EUROPEAN
COMMISSION

Brussels, 22.2.2017
SWD(2017) 74 final

COMMISSION STAFF WORKING DOCUMENT

Country Report Spain 2017
Including an In-Depth Review on the prevention and correction of macroeconomic imbalances

Accompanying the document

COMMUNICATION FROM THE COMMISSION TO THE EUROPEAN PARLIAMENT, THE COUNCIL, THE EUROPEAN CENTRAL BANK AND THE EUROGROUP

2017 European Semester: Assessment of progress on structural reforms, prevention and correction of macroeconomic imbalances, and results of in-depth reviews under Regulation (EU) No 1176/2011

{COM(2017) 90 final}
{SWD(2017) 67 final to SWD(2017) 93 final}

CONTENTS

Executive summary 1

1. Economic situation and outlook 4

2. Progress with country-specific recommendations 9

3. Summary of the main findings from the MIP in-depth review 12

4. Reform priorities 20

- 4.1. Public finances and taxation 20
- 4.2. Financial sector and private sector deleveraging 31
- 4.3. Labour market, education and social policies 36
- 4.4. Investment 45
- 4.5. Sectoral policies 52
- 4.6. Public administration 56

A. Overview table 59

B. MIP Scoreboard 64

C. Standard tables 65

References 70

LIST OF TABLES

1.1.	Key economic, financial and social indicators — Spain	8
2.1.	Summary table on 2016 CSR assessment	10
3.1.	Current account and net international investment position sensitivity analysis	15
3.2.	MIP assessment matrix — Spain	16
4.1.1.	Correlation between (1) changes in regional revenues and (2) changes in expenditure with changes in regions' deficits	30
B.1.	The MIP Scoreboard for Spain	64
C.1.	Financial market indicators	65
C.2.	Labour market and social indicators	66
C.3.	Labour market and social indicators (continued)	67
C.4.	Product market performance and policy indicators	68
C.5.	Green growth	69

LIST OF GRAPHS

1.1.	Contributions to GDP growth	4
1.2.	Net lending/borrowing by sector	5
1.3.	Breakdown of unit labour costs (ULC)	6
1.4.	Employment, unemployment and long-term unemployment	6
3.1.	Non-cyclical current account and NIIP	13
3.2.	Breakdown of rate of change of net international investment position	13
4.1.1.	Evolution of expenditure ratios for various categories	24
4.1.2.	General government revenue, expenditure and balance by subsector	245
4.1.3.	Expenditure structure of regional governments, 2014	25
4.1.4.	Revenue structure of regional governments, 2015	26
4.1.5.	Evolution of the Regional Authority Index since 1980 and level in 2010	27
4.1.6.	Taxing power of the regional government sector (as % of general government tax revenue)	27
4.1.7.	Regional governments: real expenditure in EUR per capita by COFOG function. Differences 2015-2006	30
4.2.1.	Non-performing loans	31
4.2.2.	Financing the Spanish economy	31
4.2.3.	Bank loans to the private sector	32
4.2.4.	Indebtedness by sector	32
4.2.5.	Breakdown of y-o-y changes in households' debt-to-GDP ratio	33
4.2.6.	Households' financial assets acquisition	33
4.2.7.	Breakdown of y-o-y changes in NFCs' debt-to-GDP ratio	33
4.2.8.	NFCs' balance sheet and financial position	34
4.2.9.	The interest coverage ratio for Spanish construction SMEs	34

4.2.10. The interest coverage ratio for Spanish manufacturing SMEs 35
4.3.1. Share of temporary employees, transition rates from temporary to permanent, wage premium for permanent and full-time temporary employed at risk of not being entitled to unemployment benefits. 37
4.3.2. Shares of temporary employees by age and education level (2015) 38
4.3.3. In-work-poverty rate, groups, Spain 42
4.3.4. Changes in social protection expenditure in real terms, and contributions by function 42
4.4.1. Breakdown of external position 45
4.4.2. Trade balance of goods (Jan-Nov), total and non-energy products 45
4.4.3. Density function of Spanish export value per quality rank 46
4.4.4. Breakdown of rate of change of unit labour costs 47
4.4.5. Total factor productivity of small firms for selected sectors in Spain, France and Italy 47
4.4.6. Allocative efficiency in selected sectors in Spain, France, Germany and Italy 2013 48

LIST OF BOXES

2.1. Contribution of the EU budget to structural change in Spain 11
3.1. Euro area spillovers 18
4.1.1. Long-term projections of general government debt 21
4.1.2. EUROMOD simulations for narrowing of the actionable policy gap in VAT 23
4.4.1. Investment challenges and reforms in Spain 51
4.6.1. Selected highlights 58

EXECUTIVE SUMMARY

This report assesses Spain's economy in light of the European Commission's Annual Growth Survey published on 16 November 2016. In the survey, the Commission calls on EU Member States to redouble their efforts on the three elements of the virtuous triangle of economic policy — boosting investment, pursuing structural reforms and ensuring responsible fiscal policies. In so doing, Member States should focus on enhancing social fairness in order to deliver more inclusive growth. The Commission also published the Alert Mechanism Report (AMR) that initiated the sixth round of the macroeconomic imbalance procedure. The in-depth review, which the 2017 AMR concluded should be undertaken for the Spanish economy, is presented in this report.

The Spanish economy continues to enjoy a strong recovery and is moving towards a more balanced composition of growth than before the crisis. In its third year of expansion, Spanish real GDP is almost back to its 2008 pre-crisis peak. The recovery was initially led by exports, helped by a reversal of the cost-competitiveness losses accumulated in the pre-crisis years. It then gradually broadened to the domestic sector. Since 2015, high job creation, low oil prices and improving financing conditions have boosted consumer spending. Investment in equipment has also been growing strongly, while investment in construction has started to recover. The current-account balance maintains a surplus position.

Growth is expected to slow, but remain robust. Spain's ambitious structural reforms in recent years laid the ground for the strong economic recovery, but favourable conditions also helped. As oil prices pick up, and assuming geopolitical tensions in competing tourist destinations subside, Spain's external balance may worsen. Furthermore, no further significant cost-competitiveness gains are expected as productivity growth remains modest and wage growth resumes. Domestic demand is set to lose vigour as falling prices, the tax cuts implemented in 2015-2016, and the improvement in financing conditions no longer provide a boost. Overall, real GDP growth is expected to moderate but remain robust, at 2.3 % in 2017 and 2.1 % in 2018.

The legacy of the crisis has not yet been fully overcome, and significant challenges remain. Spain has undertaken a substantial economic adjustment, but the stock of imbalances leaves the economy vulnerable. Private sector debt continued to decrease, supported by a healthier financial sector, but public sector debt has not been reduced, resulting in a slow reduction of the very high level of external debt. Although unemployment has been falling rapidly, it remains very high, and both poverty and income inequality are among the highest in the EU.

Spain represents a source of moderate spillovers to other euro area countries. Simulations show that an increase in government expenditure (e.g. for higher education and R&D support), financed by a value-added tax rise would have limited impact on the growth of other euro area countries, except Portugal, for which Spain is the main export market.

Overall, Spain has made limited progress in addressing the 2016 country-specific recommendations (CSRs). It should be borne in mind when assessing progress towards implementing the CSRs that, since the publication of the CSRs and until early November 2016, Spain had a caretaker government without full legislative powers. On the fiscal CSR, in November 2016 the Commission concluded that the excessive deficit procedure could be kept on hold. However, limited progress was achieved in strengthening public procurement policy frameworks, and some progress in implementing the fiscal framework law. Some progress was achieved in the provision of individualised support by the regional employment services. However, limited progress was made in improving coordination between employment and social services, addressing gaps in social benefits and improving family support, including the provision of child-care services. Some progress was made in the provision of long-term care services. Progress was limited in improving the labour market relevance of tertiary education and in fostering university-business cooperation, as well as in increasing performance-based funding for public research bodies and private sector investment in research and innovation. In goods and services markets, limited progress was made in implementing the 2014 retail reform, and some progress in implementing the market unity law at regional level. No progress was made in the regulation of professional services.

Regarding progress in reaching the national targets under the Europe 2020 strategy, Spain is performing well in reducing greenhouse gas emissions and is also on track to achieve the agreed renewable energy share. The tertiary education attainment target is within close reach. While the country is still far from the targets for the employment rate and early school leaving, the gaps were reduced substantially in 2015 and 2016. By contrast, there was little progress towards the targets for R&D investment, energy efficiency, and reducing poverty risk.

The main findings of the in-depth review contained in this report, and the related policy challenges, are as follows:

- **Current account surpluses are translating into a slow reduction of Spain's net external liabilities.** The current account adjustment since the aftermath of the crisis has been largely due to structural improvements in export performance, supported by sustained cost competitiveness gains. However, recently it has also been driven by temporary factors, such as the low oil prices, which are gradually abating. Moreover, the still sizeable amount of external liabilities exposes the country to shifts in market sentiment. In order to bring them to prudential levels, Spain needs to maintain current account surpluses over a sustained period of time.

- **Private sector debt reduction has continued, but indebtedness remains high, especially for households.** The total stock of private sector debt has continued to fall, although the pace of reduction has slowed as new credit has started to flow again. Economic growth has become, and is expected to remain, the main driver of debt reduction in the medium term, also facilitated by the expected rebound in inflation. Debt reduction needs have significantly declined for the corporate sector, but remain relatively high for households.

- **The financial sector has continued to show a high degree of stability, supported by its ongoing restructuring, low funding costs and the economic recovery.** The banking system further strengthened its capital buffers and the six largest Spanish banks comfortably met their capital requirements in the EBA stress tests of July 2016. The aggregate non-performing loan ratio fell to just above 9% in November 2016. As elsewhere in Europe, squeezed profitability, against the background of low interest rates and remaining scope to further improve the sector's business model, is the main challenge. The outstanding volume of credit is still falling, but bank lending to firms, in particular small and medium-sized enterprises, and consumer credit have resumed, supporting economic activity.

- **Fiscal sustainability risks remain high in the medium term.** Spain's general government debt ratio remains high, at just below 100 % of GDP in 2016. While in the long term the projected savings in age-related expenditure would significantly mitigate risks to fiscal sustainability, the public debt ratio is expected to continue rising in the medium term. On the revenue side, fiscal adjustment is not sufficiently supported by consumption taxes, mainly due to a large policy gap in VAT, and environmental taxes. On the expenditure side, some ongoing and planned policy initiatives aim to increase efficiency of spending at all government levels, though weaknesses in public procurement remain an obstacle.

- **Job creation has been strong in recent years and unemployment decreased rapidly, but remains very high.** Labour market reforms are credited to have cushioned the fall in employment during the later stages of the crisis and increased the responsiveness of employment to growth. Wage moderation has also been an important driver of strong job creation and competitiveness gains in recent years. The unemployment rate has been declining rapidly in the past three years, but remains among the highest in the EU, especially among young and low-skilled workers. Almost half of the unemployed have been without a job for more than a year. Spain is taking measures to strengthen individual support to the long-term unemployed, but their effectiveness depends on the capacity of the regional public employment services.

Other key economic issues analysed in this report pointing to particular challenges for Spain’s economy are:

The cooperation of regional governments is critical for Spain to reach its fiscal targets. Over 2013-2015, regional governments were responsible for around one third of the average annual general government deficit. While enjoying a high degree of tax autonomy, the extent to which it has been used to finance increases in spending has varied across taxes and regional governments. Limited use of the preventive and corrective tools established in domestic legislation and other policy settings have not provided sufficient incentives for fiscal discipline.

The widespread use of temporary contracts may impact negatively on the social situation and hinder productivity growth. Spain has one of the highest shares of employees on temporary contracts in total employment in the EU. Many of these contracts are of very short duration. The widespread use of temporary contracts may harm productivity growth, including through lower on-the-job training opportunities. Too often, temporary jobs fail to be a stepping stone into stable careers and might be associated with poorer working conditions and higher poverty risks. The recent labour market reforms seem to have a mildly positive effect in reducing segmentation between permanent and temporary contracts, but some aspects of the labour law may still create an incentive to hire on temporary contracts.

Weaknesses in activation and social policies hinder a fast reduction in poverty. The risk of poverty or social exclusion started to decline in 2015. However, it remained very high, especially for children, and in-work poverty was still on the rise. Limited coverage of social benefits other than pensions, and lack of coordination between employment and social services leave many jobless people without support in their efforts to (re)enter the labour market. Support to families is low and poorly targeted to low-income families.

Gaps in education outcomes are set to hamper future productivity growth. The average students' performance remains stable and Spain still has the highest share of early school leavers and low basic skills among adults in the EU, despite measures to improve the attractiveness of vocational education and training. Wide regional disparities in the performance of students remain. The employability of university graduates is relatively low.

Innovation performance remains weak, despite some modest improvements. Expenditure for research and development as a share of GDP and innovation performance have both continued to decline. A complex governance framework and lack of an evaluation culture weigh on the effectiveness of R&I support. Despite some bright spots, coordination of regional and national innovation policy is still limited. Obstacles to cooperation between universities and businesses remain, in particular regarding technology transfer and the inter-sectoral mobility of researchers.

The business environment hampers efficient resource allocation and productivity growth. The average cost of starting a business is higher than in most Member States and varies substantially across regions. Shortages of digitally skilled labour slow down the integration of digital technologies into the economy. The implementation of the market unity law only made minor advances in 2016 and regulation of professional services remains restrictive and the corresponding mark-ups high. Venture capital remains underdeveloped, even though public support instruments contributed to stimulating its supply.

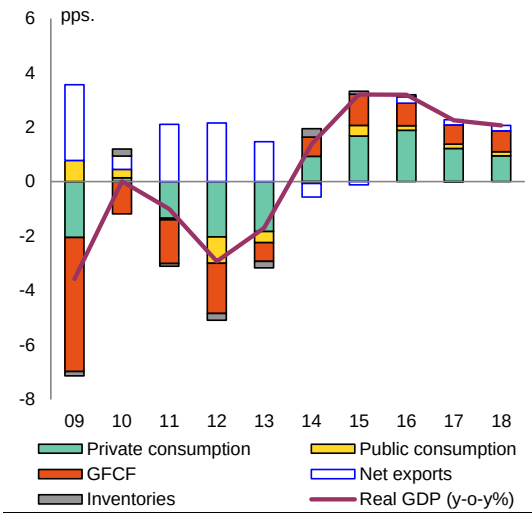
The public procurement policy framework does not foster efficiency and legal compliance. Spain lacks a nation-wide public procurement policy that ensures efficiency and legal compliance and a high level of competition across the country. Some measures have been taken recently to improve public procurement practices, but weaknesses remain, including low coordination across general government levels, insufficient control mechanisms, gaps in transparency and a relatively low use of centralised purchasing.

1. ECONOMIC SITUATION AND OUTLOOK

Economic growth

The Spanish economy expanded by 3.2 % in 2016, well above the euro area average. On its third year of expansion, GDP growth has continued to outpace the euro area average, and the level of output has almost reached its pre-crisis level. Growth has continued to surprise on the upside in recent quarters, and GDP expanded by 3.2% in 2016, the same rate as in 2015 (European Commission 2017a). The composition of growth is expected to have been more balanced in 2016 than in previous years. Growth is projected to have been driven by private consumption and investment, but the external sector is expected to have had a positive contribution to growth in 2016 for the first year since the recovery started (see Graph 1.1).

Graph 1.1: **Contributions to GDP growth**



(1) GFCF: Gross fixed capital formation
Source: European Commission

As favourable tailwinds gradually subside, growth is expected to decelerate but remain robust. Real GDP growth is projected at 2.3 % in 2017 and 2.1 % in 2018, mainly driven by domestic demand. Private consumption is expected to slow down as job creation decelerates, and other factors that supported the growth of disposable income in recent years - i.e. declining oil prices, tax cuts and improving financing conditions - gradually abate. However, private consumption is projected to remain the main contributor to growth until 2018. Investment is expected to be affected by two opposing trends, with growth in residential and non-residential construction investment gradually recovering, while equipment investment growth is expected to moderate in line with final demand. This is likely to lead total investment growth to ease slightly in 2017, before picking up modestly again in 2018.

External position

The contribution of the external sector to growth is expected to remain positive until 2018. Export growth is expected to have slowed down slightly in 2016 and ease a bit further in 2017, before picking up in 2018 as Spain's trading partners recover, also reflecting structural improvements in export performance (see Section 4.4.1). Import growth is projected to follow a similar pattern, slowing down in 2016 and 2017, and accelerating in 2018, in line with the evolution of final demand. However, as growth of imports is expected to remain below that of exports until 2018, net trade is set to give a positive contribution to growth throughout the period. However, after a projected increase in 2016, Spain's current account surplus is forecast to decline somewhat in 2017 and 2018, mainly reflecting the impact of the expected deterioration in the terms of trade. Net external lending is similarly expected to gradually decline in until 2018.

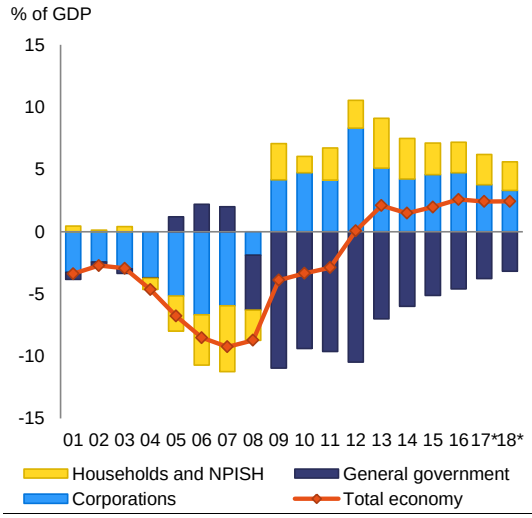
The current account surpluses recorded in recent years are finally translating into a reduction of Spain's external liabilities. The net international investment position (NIIP) has been improving since 2015, but remains sizeable at -88.7 % of GDP in Q3-2016. At the same time, the composition of external liabilities has been gradually shifting from the private to the public sector. The expected continued strong growth, pickup in inflation and net external surpluses projected until 2018 should facilitate the further improvement of the NIIP. However, the current external dynamics do not seem sufficient to decisively bring down the NIIP over the medium term (See section 3.2).

Private indebtedness

Private sector deleveraging is progressing, but the level of debt is still high. Private sector debt stood at nearly 167.5 % of GDP in Q3-2016, a decrease of about 50 % of GDP since its peak (see Section 4.2). A large part of this reduction —

about 30 pps. — has been due to the fall in debt of non-financial companies (NFCs), but progress in household deleveraging was also quite remarkable (see Graph 1.2). Real growth has now become the main driver of the reduction in debt ratios, as new credit to households and SMEs has continued to grow, supported by a healthier financial sector. However, deleveraging needs are still sizeable, especially for households.

Graph 1.2: **Net lending/borrowing by sector**



(1) ESA2010
Source: AMECO

Public finance

The general government deficit is declining, but the debt ratio has not been put on a declining path. The general government debt ratio is expected to stabilise at around 100 % of GDP, as strong nominal GDP growth largely offsets the still large, though declining, deficit expected until 2018. The deficit in 2015 was 5.1 % of GDP and recent data indicate that Spain's general government deficit only narrowed by 0.3% in the first three quarters of 2016. Whereas expenditure has grown in line with expectations, significant shortfalls in income tax revenue have weighed on revenue growth. According to the Commission 2017 winter forecast, this should lead to a deficit of 4.7 % of GDP in 2016. At unchanged policies, the deficit is expected to narrow to 3.5 % and 2.9 % of GDP in 2017 and 2018.

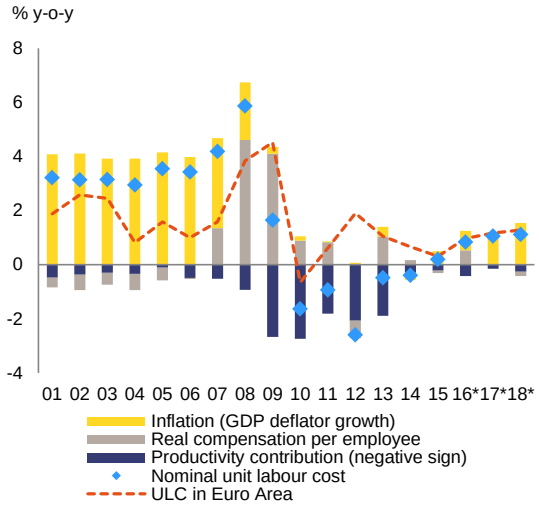
Inflation

Inflation is expected to pick up, as oil prices increase and core inflation recovers. The projected oil price increases are set to continue dominating inflation developments in the short term. Headline inflation is forecast to rise from −0.3 % in 2016 to 1.9 % in 2017, before decreasing slightly to 1.7 % in 2018 as the effect of energy price increases fades away. At the same time, core inflation is expected to gradually increase over the next two years, as wages pick up, the output gap closes, and the energy price increases pass-through into consumer prices.

Labour market

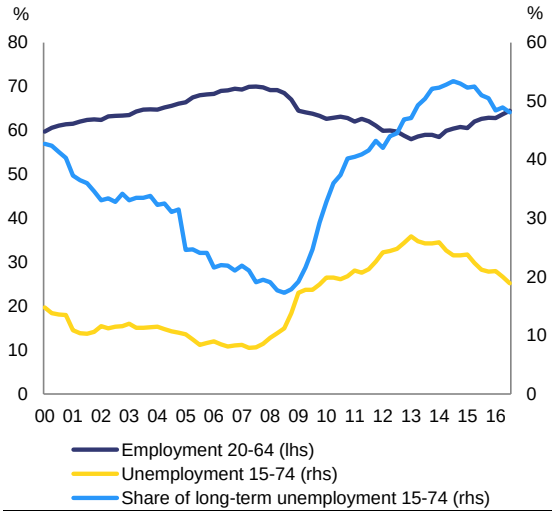
Strong job creation has continued throughout 2016, and it is expected to moderate but remain robust until 2018. The employment rate increased again in 2016 on the back of sustained economic growth but is still well below the pre-crisis level (64.5 % in Q3-2016, compared to 69.7 % in 2007) and the EU average (71.5 % in Q3-2016). Robust job creation has been underpinned by ongoing wage moderation and the labour market reforms implemented in previous years. Full-time equivalent employment is expected to have expanded by 2.9 % in 2016, and is expected to grow further by 2.0% and 1.7% in 2017 and 2018 respectively. Wage moderation has also been facilitated by very low inflation. However, as inflation gradually picks up, wages are projected to increase. This, together with very low productivity growth, is likely to result in increasing unit labour costs (see Graph 1.3).

Graph 1.3: **Breakdown of unit labour costs (ULC)**



Source: AMECO

Graph 1.4: **Employment, unemployment and long-term unemployment**



Source: Instituto Nacional de Estadistica, Eurostat

Social developments

The improvement in the labour market translated into a small decline in poverty and social exclusion rates. Despite having fallen rapidly, the unemployment rate and the share of long-term unemployment remain very high (18.6 % and 45.9 % in Q4-2016 respectively, see Graph 1.4 and Section 4.3.1). Improved labour market conditions led to a decline in poverty and social exclusion rates in 2015 ([1]). However, they remained at very high levels, affecting people in working age and children in particular. In addition, the regional variation in employment rates increased significantly during the crisis and is the second highest in the EU ([2]).

Income inequality, as measured by the income quintile ratio ([3]), widened during the crisis, and is one of the highest in the EU. This trend was largely due to soaring unemployment and persistent segmentation ([4]), which mainly increased inequalities at the bottom of the income distribution (OECD 2015). The polarisation of skills between a high share of low-skilled and rather high share of tertiary educated is another important factor (Eurofound 2014). In 2014, the overall inequality reduction impact of the tax and benefit system — as measured by the difference between the Gini coefficients ([5]) before and after taxes and transfers — remained below the EU average despite an increase recorded since 2007 (European Commission 2016a, Chapter 1). Efforts to improve the progressivity of the system in the context of the reforms implemented since 2008 (De Agostini *et al.* 2016) have been weakened by the pressure on expenditure (and lower revenues).

([1]) EU-SILC 2015 data. Note that these data refers to the 2014 situation (first year of recovery) for the income and work intensity components, while material deprivation refers to 2015.

([2]) The variation coefficient of employment rates at NUTS2 regional level increased from 7.2 in 2007 to 10.8 in 2014.

([3]) i.e. the ratio of total income received by the 20% of the population with the highest income to that received by the 20% of the population with the lowest income. In Spain the S80/S20 increased from 6.2 in 2010 to 6.9 in 2015

([4]) S50/S10 (2.7) is higher and increased more than the S90/S50 (2.08)

([5]) The Gini coefficient is an indicator with value between 0 and 1. Lower values indicate higher equality. In other words a value equal to 0 indicates everybody has the same income, a value equal to 1 indicates that one person has all the income. Note: To take into account the impact of differences in household size and composition, the total disposable household income is "equivalised".

Inequality in net wealth ([6]) was within the range observed in other EU countries for which data were collected in 2013-2014 (ECB 2016). Inequalities in access to healthcare have also risen significantly from low levels during the crisis ([7]).

([6]) Difference between total assets and total liabilities.
([7]) The income quintile gap in self-reported unmet need for medical examination increased from 0.2 pps in 2008 to 1.6 in 2014.

