



Public finances

5. Public finances

5.1 Deterioration in Belgian public finances

Belgium ended 2016 on a general government deficit of 2.8% of GDP. This was a substantial deterioration compared with 2015, with an increase of 0.3 percentage points of GDP, taking it once again very close to the threshold of 3% of GDP set by the European fiscal framework as its reference value for determining excessive deficits. General government debt also rose again, to 106.6% of GDP.

The higher deficit was the result of a drop in revenue combined with a slight rise in primary expenditure expressed as a percentage of GDP; this in turn caused the primary balance to fall by 0.6 percentage point of GDP, taking it back into negative territory for the first time since 2012. Interest charges fell further, by 0.3 percentage point of GDP.

The structural overall balance, which is obtained by correcting the budget for the effects of cyclical and temporary

factors, also deteriorated in 2016 compared with the previous year. The structural budget deficit widened by 0.2 percentage point of GDP, slightly less than the nominal overall deficit. Non-recurrent factors had a positive impact of 0.1 percentage point of GDP on the nominal balance, less than the 0.3 percentage point boost in 2015. By contrast, the impact of the business cycle on public finances was virtually unchanged. The structural primary balance, which is a better reflection of discretionary fiscal policy because it is immune to the influence of changes in interest rates, deteriorated by 0.5 percentage point of GDP. All in all, then, Belgium's public finances worsened in 2016. This means that there has been no structural improvement in the overall balance for the last three years and that there is a need for further consolidation of public finances.

Fiscal targets missed again in 2016

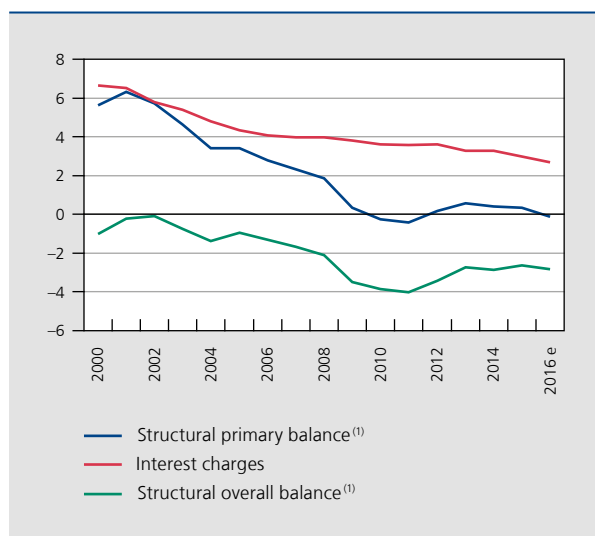
The fiscal policy of Member States has to conform with European fiscal rules as laid down in the Treaty of

TABLE 17 GENERAL GOVERNMENT OVERALL BALANCE AND DEBT
(in % of GDP)

	2000	2012	2013	2014	2015	2016 e
Revenue	49.0	51.6	52.7	52.0	51.3	50.9
Primary expenditure	42.4	52.2	52.4	51.8	50.9	51.0
Primary balance	6.6	-0.6	0.3	0.2	0.5	-0.1
Interest charges	6.7	3.6	3.3	3.3	3.0	2.7
Overall balance	-0.1	-4.2	-3.0	-3.1	-2.5	-2.8
General government debt	108.8	104.1	105.4	106.5	105.8	106.6

Sources: NAI, NBB.

CHART 60 DETERIORATION IN BOTH STRUCTURAL PRIMARY BALANCE AND STRUCTURAL OVERALL BALANCE IN 2016
(in % of GDP)



Sources: EC, NAI, NBB.

(1) The cyclical component of the structural primary balance and the structural overall balance is determined based on EC methodology.

Maastricht and in the Stability and Growth Pact. Belgium currently finds itself in the preventive arm of the Pact, but must of course also meet the conditions laid down in the corrective arm. This means that the budget deficit may

not exceed the reference value of 3 % of GDP and that public debt must be brought down to 60 % of GDP at a satisfactory pace.

