

QUARTERLY ECONOMIC COMMENTARY

Kieran McQuinn

Conor O'Toole

Matthew Allen-Coghlan

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THE AUTHORS

The *Commentary* is edited by Kieran McQuinn and Conor O'Toole. Kieran McQuinn is Research Professor and Conor O'Toole is a Senior Research Officer at the Economic and Social Research Institute (ESRI). Matthew Allen-Coghlan is a Research Assistant at the ESRI.

The Quarterly Economic Commentary has been accepted for publication by the Institute, which does not itself take institutional policy positions. It has been peer reviewed by ESRI research colleagues prior to publication. The authors are solely responsible for the content and the views expressed.

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SUMMARY TABLE

	2016	2017	2018	2019	2020
Output (Real Annual Growth %)					
Private Consumer Expenditure	5.2	3.0	3.4	2.7	2.5
Public Net Current Expenditure	3.6	3.9	4.4	4.2	3.6
Investment	50.8	-6.8	-21.1	45.1	4.6
Exports	4.1	9.2	10.4	8.8	6.3
Imports	18.4	1.1	-2.9	20.3	7.3
Gross Domestic Product (GDP)	3.7	8.1	8.2	4.9	3.1
Gross National Product (GNP)	9.7	5.2	6.5	4.1	2.6
Prices (Annual Growth %)					
Consumer Price Index (CPI)	0.0	0.3	0.5	1.1	1.4
Growth in Average Hourly Earnings	2.5	3.4	3.0	4.2	4.5
Labour Market					
Employment Levels (ILO basis ('000))	2,132	2,194	2,258	2,305	2,348
Unemployment Levels (ILO basis ('000))	195	158	137	129	123
Unemployment Rate (as % of Labour Force)	8.4	6.7	5.8	5.1	5.0
Public Finance					
General Government Balance (€bn)	-1.8	-0.8	0.0	0.0	1.0
General Government Balance (% of GDP)	-0.7	-0.3	0.0	0.0	0.3
General Government Debt (% of GDP)	73.9	67.8	63.6	58.8	53.9
External Trade					
Balance of Payments Current Account (€bn)	-11.4	1.5	29.0	-6.6	-10.6
Current Account (% of GNP)	-5.2	0.6	11.5	-2.4	-3.8

Note: Detailed forecast tables are contained in an Appendix to this *Commentary*.

NATIONAL ACCOUNTS 2018

A: EXPENDITURE ON GROSS NATIONAL PRODUCT

	2017	2018	Change in 2018		
	€ bn	€ bn	Value	Price	Volume
Private Consumer Expenditure	101.6	107.0	5.3	1.8	3.4
Public Net Current Expenditure	29.6	32.1	8.7	4.0	4.4
Gross Fixed Capital Formation	93.2	75.9	-18.6	3.1	-21.1
Exports of Goods and Services	359.7	396.4	10.2	-0.2	10.4
Physical Changes in Stocks	6.1	1.2			
Final Demand	590.1	612.5	3.8	0.8	3.0
less:					
Imports of Goods and Services	294.0	289.0	-1.7	1.2	-2.9
Statistical Discrepancy	1.1	0.5			
GDP at Market Prices	296.1	323.5	9.3	0.4	8.8
Net Factor Payments	-62.3	-71.0			
GNP at Market Prices	234.9	253.1	7.7	1.2	6.5

B: GROSS NATIONAL PRODUCT BY ORIGIN

	2017	2018	Change in 2018	
	€ bn	€ bn	€ bn	%
Agriculture, Self Employed Income	3.5	3.0	-0.5	-15.4
Agriculture, Employee Remunerations	0.7	0.7	0.0	0.0
Non-Agriculture, Employee Remunerations	87.4	92.6	5.1	5.9
Other	113.3	119.4	6.1	5.4
Adjustments: Stock Appreciation	0.1	0.3		
Statistical Discrepancy	-2.8	-3.2		
Net Domestic Product	252.5	273.7	21.2	8.4
Net Factor Payments	-62.3	-71.0	-8.7	14.0
National Income	190.2	202.7	12.5	6.6
Depreciation	73.1	79.3	6.2	8.5
GNP at Factor Cost	263.3	282.0	18.7	7.1
Taxes less Subsidies	-28.4	-28.9	-0.5	1.8
GNP at Market Prices	234.9	253.1	18.2	7.7

C: BALANCE OF PAYMENTS ON CURRENT ACCOUNT

	2017	2018	Change in 2018
	€ bn	€ bn	€ bn
X – M	65.6	99.5	33.8
F	-61.1	-65.4	-4.3
Net Transfers	-3.1	-5.1	-2.0
Balance on Current Account	1.5	29.0	27.5
as % of GNP	0.6	11.5	10.9

NATIONAL ACCOUNTS 2019

A: EXPENDITURE ON GROSS NATIONAL PRODUCT

	2018	2019	Change in 2019		
	€ bn	€ bn	Value	Price	Volume
Private Consumer Expenditure	107.0	111.8	4.5	1.8	2.7
Public Net Current Expenditure	32.1	34.8	8.5	4.1	4.2
Gross Fixed Capital Formation	75.9	113.4	49.4	3.0	45.1
Exports of Goods and Services	396.4	438.0	10.5	1.5	8.8
Physical Changes in Stocks	1.2	3.0			
Final Demand	612.5	701.1	14.5	2.1	12.1
less:					
Imports of Goods and Services	289.0	352.2	21.9	1.3	20.3
Statistical Discrepancy	0.5	-0.1			
GDP at Market Prices	323.5	348.9	7.8	2.8	4.9
Net Factor Payments	-71.0	-77.6			
GNP at Market Prices	253.1	271.2	7.2	2.9	4.1

B: GROSS NATIONAL PRODUCT BY ORIGIN

	2018	2019	Change in 2019	
	€ bn	€ bn	€ bn	%
Agriculture Self-Emp. Income	3.0	3.9	0.9	31.9
Agriculture, Employee Remuneration	0.7	0.7	0.0	0.0
Non-Agriculture, Employee Remunerations	92.6	99.2	6.6	7.1
Other	119.4	122.6	3.2	2.7
Adjustments: Stock Appreciation	0.3	0.2		
Statistical Discrepancy	-3.2	-3.2	0.0	
Net Domestic Product	273.7	296.0	22.3	8.1
Net Factor Payments	-71.0	-77.6	-6.7	9.4
National Income	202.7	218.3	15.6	7.7
Depreciation	79.3	82.1	2.9	3.6
GNP at factor cost	282.0	300.5	18.5	6.5
Taxes less Subsidies	-28.9	-29.3	-0.4	1.2
GNP at Market Prices	253.1	271.2	18.1	7.2

C: BALANCE OF PAYMENTS ON CURRENT ACCOUNT

	2018	2019	Change in 2019
	€ bn	€ bn	€ bn
X - M	99.5	76.7	-22.8
F	-65.4	-77.6	-12.3
Net Transfers	-5.1	-5.6	-0.6
Balance on Current Account	29.0	-6.6	-35.6
as % of GNP	11.5	-2.4	-13.1

NATIONAL ACCOUNTS 2020

A: EXPENDITURE ON GROSS NATIONAL PRODUCT

	2019	2020	Change in 2020		
	€ bn	€ bn	Value	Price	Volume
Private Consumer Expenditure	111.8	116.8	4.4	1.9	2.5
Public Net Current Expenditure	34.8	35.6	2.1	-1.4	3.6
Gross Fixed Capital Formation	113.4	122.0	7.6	2.9	4.6
Exports of Goods and Services	438.0	472.1	7.8	1.4	6.3
Physical Changes in Stocks	3.0	3.0			
Final Demand	701.1	749.5	6.9	1.6	5.3
less:					
Imports of Goods and Services	352.2	384.2	9.1	1.6	7.3
Statistical Discrepancy	-0.1	-0.1			
GDP at Market Prices	348.9	365.2	4.7	1.5	3.1
Net Factor Payments	-77.6	-82.8			
GNP at Market Prices	271.2	282.4	4.1	1.5	2.6

B: GROSS NATIONAL PRODUCT BY ORIGIN

	2019	2020	Change in 2020	
	€ bn	€ bn	€ bn	%
Agriculture Self-Emp. Income	3.9	4.0	0.1	2.6
Agriculture, Employee Remuneration	0.7	0.7	0.0	0.0
Non-Agriculture, Employee Remunerations	99.2	105.5	6.4	6.4
Other	122.6	126.9	4.2	3.5
Adjustments: Stock Appreciation	0.2	0.2		
Statistical Discrepancy	-3.2	-3.2	0.0	
Net Domestic Product	296.0	310.4	14.4	4.9
Net Factor Payments	-77.6	-82.8	-5.1	6.6
National Income	218.3	227.6	9.3	4.2
Depreciation	82.1	84.9	2.8	3.4
GNP at factor cost	300.5	312.5	12.1	4.0
Taxes less Subsidies	-29.3	-30.1	-0.8	2.9
GNP at Market Prices	271.2	282.4	11.2	4.1

C: BALANCE OF PAYMENTS ON CURRENT ACCOUNT

	2019	2020	Change in 2020
	€ bn	€ bn	€ bn
X - M	76.7	78.3	1.6
F	-77.6	-82.8	-5.1
Net Transfers	-5.6	-6.1	-0.5
Balance on Current Account	-6.6	-10.6	-4.0
as % of GNP	-2.4	-3.8	-1.4

The Irish Economy – Forecast Overview

Although the Irish economy continues to perform in a robust manner, a number of considerations arise given the present growth performance. Firstly, due to certain multinational related activities, a divergence is likely once again between headline and underlying output growth for the present year. While we are revising upwards our forecast of headline GDP to just less than 5 per cent for 2019, certain underlying data would suggest the growth outlook has moderated somewhat as we move through the present year. Secondly, a number of significant international related risks are on the horizon for the Irish economy. As with previous *Commentaries*, our forecasts, unless otherwise stated, are subject to the technical assumption that the United Kingdom remains part of the European Union.

From an international perspective the deterioration in the outlook for many of our main trading partners is a concern and suggests that external sources of growth may be somewhat diminished in 2020. A further source of uncertainty is the nature of the UK's proposed exit from the European Union. This has particular complications for the domestic budgetary process given the UK Government's insistence on leaving the European Union by the end of October irrespective of whether an agreement has been reached. Under our baseline outlook, we believe the economy will grow by over 3 per cent in 2020; however if a No-Deal Brexit were to materialise in late 2019, output growth could dissipate entirely next year. Indeed, it is not inconceivable that the Irish economy could contract in 2020 under such a scenario.

This means that the most appropriate budgetary stance may vary significantly depending on the Brexit process. If the domestic economy continues to perform strongly into 2020 then a mildly contractionary budget is advisable to reduce the possibility of overheating. If the Brexit issue is resolved satisfactorily from an Irish perspective, then the Irish economy may face increased overheating pressures. However, if the nature of Brexit results in a significant and adverse shock for the domestic economy then a stimulatory budget may be required.

The recent figures for housing completions suggest that the increase in the number of new houses has slowed somewhat. Furthermore, the rate of house price inflation has also slowed, particularly in the capital. Some have suggested that the associated issues with house price affordability should give rise to changes in the manner in which the Central Bank of Ireland's macro-prudential policy is implemented. However, it is imperative that these measures are

maintained in such a manner to prevent the emergence of another house price-mortgage credit feedback loop. It is important that we do not forget the significant domestic policy failures which preceded the financial crisis of 2007/2008.

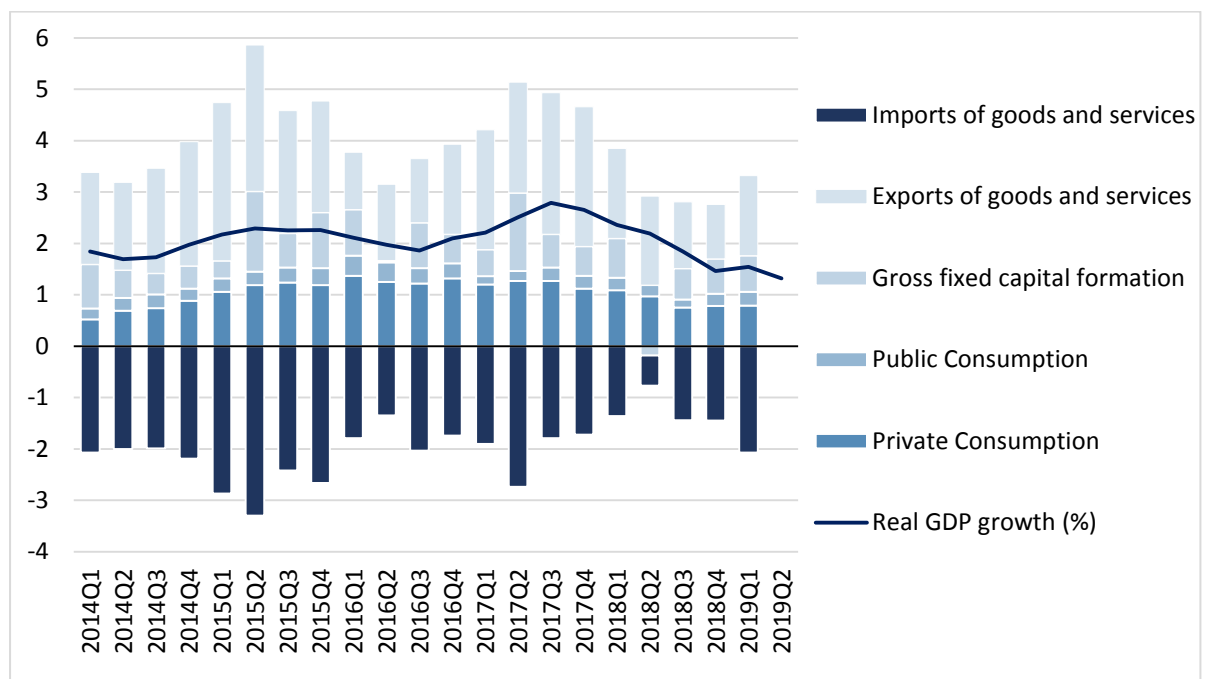
The International Economy

The international economy section has now been amended to also include a section on international financial developments. This has previously been in the Monetary and Financial section. Therefore, the section now deals initially with the overall performance of the domestic economy's main trading partners, then international financial developments, and finally the implications for the traded sector of the domestic economy.

Global growth looks set to remain subdued with the outlook for a number of major economies continuing to deteriorate. In the United States an increasing number of indicators, including the inverted yield curve and declining Purchasing Managers' Index are pointing towards a potential recession. In Europe the economic outlook is also deteriorating, with a recession looming in Germany and an increasing probability of a 'No-Deal Brexit'. In the midst of a trade war with the US, the Chinese economy is beginning to slow down, with some forecasters projecting growth to fall below 6 per cent in 2020. Against this backdrop, in the July update of its *World Economic Outlook*, the IMF revised down its forecast for global growth to 3.2 per cent in 2019 and 3.5 per cent in 2020.¹ From an Irish perspective, a slowdown in the growth rates of major economies around the world suggests a weakening of global demand for exports which in turn will have a negative impact on Irish growth.

Economic activity in the European Union has continued to slow in 2019. Though there was a slight pick-up in the growth rate in Q1, flash estimates of annual growth show the growth rate falling to 1.3 per cent in Q2 2019. In the Euro Area the growth rate is even lower at 1.1 per cent with growth especially subdued in the major European economies. In Germany, France and Italy real GDP growth in Q2 2019 fell to 0.4, 1.4 and -0.1 per cent respectively. Figure 1 illustrates that the main reason for the declining growth rate in GDP has been the weak performance of exports and a decline in private consumption. As of June 2019 the unemployment rate in the EU stood at 6.3 per cent, the same rate as the previous month and 0.5 percentage points lower than June 2018. Inflation in the Euro Area averaged 1 per cent in July 2019, down from 1.3 per cent in June and the lowest rate of inflation in the currency bloc since November 2016.

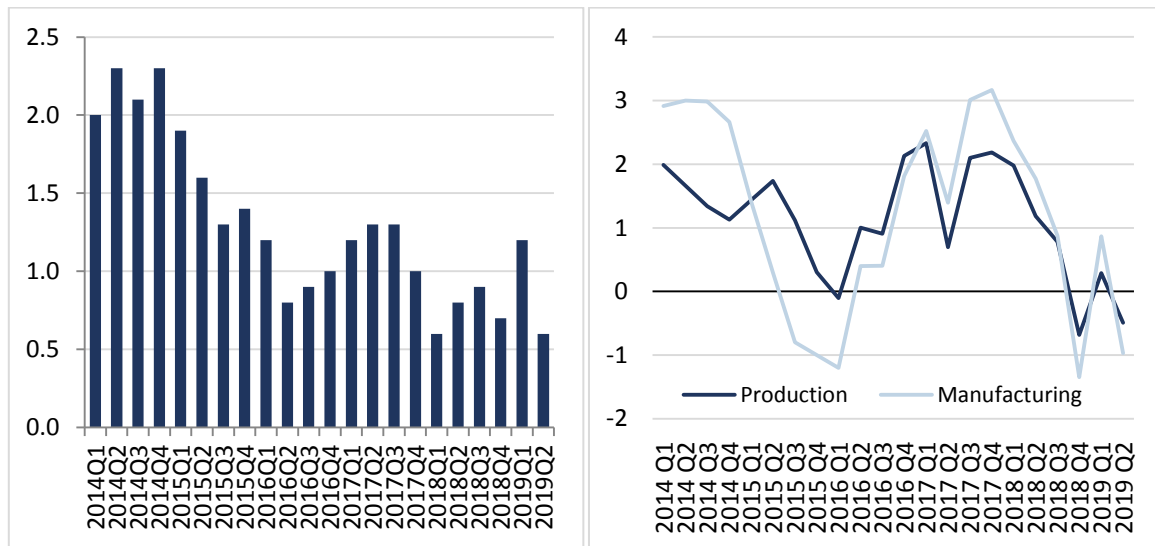
¹ International Monetary Fund (2019). *World Economic Outlook: Update, Precarious Recovery*, Washington, D.C.: International Monetary Fund, July 2019.

FIGURE 1 EU28 – CONTRIBUTIONS TO YEAR-ON-YEAR GDP GROWTH (P.P.)

Sources: Eurostat, GDP and main components.

The annual growth rate of real GDP in the UK declined significantly in Q2 2019 compared to the previous quarter. While it is likely that the strong growth rate in Q1 2019 can be attributed to stockpile accumulation in anticipation of Brexit and that a drop off in the growth rate in Q2 was likely to occur, the low growth rate of 0.6 per cent is still concerning. This is the joint lowest annual growth rate in a quarter since Q2 2012, an ominous sign for the UK in the face of so much domestic and international uncertainty. The weak performance of the UK can also be seen in the poor performance of the production and manufacturing sectors over this period. On an annual basis, production declined by 0.5 per cent in Q2 2019 while manufacturing declined by 1 per cent over the same period. Nevertheless, the UK labour market has been robust over this period with the unemployment rate remaining below 4 per cent throughout 2019. This has put upward pressure on labour costs with weekly earnings rising by 3.7 per cent annually in June 2019, the highest rate of growth since before the financial crisis. However, as the value of the pound continues to tumble, the price of imports into the UK will increase, which may erode the benefit of increased earnings to workers and exert further higher production costs on UK businesses.

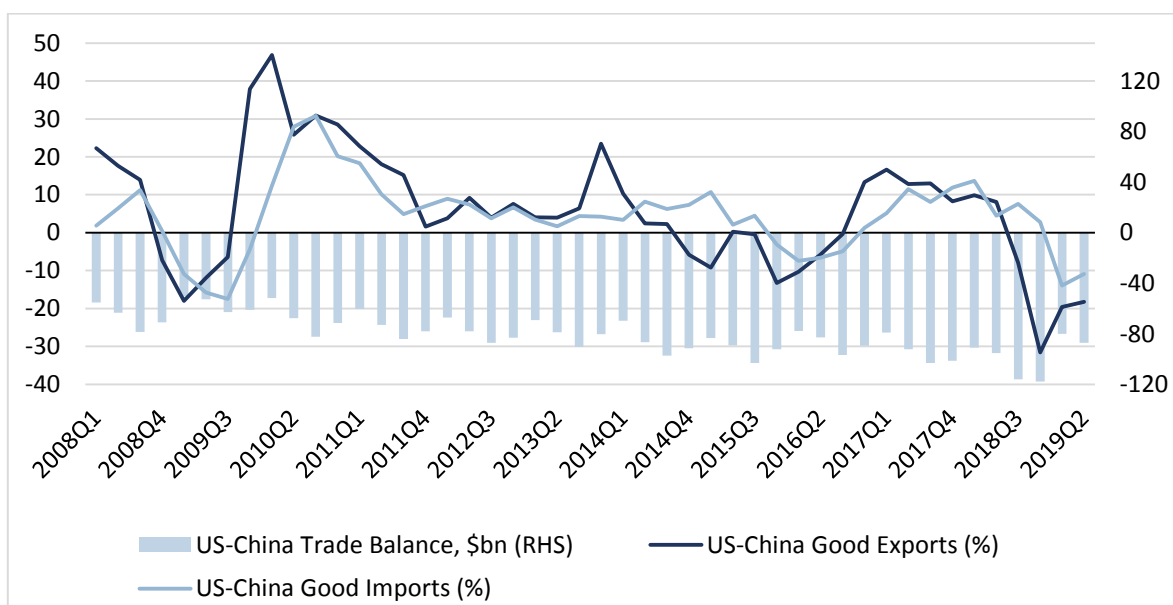
FIGURE 2 UK GDP (LHS), UK PRODUCTION AND MANUFACTURING (RHS), Y-ON-Y CHANGE (%)



Source: Office for National Statistics

The US economy grew at an annual rate of 2.0 per cent in Q2 2019, down from 3.1 per cent in the previous quarter. Though private consumption expenditure was strong over this period, increasing by 2.6 per cent, this was offset somewhat by a fall in the level of exports, which declined by 1.7 per cent. The US labour market continues to perform strongly with the unemployment rate standing at 3.7 per cent in July 2019. Despite this, the warning signs for a potential contraction in the US economy are mounting. These include falling corporate earnings estimates, the inverted yield curve on US Treasuries and weakening PMI in manufacturing, which as of August 2019 experienced negative growth.

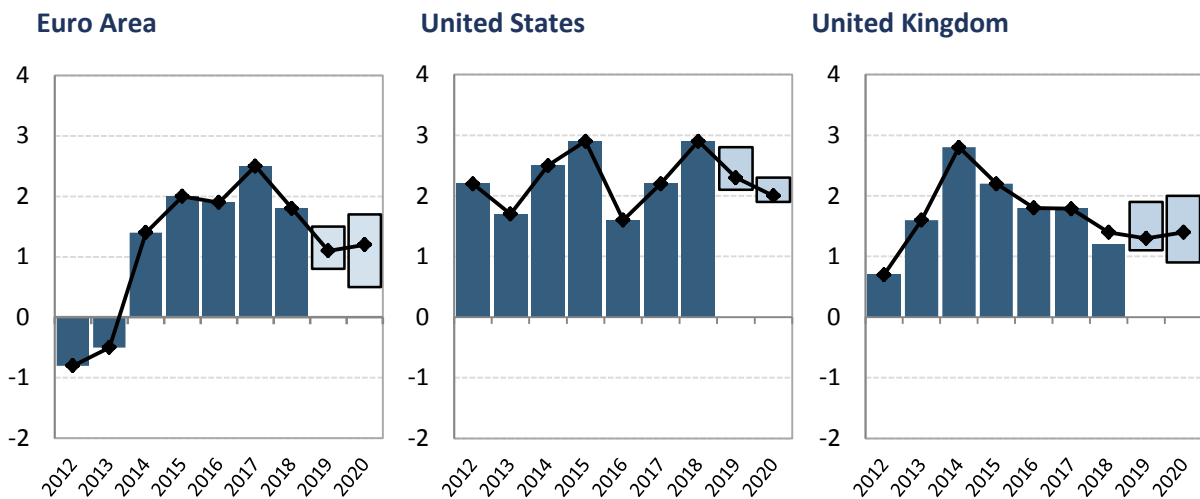
The aforementioned fall in US exports can partially be explained by the decline in exports to China. Figure 3 highlights a significant deterioration in bilateral trade between the two countries. In Q2 2019 the US exported 18 per cent fewer goods to China compared to the same period the previous year and imported nearly 11 per cent less. With no sign of a de-escalation in trade tensions, there is likely to be further deterioration in trade between the two countries going forward.

FIGURE 3 US-CHINA SEASONALLY-ADJUSTED IMPORTS AND EXPORTS, Y-O-Y GROWTH (%)

Source: United States Census Bureau, US Export and Import data for goods.

Real GDP growth in China decreased to 6.2 per cent in Q2 2019, down from 6.4 per cent the previous period. This is a continuation of the downward trend in Chinese growth that started in 2009. While a deceleration in growth is to be expected from a country that has experienced such rapid expansion over the last number of decades, the escalation of the trade war with the United States is putting increased pressure on the Chinese economy. Due in part to fiscal stimulus measures implemented by the Chinese government to combat trade pressure and weakening growth, debt accumulation in the economy has also accelerated. The IMF forecasts that debt-to-GDP will increase by 10 percentage points in 2019. Some forecasters are predicting Chinese growth rates to fall below 6 per cent in 2020, rates of growth not seen since the early 1990s.