Table 1.1: **Key economic, financial and social indicators — Spain**

									forecast		
	2004-2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018
Real GDP (y-o-y)	3.2	-3.6	0.0	-1.0	-2.9	-1.7	1.4	3.2	3.2	2.3	2.1
Private consumption (y-o-y)	2.9	-3.6	0.3	-2.4	-3.5	-3.1	1.6	2.9	3.0	2.1	1.8
Public consumption (y-o-y)	5.8	4.1	1.5	-0.3	-4.7	-2.1	-0.3	2.0	1.3	0.9	0.8
Gross fixed capital formation (y-o-y)	4.1	-16.9	-4.9	-6.9	-8.6	-3.4	3.8	6.0	3.7	3.4	3.8
Exports of goods and services (y-o-y)	3.7	-11.0	9.4	7.4	1.1	4.3	4.2	4.9	4.3	4.0	4.3
Imports of goods and services (y-o-y)	5.6	-18.3	6.9	-0.8	-6.4	-0.5	6.5	5.6	3.2	3.5	4.3
Output gap	2.4	-3.2	-4.2	-5.6	-7.8	-8.6	-7.2	-4.3	-1.6	0.0	1.3
Potential growth (y-o-y)	3.4	0.9	1.1	0.4	-0.6	-0.8	-0.2	0.0	0.5	0.6	0.8
Contribution to GDP growth:											
Domestic demand (y-o-y)	3.8	-6.2	-0.7	-3.0	-4.8	-2.9	1.6	3.2	2.7	2.0	1.9
Inventories (y-o-y)	0.0	-0.2	0.3	-0.1	-0.2	-0.2	0.3	0.1	0.1	0.0	0.0
Net exports (y-o-y)	-0.7	2.8	0.5	2.1	2.2	1.5	-0.5	-0.1	0.4	0.2	0.1
Contribution to potential GDP growth:											
Total Labour (hours) (y-o-y)	1.4	-0.4	0.0	-0.3	-1.0	-1.0	-0.5	-0.4	-0.1	0.0	0.0
Capital accumulation (y-o-y)	1.7	0.8	0.6	0.4	0.2	0.1	0.1	0.2	0.3	0.3	0.4
Total factor productivity (y-o-y)	0.3	0.5	0.5	0.3	0.2	0.1	0.1	0.2	0.3	0.3	0.4
Current account balance (% of GDP), balance of payments	-8.2	-4.3	-3.9	-3.2	-0.2	1.5	1.1	1.4	.	.	.
Trade balance (% of GDP), balance of payments	-5.2	-1.1	-1.3	-0.2	1.5	3.3	2.5	2.4	.	.	.
Terms of trade of goods and services (y-o-y)	-0.2	5.1	-2.3	-3.7	-1.9	1.0	-0.8	0.7	0.6	-0.7	-0.2
Capital account balance (% of GDP)	0.6	0.3	0.5	0.4	0.5	0.6	0.5	0.7	.	.	.
Net international investment position (% of GDP)	-68.4	-93.5	-88.6	-91.9	-89.9	-94.3	-97.5	-89.9	.	.	.
Net marketable external debt (% of GDP) (1)	-66.2	-76.1	-78.6	-83.0	-81.4	-79.4	-81.4	-79.2	.	.	.
Gross marketable external debt (% of GDP) (1)	116.5	142.1	137.3	141.5	146.4	139.7	146.7	147.9	.	.	.
Export performance vs. advanced countries (% change over 5 years)	4.7	-1.3	-4.4	-0.2	-8.4	-2.6	-5.4	-1.48	.	.	.
Export market share, goods and services (y-o-y)	-3.0	2.3	-9.6	-1.0	-5.8	3.7	0.7	-0.9	.	.	.
Net FDI flows (% of GDP)	3.1	0.2	-0.1	0.9	-2.0	-1.8	0.8	2.7	.	.	.
Savings rate of households (net saving as percentage of net disposable income)	2.0	7.3	3.7	4.6	2.3	3.8	3.2	2.3	.	.	.
Private credit flow, consolidated (% of GDP)	23.9	-1.2	1.0	-3.8	-11.3	-10.3	-7.2	-2.7	.	.	.
Private sector debt, consolidated (% of GDP)	171.2	201.4	200.4	196.2	187.8	176.7	165.5	154.0	.	.	.
of which household debt, consolidated (% of GDP)	74.7	84.0	83.5	81.8	80.6	77.1	72.8	67.8	.	.	.
of which non-financial corporate debt, consolidated (% of GDP)	96.4	117.4	116.9	114.4	107.2	99.6	92.7	86.2	.	.	.
Corporations, net lending (+) or net borrowing (-) (% of GDP)	-4.7	4.2	4.7	4.1	8.3	5.1	4.2	4.6	4.7	3.8	3.3
Corporations, gross operating surplus (% of GDP)	21.2	24.9	23.6	23.3	23.9	23.9	24.1	24.1	24.2	23.9	24.0
Households, net lending (+) or net borrowing (-) (% of GDP)	-3.1	2.9	1.3	2.6	2.2	4.0	3.2	2.5	2.5	2.4	2.3
Deflated house price index (y-o-y)	6.7	-5.8	-3.7	-9.8	-16.8	-10.1	0.2	3.8	.	.	.
Residential investment (% of GDP)	11.3	8.1	6.9	5.7	4.9	4.1	4.3	4.4	.	.	.
GDP deflator (y-o-y)	3.5	0.3	0.2	0.0	0.1	0.4	-0.3	0.5	0.4	1.4	1.6
Harmonised index of consumer prices (HICP, y-o-y)	3.4	-0.2	2.0	3.0	2.4	1.5	-0.2	-0.6	-0.3	1.9	1.7
Nominal compensation per employee (y-o-y)	4.5	4.4	1.1	0.9	-0.6	1.4	-0.1	0.4	0.5	1.4	1.6
Labour productivity (real, person employed, y-o-y)	0.1	2.9	1.8	1.7	1.1	0.9	0.5	0.7	.	.	.
Unit labour costs (ULC, whole economy, y-o-y)	4.0	1.6	-1.6	-0.9	-2.6	-0.5	-0.4	0.2	0.2	1.1	1.2
Real unit labour costs (y-o-y)	0.5	1.4	-1.8	-1.0	-2.7	-0.8	-0.1	-0.3	-0.3	-0.3	-0.4
Real effective exchange rate (ULC, y-o-y)	2.9	-1.0	-3.9	-1.4	-6.3	0.6	-0.8	-3.4	0.0	0.4	-0.5
Real effective exchange rate (HICP, y-o-y)	1.4	0.5	-3.1	0.2	-2.4	1.9	-0.5	-4.2	0.6	-0.4	.
Tax rate for a single person earning the average wage (%)	20.2	19.8	21.6	21.9	22.9	22.9	23.0	21.5	.	.	.
Tax rate for a single person earning 50% of the average wage (%)	10.1*	8.7	9.1	10.4	11.6	11.8	12.0	9.7	.	.	.
Total Financial sector liabilities, non-consolidated (y-o-y)	12.3	4.0	-3.1	0.2	-2.2	-3.8	3.2	0.3	.	.	.
Tier 1 ratio (%) (2)	.	9.3	9.6	10.2	9.7	11.7	11.7	12.6	.	.	.
Return on equity (%) (3)	.	9.2	8.8	0.2	-25.6	6.0	5.7	6.6	.	.	.
Gross non-performing debt (% of total debt instruments and total loans and advances) (4)	.	3.6	4.1	5.2	6.4	7.9	6.7	5.3	.	.	.
Unemployment rate	9.6	17.9	19.9	21.4	24.8	26.1	24.5	22.1	19.6	17.7	16.0
Long-term unemployment rate (% of active population)	2.2	4.3	7.3	8.9	11.0	13.0	12.9	11.4	.	.	.
Youth unemployment rate (% of active population in the same age group)	20.4	37.7	41.5	46.2	52.9	55.5	53.2	48.3	44.4	.	.
Activity rate (15-64 year-olds)	70.9	73.1	73.5	73.9	74.3	74.3	74.2	74.3	.	.	.
People at risk of poverty or social exclusion (% total population)	24.1	24.7	26.1	26.7	27.2	27.3	29.2	28.6	.	.	.
Persons living in households with very low work intensity (% of total population aged below 60)	6.8	7.6	10.8	13.4	14.3	15.7	17.1	15.4	.	.	.
General government balance (% of GDP)	0.2	-11.0	-9.4	-9.6	-10.5	-7.0	-6.0	-5.1	-4.7	-3.5	-2.9
Tax-to-GDP ratio (%)	35.5	30.6	32.1	32.0	33.1	34.0	34.5	34.6	34.0	34.5	34.5
Structural budget balance (% of GDP)	.	.	-7.1	-6.4	-3.3	-1.9	-1.8	-2.6	-3.8	-3.6	-3.6
General government gross debt (% of GDP)	40.3	52.7	60.1	69.5	85.7	95.4	100.4	99.8	99.7	100.0	99.7

(1) Sum of portfolio debt instruments, other investment and reserve assets
(2,3) domestic banking groups and stand-alone banks.
(4) domestic banking groups and stand-alone banks, EU and non-EU foreign-controlled subsidiaries and EU and non-EU foreign-controlled branches.
(*) Indicates BPM5 and/or ESA95
Source: European Commission, European Central Bank

2. PROGRESS WITH COUNTRY-SPECIFIC RECOMMENDATIONS

Progress with the implementation of the recommendations addressed to Spain in 2016([8]) has to be seen in a longer term perspective since the introduction of the European Semester in 2011. Spain has a comparatively good record of Country Specific Recommendations (CSRs) implementation since 2011, which has however weakened since 2014, as the recovery gathered strength and reform fatigue set in. The Spanish economy has experienced a significant turnaround in recent years, also thanks to reforms undertaken in a challenging economic environment that partially addressed some of the rigidities in labour, product and financial markets.

Progress has been visible in the policy areas of financial sector, labour market and the long term sustainability of the public finances. Over the past few years, Spain has made substantial progress in restructuring the financial sector. The law on savings banks to strengthen their governance and reduce controlling stakes held by banking foundations has been applied. The implementation of plans for restructuring State-aided banks is well advanced. The labour market reforms undertaken in recent years have made employment more responsive to growth and job creation has resumed, supported by increased flexibility and continued wage moderation. Spain has also made progress in ensuring long-term sustainability of public finances also thanks to the 2011 and 2013 pension reforms.

Spain has also improved its fiscal framework. The 2012 Stability Law, as amended, the creation of an independent fiscal institution in 2013 and improvements made in the reporting of budgetary execution are cases in point. However, the assessments accompanying the Country Specific Recommendations have frequently noted that there is scope for a more automatic implementation of the Stability Law's preventive and corrective mechanisms.

Progress made in implementing product market reform CSRs has been mixed. Over the past few years the CSRs have called on the Spanish government to address regulatory fragmentation in Spain's internal market. The law on the guarantee of market unity has been in force more than three years. However, its implementation has visibly slowed down since the last quarter of 2015, judging from the limited progress made in adapting sector specific legislation to the principles of the law. The Council has also recommended Spain to reform professional services. However, since 2010, no horizontal reform of regulated professions has been adopted other than in the area of professional board certification of projects. Likewise, the benefits of the 2014 retail sector reform adopted by Spain's central government still depend on regional governments adopting the necessary implementing acts. On a more positive side, the Spanish government has reformed the corporate and personal insolvency policy frameworks and has taken measures to ease business licencing procedures.

Overall, Spain has made limited ([9]) progress in addressing the 2016 country-specific recommendations. This has taken place against the backdrop of a government without full legislative powers until November 2016. On CSR1, there has been some progress in implementing Spain's Stability Law at all government levels but limited progress on strengthening Spain's public procurement policy framework. The Commission finds that Spain has made some progress in implementing CSR2, following the adoption of a three-year action plan to strengthen the employment services' capacity to provide individualised support for long-term unemployed and the evaluation made of the regional employment services. On CSR3, progress is limited, as only small steps have been taken to increase performance-based funding of public research organisations and universities and to combine vocational training with higher education. On CSR4, Spain has made limited progress, judging from the slow pace of implementation of the law on market unity and the 2014 retail reform at regional level and as the reform of professional services has not yet been adopted.

([8]) For the assessment of other reforms implemented in the past, see in particular section 3.

([9]) Information on the level of progress and actions taken to address the policy advice in each respective subpart of a CSR is presented in the Overview Table in the Annex. This overall assessment does not include an assessment of compliance with the Stability and Growth Pact

Table 2.1: **Summary table on 2016 CSR assessment**

Spain	Overall assessment of progress with 2016 CSRs: Limited
CSR 1: *Ensure a durable correction of the excessive deficit, in accordance with the relevant decisions or recommendations under the excessive deficit procedure, by taking the necessary structural measures and by using all windfall gains for deficit and debt reduction. Implement at all government levels the tools set out in the fiscal framework law. Enhance control mechanisms for public procurement and coordination of procurement policies across government levels.*	**Limited progress (*)** • Some progress in implementing the fiscal framework law at all government levels • Limited progress public procurement policy frameworks
CSR 2: *Take further measures to improve labour market integration, by focusing on individualised support and strengthening the effectiveness of training measures. Enhance the capacity of regional employment services and reinforce their coordination with social services. Address gaps and disparities in minimum income schemes and improve family support schemes, including access to quality childcare and long-term care (MIP relevant)*	**Some progress** • Some progress in improving individualised support • Some progress in enhancing the capacity of regional employment services, but no significant progress in reinforcing their coordination with social services • Limited progress in addressing gaps and disparities in minimum income schemes and improving family support schemes
CSR 3: *Take further measures to improve the labour market relevance of tertiary education, including by incentivising cooperation between universities, firms and research institutions. Increase performance-based funding of public research bodies and universities and foster R&I investment by the private sector. (MIP relevant*)	**Limited progress** • Limited progress in improving labour market relevance of tertiary education • Limited progress in increasing performance-based funding and fostering R&I investment by the private sector
CSR 4: *Accelerate the implementation of the law on market unity at regional level. Ensure implementation by the autonomous regions of the reform measures adopted for the retail sector. Adopt the planned reform on professional services and associations. (MIP relevant*)	**Limited progress** • Some progress in implementing the law on market unity at regional level • Limited progress in implementing the retail reform at regional level • No progress in adopting the reform on professional services

(*) This overall assessment of CSR1 does not include an assessment of compliance with the Stability and Growth Pact. For more detail about fiscal surveillance see https://ec.europa.eu/info/business-economy-euro/economic-performance-and-forecasts/economic-performance-country/spain/fiscal-surveillance-spain_en

Source: European Commission

Box 2.1: Contribution of the EU budget to structural change in Spain

Spain is the third largest beneficiary of European Structural and Investment Funds (ESI Funds) with an allocation of up to EUR 37.4 billion up till 2020. This is equivalent to around 0.5 % of annual GDP (over 2014-2017) or 16 % of national public investment ([1]) . Out of the EU financing, EUR 1.5 billion is planned to be delivered via financial instruments, which is about a 50 % increase compared to the 2007-2013 period. By 31 December 2016, an estimated EUR 7.1 billion, which represents about 19 % of the total allocation for ESI Funds, have already been allocated to concrete projects.

Financing under the European Fund for Strategic Investments, Horizon 2020, the Connecting Europe Facility and other directly managed EU funds is additional to the ESI Funds. By end 2016, Spain has signed agreements for EUR 900 million for projects under the Connecting Europe Facility. The EIB Group approved financing under EFSI amounts to EUR 3.4 billion, which is expected to trigger nearly EUR 23 billion in total investments (as of end 2016).

ESI Funds helped implement a number of structural reforms in 2015 and 2016 via ex-ante conditionalities ([2]) and targeted investments. Examples of these reforms include improving the participative governance mechanisms to incentivise cooperation between universities, firms and research institutions and to increase research and innovation investment by the private sector (all this has been made possible through improving the quality of the RIS3 ([3]) for all regions). The transposition of the Energy Efficiency and Buildings Directives enabled more efficient and cost-effective investments in energy efficiency. These reforms have prepared the ground for better implementation of public investment projects in general, including those financed from national sources and from the other EU instruments mentioned above. The fulfilment of ex-ante conditionalities is on track, except in the area of water.

The Relevant CSRs focusing on structural issues were taken into account when designing the 2014-2020 programmes. These included strengthening research, technological development and innovation, increasing SMEs access to finance, fostering sustainable transport infrastructures, improving labour market access and promoting social inclusion. Spain has also received support from the Youth Employment Initiative to combat youth unemployment. Nearly 277 000 young people have participated in it of which 53 500 are in employment, education or training after the support from this initiative has ended.

In addition to the challenges reflected in past CSRs, the **ESI Funds address wider structural obstacles to growth and competitiveness**. The Funds contribute to increasing the share of R&D expenditure co-financed by the private sector with a view to reaching 60 % and to facilitating that 25 % of Spanish firms with more than ten employees incorporate technological innovation; improving the coverage of fast and ultrafast broadband for 100 % of households (30 Mbps internet) and 50% of the population (100 Mbps); fostering entrepreneurship and start-ups and making firms more competitive and better able to engage in higher added-value activities (including through ICT), with a view to ultimately increase their presence in international markets. And ease access to finance mainly by channelling EUR 1.5 billion through financial instruments. These funds will also contribute to increasing the employment rate, reducing early-school leaving and reducing the amount of people at risk-of-poverty or exclusion.

https://cohesiondata.ec.europa.eu/countries/ES

([1]) National public investment is defined as the sum of gross capital formation, investment grants and national expenditure on agriculture and fisheries.

([2]) Before programmes are adopted, Member States are required to comply with a number of ex-ante conditionalities, which aim at improving framework and conditions for the majority of public investments areas. For Members States that did not fulfil all the ex-ante conditionalities by the end 2016, the Commission has the possibility to propose the temporary suspension of all or part of interim payments.

([3]) Smart Specialisation Strategies (RIS3) have been developed and had to be approved for all regions, aiming to merge research with business needs.

3. SUMMARY OF THE MAIN FINDINGS FROM THE MIP IN-DEPTH REVIEW

3.1. INTRODUCTION

The 2017 Alert Mechanism Report called for further in-depth analysis to monitor progress in the unwinding of the imbalances identified in the 2016 MIP cycle. The selection was motivated by the fact that Spain was identified to have imbalances in spring 2016 after the last In-Depth Review (IDR) analysis, so that a new IDR is needed to assess how these imbalances evolve. The identified imbalances related to the high levels of external and internal debt, both private and public, in a context of high unemployment.

This Country Report provides an In-Depth Review into how the identified imbalances have developed. In particular IDR relevant analysis is found in the following sections: high government debt is analysed in Section 4.1.1; private sector indebtedness and its links with the financial sector are discussed in Sections 4.2.1 and 4.2.2; and external adjustment and competitiveness is assessed in section 4.4.1. An additional IDR relevant topic through its links to external sustainability and growth is that of productivity, also analysed in Sections 4.4.1 and 4.4.2. Labour market adjustment related aspects are dealt with in Section 4.3.1. Potential spillovers to the rest of the euro area are discussed in Box 3.1.

3.2. IMBALANCES AND THEIR GRAVITY

Spain's net international investment position remains very negative, and is mostly composed of debt. The large stock of net external liabilities (-88.7 % of GDP in Q3-2016) is mainly composed of net marketable debt (about 80% of GDP) ([10]), leaving the country highly exposed to adverse shocks or shifts in market confidence. Equity instruments (foreign direct investment / portfolio equity) do not imply the same risks as debt for external sustainability given that dividend payments can be adjusted during economic downturns, whereas servicing costs related to fixed-income liabilities are less sensitive to the cycle. Although much of the debt has long-term maturity and does not pose an immediate risk in terms of liquidity, it may pose a risk in terms of sustainability.

Private sector indebtedness is still high, but low interest rates reduce the associated financial burden. Private sector debt amounted to 167.5 % of GDP in Q3-2016 (65.2 % of GDP as household debt and 102.3 % of GDP as non-financial corporation debt, hereafter, NFC). A high level of debt increases vulnerability to interest rate shocks, and its associated financial burden constrains domestic demand. The financial position of Spanish households has strengthened thanks to improvements in the labour market and growing real disposable income, partly due to low or negative inflation and lower income taxes. Furthermore, the financial burden of household debt has been reduced by the prevailing low interest rates. However, indebted Spanish households are among the most vulnerable in the euro area to interest rate increases (Ampudia et al., 2014). On the corporate side, the net financial wealth of firms improved in 2015 for a third consecutive year, but is still negative.

Spain's general government debt ratio remains high, and fiscal sustainability risks are high in the medium term. The general government debt ratio peaked at slightly above 100 % of GDP in 2014, a sharp increase of about 65 percentage points above its trough of 2007. Under normal economic conditions and with no change of fiscal policy after the last Commission forecast year (2018), the Spanish general government debt would rise to almost 108 % of GDP by 2027 (see Section 4.1).

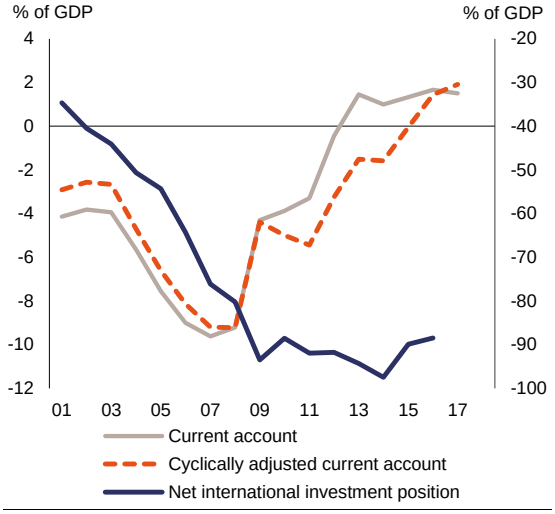
The unemployment rate is still very high (18.9 % in Q3-2016), particularly among young and low-skilled people. Besides, almost half of the unemployed have been without a job for more than one year, indicating a high risk of long-term unemployment becoming entrenched and human capital depreciation. This in turn constrains potential growth and productivity.

([10]) Marketable debt is composed of portfolio debt, other investment, reserves and financial derivatives

3.3. EVOLUTION, PROSPECTS, AND POLICY RESPONSES

The improvement in the current account has been due to structural, cyclical, and transitory factors (see Section 4.4.1). Spain has undergone a substantial current account adjustment in recent years, amounting to 11 pps. of GDP between 2007 and 2015. Much of this adjustment was due to an improvement in the trade balance of goods (about 6 pps. of GDP), initially driven by a collapse of domestic demand, but increasingly reflecting a structural improvement in export performance, such as the expansion in the number of regular exporters and cost competitiveness gains. Some of the improvement in the current account was also been driven by non-cyclical, transitory factors, such as low oil prices, low interest rates, or the depreciation of the euro (See Section 4.4.1). In cyclically adjusted terms, the current account has continued to improve (see Graph 3.1). However, the elasticity of imports with respect to final demand remains high, and no significant changes in import substitution are detected yet at the aggregate level. In addition, after years of cost-competitiveness gains, unit labour costs (ULC) have started to increase again and converge to the euro area average.

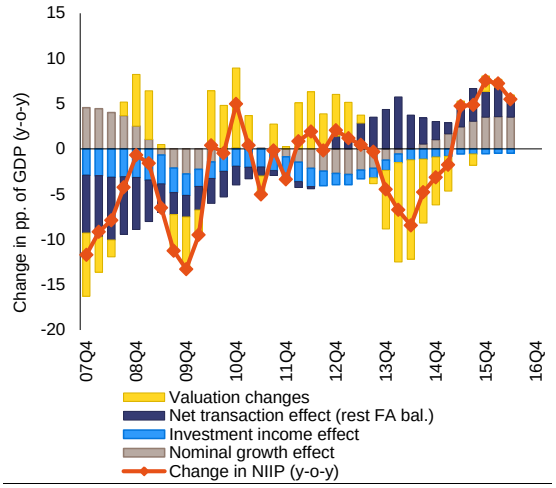
Graph 3.1: **Non-cyclical current account and NIIP**



Source: AMECO, European Commission

Current account surpluses are finally translating into a slow reduction of Spain's net external liabilities (see Graph 3.2**).** The external surpluses registered since 2013 and, as of 2014, high nominal growth, have started to translate into a slow reduction of Spain's net international investment position (NIIP) – Graph 3.2**.** Valuation effects, which played a strong role in the deterioration of net external liabilities in 2013 and 2014, have been broadly neutral since 2015. As a consequence, the NIIP has been improving since 2015, but at -88.7 % of GDP in the third quarter of 2016 it remains sizeable. In the short term, net external surpluses, strong real growth, and the pickup in inflation projected until 2018 should facilitate the further improvement of the NIIP.

Graph 3.2: **Breakdown of rate of change of net international investment position**



Source: Eurostat

Spain would need to maintain the current account surpluses over sustained periods of time in order to decisively reduce its net external liabilities. Even under relatively benign growth and inflation scenarios, Spain would need to maintain current account surpluses over a long period of time in order to bring down decisively its NIIP (See Table 3.1). In this context, the current account surpluses projected over the next two years continue to be partly driven by transitory factors. Maintaining these surpluses over sustained periods of time may therefore be challenging. This underscores the importance of safeguarding cost competitiveness, given that Spain is specialised in price-sensitive market segments. While cost-competitiveness gains in recent years have been largely achieved through wage moderation, supporting productivity growth is a key challenge going forward. Higher productivity growth could also attract foreign direct investment (FDI) and

reduce import dependence, thereby supporting external sustainability.

Private sector deleveraging is increasingly driven by GDP growth, while new credit continues to grow. Private sector debt has been reduced by more than 50 pps. of GDP since its peak in 2010. A large part of this reduction has been due to a decline in NFC debt (about 30 pps. of GDP), but progress in households deleveraging (20 pps. of GDP) was also remarkable. Even so, deleveraging needs remain sizeable, mainly for households. Although the outstanding volume of credit to the private sector is still shrinking, new bank lending to households and SMEs continues to grow. As new credit increases, debt reduction is now being supported by real GDP growth, especially for households (see section 4.2.2). Although NFC deleveraging has been mainly driven by negative credit flows, it is also now increasingly driven by real GDP growth. The projected pickup in inflation should further facilitate deleveraging in the private sector, even though consumption and investment are forecast to keep registering robust growth rates.

In 2016, Spanish banks furthered the process of balance sheet clean-up through the reduction in the crisis legacy of non-performing loans (NPLs). The banking system has ample access to liquidity and can comfortably meet the regulatory capital requirements. Solvency levels are resilient to a stress scenario, and the quality of banks' assets has further strengthened. The stock of NPLs went further down to 9.4 % as of July 2016, and is now close to the euro area average. After a sharp adjustment since the crisis, the housing market and the construction sector have bottomed out, and housing prices have been rising for almost three years in a row. Despite these positive signs, there is still a large stock of unsold houses, especially in some areas. The evolution of the real estate market remains important for banks' future profitability.

Reforms undertaken in 2014/2015 made corporate and personal insolvency and out-of-court procedures more flexible. Although the number of insolvency cases has continued declining, especially for corporate insolvencies, this has been to a large extent due to the improvement in economic conditions.

Public sector debt is not being reduced. The deficit in 2015 was 5.1 % of GDP. According to the Commission 2017 winter forecast, the deficit should decline to 4.7 % of GDP in 2016. It is then expected to narrow to 3.5 % and 2.9 % of GDP in 2017 and 2018. Since 2014, the slow reduction of the deficit has been relying to a large extent on the positive macroeconomic outlook and the improving financing conditions. Public sector debt is expected to remain stable at around 100 % of GDP, as strong nominal GDP growth largely offsets the still large, though declining, deficit expected until 2018. Thanks to the relatively benign macro-financial situation, there is no immediate risk of fiscal stress. However, risks to fiscal sustainability remain significant in the medium term (See Section 4.1.1).

The labour market has kept improving, but high levels of long-term unemployment increase the risk of human capital depreciation. Strong job creation has continued throughout 2016, and is expected to slow but remain robust until 2018. Robust job creation has been underpinned by ongoing wage moderation and the labour market reforms implemented in previous years. These include a reform of the wage bargaining system to promote more wage bargaining decentralization. Despite this, evidence shows that firm level bargaining is not picking up. The minimum wage has increased by 8% in 2017, but the immediate impact on job creation and the overall wage distribution is likely to be modest (see section 4.3.1). There is however a risk that high unemployment becomes entrenched. Spain is taking measures to strengthen individual support to the long-term unemployed, but their impact relies on the capacity of the regional public employment services, which so far has been limited. In addition, addressing the education gaps is critical to reduce structural unemployment and support the reallocation of resources towards more productive activities.

Table 3.1: **Current account and net international investment position sensitivity analysis**

	Low nominal GDP growth (2% average 2016-25)	Medium nominal GDP growth (3,2% average 2016-25)	High nominal GDP growth (4.5% average 2016-25)
NIIP Stabilisation	-2.1	-3.1	-4.2
NIIP at -65% of GDP	0.4	-0.5	-1.4
NIIP at -50% of GDP	2	1.2	0.4
NIIP at -35% of GDP	3.7	2.9	2.2
NIIP at -20% of GDP	5.3	4.7	4

(1) The table above shows the current account balance needed to achieve different NIIP values by 2025, based on several nominal GDP growth scenarios
(2) NIIP stabilisation implies a NIIP level of -92.5 % of GDP by 2025
(3) These simulations do not take into account REER and valuation effects
(4) Other assumptions are average yields (nominal effective) over the 2016-2025 of 3.0 % for domestic yield, and of 3.4 % for foreign yield
(5) Domestic yield is the long-term interest rate (as in AMECO and long-term projections)
(6) Euro area / foreign yield is the underlying long-term interest rate on foreign assets, and the spread "external liability-domestic yield" is based on the median 2004-2012 spread between returns of foreign liabilities and the long-term interest rates
Source: European Commission calculations

The share of temporary work is very high, with negative impact on productivity growth and social cohesion. There is evidence that labour market segmentation negatively affects productivity through various channels (see section 4.3.1). The impact of the labour market reforms in reducing segmentation has been mildly positive.

3.4. OVERALL ASSESSMENT

Spain has undertaken a substantial adjustment in terms of flows, but significant vulnerabilities remain in terms of stocks. Private sector deleveraging has continued to advance. However, public sector debt has not been reduced on account of large but declining deficits, resulting in a slow reduction of the very high level of net external debt. In order to bring down decisively its stock of external liabilities, Spain would have to record large current account surpluses over a long period of time. Based on current external dynamics, this appears challenging. Low productivity growth makes competitiveness gains hinge on cost advantages, also affecting working conditions. Besides, some of the factors behind the improvement in the external balance have been of a transitory nature. Although unemployment has been declining rapidly, it remains very high, especially for the young and long-term unemployed, and risks becoming entrenched. Measures have been taken to maintain cost competitiveness, but continued efforts are needed to further strengthen the resilience of the banking sector, ensure a durable reduction of the general government deficit and resume structural growth.

Table 3.2: **MIP assessment matrix — Spain**

	Gravity of the challenge	Evolution and prospects	Policy response
	Imbalances (unsustainable trends, vulnerabilities and associated risks)		
External position	Spain has a high stock of net external liabilities (-88.7 % of GDP in 2016 Q3), mainly composed of debt instruments. In spite of the high proportion of public debt, this exposes Spain to adverse shocks or shifts in market sentiment.	The current account has been in surplus since 2013, and is expected to remain at or above 1.7 % until 2018. However, some of this improvement has been due to temporary factors, such as low energy prices and geopolitical tensions in other tourist destinations. After years of cost-competitiveness gains vis-à-vis the euro area, ULCs have started to increase again and are expected to converge to the euro are average. No major improvement in non-cost competitiveness can be evidenced yet. Nevertheless, the increase in the number of regular exporters confirms some structural changes drive exports positive performance (see Section 4.4.1). The external surpluses registered since 2013 and, as of 2014, high nominal growth, have started to translate into a slow reduction of Spain's net external liabilities. The external surpluses, real GDP growth, and the pickup in inflation projected until 2018 should further facilitate the improvement of the NIIP over the medium term. However, maintaining current account surpluses over sustained periods of time, not granted by current external dynamics, would be needed to bring down decisively the NIIP over the medium term.	Measures have been taken to restore and maintain cost competitiveness. These include a reform of the wage bargaining system — although evidence shows that firm level bargaining is not picking up. No major improvement in non-cost competitiveness can be evidenced yet. Challenges are still present regarding R&D, innovation and technology level
Public debt	Spain has a high level of public debt, which amounted to 99.8 % in 2015. It is forecast to drop to 99.7 % of GDP in 2016, before increasing to 100 % in 2017 and then decline again to 99.7 % in 2018 (see Section 4.1.1). A large stock of public debt is a burden on the economy and makes Spain vulnerable to changes in financial or economic conditions and increasing financing costs. The country faces high debt-sustainability risks in the medium term (see Section 4.1.1).).	The public debt ratio has been increasing, as a result of persistently large, though declining, headline deficits. Standard debt sustainability analysis indicates that without further consolidation measures, debt would reach almost 108 % of GDP in 2027 (see Box 4.1.1).	The Commission concluded that the updated Draft Budgetary Plan of Spain is broadly compliant with the provisions of the Stability and Growth Pact. The required fiscal effort is projected to be met in both 2017 and in cumulative terms over 2016 and 2017. While the fiscal policy measures taken so far have significantly increased the probability of meeting the 2016 headline deficit target, the 2017 headline deficit target is not projected to be met. The excessive deficit procedure is currently kept in abeyance.

