts exceed payments from the Fund, or negative in a period when the shortfall is met from investments. As unemployment is forecast to fall over the forecast period from 2017-2021, the SIF is projected to move into surplus as shown in line(h). Current projections indicate strong growth in the SIF surplus, which improves the General Government balance over the horizon. See the Department of Finance note on the GG accounts here:
€ million	2015	2016	2017	2018	2019	2020	2021
(a) Exchequer balance	-60	-1,445	-2,150	-2,260	-1,785	-1,020	610
(b) Exclude equity and loan transactions	-4,600	-2,635	-1,025	-980	-1,260	-1,025	-1,055
(c to e) Adjust for accruals	945	1,210	815	785	785	835	420
(f) Net lending/borrowing of non- commercial State bodies	-400	-75	135	140	0	190	215
(g) Impact of ISIF/NPRF	-1,460	205	335	350	355	365	365
(h) Net Surplus of the SIF	30	370	665	1,050	1,425	1,780	2,150
(i) Net Surplus of other EBF's	60	-25	-15	25	20	15	15
(j) Net (Borrowing)/Surplus of Local Government	695	0	0	0	0	0	0
(k) Rainy Day Fund	0	0	0	0	1,000	1,000	1,000
(l) General Government balance (=a to l)	-4,785	-2,400	-1,235	-890	540	2,135	3,720

TABLE E.1: THE WALK FROM EXCHEQUER TO GENERAL GOVERNMENT (€ MILLION)

Source: Budget 2017.

Table E.2 reproduces *Budget 2017* figures for revenue and expenditure over 2015-2017 using the standard General Government classifications.

In terms of revenue, taxes on production and imports (€22.5 billion in 2015) and current taxes on income and wealth (€27.9 billion) make up the majority of General Government revenue. Both of these are expected to grow in line with nominal GDP over the forecast horizon. The other large revenue component, social contributions (€11.4 billion), relates primarily to PRSI contributions to the SIF.

On the expenditure side, social payments (€28.3 billion in 2015) are the largest category of expenditure. This includes expenditure by the SIF and the Department of Social Protection. Compensation of employees (€18.9 billion) is the next largest component, and includes a provision for the Lansdowne Road Agreement in 2017 and 2018. Intermediate consumption (€9.3 billion), which covers expenditure by the State on goods and services, excluding fixed assets, is the next largest category. Interest expenditure on national debt (€6.7 billion) is the fourth largest category, but is expected to decline steadily over the forecast horizon. Public investment spending, categorised as Gross Fixed Capital formation (GFCF), amounted to €4.3 billion in 2015.

The General Government balance in Table E.2 is given by the difference between General Government revenue and expenditure, and is identical to the balance obtained from the 'walk' above.

	2015	2016	2017
Revenue			
Taxes on production and imports	22.5	23.4	24.7
Current taxes on income, wealth	27.9	29.3	30.5
Capital taxes	0.4	0.4	0.4
Social contributions	11.4	11.9	12.4
Property Income	2.7	1.9	1.8
Other	5.8	5.1	5.5
Total revenue	70.5	72,15	75,32
Expenditure			
Compensation of employees	18.9	19.7	20.6
Intermediate consumption	9.3	9.9	9.7
Social payments	28.3	28.1	28.8
Interest expenditure	6.7	6.2	6.1
Subsidies	1.8	1.7	1.7
Gross fixed capital formation	4.3	4.6	5.1
Capital transfers	3.5	1.4	1.5
Other	2.6	3	3.2
Resources not allocated	-	-	-
Total expenditure	75.3	74.6	76.6
General government balance	-4.8	-2.4	-1.2

TABLE E.2: GENERAL GOVERNMENT RECEIPTS AND EXPENDITURES (€ BILLIONS)

Source: Budget 2017.

APPENDIX F: EXCHEQUER TAX REVENUE FORECASTS

This Appendix examines disaggregated forecasts for tax revenues produced by the Department of Finance for *Budget 2017*.

Figure F.1 (A-D) below show the main factors influencing the *Budget 2017* tax forecasts for the four main tax heads over the period 2016-2021. In each case, the forecasts for 2016 and 2017 are shown separately while the forecasts for 2017-2021 are shown cumulatively. The floating bars show the size of the increase in taxes due to that source.