In the event, however, Belgium failed to lift its structural overall balance in 2016 by the required minimum of 0.6 percentage point of GDP, even though the April 2016 stability programme had assumed that this improvement would be achieved. The structural improvement in 2015 was also well below the threshold.

Based on its autumn forecast, the EC decided that there was a risk of a significant deviation from the required adjustment path towards the medium-term budgetary objective (MTO), a key requirement of the Stability and Growth Pact's preventive arm. The current objective is to achieve a structurally balanced budget. The EC takes the view that the risk of a significant deviation in 2016 means a similar risk exists over 2016 and 2017 taken together. This conclusion remains unchanged if the direct budgetary impact of the refugee crisis and additional security measures are factored in, which require additional expenditure estimated at 0.2 % of GDP in 2016.

Until end-2016, Belgium was subject to the transitional rule for the debt criterion, which sets a specified minimum annual improvement in the structural balance aimed at creating sufficient momentum in reducing the level of debt. According to an analysis by the EC based on its

TABLE 18 TARGETS FOR THE OVERALL BALANCE OF BELGIAN GENERAL GOVERNMENT

(stability programme targets; unless otherwise stated; in % of GDP)

	2013	2014	2015	2016	2017	2018	2019
Nominal balance							
April 2013	-2.5	-2.0	-0.5	0.4			
April 2014		-2.1	-1.4	-0.4	0.6		
April 2015			-2.5	-2.0	-1.0	-0.2	
April 2016				-2.5	-1.4	-0.4	-0.2
November 2016 (draft budget)				-2.9	-1.7	-0.4	-0.3
<i>p.m. Actual</i>	-3.0	-3.1	-2.5	-2.8 e			
Structural balance							
April 2013	-1.8	-1.2	0.0	0.75			
April 2014		-1.4	-0.7	0.0	0.75		
April 2015			-2.0	-1.3	-0.6	0.0	
April 2016				-1.7	-0.8	0.0	0.0
November 2016 (draft budget)				-2.4	-1.1	0.0	0.0
<i>p.m. Actual</i>	-2.7	-2.9	-2.6	-2.8 e			

Sources: EC, FPS Budget and Management Control, FPS Finance, NAI, NBB.

autumn forecast, it looked as if Belgium would not make sufficient progress in 2016 to comply with the debt rule. Consequently, the EC will prepare a new report pursuant to Article 126, paragraph 3 of the Treaty on the Functioning of the European Union to determine whether Belgium, taking into account all relevant factors, is complying with the debt criterion.

Given the absence of a structural improvement in Belgium's public finances in 2016, implementation of the measures needed to achieve a structural balance was once again pushed into future years, continuing the trend in recent years of consistently deferring target achievement.