(Continued on the next page)

Table (continued)

Public debt	Spain has a high level of public debt, which amounted to 99.8 % in 2015. It is forecast to drop to 99.7 % of GDP in 2016, before increasing to 100 % in 2017 and then decline again to 99.7 % in 2018 (see Section 4.1.1). A large stock of public debt is a burden on the economy and makes Spain vulnerable to changes in financial or economic conditions and increasing financing costs. The country faces high debt-sustainability risks in the medium term (see Section 4.1.1).).	The public debt ratio has been increasing, as a result of persistently large, though declining, headline deficits. Standard debt sustainability analysis indicates that without further consolidation measures, debt would reach almost 108 % of GDP in 2027 (see Box 4.1.1).	The Commission concluded that the updated Draft Budgetary Plan of Spain is broadly compliant with the provisions of the Stability and Growth Pact. The required fiscal effort is projected to be met in both 2017 and in cumulative terms over 2016 and 2017. While the fiscal policy measures taken so far have significantly increased the probability of meeting the 2016 headline deficit target, the 2017 headline deficit target is not projected to be met. The excessive deficit procedure is currently kept in abeyance.
Private debt	The total stock of private non-financial sector debt stood at 167.5 % of GDP in 2016 Q3 in non-consolidated terms, which constitutes a vulnerability and constrains demand and growth in light of deleveraging needs (see Section 4.2.2). Household debt remains high, at 65.2 % of GDP in 2016 Q3, whereas corporate debt stands at 102.3 % of GDP.	The debt stock of the private sector has been reduced by about 50 pps. of GDP since its peak (about 30 pps. for corporates and 20 pps for households); however, deleveraging needs are still present, especially for households. Real GDP growth has become the main driver of private sector deleveraging as new credit hast started flowing again to the private sector. While Spanish households remain vulnerable, they have strengthened their financial position, aided by the prevailing low interest rates and improved economic conditions. Banks have restructured their activity and cleaned up their balance sheets, and the non-performing loans (NPLs) ratio has continued to decrease and is now close to the euro area average (9.2 % in September 2016). The housing market has started to recover.	Measures were taken in 2015 in the area of personal and corporate insolvency (see Section 4.2.3), which may have a positive impact on NPLs, as well as access to finance. The impact of those changes is still difficult to discern, as insolvencies have become less frequent due to improving economic conditions in general.
	Adjustment issues		
Unemployment	The unemployment rate stood at 18.6 % in Q3-2016, with the youth unemployment at 41.9 %, and the share of long-term unemployment at 48.1 %, both rates among the highest in the EU (see Section 4.3.1). The persistence of high unemployment reflects frictions in the adjustment process to existing macroeconomic imbalances. Labour market adjustment is key to prevent the risk of hysteresis, ensure a lasting competitiveness improvement and mitigate social distress.	Unemployment has been declining rapidly, but it remains very high, especially for the youth and long-term unemployed. Wage moderation has continued, facilitated by negative inflation, but productivity growth has remained very modest. High levels of labour market segmentation (permanent vs. temporary employment) continue to affect negatively productivity and working conditions.	Preliminary estimates suggest that the 2012 labour market reform had a positive effect on job creation. The latest proposal for a minimum wage increase is likely to have a limited impact on the overall wage distribution and job creation. Challenges are still present, especially concerning the system the education system and enhancing the capacity of public employment services.
	Conclusions from IDR analysis		
• Spain is characterised by a combination of large stock imbalances in the form of external and internal debt, both public and private. These constitute significant vulnerabilities as they expose Spain to adverse shocks or shifts in market sentiment which would have harmful implications for the real economy, especially given the context of still very high unemployment. • The current account balance and cost competitiveness have significantly improved since the crisis but net external liabilities have only started to slowly decrease. Private sector deleveraging is on track and the reduction of debt-to-GDP ratios is now supported by a favourable real and nominal GDP growth. Public debt keeps increasing, on account of persistently large though declining deficits. Despite recent improvements, unemployment remains very high.		

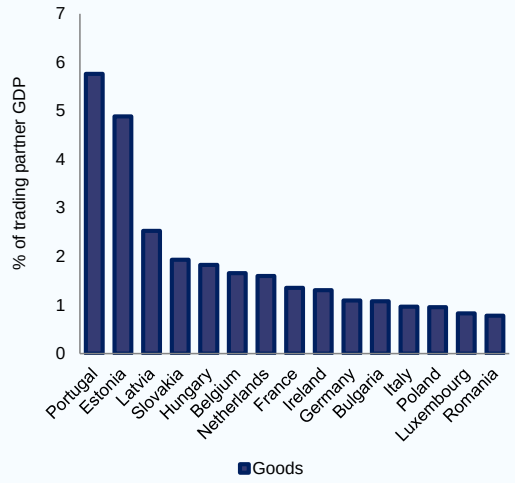
Source: European Commission

Box 3.1: **Euro area spillovers**

Given its relatively large size and openness, the Spanish economy is a potentially significant source of outward spillovers. These refer to Member States' exposure, through trade and financial ties, to adverse shocks hitting Spain.

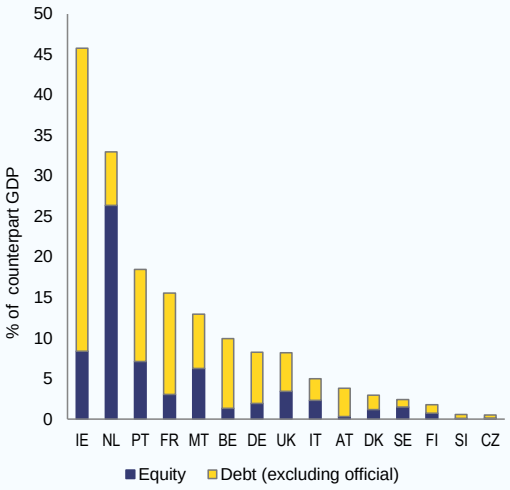
Portugal and Estonia are the most vulnerable to outward spillovers due to their large exports of goods to Spain. These were the countries with the largest exports to Spain as a share of their domestic GDP in 2014, with 5.8 % of Portuguese and 4.9 %, of Estonian GDP, (see Graph 1).

Graph 1: Exports to spain as share of exporting country's GDP (top 15 EU trade partners) in 2014



Source: European Commission based on UN data.

Graph 2: Exposures of EU countries to Spanish foreign liabilities



Gross foreign liabilities as a % of counterpart GDP
Source: European Commission based on Hobza and Zeugner (2014)

Ireland, the Netherlands, Portugal and France have the highest gross financial exposures to Spain (excluding Luxembourg). Spanish external liabilities amount to approximately 45 % of Ireland's GDP, more than 30 % of Dutch GDP, and more than 15 % of Portuguese and French GDP (see Graph 2). Overall, the euro area shows total financial exposures to Spain worth more than 15% of GDP.

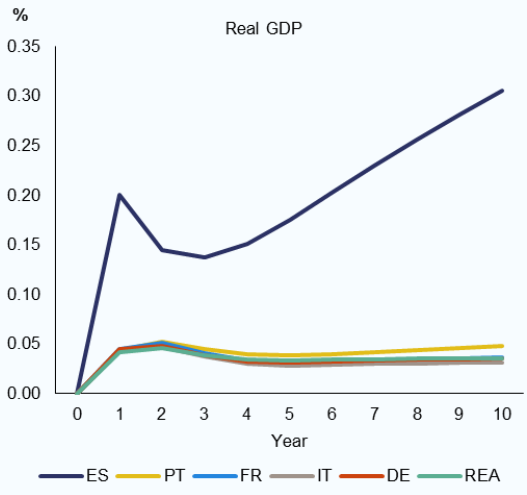
To illustrate spillover effects of policy changes in Spain to other countries, we model the impact of a growth-friendly increase in government expenditure offset by higher taxes. Using the Commission's QUEST model[1], we simulate a rise of government spending equivalent to 0.5% of GDP which is distributed equally on public investment and consumption. This could be thought of as a combined increase in resources for higher education and training and support for private research and development. This expenditure is financed by a value added tax raise resulting in revenues of the same magnitude. Both changes are sustained over ten years, assuming a binding zero lower bound on ECB rates for the first two years. We consider the impact on real GDP and current account balance of selected countries as well as the rest of the euro area (see Graphs 3 and 4).

[1] QUEST is the global macroeconomic model DG ECFIN uses for macroeconomic policy analysis and research. Detailed information on the model and applications are available at: http://ec.europa.eu/economy_finance/research/macroeconomic_models_en.htm.

(Continued on the next page)

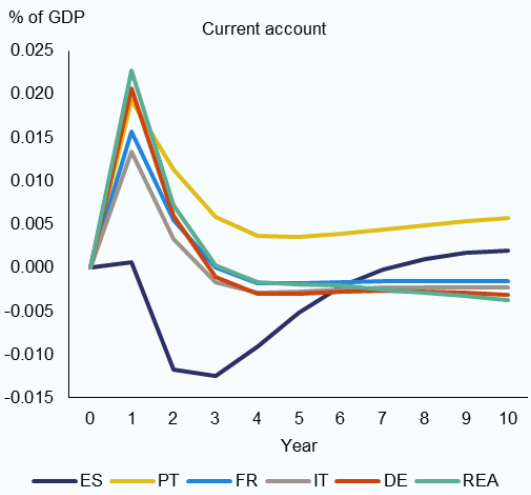
Box (continued)

Graph 3: Simulation results: impact on real GDP



REA: rest of euro area
Source: European Commission

Graph 4: Simulation results: impact on current account



REA: rest of euro area
Source: European Commission

The simulation shows small spillover effects on other Member States' real GDP, and a non-negligible initial impact on their current account balance. The fiscal stimulus initially boosts Spanish real GDP by about 0.2 %. Through positive supply effects building up over time, real GDP is further increased by up to 0.3 % over the rest of the simulated period (an example would be an increase in the stock of intangible assets due to the higher support to research and development). The impact on real GDP of the rest of the euro area is small (below 0.05 %) but persists over the simulation period (see Graph 3). Spain's current account turns negative after the first year before slowly rising and turning slightly positive after year 6. The spillover effect on other euro area countries' current account consists in an initial positive spike by around 0.025 % of GDP (see Graph 4). The effect levels off after year 2, except for Portugal, where it partially persists over the whole simulation period. This likely reflects Portugal's substantial trade exposure to Spain (see Graph 1).

4. REFORM PRIORITIES

4.1. PUBLIC FINANCES AND TAXATION

4.1.1. PUBLIC SECTOR DEBT

Spain's general government debt ratio remains high and is not yet on a clear declining path. After rising sharply in the years following the financial crisis, the general government debt ratio peaked at slightly over 100 % of GDP in 2014, about 65 percentage points above its trough of 2007. The Commission 2016 winter forecast projects the debt ratio to stabilise at just below that peak level over 2016-18, as relatively strong nominal GDP growth largely offsets the still large, though declining, expected deficit. As the private debt ratio has declined from its peak levels, general government debt now makes up a much larger share of the total indebtedness of the economy – at around 40% in 2015 relative to around 20% in 2010, the year in which private debt peaked (See Graph 4.2.4).

Spain does not appear to face immediate risks of fiscal stress. ([11]) This is mainly thanks to the improved macro-financial situation, in particular strong real GDP growth, a positive current account balance and regained cost competitiveness, as well as the low proportion of short-term debt among non-financial corporations and households. In an assessment of the balance of risks stemming from the macro-financial situation, these favourable features more than offset Spain's still sizeable negative net international investment position and low household savings rate. Short-term risks related to the still high general government deficit and the financing structure of public debt are mitigated by improved investor confidence (as measured by the decline in yield spreads since 2012). Nevertheless, the still high general government deficit and debt ratios remain a source of vulnerability to changes in market sentiment, also given the proportion of total public debt that is of a short-term nature (8.0 %) or held by non-resident creditors (43.3%).

Spain faces high fiscal sustainability risks in the medium term. Under normal economic conditions and with no change of fiscal policy after the last Commission forecast year (2018), the Spanish general government debt would rise to around 108 % of GDP by 2027 (last projection year). The increase of around 8 pp over a 10-year horizon is driven by the persistent primary deficit throughout the projection period and a growing interest rate-growth differential, especially in the latter part of the projection period (see Box 4.1.1 for further details and for alternative debt projection scenarios). Furthermore, Spain's structural primary balance would need to improve by as much as 4.6 % of GDP in cumulated terms over a five-year horizon (from 2018 until 2023) relative to the baseline no-fiscal policy change scenario to reach the 60 % public debt-to-GDP ratio reference value by 2031([12]).

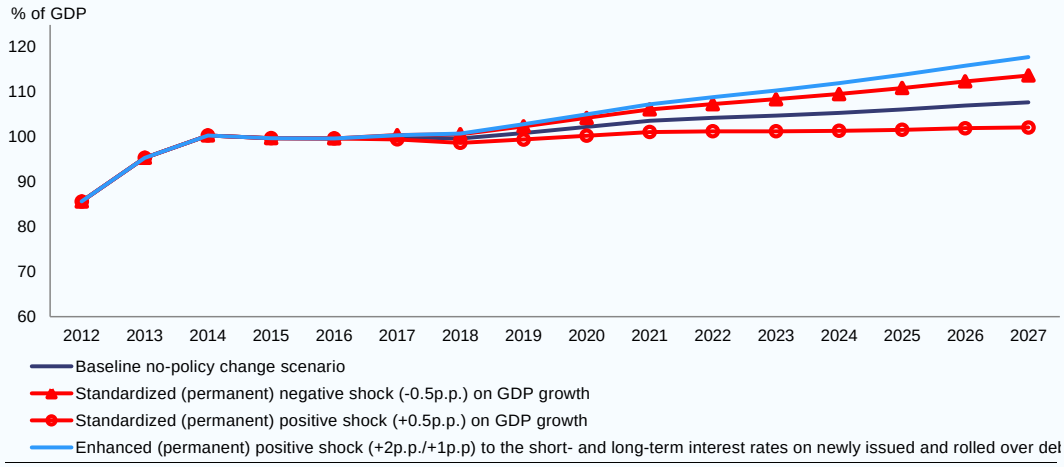
([11]) As measured by the S0 indicator, which is an 'early-detection indicator', designed to highlight short-term fiscal risks stemming from either the macro-financial or the fiscal side of the economy. It is a composite indicator using a wide range of variables with a proven track record of detecting fiscal stress. For an overview of the European Commission's fiscal sustainability risk assessment see European Commission (2017), 'Debt Sustainability Monitor 2016', European Economy, Institutional Paper No. 047.

([12]) The following thresholds apply: (i) for values lower than 0, the country is assigned low risk; (ii) for values lower than 2.5 pp, it is assigned medium risk; (iii) for values greater than 2.5 the country is assigned high risk.

Box 4.1.1: **Long-term projections of general government debt**

The public debt trajectory has been simulated under different scenarios. Under the baseline scenario, the general government debt is forecasted to increase throughout the projection period to reach about 107.8 % of GDP in 2027 (the end of the projection horizon). The baseline has been derived from the Commission's 2017 winter forecast, consistent with the forecast implicit interest rate and the shares of short-term and long-term public debt. It has a number of technical assumptions. First, over the post-forecast horizon, the structural primary balance is set constant at the value projected for 2018. The cyclical component of the primary balance is calculated using (country-specific) budget balance sensitivities over the period until output gap closure is assumed (2021). Second, the long-term interest rate on new and rolled-over debt is assumed to be 3.0 % in real terms by the end of the projection horizon, while the short-term real interest rate reaches an end-of-projection value that is consistent with the 3.0% long-term real interest rate and the value of the euro area yield curve. Third, the GDP deflator is assumed to change linearly until it reaches 2% in 2021 and remain constant thereafter. Fourth, the stock-flow adjustment is set to zero after 2017. Finally, medium-term real GDP growth projections are based on the T+10 methodology agreed with the EPC and are assumed to average 1.7% in the 2015-2021 period and to decelerate to 1.1% on average in the 2022-2027 period.

Graph 1: **Gross debt, Spain**



Source: European Commission

More favourable assumptions on real growth would lead the debt ratio to follow a lower path to rea 102.2 % of GDP in 2027. By contrast, under more unfavourable assumptions on real GDP growth interest rates, the debt ratio would increase, respectively, to 113.7 % or 117.8 % of GDP by 2027.

In the longer term, risks to fiscal sustainability are significantly mitigated by savings in age-related expenditure. These correspond to savings in non-health ageing related spending (pensions, education and unemployment benefits), also due to the recent pension reform. By contrast, public expenditure on health care and long term care is projected to increase slightly above the average increase for the EU over the horizon till 2060 (by 1.1 pp against 0.9 pp, respectively). The projection is based on current expenditure trends and the expected demographic changes.

The persistent deficit of the social security system is receiving policy attention. Two successive reforms of the pension system, in 2011 and 2013, will help contain the increase in pension expenditure in the long term, while also resulting in lower income replacement rates at retirement. However, despite these reforms social security sector has been running widening deficits since 2011. Behind this development lies the loss of revenues as employment fell in the wake of the crisis while pension expenditure continued to increase, driven by demographic trends and the

fact that new entrants have higher pensions than those who exit the system. More recently, the rebound in employment is supporting contributions paid into the system, but the 0.25% minimum annual revaluation of pensions in a context of low or even negative inflation, and the various employment incentive schemes in the form of contributions' rebates, have weighed on social contributions' revenues. To strengthen revenues, in December 2016 the government raised the maximum contributory base by 3%. ([13]) This is expected to bring in EUR 300 million in additional revenues in 2017. On 22 November 2016, the Toledo Pact parliamentary committee ([14]) launched a discussion on the possible further revisions of Spain's pension system, in the light of the persistent social security deficit but also as part of a regular review of the sustainability and sufficiency of the pension system against the backdrop of the increase in life expectancy and low fertility rates. The Committee will look into measures to be adopted in the short term to reduce that deficit (e.g., through the allocation of existing tax revenues to the funding of social security rebates and/or survivors' pensions).

4.1.2. TAX AND GOVERNMENT SPENDING STRUCTURE

Spain raises less tax revenue as a share of GDP than the EU or euro area average. In 2015, Spain's tax burden accounted for 34.6% of GDP in 2015 compared to an EU average of about 40% and euro area average of 41.4%. Spain raises roughly equal shares of revenues from indirect taxes, direct taxes and social contributions (see 2016 country report for details). Measured by the implicit tax rates on labour or the tax wedge on the average wage, Spain ranks low in the league table of EU countries. The scope for higher taxation on labour income is however limited, given the need to bring down the high unemployment rate.

The low share of consumption tax revenues is linked to a relatively high policy gap in VAT ([15]). At 21 %, Spain's standard VAT rate was in line with the EU median in 2014. However, Spain has relatively low VAT revenues. This is mainly due to Spain extensively applying exemptions or reduced rates ([16]) on various goods and services. As a result, Spain recorded the largest policy gap in the EU in 2014 (59 % compared to the EU average of about 44 %), up from 53.9 % in 2013. In contrast, the VAT compliance gap– the difference between the theoretical VAT liability and the revenue actually received– continued to decrease and amounted to 9 % in 2014 (down from a peak of 14 % in 2011), significantly below the EU average of about 14 % (see 2016 country report for a more detailed discussion of measures against fraud).

A reduction of the policy gap in VAT is likely to bring in higher tax revenues. Simulations conducted by the European Commission Joint Research Centre based on the EUROMOD model (See Box 4.1.2) show that reducing the actionable VAT policy gap would increase revenues by 0.2-1.4 % of GDP, depending on the scope and extent of the reduction. Any negative distributional effects can be reduced or avoided by giving priority to items with little or no regressive effects or compensated through other means, such as social transfers.

([13]) Royal Decree Law 3/2016 of 2 December 2016.

([14]) This parliamentary committee is a forum for the follow up and evaluation of the Toledo Pact agreement, which laid out the reform of the Spanish social security system that was approved by the Spanish parliament on 6 April 1995.

([15]) The policy gap is an indicator of the VAT revenue theoretically foregone by applying non-standard rates to some goods and services, expressed as a share of revenues that would be collected if everything was taxed at the standard rate and assuming full compliance.

([16]) Spain applies a super-reduced VAT rate of 4 % *inter alia* on foodstuffs, pharmaceutical products, some medical equipment, some books and newspapers and social housing and a reduced rate of 10 % *inter alia* on domestic transport, hotels, take-aways, bars and cafes, agricultural inputs, treatment of waste and waste water and collection of household waste.

Box 4.1.2: **EUROMOD simulations for narrowing of the actionable policy gap in VAT**

Spain has one of the largest policy gaps in VAT in the EU. This box presents the fiscal and distributional impacts of four reform scenarios for the Spanish VAT rate structure that would reduce the VAT actionable policy gap ([1]). The reform scenarios vary from an increase in the super-reduced VAT rate (Scenario no 1) to increases in both the super-reduced and reduced VAT rates (Scenario no 2 and 3). Scenario no 4 considers the elimination of both the super-reduced and the reduced rate rates. Table 1 summarizes the results of the various simulations compared to the 2015 baseline scenario. The estimated impact on tax revenue varies from around 0.2 % of GDP in Scenario no 1 to about 0.4-0.5% of GDP in Scenario no 2 and 3 and about 1.4% of GDP in Scenario no 4. Income inequality measured by the Gini coefficient increases in all scenarios compared to the baseline, especially in scenario no 4.

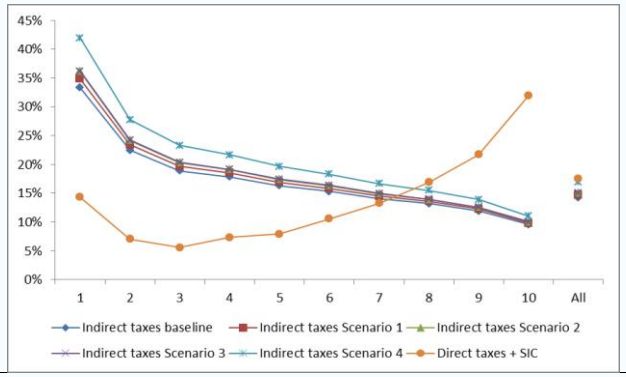
Table 1: VAT simulations performed

	Rates %				
Scenario	**Super-reduced**	**Reduced**	**Standard**	**Δ gov't revenue (% of GDP)**	**Gini coefficient**
Baseline	4	10	21	0	0.345
Scenario 1	10	10	21	0.2	0.346
Scenario 2	8	14	21	0.5	0.348
Scenario 3	12	12	21	0.4	0.348
Scenario 4	21	21	21	1.4	0.354

Source: European Commission, Joint Research Centre, based on the EUROMOD model

Graph 1 shows the effect of direct taxes, social security contributions (employee and self-employed) and indirect taxes by deciles, as a percentage of disposable income. There is a clear regressive pattern of indirect taxes (with a very large impact in the first decile), and a mostly progressive pattern of direct taxes and contributions (except in the first three deciles, due to contributions). Comparing the VAT scenarios, the ranking observed in aggregate terms is also observed here across deciles, the effect of scenarios 1 to 3 having only a relatively limited impact on income inequality compared to scenario no 4. ([2])

Graph 1: Taxes as a % of disposable income, by deciles of disposable income



Source: European Commission, Joint Research Centre, based on the EUROMOD model

([1]) The simulations have been conducted by the Joint Research Centre of the European Commission, using EUROMOD.
([2]) The rates in the lower income deciles are higher than the maximum VAT rate, as expenditures exceed income for various reasons, such as measurement error, dependence on the frequency of expenditures, length of the period. In a life cycle perspective we would expect this to vanish or become much less important.

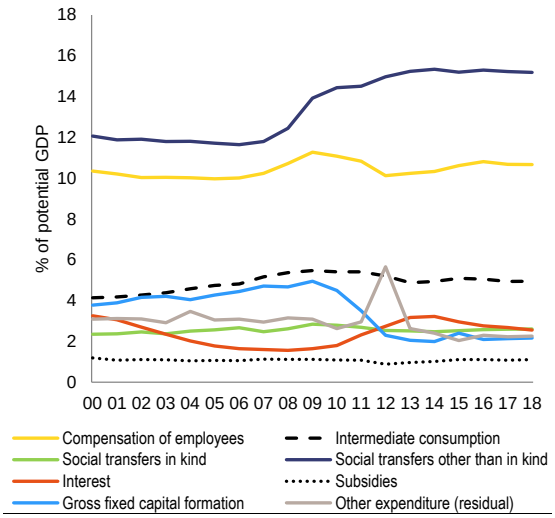
Environmental taxes are still below the EU average, despite increases in recent years. Environmental taxes in Spain amounted to about 1.8 % of GDP in 2014, compared to an EU average of about 2.5 % of GDP. In particular, taxes on transportation only yield half as much revenue in

Spain as the EU average, reflecting a relatively low level of excise duties on both unleaded petrol and diesel. As a share of total tax revenues, Spain also relies less on environmental taxes than its EU peers (5.5 % vs 6.3 %).

In property taxation, Spain relies to a relatively low extent on recurrent taxes. While overall revenues from property taxation in Spain are close to the EU average, the recurrent element is below the EU average (1.3 % of GDP v 1.6 % in 2014). No major policy changes have been introduced in the area of property taxation in recent years, except for the gradual phasing out of mortgage deductibility. From a theoretical point of view, recurrent property taxes are considered among the taxes least detrimental to growth and preferable to transaction taxes, as the former allow a more efficient allocation of assets, as well as higher labour mobility.

On the expenditure side, the crisis-induced rise in the expenditure ratio has been partly reversed. General government expenditure reached 43.8% of GDP in 2015, compared with an EU average of 48.8% and a euro area average of 49.6%. In the years following the crisis, the expenditure ratio rose sharply, as GDP fell, unemployment benefits rose sharply and other government expenditure continued to rise, but it has subsequently declined as economic growth has resumed, the interest burden has decreased and investment been reduced. However, some expenditure ratios are expected to be at higher levels in 2018 than during the years prior to the crisis, also when measured against potential GDP. Graph 4.1.1 shows the evolution of the main expenditure items from 2000 to 2018 (with 2016-2018 based on the Commission 2016 autumn forecast). Compared to the average for 2000-2007, total expenditure is expected to be about 1.9 % of potential GDP higher in 2018, despite a halving of gross fixed capital formation as a percentage of potential GDP during the crisis. Although there might have been some excessive investment in the years leading up to the crisis, the subsequent steep decline has left the former at historically low levels. Both compensation of employees and intermediate consumption have ratios above the pre-crisis period and this is expected to remain the case in 2018 (at 15.6 % of potential GDP, their aggregate ratio is expected to be 1.0 % of potential GDP higher in 2018 than the average for 2000-2007.

Graph 4.1.1: **Evolution of expenditure ratios for various categories**

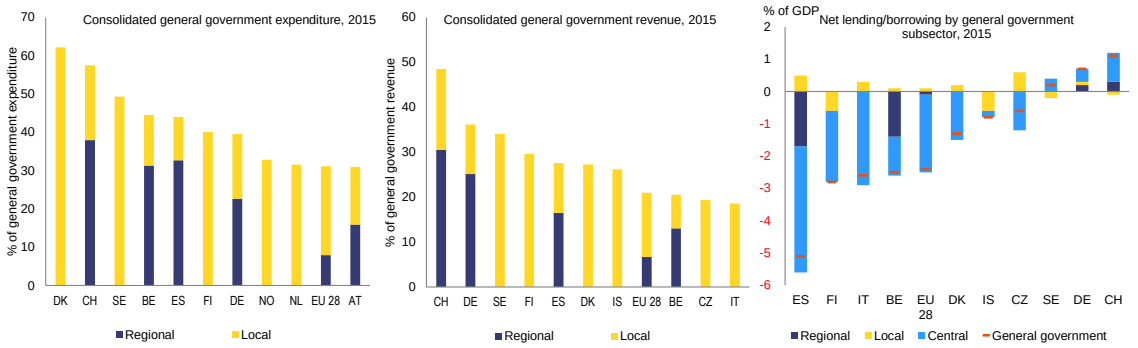


Source: European Economic Forecast - Autumn 2016

Some ongoing and planned policy initiatives aim to increase efficiency of spending, but weaknesses in public procurement remain an obstacle. Efforts to implement the CORA reform continued, a programme for administrative reform launched in 2012 including a broad set of measures to enhance efficiency and effectiveness in the public sector at all general government levels. According to the latest implementation report, 87 % of the 222 concrete measures included in the reform had been implemented by June 2016([17]). These measures include i) reducing duplicated administrative structures within the central government and between central and regional governments; ii). reducing administrative burdens; iii) streamlining overheads; and iv) rationalising the central government's 'institutional' administration. The government has also announced that it will ask the independent fiscal body, AIReF, to undertake a general spending review to identify further areas of potential efficiency gains. Inefficiencies in public procurement policies (see Section 4.5) limit the potential efficiency gains from some of these measures.

([17]) http://transparencia.gob.es

Graph 4.1.2: **General government revenue, expenditure and balance by subsector**

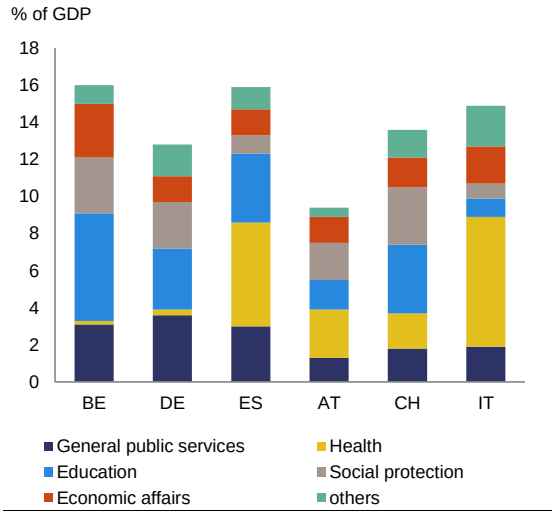


(1) Regional government sub-sector corresponds to ESA category S.1312 (i.e., State government).
Source: Eurostat, own calculations.