Of particular note for this round are the forecasts for PAYE and USC (PAYE) (Panel D). Over the period 2018-2021, *Budget 2017* allocates ≤ 2.2 billion of the available fiscal space to reductions in income taxes (including the USC). This allocation is based on the technical assumption made in *Budget 2017* that reflects the government's stated preference for allocating estimated fiscal space available over the period.⁸⁹

Also of note is Corporation Tax (Panel B) in 2017. *Budget 2017* notes that "Corporation tax is estimated to grow by under 3 per cent next year. The forecast does allow for a number of specific one-off adjustments which may impact the tax base in 2017." Based on information supplied to the Department of Finance from the Revenue Commissioners, these one-off adjustments are expected to have a net negative effect on CT receipts in 2017 of some €0.4 billion.

On Excise (Panel C), a downward judgement factor of some €0.3 billion in 2016 can be seen. This reflects the expected unwinding of the front-loading of tobacco receipts, a process which peaked in June. As of end-October, excise receipts were some €0.2 billion ahead of the cumulative profile, and are expected to be on profile at year-end.

⁸⁹ This reflects the stated preference for a 2:1 ratio between public spending increases and taxation reductions while a contingency reserve of the order of €1 billion per annum is also provided for from 2019.









108



APPENDIX G: CHAPTER 4 FIGURES

		Required minimum annual structural balance adjustment		
	Condition	Debt below 60% of GDP and no sustainability risk	Debt above 60% or sustainability risk	
Exceptionally bad times	Real growth < 0 or output gap < -4	No adjustment needed		
Very bad times	-4 <u><</u> output gap < -3	0	0.25	
Bad times	-3 <u><</u> output gap < -1.5	0 if growth below potential, 0.25 if growth above potential	0.25 if growth below potential, 0.5 if growth above potential	
Normal times	-1.5 <u><</u> output gap < 1.5	0.5	> 0.5	
Good times	output gap ≥ 1.5	> 0.5 if growth below potential, ≥ 0.75 if growth above potential	≥ 0.75 if growth below potential, ≥ 1 if growth above potential	

FIGURE F.1: MATRIX FOR SPECIFYING THE ANNUAL FISCAL ADJUSTMENT TOWARDS THE MTO UNDER THE SGP

Source: Vade Mecum Update (EC, 2016).

Note: Requirements of > 0.5 percentage points are operationalised within EC assessments as at least 0.6 percentage points.

FIGURE F.2: THE OVERALL ASSESSMENT UNDER THE PREVENTIVE ARM

Structural Balance Expenditure Benchmark	Adjustment delivered	Deviation	Breach of "significance" threshold
Benchmark Respected	Compliance	Need an overall assessment (cannot lead to a significant deviation procedure)	Need an overall assessment (<i>can</i> lead to a significant deviation procedure)
Deviation	Need an overall assessment (<i>cannot</i> lead to a significant deviation procedure)	Need an overall assessment (cannot lead to a significant deviation procedure)	Need an overall assessment (<i>can</i> lead to a significant deviation procedure)
Breach of "significance" threshold	Need an overall assessment (<i>can</i> lead to a significant deviation procedure)	Need an overall assessment (<i>can</i> lead to a significant deviation procedure)	Need an overall assessment, but strong presumption of significant deviation (<i>can</i> lead to a significant deviation procedure)

Source: Vade Mecum Update (EC, 2016).

Note: The threshold for "significance" is judged to be 0.5 per cent of GDP or more for the year under consideration, or an average deviation of 0.25 per cent of GDP over two years.

GLOSSARY⁹⁰

Automatic stabilisers: Features of the tax and spending regime which react automatically to the economic cycle and reduce its fluctuations. As a result, the budget balance in per cent of GDP tends to improve in years of high growth, and deteriorate during economic slowdowns.

Budget balance: The balance between total public expenditure and revenue in a specific year, with a positive balance indicating a surplus and a negative balance indicating a deficit. For the monitoring of Member State budgetary positions, the EU uses General Government aggregates.

Cyclical component of budget balance: That part of the change in the budget balance that follows automatically from the cyclical conditions of the economy, due to the reaction of public revenue and expenditure to changes in the output gap.