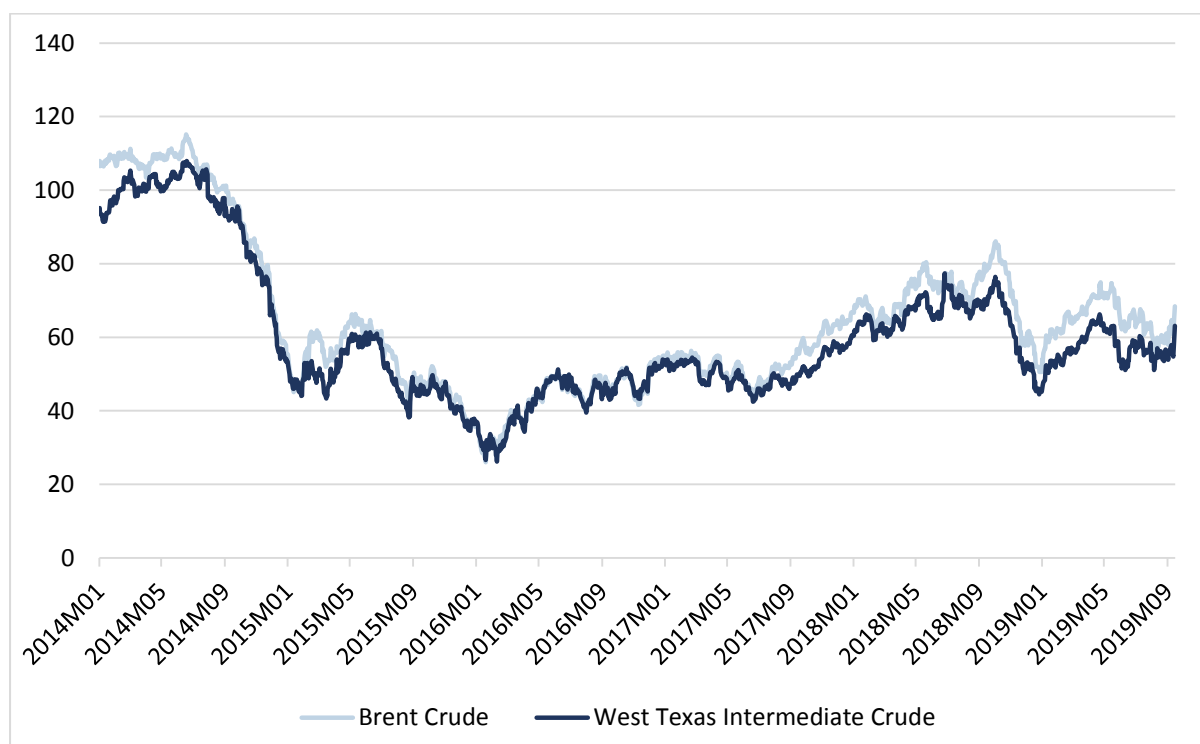
Figure 4 summarises the forecasts for GDP growth of the Euro Area, the US and the UK produced by the major institutions of their respective economies. Each forecast signals minimum and maximum forecasts with point values identifying the median of forecasts. These forecasts suggest a broad-based expectation of a moderation in economic growth in 2019.

FIGURE 4 REAL GDP, YEAR-ON-YEAR GROWTH (%)

Sources: FocusEconomics, IMF, OECD, HM Treasury and Federal Reserve.

Developments in oil prices

Figure 5 displays recent trends in global oil prices. Following a significant fall in oil prices in Q4 2018, OPEC – a cartel of oil producing countries – slashed output causing prices to increase significantly over the first half 2019. This price inflation was reversed somewhat in Q3 2019 as escalating trade tensions between the US and China and a general softening in the outlook for many developed economies softened the global demand for energy. However, following a missile attack on Saudi Arabian oil infrastructure on September 14, oil prices spiked, increasing by as much as 20 per cent in a single day. Should the conflict escalate in the coming months further increases in prices are likely to occur. From an Irish perspective, higher oil prices will increase inflation, putting upward pressure on household expenses.

FIGURE 5 CRUDE OIL PRICES (\$ PER BARREL)

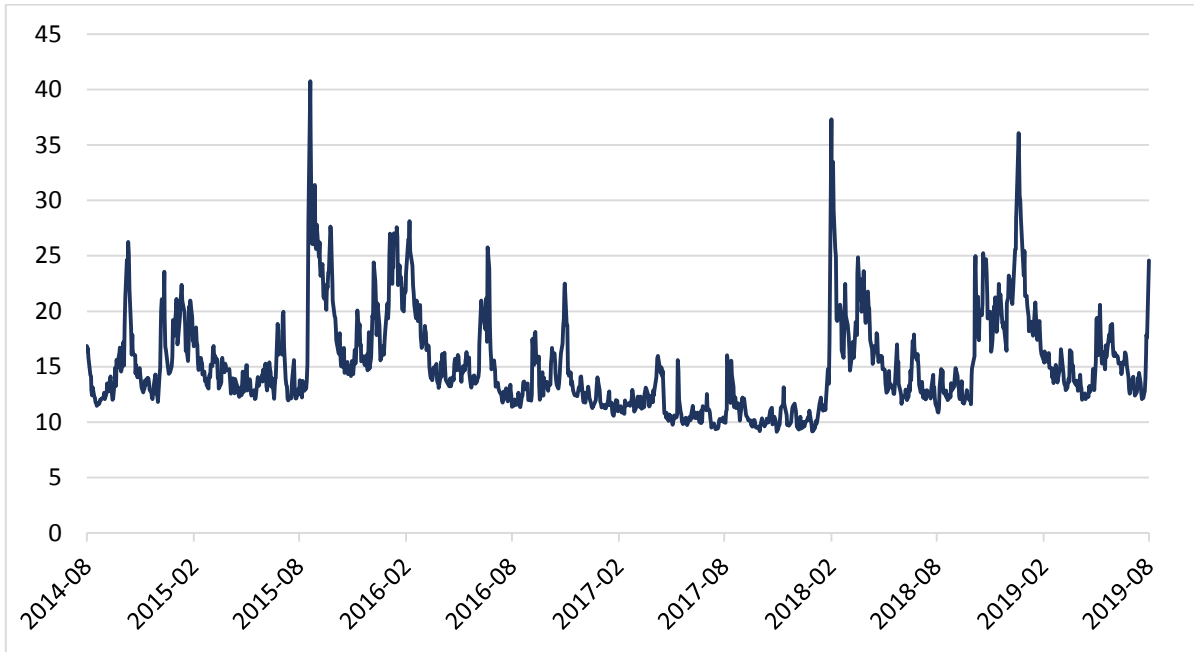
Source: Federal Reserve Bank of St. Louis

International financial developments

Due to the small open nature of the Irish economy, fluctuations in international financial markets can have a significant impact on the domestic economy. With the prospect of recession looming for a number of developed countries, volatility has been increasing in global equity markets through 2019, while sovereign and corporate bond yields have been driven to record lows. Further slowdowns in global growth, escalating international trade tensions and the potential of a hard Brexit are likely to lead to further uncertainty in financial markets going forward.

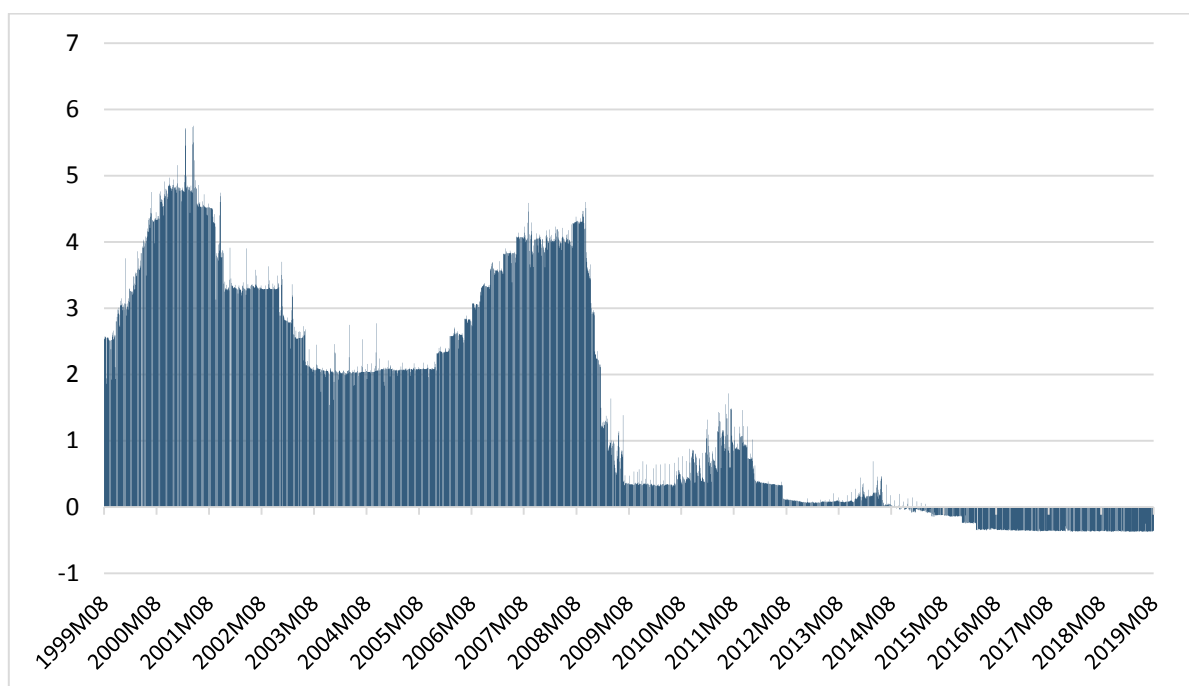
In early August the VIX Volatility Index rose to its highest level since December 2018. This index, known as the ‘fear gauge of Wall Street’, is derived from volatility in the S&P 500 stock index and is a reflection of investor uncertainty about future market conditions. The spike in the index followed a statement from the Fed that the July interest rate cut was a ‘mid-cycle adjustment’ as opposed to the beginning of series of interest rate cuts, and an announcement from the US administration of further tariffs on Chinese imports.

FIGURE 6 VIX VOLATILITY INDEX (%)



Source: St Louis Fed Database (FRED), from Chicago Board Options Exchange.

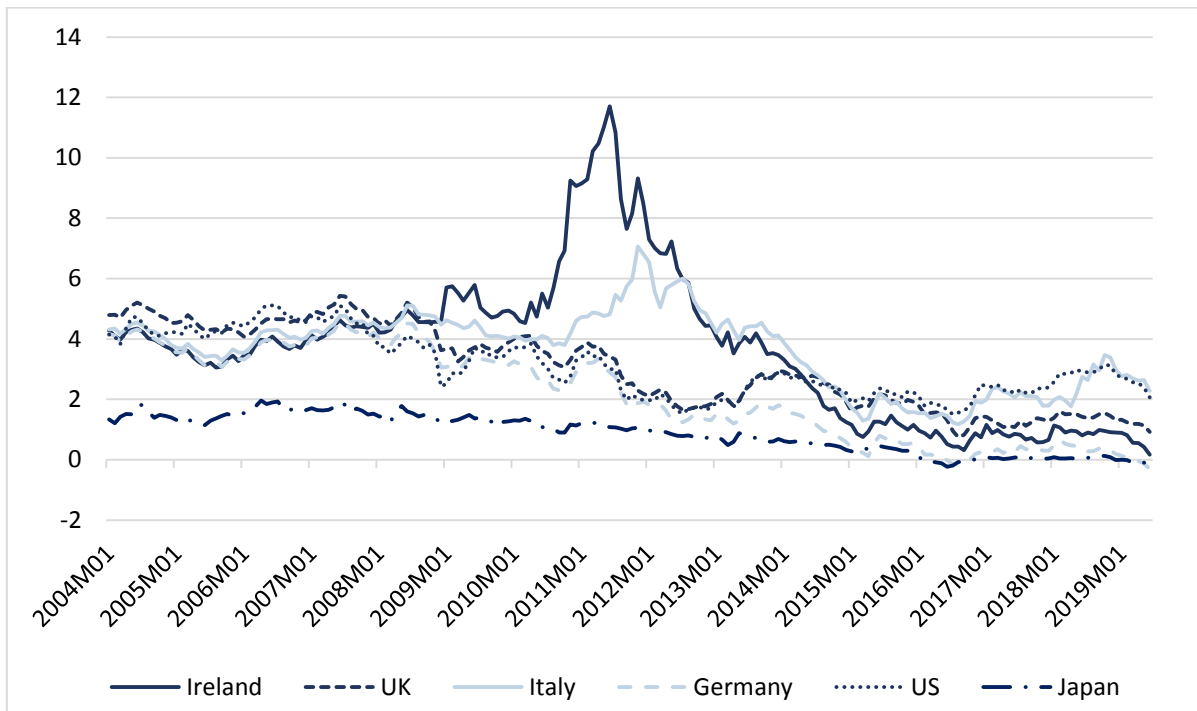
In light of the subdued performance of the Eurozone economy and the diminished growth expectations globally, the ECB continues to provide stimulus through accommodative monetary policy. At its most recent governing council meeting, the ECB agreed to re-engage quantitative easing policies and lower the deposit rate further into negative territory. The Eonia rate, which is the rate at which banks can lend to each other overnight, stood at just above -0.4 per cent in August, which is in line with the negative policy rates set by the ECB. The loosening of monetary policy by the ECB is a direct result of the poor European growth outlook and low inflation expectations.

FIGURE 7 EURO OVERNIGHT INDEX AVERAGE, EONIA (%)

Source: European Central Bank, Statistical Data Warehouse.

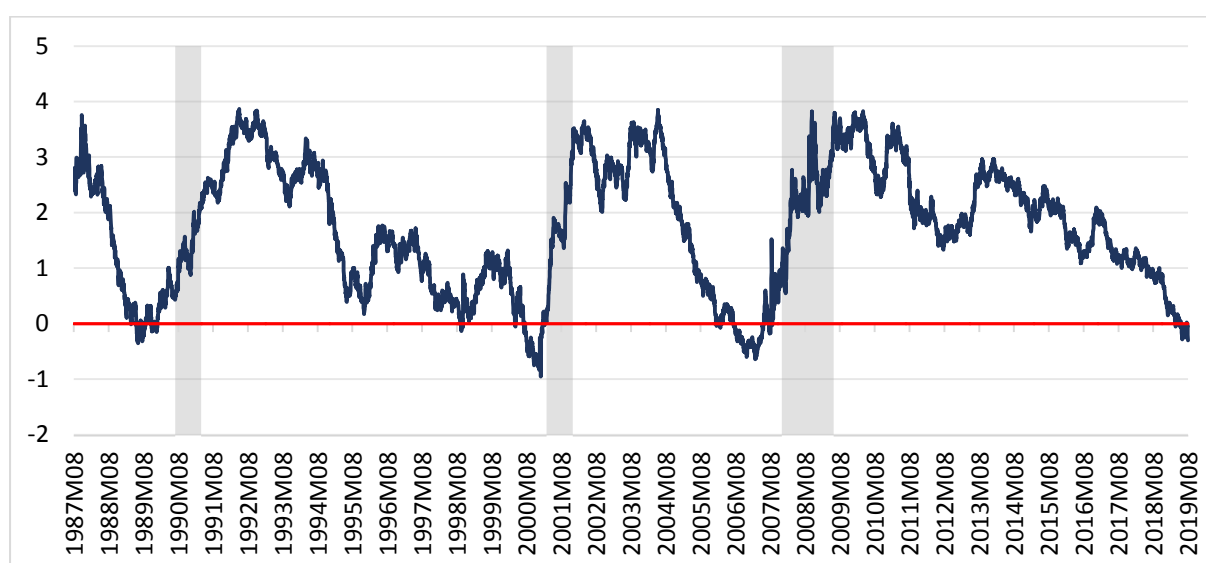
Government bond yields continue to trend downward as around the world central banks provide accommodative monetary policy. Further downward pressure is also being exerted on sovereign yields as investor concern about the future prospects for the global economy grow, increasing the demand for developed country sovereign bonds which are generally considered to be safe assets. Ten-year government bond yields for a select group of advanced countries are presented in Figure 8. The ten-year yield for both Japan and Germany are now both in negative territory while in the UK the yield has fallen below 1 per cent. In Ireland the ten-year yield fell to a 0.17 per cent in June, which represents a record low rate for the country. This is particularly beneficial for the Irish Exchequer as the level of outstanding debt to output is relatively high by international standards.

FIGURE 8 TEN-YEAR GOVERNMENT BOND YIELDS (%)



Source: St. Louis Fed database (FRED).

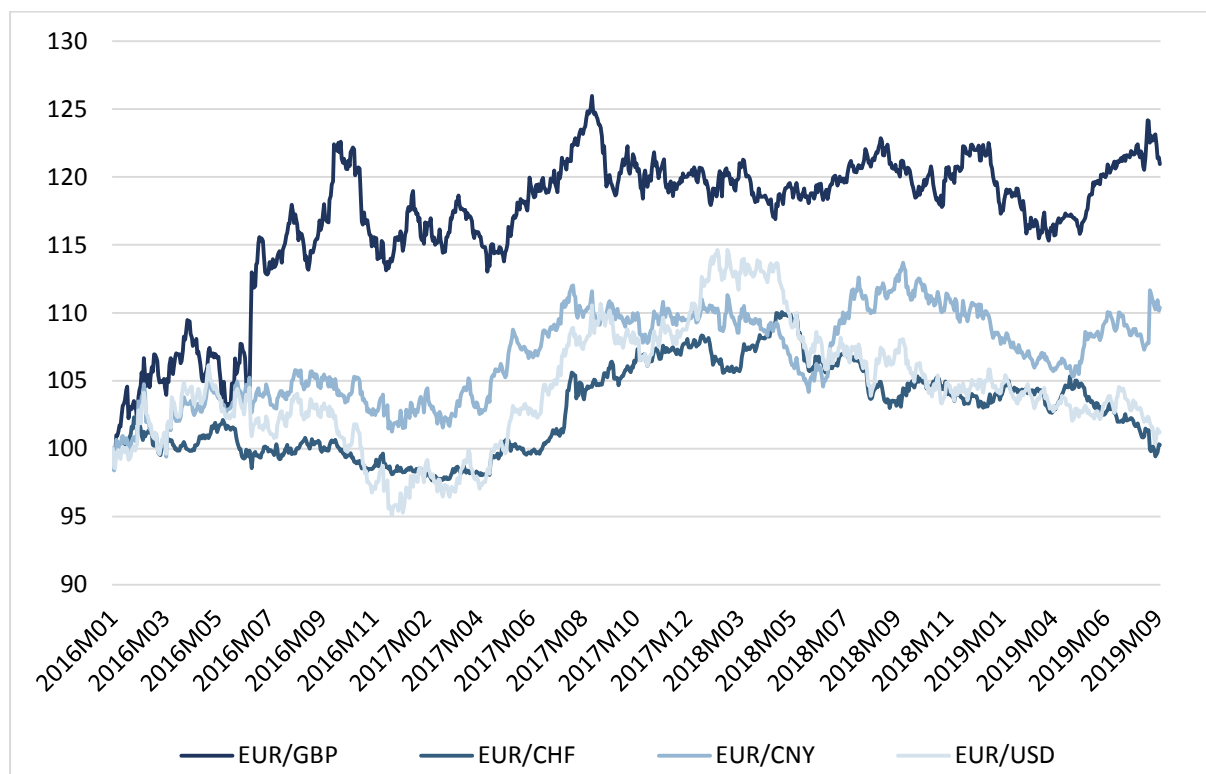
The spread between long- and short-term US Treasury yields is commonly used by investors and policymakers as an indicator of future recessions. Over the last half century every recession in the US has been preceded by an inversion in the yield curve, whereby yields on short-term bonds are higher than yields on long-term bonds, as illustrated in Figure 9. Theory would suggest that long-term bonds should have higher yields than short-term bonds due to the maturity premium demanded by investors for longer term investments. However, in circumstances when investors believe that interest rates in the future will be set lower (i.e. during recessions), they may choose to invest in long-term bonds in order to avail of the higher prevailing interest rate today. This increases the demand for longer term bonds, driving down their yield and conversely reduces the demand for shorter term bonds, increasing their yield. Since May 2019 the spread between the yield on ten-year Treasury note and a three-month Treasury bill has been negative and as of August was its lowest point since March 2007. Though this would suggest that there will be a recession in the US within the next six to 18 months some have argued that the inverted yield curve has lost its predictive power somewhat due to the current low yield environment. Given the reliance of the Irish economy on global, and in particular US economic activity, any slowdown would likely pass-through to domestic economic activity.

FIGURE 9 SPREAD BETWEEN TEN-YEAR AND THREE-MONTH TREASURY YIELDS (%)

Source: St. Louis Fed database (FRED).

Note: Shaded areas represent periods of recession.

Figure 10 graphs the exchange rate of the euro (EUR) to the US dollar (USD), the British pound sterling (GBP), the Swiss franc (CHF) and the Chinese renminbi (CNY). These are the currencies of Ireland's largest trading partners outside the Eurozone and their value against EUR impacts on the competitiveness of Irish companies in the international market. Since the result of the Brexit referendum in June 2016, the EUR/GBP rate has appreciated significantly. As the probability of a No-Deal Brexit has increased over the past number of months the value of the EUR against GBP has strengthened even further and as of August it is at the highest rate since the financial crisis. Further developments in the Brexit saga over the coming months will go a long way in determining the future exchange rate, with some analysts predicting parity between both currencies in the event of a 'No-Deal'. While the increased possibility of a No-Deal Brexit has led to an increase in the EUR/GBP rate, the exposure of the European market to a disorderly Brexit has likely contributed to a weakening of the EUR against USD. Coupled with the relatively weak economic performance in the Eurozone versus the United States, the EUR/USD rate has been weakening since the first quarter of 2018. Meanwhile, the devaluation of the CNY in August has resulted in an appreciation of the EUR/CNY rate.

FIGURE 10 EUR EXCHANGE RATE TO GBP, CHF, CNY, USD (JANUARY 2016 BASE=100)

Source: Eurostat.

IMPLICATIONS FOR IRISH EXPORTS, IMPORTS AND THE BALANCE OF PAYMENTS

Goods

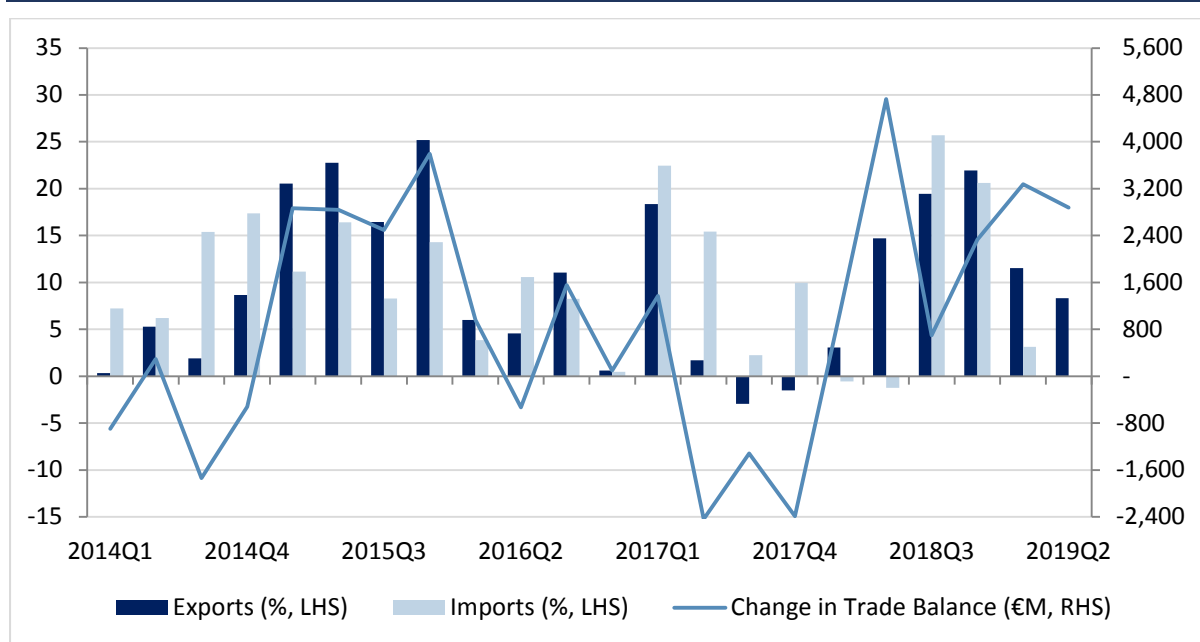
The latest quarterly National Account figures show that the traded goods sector continues to be a strong source of growth for the Irish economy. In Q1 2019 the annual growth rate for Irish goods exports was 14.3 per cent compared to 10.9 per cent for Irish goods imports. In level terms, the volume of goods exported in Q1 2019 was well over double that of goods imported. However, the overall trade figures may not paint an accurate picture of the underlying trends in goods trade. In order to examine the underlying trend it is important to assess developments in cross-border trade.

Cross-border trade excludes the trade of ownership goods (e.g. contract manufacturing, merchanting)² hence the final growth rates for quarterly National Account goods trade will differ upon release. While these traded goods are owned by Irish resident firms, some of these goods may never physically cross the Irish border nor are they produced domestically. Cross-border trade therefore

² 'Goods for processing' is dominated by 'contract manufacturing', a process in which multinational companies residing in Ireland issue contracts to foreign firms to produce goods. Although these goods never enter the Irish economy, due to ownership of these goods pertaining to Irish resident firms, sales are recorded as an Irish export. 'Merchanting' consists of the buying and selling of completed goods abroad which at no stage enter or leave Ireland.

functions somewhat more accurately as an indicator of domestic exporter performance.³ In Q2 2019 cross border exports increased by 8.3 per cent on the same period the previous year while growth in cross border imports was flat. This resulted in an annual increase in the trade balance of €2.9 billion.

FIGURE 11 ANNUAL GROWTH RATE IN CROSS-BORDER IRISH EXPORTS AND IMPORTS, (SEASONALLY ADJUSTED)

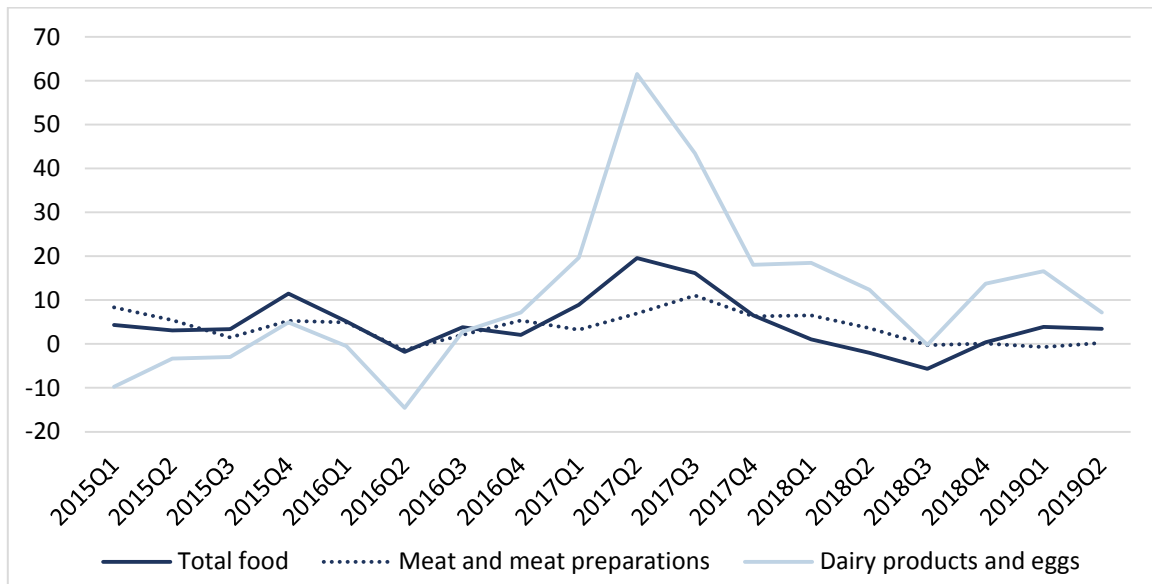


Source: Central Statistics Office.