4.1.3. FISCAL FRAMEWORKS

Spain is a highly decentralised country. In 2015, consolidated regional and local government expenditure (as percent of total general government spending) stood at a level comparable to that in federal Belgium, at around 42%. Decentralisation is also considerable on the revenue side, although as in other countries, less intense than on the expenditure side: the share of total general government revenues owned by sub-central governments amounted to around 27%. In 2015, the sub-central government subsector in Spain recorded a higher share in the general government deficit than in other countries with a regional dimension and in the EU28 (Graph 4.1.2).

Graph 4.1.3: **Expenditure structure of regional governments, 2014**



Source: Eurostat. Cofog data

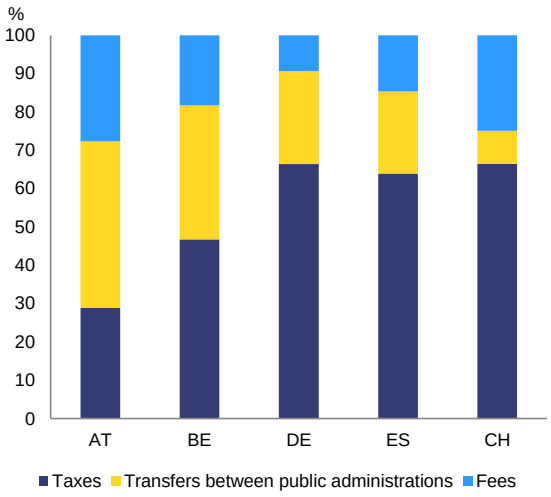
Despite not being *de iure* a federal country, Spain has a strong regional dimension. Regional governments in Spain are responsible for a variety of expenditure functions, mostly geared towards the provision of public services such as healthcare, education, and social protection policies. Spain stands out together with Italy for the importance of the healthcare function relative to Austria and Switzerland, and above all, to Germany and Belgium, where healthcare spending is to a large extent centralised (Graph 4.1.3). Over time, the share of taxes in Spain's regional revenue has become more important than the share of transfers from other government levels, namely the central government. In 2015 the share of own taxes – excluding shared taxes on which regional governments have no normative powers, which are

treated as transfers in revenue statistics - was slightly smaller than in Germany and Switzerland (Graph 4.1.4).

Regional governments play an important role in shaping policies in Spain. There is more to the role of government than managing resources and providing services. The regional authority index (Hooghe et al., 2016), a composite indicator measuring the powers of regional governments across ten dimensions, including law making and policy scope (see Graph 4.1.5), also place Spain in the group of most decentralised countries in the world. The graph also shows that over the past few decades, Spain has reached comparable levels of decentralisation than long-established federal countries.

The regional financing system is based on the constitutional principles of autonomy, solidarity and coordination with the government's fiscal policy. There are two regional financing systems in Spain: the common and the *foral* system. The former, which is the object of this section, applies to all regions other than Navarre and the Basque Country. It is regulated via Organic Law 8/1980 and ordinary law 22/2009 (as amended). In addition to the above-mentioned principles, it is based on the principle of sufficiency. It aims at ensuring sufficient homogeneity in the provision of essential public services throughout Spain while allowing for different spending patterns across regions. The latter, applies to the Basque Country and Navarre. Under this system, both regions enjoy a considerably higher level of revenues per capita than the common financing system regions, thus creating a visible asymmetry in funding.([18])

Graph 4.1.4: **Revenue structure of regional governments, 2015**



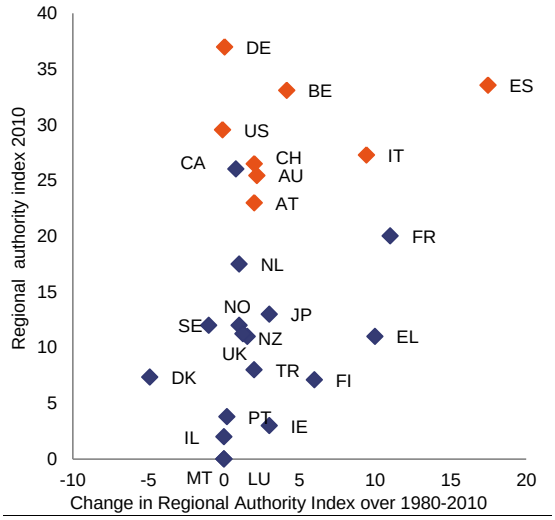
Source: OECD. Fiscal Federalism database.

To implement the principle of co-responsibility, the tax autonomy of regions has increased over time. Spanish regions have considerable discretion over their own taxes (De la Fuente et al., 2016). Their tax autonomy, as measured by the OECD taxing power index,([19]) is the highest among the relevant EU countries and among the highest in the group of OECD federal countries (see Graph 4.1.6), even though tax sharing agreements in which regions have no normative powers account for a considerable part of regional tax revenue. In 2011, the share of regional tax revenues with full or partial discretion amounted to around 23% of total general government tax revenues. Regions' tax autonomy allows them to make spending decisions in the margin through increases in the taxes they control.

([18]) In addition, in the *foral* system, the collection of most taxes is done at the regional level, unlike in the common system, which is mostly done centrally. In exchange, the *foral* regions make an annual payment to the central government for the services rendered by it.

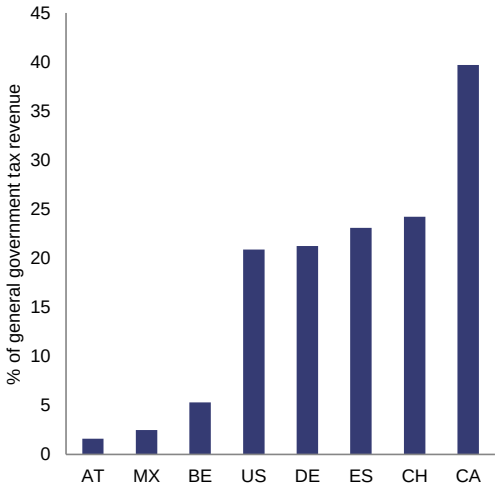
([19]) The OECD tax autonomy or taxing power index captures various aspects of the freedom of sub-central governments have over their own taxes, such as their right to introduce or to abolish a tax, to set tax rates, to define the tax base, or to grant tax allowances or reliefs to individuals and firms.

Graph 4.1.5: **Evolution of the Regional Authority Index since 1980 and level in 2010**



(1) The ten dimensions of the regional authority index are the following: institutional depth, policy scope, fiscal autonomy, borrowing autonomy, representation, law making, executive control, fiscal control, borrowing control, constitutional reform.
(2) In red, countries with state government sector.
Source: European Commission based on the Regional Authority Index. Hooghe et al. (2016).

Graph 4.1.6: **Taxing power of the regional government sector (as % of general government tax revenue)**



(1) Regional government sub-sector corresponds to ESA category S.1312 (i.e., State government).
(2) 2011 data.
Source: OECD. Fiscal Federalism database.

Differences in regions' initial tax capacity call for equalisation transfers under the solidarity principle. There are considerable differences in various economic indicators across regions. Disparities in income per head across regions translate into differences in regions' tax capacity, a measure of the tax revenues regions would get if they applied the same tax rates and were all equally efficient in the taxes they collect. Equalisation transfers are carried out namely through the Guarantee Fund, which aims to ensure that each region receives the same resources relative to its population (adjusted for differences in relevant demand and cost factors) to finance the basic public welfare services (i.e., education, healthcare and social services), as well as through the Convergence Funds, which redistribute resources based on regions' ranking in variables such as income per head, population density and population growth.

The regional financing system is also based on the principle of sufficiency of resources. This principle, however, does not give right of an unlimited coverage of regions' spending needs by the system. Rather, it aims at ensuring that all regions have sufficient resources to provide services that have been transferred to them by the central government at a minimum level of quality - it therefore does not apply to quality improvements in the provision of those services or to new services by regions, whose funding would have to rely on the use of the regions' tax autonomy (Herrero Alcalde et al., 2011). Moreover, it implies that the allocation across regions of the total amount of available resources at each point in time should be done with respect of the principles of solidarity and coordination (Constitutional Court Judgement, 2016). This puts this principle in relation with the fairness dimension and the financing needs of the general government. Ultimately, sufficiency of resources is measured against the level of taxation the society is willing to support to cover spending needs.

The financial autonomy of regions is carried out within the framework of the government's fiscal policy. To that end, the reforms to the regional financing systems have been accompanied with reforms to Spain's fiscal framework. The adoption in 2001 of the first Stability Law and its

amendment in 2012 is a case in point, to ensure that the increasing tax and spending autonomy of sub central governments is carried out consistently with the annual general government fiscal targets.

The use of the tax autonomy has varied across taxes and regional governments. Over 2003-2014, regions have made low use, in aggregate terms, of their normative powers to raise personal income tax. They have relied more on other taxes, such as stamp duty tax, to get additional resources during the crises years. There are also considerable differences across regions in the use of their tax powers (AIReF 2016b).

Several elements have weakened regions' incentives to use their tax autonomy, thus reducing fiscal co-responsibility.

Firstly, to date, each revision of the financing system has been carried out under the premise that no regional government would lose revenues relative to the status quo and has been accompanied by additional monetary transfers from the central government, thus reducing the need for regions to use their taxing powers.

Secondly, while the Regional Liquidity Fund (RLF),([20]) as amended in 2014, further reduces the cost of debt for regional governments, it could weaken incentives to keep borrowing in check. And while access to the RLF is subject to conditionality, the regions' adjustment plans under the RLF are subject to less strict requirements than the economic and financial plans required by the Stability law in case of non-compliance with the fiscal targets.([21]). A gradual return of region's financing schemes to market conditions can therefore contribute to reduce moral hazard and increase fiscal prudence at the regional level.

Thirdly, until recently, Spain has made little use of the corrective and preventive tools in Spain's fiscal framework to ensure fiscal discipline at all government levels. However, in 2016, the Ministry of Finance activated for the first time some such provisions, such as the requirement for several regional governments to adopt spending cuts (*acuerdos de no disponibilidad*) to reach the regional 2016 deficit target, although the actual response by regional governments (EUR 40 million; AIReF, 2016a) was considerably below what the Ministry of Finance called for.

There are limits to further devolving tax powers to regions. Further increases in regions' tax autonomy would have to rely on the devolution of powers over the large taxes and / or the creation of new taxes. In practice, some taxes are ill-suited to be shared with regional governments. For example, the high sensitivity to the economic cycle of corporate income tax would not ensure stability of financing sources for the regions, and in addition it would be difficult to allocate revenues from this tax to each region. There are also limits to further increasing the share of personal income taxes devolved to regions, as this could impair the central government's ability to carry out its stabilisation and redistribution functions. Moreover, EU law does not allow for differentiated regional VAT rates. Lastly, on the expenditure side, higher co-responsibility could be achieved through increases in the powers of regional governments over the setting of co-payments (Tax experts' report, 2014), with due consideration to their distributional impact, in terms of access by low income households to the services subject to co-payment.

Equalisation transfers go some way in reducing dispersion in revenue per head across regions, but raise issues of fairness. This is because they result in a final distribution of revenues that does not preserve the ranking of regions in terms of tax capacity. Specifically, the Guarantee Fund reduces the dispersion in regions' revenues per head, while keeping the initial ordering of regions in terms of capacity. However, three other funds - i.e., the Sufficiency, ([22]) Competitiveness and Cooperation funds - come into action after the redistribution made by the Guarantee Fund. The end result is an

([20]) The RLF is a financial facility created in July 2012, so that adhering regions / local entities can borrow money from it at favourable interest rates relative to market conditions.

([21]) E.g. no ex-ante assessment by AIReF, no approval by the Financial and Fiscal Policy Council and less detailed periodic monitoring by the Ministry of Finance compared with the Stability law's economic and financial plans.

([22]) The sufficiency fund for each region aims to grant enough resources to fund the powers taken on in their statutes. The value of the sufficiency fund for each region was calculated such that their total resources would not fall below the amount that they would have received under the previous financing system.

increased dispersion of revenues per head across regions relative to the distribution post-Guarantee Fund (although a decrease compared with the initial one) and, above all, a ranking of regions' revenues per head that is uncorrelated with the initial ranking based on the tax capacity (de la Fuente, 2016; Zubiri, 2016). Thus, regions with comparable tax capacity per head may end up having different revenues per head as a result of the operation of the above-mentioned three funds; similarly, regions with relatively low tax capacity may end up getting higher revenues per head than regions with a higher tax capacity.

Regions with higher revenues from the financing system are not necessarily the ones with lower deficits. There are differences in revenues from the financing system across regions. In 2016, there was a difference of 36%, between the region with highest and lowest revenues per head from the financing system, measured in terms of EUR per head. A priory, regions with higher revenues from the regional financing system should record, all other things equal, lower deficits compared with regions with lower revenues. However, the deficit is a matter of revenues and expenditure and while variations in revenues show some correlation with variations in the deficit, over time the change in primary expenditure shows a higher degree of correlation with the change in the deficit than the change in the level of revenues (Table 4.1.1).

The cooperation of regional governments is crucial for Spain to reach its fiscal consolidation targets. Over 2003-2015, the average deviation of regional governments from their deficit target (0.7 % of GDP) has been close to the central government's (0.8 % of GDP). Over the past few years, regional governments have contributed to fiscal consolidation. The regional deficit peaked at 5.1% of GDP in 2011, was more than halved in 2012 and has been hovering around 1.6% of GDP since then. However, the pace of consolidation went down considerably in 2015, at both central and regional level, despite a pick-up in revenues from the financing system and a considerable reduction in regions' interest expenditure. This slowdown has hampered Spain's deficit reduction in 2015.

Regional expenditure is regaining its pre-crisis levels. Graph 4.1.7 shows that in 2015, the total level of regional expenditure per capita in real terms was very close to the 2006 level. While some expenditure categories, such as economic affairs, were considerably lower (on account of the fall in gross fixed capital formation, investment aid and subsidies to production) others, namely healthcare and spending on social protection, were above. The application of the Stability Law's expenditure rule, whose implementation details are still not sufficiently specified (European Commission, 2016d), can help underpin the sustainability of expenditure growth, especially for regions for which the annual headline deficit target may not be overly demanding.

A reform of the regional financing system is scheduled for 2017. A revised regional financing system along the principles of co-responsibility, solidarity and coordination with the central government's fiscal policy could increase incentives for fiscal compliance at regional level. Other policy settings, which are related to this reform, are also believed to play a role in fostering fiscal discipline at this government level. For example, regions have received so far uniform public deficit and debt targets, regardless of their initial budgetary position, with the exception of 2013. It has been suggested that differentiated deficit and debt targets would help regions to increase the likelihood of reaching their fiscal targets, as it would allow keeping a better balance between their ambition and realism (AIReF, 2016b). Moreover, it has been noted that the current system of periodic payments from the central to regional governments of shared taxes and equalisation transfers (whereby payments are made in year t on account of the final settlement of those taxes and transfers in year t+2), reduces the sensitivity to the cycle of regions' revenues. This lowers in turn, regions' incentives to adjust in bad economic times and makes it more difficult for regions to comply with deficit targets in good times, as revenue slowdowns / recoveries are felt with a two year lag (Hernández de Cos, 2015). Furthermore, the setting up of rainy day fund (i.e., a fund made of contributions from regions to help them deal with revenue shortfalls in slowdowns) could also enhance the contribution of regional governments to the stabilisation of the economy (Hernández de Cos, 2015). Lastly, the spending review announced in the 2017 DBP, to be carried out by AIReF, is a step in the right direction, as it

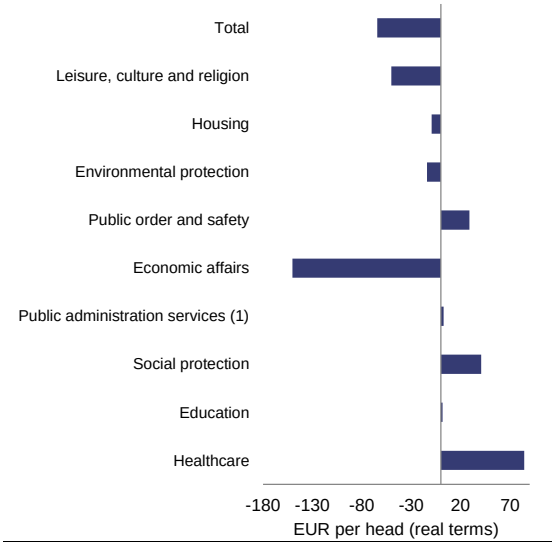
Table 4.1.1: **Correlation between (1) changes in regional revenues and (2) changes in expenditure with changes in regions' deficits**

	2004-15	2005-15	2006-15	2007-15	2008-15	2009-15	2010-15	2011-15	2012-15
% change in revenues net of transfers to other public administrations	0.09	0.06	0.04	0.00	-0.03	-0.80	-0.83	-0.76	-0.71
% change in primary expenditure net of transfers to other public administrations	-0.34	-0.38	-0.47	-0.54	-0.66	0.48	0.56	0.78	0.96

Correlation of (1) and (2) with the % change in primary deficit
Source: European Commission

can help identify areas where spending needs can be met with a more efficient use of resources.

Graph 4.1.7: **Regional governments: real expenditure in EUR per capita by COFOG function. Differences 2015-2006**



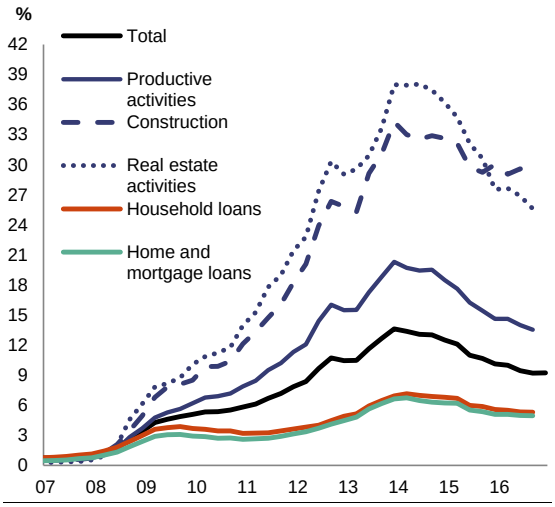
(1) Excludes transfers between public administration and interest expense.
Source: European Commission from IGAE and INE (padrón continuo)

4.2. FINANCIAL SECTOR AND PRIVATE SECTOR DELEVERAGING

4.2.1. FINANCIAL SECTOR

The Spanish financial sector has continued to show a high degree of stability, supported by its ongoing restructuring, low funding costs and the strength of the economic recovery ([23]). The banking system further strengthened its capital buffers and all six Spanish banking groups that were subject to the EBA stress tests of July 2016 comfortably met capital requirements under this exercise. As elsewhere in Europe, sustaining profitability over the medium term, against the background of low interest rates and still negative growth of business volumes, remains the main challenge ([24]).

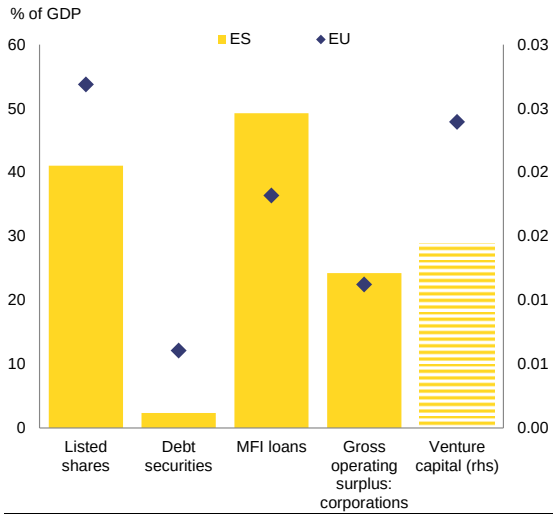
Graph 4.2.1: **Non-performing loans**



Source: BdE, own calculations.

In 2016, Spanish banks continued to clean up their balance sheets and reduce the share of crisis legacy loans. Amid robust economic growth over the past two years, the stock of non-performing-loans (NPLs) further dropped in September 2016. The overall NPL ratio (share in total loans) went down to 9.23 % as of November 2016, from 10.12 % at the end of 2015 (see Graph 4.2.1). However, the share of legacy assets is not uniform across banks. For Q1-2016, the aggregate NPL ratio_([25]) of Spanish banks remained only just above the euro area average (EBA, 2016). The divestment of SAREB's portfolio has been progressing, even though SAREB has continued to post consistent negative financial results before tax since its start of operations.

Graph 4.2.2: **Financing the Spanish economy**



Source: European Commission, own calculations based on AMECO, ECB and Invest Europe.

The outstanding volume of credit is still decreasing, but new bank lending to firms and households has been growing. The Spanish economy still relies heavily on the banking sector. In 2015, bank loans represented 50 % of GDP vs. a EU average of around 36 % (see Graph 4.2.2), while non-bank financial intermediation via equity markets, debt issuance and venture capital is below the EU average (see Section 4.5). Credit standards

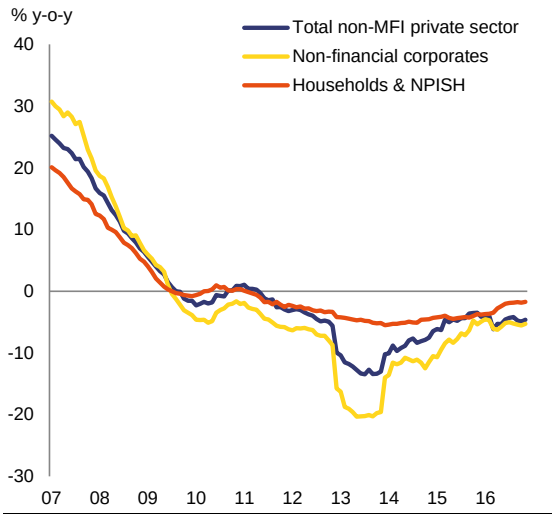
([23]) The European Commission conducts the monitoring of the Spanish financial sector under Post-Programme Surveillance (PPS), in conjunction with the ECB and ESM. The latest PPS report is, available at: https://ec.europa.eu/info/publications/post-programme-surveillance-report-spain-autumn-2016_en

([24]) On 21 December 2016, the Court of Justice of the EU ruled about the full retroactivity of the nullity of floor clauses for variable-interest mortgage contracts beyond May 2013. As a result of the ruling, Spanish banks may have to compensate the affected consumers. This puts additional pressure on banks' profitability. A law has been recently passed introducing a free, voluntary and speedy out-of-court procedure for settling refund requests regarding floor clauses. Additionally, negative pressures on profitability are compensated by the fact that some of the affected banks have already built up provisions for litigation risks.

([25]) The EBA (2016) study relies on the harmonised European definition of NPLs for supervisory purposes (under FINREP). The denominator of the ratio only covers exposures qualifying as loans, thus excluding debt securities or off-balance sheet exposures. Due to differences in scope and definition, the EBA figures do not often overlap with the figures provided by BdE.

for approving loans were further relaxed in Q1-2016 for households, while the average terms and conditions for loans continued to ease for both households and non-financial corporations (NFCs) (Banco de España, 2016). Also supported by the robust economic recovery, new bank lending to firms and households, in particular to small and medium enterprises (SMEs) and households for other than real estate purposes, continues to grow, in turn supporting economic activity (see Graph 4.2.3).

Graph 4.2.3: **Bank loans to the private sector**

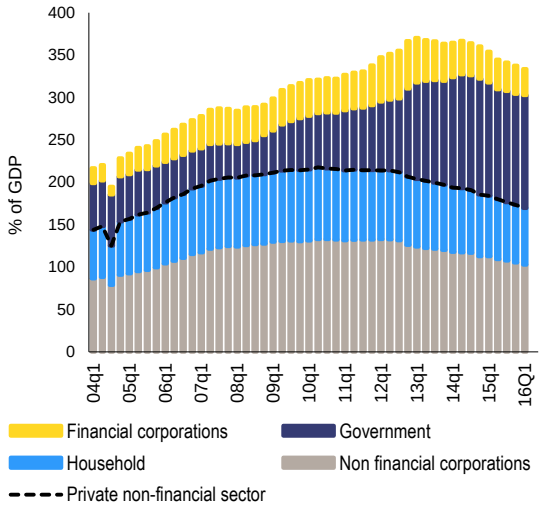


The decrease in the stock of loans observed in late 2012 and early 2013 was due to the transfer of assets to SAREB.
Source: BdE, own calculations.

4.2.2. PRIVATE SECTOR DELEVERAGING

Although declining since mid-2014, the indebtedness of the Spanish economy remains high, the stock of private non-financial sector debt amounting to 167.5 % of GDP, Q3-2016. Mirroring the net external liabilities, the high level of debt remains a macroeconomic imbalance, the associated financial burden constraining domestic demand and increasing vulnerability to interest rate shocks. In the wake of the crisis, the debt-to-GDP ratio significantly increased, but, since then, its composition has been shifting from the private to the public sector, in line with the deleveraging process undertaken in the former (see Graph 4.2.4).

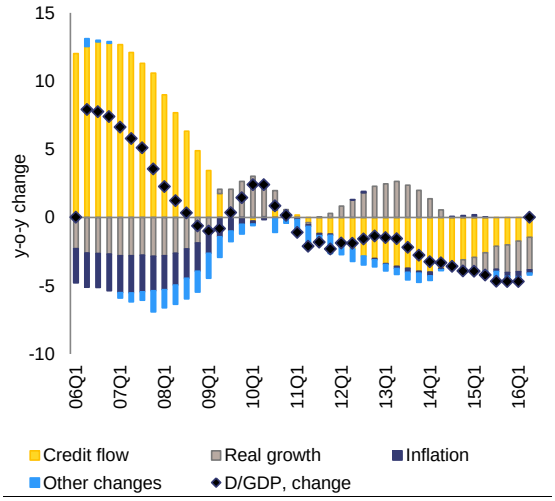
Graph 4.2.4: **Indebtedness by sector**



Source: Eurostat, own calculations.

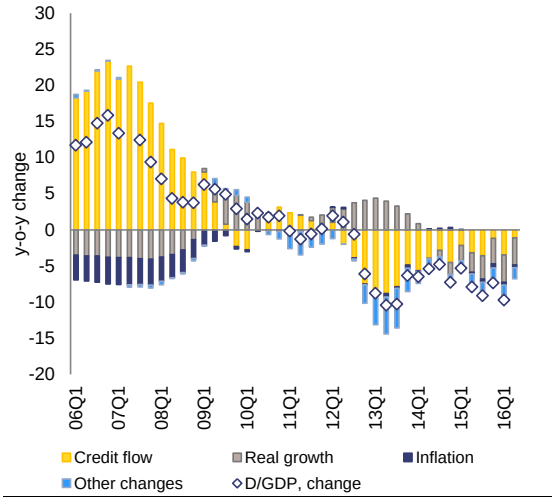
Real GDP growth has become the main driver of households' deleveraging. As the household sector moved from a net borrowing to a net lending position in Q1-2011 (see Graph 4.2.6), it actively reduced its high debt, from 84.7 % of GDP in Q2-2010 to 65.2 % in Q3-2016. This trend was driven by the negative net credit flows. However, the decrease in household borrowing is currently decelerating. The household deleveraging process has been more gradual than for the corporate sector, as most household loans are long-term housing mortgage loans, which are written off by banks less often than corporate loans. With nominal growth gaining momentum, the deleveraging is likely to accelerate (see Graph 4.2.5), while sustainability analyses reveal persistent household deleveraging needs.

Graph 4.2.5: **Breakdown of y-o-y changes in households' debt-to-GDP ratio**



Source: Eurostat, own calculations.

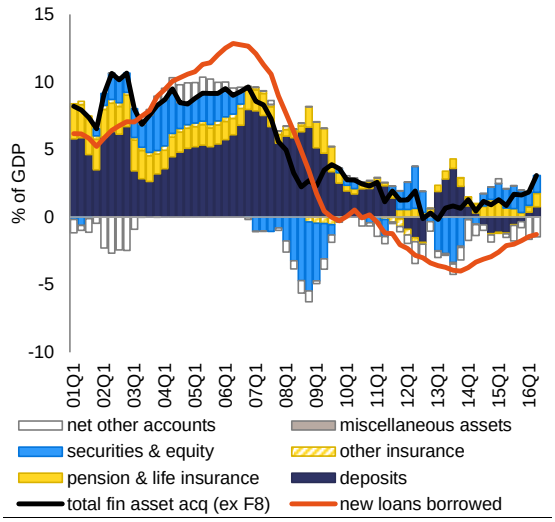
Graph 4.2.7: **Breakdown of y-o-y changes in NFCs' debt-to-GDP ratio**



Source: Eurostat, own calculations.

The financial position of Spanish households continued to strengthen in 2016 (see Graph 4.2.6). With low interest rates and adjustable rate loans prevailing in the Spanish mortgage market, the financial burden borne by households has been falling rapidly. Together with labour market improvements and growing gross disposable incomes, the ratio of NPLs to households has been declining since the peak of 7.1 % in Q1-2014 to 5.3 % in Q3-2016 (see Graph 4.2.1).