Discretionary fiscal policy: Change in the budget balance and in its components under the control of government. It is usually measured as the residual of the change in the balance after the exclusion of the budgetary impact of automatic stabilisers.

Excessive Deficit Procedure (EDP): A procedure according to which the Commission and the Council monitor the development of national budget balances and public debt in order to assess and/or correct the risk of an excessive deficit in each Member State.

Expenditure rules: A subset of fiscal rules that target (a subset of) public expenditure.

Fiscal consolidation: An improvement in the budget balance through measures of discretionary fiscal policy, either specified by the amount of the improvement or the period over which the improvement continues.

General Government: As used by the EU in its process of budgetary surveillance under the *Stability and Growth Pact* and the excessive deficit procedure, the General Government sector covers national government, regional and local government, as well as social security funds. Public enterprises are excluded, as are transfers to and from the EU Budget.

⁹⁰ These definitions are taken directly from the European Commission. See European Economy, Occasional Papers 151, May 2013, *Vade Mecum* on the *Stability and Growth Pact*.

Maastricht reference values for public debt and deficits: Respectively, a 60 per cent General Government debt-to-GDP ratio and a 3 per cent General Government deficit-to-GDP ratio. These thresholds are defined in a protocol to the Maastricht Treaty on European Union.

Medium-Term Budgetary Framework: An institutional fiscal device that lets policymakers extend the horizon for fiscal policymaking beyond the annual budgetary calendar (typically 3-5 years). Targets can be adjusted under Medium-Term Budgetary Frameworks (MTBF) either on an annual basis (flexible frameworks) or only at the end of the MTBF horizon (fixed frameworks).

Medium-Term Budgetary Objective (MTO): According to the reformed *Stability and Growth Pact*, stability programmes and convergence programmes present a Medium-Term Objective for the budgetary position. It is country-specific to take into account the diversity of economic and budgetary positions and developments as well as of fiscal risks to the sustainability of public finances, and is defined in structural terms.

Minimum benchmarks: The lowest value of the structural budget balance that provides a safety margin against the risk of breaching the Maastricht reference value for the deficit during normal cyclical fluctuations. The minimum benchmarks are estimated by the European Commission. They do not cater for other risks such as unexpected budgetary developments and interest rate shocks. They are a lower bound for the Medium-Term Budgetary Objectives (MTO).

One-off and temporary measures: Government transactions having a transitory budgetary effect that does not lead to a sustained change in the budgetary position.

Output gap: The difference between actual output and estimated potential output at any particular point in time.

Potential GDP: The level of real GDP in a given year that is consistent with a stable rate of inflation. If actual output rises above its potential level, then constraints on capacity begin to bind and inflationary pressures build; if output falls below potential, then resources are lying idle and inflationary pressures abate.

Primary budget balance: The budget balance net of interest payments on General Government debt.

Primary structural budget balance: The structural budget balance net of interest payments.

112

Pro-cyclical fiscal policy: A fiscal stance which amplifies the economic cycle by increasing the structural primary deficit during an economic upturn, or by decreasing it in a downturn. A neutral fiscal policy keeps the cyclically-adjusted budget balance unchanged over the economic cycle but lets the automatic stabilisers work.

Public debt: Consolidated gross debt for the General Government sector. It includes the total nominal value of all debt owed by public institutions in the Member State, except that part of the debt which is owed to other public institutions in the same Member State.

Sovereign bond spread: The difference between risk premiums imposed by financial markets on sovereign bonds for different states. Higher risk premiums can largely stem from (i) the debt - service ratio, also reflecting the countries' ability to raise their taxes for a given level of GDP, (ii) the fiscal track record, (iii) expected future deficits, and (iv) the degree of risk aversion.

Stability and Growth Pact (SGP): Approved in 1997 and reformed in 2005 and 2011, the SGP clarifies the provisions of the Maastricht Treaty regarding the surveillance of Member State budgetary policies and the monitoring of budget deficits during the third phase of EMU. The SGP consists of two Council Regulations setting out legally binding provisions to be followed by the European Institutions and the Member States and two Resolutions of the European Council in Amsterdam (June 1997).