Due to the exposure of the domestic agricultural sector to Brexit, it is important to track developments in Irish food exports. Figure 12 shows how the growth rate for food exports and two of its major subcomponents has changed over time. The annual growth rate of total food exports decreased slightly to 3.5 per cent in Q2 2019. This was driven by a sizeable drop in the growth rate of dairy products and eggs which fell from 16.6 per cent in Q1 2019 down to 7.2 per cent in Q2 2019.

³ For further details on ownership trade, see CSO document ‘Explaining Goods Exports and Imports 2012-2016’.

FIGURE 12 ANNUAL GROWTH RATE OF CROSS-BORDER FOOD EXPORTS (%)

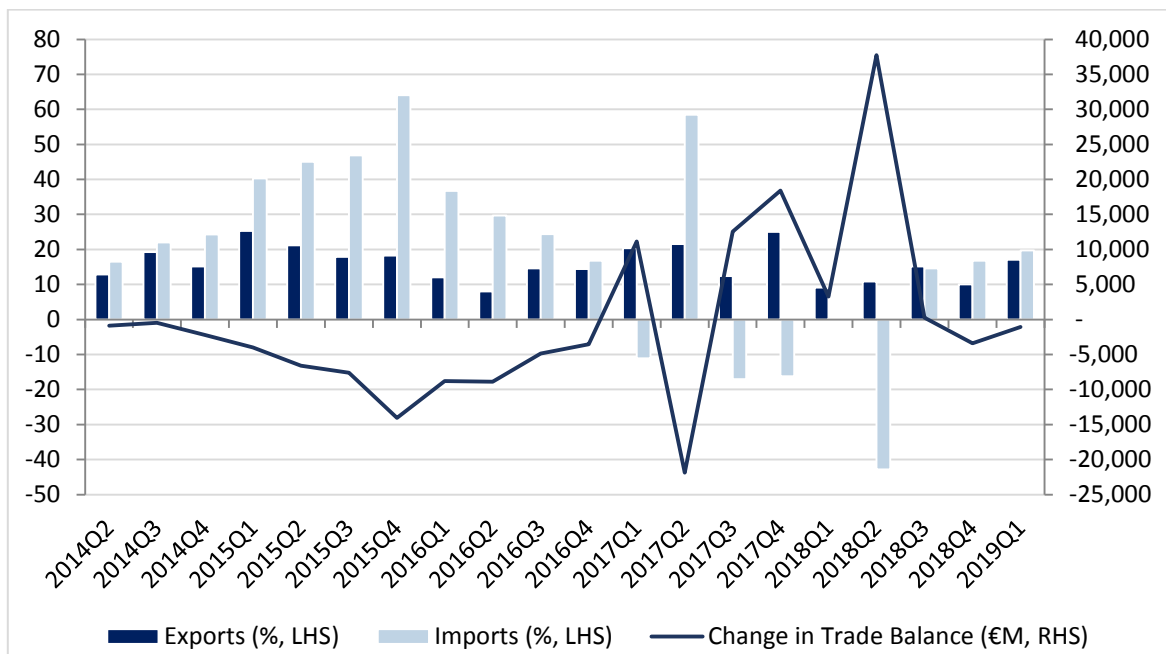


Source: Central Statistics Office.

Services

As was the case in Q4 2018, service imports continued to grow at a faster pace than service exports in Q1 2019. Relative to the same period last year, imports of services increased by 19.7 per cent while exports of services increased by 17.1 per cent. This resulted in a worsening of the services trade balance which declined by over €1 billion in the year to Q1 2019.

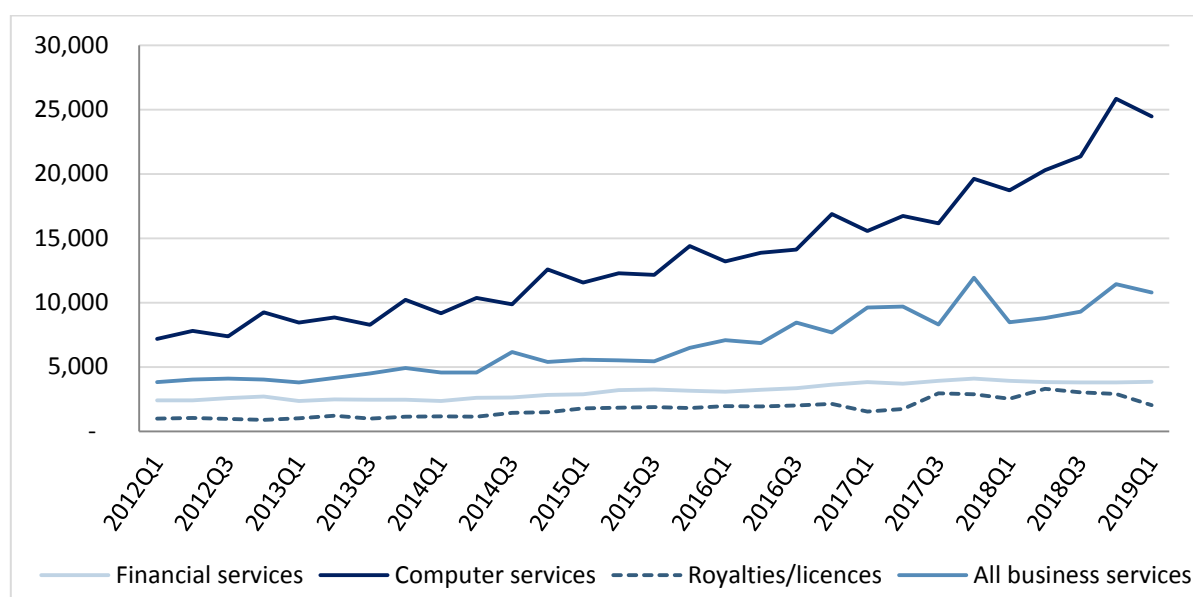
FIGURE 13 ANNUAL GROWTH RATE IN IRISH SERVICE EXPORTS AND IMPORTS



Source: Central Statistics Office.

It is evident from Figure 14 that over the last decade computer services exports have been growing rapidly. Exports of computer services accounted for 48 per cent of total service exports in Q1 2019 which was a slight increase on its share of total service exports in the same period last year. At 21 per cent, business services make up the second largest share of total service exports while royalties/licences account for about 4 per cent.

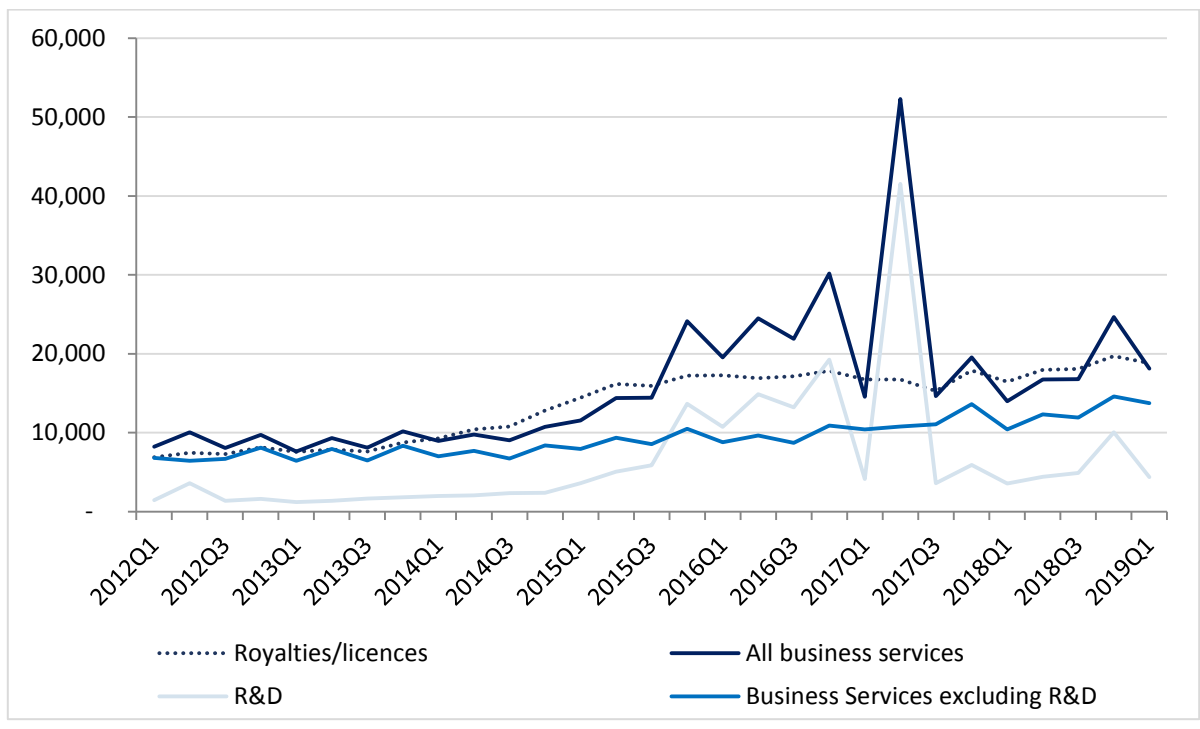
FIGURE 14 EXPORTS OF SERVICES BY COMPONENT (€ MILLION)



Source: Central Statistics Office.

Figure 15 highlights how volatile imports of research and development are over time and the knock-on effect this has on imports of business services. Business services accounted for 33 per cent of all service imports in Q1 2019, down from 44 per cent in the previous quarter. R&D, which is a component of business services, made up 8 per cent of total service imports in Q1 2019 down from 18 per cent in the previous quarter. The volatile nature of R&D imports, which is influenced by a small number of multinational corporations, can have a large impact on the overall level of imports and is one of the main causes of distortion in the Irish National Accounts.

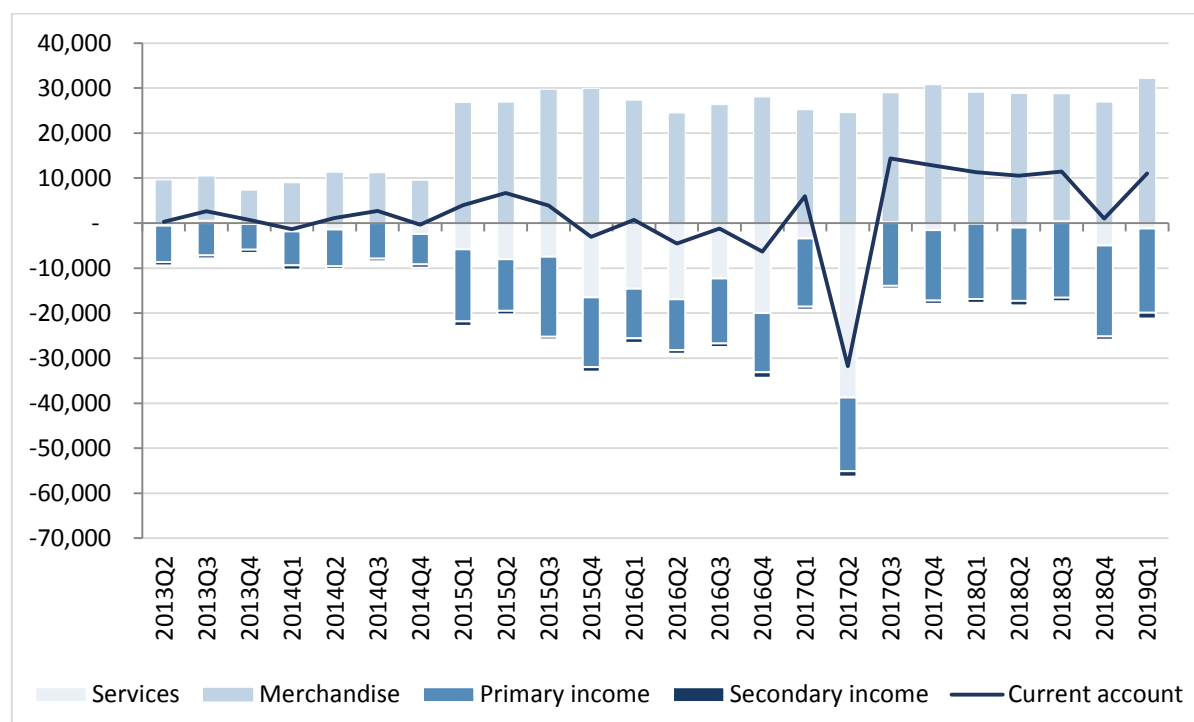
FIGURE 15 IMPORTS OF SERVICES BY COMPONENT (€ MILLION)



Source: Central Statistics Office.

Current Account

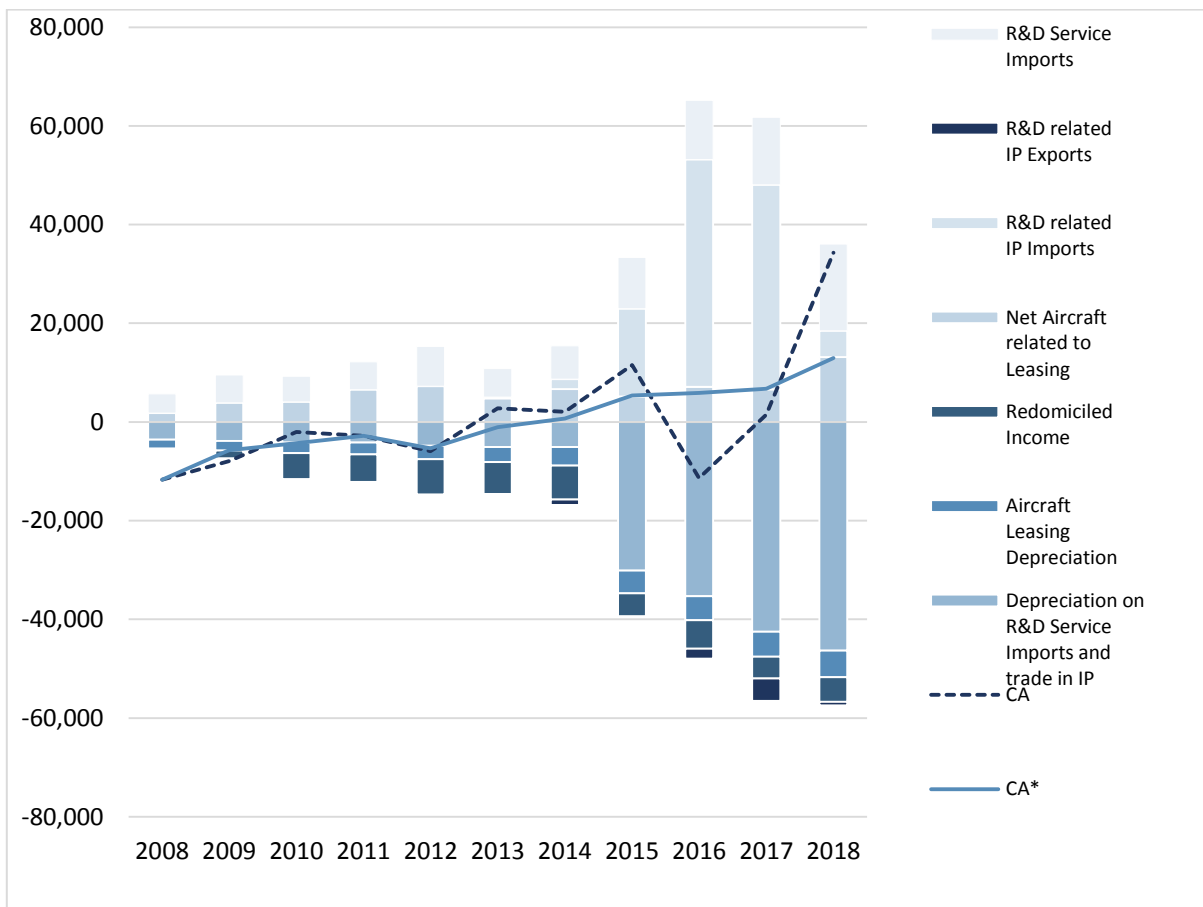
The Irish current account balance decreased to approximately €11 billion in Q1 2019 compared to €11.3 billion in the same period the previous year. This was primarily due to a worsening situation in the balance of primary income and services trade. This was offset somewhat by an increase of €300 million in the surplus of merchandise trade over the same period.

FIGURE 16 CURRENT ACCOUNT BALANCE (€ MILLION)

Source: Central Statistics Office.

In light of the well-publicised distortionary effects a small number of multinational firms have had on the Irish current account, the CSO produces a modified version of the current account on an annual basis. The purpose of the modified current account is to exclude transactions that have little tangible impact on the Irish economy and in turn to give a better understanding of the underlying trends in the resources generated in the domestic economy. In order to accomplish this, transactions relating to intellectual property, aircraft leasing and the related depreciation are excluded. The current account, the modified current account and the items causing distortion which are excluded from the modified current account are displayed in Figure 17. The current account and modified current account were both very similar until 2014 when the impact of R&D, intellectual property and aircraft related to leasing were not that significant. However, from 2015 onwards the size of these items, most notably depreciation on R&D imports and R&D related IP imports, began to increase significantly. In 2018 the modified current account balance stood at nearly €13 billion which was 62.3 per cent less than the headline current account figure.

FIGURE 17 MODIFIED CURRENT ACCOUNT BALANCE (€ MILLION)



Source: Central Statistics Office.

Exports are expected to grow by 8.8 per cent this year and then moderate to 6.3 per cent in 2020 due to the general consensus of a global economic slowdown next year. As a result of distortions from multinational activity we expect imports to increase by 20.3 per cent in 2019 and then to moderate to 8.0 per cent in 2020.

The Domestic Economy

Output

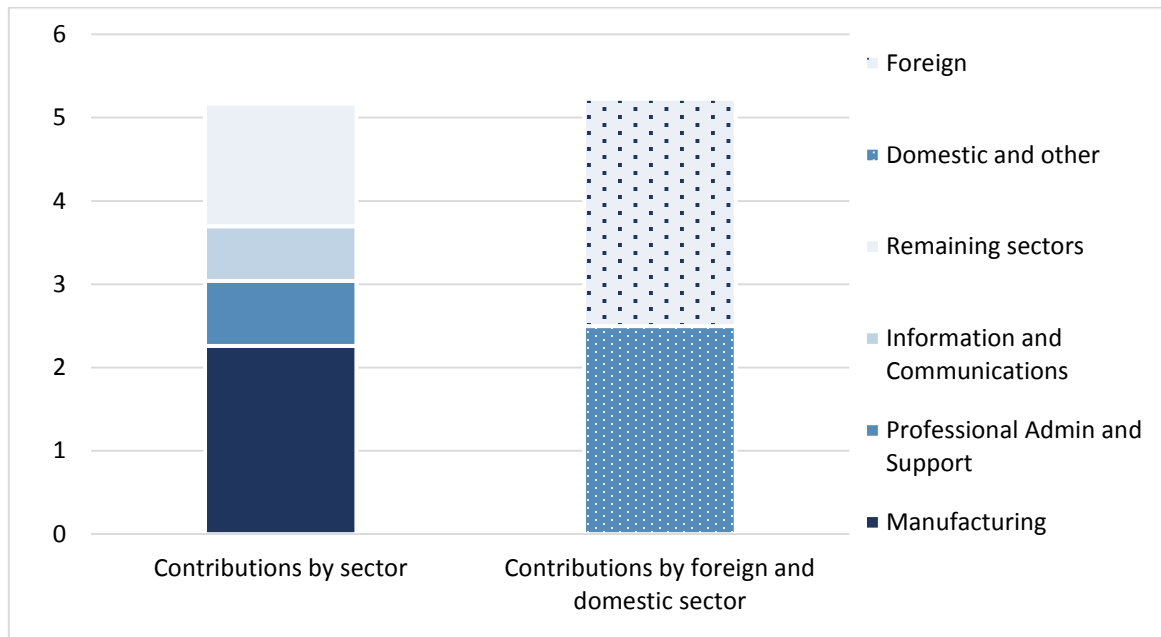
The domestic section of the *Commentary* is organised as follows; we initially review the outlook for output growth before discussing developments in the Irish monetary and financial sectors. Prices and earnings in the economy are then discussed, followed by a review of demand-side factors such as consumption and housing market issues. On the supply side, we then examine developments in investment and the labour market before concluding with an analysis of the public finances.

The CSO recently released its second ‘Productivity in Ireland’ publication which examines productivity in the Irish economy over the past 20 years. Changes in productivity are typically measured in terms of changes in gross value added. Additionally, productivity is also examined in terms of changes to gross output using the KLEMS approach,⁴ which draws heavily on historic ‘Supply and Use’ tables.

Over the period 2000 to 2017, gross value added in the Irish economy increased on an annual average basis by 5.2 per cent. Figure 18 summarises the contributions from different sectors. On a sectoral basis, 2.3 per cent of GVA growth was accounted for by Manufacturing. The second largest contributor to growth was the Professional, administrative and support services sector contributing 0.8 per cent to the GVA growth. Information and communication was third with a contribution of 0.7 per cent to GVA growth. Construction, which experienced significant volatility over the period, was the fourth largest contributing sector with a 0.1 per cent contribution to growth.

⁴ The KLEMS approach is used to measure changes in productivity based on changes in gross output. Both the factor inputs of capital (K) and labour (L) are measured as well as the intermediate inputs of energy (E), material (M) and services (S). For more see on this approach see: Jäger, K. (2016). ‘EU KLEMS Growth and Productivity Accounts 2016 Release, Statistical Module’. *Description of Methodology and Country Notes for Spain*.

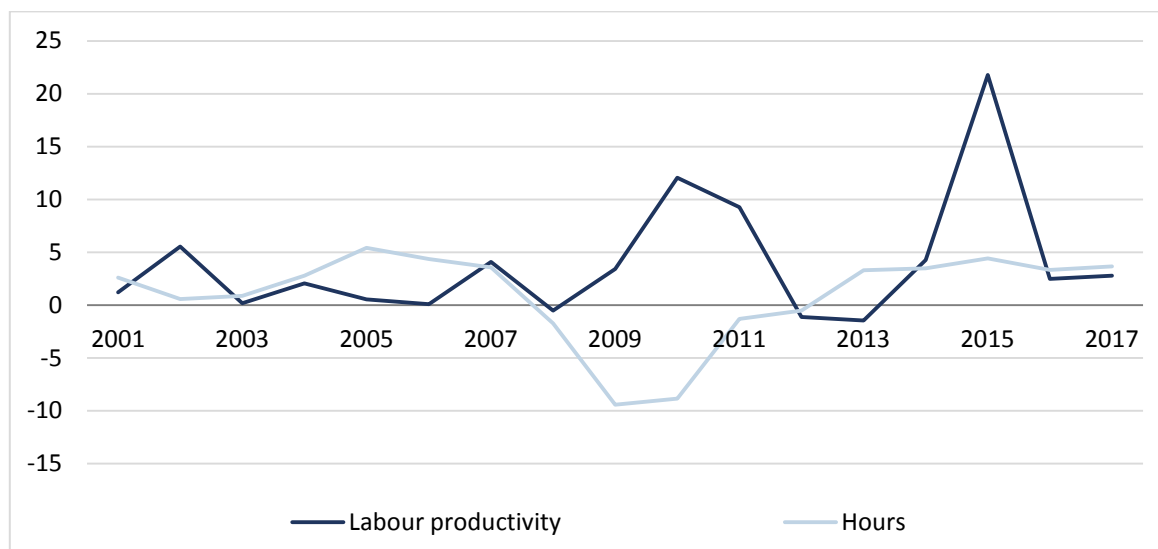
FIGURE 18 SOURCES OF OUTPUT GROWTH FOR THE IRISH ECONOMY, 2000-2017 (%)



Source: Central Statistics Office.

Labour productivity in the Irish economy increased on an annual average by 3.9 per cent over the period (see Figure 19). There was a gradual downward trend in labour productivity from 2000 to 2008; however after the financial crisis, there was a significant increase in labour productivity, mainly due to the fall in employment in the Construction and real estate, Transport and distribution, and Hotels and restaurants sectors. Initially, after the 2008 crisis, employers appeared to engage in labour hoarding, however there then followed a period of significant lay-offs particularly in the Construction sector. The extreme globalisation-related events of 2015 did result in a sharp increase in Irish labour productivity for that period.