Graph 4.2.6: **Households' financial assets acquisition**

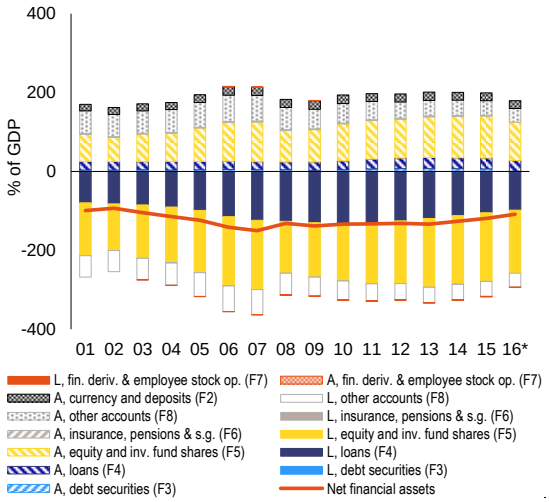


Source: Eurostat, own calculations.

Deleveraging in the corporate sector is being compatible with an increase in investment. In 2009, the corporate sector in Spain turned from a net borrower to a net lender position (see Graph 4.2.7), and, since 2012, negative credit flows have been the main driver of the fall in corporate debt-to-GDP ratio, clearing of debt occurring at a faster pace than new lending. However, the deleveraging process is now increasingly driven by real growth, as the improvement of economic conditions have gone hand-in-hand with an increase in new credit. As investment continues to grow, the corporate sector can be expected to move back to a net borrower position.

The financial position of the corporate sector has been steadily improving since 2013. The net financial wealth of firms increased for a third consecutive year, although' still remaining in the negative territory, from -133.4 % of GDP in 2013 to a forecast -108.6 % in 2016 (see Graph 4.2.8). The improvement, consistent with the sustained deleveraging process, was driven by the decreases on the liabilities side which countervailed the ones on the assets side. While the overall decrease on the assets side was reflected across almost all asset classes, the total drop in liabilities is, to a great extent, supported by reductions in corporate loans.

Graph 4.2.8: **NFCs' balance sheet and financial position**



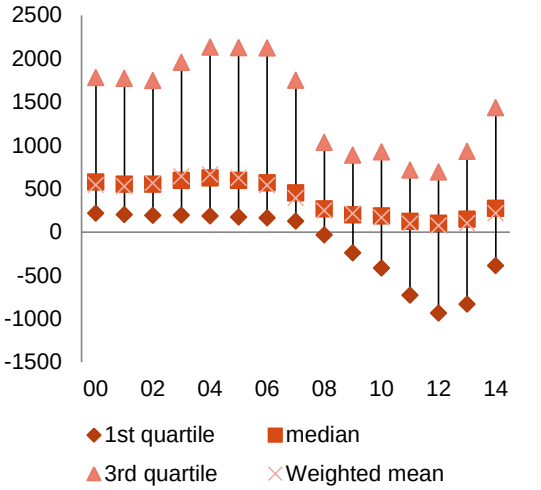
Source: Eurostat, own calculations.

4.2.3. INSOLVENCY REFORM

The number of insolvencies has been decreasing since 2013, reflecting the ongoing economic recovery. Reforms undertaken in 2014/2015 made corporate insolvency and out-of-court procedures more flexible. The corporate insolvency law ([26]), adopted in 2015, reformed the in-court debt restructuring by expanding the scope of agreements. Although the number of insolvency cases continued to fall ([27]), the declining recourse to insolvency can be explained by the improving ability of Spanish firms to meet their interest payments.

The ability of Spanish SMEs to meet their interest payments has improved. The ability to service debt is determined by the level of earnings and debt and by the paid interest. Improving earnings and lower interest rates made it easier for firms to service their debt. Since 2012, the interest coverage ratios ([28]) have been increasing for SMEs operating in manufacturing or construction (see Graphs 4.2.9 & 4.2.10([29])). The probability of bankruptcy remains higher for SMEs in construction, as compared to manufacturing or other sectors. In the period 2008-2014, between a quarter and a half of SMEs in construction had difficulties generating sufficient cash flow to pay their interest obligations.

Graph 4.2.9: **The interest coverage ratio for Spanish construction SMEs**

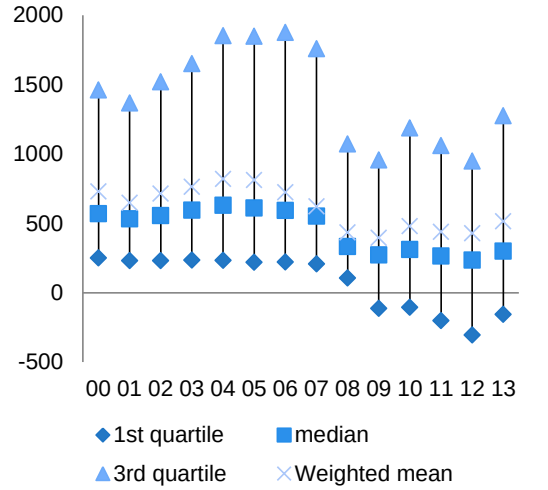


Source: BACH-ESD database, own calculations

([26]) Law 9/2015 on urgent measures in the area of insolvency.
([27]) As INE's Q3-2016 Insolvency Statistics bulletin reveals.
([28]) Interest coverage ratio is defined as earnings before interest, taxes, dividend payments and cost of amortisation (EBITDA) divided by interest expenses of accumulated financial debt. It measures how many times a business could make interest payments on its debt with its EBITDA. The lower the ratio, the more a business is vulnerable to an increase in interest rates.

([29]) Moving upwards on the y-axis illustrates the increased ability of the SMEs to service their debt, while moving into negative territory suggests increased possibility of bankruptcy; the corresponding values represent the calculated ratios for the SMEs.

Graph 4.2.10: **The interest coverage ratio for Spanish manufacturing SMEs**



Source: BACH-ESD database, own calculations

The number of personal bankruptcy cases is increasing. The reform of the personal insolvency framework, adopted in 2015([30]), set provisions for full debt relief for individuals and extended the number of beneficiaries entitled to mortgage debt restructuring. Although the new legislation came into force when the economy was experiencing a strong rebound, the number of personal bankruptcy cases started increasing at a fast pace in the course of 2016.

([30]) Law 25/2015 on second chance.

4.3. LABOUR MARKET, EDUCATION AND SOCIAL POLICIES

4.3.1. LABOUR MARKET

The labour market keeps improving, but unemployment and segmentation remain important challenges. Previous labour market reforms, wage moderation and economic growth are supporting job creation and contribute to reducing the job destruction rate, leading to falling unemployment. Still, at 18.9 % in Q3-2016 unemployment remains very high, especially for the young (41.9 %, 15-24 years old) and low-skilled workers (27 %, ISCED levels 0-2). Almost half of the unemployed have been without a job for more than one year (2.1 million people or 9.1 % of the labour force) and 17.8 % for more than four years. Wages are expected to increase as inflation gradually picks up, which may affect job creation. Moreover, Spain has one of the highest shares of temporary employment in the EU. Unemployment and labour market segmentation, together with ageing and gaps in education, contribute to low potential growth and one of the highest levels of inequality in the EU.

Measures to step up the specific support for young people are beginning to bear fruit. After a slow start, implementation of the Youth Guarantee (YG) improved in 2016, partly thanks to reinforced outreach mechanisms ([31]). A reform adopted in December 2016 will significantly increase coverage as it envisages that all young people registered as unemployed with the Public Employment Services (PES) are automatically eligible for support from the YG as from 2017. The quality of the offers proposed to the YG beneficiaries will depend on the capacity of the PES to meet the increased demand for services resulting from this reform.

Spain is taking measures to strengthen individual support for the long-term unemployed. Previously adopted measures (e.g. the *PREPARA* plan for professional reskilling and the employment activation programme, *PAE*) have not yet helped to significantly improve individual support for the long-term unemployed. In 2016, Spain allocated EUR 515 million over three years to a new joint action plan ([32]) to support the employment services in providing assistance to one million long-term unemployed until 2018. The plan envisages profiling and individual integration pathways, for which a profiling tool is being developed, and an upper limit of 120 cases handled per counsellor. The success of the plan will depend on the capacity of the regional PES, as well as on the stability of funding.

Indicators point to a still weak performance of the PES in providing services to both employers and jobseekers. The share of vacancies handled by the PES is very low, as well as their contribution to job placement (2 % of total vacancies against 10 % on average in the EU, based on Labour Force Survey data). The share of the unemployed having contacted the PES to seek work is the lowest in the EU (27.5 % in 2015 against 48.3 % in the EU-28). This is reflected in Spain's relatively low expenditure on active labour market policies (ALMPs) ([33]). Moreover, a benchmarking evaluation of regional PES run by the Spanish authorities (*EVADES*) points to large differences in performance across regions linked, among other factors, to weak cooperation with national authorities and a focus on procedures rather than on results. There is also little progress on implementing single points of contact.

The new government has announced further labour market measures. In particular, it intends to promote an integral agenda on employment quality. It has also announced an upcoming law to support the self-employed, including through the extension of the social contribution flat rate scheme (*tarifa plana*) of EUR 50 from six to twelve months. At the same time, the government has increased the upper threshold for income subject to social contributions by 3 % from 2017

([31]) In December 2016 400 000 young people not in employment, education or training (NEETs) had registered in the YG, while the share of NEETs registered in the YG had already improved from 2 % in 2014 to 10.7 % in 2015.

([32]) *Programa de acción conjunta para la atención a desempleados de larga duración*. For comparison, the national budget allocated to active employment policies in 2016 was EUR 5.2 billion (including EUR 129 million allocated to the new joint action plan), according to the annual plan of employment policies.

([33]) Between 2008 and 2013 expenditure on ALMP per person willing to work decreased by 66 %, the strongest decrease in the EU. The share of the unemployed benefiting from ALMPs decreased from more than 80 % in 2008 to 20 % in 2013 and less than 1 % of the low-skilled unemployed (0.29 % of low-skilled long-term unemployed) benefited from training programmes. Jansen (2016). Since 2014 Spain has increased the budget allocated to ALMPs.

(see section 4.1) ([34]). This will contribute to reducing the deficit of the social security system, but might entail adverse employment effects.

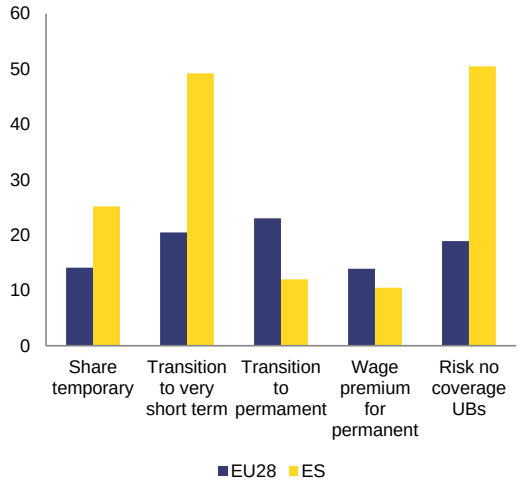
After years of almost complete freeze, the minimum wage has increased by 8 % in 2017. The new minimum wage is set at EUR 707.6 a month (14 payments a year). This comes after a very limited nominal increase (2.2 % in cumulated terms) between 2011 and 2016, below cumulated inflation (2.8 %) and productivity growth (5 %). The minimum wage in force until 2016 was one of the lowest in the EU ([35]), although the share of employees receiving it was also low. This suggests that the immediate impact of the increase on in-work poverty, job creation and the overall wage distribution will be modest. In addition, the Parliament is due to discuss a proposal that would increase the minimum wage significantly and envisages full indexation to inflation.

The share of temporary work, most of which of short duration, is still very high. The share of temporary employees of total employees dropped during the first years of the crisis, as they bore most of the adjustment, but increased after 2013 to reach 26.5 % in Q4-2016, still the second highest share in the EU (Graph 4.3.1). While temporary work is most frequent among the young (15-24 years old) and the low-skilled, it also affects medium- and high-educated workers more often than in the rest of the EU (Graph 4.3.2). This, together with very low yearly transition rates from temporary to permanent contracts (10.2 % in 2015 compared to an EU average of 23 % in 2014) suggests that temporary jobs are not a stepping stone to stable careers. In addition, around one third of temporary workers have contracts of up to three months. This is larger than the 20 % EU average and national data indicates that one fourth of the contracts signed in 2016 had a duration of up to seven days.

([34]) The 8 % increase in the minimum wage discussed below also implies an automatic increase in the lower threshold for income subject to social security contributions.

([35]) As a proportion of median and mean wages (European Commission, 2016a).

Graph 4.3.1: **Share of temporary employees, transition rates from temporary to permanent, wage premium for permanent and full-time temporary employed at risk of not being entitled to unemployment benefits.**



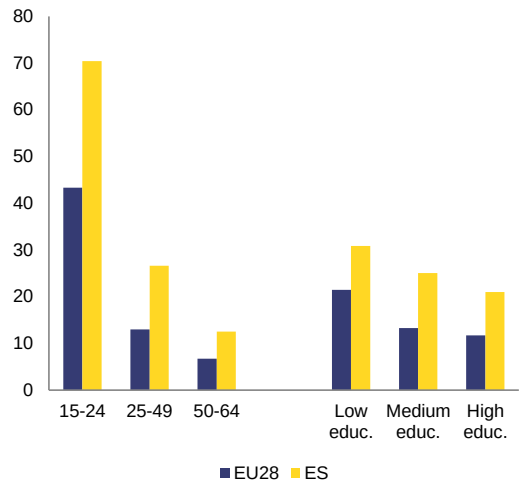
(1) Share of temporary employees in total employees (15-64, LFS, 2015)
(2) Share of workers moving to a contract of up to 3 months in total transitions from unemployment to employment (LFS,2015)
(3) Transition from temporary employee to permanent employee (Eurostat, 2014)
(4) Wage premium for permanent workers (A. Turrini and A. Dias da Silva, 2015), expressed as log points multiplied by 100.
(5) Full-time temporary employed at risk of not being covered by unemployment benefits
Source: Eurostat, Turrini and Dias da Silva (2015), Research note Non-standard employment and access to social security benefits (2015).

The widespread use of temporary contracts might be explained by multiple factors. The use of temporary contracts allows companies to respond flexibly to fluctuations in demand, but the use of temporary contracts may reveal rigidities in wage structures or a too short trial period. Higher costs for permanent workers are related to higher dismissals costs, aggravated by uncertain and cumbersome dismissal procedures, and to less flexible working conditions. The last labour reforms addressed some of these issues. The sectoral composition of the economy, the dominance of small companies or uncertainty about future economic developments may also play a role.

Several forms of atypical employment coexist in Spain. The most frequent types of fixed-term contracts are those used to respond to production needs or to carry out a specific task or service

(45 % and 40 % of temporary contracts in 2016 respectively) ([36]). Other forms of atypical work include discontinuous permanent contracts, which are frequent in seasonal jobs, as well as temporary agency contracts. There are also concerns about the use of 'bogus' self-employment as a replacement for standard employees. In addition, while part-time work is less widespread than in other Member States, a large share of it is involuntary (in 2015 more than 60 % of part-time workers could not find a full-time job and this percentage has almost doubled in the last ten years). Almost three quarters of part-time workers are women.

Graph 4.3.2: **Shares of temporary employees by age and education level (2015)**



Source: Eurostat

The widespread use of temporary work may harm productivity growth. There is evidence that high shares of temporary work harms total factor productivity growth through various channels. These include limited incentives for workers to acquire firm-specific knowledge, lower on-the-job training opportunities (e.g. Cabrales *et al*, 2014), smaller workers' effort (Dolado *et al*, 2011) and concentration of temporary jobs in production opportunities with short-expected durations (Cahuc *et al*, 2016). This may bias the production structure towards less productive activities. Moreover, short employment spells have negative fiscal implications due to lower contributions and higher expenditure on benefits.

Segmentation also contributes to inequality and has significant social consequences. Many workers alternate fixed-term contracts with unemployment spells. The wage gap between permanent and temporary workers is estimated at between 10 % and 19 % (Dias da Silva, A. and A. Turrini, 2015 and OECD, 2015), and rises with age. Together with higher probabilities of repeated unemployment spells and of working part-time, this results in lower annual earnings and higher poverty risks among temporary workers (23.3 % against 5.9 % for permanent workers in 2015) ([37]).

The impact of recent reforms in reducing segmentation has been mildly positive. The 2010-2012 reforms increased firms' internal flexibility and introduced a new permanent contract for full-time workers in small companies, with an extended probation period of 12 months (*entrepreneurs*' *contract*). There are indications that the reforms have increased the probability of moving from unemployment into permanent employment from 1.7 % to 2.6 %, while the probability of moving from unemployment to temporary employment is still 4.6 times higher (it was seven times higher before the crisis), suggesting a positive but small effect in reducing segmentation (García Pérez and Mestres Domenech, 2016). A plan for fighting employment segmentation agreed upon in the tripartite agreement of 29 July 2014 has not been further developed (European Commission, 2016e).

The remaining gap in firing costs between temporary and permanent contracts, and uncertainty in case of legal dispute may incentivise fixed-term hiring. The 2012 reform increased severance payments for temporary workers, while it reduced those for permanent contracts, namely in case of unfair dismissal (from 45 to 33 days' pay per year of service, with a cap at 24 months instead of 42). According to OECD summary indicators on employment protection legislation ([38]), the gap between overall protection

([36]) There are also fixed-term contracts to replace workers on leave (8 % of temporary contracts) as well as apprentice or training contracts and traineeships.

([37]) This gap is much higher than for the EU average: 15.4 % against 5.6 %.

([38]) Spain does not stand out as having particularly stringent rules and procedures to hire and fire workers compared to

of permanent and temporary workers has not changed significantly, and severance payments for permanent workers remain comparatively high in case of fair dismissals, at long tenures. The gap in severance payments between different types of contracts might limit the incentives for employers to hire on permanent contracts. Incentives may also be reduced by potentially higher costs in case of dispute (if the dismissal of a permanent employee is judged 'unfair' in court, the employer would need to pay a higher severance payment). According to Jimeno *et al.* (2015) during 1984-2010 about 70 % of dismissal cases resolved in court were declared 'unfair', and this percentage has increased after the crisis. Spain stands out for having a high number of labour law cases compared to the number of employees (European Commission, 2015a).

The reinforcement of labour inspections is showing positive results in reducing the abuse of temporary contracts. Weak enforcement of regulations limiting the abuse of temporary contracts had been identified as an issue in Spain (e.g. Bentolila *et al.*, 2012). In this regard, labour inspections have been improved by targeting action towards those areas where abuse appears to be more widespread and by increasing staff and improving their expertise regarding temporary work. Between 2012 and October 2016, the number of yearly inspections has increased by more than 60 % and 230 000 temporary contracts were transformed into permanent ones. In 2015, more than 20 % of inspections resulted in temporary contracts being transformed into permanent contracts.

The Court of Justice of the EU (CJEU) in September 2016 issued three rulings related to the use of fixed-term contracts in Spain ([39]). These judgments concerned the renewal of successive fixed-term contracts when needs were permanent ([40]) and the payment of compensation for termination of a temporary replacement contract (*contrato de interinidad*). Following on from the latter CJEU judgment, the competent Spanish court ruled that the worker in question should receive compensation equivalent to that of a permanent worker. The Government has set up a panel of experts with government and social partner representatives to analyse the rulings and make a proposal to translate them into Spanish legislation.

Hiring incentives aimed at reducing segmentation are not always well targeted. At the national level, there are a wide variety of incentives, including rebates in social contributions or lump-sum subsidies to hire on a permanent basis and to transform temporary into open-ended contracts. In 2015, 10.9 % of subsided contracts were to hire workers with permanent contracts (mainly for young or older workers in small firms). The groups of eligible workers are rather broad, suggesting that incentives are not sufficiently targeted towards those with greater difficulties to (re-)enter the labour market. Moreover, research shows that subsidies entailed deadweight and substitution effects, i.e. they either were not effective, or incentivised the replacement of non-subsidised workers.

4.3.2. EDUCATION

High early school leaving (ESL) rates and a high share of low-skilled people among the adult population remain major challenges. The ESL rate ([41]) further declined to reach 19 % in 2016, but remains among the highest in the EU. ESL rates vary greatly across regions, due to the high demand for low-skilled workers in given areas but also linked to students' socio economic or migrant background. Spain also has the third highest share of low-skilled people (ISCED 0-2) in the adult population (42.6 % in 2015), which hardly declined in the last 10 years among the younger age group (25-29). This hampers productivity growth and fuels inequalities.

Student's performance at school is stable and around the EU average, but varies greatly

other Member States, but severance payments at longer tenures are high in international comparison.

([39]) De Diego Porras (C-596/14), Martínez Andrés (joined cases C-184/15 and C-197/15) and Pérez López (C-16/15).

([40]) Firms have to provide objective reasons for the renewal of fixed-term contracts and certain rules apply on the maximum duration of successive temporary contracts and the number of renewals allowed, in line with Directive 1999/70/EC on Fixed-Term Work.

([41]) 18 to 24 year old who have at most lower secondary education and are not in further education and training.

across regions. According to the 2015 OECD Programme for International Student Assessment (PISA), pupils' performance in Spain improved in reading and maths. The proportion of low achievers is lower than the EU average in all three tested fields. However, differences between well performing regions and low performing ones can exceed 40 points (equivalent to one school year) in the three fields, reflecting differences in the socio-economic conditions of their populations and gaps in the effectiveness of their education system. The impact of socio-economic status is close to the EU average ([42]), while the performance gap between non-immigrants and first-generation immigrants is relatively small (OECD, 2016). The results of the 2015 Trends in International Mathematics and Science Study show that fourth grade students in Spain have improved their mathematics and science performance from 2011 to 2015.

High rates of grade repetition increase inequality and education costs. In 2015, more than 31 % of pupils had repeated a grade during compulsory education in Spain, the second highest rate in the EU, even if slightly improved compared to 2012. Rates vary from 53 % among disadvantaged students to less than 9 % among advantaged ones (PISA 2016). Grade repetition increases the risk of school drop-out, lowers attainment expectations (OECD 2012) and increases education inequalities, affecting professional achievement and wages. The cost of grade repetition in Spain accounted for 8 % of the total education budget in 2012 (OECD 2013).

Spain has taken measures to improve performance and basic skills with mixed results. Most of the measures set out in the Organic Law for Improvement of the Quality of Education (*LOMCE*) adopted in 2013 are now implemented, but their continuation depends on the outcome of the Pact for Education ([43]) (currently under discussion). The planned yearly nation-wide students' evaluations have been substituted by sample- based studies without academic effects. Several regions are also introducing bilingual teaching in primary and secondary schools. A first study related to science teaching conducted in one of the Spanish regions suggests that the lack of foreign language proficiency of teachers and parents may have a negative impact on students' learning especially in science (Anghel, Cabrales, Carro 2016). Additional funding (EUR 11.7 million) has been earmarked to hire assistants and support teachers' language courses, but its impact is not clear at this stage. It should be mentioned that the upcoming Pact for Education is expected to improve the initial training of teachers and include performance-based remuneration in their career paths to improve the quality of school education.

Spain is making efforts to strengthen basic vocational education and training (VET) but enrolment rates are low so far. The strengthening of VET is intended to be the cornerstone of the national strategy to reduce ESL. The government approved 27 new qualifications of the basic VET ([44]) in 2016, which should enrich the offer and increase its attractiveness. However, enrolment rates are low, which might be partly explained by the slow roll out of the programmes in some regions or the limited relevance of the degrees for the local economies. In several regions transitions from the first to the second year and promotions from basic to medium VET (upper secondary) are low, probably due to implementation flaws and lack of resources (European Commission, 2016). In addition, the number of students enrolled in medium VET programmes decreased in 2015-2016 for the first time since 1990.

Reforms of vocational training for employment are being implemented. In 2015, Spain completed the reform of the training for employment subsystem (*Subsistema de Formación para el Empleo*) as part of the broader reform of the VET system to increase its attractiveness and improve young people's skills. In the new governance

([42]) Rates of low achievers are below 10 % among the upper social quarters while they overpass 30 % among the lower social quarters.

([43]) *Pacto de Estado social y politico por la educacion*. Agreeing on this Pact was an electoral commitment shared by all political parties. The process was launched in November 2016. A dedicated parliamentary sub commission is due to report on the current state of the education system in Spain and make proposals for a new legal framework for education based on a wide social and political agreement.

([44]) *Formación Profesional Básica, FPB* 2-year alternative path for students in lower secondary education to reach medium vocational education and training qualification

model, the role of social partners focuses on strategic planning and monitoring while the PES manages the system through the new State Foundation for Training in Employment (*Fundación Estatal para la Formación en el Empleo*). The reform also introduced the right to a twenty-hour period of training leave for workers with at least one year of seniority and the option of introducing an individual training account for workers. This should contribute to improving participation in lifelong learning activities (9.9 % against 10.7 % in the EU).

Employability of tertiary graduates remains an issue. Spain's tertiary educational attainment rate is still above the EU average, but the employment rate of recent tertiary graduates ([45]) is one of the lowest in Europe at 68.7 % in 2015, far below the EU average of 81.9 %. Spain also has the highest share (37 %) of tertiary graduates working in occupations considered as not requiring university education ([46]). In 2015, a graduate tracking system was set-up to raise awareness about future employment prospects among university applicants.

Spain is taking measures to foster cooperation between universities and business. Spain had the highest number of applications to the Knowledge Alliance EU grants in 2016, which shows the interest of education and research institutions for university-business cooperation. However, the reduced mobility of students and academic staff, lack of incentives to engage with businesses in teachers' career progression schemes and the rigidity of university governance remain significant obstacles to cooperation and innovation. The government has approved a number of fiscal incentives to help businesses to expand their limited innovation capacity by encouraging them to hire research staff and to offer apprenticeships to university and VET students. The government envisages expanding the dual model to higher education and some universities have already signed agreements with companies to develop dual training in engineering programmes.

([45]) People aged 20-34 who left tertiary education between one and three years before the reference year.

([46]) 37 % of tertiary graduates worked in occupations classified under ISCO categories 4-9 (EU:23 %), considered by ILO (2007) as not requiring a tertiary degree (LFS).

4.3.3. SOCIAL POLICIES

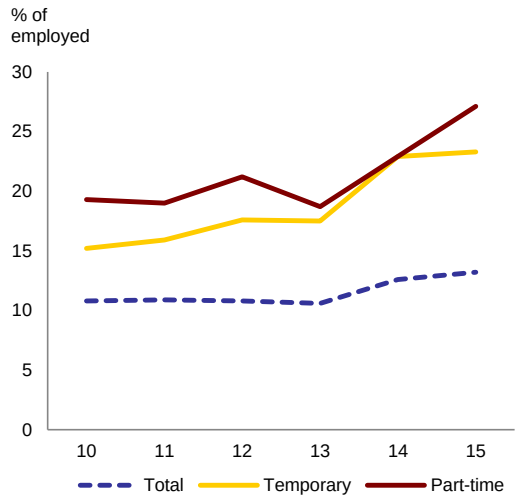
In 2014, poverty started to decrease thanks to the emerging improvement in the labour market, but not all groups were benefiting. Based on 2015 SILC data([47]), the share of people at risk of poverty or social exclusion declined slightly to 28.6 %, but remained far above the 2008 rate and the EU average. It was especially high for the working age population and children. The at-risk-of-poverty gap ([48]) increased, reflecting the worsening situation of those who remain out of work, such as the long-term unemployed and their households.

In-work poverty was still on the rise. In 2014, 13.1 % of Spanish employed people were at risk of poverty. In-work poverty was especially high and rising for people on temporary contracts or working part-time (Graph 4.3.3). Other drivers of in-work poverty in Spain were low hourly wages, and low work intensity at household level (European Commission, 2016b).

([47]) Note that 2015 SILC data refers to the 2014 situation (first year of recovery) for the income and work intensity components, while material deprivation refers to 2015.

([48]) Between 2014 and 2015 the at-risk-of-poverty gap increased from 33% to 35% for the working age population and from 35% to 40% for children. It measures the difference between the median equivalised disposable income of people at-risk-of-poverty and the poverty threshold.

Graph 4.3.3: **In-work-poverty rate, groups, Spain**

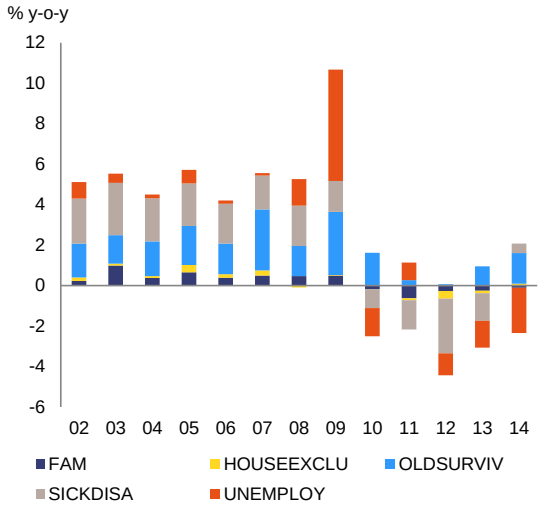


In-work-poverty rate (% of employed). Employed who have an equivalised disposable income below 60 % of the national equivalised median income.
Source: Eurostat, EU-SILC.