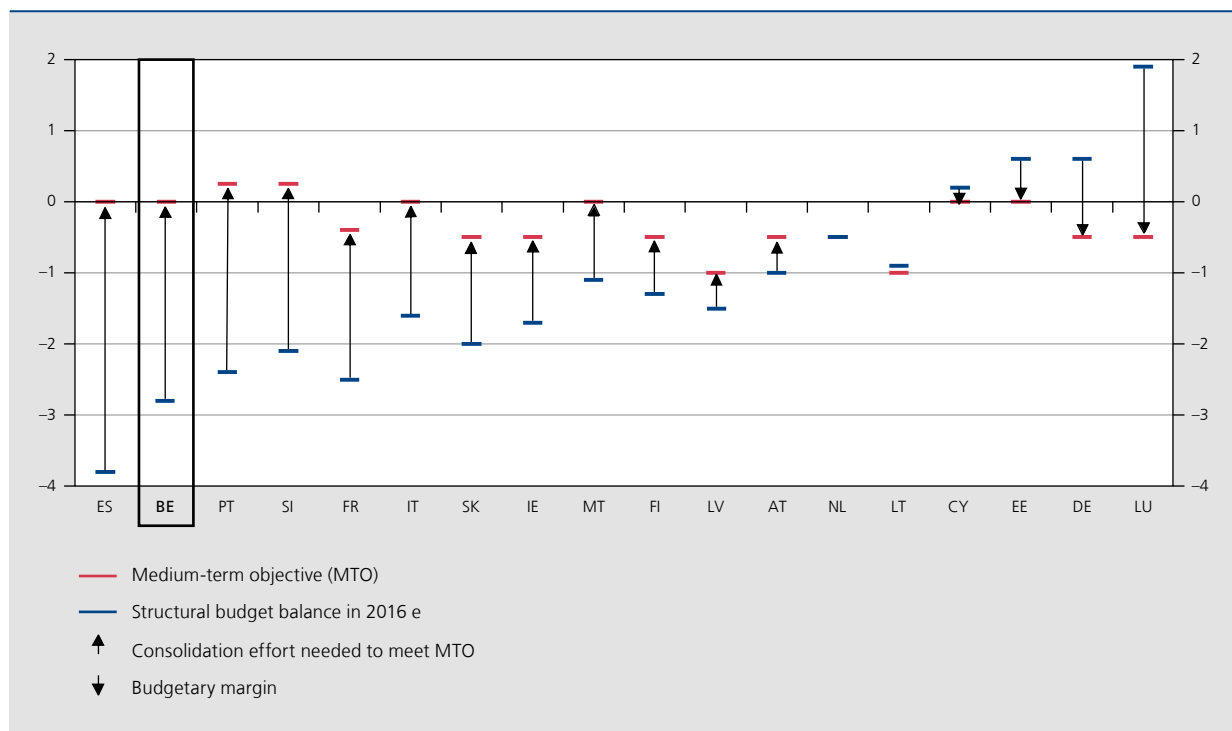
Structural budget balance to be achieved in the medium term

The government must achieve and maintain a healthy budget by taking determined action to reduce the budget deficit resolutely and sustainably to a position of structural balance. This would lower government debt, which is currently well above the threshold of 60 % of GDP set in the

Treaty of Maastricht, allowing the necessary buffers to be established for the future and creating the policy scope needed to meet the costs of an ageing society. Those costs remain considerable, though they are mitigated by pension reform measures.

If Belgium adheres to the European fiscal framework, its public finances could be made sustainable. As noted, achieving the MTO is at the heart of the preventive arm of the Stability and Growth Pact. In its April 2016 stability programme, Belgium revised this objective downwards, from a structural surplus of 0.75 % of GDP to a position of structural balance. This objective applies from 2017 and is in line with minimum MTOs as calculated by the EC, as it is more ambitious. Revising Belgium's MTO was possible largely thanks to pension reforms which lower the projected costs of population ageing. If it steadily follows the route towards a structurally balanced budget, Belgium should create a budgetary margin that could be used to accommodate the costs of population ageing. The funds released by falling interest charges following accelerated debt reduction could be used to cover these costs, while the structural balance objective could be eased as soon as

CHART 61 BELGIUM NEEDS TO MAKE RELATIVELY MARKED IMPROVEMENT IN STRUCTURAL BALANCE TO ACHIEVE MEDIUM-TERM OBJECTIVE⁽¹⁾
(in % of GDP)



Sources: EC, NBB.

(1) The chart contains data for countries in the euro area excluding Greece, for which no new MTO has yet been defined because it is subject to an adaptation programme. Countries are ranked by size of the required consolidation effort.

the debt has been reduced to a substantially lower level than at present.

Belgium's structural balance for 2016 is projected to show a deficit of 2.8% of GDP. Based on the Bank's December 2016 economic projections, the deficit should fall to 2.1% of GDP in 2017 and remain around that level in the following two years. To achieve its MTO, therefore, Belgium will need to improve its balance substantially. Based on data for 2016, it will need to make more progress than every other country in the euro area with the exception of Spain. Some countries – the Netherlands, Lithuania, Cyprus, Estonia, Germany and Luxembourg – have already achieved or exceeded their MTOs and consequently have some budgetary margin.