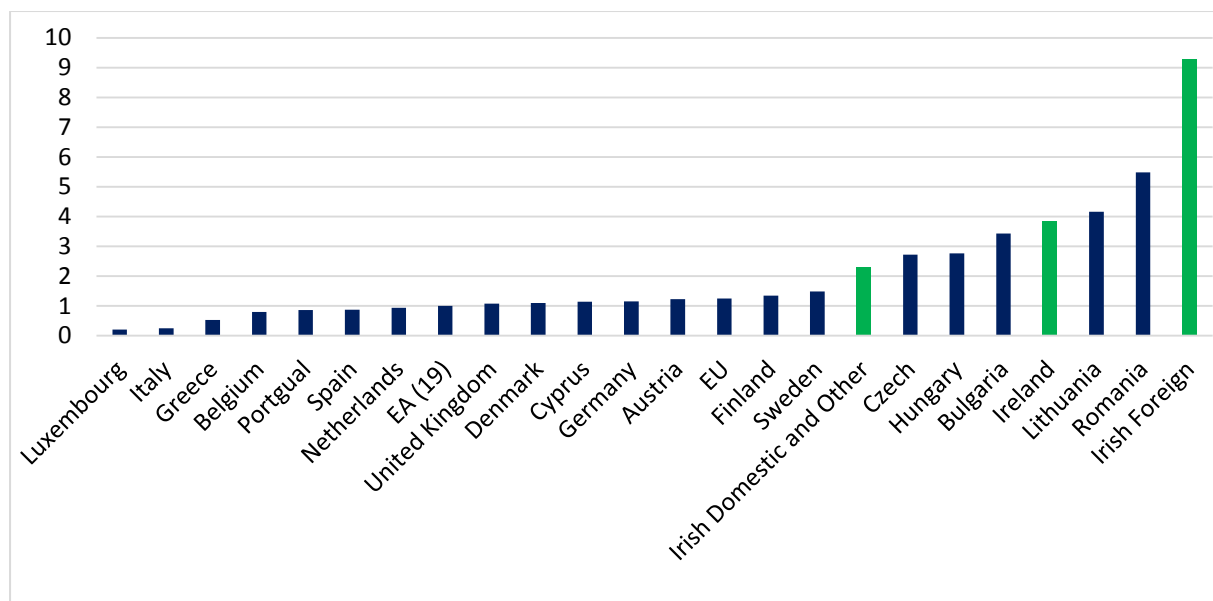
FIGURE 19 GROWTH RATE OF LABOUR PRODUCTIVITY AND HOURS WORKED IN IRELAND, 2000-2017 (%)



Source: Central Statistics Office.

Given the distortionary impact a small number of multinational corporations had on the Irish economy in 2015, in Figure 20 the annual average productivity rate is broken down for both the Irish domestic and foreign sectors and compared with other European countries. This provides a better understanding of the underlying level of productivity in the Irish economy. For Ireland as a whole, the average productivity rate was 3.9 per cent, compared with 1.25 per cent for the EU 28. However, the labour productivity rate for the domestic and other sector in Ireland was 2.3 per cent.

FIGURE 20 LABOUR PRODUCTIVITY ANNUAL AVERAGE GROWTH RATE 2000 TO 2017 (%)



Source: Eurostat.

The CSO recently also released a breakdown for gross value added (GVA) between the foreign (MNE) and domestic owned sectors (non-MNE) of the economy over the period 2013-2018. GVA at constant (2017) basic prices for the non-MNE dominated sectors of the economy increased by 3.9 per cent between 2017 and 2018. For the same period, the MNE sector increased by 13.9 per cent. Overall, GVA as a whole increased by 7.9 per cent. Table 1 summarises the increases in the MNE and non-MNE sectors over the period 2013 and 2018. For 2015, it is evident that when GVA growth was 26 per cent, the non-MNE sector still grew by 6.6 per cent.

TABLE 1 GROWTH RATE OF GROSS VALUE ADDED AT CONSTANT PRICES 2013 – 2018 (%)

	2013	2014	2015	2016	2017	2018
	Growth (%)					
Foreign-owned MNE dominated	-1.3	11.6	82.8	6.2	10.3	13.9
Other	2.5	6.0	6.6	3.6	4.8	3.9
Total	1.6	7.3	25.9	4.7	7.0	7.9

Source: Central Statistics Office.

For 2019 our baseline headline GDP growth rate has been revised upwards to 4.9 per cent with output expected to grow by 3.1 per cent in 2020. However, this revision reflects more the likely impact of certain multinational-related transactions than any increase in underlying domestic economic activity. Furthermore, if a No-Deal Brexit were to occur in late 2019 we believe the economy might only grow by 1 per cent in 2020.

MONETARY AND FINANCIAL AND INFLATION OUTLOOK

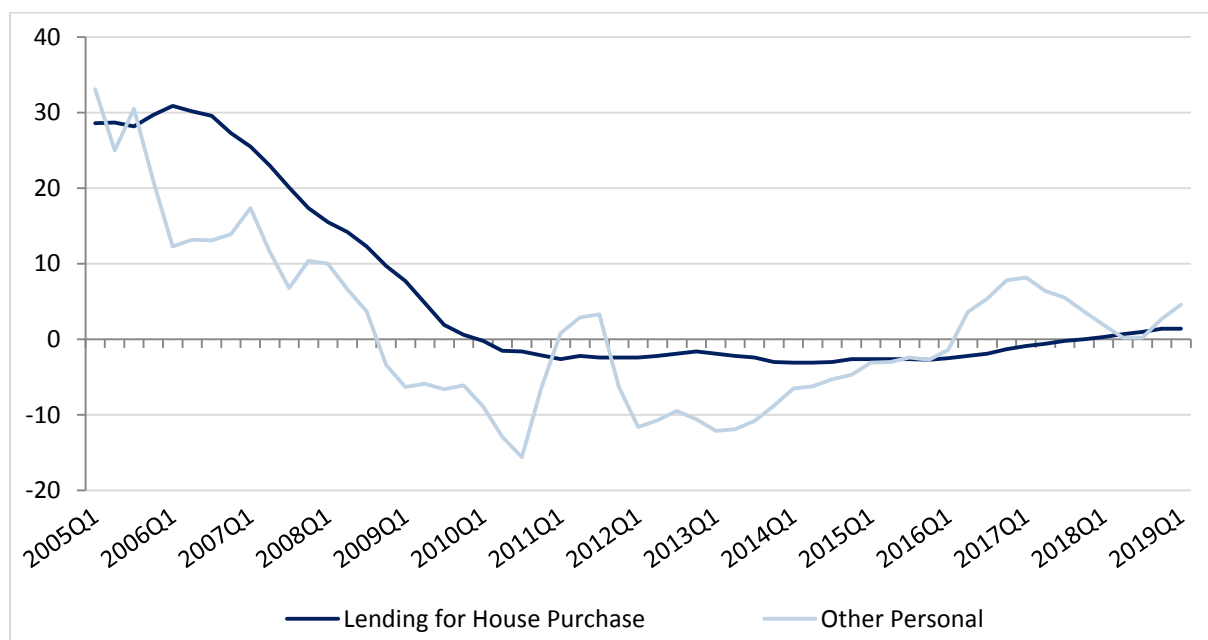
Household credit and mortgage market

While credit flows play an important role in allowing households to optimise their consumption patterns, they must be monitored closely as the build-up of large levels of credit can be detrimental to the financial stability of an economy. Figure 21 presents the annual growth rates of credit to households from Irish resident credit institutions.⁵ The data are split by loans for house purchase and other personal loans (auto finance, credit cards, student loans etc.). The growth rate in lending for house purchase was relatively modest at 1.4 per cent in Q1 2019 while credit growth for other personal loans continued to expand over the same period and now stands at 4.6 per cent on an annual basis. These rates

⁵ See CBI, 'Credit, Money and Banking Statistics: Private Household Credit and Deposits' A.18 for details.

remain significantly below the levels they were at before the financial crisis when credit growth in some quarters was in excess of 30 per cent.

FIGURE 21 GROWTH RATES OF CREDIT TO HOUSEHOLDS (%)

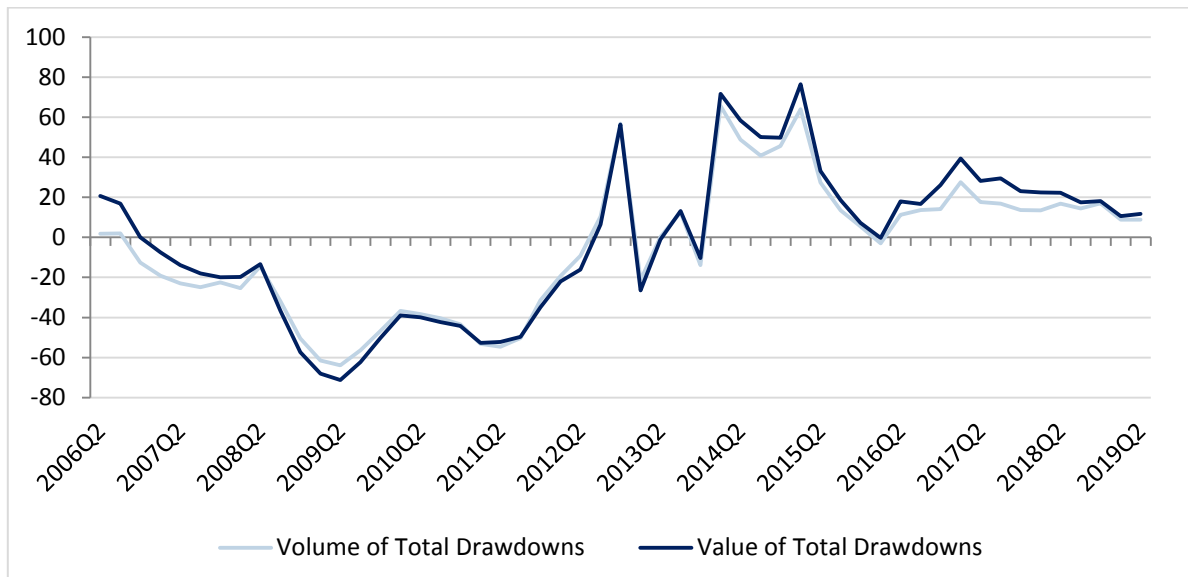


Source: Central Bank of Ireland, Credit, Money and Banking Statistics.

Notes: Data are taken from Central Bank of Ireland data release A.18, Growth rates series codes 777 and 1,252.

While the growth rate of new mortgage lending has been declining since Q2 2017, both the increase in the volume and value of drawdowns remains strong at 8.8 and 11.7 per cent respectively (Figure 22). In level terms the number of new mortgage transactions in Q2 2019 stood at just over 10,000 which is the highest number of drawdowns in the second quarter of a year since 2009. A moderation in the growth rate of mortgage credit is not unexpected given the high growth rates in 2017 as the market recovered. Furthermore, recent increases in house prices may present an affordability challenge for households looking to borrow within the current regulatory framework, particularly in urban areas. This is likely to dampen the growth in new mortgage lending.

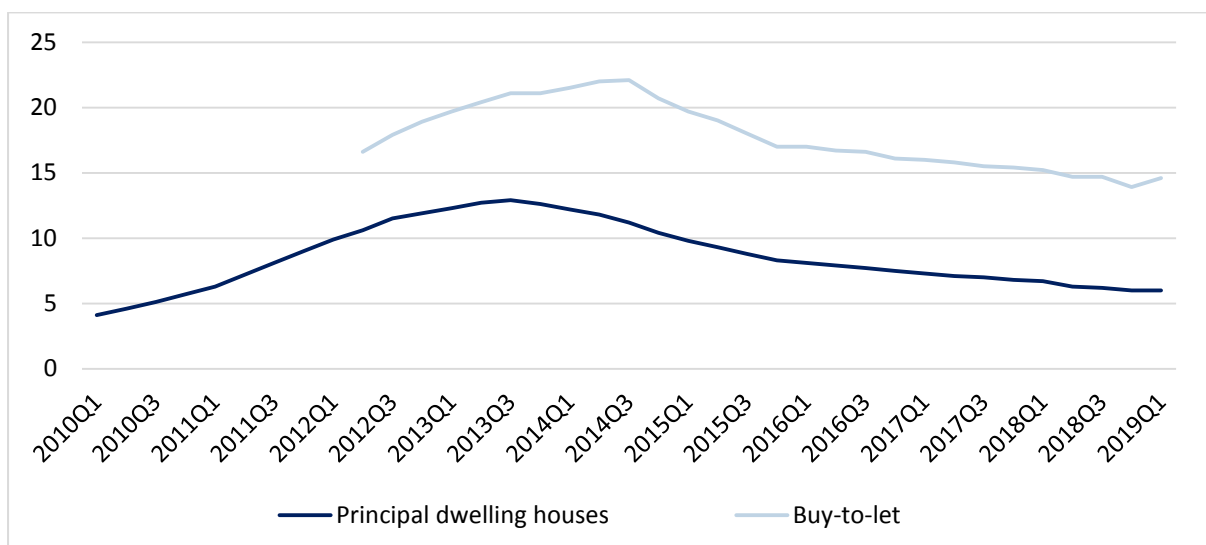
FIGURE 22 TOTAL NEW MORTGAGE LENDING (%)



Source: Banking and Payments Federation Ireland.

The payment arrears rate on mortgages and buy-to-let properties gives an indication of the sustainability of lending. The percentage of principal dwelling home loans in arrears has declined steadily since 2013, falling from a peak rate of 12.9 per cent in Q3 2013 to just over 6 per cent in Q1 2019 (Figure 23). Many of the loans still in arrears are the very long-term cases. Given the recent economic performance, it is unlikely these arrears cases will be cured by economic factors and will likely need restructuring or legal solutions to their impairment.

FIGURE 23 IRISH HOUSEHOLD MORTGAGE ACCOUNTS IN ARREARS BY TYPE OF LOAN (%)



Source: Central Bank of Ireland, Mortgage Arrears Statistics.

Notes: Loans are defined in arrears if they are greater than 90 days past due on their payments.

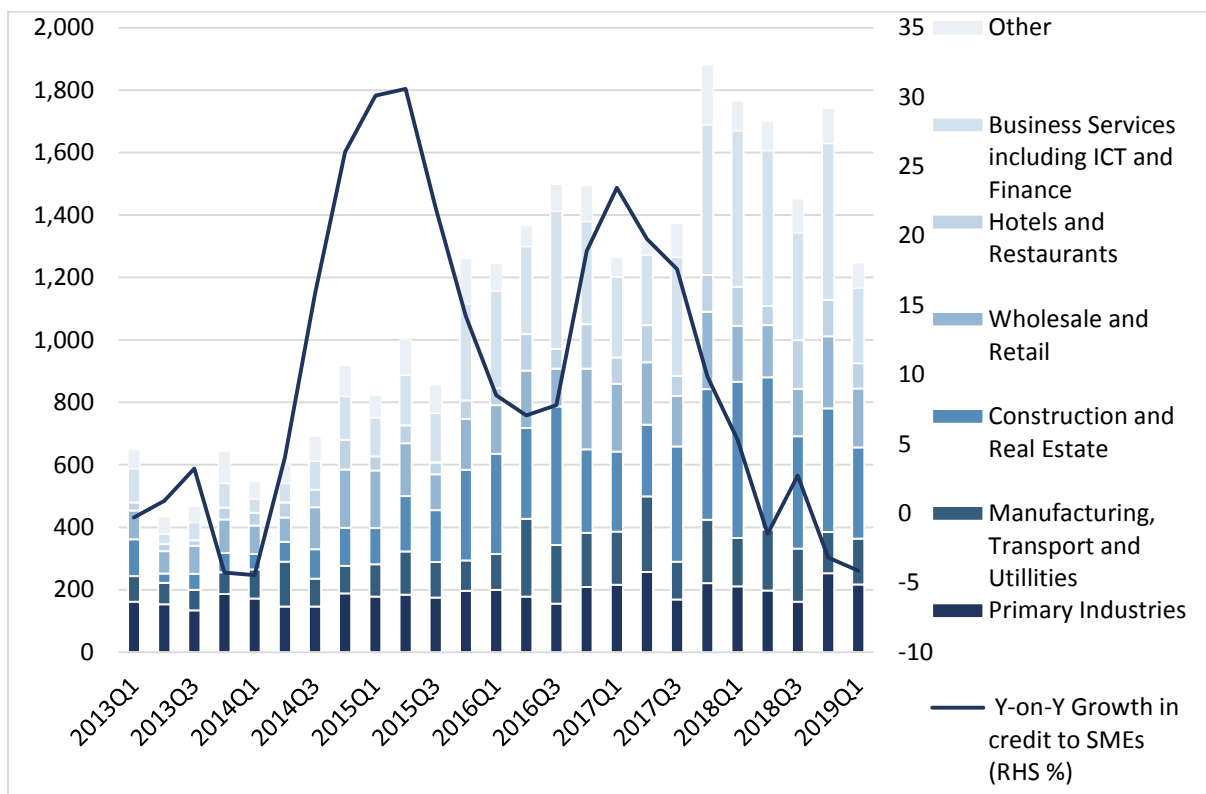
Trends in SME credit market

The allocation of credit to SMEs is an indicator of the health of the domestic economy and banking sector. It provides a gauge of both the willingness of credit providers to take on risk and the views of indigenous businesses to the suitability of market conditions for future investment. Figure 24 shows that from 2017 onwards there has been a fall in the growth rate of new lending to SMEs by Irish banks. As of Q1 2019 the growth rate of credit has declined to -4.1 per cent year-on-year. Given the robust performance of the economy over this period, the fall in new lending suggests there is increasing uncertainty among SMEs/banks. However, it should be noted that this data only contains lending to SMEs by the traditional banking sector. A recent report by the OECD has noted that globally there has been an increase in alternative lending to SMEs through platforms such as peer-to-peer lending and hire purchase.⁶ If SMEs are turning away from traditional bank lending towards these alternative methods of financing then bank lending may not give a true indication of SME activity. In Ireland, recent research has highlighted that many firms have considerable internal funds and these are being used to fund investment (Gargan et al., 2018).⁷ High levels of cash stocks are also likely to dampen credit demand. In terms of SME lending by sector, from Q1 2018 to Q1 2019 there were significant falls in new lending to Business services including ICT and finance (-52.0 per cent), Construction and real estate (-41.6 per cent) and Hotels and restaurants (-34.7 per cent). Over the same period there was an increase in lending to Wholesale and retail (+5.0 per cent) and Primary industries (+2.8 per cent).

⁶ OECD (2019). *Financing SMEs and Entrepreneurs 2019: An OECD Scoreboard*, OECD Publishing, Paris.

⁷ Gargan, E., M. Lawless, M. Martinez-Cillero and C. O'Toole (2018). 'Exploring SME investment patterns in Ireland: New survey evidence', *Quarterly Economic Commentary: Special Article*, Autumn 2018. Economic and Social Research Institute.

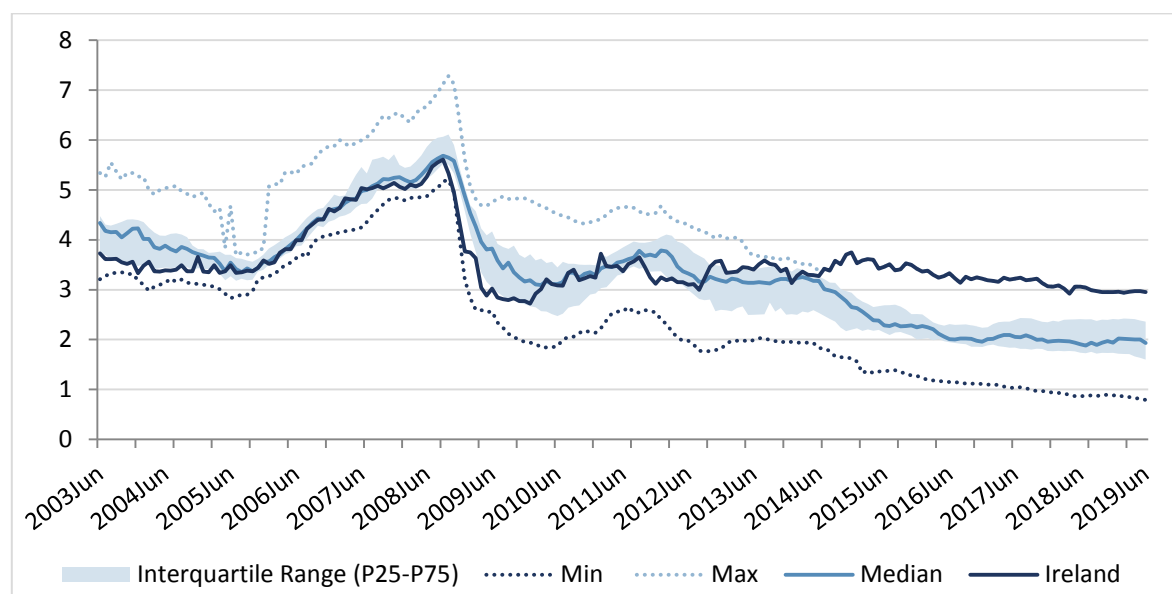
FIGURE 24 NEW LENDING TO SMES BY IRISH BANKS, TOTAL PER ANNUM (€ MILLION)



Source: Central Bank of Ireland, SME Credit Series, Table A.14.1.

Interest rates and the cost of finance

Figure 25 shows that the cost of finance for Irish households is relatively high compared to other Euro Area countries. This has been the case since 2014 when Irish interest rates started to increase despite the fact that they were beginning to fall in the Euro Area. As of June 2019 interest rates in Ireland were 2.9 per cent, which is over 100 basis points higher than the median rate in the Euro Area. Given the affordability issues in the Irish housing market, the comparatively high rates of borrowing exacerbate the challenges faced by Irish homeowners relative to their European peers.

FIGURE 25 INTEREST RATES ON NEW HOUSE PURCHASE LOANS TO HOUSEHOLDS, EURO AREA COMPARISON (%)

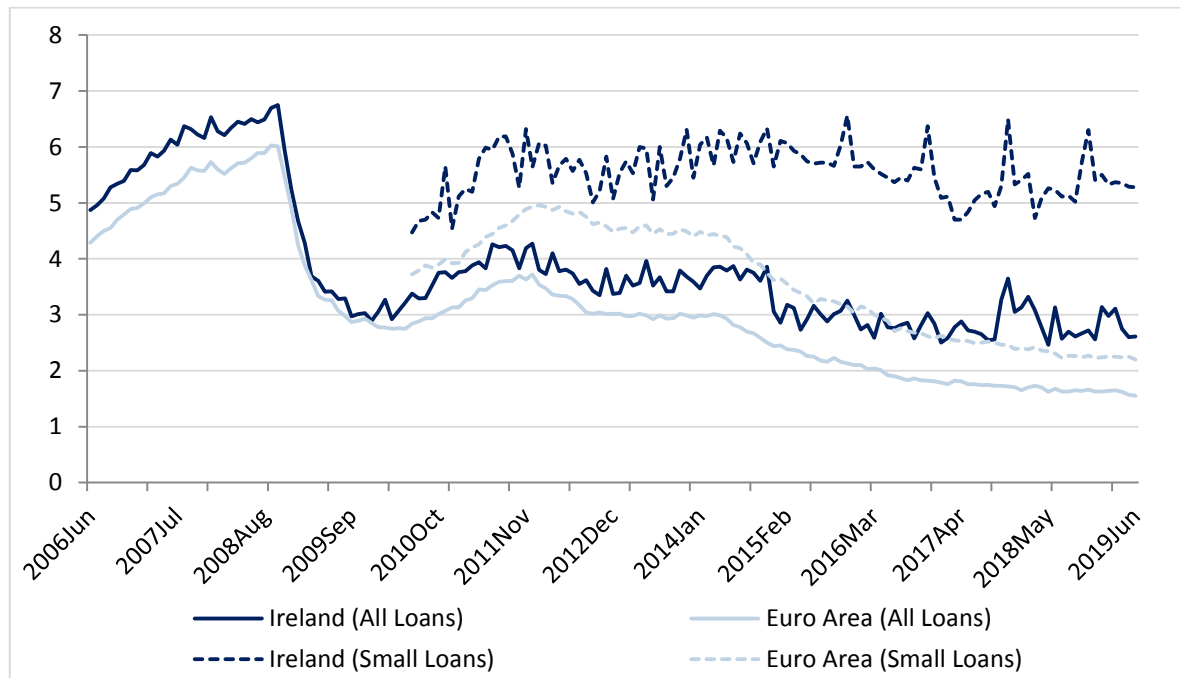
Source: Central Bank of Ireland, SME Credit Series, Table A.14.1.

Notes: Countries included are: AT, BE, EE, ES, FI, FR, IE, IT, LT, NL, PT, SI. These countries are selected due to data availability. Data differ between this chart presented and the text as the ECB comparison data include restructured mortgages whereas the new business SVR is only for new drawdowns.

Similar to interest rates on mortgages, interest rates on corporate loans in Ireland are also high relative to other Euro Area countries. Figure 26 presents the interest rates on new business loans for Non-Financial Corporations in Ireland as well as the median rate for the Eurozone. Two series are shown: 1) covering all loans and 2) covering loans worth less than €250,000, the latter of which is used as a proxy for loans to SMEs. In June 2019 the average interest rate for all loans in Ireland was 2.6 per cent compared to just 1.6 per cent in the Euro Area. The difference was even greater for small loans which had an average interest rate of 5.3 per cent in Ireland and 2.2 per cent in the Euro Area.

Given the common monetary policy across Euro Area countries, the relatively high interest rates faced by Irish consumers and businesses may be explained by structural dissimilarities in the banking system. These include differences in risk appetites and regulatory differences, particularly with regard to repossessions. Another commonly cited reason is the lack of competition among retail banks, owing partly to the increased concentration of retail banks in the Irish market following the financial crisis.⁸

⁸ See: Nevin, C. (2018). 'Irish retail bank profitability 2003-2018', *Financial Stability Notes*, Vol. 2018, No. 10, Central Bank of Ireland.

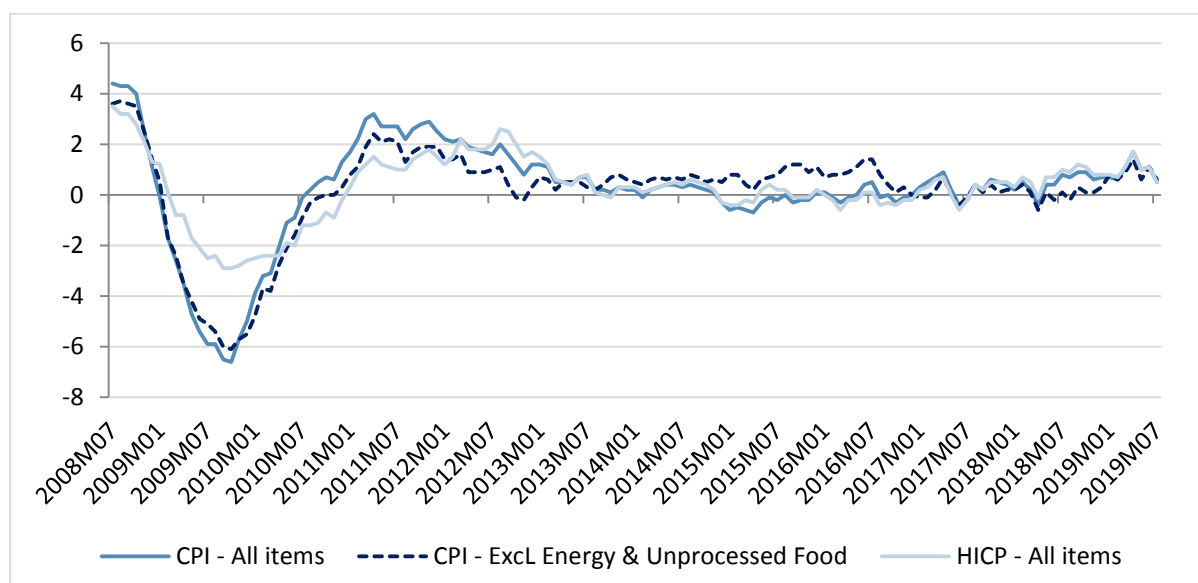
FIGURE 26 INTEREST RATES ON NEW CORPORATE LOANS, EURO AREA COMPARISON (%)

Source: ECB MFI data. Small loans refer to loans worth less than €250,000.