Child poverty remained high mainly because of parents' labour market situation and weak family support. Though declining, a high share of children (12% in 2014) still lived in jobless households. Children whose parent(s) work faced the highest risk of poverty in the EU28 (22.6 %), in particular if living in single earner families (39.5 %). This also reflects the weakness of family support, in cash and in kind ([49]). In 2013, family expenditure per child represented 7.6 % of GDP per head against 13 % on average in the EU (Chart 1.28 in European Commission, 2016b). Family benefits are also poorly targeted ([50]) (European Commission, 2015) and when taking into account the impact of tax credits, the tax-benefit system is overall slightly regressive ([51]) (Canto, 2012).The impact of social transfers on reducing child poverty further deteriorated and was lower than the EU average (21.1 % in comparison to 39 % in the EU). In addition, there is a strong social gradient in the uptake of childcare (European Commission, 2015), suggesting barriers to access to childcare for low-income parents.

Social expenditure stabilised in 2014 after four years of decline and has low effectiveness. In 2014, total social protection expenditure stabilised in real terms, after significant reductions affecting all functions, except old age benefits (Graph 4.3.4). The drop of expenditure on unemployment benefits was compensated by a further increase of spending on pensions, and by a slight increase on health care, for the first time in five years. Overall, the redistributive impact of both taxes and social transfers remains below the EU average (see chart 1.45 in European Commission, 2016b).

Graph 4.3.4: **Changes in social protection expenditure in real terms, and contributions by function**



Social protection expenditure refer to income maintenance or support in cash or kind in connection to
UNEMPLOY: unemployment
OLDSURVIV: old age or the death of a family member
FAM: family or children
SICKDISAB: sickness and disability
HOUSEEVCLU: housing and social exclusion

Source: European Commission calculations based on ESSPROS and Price Statistics

Spain's income support schemes have limited coverage and effectiveness. While adequate indicators for unemployment benefits and minimum income are slightly below the EU average (Chart 1.41, European Commission, 2016b), survey data reveal gaps in coverage. While the effective coverage of unemployment benefits is around the EU average (34%), only 61 % of the jobless poor receive income support (all benefits

([49]) Spain also spends relatively little on family expenditure, housing and social exclusion which are especially relevant for poor families with children.
([50]) In 2014, the share of family benefits in household disposable income for children in the lowest income quintile was below 2 % in comparison to 20 % in the EU.
([51]) Despite the tax reductions for working mothers with dependent children under 3 years of age envisaged by the Integrated Plan for Family Support (PIAF). Canto *et al.*, 2012.

other than old age) against 80 % in the EU (Charts 1.34 and 1.36: European Commission, 2016b). At the same time, pensions play an indirect role in supporting the working age people through family solidarity mechanisms such as inter-household transfers and multigenerational households.

Fragmentation and large regional disparities in income guarantee schemes could explain their low average effectiveness. Ayala et al. (2106) highlight great disparities in the level of protection provided by different schemes, as well as disparities in eligibility conditions and in the link between activation and protection across regions and schemes ([52]). The study also identifies loopholes in the coverage of certain categories of households. The government will analyse the findings of the study and work with the regions to improve the effectiveness of the schemes. In doing so they will build on good practices identified at the regional level, such as combining employment with income support up to a certain level of earnings. Jansen (2016) suggests that the fragmentation of income guarantee schemes introduces discontinuities in the support to beneficiaries and hampers the delivery of integrated pathways. To better coordinate national and regional schemes, the government has announced the introduction of a personal 'social card' that will register all benefits granted by different public administrations.

Coordination between employment and social services at regional level remains a challenge. Measures to reinforce the PES (Section 4.3.1) are likely to improve their capacity to support welfare to work transitions. However, the lack of coordination between employment and social services hampers the provision of extended services that jobseekers need to overcome the multiple barriers they face. Identified weaknesses ([53]) include the lack of mutual knowledge on the role and working methods of their counterparts; operational structures that do not take into account the need to cooperate with other services and other local players; and entitlements to services that are not linked to an assessment of needs.

The provision of long-term care services is improving, but it differs across regions and current needs are still not met. Although in 2016 there has been a 9% increase in the number of people receiving services ([54]), in December 2016 about one third of people recognised as dependent (348.240 out of 1.21 million) were on a waiting list ([55]). Wide inequalities in access to long-term care services ([56]) persist across regions, due to large disparities in the number of places available, services offered and prices. In addition, regions bear an increasing share of the expenditure ([57]).

The cost of energy weighs on some categories of poor households. In 2015, the burden of energy costs for Spanish households started to decrease, after the large increases recorded between 2008 and 2014. However, it continued to increase for low income households with children, as one in four still experienced difficulties in paying utility bills and keeping their home warm (EU-SILC 2015). This trend may reflect the fact that the social tariff for vulnerable consumers introduced in 2009 ([58]) did not reach all low-income households, such as the working poor who were not eligible. In December 2016, the criteria of the social tariff were amended ([59]) with a view to better targeting

([52]) The study includes estimates of the poverty reduction effects of contributory and welfare social benefits. They show great regional disparities, and significantly lower impact on children. The added effect of individual benefits not classified as pensions is also limited.

([53]) National and regional authorities in charge of employment and social services met in October 2016 in Brussels to reflect on measures to enhance the coordination between employment and social services in Spain. Conclusions: http://ec.europa.eu/social/BlobServlet?docId=16749&langId=en.

([54]) The provision of services includes dependence prevention services, remote care, home care, day and night centres and residential care, as well as financial support to cover the cost of purchasing personal care services or to compensate the provision of home care by family members.

([55]) SAAD statistics (System for Autonomy and Care for Dependency)

([56]) The share of people recognised as disabled receiving benefits varies per region from less than 70% to nearly 100% for grades 2 and 3, and from less than 20% to nearly 100% for grade 1 (SAAD).

([57]) http://www.directoressociales.com/images/documentos/dictamenes/doc-dependencia/Informe%20%20Dependencia%207-16%201%201.pdf

([58]) Electricity pricing system implying a 25% discount for household residential consumers with contracted power less than 3 kW, pensioners receiving minimum benefits, large families or jobless households.

([59]) Royal Decree in Law 7/2016, 23rd December

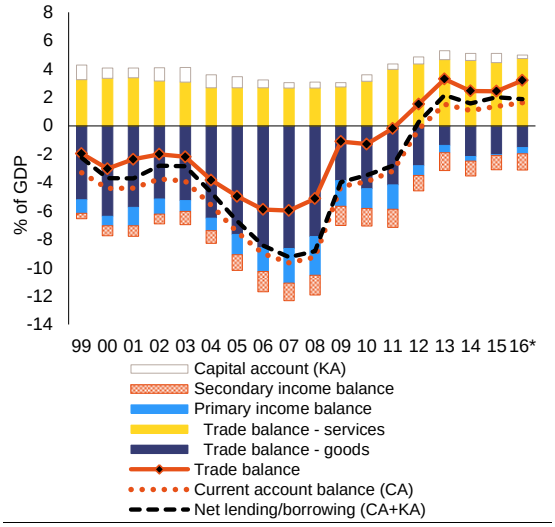
low income households and strengthening the protection of vulnerable consumers. The participation of all stakeholders, such as regional and local governments and social services will be key in implementing

4.4. INVESTMENT

4.4.1. EXTERNAL SUSTAINABILITY AND COMPETITIVENESS

Much of the current account adjustment in recent years has been driven by improvement in the trade balance of goods. The trade balance of goods remains in deficit, but has improved considerably since 2007, accounting for more than half of the adjustment in the current account (see Graph 4.4.1). The trade surplus in services has also increased, partly due to an increase in exports of tourist services, but also of other services with higher value added (i.e. such as consultancy, construction services, engineering and technical activities), which already constitute more than half of Spanish exports of services. The primary income balance has been improved by the reduction of investment income paid abroad due to the fall of interest rates and rates of return to equity during the crisis years.

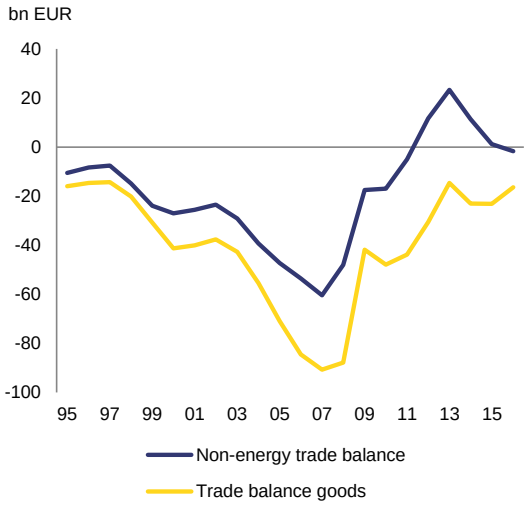
Graph 4.4.1: **Breakdown of external position**



Source: European Commission

Some of the improvement in the current account has been due to transitory factors. Some of the improvement in the trade balance of goods has been driven by low oil prices, and in fact the non-energy trade balance, which recorded a surplus between 2012 and 2015, turned into a deficit between January and November 2016 (see Graph 4.4.2). Moreover, exports of tourist services have benefitted from political tensions in competing destinations in the Mediterranean and are thus vulnerable to a reversal of this situation. Finally, as the scope for further interest rates reductions in the future appears limited, additional improvements in the balance of primary income seem unlikely.

Graph 4.4.2: **Trade balance of goods (Jan-Nov), total and non-energy products**



Source: Datacomex

However, the current account adjustment also reflects a structural improvement in export performance. In cyclically adjusted terms, the current account has also continued to improve, initially driven by a collapse of domestic demand, but increasingly reflecting a structural improvement in export performance. However, the elasticity of imports with respect to final demand remains high, and no significant changes in import substitution are detected yet at the aggregate level. Also, after years of cost-competitiveness gains, Unit Labour Costs (ULC) have started to increase again in 2015 and converge to the euro area average.

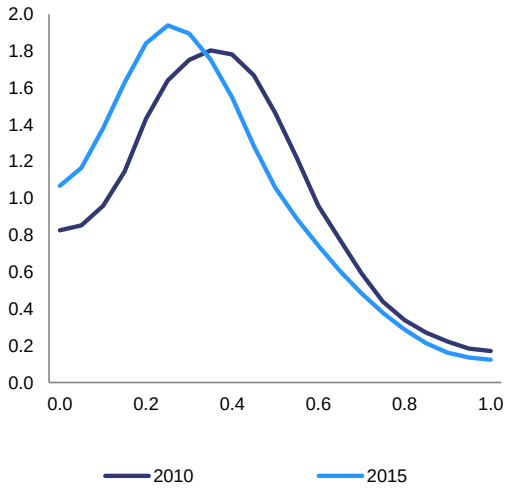
Export strength has been supported by a rise in the number of exporters, but the small average firm size limits their export capacity. The number of exporting firms rose by 35 % and that of regular exporters by 23% between 2010 and 2015 (European Commission, 2016e). Given the fixed costs associated with establishing a presence in foreign markets, a reversal of the internationalization of Spanish firms is unlikely, and can be considered a structural improvement. However, 75% of the increase in exported value between 2010 and 2015 was realised by very large

exporters (with exports above 50 million EUR; Ministry of Economy, 2016). Unit labour cost developments in the largest firms have also been more favourable than in smaller ones due to higher productivity growth. In this regard, the large share of small enterprises in the Spanish economy limits their export capacity (see section 4.4.2 and European Commission, 2016).

Spain's specialisation in medium-high technology and medium-low quality exports with high price sensitivity implies a dependence on cost-competitiveness. Apart from the large share of food and primary products, Spanish goods exports consist mainly of intermediate goods, especially chemical products, equipment goods, and motor vehicles, the latter accounting for around 20 % of total exports. Although these products are characterised by medium to medium-high technological content, Spanish exporters specialise in medium-low quality, more exposed to competition from emerging economies (European Commission, 2015b), even more so as the average quality of Spanish exports to the EU decreased in relative terms between 2010 and 2015 (see Graph 4.4.3). Furthermore, the price elasticity of Spanish exports is comparatively high (European Commission 2016e, 2015b).

At the same time, Spanish imports are rather inelastic to price changes. Import intensity, especially in manufacturing, is higher in Spain than in other large euro area economies. Besides, the average technological content of imports is relatively high, which contributes to their low price elasticity. This can be partly explained by the specialization of Spanish exports in activities highly integrated in global value chains (GVC). Accordingly, Spain shows by far the highest stock of foreign direct investment relative to GDP amongst large euro area economies. The combination of price-sensitive exports and price-insensitive imports in Spain's economic structure underscore the reliance on cost-competitiveness for gaining export market shares in absence of strong productivity growth (see Section 4.4.2).

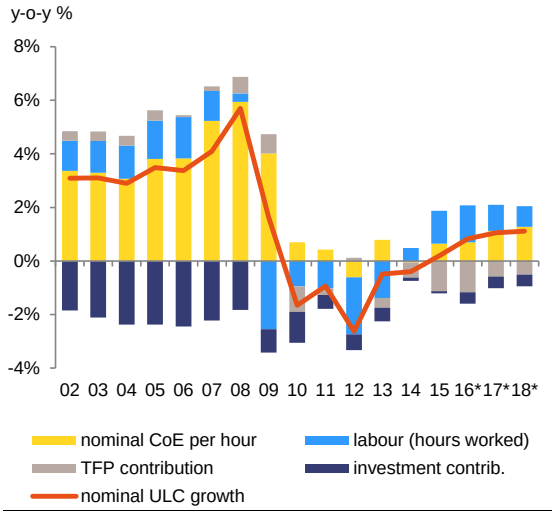
Graph 4.4.3: **Density function of Spanish export value per quality rank**



Source: European Commission, based on Orbis data

Recent cost-competitiveness gains resulted mostly from wage moderation rather than productivity growth. The contribution of productivity to cost-competitiveness has been positive, but small (see Graph 4.4.4). Wage moderation, partly a consequence of the labour market reforms in recent years, was also facilitated by real wage increases due to low or even negative imported inflation. However, as inflation gradually picks up, nominal wages are expected to increase. Together with very low productivity growth this is likely to raise unit labour costs, which already started picking up in 2015.

Graph 4.4.4: **Breakdown of rate of change of unit labour costs**



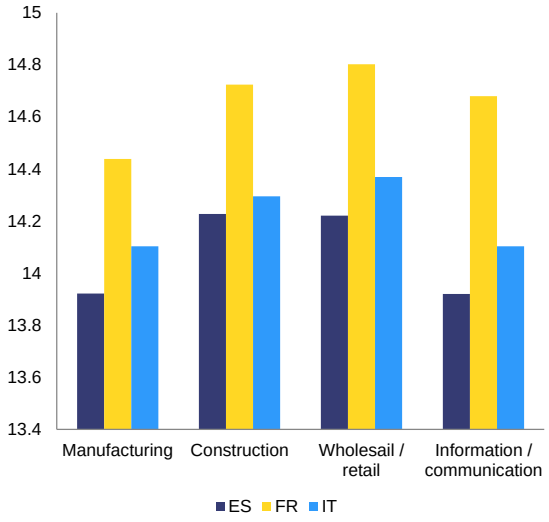
(1) CoE: Cost of employment; TFP: Total factor productivity
(2) A negative sign implies a reduction in ULC and thus a positive contribution to cost-competitiveness.
Source: European Commission

Faster productivity growth and rebalancing towards higher value added sectors could help to sustain export growth, but also moderating import growth. With cost advantages hinging increasingly upon productivity increases, promoting innovation and supporting research and development is becoming more central to ensuring competitiveness of the Spanish economy. It would furthermore pave the way towards higher quality levels and a shift to higher technology content of products, reducing the pressure to compete primarily on costs. Lastly, it might also support import substitution to a certain extent, improving also the other side of the current account balance.

4.4.2. PRODUCTIVITY

Labour and capital misallocation held back productivity growth before the crisis. Investment was largely concentrated in non-tradable sectors with low marginal returns, in particular construction and real estate. This was fuelled by cheap and easily available credit, which allowed low-productive firms to continue operating. Low efficiency of labour allocation contributed further to a decrease in total factor productivity (TFP) growth. Misallocation was more severe in industries characterised by strong regulation that impeded competition (García-Santana *et al.*, 2016). During the crisis productivity growth slightly recovered. This trend reversal was however mainly due to low-productive firms exiting the market (European Commission, 2016e).

Graph 4.4.5: **Total factor productivity of small firms for selected sectors in Spain, France and Italy**



(1) Y-axis shows average log TFP. Firm size class: 0-9 employees.
Source: European Commission, based on Orbis data

Low productivity is partly explained by Spain's large share of small companies and their low productivity compared to other large MS. In 2013, 95% of Spanish companies were micro enterprises (below 10 employees), 13 percentage points more than in Germany. Small companies tend to exhibit lower productivity than large ones, mainly due to scale effects and lower investment in R&D limiting their absorptive capacity for innovation. The productivity gap between large (above 250 employees) and small (below 10) firms in Spain is 55%, considerably more pronounced than in other large EU economies (OECD, 2016a). As firm-level micro data reveal, the productivity of Spanish small companies is moreover much lower than in other Member States. Whereas large companies (above 250 employees) are actually somewhat more productive than their French and Italian counterparts, the productivity gap is negative for smaller companies and gets larger when moving down size classes, with the gap

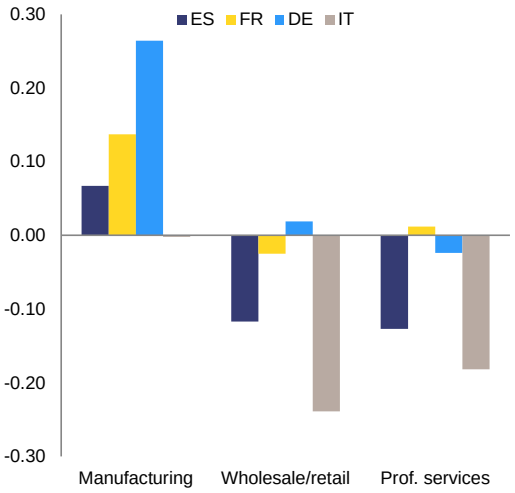
towards France for micro enterprises being particularly large.([60])

The size of the TFP gap between Spain and other Member States for small companies varies across sectors. Compared to France, the largest gap can be observed in the information and communication sector. However, TFP is also considerably lower in the Spanish manufacturing and wholesale/retail sectors, which represent the largest sectors in terms of share of value added in the Spanish economy (see Graph 4.4.5). This productivity gap is compounded by the significantly slower growth of small firms in Spain (European Commission 2016e).

The efficiency of labour allocation in most large sectors has deteriorated. Allocative efficiency is a measure for the extent to which labour is allocated towards the most productive companies within a sector. Negative allocative efficiency essentially means that resources are allocated less efficiently than by a random distribution with uniform probability. Among the larger sectors in terms of share of value added, only in manufacturing (13.2% of total value added in 2014) allocative efficiency is positive ([61]). Having improved since 2009, it is however still below its pre-crisis peak. Construction, wholesale and retail, accommodation, real estate, and professional services all display negative allocative efficiency levels that have been deteriorating for years.

Levels and trends of allocative efficiency in key sectors do not compare favourably to other large MS. In manufacturing most other large MS outperform Spain, in particular Germany and France (see Graph 4.4.6). Manufacturing in those countries did not experience a decline in allocative efficiency as steep as in Spain before the crisis, and they improved more decisively afterwards, leaving them on efficiency levels between two and four times higher than Spain (with the exception of Italy). In professional services France and Germany again show higher allocative efficiency levels (even though in the latter case it is negative as well), and a more positive trend than Spain. These discrepancies point to a comparatively low level of competition in Spain, slowing down the reallocation of labour towards the most productive firms in those sectors.

Graph 4.4.6: **Allocative efficiency in selected sectors in Spain, France, Germany and Italy 2013**



(1) Manufacturing value for Italy (-0.002) not visible due to scale.
Source: European Commission

Restrictive business regulation and weaknesses in innovation policy contribute to slowing down firm and productivity growth. Tax and other regulations applicable to large companies may constitute disincentives to Spanish firms to grow beyond certain turnover and personnel thresholds. Only some of those have been reduced by recent reforms (European Commission 2016e). Firms' inter-regional expansion is hampered by a still somewhat fragmented national market (see section 4.4.3). Liberalisation of professional services, whose regulation in Spain is relatively restrictive (see next section), has also been shown to have positive effects on allocative efficiency and thus within-sector productivity. Given the interlinkages of this sector with the rest of the economy, knock-on effects on other sectors are also likely to be significant (Canton *et al.*, 2014). Finally, business R&D is relatively weak (see section 4.5.1), limiting not only firm-internal innovation to enhance productivity, but also their absorptive

([60]) European Commission calculations based on ORBIS firm-level data

([61]) European Commission calculations based on Eurostat data. The estimate for Allocative Efficiency is interpreted as the %-increase in industry productivity connected with the actual allocation of employment across firm size classes, relative to a baseline scenario in which employment is allocated randomly across the different firm size categories. A positive (negative) number for AE means that resources are allocated in a more (less) efficient way relative to the baseline.

capacity to benefit from R&D spillovers (e.g. Griffith *et al*. 2003).

4.4.3. BUSINESS ENVIRONMENT

Business environment

The 2017 Doing Business Indicators rank Spain 32nd in the ease of doing business, (17th amongst EU Member States). This is one place higher than in the 2016 edition of Doing Business, owing to improvements in the 'payment taxes', 'enforcing contracts' and 'resolving insolvency' indicators, which compensate the deterioration in other indicators such as 'starting a business' and 'getting electricity'. Other areas where Spain continues to underperform relative to most Member States are late payments and time and costs to obtain permits and licenses (European Commission, 2015e). The latter is especially cumbersome for newly-incorporated industrial companies, also in view of the large regional divergences. For example, starting an industrial SME takes about 60 days in the Canary Islands compared to 250 days in Murcia, and costs range between 6 % (Andalusia) and 23 % (Catalonia) of income per capita (World Bank Doing Business Subnational, 2015).

Progress in enhancing the business environment has been modest in 2016. Far-reaching reforms have been introduced in recent years to facilitate business creation, firm growth and reduce administrative burden. However, the implementation of flagship reforms, such as the law on market unity, has slowed down considerably in 2016, including at regional level, judging from the lack of progress made in adapting sector specific legislation to the principles of the law. Regulation adopted by some regions on collaborative economy activities may in fact be contrary to the spirit of the market unity law and other Spanish laws transposing the Services Directive (CNMC, 2016). Against this backdrop, on 17 January 2017, the central and regional governments agreed to foster mutual cooperation with a view to guaranteeing market unity and better regulation in Spain. Lastly, the law also introduces a complaint mechanism offering the possibility for economic agents to seek redress on barriers to market unity within shorter deadlines than ordinary administrative appeals. At the time of writing, around 170 complaints had been evaluated, the majority of which were related to the presumed transgression of the law's principles of proportionality and necessity, thus hinting to a possible need to simplify licensing procedures.

Firms' innovation activity is still below pre-crisis levels, and the share of high-growth innovative enterprises (HGIE) in the economy remains low. Spain's industrial structure is characterised by a high share of SMEs operating in low-tech sectors (Fernández-Zubieta *et al*., 2016), and the number of enterprises active in innovation has decreased from 35 000 to around 15 000 between 2008 and 2015 (COTEC, 2016). HGIEs tend to have higher total factor productivity than average SMEs (Hölzl, 2016) Although HGIE growth rates in terms of turnover and employment have picked up in recent years, fewer companies experience high-growth periods in Spain than on average in the EU (0.08 % vs. 0.16 %; Costa *et al*., 2016).

Progress in integrating digital technologies throughout the economy is slowed down by the low use of internet and scarcity of digital skills. Overall, Spain has slightly improved its performance in this area (European Commission, 2017b). Several Industry 4.0 initiatives have been put in place at national and regional level, and Spain is above the EU average in number of graduates with a Science, Technology, Engineering and Mathematics (STEM) degree (21 vs 19 per 1 000 population).([62]) However, the low percentage of people with basic digital skills and the low share of ICT specialists in the workforce (2.4 % of total individuals employed vs 3.5 % on EU average) remains a challenge whose gravity, if not addressed, may increase if new cohorts with low digital skills enter the labour market. Furthermore, the National Coalition for Digital Skills and Jobs, which aims to enhance digital skills at all government levels, has not yet been set up.

Competition in product and service markets

The development of the collaborative economy is held back by restrictive regulation in some

([62]) Figures refer the number of STEM graduates per 1,000 inhabitants aged 20-29 years.

regions. A high number of collaborative economy start-ups have been created, and some have scaled-up and internationalised successfully (PWC, 2016). The regulatory approach towards collaborative economy firms, especially regarding market access, diverges from region to region, in some cases preventing the collaborative economy from realising its growth potential and foreclosing market opportunities both for consumers and entrepreneurs. In context of the implementation of the market unity law (see above), Spain's competition authority (CNMC) has invited national and regional governments to ensure that sectorial legislation respects the principles of necessity and proportionality, and has challenged some regulations and administrative acts in court (CNMC, 2017).

Restrictions to competition remain, especially in the services sector. Spain is among the ten Member States with the most restrictive regulation in retail trade (European Commission, 2015d). Only limited progress has been achieved at regional level on the implementation of the 2014 retail sector reform. Not all regions have adopted measures to implement it, although conformity of regional legislation with corresponding national law is being monitored systematically. Restrictions also remain in the regulation of professional services, as protectionist rights ("reserved activities") are granted selectively to some services providers, excluding others with relevant similar qualifications. The level of restrictions significantly exceeds the EU average for architects, civil engineers, and tourist guides ([63]). Moreover, for a large number of professions membership in professional colleges is mandatory. Law 25/2009, transposing the Services Directive, tried to address this issue by calling on the government to submit a draft law to Parliament to spell out which professions require membership in the relevant professional bodies. However, this legal mandate has not been fulfilled to date. One observable economic consequence of such restrictions is the relatively high service sector mark-ups (Thum-Thysen and Canton, 2015). Reducing those barriers would likely intensify competition by facilitating market entrance, and lower consumer prices. It could moreover contribute to increasing labour productivity (see section 4.4.1). The draft professional services law envisaging liberalisation of professional association membership and reduction of reserved activities has not been adopted. The Spanish national action plan on regulated professions, which sets out possible steps towards liberalisation, covers only a limited number of professions.

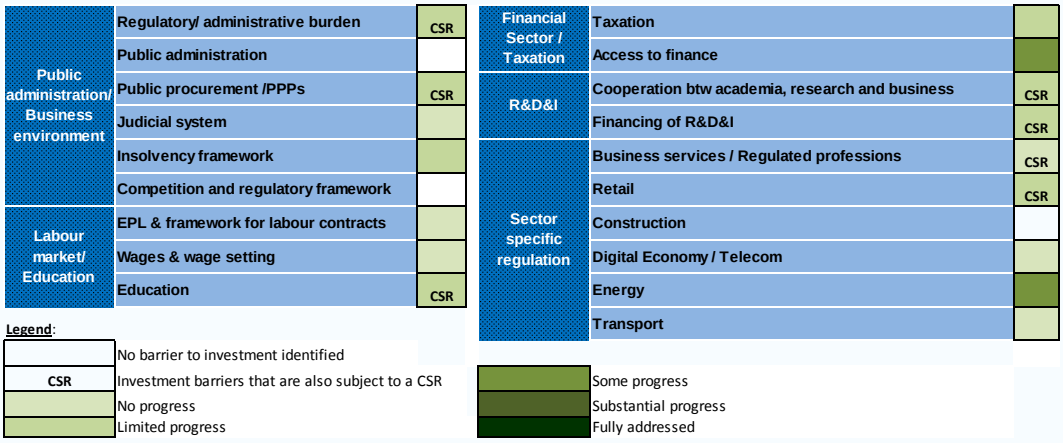
([63]) The European Commission has developed a new composite indicator on restrictiveness of most existing barriers to the access to and exercise of professional services. It is based on data collected from Member States, complemented by desk research. Cf. SWD(2016) 436 final.

Box 4.4.1: Investment challenges and reforms in Spain

Macroeconomic perspective

Investment started growing again in 2014 and was strong during 2015, mainly driven by investment in equipment. Investment's contribution to GDP growth slowed slightly in 2016 due to a moderation in final demand curbing incentives to expand production capacities. It is expected to remain at broadly similar levels during 2017 and to pick up slightly in 2018. Private sector deleveraging still dampens investment, although this effect is receding. Public investment levels have dropped far below the EU average since 2012 and are expected to remain stable due to fiscal consolidation requirements. For more information on investment trends in Spain see Section 1.

Assessment of barriers to investment and ongoing reforms



Whereas the macroeconomic outlook for investment is broadly favourable, the framework conditions for investment in Spain suffer from various barriers to investment (European Commission 2015c). Some reforms and support measures are being implemented or have been adopted, e.g. on access to finance, but other issues remain to be addressed.

Main barriers to investment and priority actions underway

1. Restrictive regulation and obstacles to doing business continue to discourage investment. The sluggish implementation of the market unity law leaves regulatory fragmentation still insufficiently addressed. Some regional regulation potentially even runs contrary to the law's principles. Restrictive regulation of professional services has not been reformed, keeping entry barriers high and discouraging investment in those industries (Section 4.4.2). Demand-side policies to induce investment are weak due to long payment delays by public authorities and lack of transparency in public procurement (Section 4.6.1). Other aspects of the business environment not conducive to investment are lengthy judicial proceedings and high time and monetary costs for obtaining permits (Section 4.4.2).