Worsening federal government deficit

Sound management of public finances is the essential duty of all governments and government sub-sectors. However, the sixth State reform, the budget part of which largely came into effect in 2015, led to a number of transfers of powers and related resources in 2016. For example, responsibility for hospital infrastructure was transferred from the social security sector to the Communities and Regions. A new structural reduction of € 1.25 billion in fiscal transfers from federal government to the Communities and Regions was also applied pursuant to the Special Finance Act of 6 January 2014, taking the contribution made by the Communities and Regions to the austerity measures to € 2.5 billion.

Against this institutional backdrop, the increase in the nominal deficit of the Belgian government can be

attributed entirely to the deterioration of the Entity I accounts, comprising the federal government and social security. Given the reduction in the borrowing requirement of Entity II, which is made up of the Communities and Regions as well as local government, Entity I accounts for virtually the entire general government deficit.

The federal government deficit widened from 2.4% of GDP in 2015 to 2.7% in 2016. Social security closed the financial year on a balanced budget. Despite their contribution to the austerity measures referred to above, the Communities and Regions managed to cut their deficit from 0.3 to 0.2 percentage points of GDP. The four main federated entities, namely the Flemish and French Communities and the Walloon and Brussels-Capital Regions, ended 2016 in deficit, while local government was able to consolidate the surplus of 0.1% of GDP recorded in 2015.

Solid internal fiscal coordination essential

The complex budgetary interactions between the different policy levels require efficient operational coordination.

This coordination is organised and formalised in the co-operation agreement signed on 13 December 2013 between the federal government, the Communities, the Regions and the Community Commissions. The agreement stipulates that when the stability programmes are drawn up, nominal and structural annual budget targets will be allocated between the various levels of government on the basis of a recommendation by the Public Sector Borrowing Requirement section of the High Council of Finance. This allocation has to be approved by

TABLE 19 OVERALL BALANCE OF GENERAL GOVERNMENT AND BY SUB-SECTOR
(in % of GDP)

	2013	2014	2015	2016 e
Entity I	-2.6	-2.5	-2.3	-2.7
Federal government ⁽¹⁾	-2.5	-2.5	-2.4	-2.7
Social security	0.0	0.0	0.1	0.0
Entity II	-0.5	-0.5	-0.2	-0.1
Communities and Regions ⁽¹⁾	-0.2	-0.4	-0.3	-0.2
Local government	-0.2	-0.2	0.1	0.1
Total	-3.0	-3.1	-2.5	-2.8

Sources: NAI, NBB.

(1) With effect from 2015, these figures include the advances on the regional additional percentages on personal income tax although, according to the methodology of ESA 2010, those advances are regarded as purely financial transactions and the regional additional percentages are only taken into account at the time of collection. This approach is in line with that observed in developing fiscal targets in the recommendations of the Public Sector Borrowing Requirement section of Belgium's High Council of Finance, as well as in stability programmes.

the Consultative Committee, a body comprising the Prime Minister and the Minister-Presidents of the Communities and Regions.

As in 2015, the Consultative Committee was again unable to agree on the allocation of the budget targets in 2016. The Communities and Regions only took note of the distribution proposed by the federal government, which prescribes a structural balance for the general government by 2018, matching Belgium's MTO. The stability programme for the sub-sectors also refers to a structural balance, but does not stipulate a precise phasing or quantified objectives for the individual Communities and Regions for 2016.

Consultations were hindered in 2015 and 2016 by uncertainty resulting from the implementation of the sixth State reform, relating to aspects such as the calculation of the advances on the regional additional percentages on personal income tax and the funding of transferred powers in relation to hospital infrastructure. Once these issues have been resolved, the members of the Consultative Committee will need to forge cooperation agreements during the discussions on future versions of the stability programmes. Moreover, this concern was included in the latest recommendations to Belgium by the EU Council.