Inflation outlook

Figure 27 presents the inflation rate in Ireland using CPI, the CPI excluding energy and unprocessed foods (core inflation), and HICP. Despite an environment of low unemployment and increasing earnings, price inflation has been relatively subdued in 2019. In July 2019, the 12-month inflation rate was 0.5 per cent for both CPI and HICP. Core inflation, which does not include energy prices or unprocessed food, was slightly higher at 0.6 per cent over this period. Over the same period there were increases in the prices of alcohol and tobacco (+2.5 per cent), restaurants and hotels (+2.3 per cent), education (+1.7 per cent), and health costs (+0.8 per cent). Elsewhere, sectors which experienced deflation over the 12-month period were communications (-6.8 per cent), furnishings, household equipment and routine household maintenance (-3.8 per cent), clothing and footwear (-1.6 per cent), transport (-1.2 per cent) and food and non-alcoholic beverages (-0.5 per cent).

Box 1 in the *Commentary* explores how the strong EUR/GBP rate that has prevailed since the Brexit referendum in 2016 may be keeping Irish inflation subdued. This phenomenon is known as exchange rate pass-through and is a measure of the extent to which cheaper import prices are passed on to consumers when the domestic currency increases in value relative to the origin country.

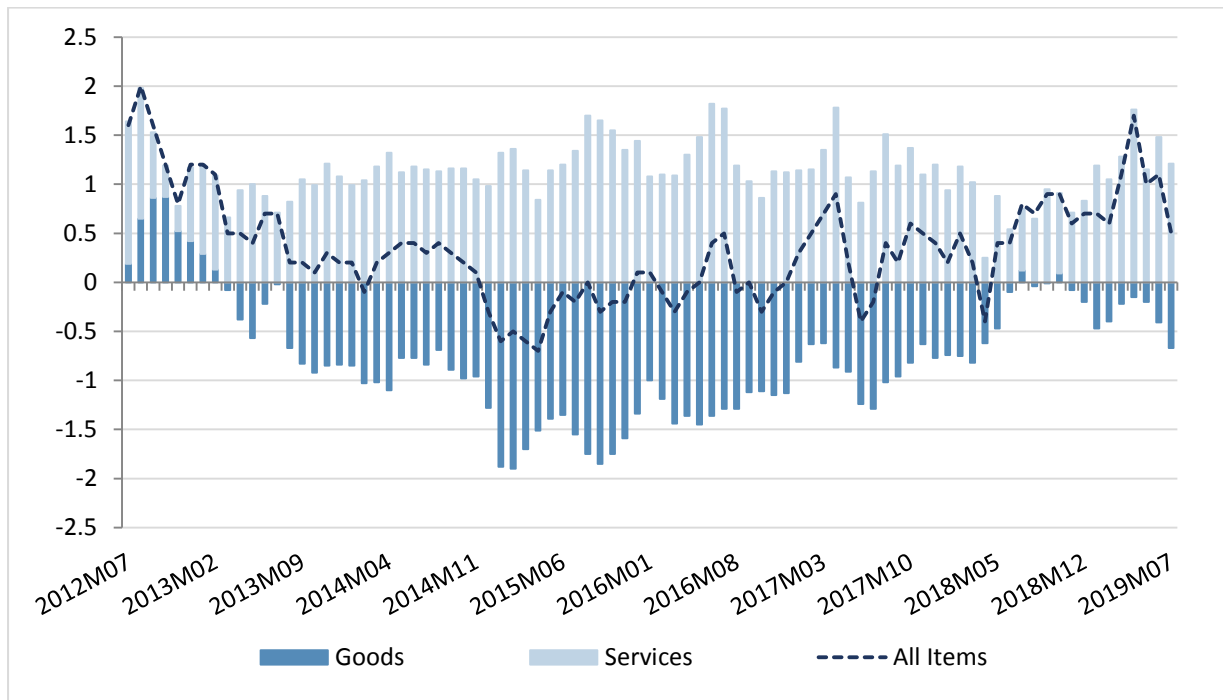
FIGURE 27 ANNUAL GROWTH IN INFLATION (%)

Source: Central Statistics Office.

The trends in price growth of goods and services have been pulling in opposite directions since 2013. Figure 28 shows that while the annual price of services has been increasing each month over the past six years, over the same period goods prices have generally been falling. It is this deflation in the price of goods that has kept the overall inflation rate subdued. There are a number of factors which may help explain the difference in price growth between goods and services. These include a greater level of competition in the goods sector, which has been enhanced by increased globalisation and international trade. There has also been a faster rate of growth in labour productivity in manufacturing relative to market services over the past number of decades.⁹

⁹ For further discussion see Ferrara, L. (2019). 'What is behind the change in the gap between services price inflation and goods price inflation?', *Economic Bulletin*, Issue 5, ECB, 2019.

FIGURE 28 DECOMPOSITION OF ANNUAL CPI GROWTH INTO GOODS AND SERVICES GROWTH (%)



Source: Central Statistics Office.

As the economy grows and the labour market continues to tighten, price growth is expected to increase over the next two years. Consumer prices are expected to rise by 1.1 per cent in 2019, followed by a 1.4 per cent increase in 2020.

BOX 1 EXCHANGE RATE PASS-THROUGH – EUR/GBP

Following the result of the Brexit referendum on June 24, 2016, the value of the euro (EUR) rose significantly against the British pound sterling (GBP). While on June 23, the EUR/GBP rate was 0.77, by June 27 (the first full trading day after the result) it had appreciated to 0.83. As of July 2019 the rate has risen to 0.90, 16 per cent higher than it had been on the day of the referendum.

Goods from the UK make up over 20 per cent of the total value of Irish goods imports and an appreciation in the EUR/GBP rate, which makes these imports cheaper, is likely to impact the overall rate of Irish inflation. The extent to which fluctuations in foreign exchange rates impact on consumer prices is known as exchange rate pass-through (ERPT).

There are two channels through which ERPT can impact the price levels of consumer goods and services, directly and indirectly. (i) When the value of the domestic currency appreciates (depreciates) against the origin country the price of imported final consumer goods will become less (more) expensive. (ii) The fall (rise) in the price of imported goods

for the production process due to an appreciation (depreciation) of the domestic currency. This results in a fall (rise) in cost to domestic producers, some of which may be passed on to consumers in the form of cheaper (more expensive) products/services.

In order to see how fluctuations in the EUR/GBP exchange rate impact on Irish inflation we estimate the exchange rate pass-through using monthly data from January 2000 to April 2019. We use a regression model similar to that implemented in the existing literature by Campa and Goldberg (2005) and Gopinath (2015) among others. The model is given as:

$$\Delta p_t = \alpha + \sum_{k=0}^T \beta_k \Delta f_{t-k} + \gamma \Delta X_t + \varepsilon_t$$

where Δp_t is the monthly log change in the Irish Consumer Price Index (CPI), Δf_{t-k} is the monthly log change of the EUR/GBP exchange rate in period t-k. The control variables ΔX_t include both the monthly log change in the UK's producer price index and the monthly log change in the average earnings for UK workers. Together these variables are used as a proxy for the production costs faced by UK exporters. As these variables could be correlated with the exchange rate, omitting them could bias the coefficient on the variable of interest. The model was estimated using OLS after conducting stationarity checks on each variable.¹⁰ The initial estimation includes no lags and estimates the contemporaneous level of pass-through each month. As the transmission of exchange rates to prices can take a number of periods before the full effect is realised, we also estimate the model including lags of three and 12 months respectively, as per Campa and Goldberg (2005). The ERPT is thus the sum of the coefficients on all lags, the results of which are presented in Table A.

TABLE A REGRESSION ESTIMATE RESULTS

Dependent Variable	Δp_t	
	Coefficient	P> t
ERPT (0 Lags)	-0.031	0.061
ERPT (3 Lags)	-0.114	0.000
ERPT (12 Lags)	-0.185	0.009

Source: QEC Authors' Analysis.

The negative sign on the coefficients is as expected given the underlying theory that an appreciation in the domestic currency relative to the origin country should result in a fall in inflation in the domestic economy. The interpretation of this coefficient is that a 10 per cent appreciation in the EUR/GBP rate yields a 1.1 and 1.9 per cent decrease in

¹⁰ We ran a Dickey Fuller test on all of the time series in order to test for a unit root. We find there to be a trend in all series and conclude that they are non-stationary. By taking the first differences both series are made stationary and we conclude they are all integrated of order 1. In order to test for cointegration we use the Engle Granger test and fail to reject the null hypothesis of no cointegration.

Irish CPI in the short and long run respectively. These results are statistically significant at the 1 per cent level. A similar study by Rice and Reddan (2017) using VAR methodology found ERPT from a 10 per cent change in the EUR/GBP rate to be about 1.5 per cent for Irish inflation over 12 months.

Given the strong value of the euro relative to sterling over the past three years, these results suggest that Irish inflation has been subdued relative to what it may have been had the UK not voted to leave the EU. In order to illustrate this we use the long-run result in Table A to provide a counterfactual of Irish CPI under a number of different historical and hypothetical exchange rate scenarios. The results of this experiment are presented in Table B. All else being equal, the Irish CPI would be 2.5 per cent higher than its actual level in July 2019 if the pre-Brexit exchange rate prevailed. If the strong sterling seen pre-financial crisis still prevailed then CPI would be 4.9 per cent higher, while if there was parity between the two currencies then the CPI would be 2.1 per cent lower.

This result has implications going forward as the outcome of Brexit is likely to have a significant bearing on the future direction of the EUR/GBP rate which, as we have shown, will have a considerable impact on Irish inflation.¹¹

TABLE B SCENARIO ANALYSIS

	EUR/GBP Rate	CPI (base Dec 2011 = 100)
Current (July 2019)	0.90	103.5
Pre-Brexit (May 2016)	0.78	106.1
Pre-Financial Crisis (Jan 2007)	0.66	108.6
Post-Crisis (Jan 2009)	0.92	103.1
Parity	1.00	101.4

Source: Eurostat, QEC Authors' Analysis.

References:

Campa, J. and L. Goldberg (2005). 'Exchange rate pass-through into import prices', *The Review of Economics and Statistics*, 87(4), 679-690.

Dornbusch, R. (1987). 'Exchange rates and prices', *American Economic Review*, 77, 93-106.

Forbes, K., I. Hjortsoe and T. Nenova (2017). 'Shocks versus structure: explaining differences in exchange rate pass-through across countries and time', Discussion Papers 50, Monetary Policy Committee Unit, Bank of England.

¹¹ It should be noted that were a 'No-Deal Brexit' to materialise there would likely be increased trade costs that would be passed on to Irish consumers. Lawless and Morgenroth (2018) estimate that in the event of a No-Deal Brexit, Irish CPI could increase by as much as 3.1 per cent due to an increase in tariffs and non-tariff barriers. This in turn could counteract the downward pressure on inflation from an increase in the EUR/GBP rate.

Gopinath, G. (2015). 'The International Price System', NBER Working Papers 21646, National Bureau of Economic Research, Inc.

Krugman, P. (1987). 'Pricing to Market When the Exchange Rate Changes', in Arndt, S.W. and J.D. Richardson, *Real-Financial Linkages among Open Economies*, Cambridge, Mass.: MIT Press.

Lawless, M. and E. Morgenroth (2018). 'Brexit and Irish consumers', Special Article, *Quarterly Economic Commentary*, March, Economic and Social Research Institute.

Reddan, P. and J. Rice (2017). 'Exchange Rate Pass-Through to Domestic Prices', Economic Letters 08/EL/17, Central Bank of Ireland.

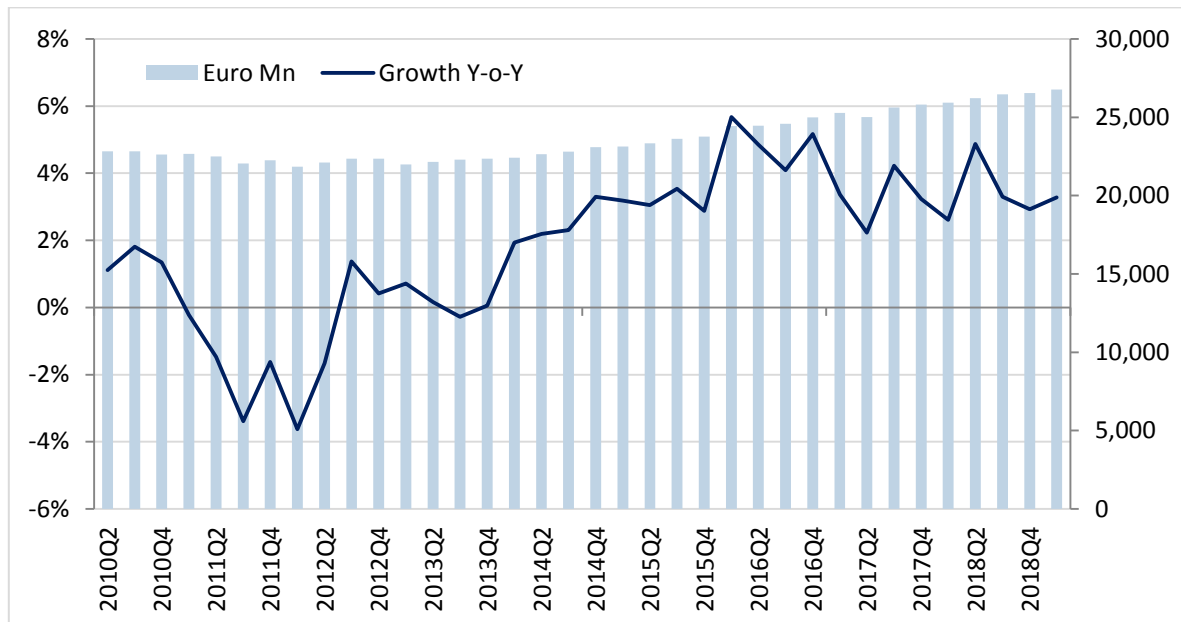
This Box was prepared by Matthew Allen-Coghlan.

DEMAND

Household sector consumption

According to the latest quarterly National Accounts, personal consumption expenditure increased by 3.3 per cent year-on-year in Q1 2019. This represents an increase in the pace of growth from Q4 2018 and is at odds with the downward trend in consumer sentiment over the same period. The continued strong growth in household spending has likely been driven by lower unemployment rates and increasing disposable incomes. While uncertainties abound internationally, the domestic economic performance in Ireland has ensured that many households have experienced improved incomes and better labour market outcomes.

FIGURE 29 QUARTERLY PERSONAL CONSUMPTION ON GOODS AND SERVICES – CONSTANT MARKET PRICES AND SEASONALLY ADJUSTED



Source: Central Statistics Office.

To get an insight into what is driving household spending patterns we draw on the detailed retail sales data. Retail sales is an important input into understanding household behaviour as it measures actual spending and is available in a timely manner. Table 2 presents the annual growth in retail sales volume for select items for the three months to July 2019. The second quarter information on retail sales gives a more up-to-date picture than the Q1 National Accounts data.

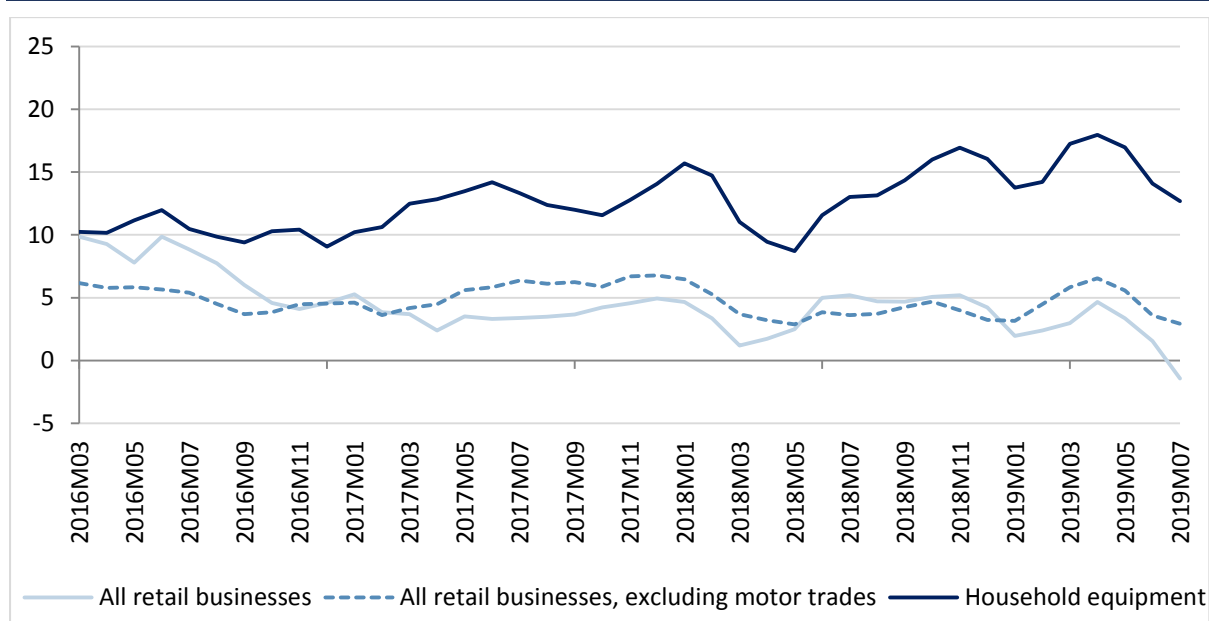
The retail sales data provide a more subdued picture of housing spending, with an actual decline recorded in July year-on-year. Overall retail sales fell by 1.4 per cent. This was mainly driven by a pull-back in sales in the motor trade; retail sales excluding the motor trade rose modestly at 2.9 per cent. Sales of furniture and lighting goods grew considerably, up 13.3 per cent year-on-year, which is likely due to the strong growth in housing market activity. However, there was a 4.5 per cent fall in retail sales from department stores.

TABLE 2 GROWTH IN SELECT RETAIL SALES (VOLUME) ITEMS, THREE MONTHS TO JULY 2019

Retail Business - NACE REV 2	Volume of Sales Annual % change
Motor trades	-8.69
Non-specialised stores (excluding department stores)	2.73
Department stores	-4.51
Clothing, footwear and textiles	0.06
Furniture and lighting	13.25
All retail businesses	-1.43
All retail businesses, excluding motor trades	2.93

Source: Central Statistics Office.

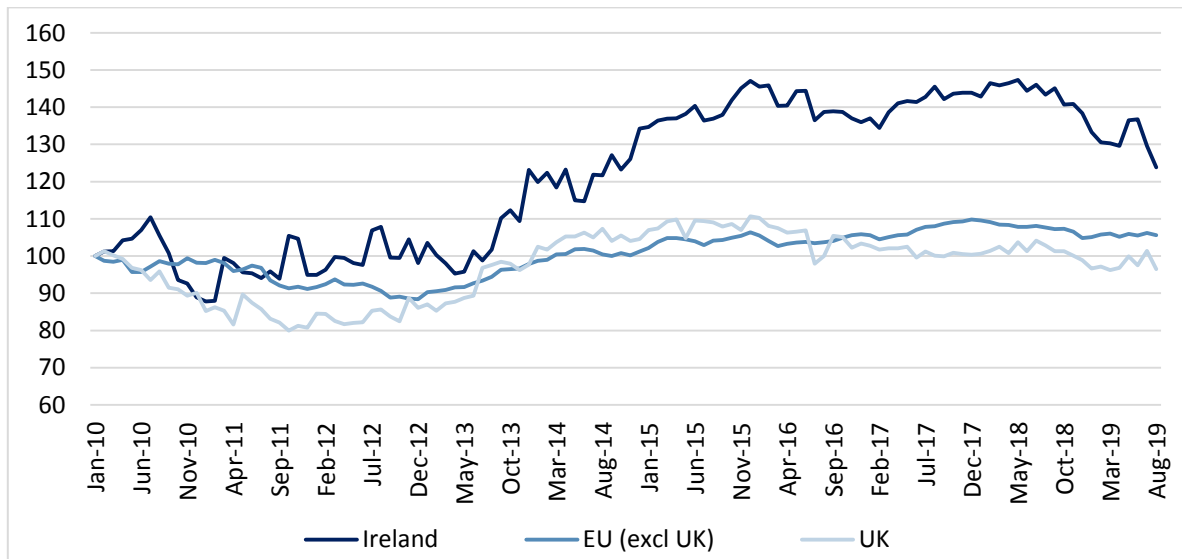
The overall trends in retail sales are displayed in Figure 30. This chart presents a three-month rolling average of annual growth of total retail sales, sales excluding the motor trade, and sales for household equipment. While the March and April data indicated an acceleration in the trend across all three series, it is clear that, throughout the second quarter and into July, the growth rate has fallen back. The fall in the growth rate is evident even excluding the motor trade.

FIGURE 30 ANNUAL GROWTH IN RETAIL SALES INDEX, VOLUME ADJUSTED, THREE-MONTH ROLLING AVERAGE (%)

Source: Central Statistics Office.

Another important indicator which provides insight into household spending is consumer sentiment. Figure 31 presents an index developed using the European Commission data on consumer sentiment. The figure presents data for Ireland, the UK and the rest of the EU to provide context.

FIGURE 31 CONSUMER SENTIMENT INDICATORS – IRELAND, UK AND REST OF EU (JANUARY 2010 BASE = 100)



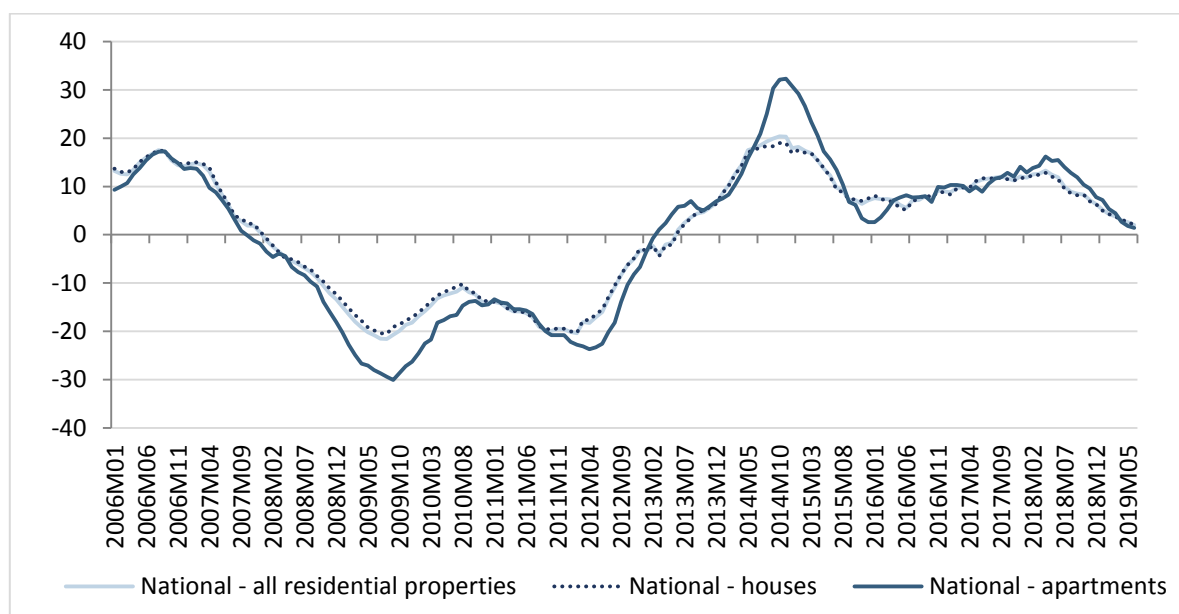
Source: European Commission data and ESRI calculation.

Note: The positive/negative balances from the EU COF series are transformed by adding 100. We then set the base to 100 in January 2010 with growth relative to this point i.e. $((Y_t/Y_{Jan2010}) - 1) * 100$.

While the initial Brexit delay from the end of March deadline was associated with a bounce in sentiment in April 2019, this has been short-lived. Irish consumer sentiment has fallen through the summer months and now stands at its lowest level since early 2014. Given the developments in the UK, and the increased likelihood of an adverse No-Deal outcome for Brexit discussions at the end of October, it appears that Irish households are becoming more pessimistic. This is likely to restrain spending and may dampen household’s willingness to make investments. Other factors such as broader international uncertainties may also be playing a role in lowering households’ spending sentiment. The combination of worsening consumer sentiment and softer retail sales growth suggests a moderation of consumption spending in the second half of the year is likely. As the uncertainty around Brexit continues, it is likely that this weakness will persist.

Property market developments

Property price growth has continued to decelerate into 2019, following the downward trend which began in mid-2018. The rate of growth is currently at its lowest point since mid-2013. Figure 32 plots the year-on-year changes in residential property prices by property type. In June 2019, the annualised growth rate in property prices was 2 per cent, a marked slowdown from the growth rate witnessed a year previously of over 11 per cent.