Stability programmes: Medium-term budgetary strategies presented by those Member States that have already adopted the Euro. They are updated annually, according to the provisions of the *Stability and Growth Pact*.

Stock-flow adjustment: The stock-flow adjustment (also known as the debt-deficit adjustment) ensures consistency between the net borrowing (flow) and the variation in the stock of gross debt. It includes the accumulation of financial assets, changes in the value of debt denominated in foreign currency, and remaining statistical adjustments.

Structural budget balance: The actual budget balance net of the cyclical component and one-off and other temporary measures. The structural balance gives a measure of the underlying trend in the budget balance.

113

BIBLIOGRAPHY

Barnes, S. and Smyth, D. (2013). *The Government's Balance Sheet after the Crisis: A Comprehensive Perspective.* IFAC Working Paper No. 2. Available at: <u>http://www.fiscalcouncil.ie/the-governments-balance-sheet-after-the-crisis-a-comprehensive-perspective/</u>

Bergin, A., and FitzGerald, J. (2014). *The Structural Balance for Ireland*. Special Article, Quarterly Economic Commentary, Spring 2014. Dublin: The Economic and Social Research Institute. Available at: <u>http://www.esri.ie/pubs/QEC2014SPR.pdf</u>

Bergin, A., García-Rodríguez, A., McInerney, N., Morgenroth, E. and Smith, D. (2016). *Modelling the Medium to Long Term Potential Impact of Brexit on Ireland*. ESRI Working Papers, No 548. November 2016. Available at: <u>http://www.esri.ie/pubs/WP548.pdf</u>

Blanchard, O. J., and Giavazzi, F. (2004). *Improving the SGP through a proper accounting of Public Investment*. CEPR Policy Discussion Paper No. 4220. Available at: http://economics.mit.edu/files/735

Borio, C., P. Disyatat and M. Juselius, (2014). *A parsimonious approach to incorporating economic information in measures of potential output*. BIS Working Papers, No 442, Bank for International Settlements, February 2014. Available at:

http://ec.europa.eu/economy_finance/events/2015/20150928_workshop/pdf/paper_mikael_juseli us.pdf

Byrne, D., Duffy, D. and FitzGerald J. (2014). *Household Formation and Tenure Choice Special*. Article in Quarterly Economic Commentary, Spring 2014. Dublin: Economic and Social Research Institute. Available at: <u>https://www.esri.ie/pubs/RN20140202.pdf</u>

Casey, E. and Hannon, A. (2016). *Challenges Forecasting Irish Corporation Tax*. IFAC Analytical Note No. 10. Available at: <u>http://www.fiscalcouncil.ie/wp-content/uploads/2015/03/AN-10-Challenges-Forecasting-Irish-Corporation-Tax-Final-Web.pdf</u>

Central Bank of Ireland (2016c). *Quarterly Bulletin 4, October 2016*. Dublin: Central Bank of Ireland. Available at: <u>https://centralbank.ie/publications/Pages/QB42016.aspx</u>

Climate Change Advisory Council (2016). *First Report*. Available at: <u>http://www.climatecouncil.ie/media/CCAC_FIRSTREPORT.pdf</u>

Conefrey, T. and FitzGerald, J. (2010). *Managing housing bubbles in regional economies under EMU: Ireland and Spain.* ESRI Working Paper No. 315. Available at: http://www.esri.ie/pubs/WP315.pdf

Department of Finance (2014). *Medium-Term Budgetary Framework*. Available at: <u>http://www.finance.gov.ie/sites/default/files/140718%20Medium%20Term%20Budgetary%20</u> <u>Framework%20-%20revised.pdf</u>

Department of Finance (2015). *Budget 2016*. Available at: http://www.budget.gov.ie/Budgets/2016/2016.aspx Department of Finance (2016a). *Stability Programme Update April 2016*. Available at: <u>http://opac.oireachtas.ie/AWData/Library3/FINdoclaid270416_094247.pdf</u>

Department of Finance (2016b). *Summer Economic Statement*. Available at: http://www.budget.gov.ie/Budgets/2017/Documents/SES/Summer-Economic-Statement-2016.pdf

Department of Finance (2016c). *Budget 2017.* Available at: <u>http://www.budget.gov.ie/Budgets/2017/Documents/Budget%202017%20-</u> %20Full%20document.pdf