5.2 Further reduction in revenues

Government revenues fell by 0.4 percentage point of GDP in 2016, continuing the downward trend seen in recent years. The decline was the result of policy measures combined with unforeseen factors.

Revenue from levies on earned income shrank by 0.9 percentage point of GDP, almost entirely due to the measures referred to in table 21 in relation to the tax shift, which greatly reduced levies on employment to improve business competitiveness, promote employment and boost household purchasing power. Changes to income tax bands intended to bolster purchasing power, especially of employees on low and middle incomes, combined with an increase in tax-deductible professional expense allowances, resulted in a reduction in revenue from personal income tax of 0.3 percentage points of GDP. Social security contributions fell by 0.5 percentage point of GDP due to the cut in the employer's contribution rate from 1 April 2016, 0.2 percentage point of which was funded by restricting wage subsidies through partial remittance of payroll tax.

The tax shift measures were intended to lead to further reductions in revenue from personal taxes and social security contributions over the coming years. This lowering of the

TABLE 20 GENERAL GOVERNMENT REVENUE⁽¹⁾
(in % of GDP)

	2012	2013	2014	2015	2016 e
Fiscal and parafiscal revenue	44.3	45.2	45.0	44.5	44.0
Levies weighing chiefly on earned income	26.0	26.5	26.3	26.0	25.2
Personal income tax ⁽²⁾	11.5	11.8	11.7	11.5	11.1
Social contributions ⁽³⁾	14.5	14.7	14.5	14.5	14.0
Taxes on company profits ⁽⁴⁾	3.0	3.1	3.2	3.4	3.6
Levies on other incomes and on assets ⁽⁵⁾	4.0	4.4	4.4	4.2	4.2
Taxes on goods and services	11.3	11.2	11.1	10.9	11.1
of which:					
VAT	6.9	7.0	6.9	6.7	6.8
Excise duties	2.1	2.1	2.1	2.1	2.2
Non-fiscal and non-parafiscal revenue ⁽⁶⁾	7.3	7.5	7.1	6.8	6.9
Total revenue	51.6	52.7	52.0	51.3	50.9

Sources: NAI, NBB.

(1) In line with ESA 2010, total revenue of general government does not include the proceeds of customs duties transferred to the EU nor the revenues levied directly by the EU.

(2) Mainly payroll tax, advance payments, assessments and additional percentages on personal income tax.

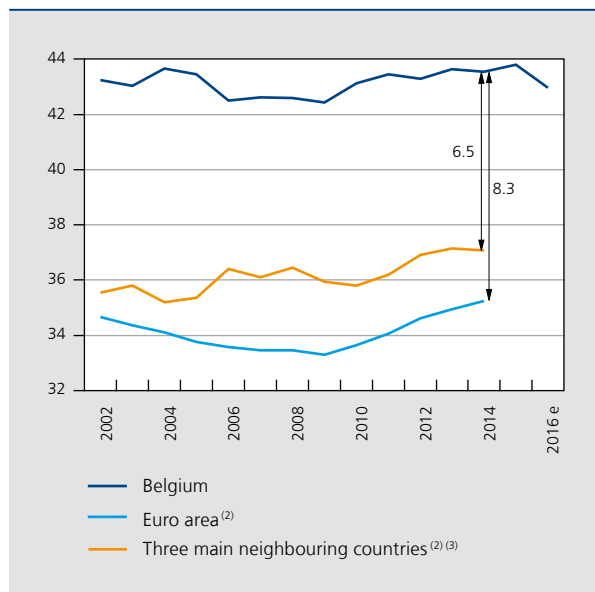
(3) Including the special social security contribution and the contributions of people not in work.

(4) Mainly advance payments, assessments and withholding tax.

(5) Mainly withholding tax on income of individuals, withholding tax on income from immovable property (including the proceeds of additional percentages), inheritance taxes and registration fees.

(6) Income from assets, imputed social contributions, current transfers and capital transfers from other sectors, plus sales of goods and services produced, including revenues on guarantees granted by the State on interbank loans.