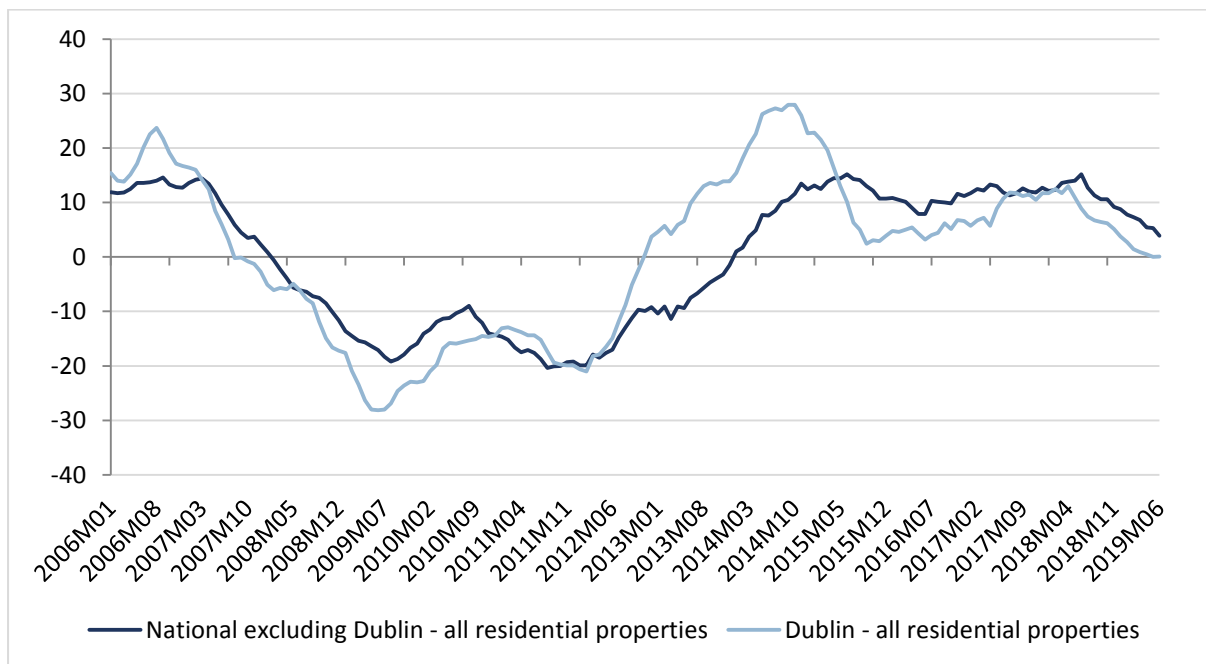
FIGURE 32 ANNUAL RESIDENTIAL PROPERTY PRICE GROWTH BY DWELLING (%)

Source: Central Statistics Office.

In the previous *Commentary* (Summer 2019), a number of potential factors were discussed for this weakening house price growth. These included the increased level of housing completions as well as affordability constraints arising from the mortgage lending limits of the Central Bank of Ireland. Recent house price data suggests a continued moderation in house price growth, albeit at a slower rate of change than earlier in 2019. Given the rapid deceleration in prices over the past number of months, it is highly plausible that property prices may fall by the end of 2019.

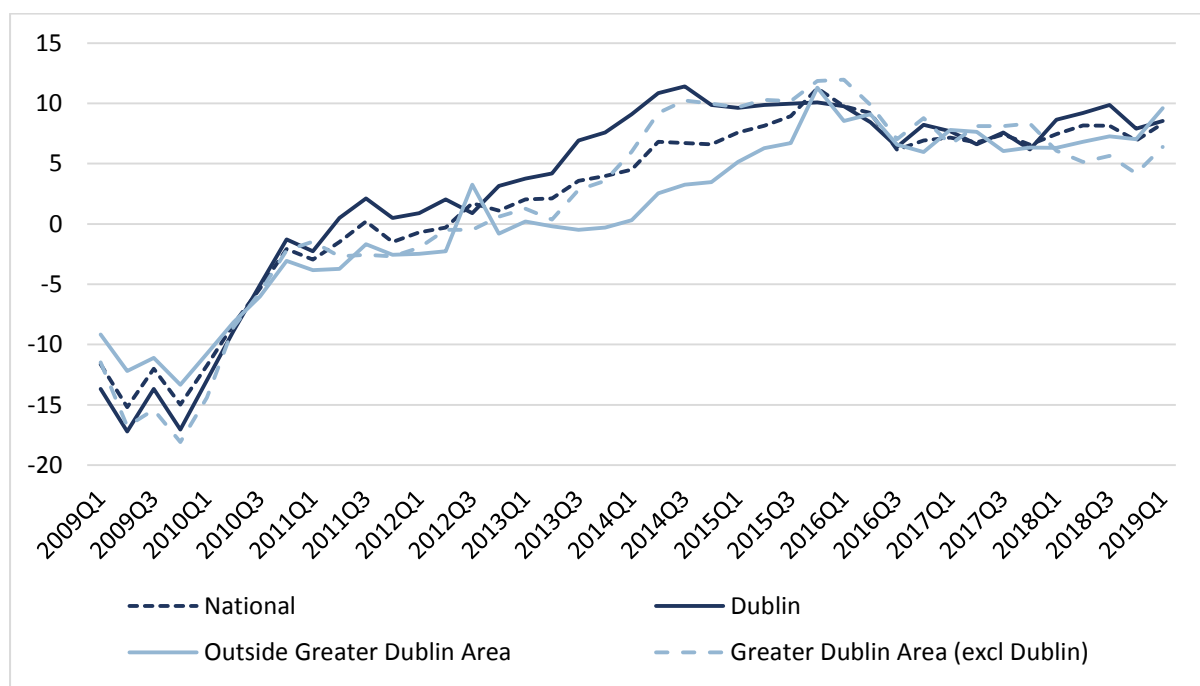
Comparing Dublin to the rest of the country (Figure 33), it is clear that the moderation in price growth has been more acute in the capital city. Over Q2 2019, the price index has remained virtually unchanged relative to the same period the previous year. Property price growth in the rest of the country has been slowing in a less pronounced manner than in Dublin since the second half of 2018 and this has continued into 2019. As of June 2019, the year-on-year growth rate was 3.9 per cent in the rest of the country, down 13 percentage points since June 2018.

FIGURE 33 ANNUAL RESIDENTIAL PROPERTY PRICE GROWTH BY REGION (%)



Source: Central Statistics Office.

While property price growth has clearly moderated, rent levels continue to rise across the country. In Q1 2019, the National Rent Index grew by just over 8.3 per cent relative to the same period the previous year. This represents an acceleration relative to Q4 2018. As well as the national index, the ESRI/RTB Rental Index also produces indicators at a regional level, namely for Dublin, the Greater Dublin Area (GDA) and outside of the GDA. The indices are presented in Figure 34. Rents in Dublin grew by 8.6 per cent year-on-year in Q1 2019, while rents in the GDA and outside the GDA grew at 6.4 and 9.6 per cent respectively over the same period. Increases in the rent level across the country are expected to continue as the level of housing supply fails to meet the country’s structural demand.

FIGURE 34 RTB RENT INDEX – NATIONAL, DUBLIN, GDA AND OUTSIDE OF GDA (%)

Source: Residential Tenancies Board (RTB).

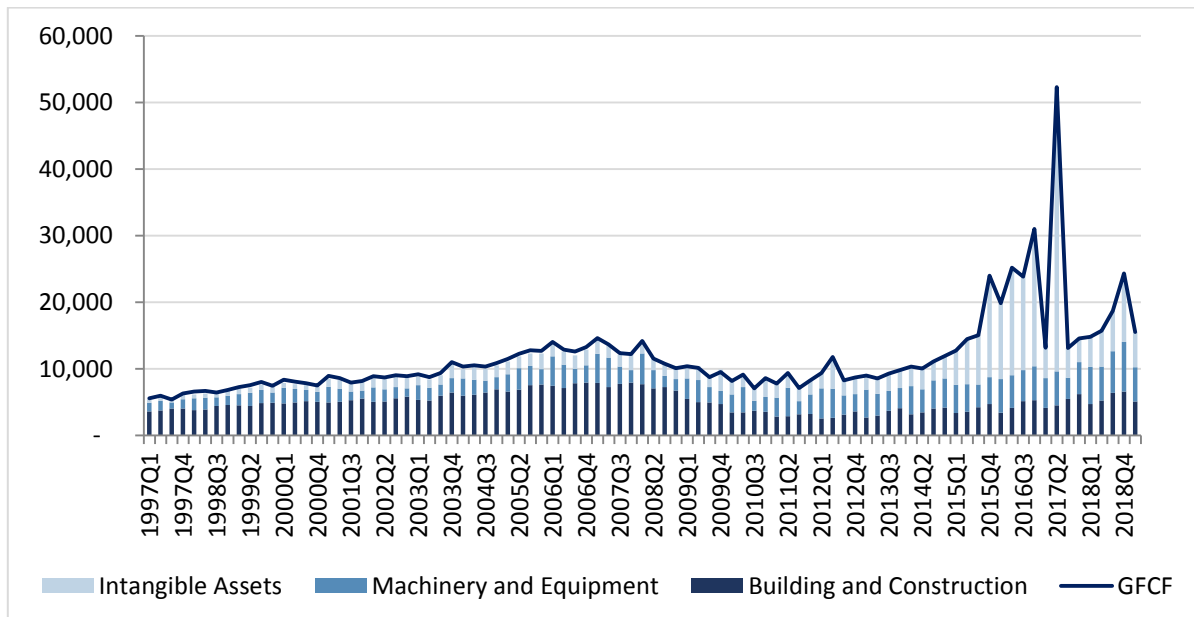
SUPPLY

Investment

Given its irreversible nature, capital investment is highly affected by uncertainty. In our previous *Commentary*, we noted the strong negative correlation between international uncertainty and investment in Ireland. In the current environment, with uncertainty elevated, businesses are likely to be limiting their level of capital spending.

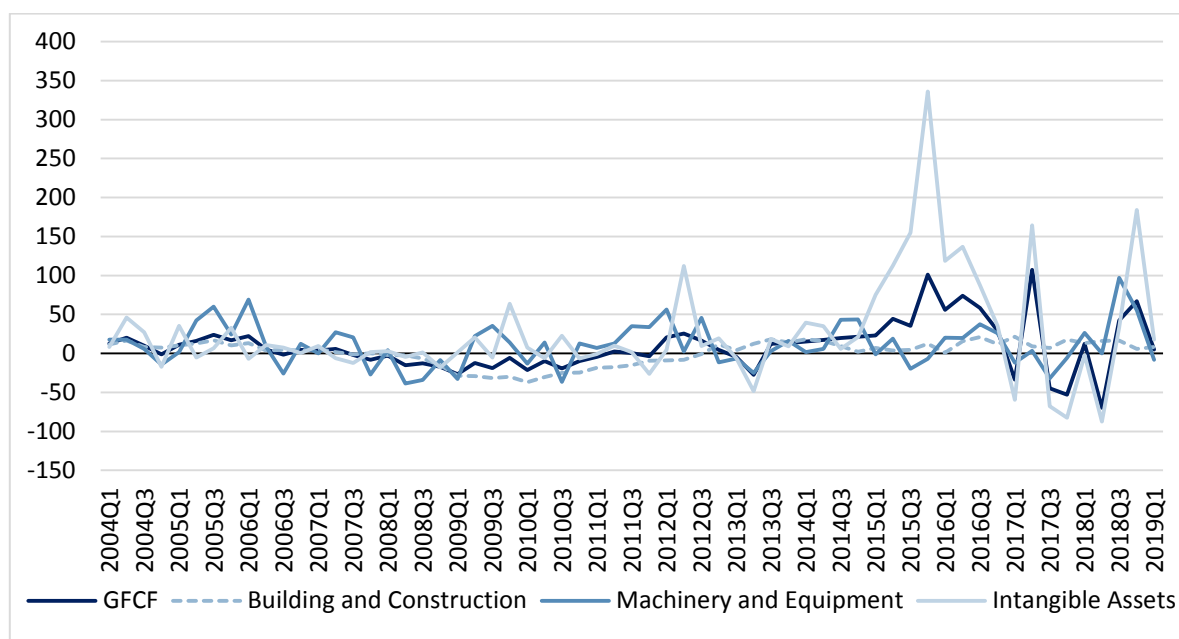
For the latest quarterly data available, Q1 2019, total gross fixed capital investment stood at €15.5 billion (Figure 35). This is down on the previous quarter but above the level from the same period the previous year.

FIGURE 35 GROSS FIXED CAPITAL FORMATION (€ MILLION)



Sources: Central Statistics Office and QEC analysis.

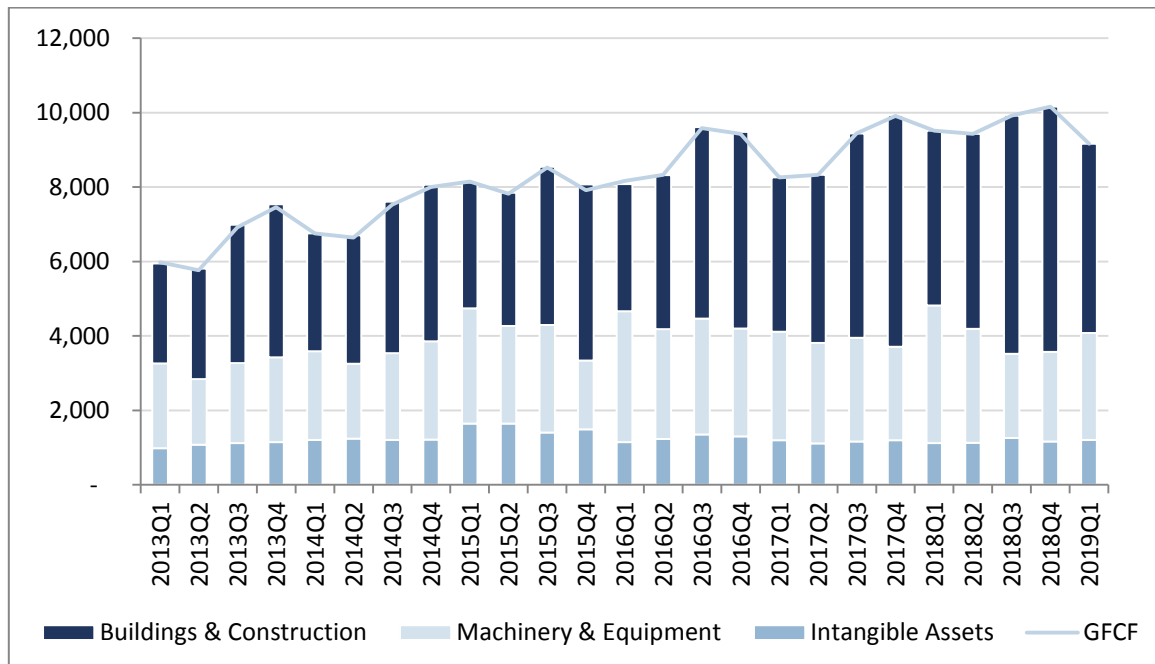
The growth rate of investment (year-on-year) is presented in Figure 36. Overall, investment grew by 5 per cent in Q1 2019. This is considerably lower than the growth rate of 67 per cent seen in Q4 2018 and 42 per cent in Q3 2018. This series displays considerable volatility reflecting multinational activity in machinery and equipment and intangible assets. Building and construction activity, which is not distorted by multinationals, grew by 8 per cent year-on-year to Q1 2019, 2 percentage points higher than Q4 2018. Investment in machinery and equipment fell by 8 per cent year-on-year in Q1 2019, down from 55 per cent in Q4 2018.

FIGURE 36 GROSS FIXED CAPITAL FORMATION GROWTH, YEAR-ON-YEAR (%)

Sources: CSO and QEC analysis.

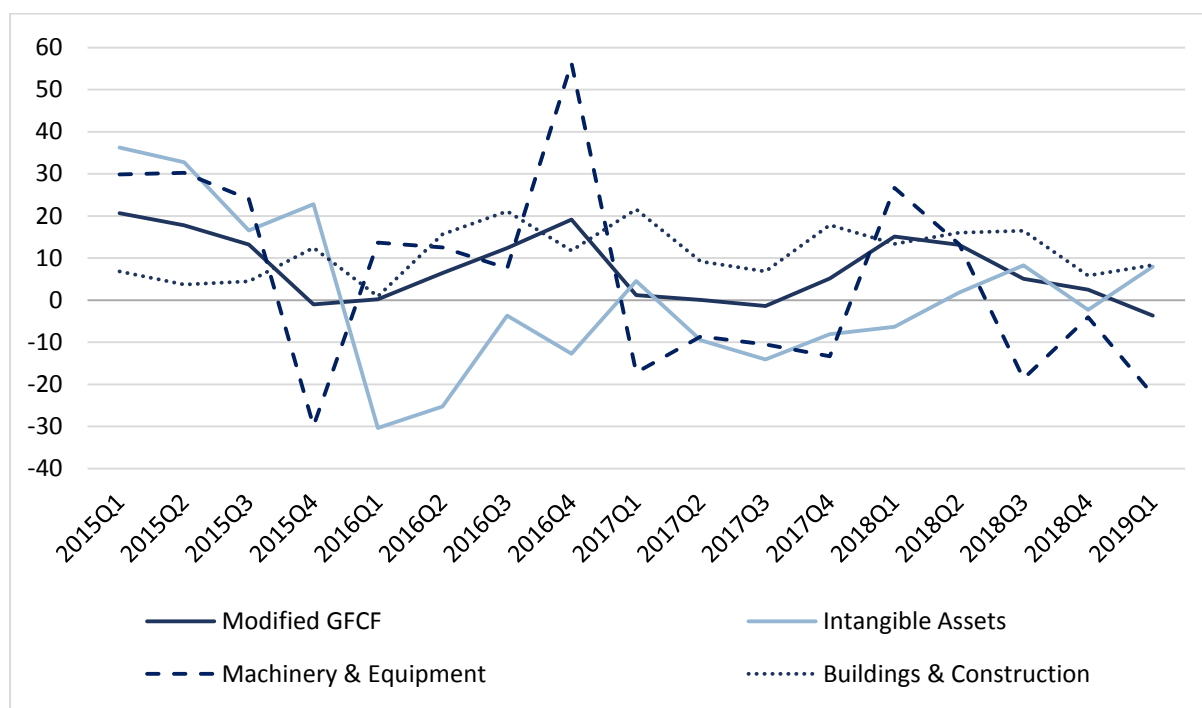
Given the distortions from multinational activity in particular asset classes, it is informative to review the CSO's modified Gross Fixed Capital Formation, which adjusts for the effects of trade in aircraft by aircraft leasing companies and the importation of intellectual property. The adjusted figures overall and for building and construction, intangibles and machinery and equipment are presented in Figure 37. It can be seen that the adjusted data display a much smoother growth pattern with an upward trend evident from mid-2015 onwards. In the most recent period (Q1 2019), overall modified investment fell to €9.165 billion, down from over €10 billion in the previous quarter. The difference between total and modified investment is approximately €6 billion which highlights the scale of the distortionary investment by multinationals.

FIGURE 37 MODIFIED GROSS FIXED CAPITAL FORMATION (€ MILLION)



Sources: CSO and QEC analysis.

The trend in the year on-year growth rate of modified investment is presented in Figure 38. The overall fall in investment was 4 per cent in the year to Q1 2019. Underneath the headline figure, there was an 8 per cent increase in both intangibles and building and construction. Machinery and equipment investment declined by 22 per cent on a year-on-year basis to Q1 2019. Our previous *Commentary* noted that machinery and equipment is very sensitive to uncertainty. Given the ongoing developments in relation to Brexit as well as the developments with the US-China trade dispute, it is likely that the slowdown in machinery and equipment is linked to a hesitancy amongst companies to invest until the parameters governing the future trading environment between the UK and EU as well as the US and China become clearer. The deterioration in the growth outlook in Europe and the US may also be leading to lower investment.

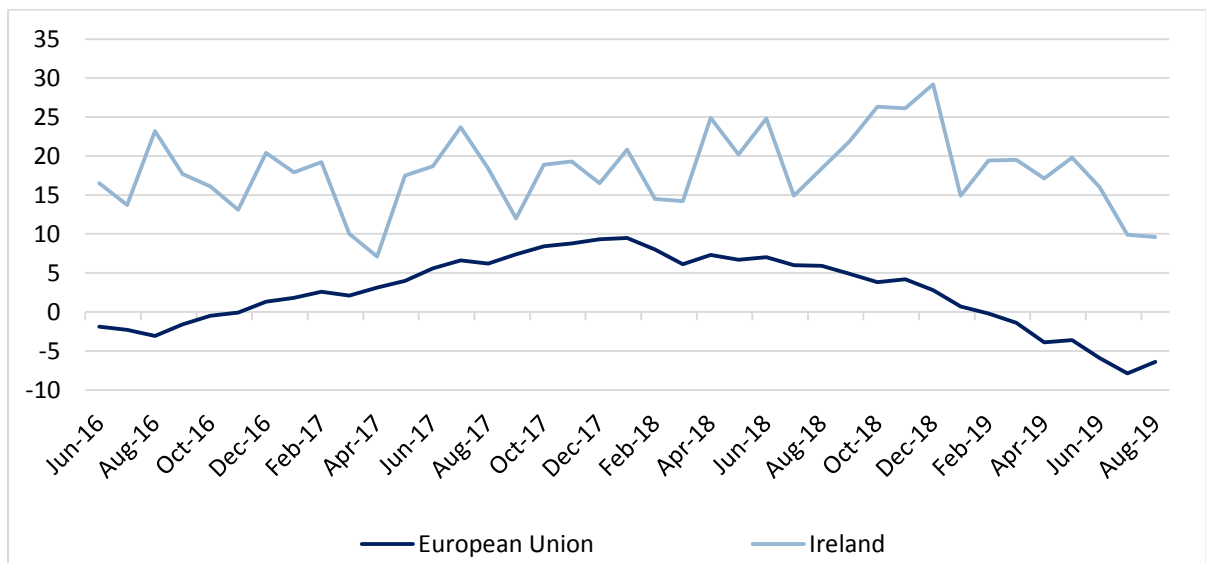
FIGURE 38 MODIFIED GROSS FIXED CAPITAL FORMATION GROWTH, YEAR-ON-YEAR (%)

Sources: CSO and QEC analysis.

Business sentiment

To gain more insight into the degree to which businesses are being affected by uncertainty, we draw on the European Commission Business Confidence Indicators. The overall confidence indicator for Ireland and the average for the European Union are presented in Figure 39. This indicator is the average of the positive/negative survey response balance to three sub-questions on the order book levels, stock holdings and production expectations over the coming three months. Positive numbers indicate that more companies perceive an improvement in conditions while negative numbers indicate a worsening in the economic outlook. While Ireland posts more favourable conditions than the EU average, it is clear that since December 2018 there has been a reduction in the number of companies viewing the outlook positively. This has occurred concurrently with a similar trend for the EU as a whole. It is likely that such a reduction in confidence is weighing on investment spending.

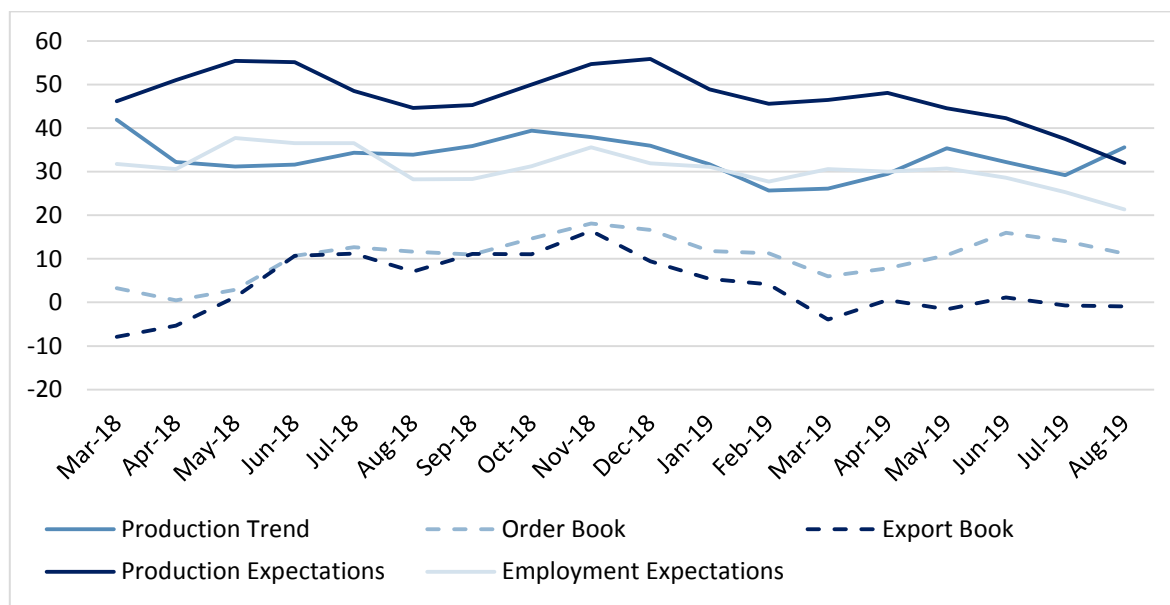
FIGURE 39 EUROPEAN COMMISSION BUSINESS CONFIDENCE INDICATOR



Source: European Commission.

A more granular review of the specific concerns of companies can be gleaned from considering the sub-indices which are built into the overall confidence indicator. Figure 40 presents the trend in the sub-indices covering the following issues; production trends, assessment of the order book levels, assessment of the export order book levels, production expectations, and employment expectations. The interpretation of these indicators is identical to that for the headline metric. Since April 2019, production expectations have softened as have views on the strength of order books (overall and export). As the trend in current production has been more stable, this likely reflects the fact that firms are factoring uncertainty into their future projections which is leading to a reduction or postponement of certain investment.