2. Tax rates and regulation, as well as low equity supply, hamper investment in innovation and a move towards higher value added activities. Spain continues to have one of the highest effective marginal corporate tax rates in the EU. The debt bias in the taxation of corporate financing discourages equity investment and the deepening of equity markets. Although the venture capital industry is becoming increasingly dynamic, venture capital supply levels are still far below those in other large EU Member States (Section 4.5.1). This hinders investment in high and medium-high tech innovation, as such business projects depend on equity capital due to their often high-risk nature. Tax incentives for hiring research staff have been introduced, which may boost companies' innovation capacity.

4.5. SECTORAL POLICIES

4.5.1. INNOVATION

Low investment in research and innovation (R&I) is contributing to low levels of total factor productivity. The Spanish economy started growing again in 2015. However, the increased external competitiveness which is partly driving this upturn is based largely on cost advantages (see Section 3.4). Maintaining growth and competitiveness will require raising productivity, which since the onset of the financial crisis primarily improved through low-productive firms exiting the market (see Section 4.4.1). For sustained productivity as well as employment growth, boosting total factor productivity is essential. One way to do this is to reinforce R&I investment (see Section 4.4.1), an area where Spain trails behind. This would also accelerate the transformation towards a knowledge-intensive economy (European Commission, 2016g).

Spain's innovation performance continues to decline relative to the EU average. Spain remains a 'moderate innovator' (the second-lowest category), ranked 20th out of 28 in the European Innovation Scoreboard 2016, but its gap to the EU average has been widening since 2013 (Hollanders *et al.*, 2016a). Spain's relative performance is weakest in the following dimensions: business R&D and innovation investment; SMEs' innovation activity; and knowledge transfer and collaboration. Both business and public R&D expenditure decreased continuously, from 1.35 % of GDP in 2010 to 1.22 % in 2015. Reaching the 2 % national R&D intensity target by 2020 overall appears highly unlikely. The public budget for R&D (GBAORD) has dropped by 30 % between 2010 and 2014. However, indirect support in the form of tax credits has gained importance, both domestically and compared to other OECD countries (OECD, 2015). The 2016 public R&D budget also indicates a trend reversal. Nonetheless, budgets have not surpassed 2006 levels. The low innovation performance outlined above coincides with a level of private R&D expenditure far below the EU average (0.65 % of GDP v 1.3 %), which has moreover been slowly declining since 2008.

Regional administrations play an important role in Spanish R&I policy, and differences in performance are large. Regional innovation capacity varies strongly on some dimensions. This is most evident for employment in higher-technology manufacturing and knowledge-intensive services, and sales of innovative products and services by SMEs, where there are innovation leaders as well as modest innovators among Spain's regions (Hollanders *et al.*, 2016b). Some R&I policy responsibilities are devolved to regional governments and regional funding accounts for around 60 % of public R&D funding (ERAC, 2014). Regional R&I policy consists of a wide range of tools and incentives to promote business-driven innovation, technology transfer and knowledge circulation. Spanish regions have designed and adopted smart specialisation strategies in the context of the programming of the European Structural and Investment Funds (ESIF). However, national and regional policies for R&I are not operating in full synergy. While some regional strategies focus on the development of genuine regional strengths, others merely replicate national-level priorities, carrying a risk of duplication (ERAC, 2014 p. 59).

Weaknesses in Spain's R&I governance framework, especially on the regional level, hamper the effectiveness of public R&I support. The complexity of the R&I governance framework and the lack of coordination persisting, despite efforts made, between regional initiatives as well as between central and regional-level actions prevent realising those potential synergies. Nevertheless, there are examples of successful coordination, such as the agreements between central and regional administrations on Scientific and Technological Infrastructures (ICTS), and on joint innovative public procurement initiatives. The participation of some Spanish regions in transnational smart specialisation initiatives may also benefit inter-regional coordination. Another critical aspect of Spain's weak R&I governance is the lack of systematic evaluations at national and regional level of the effectiveness of R&I support tools, as it impedes the development of more effective R&I programmes (ERAC, 2014).

Public-private cooperation in research and innovation remains weak. In 2014, the level of business-financed public R&D declined further, reaching 0.034 % of GDP (compared to an EU average of 0.052 %), and the number of public-private scientific co-publications per million population dropped to 16.3 (EU average: 34). The Offices for the Transfer of Research Outcomes ('OTRIs') lack institutional support and experience

in knowledge management. Excessive bureaucracy and heterogeneity hamper effective knowledge transfer. Inter-sectoral mobility of researchers is low due to weak incentives for public sector research personnel to engage in public-private cooperation activities, the low number of firms carrying out R&D, and the rigidity of universities' administrative procedures in this respect. These circumstances are reflected in the low share of researchers in total staff employed by private companies (2 % compared to an EU average of 3.6 %). The government has approved tax incentives for hiring research staff and is exploring the combination of vocational training with university education (see Section 4.3.2). An industrial PhD scheme has been established in 2014 and should soon produce the first graduates. A comprehensive national policy on knowledge transfer is however still missing. In 2016, the government announced measures to boost the contribution of the private sector to public research through sponsorship and patronage.

Venture capital has a large potential in Spain for supporting innovation. ICT and digital projects accounted for 81 % of new venture capital investments in Spain in 2015. The largest recipient sectors were life sciences, communications, and computer/consumer electronics. There has been a noticeable increase in the number of new venture capital entities, with 30 new venture capital funds entering the Spanish market in 2015 (ASCRI, 2016). This growth is driven by the ongoing economic recovery as well as government initiatives to foster venture capital, most notably through the establishment of a public fund of funds ("Fond-ICO Global"). Since 2013, Fond-ICO has committed to invest EUR 1 104 million in private venture capital funds, which in turn have committed to invest EUR 4.1 billion in Spanish companies. From the fund's total volume of EUR 1.5 billion, EUR 125 million is guaranteed by the European Fund for Strategic Investments (EFSI). Other direct venture capital support schemes, including by the Centre for the Development of Industrial Technology (CDTI), have continued in parallel. Most portfolio companies are active in innovation, above all in the ICT sector.

Despite sound growth since 2013, venture capital supply is still underdeveloped. Despite sound growth since 2014, venture capital investment in Spain remains below its pre-crisis level, and is very low compared to most Member States in terms of GDP share (0.014 %, compared to an EU average of 0.024 %). In particular, Spanish venture capital funds stand out by their small volumes (EUR 38 million on average compared to EUR 71 million EU-wide). One reason is the lack of attractive opportunities for investors to exit from their investments: Spain's public stock market for small firms is not very dynamic, which means that venture capital-backed firms rarely go public.

There was some improvement in setting priorities for the allocation of public R&I funding, but the use of performance-based criteria remains limited. Funding programmes such as the 'María de Maeztu' and 'Severo Ochoa' initiatives under the 'institutional strengthening' pillar of the national R&I plan provide for a funding increase to reward scientific excellence and proven impact. These programmes can be a stepping stone for a wider use of performance-based funding. A further positive development (in line with the 2014 ERAC peer review of Spain's R&I system) is the prioritisation of available public funding towards global societal challenges in the 2016 calls for proposals under the national R&I plan. Having been legally incorporated in 2015, the State Agency for Research responsible for managing the allocation of central government R&I funding is expected to be fully operational in 2017.

4.5.2. ENERGY, CLIMATE CHANGE AND ENVIRONMENT

Energy

Insufficient interconnection capacity between Spain and rest of the EU is a major obstacle for the creation of the internal energy market (European Commission, 2016e p. 63ff.). In 2015, the High level Group for South-West Europe on interconnections set objectives for integrating Spain into the internal energy market by ensuring the swift implementation of the priority projects identified in the Madrid Declaration signed in March 2015 by the leaders of France, Spain and Portugal and the President of the European Commission. The projects listed in the Madrid Declaration comprise: the Bay of Biscay electrical super highway via a subsea cable; two lines

through the Pyrenees; and the completion of the eastern gas axis pursuing the Midcat and Val de Saône projects. In September 2016, the High Level Group agreed on the Implementation Plan of the Madrid Declaration.

Spain is on track to meet its 2020 target for consumption of renewable energy, even if the share of renewables is estimated to have decreased from 16.2 % in 2014 to 15.6 %. Some measures to counteract the slowdown in renewables investment caused by the recent reforms to address the electricity tariff deficit have been agreed. The tenders organised in 2015 for allocating support to renewable electricity projects, as well as the announced plans for organising a new tender for 3 000 MW in the first half of 2017, are seen as a good step forward to fostering investment in renewables and meeting the 2020 target. The government has also started to apply biofuels sustainability criteria in 2016 which will make it possible to count biofuels towards the renewable energy targets and has passed an increased mandatory blending mandate to promote biofuels.

While declining since 2005, Spain's energy dependency rate is still above the EU average. Almost three quarters of energy needs — 72.8 % in 2015 — are covered by imports compared to the EU average of 53.5 %.

Spain is on track towards its emissions target. Under the EU 2020 strategy, Spain committed to a non-ETS emission target in 2020 of a 10 % reduction compared to 2005 levels. Since 2005, emissions have been decreasing. According to national projections, it is forecast that non-ETS emissions will be reduced by 12.4 % by 2020. With the economic recovery, the challenge is to keep emissions decoupled from increasing economic activity, to stay on track towards the 2020 targets.

Environment

Spain is still far from the 2020 recycling target. The main challenges in the waste sector remain to increase waste prevention and recycling. According to 2014 data, 55 % of municipal waste is still landfilled (much above the EU average of 28 %). At the current rate of 33 % (17 % recycled and 16 % composted), Spain would need to make more effort to reach the EU recycling target of 50 % of municipal waste by 2020.

Better water management, more efficient use of water supply infrastructures and better water governance would improve water efficiency. Certain areas of Spain are water-stressed, meaning that water demand exceeds the available water resources under sustainable conditions. An appropriate water-pricing policy, promotion of wastewater reuse, modernisation of irrigation systems and better control of water abstraction, could all harness water saving potential. Finally, flooding is a recurrent problem, but prevention measures are sometimes disregarded, despite being cheaper than the costs of flood recovery.

4.5.3. OTHER NETWORK INDUSTRIES

Digital economy

More than three quarters of households have access to fast broadband but there is still a gap between urban and rural areas. 81 % of households have access to fast broadband networks (at least 30 Mbps) and infrastructure-based competition is developing in dense urban areas. However, in rural areas, only 28 % of households have fast broadband network access, indicating that there is still a gap between urban and rural areas. By 2020 Spain aims to cover 100 % of the population with 30 Mbps internet and provide 50 % of households with access to 100 Mbps internet, thanks to the support of European Structural and Investment Funds ([64]). In the context of the Digital Agenda ([65]), the plan for telecommunications and high-speed networks also contains actions to boost demand. If vigorously implemented, all these policies can effectively improve the take up of high-speed broadband connections. Spain currently plans to publish a new Digital Agenda 4.0. for 2017-2020 with more ambitious targets.

Spain is increasingly benefitting from the digital economy on the supply side. There is an

([64]) http://www.dgfc.sepg.minhap.gob.es/sitios/dgfc/es-ES/ipr/fcp1420/p/pa/Documents/20141022_AA_spain_2014_2020.pdf

([65]) http://www.agendadigital.gob.es/digital-agenda/Documents/digital-agenda-for-spain.pdf

increase in the number of enterprises which make use of specific applications of digital technology in business activities, which is above EU average (European Commission, 2017b). Concerning e-commerce, SME companies' turnover is in line with EU average (9.4 % of total turnover). Positively, the share of Spanish SMEs selling online (19 %) is above the EU average (17 %).

Transport

Transport plays an essential role in ensuring territorial cohesion and economic development. Spain is the second largest Member State after France and it supports the international traffic connections of Portugal and of the Maghreb with the EU. However, in the last decade, Spain seems to have given priority to increasing geographical cohesion, rather to improving the efficiency of investment in transport infrastructure.

The recent extension of motorway and high-speed rail networks in Spain has not been followed by an increase in traffic. As stated in the 2016 country report (European Commission, 2016e), the building up of an extensive high-speed rail network and certain toll motorways, combined with a reduction of traffic flows during the economic crisis period, has created liabilities for public finances. The authorities have been exploring ways to minimise the negative impact of unprofitable motorways on public finances and it is expected that the Ministry of Development will take over the operation and management of such motorways.

The Spanish authorities are trying to use the existing transport infrastructures more efficiently. The process of opening railway passenger services to competition was launched in 2015 ([66]) but the effects are not yet fully tangible. Recent developments indicate that this ministerial order might, however, remain without effect, and that market opening will be postponed until 2020. In 2015, the government completed privatising airport infrastructures and 49 % of AENA's shares are currently floated on the Madrid stock exchange. The costs of airport services at airports operated by AENA are not always transparent but some progress has been made in setting up an independent regulator and a more independent slot coordinator. The proper fulfilment of their respective functions will be crucial.

The Spanish freight transport system relies heavily on roads for intra-EU trade. Serious road congestion problems appear repeatedly at border crossings with France. Developing the potential of maritime transport and improving the connections — in particular freight railway links — between Atlantic and Mediterranean ports and the industrial sites, could help to address the problem. This has to go along with the development of a strategic plan for the deployment of UIC gauge throughout the Iberian Peninsula, including trans-shipment terminals.

Although the port system in Spain is profitable, the high cost of certain port services and high port charges are an obstacle to further increases in traffic. The system of port charges is complex and non-transparent, and ports still do not have sufficient autonomy in their charging policy. Moreover, according to the Spanish competition authority, there is lack of competition in the provision of services within ports and the European Court of Justice has required Spain to adapt urgently the existing law on port labour ([67]). The national long term strategy for port development could contribute to better prioritise investments for ports according to their roles and functions and promoting more efficient pricing policies. There is also potential for developing better links between ports and the hinterland (European Court of Auditors, 2016).

([66]) Order FOM/1977/2015, allowing a licensed provider to compete with the incumbent operator RENFE on the line between Madrid and Levante area.

([67]) Case C-576/13: Judgment of the Court (Sixth Chamber) of 11 December 2014

4.6. PUBLIC ADMINISTRATION

4.6.1. PUBLIC PROCUREMENT

Several factors limit the efficiency of Spain's public procurement. Sub-national governments' procurement accounts for the lions' share in terms of number of contracts and their value. However, there has been little coordination of procurement policy between the different government levels, other than to promote the use of the public sector's procurement platform and the convergence of the criteria governing the central and regional government's official registers of bidders. Moreover, the use of centralised public procurement is not widely spread. ([68]) Spain also stands out for a relatively high use of the negotiated procedure without prior publication, ([69]) which translates into an absence of call for competition at EU level and frequently leads to a direct award.

There is scope for enhancing ex-ante and ex-post controls on contracting authorities. This is evidenced by the high flow of judicial investigations concerning alleged wrongdoings in public procurement, as well as by the number of complaints lodged at the European Commission that result in investigations and infringement procedures (European Commission, 2016d). While legal remedies done by specialised independent review bodies appear to function well (European Commission, 2017c), they are only applied if an economic operator (e.g. a competitor firm) alleges a breach of procurement legislation.

There is no consistent public procurement policy in Spain. In a broader perspective, Spain lacks a consistent public procurement policy that targets all administrative levels and that ensures transparency and coordination and guarantees economic efficiency and a high level of competition. In particular, the absence of an independent body in charge of ensuring efficiency and legal compliance in public procurement throughout the country hampers the proper implementation of procurement rules and may leave space for wrongdoings (European Commission, 2016d).

Against this backdrop, some measures are planned to strengthen Spain's public procurement policy framework. Two draft laws were submitted to Parliament in November 2016 for fast-track adoption to transpose the 2014 EU directives on public procurement. The measures are a step in the right direction, although shortcomings remain. Firstly, in response to the August 2016 Council Decision on deficit reduction, the draft laws eliminate the current unrestricted capacity of contracting authorities to use the negotiated procedure without prior publication for low-value contracts (i.e. below the thresholds for the application of EU directives), although it does not address the frequent use of this procedure for public procurement subject to the EU directives relative to the EU average. Secondly, the draft laws reinforce the powers of the central government's advisory council on public procurement (the *Junta Consultiva del Estado*) to supervise ex-post control activities at central level and coordinate ex-post controls (e.g., interpretation of rules, methodology) at sub-central level. However, the provisions do not provide details about the operational aspects of these controls, or give additional potential enforcement powers of the advisory council (such as imposing sanctions and/or lodging legal actions). Thirdly, a new agency (*Oficina Nacional de Evaluación*) not yet operational is to carry out non-binding ex-ante controls albeit limited to the central and local government's works and services' concessions. Lastly, the measures do not seem to strengthen ex-ante controls, as they fail to address the shortage of staff in the relevant bodies performing ex-ante controls at the various general government levels, and the independence of the relevant bodies at sub-central level carrying out those controls. Moreover, the draft laws do not envisage the promotion of joint purchasing by contracting authorities.

4.6.2. FIGHT AGAINST CORRUPTION

Spain has made progress in enacting legislation on transparency of party financing, asset disclosure and conflicts of interest. With all legislative measures of the September 2013 package for democratic renewal now in place (covering the above-mentioned areas), the focus

([68]) In 2016 centralised procurement represented 1% of the total, in comparison with the EEA average of 9%. Source: EU Tenders Electronic Daily (TED).

([69]) The share of the negotiated procedure in all public procurement was 11% in 2016, the 8th highest in the EU (TED).

shifts to their implementation. However, despite a surge in corruption investigations involving cases at the local and regional levels (Fiscalía General, 2015, Hay Derecho, 2015) no tailor-made preventive strategies to mitigate corruption risks have been developed at this government level nor is there a shared preventive strategy across government levels. Moreover, other shortcomings flagged in last year's country report (i.e., lack of legislation to protect whistle-blowers - other than in the areas of unfair dismissal and discriminatory treatment of employees-, the degree of independence of the recently established Office of Conflicts of Interest and lack of regulation of lobbying -European Commission, 2016e) have not been the object of a specific follow up. In 2016, Spain's competition authority (CNMC) created a lobbyists registry, with participation by companies done on a voluntary basis. To date it contains over 300 companies, but the country's top businesses are underrepresented ([70]). Another issue in Spain has been the protracted judicial procedure for corruption cases. While the Criminal Procedure law was amended in 2015 to limit the time allocated to investigations and reduce undue delays in criminal procedures, this measure could result in impunity in complex corruption cases for which the time limits would not be sufficient for building cases.

4.6.3. JUDICIAL REFORM

Spain has improved in terms of perceived independence of justice. According to the 2017 EU Justice Scoreboard,([71]) Spain has made progress on how judicial independence is perceived by businesses, coming, however, from a relatively low level (Spain now ranks 17 and used to rank 23 in 2016 within the 28 EU member states). However, concerns have been expressed by the Consultative Council of European Judges regarding the 2013 reform of the General Council of the Judiciary. The reform sets out that all members of this body are to be appointed by Parliament through a quota agreement between the main political parties, this change being considered as a potential threat to judicial independence relative to the situation before the reform.([72]) Regarding the efficiency of justice, the 2017 EU Justice Scoreboard shows that the disposition time in courts remained almost unchanged compared to the previous year despite efforts to balance the workload between courts. As to the quality of justice, Spain has recorded some positive results, e.g. regarding the availability of IT for case management and arrangements for online publication of judgments. There is also room for improving the qualitative aspects of justice, for example, relating to compulsory training for judges, including on IT techniques. Lastly, while legislative reforms have been adopted recently, such as the 2015 reform on workload allocation, they require full implementation and application over a certain period of time to be duly assessed.

([70]) https://rgi.cnmc.es/

([71]) World Economic Forum data contained in the 2017 EU Justice Scoreboard (to be published).

([72]) Consultative Council of European Judges (CCJE) G/Inf(2016)3rev of 24 March 2016, para. 88.

Box 4.6.1: **Selected highlights**

- "FOND-ICO Global" is the first State-owned venture capital "Fund of Funds" created in Spain. It was set up to promote the creation of privately managed venture capital funds that primarily invest in Spanish companies, at all stages of their development. Seven funding rounds have been completed since 2013, committing EUR 1,104 million to 48 newly created funds, which in turn have committed to invest EUR 4.1 billion in Spanish companies. From the fund's total volume of EUR 1.5 billion, EUR 125 million is covered under the European Fund for Strategic Investments (EFSI) guarantee.

- Digital Public Services. Spain's eGovernment strategy aim at digitising all public administration communications by 2018. The Government adopted the ICT Strategic plan for 2015-2020 ([1]) which sets out the global strategic framework to make progress in the transformation that will deliver eAdministration. This plan is needed as a continuation of the Digital Agenda in order to speed up the digital transformation of the Administration. Yearly revisions will be undertaken by the Commission on ICT Strategy. This new strategy is expected to strengthen Spanish position on Public Service Digitisation by setting ambitious goals for the digitisation of the public sector. This will facilitate a "digital by default" strategy for the most used citizen's public services, boosting the number of eGovernment users.

([1]) Plan de Transformación digital de la Administración General del Estado y sus Organismos Públicos: http://administracionelectronica.gob.es/pae_Home/pae_Estrategias/Estrategia-TIC-AGE.html

ANNEX A
Overview table

Commitments	Summary assessment ([73])
2016 country-specific recommendations (CSRs)	

CSR 1: • Ensure a durable correction of the excessive deficit, in accordance with the relevant decisions or recommendations under the excessive deficit procedure, by taking the necessary structural measures and by using all windfall gains for deficit and debt reduction. • Implement at all government levels the tools set out in the fiscal framework law. • Enhance control mechanisms for public procurement and coordination of procurement policies across government levels. Note: in the summer 2016, the Council decided that Spain had not taken effective action in response to its recommendation to correct the excessive general government deficit, and set out a new fiscal adjustment path for Spain with an extended deadline for the correction in 2018. It also required Spain to adopt measures to strengthen its fiscal framework and public procurement policy. This Council decision, which	Spain has made **limited progress** in addressing CSR 1 (this overall assessment of CSR1 does not include an assessment of compliance with the Stability and Growth Pact): **Some progress** has been made to strengthen Spain's fiscal framework. The updated DBP for 2017 reports that the government will assess, with the assistance of regional and local governments, the Stability law's spending rule, with a view to removing inconsistencies with the SGP spending rule, without however, providing details and a timeline. The government has implemented in 2017 some provisions set out in Spain's Stability law that had never been implemented –such as the requirement to adopt cuts in expenditure appropriations for public administrations at risk of non-compliance with the fiscal targets. However, the government has disclosed no measures to further increase the automaticity of the Stability Law's mechanisms to prevent and correct deviations from the deficit, debt and expenditure targets. **Limited progress** has been made to strengthen Spain's public procurement policy framework. The

([73]) The following categories are used to assess progress in implementing the 2016 country-specific recommendations:
No progress: The Member State has not credibly announced nor adopted any measures to address the CSR. Below a number of non-exhaustive typical situations that could be covered under this, to be interpreted on a case by case basis taking into account country-specific conditions:
• no legal, administrative, or budgetary measures have been announced in the National Reform Programme or in other official communication to the national Parliament / relevant parliamentary committees, the European Commission, or announced in public (e.g. in a press statement, information on government's website);
• no non-legislative acts have been presented by the governing or legislator body;
• the Member State has taken initial steps in addressing the CSR, such as commissioning a study or setting up a study group to analyse possible measures that would need to be taken (unless the CSR explicitly asks for orientations or exploratory actions), while clearly-specified measure(s) to address the CSR has not been proposed.
Limited progress: The Member State has:
• announced certain measures but these only address the CSR to a limited extent;
and/or
• presented legislative acts in the governing or legislator body but these have not been adopted yet and substantial non-legislative further work is needed before the CSR will be implemented;
• presented non-legislative acts, yet with no further follow-up in terms of implementation which is needed to address the CSR.
Some progress: The Member State has adopted measures that partly address the CSR and/or the Member State has adopted measures that address the CSR, but a fair amount of work is still needed to fully address the CSR as only a few of the adopted measures have been implemented. For instance: adopted by national parliament; by ministerial decision; but no implementing decisions are in place.
Substantial progress: The Member State has adopted measures that go a long way in addressing the CSR and most of which have been implemented.
Full implementation: The Member State has implemented all measures needed to address the CSR appropriately.

was adopted under article 126(9) of the Treaty on the Functioning of the EU, therefore superseded the Council CSR in the fiscal area.	updated 2017 DBP includes measures that can go some way towards improving some public procurement practices in Spain. However, they do not address the need for a consistent framework that ensures sufficient transparency and coordination of public procurement across all contracting authorities and entities. Furthermore, the reported measures do not spell out clear objectives for public procurement, instruments for action and a timeline for their adoption and implementation.
CSR 2: • Take further measures to improve labour market integration, by focusing on individualised support and strengthening the effectiveness of training measures. • Enhance the capacity of regional employment services and reinforce their coordination with social services. • Address gaps and disparities in minimum income schemes and improve family support schemes, including access to quality childcare and long-term care.	Spain has made **some progress** in addressing CSR 2: In 2016 Spain adopted the three-year Joint Action Plan to enhance the assistance to long-term unemployed, aimed at strengthening the employment services' capacity to provide individualised support for long-term unemployed. The Protocols to develop the Common Employment Services Portfolio are being developed. **Some progress** has been made in improving labour market integration by focusing on individualised support. The Joint Action Plan to enhance the assistance to long-term unemployed lays down a limit of 120 beneficiaries per caseworker. Caseworkers should design an individualised pathway based on the profile of the unemployed, for which a profiling tool is being developed. Spain has made **some progress** in enhancing the capacity of regional employment services. The Joint Action Plan to enhance the assistance to long-term unemployed provides for EUR 515 million for 2016-2018. In 2016 Spain has finalised an evaluation of the regional employment services (EVADES), whose conclusions have not been translated into concrete action so far. There has been no significant action to reinforce coordination between the public employment and social services. **Limited progress** has been made in addressing gaps and disparities in minimum income schemes and improving family support schemes. The government will analyse the findings and recommendations of the in-depth evaluation of income guarantee systems and will work with the regions to improve the effectiveness of the

	schemes. In the area of long-term care some progress was made in terms of provision of services. The government plans to improve the conditions for access to the services, notably by simplifying the categories of dependency.
CSR 3: • Take further measures to improve the labour market relevance of tertiary education, including by incentivising cooperation between universities, firms and research institutions. • Increase performance-based funding of public research bodies and universities and foster R&I investment by the private sector.	Spain has made **limited progress** in addressing CSR 3: **Limited progress** was made as regards measures to foster public-private cooperation in research and innovation. There is no strategic approach to knowledge transfer. Only a few punctual measures have been taken: creation of a working groups with chambers of commerce; establishment of a new technological 6 years-term; creation of an industrial PhD scheme; tax incentives for companies hiring researchers **Limited progress** made towards increasing performance-based funding of public research bodies and universities, and on fostering R&I investment by the private sector. The valuable initiatives under the "institutional strengthening" pillar of the National Plan for R&I can be a stepping stone for the further reinforcement of performance-based funding.
CSR 4: • Accelerate the implementation of the law on market unity at regional level. • Ensure implementation by the autonomous regions of the reform measures adopted for the retail sector. • Adopt the planned reform on professional services and associations.	Spain has made **limited progress** in addressing CSR 4: **Limited progress** has been made on the implementation of the market unity law at regional level, judging from the pace of adaptation of sectorial regulation to the principles of the law on market unity and from the number of agreements reached between the central and regional governments at sectorial conference level to develop regulatory frameworks adapted to that law, since the publication of the 2016 Country Report for Spain. Moreover, some regulations adopted by regions in the area of the collaborative economy may be contrary to the principles of the market unity law. **Limited progress** has been made on implementing the retail sector reform, as only some regions have adopted implementing measures. **No progress** has been made on reforming professional services. Spain has neither announced

	nor adopted any measures in this area in 2016.

Europe 2020 (national targets and progress)

Europe 2020 national targets	**Assessment**
Employment rate target: 74 %	2015: 62 % (Eurostat). Q3-2016: 64.5 % (INE; 70.3 % for men and 58.6 % for women)
R&D expenditure target: 2 % of GDP	2015: 1.22 % (provisional data). Spain's spending on R&D relative to GDP (i.e., R&D intensity), by both the private and public sectors, continued declining in 2015. Reaching the 2% national R&D intensity target by 2020 will be a challenge.
Greenhouse gas emissions target: -10 % in 2020 compared to 2005 (in non-ETS sectors) Non-ETS 2015 interim target: -6 %	2020 target: According to the latest national projections submitted to the Commission and taking into account existing measures, it is expected that the target will be achieved: -12.4 % in 2020 as compared with 2005 2015 interim target: Preliminary figures show that the non-ETS emissions decreased by 16 %.
2020 Renewable energy target: 20 %	With a renewable energy share of 15.6 %([74]) in 2015, Spain is on track to reach the 2020 target.
Energy efficiency target: 119.8 Mtoe expressed in primary energy consumption (80.1 Mtoe expressed in final energy consumption)	Primary energy consumption 2015: 117.11 Mtoe Final energy consumption 2015: 80.46 Mtoe Spain has to increase its effort to decrease its final energy consumption further in order to achieve its indicative final energy consumption 2020 target and to keep its current primary energy consumption below its primary energy 2020 target.
Early school leavers target: 15 %	2015: 20 % (interim target for 2015 was 23 %). 24 % for men and 15.8 % for women.
Tertiary education attainment target: 44 %	2015: 40.9 % (34.8 % for men and 47.1 % for women).
Target on the reduction of population at risk of poverty or social exclusion compared to 2008 in thousands of persons: -1 400	2015: + 2 389, which represents the first break of the rising trend since the crisis (2 616 in 2014).