Department of Finance (2016d). *Exchequer Returns end-October 2016*: *Information Note*. Available at:

http://www.finance.gov.ie/sites/default/files/Exchequer%20Returns%20end%20October%202016 %20information%20note.pdf

Department of Public Expenditure and Reform (2011). *Comprehensive Expenditure Report 2012-14*. Available at: <u>http://www.per.gov.ie/en/comprehensive-expenditure-report-2012-2014/</u>

Department of Public Expenditure and Reform (2016a). *Mid-Year Expenditure Report*. Available at: http://www.per.gov.ie/en/mid-year-expenditure-report-2016/

Department of Public Expenditure and Reform (2016b). *Expenditure Report 2017*. Available at: <u>http://budget.gov.ie/Budgets/2017/Documents/Part%20I%20-%20Expenditure%20Strategy.pdf</u>

ESRI (2016a). *Quarterly Economic Commentary, Spring 2016*. Available at: <u>http://www.esri.ie/pubs/QEC2016SPR.pdf</u>

ESRI (2016b). *Quarterly Economic Commentary, Autumn 2016*. Available at: http://www.esri.ie/publications/quarterly-economic-commentary-autumn-2016/

European Commission (2014a). *The Production Function Methodology for Calculating Potential Growth Rates and Output Gaps*. Economic Papers 535. Available at: http://ec.europa.eu/economy_finance/publications/economic_paper/2014/pdf/ecp535_en.pdf

European Commission (2016a). *European Economic Forecast: Spring 2016*. Institutional Paper 025. Available at: <u>http://ec.europa.eu/economy_finance/publications/eeip/pdf/ip025_en.pdf</u>

European Commission (2016b). "Assessment of the 2016 Stability Programme for Ireland." Available at:

http://ec.europa.eu/economy finance/economic governance/sgp/pdf/20 scps/2016/07 ie scp e n.pdf

European Commission (2016c). *European Economic Forecast, Autumn 2016*. Available at: <u>http://ec.europa.eu/economy_finance/eu/forecasts/2016_autumn_forecast_en.htm</u>

European Commission (2016d). Commission Opinion of 16.11.2016 on the Draft Budgetary Plan of Ireland. Available at:

http://ec.europa.eu/economy finance/economic governance/sgp/pdf/dbp/2016/ie 2016-11-16 co en.pdf European Commission (2016e). "Vade Mecum on the Stability and Growth Pact". Institutional Paper 025. Available at:

http://ec.europa.eu/economy_finance/publications/eeip/pdf/ip021_en.pdf

Heller, P. S. (2005). *Understanding Fiscal Space*. IMF Policy Discussion Paper PDP/05/4 Available at: <u>http://mulkiye.byethost13.com/web_documents/imfpaperfiscalspace.pdf?i=1</u>

HM Treasury (2016). *The long-term economic impact of EU membership and the alternatives.* Available at:

https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/517415/treasury analysis_economic_impact_of_eu_membership_web.pdf

IMF (2016). *World Economic Outlook, October 2016.* Washington DC: International Monetary Fund. Available at: <u>http://www.imf.org/external/pubs/ft/weo/2016/02/</u>

Irish Fiscal Advisory Council (2011). *Fiscal Assessment Report, October 2011*. Dublin: Irish Fiscal Advisory Council. Available at: <u>http://www.fiscalcouncil.ie/wp-</u> content/uploads/2011/10/FiscalAssessReport_V1.1.pdf

Irish Fiscal Advisory Council (2012). *Fiscal Assessment Report, September 2012*. Dublin: Irish Fiscal Advisory Council. Available at: <u>http://www.fiscalcouncil.ie/publications/</u>

Irish Fiscal Advisory Council (2013a) *Fiscal Assessment Report, April 2013*. Dublin: Irish Fiscal Advisory Council. Available at: <u>http://www.fiscalcouncil.ie/wp-</u>content/uploads/2013/04/FARApr13.pdf

Irish Fiscal Advisory Council (2013b). *Fiscal Assessment Report, November 2013*. Dublin: Irish Fiscal Advisory Council. Available at: <u>http://www.fiscalcouncil.ie/publications/</u>