FIGURE 40 ROLLING AVERAGE FOR INDIVIDUAL ITEMS FROM EUROPEAN COMMISSION BUSINESS SENTIMENT FOR IRELAND

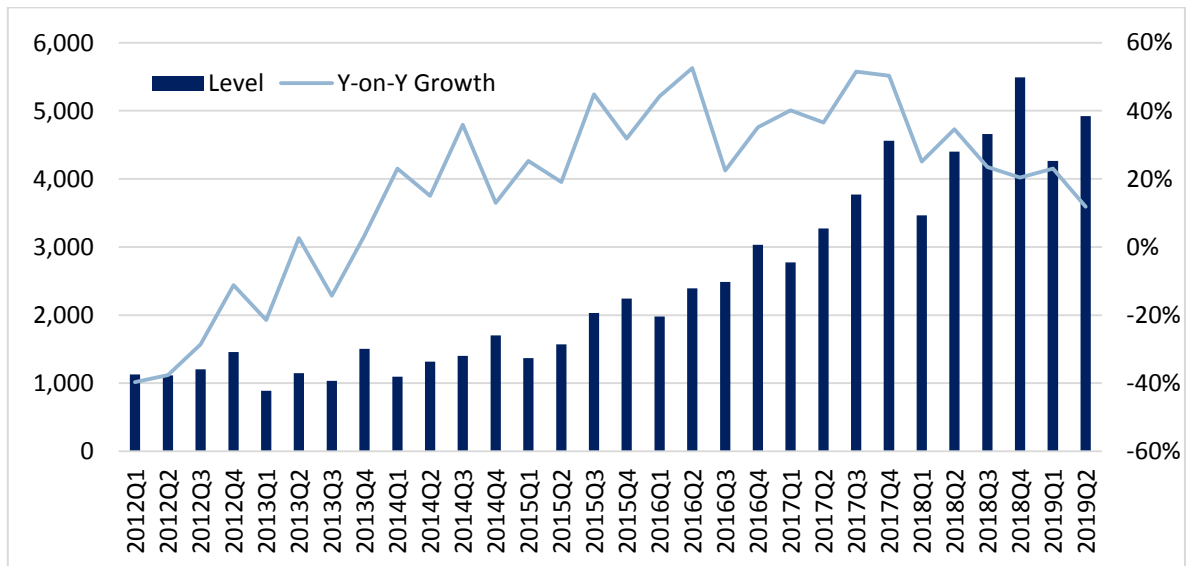


Source: QEC analysis of European Commission data.

Construction outlook

Construction sector investment has grown strongly in recent years with growth rates of over 20 per cent per annum through 2016 and into 2017. However, more recently the growth rate has moderated, as noted above. Figure 41 presents the trend in housing completions on a quarterly basis over the period Q1 2012 to Q2 2019. While completions rapidly increased over the period 2016 and 2017, it is clear there has been a slowdown in growth since the start of 2018. Given the very high growth rates in the recovery phase (2014-2016), it is not unexpected that a moderation would occur.

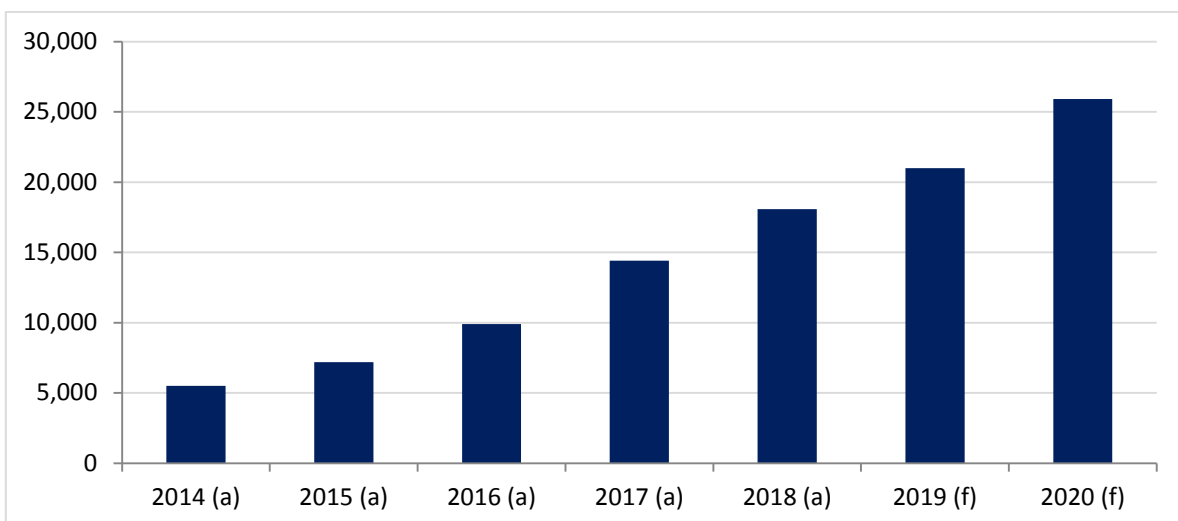
FIGURE 41 HOUSING COMPLETIONS (ESB CONNECTIONS) – QUARTERLY LEVEL AND YEAR-ON-YEAR GROWTH



Sources: Central Statistics Office.

However, the slowdown in the growth rate of completions in Q2 2019, to 12 per cent per annum, makes it unlikely that our previous forecast outturn of 23,500 units for 2019 will be reached. This is despite the expanded commitment by the Government to increase the capital spend in housing (particularly related to the delivery of social and affordable units). Consequently, we have moderated our forecast for 2019 to 21,000 units. Our growth rate for 2020 suggests a completions level of just over 25,000 units next year (Figure 42). However, should any adverse economic shock occur, for example from a hard Brexit, this may further slow completions next year.

FIGURE 42 ANNUAL HOUSING COMPLETIONS (2014-2018 ACTUAL: 2019-2020 FORECASTS)



Sources: Central Statistics Office and QEC Forecasts.

Construction forecasts

As global risk factors and the Brexit negotiations continue to weigh on business planning, we have moderated our underlying investment outlook for 2019 and 2020. However, strong construction activity and increased public investment are likely to be key drivers of domestic capital formation, despite the recent noted slowdown. Overall we expect annual average growth in investment of 45.1 per cent in 2019 due to distortionary multinational activity, falling to 4.6 per cent in 2020. Given the degree of uncertainty surrounding Brexit, coupled with the international slowdown, it is likely that the investment outturn could be much weaker than expected.

LABOUR MARKET

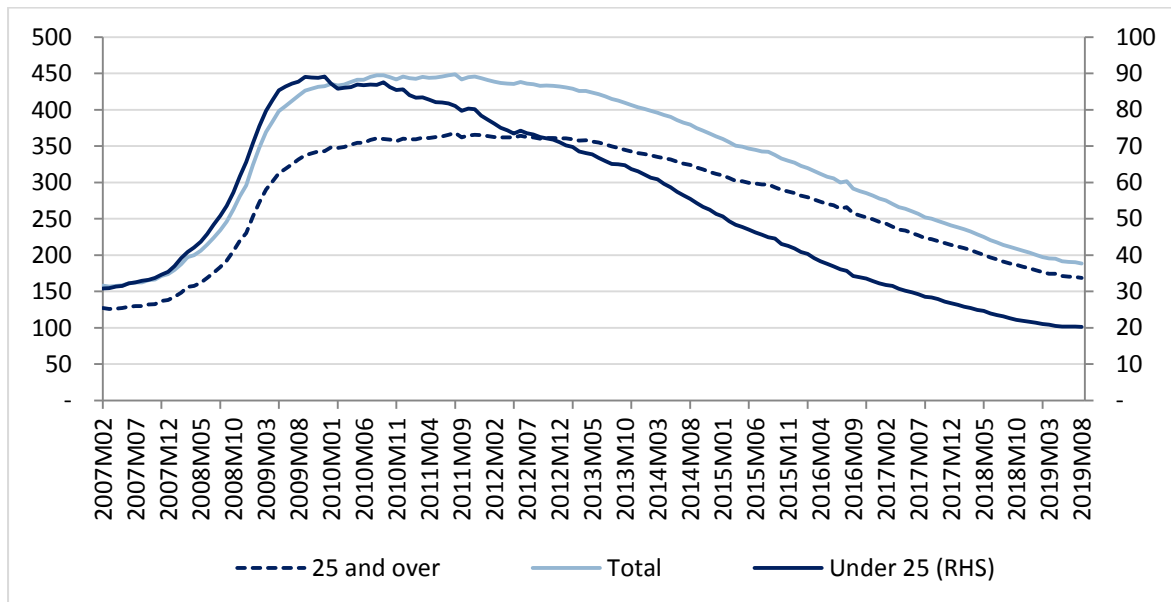
Consistent with the robust performance of the domestic economy, conditions in the Irish labour market continue to improve. While the unemployment rate has stabilised in 2019, there remains a strong rate of growth in the number of new jobs being created. As the competition for labour has intensified, the bargaining power of employees has increased and this is reflected in accelerated earnings growth. However, the resilience of the labour market is likely to be tested by turbulence in the global economy over the coming year with sectors dependent on international trade especially vulnerable.

Unemployment

While the Live Register is not a precise measure of unemployment,¹² as it includes part-time and some seasonal and casual workers, it is one of the most up-to-date and detailed labour market measures. Figure 43 shows that the number of people on the Live Register fell to 188,500 in August 2019, 24,400 (11.9 per cent) less than the same period the previous year. Over this period the number of people under the age of 25 declined by 2,900 (12.6 per cent) and now stands at 20,200.

¹² The Live Register provides a monthly series of the numbers of people registered for Jobseekers Benefit, Jobseekers Allowance or other statutory entitlements at the Irish Department of Social Protection.

FIGURE 43 NUMBERS ON THE LIVE REGISTER BY AGE ('000)



Source: Central Statistics Office.

Data from the Live Register also indicate there has been a decrease in the *duration of time* people have been out of work. Long-term unemployment is defined as being out of work for a period of greater than 12 months and its negative consequences for individuals and society have been well documented.¹³ The longer a person is unemployed, the more difficult they are likely to find it to return to the workforce as a result of deskilling, reduced motivation and apprehension from employers about hiring someone who has been out of work for a sustained period of time.

Table 3 shows that over the past five years there has been a significant decline in both the number and proportion of people who can be considered long-term unemployed. As of August 2019 there were 75,800 people who had been on the Live Register for a period of greater than a year. This represents 38.1 per cent of the total number of people on the Live Register, which is 9 percentage points less than the number of people in long-term unemployment in August 2014. Over the same period of time there has also been a decline in the number of people in very long-term unemployment, with the proportion of people on the Live Register for a period of greater than three years decreasing by nearly 5 percentage points to 21.1 per cent.

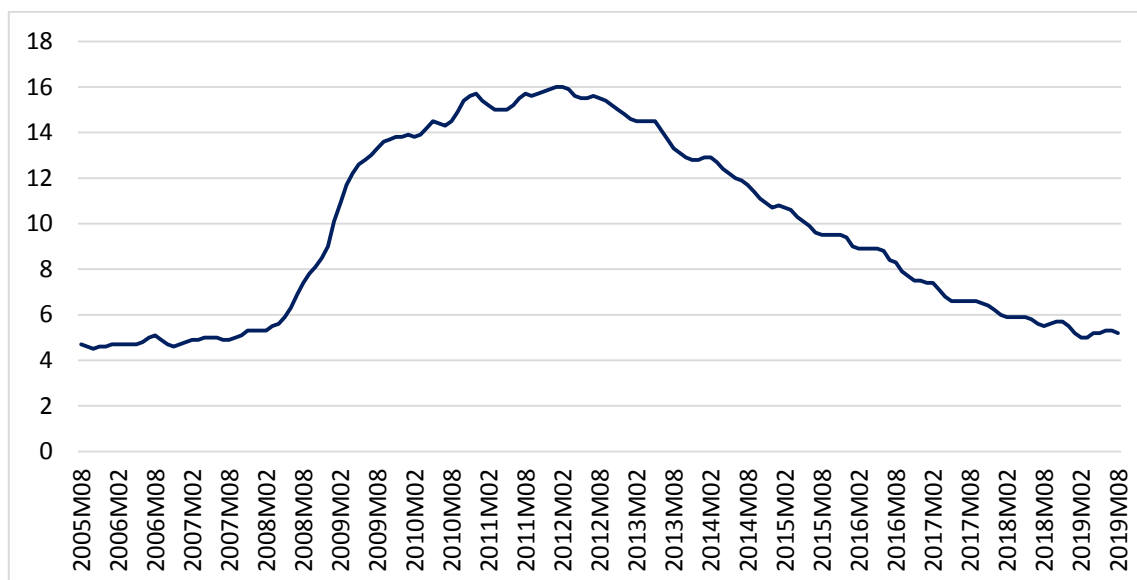
¹³ Abraham, C.G., K. Sandusky, J. Haltiwanger and J.R. Spletzer (2016). 'The Consequences of Long Term Unemployment: Evidence from Matched Employer-Employee Data,' Working Papers 16-40, Center for Economic Studies, US Census Bureau;
O'Connell, P.J., S. McGuinness and E. Kelly (2010). 'A Statistical Profiling Model of Long-Term Unemployment Risk in Ireland'. Working Paper No. 345, Economic and Social Research Institute (ESRI).

TABLE 3 NUMBER AND PROPORTION OF PEOPLE ON THE LIVE REGISTER BY DURATION

	2014 M08		2018 M08		2019 M08	
	('000s)	%	('000s)	%	('000s)	%
All durations	398.0		225.2		199.1	
Under 1 year	210.5	52.9	133.2	59.2	123.3	61.9
1 year and over	187.5	47.1	92.0	40.8	75.8	38.1
1 year - less than 2 years	51.6	13.0	25.2	11.2	21.3	10.7
2 years - less than 3 years	32.6	8.2	14.6	6.5	12.5	6.3
3 years and over	103.3	26.0	52.2	23.2	42.0	21.1

Source: Live Register, Central Statistics Office.

In February 2019 the seasonally-adjusted rate of unemployment fell to 5.0 per cent, which was the lowest rate of unemployment in the country since September 2007. More recently the unemployment rate has remained relatively flat and as of August stands at 5.2 per cent. As the labour market approaches full employment it is unlikely that there will be a further significant decline in the unemployment rate such as that consistently witnessed between 2012 and 2019. A significant portion of the remaining unemployment is likely to be structural in nature meaning that it is independent of the business cycle.

FIGURE 44 SEASONALLY-ADJUSTED UNEMPLOYMENT RATE BY MONTH (%)

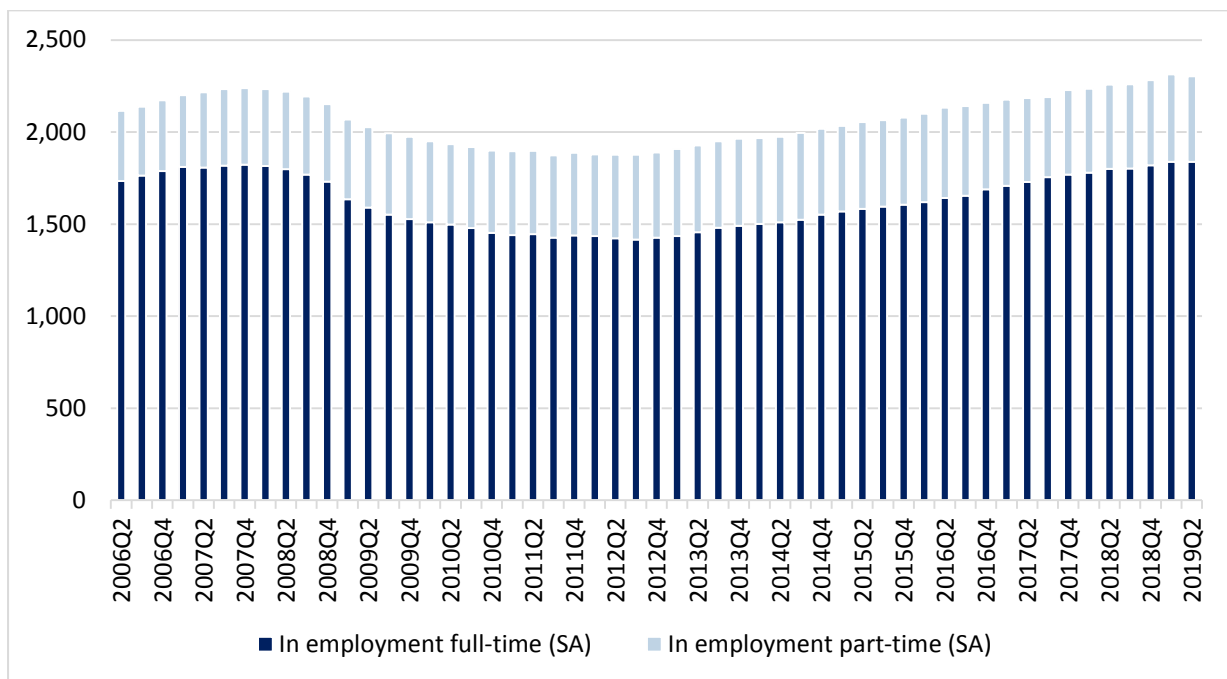
Source: Monthly Unemployment Series, Central Statistics Office.

Employment

There were an additional 44,400 people employed in Q2 2019 in comparison to the same period the previous year, an increase of 2.0 per cent. While this marks

the twenty-eighth straight quarter in which annual employment growth has been positive it is also the lowest rate of growth in over five years. This is likely part of a natural decrease in the rate of employment growth as the economy approaches full employment and the rapid recovery from the financial and economic crisis begins to give way to more normalised growth rates. It may also be partially explained by increasing apprehension on the part of employers in the face of ever increasing international uncertainty. The number of people working full-time increased by 2.2 per cent to 1,838,100 in Q2 2019, and now accounts for approximately 80 per cent of the total workforce. The number of people working part-time increased by 1.3 per cent to 462,000 over the same period. The number of people who are part-time *underemployed*, which is a measure of those who are currently working part-time but have a desire to work more hours, fell by over 12 per cent. This suggests that there is an increasing number of people moving from part-time to full-time work in the Irish labour force. Labour force participation remains static at 73.1 per cent for those aged 15-64.

FIGURE 45 SEASONALLY-ADJUSTED EMPLOYMENT, FULL-TIME AND PART-TIME ('000S)

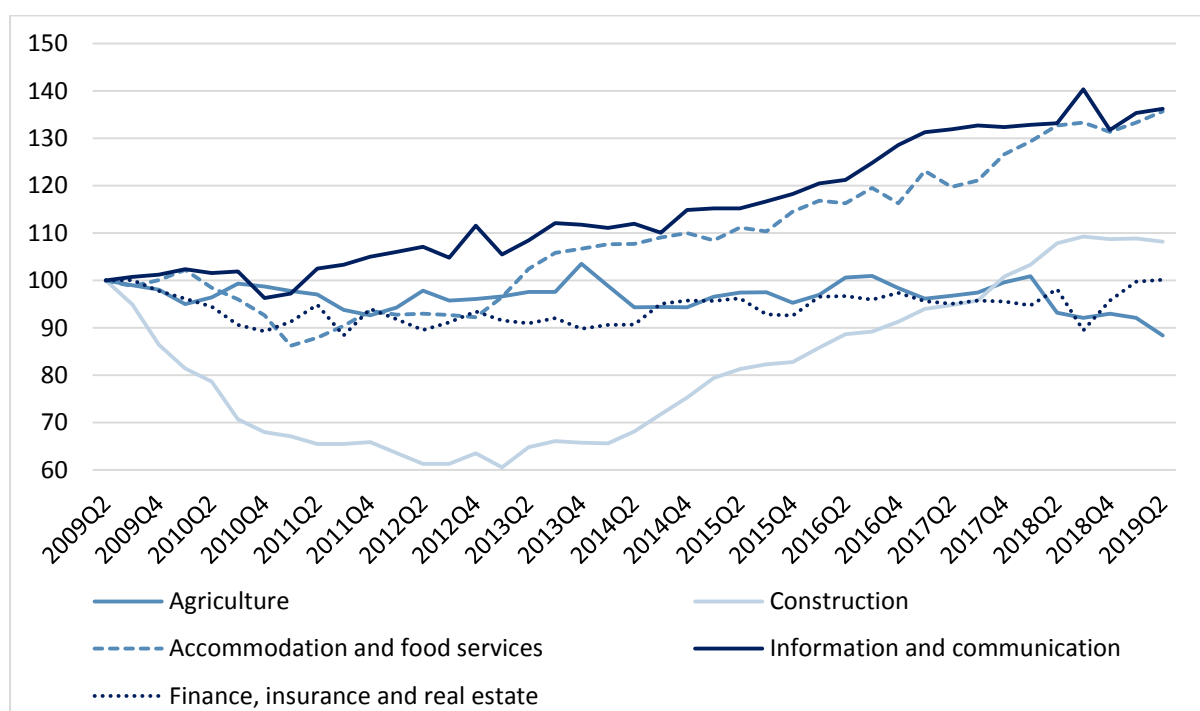


Source: Labour Force Survey, Central Statistics Office.

Figure 46 breaks down the growth in the seasonally-adjusted level of employment by sector. Over the last ten years the ICT sector has experienced significant improvements in employment with nearly 40 per cent more people working in the sector in Q2 2019 compared to Q2 2009. There has also been a similar improvement in employment in the Accommodation and food service sector, likely resulting from an increase in disposable income and tourism to Ireland over this period. The nadir of the Construction sector came a number of years after the other sectors, bottoming out in 2013. Following that there has

been a rapid rise in employment but the sector has shown signs of cooling off since the middle of 2018. This is in line with the slowdown in the investment witnessed within the construction industry over the same period. Meanwhile, employment in the Finance, insurance and real estate sector has remained relatively flat over the past decade. The only sector in which there has been a fall in employment over this period is in Agriculture. This decline has manifested itself since the beginning of 2018 and coincides with the increased uncertainty around Brexit. This is unsurprising given the high level of importance that UK trade has for the agricultural sector.

FIGURE 46 SEASONALLY-ADJUSTED EMPLOYMENT BY SECTOR (Q2 2009 BASE=100)



Source: Labour Force Survey, Central Statistics Office

Table 4 presents a comparison of employment rates in Ireland and the EU for Q1 2019. While the overall employment rate in Ireland is comparable to the EU average, breaking down the figures by gender and age reveal a number of differences. The main difference is in the employment rate for those between the ages of 15-24 where the Irish rate compares favourably against the EU average. The youth employment rate in Ireland is 41.8 per cent which is 6 percentage points greater than the EU average. This difference is even greater for female youth employment where there is 7.8 percentage point difference between Ireland and the EU.

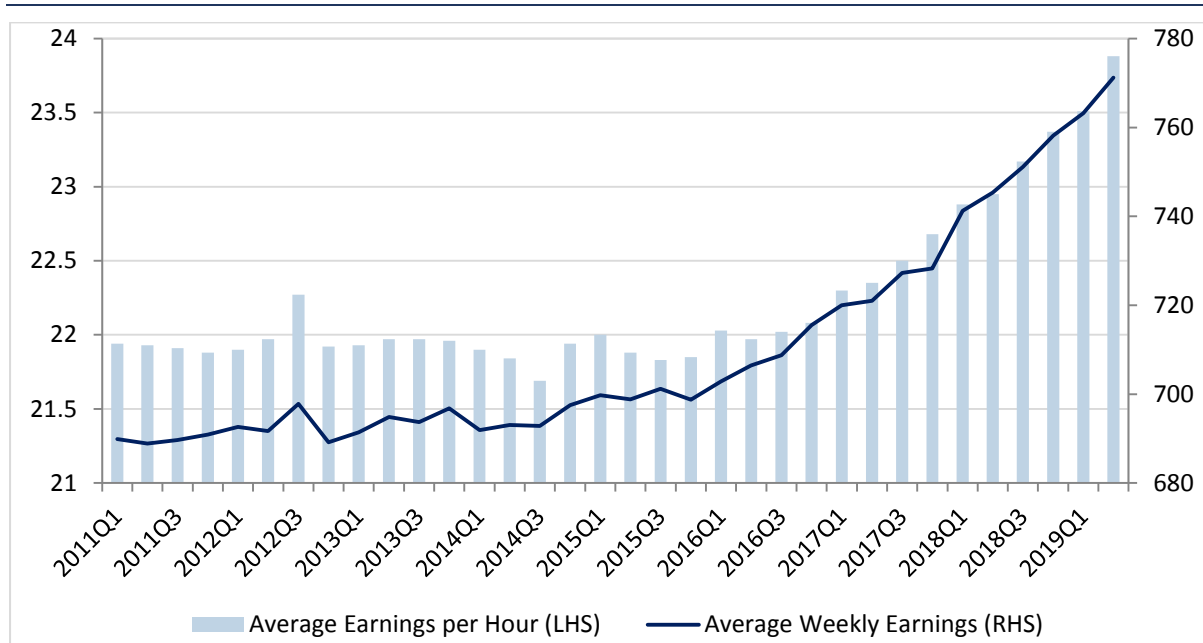
TABLE 4 EMPLOYMENT RATES BY GENDER AND EDUCATION Q1 2019

Gender	Age	Ireland %	EU %
Total	Total (15-64 years)	69.7	69.2
	15-24 years	41.8	35.8
	25-54 years	80.2	81.0
	55-64 years	61.5	59.5
Male	Total (15-64 years)	74.8	74.4
	15-24 years	41.8	37.7
	25-54 years	86.4	86.8
	55-64 years	69.6	66.3
Female	Total (15-64 years)	64.7	63.9
	15-24 years	41.7	33.9
	25-54 years	74.3	75.2
	55-64 years	53.5	53.2

Source: Eurostat.