([74]) "Renewable energy shares for 2015 are approximations and not official data, reflecting the available data (04.10.2016). See the Öko-Institut Report: Study on Technical Assistance in Realisation of the 2016 Report on Renewable Energy, http://ec.europa.eu/energy/en/studies"

ANNEX B
MIP Scoreboard

Table B.1: **The MIP Scoreboard for Spain**

			Thresholds	2010	2011	2012	2013	2014	2015
External imbalances and competitiveness	Current account balance, (% of GDP)	3 year average	-4%/6%	-5.8	-3.8	-2.4	-0.6	0.8	1.3
	Net international investment position (% of GDP)		-35%	-88.6	-91.9	-89.9	-94.3	-97.5	-89.9
	Real effective exchange rate - 42 trading partners, HICP deflator	3 years % change	±5% & ±11%	-0.3	-2.5	-5.3	-0.4	-1.0	-2.9
	Export market share - % of world exports	5 years % change	-6%	-11.4	-8.2	-17.6	-10.6	-12.0	-3.5
	Nominal unit labour cost index (2010=100)	3 years % change	9% & 12%	5.7p	-1.0p	-5.1p	-4.1p	-3.5p	-0.7p
Internal imbalances	Deflated house prices (% y-o-y change)		6%	-3.7	-9.8	-16.8	-10.1	0.2	3.8
	Private sector credit flow as % of GDP, consolidated		14%	0.9	-3.7	-11.2	-10.3	-7.2	-2.7
	Private sector debt as % of GDP, consolidated		133%	200.3	196.2	187.8	176.7	165.4	154.0
	General government sector debt as % of GDP		60%	60.1	69.5	85.7	95.4	100.4	99.8
	Unemployment rate	3 year average	10%	16.4	19.7	22.0	24.1	25.1	24.2
	Total financial sector liabilities (% y-o-y change)		16.5%	-2.0	2.8	2.7	-11.6	-1.2	-2.1
New employment indicators	Activity rate - % of total population aged 15-64 (3 years change in p.p)		-0.2%	1.7	1.2	1.2	0.8	0.3	0.0
	Long-term unemployment rate - % of active population aged 15-74 (3 years change in p.p)		0.5%	5.6	6.9	6.7	5.7	4.0	0.4
	Youth unemployment rate - % of active population aged 15-24 (3 years change in p.p)		2%	23.4	21.7	15.2	14.0	7.0	-4.6

Flags: e: estimated. p: provisional.
1) House price index: e = Eurostat estimates.
Source: European Commission, Eurostat and Directorate General for Economic and Financial Affairs (for Real Effective Exchange Rate), and International Monetary Fund.

ANNEX C
Standard tables

Table C.1: **Financial market indicators**

	2011	2012	2013	2014	2015	2016
Total assets of the banking sector (% of GDP)	338.3	344.4	307.3	286.7	263.0	244.5
Share of assets of the five largest banks (% of total assets)	48.1	51.4	54.4	58.3	60.2	-
Foreign ownership of banking system (% of total assets)	9.5	9.1	8.1	8.5	7.2	-
Financial soundness indicators:[1)]						
- non-performing loans (% of total loans)	5.2	6.4	7.9	6.7	5.3	5.0
- capital adequacy ratio (%)	12.2	11.5	13.3	13.6	14.5	14.6
- return on equity (%)[2)]	0.2	-24.9	5.8	6.7	6.6	3.4
Bank loans to the private sector (year-on-year % change)	-1.9	-7.4	-8.6	-4.8	-2.3	-2.2
Lending for house purchase (year-on-year % change)	-1.2	-3.3	-4.1	-3.7	-4.2	-2.8
Loan to deposit ratio	108.7	108.1	98.7	93.3	91.4	89.1
Central Bank liquidity as % of liabilities	6.5	13.5	8.7	6.2	6.1	6.6
Private debt (% of GDP)	196.2	187.8	176.7	165.4	154.0	-
Gross external debt (% of GDP)[1)] - public	25.6	24.3	41.2	48.5	51.1	49.9
- private	54.4	40.6	52.4	52.8	48.8	47.1
Long-term interest rate spread versus Bund (basis points)*	283.3	435.1	299.2	156.0	124.0	131.4
Credit default swap spreads for sovereign securities (5-year)*	250.1	325.7	185.5	71.4	72.6	68.1

(1) Latest data Q2-2016.
(2) Quarterly values are not annualised.
(*) Measured in basis points.
Source: European Commission (long-term interest rates); World Bank (gross external debt); Eurostat (private debt); ECB (all other indicators).

Table C.2: **Labour market and social indicators**

	2011	2012	2013	2014	2015	2016 [4]
Employment rate (% of population aged 20-64)	62.0	59.6	58.6	59.9	62.0	63.7
Employment growth (% change from previous year)	-2.7	-4.0	-2.6	0.9	2.5	2.7
Employment rate of women (% of female population aged 20-64)	56.1	54.6	53.8	54.8	56.4	57.9
Employment rate of men (% of male population aged 20-64)	67.7	64.6	63.4	65.0	67.6	69.4
Employment rate of older workers (% of population aged 55-64)	44.5	43.9	43.2	44.3	46.9	49.0
Part-time employment (% of total employment, aged 15-64)	13.5	14.4	15.7	15.8	15.6	15.1
Fixed-term employment (% of employees with a fixed term contract, aged 15-64)	25.2	23.4	23.2	24.0	25.2	26.0
Transitions from temporary to permanent employment	10.8	14.4	14.4	12.0	10.2	:
Unemployment rate[1] (% active population, age group 15-74)	21.4	24.8	26.1	24.5	22.1	20.0
Long-term unemployment rate[2] (% of labour force)	8.9	11.0	13.0	12.9	11.4	9.7
Youth unemployment rate (% active population aged 15-24)	46.2	52.9	55.5	53.2	48.3	45.1
Youth NEET[3] rate (% of population aged 15-24)	18.2	18.6	18.6	17.1	15.6	:
Early leavers from education and training (% of pop. aged 18-24 with at most lower sec. educ. and not in further education or training)	26.3	24.7	23.6	21.9	20.0	:
Tertiary educational attainment (% of population aged 30-34 having successfully completed tertiary education)	41.9	41.5	42.3	42.3	40.9	:
Formal childcare (30 hours or over; % of population aged less than 3 years)	20.0	15.0	16.0	16.0	:	:

(1) The unemployed persons are all those who were not employed but had actively sought work and were ready to begin working immediately or within 2 weeks.
(2) Long-term unemployed are those who have been unemployed for at least 12 months.
(3) Not in education employment or training.
(4) Average of first three quarters of 2016. Data for total unemployment and youth unemployment rates are seasonally adjusted.
Source: European Commission (EU Labour Force Survey).

Table C.3: **Labour market and social indicators (continued)**

Expenditure on social protection benefits (% of GDP)	2010	2011	2012	2013	2014	2015
Sickness/healthcare	7,0	6,9	6,6	6,5	6,5	:
Disability	1,7	1,8	1,8	1,9	1,8	:
Old age and survivors	10,3	10,8	11,4	12,0	12,2	:
Family/children	1,5	1,4	1,3	1,4	1,3	:
Unemployment	3,2	3,6	3,4	3,3	2,7	:
Housing	0,2	0,2	0,1	0,1	0,1	:
Social exclusion n.e.c.	0,2	0,2	0,2	0,2	0,3	:
Total	24,2	24,9	25,0	25,3	24,9	:
of which: means-tested benefits	3,6	4,0	3,7	3,7	3,5	:
Social inclusion indicators	**2010**	**2011**	**2012**	**2013**	**2014**	**2015**
People at risk of poverty or social exclusion[1] (% of total population)	26,1	26,7	27,2	27,3	29,2	28,6
Children at risk of poverty or social exclusion (% of people aged 0-17)	33,3	32,2	32,4	32,6	35,8	34,4
At-risk-of-poverty rate[2] (% of total population)	20,7	20,6	20,8	20,4	22,2	22,1
Severe material deprivation rate[3] (% of total population)	4,9	4,5	5,8	6,2	7,1	6,4
Proportion of people living in low work intensity households[4] (% of people aged 0-59)	10,8	13,4	14,3	15,7	17,1	15,4
In-work at-risk-of-poverty rate (% of persons employed)	10,9	10,9	10,8	10,5	12,5	13,1
Impact of social transfers (excluding pensions) on reducing poverty	28,1	31,3	28,5	32,0	28,6	26,6
Poverty thresholds, expressed in national currency at constant prices[5]	8202	7666	7407	7050	6813	6869
Gross disposable income (households; growth %)	-1,5	0,8	-3,4	-0,9	0,9	1,9
Inequality of income distribution (S80/S20 income quintile share ratio)	6,2	6,3	6,5	6,3	6,8	6,9
GINI coefficient before taxes and transfers	49,2	51,0	50,8	51,5	52,7	52,9
GINI coefficient after taxes and transfers	33,2	34,0	34,2	33,7	34,7	34,6

(1) People at risk of poverty or social exclusion: individuals who are at risk of poverty and/or suffering from severe material deprivation and/or living in households with zero or very low work intensity.
(2) At-risk-of-poverty rate: proportion of people with an equivalised disposable income below 60 % of the national equivalised median income.
(3) Proportion of people who experience at least four of the following forms of deprivation: not being able to afford to i) pay their rent or utility bills, ii) keep their home adequately warm, iii) face unexpected expenses, iv) eat meat, fish or a protein equivalent every second day, v) enjoy a week of holiday away from home once a year, vi) have a car, vii) have a washing machine, viii) have a colour TV, or ix) have a telephone.
(4) People living in households with very low work intensity: proportion of people aged 0-59 living in households where the adults (excluding dependent children) worked less than 20 % of their total work-time potential in the previous 12 months.
(5) For EE, CY, MT, SI and SK, thresholds in nominal values in euros; harmonised index of consumer prices = 100 in 2006 (2007 survey refers to 2006 incomes)
Source: For expenditure for social protection benefits ESSPROS; for social inclusion EU-SILC.

Table C.4: **Product market performance and policy indicators**

Performance indicators	**2010**	**2011**	**2012**	**2013**	**2014**	**2015**
Labour productivity (real, per person employed, year-on-year % change)						
Labour productivity in industry	5.50	2.78	2.29	0.49	2.38	3.52
Labour productivity in construction	-1.05	2.20	12.30	2.18	1.19	-7.23
Labour productivity in market services	1.76	1.53	1.70	1.21	0.71	0.98
Unit labour costs (ULC) (whole economy, year-on-year % change)						
ULC in industry	-4.11	-1.63	-0.24	0.72	-2.43	-4.46
ULC in construction	1.03	-4.12	-12.38	-4.09	-2.02	5.34
ULC in market services	-0.90	0.23	-2.07	-1.17	-0.32	0.82
Business environment	**2010**	**2011**	**2012**	**2013**	**2014**	**2015**
Time needed to enforce contracts[1] (days)	515.0	515.0	510.0	510.0	510.0	510.0
Time needed to start a business[1] (days)	52.0	29.0	30.0	24.0	14.0	14.0
Outcome of applications by SMEs for bank loans[2]	0.99	0.94	1.15	0.98	0.97	0.66
Research and innovation	**2010**	**2011**	**2012**	**2013**	**2014**	**2015**
R&D intensity	1.35	1.33	1.29	1.27	1.24	1.22
Total public expenditure on education as % of GDP, for all levels of education combined	4.98	4.82	4.34	4.19	na	na
Number of science & technology people employed as % of total employment	41	42	43	44	45	45
Population having completed tertiary education[3]	28	29	30	31	32	32
Young people with upper secondary education[4]	62	62	63	64	66	69
Trade balance of high technology products as % of GDP	-1.24	-1.05	-0.86	-0.70	-0.87	-1.06
Product and service markets and competition				**2003**	**2008**	**2013**
OECD product market regulation (PMR)[5], overall				na	1.59	1.44
OECD PMR[5], retail				3.67	3.48	2.88
OECD PMR[5], professional services				2.92	2.74	2.43
OECD PMR[5], network industries[6]				2.27	1.65	1.59

(1) The methodologies, including the assumptions, for this indicator are shown in detail at : http://www.doingbusiness.org/methodology .
(2) Average of the answer to question Q7B_a. '[Bank loan]: If you applied and tried to negotiate for this type of financing over the past six months, what was the outcome?'. Answers were scored as follows: zero if received everything, one if received most of it, two if only received a limited part of it, three if refused or rejected and treated as missing values if the application is still pending or if the outcome is not known.
(3) Percentage population aged 15-64 having completed tertiary education.
(4) Percentage population aged 20-24 having attained at least upper secondary education.
(5) Index: 0 = not regulated; 6 = most regulated. The methodologies of the OECD product market regulation indicators are shown in detail at : http://www.oecd.org/competition/reform/indicatorsofproductmarketregulationhomepage.htm
(6) Aggregate OECD indicators of regulation in energy, transport and communications.
Source: European Commission; World Bank — Doing Business (for enforcing contracts and time to start a business); OECD (for the product market regulation indicators); SAFE (for outcome of SMEs' applications for bank loans).

Table C.5: **Green growth**

Green growth performance		2010	2011	2012	2013	2014	2015
Macroeconomic							
Energy intensity	kgoe / €	0,12	0,12	0,12	0,12	0,11	0,11
Carbon intensity	kg / €	0,37	0,37	0,38	0,35	0,35	-
Resource intensity (reciprocal of resource productivity)	kg / €	0,60	0,54	0,44	0,42	0,40	0,40
Waste intensity	kg / €	0,14	-	0,13	-	0,12	-
Energy balance of trade	% GDP	-2,9	-3,7	-3,7	-3,4	-2,9	-
Weighting of energy in HICP	%	10,23	10,78	11,60	12,39	12,30	12,38
Difference between energy price change and inflation	%	4,3	12,7	7,4	-1,9	2,6	-4,5
Real unit of energy cost	% of value added	12,9	13,4	14,5	14,9	15,0	-
Ratio of environmental taxes to labour taxes	ratio	0,10	0,09	0,09	0,11	0,11	-
Environmental taxes	% GDP	1,6	1,6	1,6	1,9	1,9	-
Sectoral							
Industry energy intensity	kgoe / €	0,14	0,14	0,14	0,15	0,14	0,13
Real unit energy cost for manufacturing industry excl. refining	% of value added	20,3	20,8	21,1	20,7	20,8	-
Share of energy-intensive industries in the economy	% GDP	8,50	8,52	8,34	8,07	8,26	-
Electricity prices for medium-sized industrial users	€ / kWh	0,11	0,11	0,12	0,12	0,12	0,12
Gas prices for medium-sized industrial users	€ / kWh	0,03	0,03	0,04	0,04	0,04	0,03
Public R&D for energy	% GDP	0,03	0,03	0,01	0,01	0,01	0,01
Public R&D for environmental protection	% GDP	0,03	0,03	0,02	0,02	0,02	0,02
Municipal waste recycling rate	%	29,2	26,7	29,8	32,5	30,8	33,3
Share of GHG emissions covered by ETS*	%	36,5	39,5	40,8	37,8	38,3	40,5
Transport energy intensity	kgoe / €	1,01	0,96	0,91	0,92	0,89	0,90
Transport carbon intensity	kg / €	2,50	2,32	2,20	2,29	2,21	-
Security of energy supply							
Energy import dependency	%	76,7	76,3	73,1	70,4	72,9	73,3
Aggregated supplier concentration index	HHI	13,1	14,1	14,9	19,8	25,2	-
Diversification of energy mix	HHI	0,30	0,29	0,27	0,27	0,27	-

All macro intensity indicators are expressed as a ratio of a physical quantity to GDP (in 2005 prices)
Energy intensity: gross inland energy consumption (in kgoe) divided by GDP (in EUR)
Carbon intensity: greenhouse gas emissions (in kg CO2 equivalents) divided by GDP (in EUR)
Resource intensity: domestic material consumption (in kg) divided by GDP (in EUR)
Waste intensity: waste (in kg) divided by GDP (in EUR)
Energy balance of trade: the balance of energy exports and imports, expressed as % of GDP
Weighting of energy in HICP: the proportion of 'energy' items in the consumption basket used for the construction of the HICP
Difference between energy price change and inflation: energy component of HICP, and total HICP inflation (annual % change)
Real unit energy cost: real energy costs as a percentage of total value added for the economy
Environmental taxes over labour taxes and GDP: from European Commission's database, 'Taxation trends in the European Union'
Industry energy intensity: final energy consumption of industry (in kgoe) divided by gross value added of industry (in 2005 EUR)
Real unit energy costs for manufacturing industry excluding refining : real costs as a percentage of value added for manufacturing sectors
Share of energy-intensive industries in the economy: share of gross value added of the energy-intensive industries in GDP
Electricity and gas prices for medium-sized industrial users: consumption band 500–20 00MWh and 10 000–100 000 GJ; figures excl. VAT.
Recycling rate of municipal waste: ratio of recycled and composted municipal waste to total municipal waste
Public R&D for energy or for the environment: government spending on R&D for these categories as % of GDP
Proportion of GHG emissions covered by EU Emissions Trading System (ETS) (excluding aviation): based on greenhouse gas emissions
(excl land use, land use change and forestry) as reported by Member States to the European Environment Agency.
Transport energy intensity: final energy consumption of transport activity (kgoe) divided by transport industry gross value added (in 2005 EUR)
Transport carbon intensity: GHG emissions in transport activity divided by gross value added of the transport sector
Energy import dependency: net energy imports divided by gross inland energy consumption incl. consumption of international bunker fuels
Aggregated supplier concentration index: covers oil, gas and coal. Smaller values indicate larger diversification and hence lower risk.
Diversification of the energy mix: Herfindahl index over natural gas, total petrol products, nuclear heat, renewable energies and solid fuels
(*) European Commission and European Environment Agency
Source: European Commission (Eurostat) unless indicated otherwise.

REFERENCES

AIReF (2016a), *Evaluación de los Planes Económico-Financieros 2016-2017 de las CCAA*, available at: http://www.airef.es/system/assets/archives/000/001/581/original/2016_07_15_Informe_PEF_2016-2017_final.pdf?1468573939

AIReF (2016b), *Informe sobre el establecimiento de los objetivos individuales de estabilidad presupuestaria y deuda pública para las Comunidades Autónomas*, available at: http://airef.es/system/assets/archives/000/001/824/original/2017_01_13_Informe_propuesta_objetivos_2016-2019.pdf?1484309362

Ampudia, M., van Vlokhoven, H., and Zochowski D. (2014), *Financial fragility of euro area households*, ECB Working Paper Series No 1737

Anghel, B., Cabrales, A., and Carro, J.M. (2015), Evaluating a bilingual education programme in Spain: The impact beyond foreign language learning, *Economic Enquiry* 54, 1202–1223

ASCRI (2016), *Venture Capital & Private Equity in Spain 2016*, Madrid: Asociación Española de Capital, Crecimiento e Inversión

Ayala *et al.* (2016), *The income guarantee system in Spain: trends, results and necessary reforms*

Banco de España (2016), *Bank Lending Survey 2016*, available at: http://www.bde.es/webbde/en/estadis/infoest/epb.html

Bentolila S., Cahuc, P., Dolado, J.J., and Le Barbanhon, T. (2012), Two-tier labour markets in the great recession: France versus Spain, *The Economic Journal* 122, 155-182

Cabrales, A, Dolado, J., and Mora, R. (2014), Temporary contracts are bad for your cognitive health: Evidence from PIAAC, available at: http://voxeu.org/article/dual-labour-markets-job-training-and-cognitive-skills

Cahuc, P., Charlot, O., and Malherbet, F. (2016), Explaining the Spread of Temporary Jobs and its Impact on Labor Turnover, *International Economic Review* 57, 533-572

Cantó Sánchez, O. (2014), La contribución de las prestaciones sociales a la redistribución. In *Informe sobre exclusión y desarrollo social en España*, Madrid: FOESSA.

Cantó, O. *et al.* (2012), *Going regional. The effectiveness of different tax-benefit policies in combating child poverty in Spain*, EUROMOD Working Paper No. EM 2/2012

Canton, E., Ciriaci, D., and Solera, I. (2014), *The economic impact of professional services liberalisation*, European Commission, ,Economic Papers 533

CNMC (2016), Preliminary results of a *study on new models of providing services and the sharing economy*, March 2016

Comisión de expertos para la reforma del sistema tributario (2014), *Informe*, available at: http://www.abc.es/gestordocumental/uploads/economia/fe007a24af859ec8ce790387ba6b7755.pdf

Costa, P., Ribeiro, A., van der Zee, F., and Deschryvere, M. (2016), *Framework conditions for high growth innovative enterprises. Final report*. Brussels: European Commission

COTEC (2016), *Informe COTEC 2016: Innovación en España*, Madrid: Fundación COTEC

De la Fuente, A. (2010), *La Financiación territorial en España: situación actual y propuestas de reforma*, mimeo

De la Fuente, A. (2016), *La reforma del sistema de financiación de las comunidades autónomas de régimen común: una propuesta específica*, Fedea Policy Papers 2016/08

De la Fuente, A., Thöne, M., and Kastrop, C. (2016), *Regional Financing in Germany and Spain: Comparative Reform Perspectives*, BBVA Research 16/04 Working Paper

Dias da Silva, A., and Turrini, A. (2015), *Precarious and less-well paid? Wage differences between permanent and fixed-term contracts in the EU*, European Commission, Economic Papers 544

Dolado, J.J., Ortigueira, S., and Stucchi, R. (2016), Does dual employment protection affect TFP? Evidence from Spanish manufacturing firms, *Journal of the Spanish Economic Association* 7, 421-459

EBA (2016), *Report on the Dynamics and Drivers of Non-performing Exposures in the Banking Sector*, available at: http://www.eba.europa.eu/documents/10180/1360107/EBA+Report+on+NPLs.pdf

ERAC (2014), *Peer Review of the Spanish Research and Innovation System – Final Report*, available at: https://ec.europa.eu/research/innovation-union/pdf/erac/es__peer_review_report__2014.pdf

European Commission (2015a), Employment and Social Developments in Europe 2015, available at: http://ec.europa.eu/social/main.jsp?catId=738&langId=en&pubId=7859&furtherPubs=yes

European Commission (2015b), *European Semester Country Report Spain 2015* SWD (2015) 28 final

European Commission (2015c), *Challenges to Member States' Investment Environments* SWD (2015) 400 final

European Commission (2015d), *A Single Market Strategy for Europe. Analysis and Evidence* SWD (2015) 202 final

European Commission (2015e), *Study on the compliance by Member States on the time needed to get licences and permits to take up and perform the specific activity of an enterprise as from beginning of 2014*, available at:
http://ec.europa.eu/DocsRoom/documents/10562/attachments/1/translations/en/renditions/native

European Commission (2016a), *Labour Market and Wage Developments in Europe*, available at:
http://ec.europa.eu/social/main.jsp?catId=738&langId=en&pubId=7935&type=2&furtherPubs=no

European Commission (2016b), *Employment and Social Developments in Europe 2016*, available at: http://ec.europa.eu/social/main.jsp?catId=738&langId=en&pubId=7952&type=2&furtherPubs=yes

European Commission (2016c), *Commission Recommendation of 9.3.2016 regarding measures to be taken by Spain in order to ensure a timely correction of its excessive deficit*, C (2016) 5200 final

European Commission (2016d), *Analysis by the Commission services of the budgetary situation in Spain following the adoption of the Council Recommendation to Spain of 21 June 2013 with a view to bringing an end to the situation of an excessive government deficit and the Council Decision of 12 July 2016 establishing that no effective action has been taken by Spain in response to the Council Recommendation of 21 June 2013*, SWD (2016) 264 final

European Commission (2016e), *European Semester Country Report Spain 2016* SWD (2016) 78 final

European Commission (2016f), *Autumn Forecast 2016*, available at: https://ec.europa.eu/info/publications/european-economic-forecast-autumn-2016_en

European Commission (2016g), *Science, research and innovation performance of the EU 2016*, Brussels: European Commission

European Commission (2017a), *Winter Forecast 2017*, available at: https://ec.europa.eu/info/publications/european-economic-forecast-winter-2017_en

European Commission (2017b), *Digital Scoreboard 2017*, Brussels: European Commission

European Commission (2017c), *Report from the Commission to the European Parliament and the Council on the effectiveness of Directive 89/665/EEC and Directive 92/13/EEC, as modified by Directive 2007/66/EC, concerning review procedures in the area of public procurement and the accompanying Staff Working Document on the evaluation of the modifications introduced by Directive 2007/66/EC to Directives 89/665/EEC and 92/13/EEC concerning the European framework for remedies in the area of public procurement/REFIT evaluation*, COM (2017) 28 final

European Court of Auditors (2016), *Maritime transport in the EU: in troubled waters — much ineffective and unsustainable investment*, available at: http://www.eca.europa.eu/Lists/ECADocuments/SR16_23/SR_MARITIME_EN.pdf

Fernández-Zubieta, A., and Zacharewicz, T. (2016), RIO Country Report 2015: European Commission, EUR 27849 EN; doi:10.2791/465255

Fiscalía General (2015), *Report of the Special Public Prosecutor's Office against Corruption and Organised Crime*, available at: https://www.fiscal.es/memorias/memoria2015/FISCALIA_SITE/index.html

García Pérez, J.I., and J. Mestres Domenech (2016), *The impact of the 2012 Spanish labour market reform on unemployment inflows and outflows: a regression discontinuity analysis using duration models*, Fedea Policy Paper 2016/27

García-Santana, M., Moral-Benito, E., Pijoan-Mas, J., and Ramos, R. (2016), *Growing like Spain: 1995-2007*, Barcelona GSE Working Paper n° 888

Griffith, R., Redding, S., and Van Reenen, J. (2003), R&D and absorptive capability: from theory to empirical evidence. *Scandinavian Journal of Economics* 105, 1–20

Hay Derecho (2015), Corrupción Institucional y Controles Administrativos Preventivos, Madrid: Fundación Hay Derecho?

Hernández de Cos, P., and Pérez, J. (2015), *Reglas fiscales, disciplina y corresponsabilidad fiscal*, Papeles de Economía Española 143/2015

Herrero Alcalde, A., and Tránchez Martín, J.M (2011), El desarrollo y evolución del sistema de financiación autonómica, *Presupuesto y Gasto Público* 62/2011, 33-65

Hobza, A., and Zeugner, S. (2014), *The 'imbalanced balance' and its unravelling: current accounts and bilateral financial flows in the euro area*, European Commission, Economic Papers 520

Hölzl, W. (2016), High growth firms in Europe, in: *European Commission, Science, research and innovation performance of the EU 2016*, 247-275

Hollanders, H., Es-Sadki, N., and Kanerva, M. (2016a), *European Innovation Scoreboard 2016,* Brussels: European Commission

Hollanders, H., Es-Sadki, N., and Kanerva, M. (2016b), *Regional Innovation Scoreboard 2016,* Brussels: European Commission

Hooghe, L., Marks, G., Schakel, A., Chapman-Osterkatz, S., Niedzwiecki, S., and Shair-Rosenfield, S. (2016), Measuring Regional Authority, in: *A Post-functionalist Theory of Governance,* Oxford: Oxford University Press

Instituto de Estudios Fiscales (2016), *Visibilidad y atribución de responsabilidades en el estado de autonomías español,* P.T. no. 1/2016

Jansen, M. (2016), *El reto de la inserción de los desempleados de larga duración,* Fedea Policy Paper 2016/26

Jimeno, J.F. , Martinez-Matute, M. and Mora- Sanguinetti, S.J. (2015), "Employment protection legislation and labour court activity in Spain", Banco de Espana, Documentos de Trabajo no. 1507

Lago-Peñas, S., and Fernández Leiceaga, X. ¿Es posible alcanzar y aplicar un acuerdo sobre el criterio de equidad en el sistema de financiación de las CCAA?, *Presupuesto y Gasto Público* 81/2015

Martínez-Vazquez, J. (2016), *El papel de los impuestos propios en la financiación autonómica: Lecciones de la experiencia internacional,* Fedea Policy Papers 2016/19

Ministry of Economy (2016), *Informe Mensual de Comercio Exterior Noviembre 2016*

OECD (2015a), *In It Together: Why Less Inequality Benefits All,* Paris: OECD Publishing

OECD (2015b), Tax subsidy rates on R&D expenditures. In *Science, Technology and Industry Scoreboard 2015*, Paris: OECD Publishing

OECD (2016a), *Entrepreneurship at a Glance 2016*, Paris: OECD Publishing

OECD (2016b), *The Productivity-Inclusiveness Nexus*, Paris: OECD Publishing

OECD/KIPF (2016), *Fiscal Federalism 2016: Making Decentralisation Work*, Paris: OECD Publishing

Thum-Thysen, A., and Canton, E. (2015), *Estimation of service sector mark-ups determined by structural reform indicators,* European Commission, Economic Papers 547

Pricewaterhouse Coopers (2016), *Assessing the size and presence of the collaborative economy in Europe*

World Bank (2015), *Doing Business in Spain 2015. Subnational Report*

Zubiri, I. (2009), La financiación de las CCAA de régimen común: valoración y propuestas de reforma, in Monasterio and Zubiri (2009), 23-152

Zubiri, I. (2016), *El Sistema de Financiación de las CC.AA.: Problemas y Propuestas de Solución,* Fedea Policy Papers 2016/18