Irish Fiscal Advisory Council (2014a). *Fiscal Assessment Report, June 2014*. Dublin: Irish Fiscal Advisory Council. Available at: <u>http://www.fiscalcouncil.ie/publications/</u>

Irish Fiscal Advisory Council (2014b). *Fiscal Assessment Report, November 2014*. Dublin: Irish Fiscal; Advisory Council. Available at: <u>http://www.fiscalcouncil.ie/wp-</u> <u>content/uploads/2012/01/FAR_251114_FINAL_Website.pdf</u>

Irish Fiscal Advisory Council. (2014c). *Future Implications of the Debt Rule.* IFAC Analytical Note No. 5. Available at: <u>http://www.fiscalcouncil.ie/wp-content/uploads/2014/06/AN-5.pdf</u>

Irish Fiscal Advisory Council (2015a). *Fiscal Assessment Report, June 2015*. Dublin: Irish Fiscal Advisory Council. Available at: <u>http://www.fiscalcouncil.ie/publications/</u>

Irish Fiscal Advisory Council (2015b). *Controlling the health budget: Annual budget implementation in the public health area.* Irish Fiscal Advisory Council Analytical Note No. 8. Available at: http://www.fiscalcouncil.ie/wp-content/uploads/2012/01/Health-Analytical-Note-FINAL2.pdf

Irish Fiscal Advisory Council (2015c). *Fiscal Assessment Report, November 2015*. Dublin: Irish Fiscal Advisory Council. Available at: <u>http://www.fiscalcouncil.ie/publications/</u>

Irish Fiscal Advisory Council (2016a). *Fiscal Assessment Report, June 2016*. Fiscal Advisory Council. Available at: <u>http://www.fiscalcouncil.ie/fiscal-assessment-report-june-2016/</u>

Irish Fiscal Advisory Council (2016b). Pre-Budget 2017 Statement, September 2016. Dublin: Irish Fiscal Advisory Council. Available at: <u>http://www.fiscalcouncil.ie/publications/</u>

Irish Government (2012). *Fiscal Responsibility Act (2012)*. Available at: <u>http://www.irishstatutebook.ie/eli/2012/act/39/enacted/en/html</u>

Irish Government (2013). *The Ministers and Secretaries (Amendment) Act 2013.* Available at: <u>http://www.irishstatutebook.ie/eli/2013/act/29/enacted/en/pdf</u>

Kornai, J. (1992). *The Socialist System: The Political Economy of Communism*. N.J: Princeton University Press, Princeton.

Mintz, J., and Smart, M. (2006). *Incentives for Public Investment under Fiscal Rules*. World Bank Policy Research Working Paper No. 3860. Available at: https://openknowledge.worldbank.org/handle/10986/8346

NIESR (2016a). *The Long and the Short of it: What price UK Exit from the EU?* London: National Institute for Economic and Social Research. Available at: <u>http://www.niesr.ac.uk/blog/long-and-short-it-what-price-uk-exit-eu#.WAjHFPkrLcs</u>

NIESR (2016b). *Prospects for the UK Economy, August 2016.* London: National Institute for Economic and Social Research. Available at: <u>http://ner.sagepub.com/content/237/1.toc</u>

NIESR (2016c). *Prospects for the UK Economy, November 2016*. London: National Institute for Economic and Social Research. Available at: <u>http://ner.sagepub.com/content/238/1.toc</u>

OECD (2015). *Review of Budgetary Oversight by Parliament in Ireland*. OECD: Paris. Available at: <u>https://www.oireachtas.ie/parliament/media/housesoftheoireachtas/Ireland-Parliamentary-Budget-Review-Preliminary-Draft.pdf</u>

Ostry, J.D., Ghosh, A.R., and Qureshi, M.S. (2010). *Fiscal Space*. IMF Staff Position Note No. 2010/11. Available at: <u>https://www.imf.org/external/pubs/cat/longres.aspx?sk=23726.0</u>

Portes, J. and Wren-Lewis, S. (2015). *Issues in the Design of Fiscal Policy Rules*. The Manchester School, 83(S3), 56-86. Available at: <u>http://www.economics.ox.ac.uk/Department-of-Economics-Discussion-Paper-Series/issues-in-the-design-of-fiscal-policy-rules</u>