Earnings

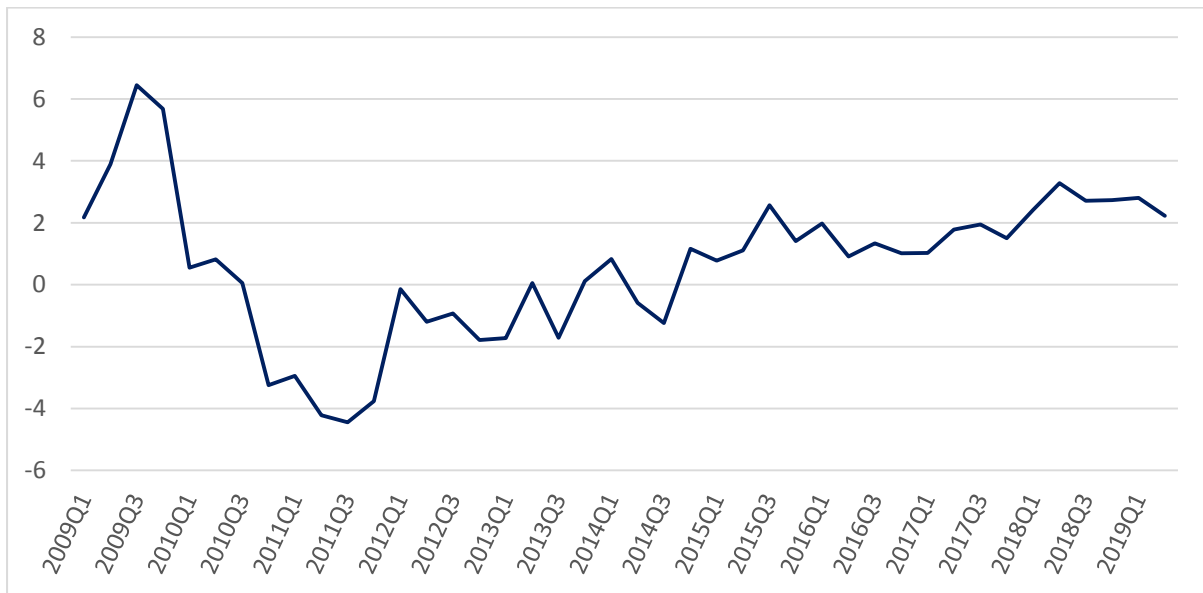
Seasonally-adjusted Average Hourly Earnings increased by a substantial 4.0 per cent in Q2 2019 compared to the same period the previous year. This is the highest rate of growth in labour earnings since Q1 2009. The average earnings per hour now stands at €23.88 while the average earnings per week is €771.23. In terms of sectors, the largest increases were observed in Transportation and storage up by €1.91 per hour (+8.6 per cent), Arts and entertainment up by €1.53 per hour (+8.6 per cent) and Administrative and support services up by €1.28 per hour (+7.2 per cent). Other notable increases occurred in Wholesale and retail (+6.1 per cent), Human health and social work (+4.4 per cent) and Accommodation and food services (+4.1 per cent). In both Mining and quarrying (-5.3 per cent) and Electricity, water supply and waste management (-1.0 per cent) there was a fall in the seasonally-adjusted Average Hourly Earnings over this period.

FIGURE 47 TRENDS IN AVERAGE EARNINGS PER WEEK AND PER HOUR, SEASONALLY-ADJUSTED (€)

Source: Earnings and Labour Costs Quarterly, Central Statistics Office.

Note: The y-axis on the LHS scale has a very low range of values.

The extent to which workers benefit from increased earnings is conditional on the relative change in consumer prices. While earnings growth has accelerated over the past number of years, over this time there has also been an increase in inflation. Figure 48 shows the developments in real earnings growth over the last decade. In the aftermath of the financial crisis real earnings tumbled, decreasing by nearly 4.5 per cent in Q3 2011. Since then there has been a general improvement in real earnings as earnings growth has surpassed inflation. In Q2 2019 nominal earnings growth reached 3.5 per cent but this was offset somewhat by a pick-up in inflation to 1.3 per cent. As the labour market continues to tighten earnings growth is expected to improve, but this in turn is likely to exert further upward pressure on inflation.

FIGURE 48 REAL EARNINGS GROWTH (%)

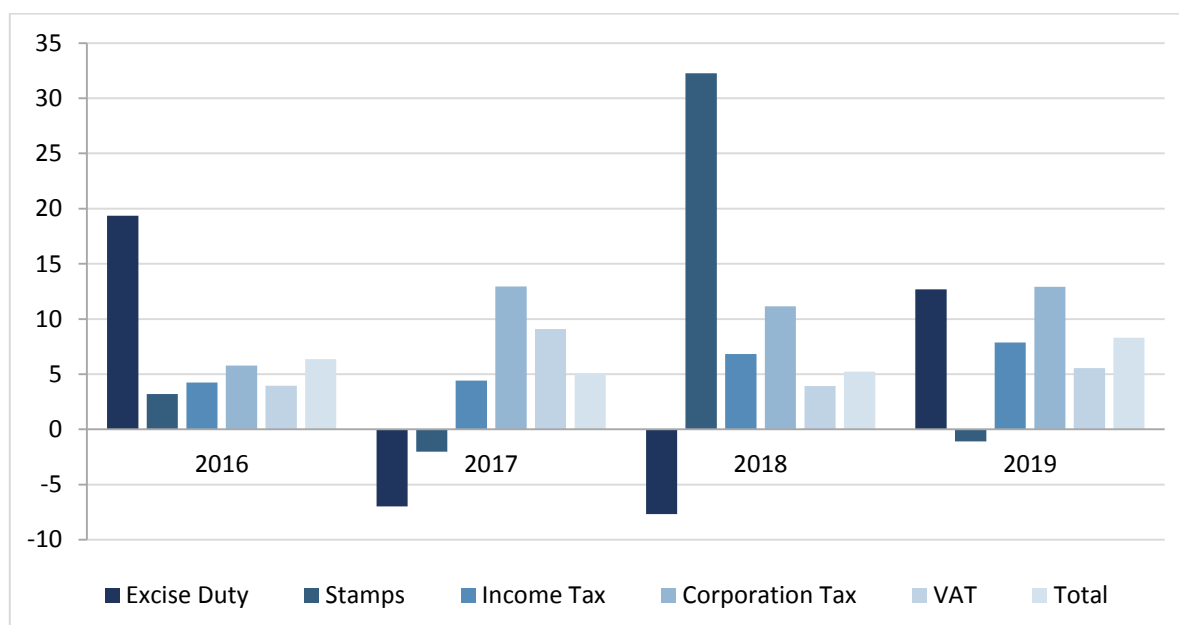
Source: Eurostat.

Labour market forecasts

In light of the expected strong growth of the Irish economy in 2019, we expect the unemployment rate to average 5.1 per cent in 2019. With growth expected to slow the following year in the face of increasing international uncertainty, the unemployment rate is expected to improve only slightly, averaging 5.0 per cent in 2020. Employment levels are expected to average 2.31 million in 2019 and 2.35 million in 2020. As the supply of labour continues to tighten we forecast nominal earnings to grow by 4.2 per cent in 2019 and 4.5 per cent in 2020.

PUBLIC FINANCES

Despite ongoing concerns about Brexit and the observed slowdown in the performance of many key trading partners of the Irish economy, Exchequer receipts have shown persistent and strong growth for the year to date in 2019. As can be seen from Figure 49, all taxation items with the exception of stamp duties have shown significant increases in year-on-year returns.

FIGURE 49 ANNUAL CHANGES IN MAJOR TAX SUB COMPONENTS, JANUARY-AUGUST (%)

Source: QEC Calculations.

Income tax receipts, for example, for the year to date are up by 7.9 per cent on the previous year, while pay related social insurance receipts are up over 5.5 per cent on the previous year. Increases in both these tax receipts along with the continued robust performance of the Irish labour market demonstrate the underlying resilience of the Irish economy.

Interestingly, corporation tax has also experienced a significant increase for the year to date. Typically, during the course of the year, November is the month which registers the largest increase in this taxation item, with strong increases also observed in May and June. Therefore, the 12.9 per cent increase for the year to date suggests that this tax heading may witness another significant increase in 2019. Corporation tax receipts increased by almost 27 per cent in 2018 prompting the Department of Finance to forecast an actual decline in receipts in 2019. The better than expected performance for this major taxation item has positive implications for the General Government Balance (GGB). Indeed, this increase along with the robust performance of the economy is the main reason why we have revised our forecast for the GGB to that of a balanced budget for 2019. In previous *Commentaries* we had forecast a deficit of 0.2 per cent of GDP. However, as noted in the previous *Commentary*, it is important to be able to distinguish between increases in corporation tax receipts which are due to underlying improvements in the profitability of multinationals, and those that are due to firm-specific taxation related strategies. Any difference between these two levels can be construed as windfall receipts in nature and as such should not be used to fund increases in current expenditure.

If a balanced budget is to be attained in the current year then improved discipline will be required on the expenditure side of the accounts. For the year to date, total gross voted expenditure is running almost €260 million below profile. Table 5 summarises the differences between the actual and profile performance for both current and capital expenditure for the year to date.

TABLE 5 CAPITAL AND CURRENT GROSS VOTED EXPENDITURE – ACTUAL AND PROFILE, JANUARY TO AUGUST (€ BILLION)

	Actual	Profile	% difference
Current	38.7	38.8	0
Capital	3.4	3.5	-3
Total	42.0	42.3	-1

Source: Fiscal Monitor, Department of Finance.

However, in terms of discipline on the expenditure side, the Governments mid-year expenditure report (MYER) published by the Department of Public Expenditure and Reform makes some interesting observations. For example, voted expenditure for the Health sector has increased from €13.4 billion in 2013 to €16.8 billion in 2018 with a further increase of circa €1.1 billion in the Voted Health allocation in 2019. The main reasons outlined by the MYER include demographic factors, with the population increasing by 0.32 million during this period and the increase in HSE staffing numbers by over 20,000 FTE (20 per cent) between 2014 and 2018.

Furthermore, the MYER highlights the tendency for expenditure in Health to increase in the second half of the year and particularly in the final quarter. In the present year, the MYER notes that

it is concerning that only 2 per cent of the additional €0.9 billion allocated to day to day health expenditure this year has been allocated to the final three months of 2019. Indeed, the Department are only projecting that Quarter 4 expenditure in 2019 will be €18 million higher than same quarter in 2018, an optimistic position given the trend in the year to date.

Past trends therefore would suggest that the profile level of expenditure for health in the current year is likely to be exceeded. An increasing focus should be placed on the development of accurate spending projections for the health budget. Better forward planning can ensure fewer unexpected overruns and improve the ability to manage the overall public finances. These measures should

go hand in hand with measures to improve the efficiency of health spending. Recent research by Keegan et al. (2018)¹⁴ aims to address this important issue.

The *Summer Economic Statement* (SES) released by the Department of Finance outlines the fiscal strategy for Budget 2020. In light of the ongoing uncertainty about Brexit, two budgetary scenarios were outlined. ‘Scenario A’ involves an orderly exit at end of 2020, while ‘Scenario B’ involves a disorderly exit at the end of October 2019.

Under Scenario A, a headline surplus of 0.4 per cent of GDP is anticipated for 2020. This, based on the forecasts in the SES, would involve a budgetary package of €2.8 billion of which €1.9 billion has already been pre-committed with an additional 0.2 billion being used as an expenditure reserve.

Under a disorderly Brexit (Scenario B), which now appears to be the most likely option, all of the pre-committed expenditure outlined in Scenario A will also be committed. However, this scenario will also provide temporary targeted funding for the sectors most impacted by Brexit – Agriculture and Enterprise. Additional expenditure will also be required under Scenario B in Social Protection given the anticipated increase in unemployment likely to occur. Under this scenario, a deficit of approximately 0.5 per cent to 1.5 per cent of GDP is projected for 2020.

From a funding perspective, the National Treasury Management Agency (NTMA) issued €11.3 billion for the year to date. That leaves a remainder of €14-18 billion in expected funding in 2019 to fund 2020 redemptions. Overall, the State’s funding position is quite positive given the level of pre-funding and the maturity of the existing funding. On a European basis, the State debt has one of the longest weighted average maturities at ten years; the NTMA has used the period of Quantitative Easing (QE) to lengthen maturities of the debt, lower the interest rate costs and repay before time the IMF loans associated with the programme of support with the ‘Troika’.¹⁵

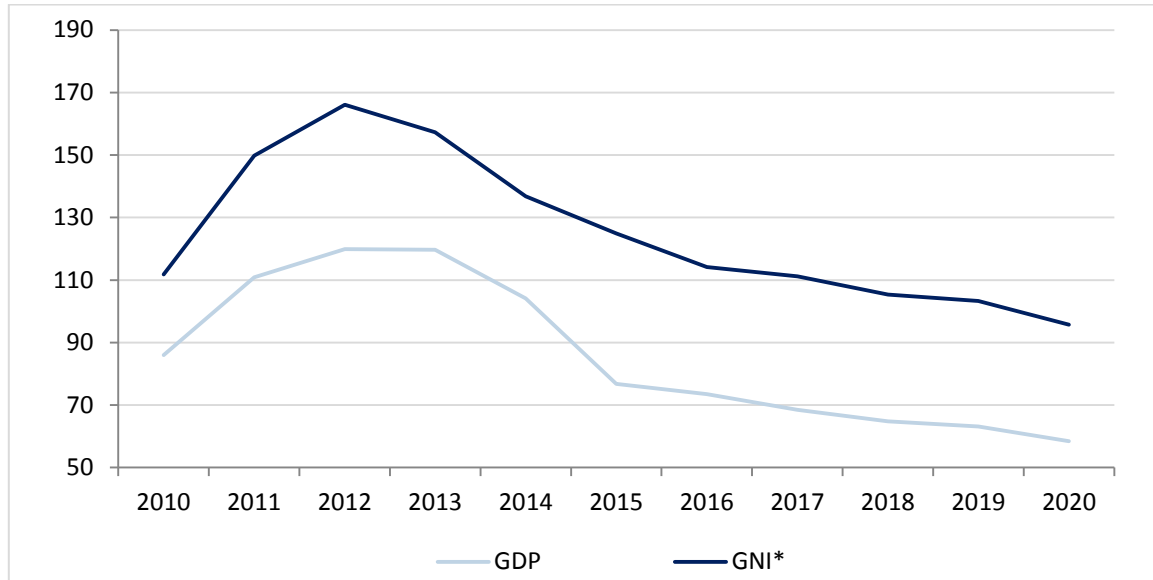
Under our baseline outlook, and subject to the assumption that actual and profile expenditure remain closely correlated for the rest of the year, we now believe that the General Government Balance is likely to be in balance in 2019 with the

¹⁴ Keegan C., A. Brick, B. Walsh, A. Bergin, J. Eighan and M.A. Wren (2018). ‘How many beds? Capacity implications of hospital care demand projections in the Irish hospital system, 2015-2030’, ESRI Research Bulletin, November.

¹⁵ The ‘Troika’ is the expression commonly used to refer to the three bodies (the European Union (EU), the International Monetary Fund (IMF) and the European Central Bank (ECB)) involved in the programme of support for the Irish State, which commenced in October 2010.

possibility of a mild surplus in 2020. We summarise the resulting implications for our forecasts of the debt-to-output ratios in Figure 50. By the end of 2020, we believe the debt-to-GDP ratio will be 54 per cent while debt-to-GNI* will have fallen just below 90 per cent.

FIGURE 50 DEBT-TO-GDP AND DEBT-TO-GNI* (%)



Source: QEC calculations.

General Assessment

While the Irish economy continues to demonstrate remarkable resilience, a number of significant risks may impact on the outlook in 2020. National Accounts data for the year to date indicate that the headline rate of growth is likely to be near to 5 per cent for the current year. However, like other years, it is evident that certain multinational related transactions are likely to see a significant divergence between the headline and underlying rate of growth in the economy. Indeed, while we have revised upwards our forecast of headline growth for the current year, certain underlying variables such as consumption and modified investment would indicate that the underlying rate of growth in the economy has slowed through the year.

The outlook for 2020 is somewhat less benign; a number of key trading partners are experiencing notable reductions in growth with global uncertainty exacerbated by ongoing trading tensions between the United States and China. Consequently our forecast of economic activity for 2020 has deteriorated with the economy expected to grow by 3.1 per cent compared to an expected increase of 3.2 per cent in the previous *Commentary*.

As with all the forecasts in the *Commentary*, this is subject to the technical assumption that the UK will retain the current trading relationship with the European Union. We still believe that, were the UK to leave the EU with significant disruptions, then the economy would only grow by 1 per cent in 2020. However, were the trade disruptions and other aspects (such as financial market stress and significant delays at both ports and airports) of a ‘No-Deal’ to be particularly severe, it is not inconceivable that the economy could contract in 2020. It is also important to acknowledge that even under the baseline outlook, as long as the Brexit issue remains unresolved, it will continue to have a contractionary impact on Irish economic activity by lowering firm investment and household spending relative to what it would be if the Brexit issue were not relevant. The improved growth outlook along with the continued increase in corporation tax returns now means that a balanced budget is a possibility in 2019.

The framing of budgetary policy for the Irish economy is particularly difficult and complex for the forthcoming year. The proposed exit by the United Kingdom from the European Union by October 31 poses a significant challenge on this front. On the face of it, the Irish economy, as discussed at some length in the previous *Commentary*, is showing some signs of overheating with wage pressures in

particular continuing to grow as the unemployment rate hovers around the 5 per cent rate. Under the baseline outlook, the enhanced outlook of the economy coupled with the continued robustness of key labour market indicators suggests that a contractionary budget, which aims to take some money out of the economy, is the most prudent outcome at this stage. However, the possibility of an adverse outcome due to a No-Deal Brexit, along with the observed slowdown in the economies of our major trading partners, constitute significant downside risks to the present outlook.

Furthermore, domestic policymakers must be alert to the possibility of a significant positive shock for the domestic economy if the Brexit issue is resolved in a satisfactory manner from an Irish perspective. For example, if the UK were to remain in the European Union or if a very benign Withdrawal Agreement were passed in the UK parliament, it is quite possible that there could be a significant, stimulatory impact on the Irish economy. One possible avenue for this to occur is through an inflation channel as examined in the box in the *Commentary* by Allen-Coghlan. The box examines the extent to which the recent decline in the value of sterling vis-à-vis the euro has helped to keep inflationary pressures somewhat subdued in the domestic economy. However, were sterling to appreciate suddenly, then it is likely that inflationary pressures could grow quite rapidly and in a persistent fashion in the Irish economy. A successful resolution of the Brexit issue could also have a positive impact on investment decisions in the domestic economy with some evidence suggesting, for example, that uncertainty due to Brexit has led to a number of domestic investment decisions being postponed. Furthermore, while consumption amongst Irish households has increased quite strongly in recent years, it is evident that Brexit-related uncertainty has, over the past ten months, caused a deterioration in consumer sentiment and expectations about future economic prospects. A sudden improvement in consumer sentiment would likely cause a further increase in consumer related behaviour. Finally, an increase in the value of sterling would also improve the competitiveness of Irish goods and services exported to the UK market.

All of this suggests that, over the next year, the most effective and appropriate fiscal policy employed by domestic policymakers may range from a stimulatory budget where a disruptive Brexit has had a significant adverse shock, to a contractionary budgetary position in the case where the domestic outlook continues to progress robustly.

In light of the difficulties surrounding the most appropriate fiscal policy stance, it is useful to summarise the choices confronting policymakers as follows:

		Government policy	
		Stimulatory	Contractionary
Performance of Economy	Above trend	X	✓
	Below trend	✓	X

From the matrix, the two optimal policy outcomes are where Government policy is contractionary when the economy performs above trend and, conversely, Government policy is mildly expansionary when the economy is operating below trend. The two possible adverse outcomes are where

1. the Government (in anticipation say of a crash-out Brexit) implements a stimulatory budget when the economy actually continues to perform above trend (the Brexit issue is possibly resolved and does not materialise); or
2. where the Government implements a contractionary policy and an unexpected (Brexit-related) shock causes the economy to experience a significant slowdown.

A key question is which adverse outcome is more significant for the Irish economy, particularly in the short run? Clearly, budgetary policy will have to be informed by some forecast of political developments in the UK; however, given the magnitude of potential Brexit-related impacts on the domestic economy, it may be necessary to consider the possibility of a supplementary budget in early 2020.

In the present *Commentary*, we have revised downwards our forecast for housing completions in 2019 to 21,500 units. We had expected earlier in the year that completions would reach 23,500 units. This apparent slowdown in housing construction is somewhat disappointing given the strong underlying structural demand for housing in the economy. A number of reasons have been offered for the slowdown including the moderation in the rate of house price inflation resulting in a slowing level of output in the construction sector as well as uncertainty due to Brexit. The observed slowdown in house price inflation is almost certainly due to affordability pressures, with the continued house price increases observed over the past few years eventually curtailing effective demand in the Irish residential market. Furthermore, the adoption and maintenance of macro-prudential regulations by the Central Bank of Ireland has prevented a house price-mortgage credit loop from emerging, where higher house prices result in larger amounts of credit being extended, which, in turn, leads to higher house prices. There has been some suggestion that these

measures should be relaxed in order to ease the affordability pressures apparent in the market. However, this would be a serious mistake and would ultimately result in higher house prices along with higher levels of personal and household debt. The latter would increase the vulnerability of the Irish economy to any international shocks or downturns. Ultimately, a greater level of housing supply is required for the given level of house prices. This is particularly the case when one observes the recent work by Bricongne et al. (2019),¹⁶ which indicates that Irish house prices, when adjusting for dwelling size, are amongst the highest in the European Union. Increasing supply requires that the cost of producing a house in the Irish market needs to be reduced. In particular, the high price of development land needs to be addressed with the introduction of the recent site tax a welcome but preliminary first step.

¹⁶ Bricongne J.C., A. Turrini and P. Pontuch (2019). 'Assessing house prices: Insights from "Houselev" a dataset of price level estimates', European Commission Discussion paper 101, July.

DETAILED FORECAST TABLES

FORECAST TABLE A1 EXPORTS OF GOODS AND SERVICES

	2017	% change in 2018		2018	% change in 2019		2019	% change in 2020		2020
	€ bn	Value	Volume	€ bn	Value	Volume	€ bn	Value	Volume	€ bn
Merchandise	192.9	8.0	13.8	208.2	8.4	7.0	225.7	6.6	5.0	240.6
Tourism	5.0	5.3	3.5	5.2	4.0	4.0	5.4	3.6	3.6	5.6
Other Services	154.7	10.1	5.4	170.3	13.7	12.0	193.6	9.3	8.0	211.6
Exports of Goods and Services	352.6	8.9	8.9	383.8	5.7	4.2	424.8	5.8	4.3	457.8
FISM Adjustment	7.1			12.6			13.2			14.2
Adjusted Exports	359.7	8.9	8.9	396.4	5.6	4.2	438.0	5.8	4.3	472.1

FORECAST TABLE A2 INVESTMENT

	2017	% change in 2018		2018	% change in 2019		2019	% change in 2020		2020
	€ bn	Value	Volume	€ bn	Value	Volume	€ bn	Value	Volume	€ bn
Housing	5.6	28.0	25.8	7.1	27.1	17.0	9.1	23.1	15.1	11.2
Other Building	12.7	14.7	7.1	14.6	16.0	12.0	17.0	13.0	9.0	19.2
Transfer Costs	1.1	24.4	14.0	1.4	17.9	8.0	1.6	17.1	7.0	1.9
Building and Construction	20.4	18.8	12.5	24.2	19.3	13.2	28.9	16.4	10.8	33.6
Machinery and Equipment	72.8	-29.1	-30.6	51.7	63.6	59.8	84.5	4.6	2.6	88.4
Total Investment	93.2	-18.6	-21.1	75.9	49.4	45.1	113.4	7.6	4.6	122.0

FORECAST TABLE A3 PERSONAL INCOME

	2017	% change in 2018		2018	% change in 2019		2019	% change in 2020		2020
	€ bn	%	€ bn	€ bn	%	€ bn	€ bn	%	€ bn	€ bn
Agriculture	0.7	1.6	0.0	0.7	2.4	0.0	0.7	1.2	0.0	0.7
Non-Agricultural	87.4	5.9	5.1	92.6	7.1	6.6	99.2	6.4	6.4	105.5
Rental Income	10.0	7.6	0.8	10.8	7.8	0.8	11.6	10.0	1.2	12.8
Other Income	15.7	3.4	0.5	16.3	6.0	1.0	17.2	8.6	1.5	18.7
Total Income Received	113.9	5.7	6.4	120.4	7.0	8.4	128.8	7.0	9.0	137.8
Current Transfers	8.6	-2.7	-0.2	8.4	-2.4	-0.2	8.2	-3.2	-0.3	7.9
Gross Personal Income	122.5	5.1	6.2	128.7	6.4	8.2	136.9	6.4	8.8	145.7
Taxes on Income and Wealth	-22.2	6.1	-1.4	-23.5	5.3	-1.2	-24.8	4.6	-1.1	-25.9
Personal Disposable Income	100.4	4.8	4.8	105.2	6.6	7.0	112.2	6.8	7.6	119.8
Consumption	93.8	7.2	6.7	100.6	4.5	4.5	105.1	4.3	4.6	109.6
Personal Savings	11.4	0.8	0.1	11.5	23.5	2.7	14.2	22.7	3.2	17.4
Savings Ratio	11.2			10.4			12.1			13.9
Average Personal Tax Rate	0.18			0.18			0.18			0.18

FORECAST TABLE A4 IMPORTS OF GOODS AND SERVICES

	2017	% change in 2018		2018	% change in 2019		2019	% change in 2020		2020
	€ bn	Value	Volume	€ bn	Value	Volume	€ bn	Value	Volume	€ bn
Merchandise	85.2	15.8	13.0	98.5	15.6	14.0	113.9	13.0	11.0	128.7
Tourism	5.8	8.8	8.3	6.3	9.6	8.0	6.9	7.8	6.0	7.5
Other Services	172.2	4.2	3.7	179.5	26.6	25.0	227.3	7.1	5.5	243.4
Imports of Goods and Services	263.3	8.0	-2.9	284.4	22.4	20.3	348.1	9.0	7.3	379.6
FISM Adjustment	30.8			4.6			4.1			4.7
Adjusted Imports	294.0	-1.7	-2.9	289.0	21.9	20.3	352.2	9.1	7.3	384.2

FORECAST TABLE A5 BALANCE OF PAYMENTS

	2017	2018	2019	2020
	€ bn	€ bn	€ bn	€ bn
Exports of Goods and Services	352.6	383.8	424.8	457.8
Imports of Goods and Services	263.3	284.4	348.1	379.6
Net Factor Payments	-62.3	-71.0	-77.6	-82.8
Net Transfers	-3.1	-5.1	-5.6	-6.2
Balance on Current Account	1.46	29.0	-6.6	-10.6
As a % of GNP	0.6	11.5	-2.4	-3.8

FORECAST TABLE A6 EMPLOYMENT AND UNEMPLOYMENT, ANNUAL AVERAGE

	2017	2018	2019	2020
	'000	'000	'000	'000
Agriculture	110.4	107.3	103.1	105.0
Industry	412.1	423.3	432.3	441.5
Of which: Construction	128.8	143.4	145.1	148.1
Services	1,664.5	1,719.4	1,767.8	1,806.6
Total at Work	2,194.2	2,257.6	2,305.0	2,348.2
Unemployed	157.9	137.5	128.6	123.1
Labour Force	2,352.3	2,395.2	2,433.6	2,471.3
Unemployment Rate, %	6.7	5.8	5.1	5.0