CHART 62 HIGH LEVIES ON EMPLOYMENT IN BELGIUM
(implicit tax rate on employment⁽¹⁾, in % of wage costs)



Sources: EC, NBB.

(1) Defined as the total levies on income from employment paid to the government, divided by the wage bill. Calculated on the basis of the national accounts.

(2) Unweighted averages.

(3) France, Germany and the Netherlands.

tax on employment is intended to address the fact that these levies in Belgium are among the highest in the euro area: on the most recent EC statistics, the implicit levy on employment in Belgium was 8.3 percentage points higher in 2014 than the average across the euro area.

Lower tax on employment as implemented in 2016 was partially offset by a move towards a tax base with a less severe impact on economic activity. An example was the increase in taxes on goods and services by 0.1 percentage point of GDP. VAT receipts went up slightly, mainly due to the lifting of the VAT rate on domestic electricity consumption on 1 September 2015, the full impact of which was felt in 2016. Revenue from excise duties also rose moderately following increases in the duty on diesel, tobacco and alcohol. However, the measures taken so far to raise incomes are not enough to fund the tax shift fully. Consequently, the tax shift largely explains the sharp fall in the revenue ratio recorded in 2016 and projected to continue in the coming years.

Taxes on company profits increased by 0.2 percentage point of GDP, due among other things to the claw-back of the tax breaks granted to companies by the government via the system of excess profit rulings, which were judged by the EC to constitute illegal state aid. The reduction in the reference rates for notional interest deductions, linked to

the sharp decline in yields on Belgian ten-year government bonds, pushed up the amount of corporation tax payable.

Levies on other income and on assets remained virtually unchanged. The impact of the rise in the standard rate of withholding tax, from 25 % to 27 %, which came into effect on 1 January 2016, was offset by a reduction in yields due to lower interest rates. The scheme enabling SMEs to form cash reserves in exchange for a tax rate of 10 % is also leading to shrinking revenues from withholding tax, as this is no longer payable when a company is wound up.

Measures taken by the Communities and Regions boosted tax revenues by 0.1 percentage points of GDP. This was largely achieved through reform of the contribution to the Energy Fund in the Flemish Region (essentially an annual levy when connecting to the electricity grid). The proceeds mainly go towards reducing the debt mountain of the transmission system operator that has built up in recent years through financing renewable energy projects. The changes to gift taxes in all Regions, coupled with a less generous system of mortgage interest relief (housing bonus) in the Walloon and Flemish Regions, also helped push up tax revenues.

Non-fiscal and parafiscal revenues rose by 0.1 percentage points of GDP, principally due to the introduction by the Regions of a kilometre-based charge for lorries.

5.3 Spending cuts have ground to a halt

The moderation of primary expenditure seen in recent years weakened in 2016, leaving expenditure as a proportion of GDP virtually unchanged. Nominally, spending therefore rose at a comparable rate to the growth in economic activity.

The governments formed following the May 2014 elections implemented numerous austerity measures to curb the growth in primary expenditure. The federal government has committed to reducing its operating costs substantially by downsizing the civil service and buying fewer goods and services. The index jump implemented in 2015 fits in with this aim. Higher social security spending is being addressed by a series of measures aimed among other things at slowing the rise in health care costs. Like the federal government, the Communities and Regions also decided to introduce austerity measures, partly by cutting subsidies. Finally, local government also needed to make savings to remain financially healthy.

The consolidation of public finances through spending measures was impeded by a number of unforeseen

TABLE 21 MAIN FISCAL AND PARAFISCAL MEASURES⁽¹⁾
(in € million, differences compared to the previous year)

	2014	2015	2016 e	
			Total	of which: Taxshift
Total fiscal measures	209	-434	984	356
Structural fiscal measures	318	-21	989	356
Federal government and social security	298	-103	551	356
Personal income tax	-56	-492	-1 643	-1 680
Corporation tax	100	82	226	339
Levies on other incomes and on assets	131	50	493	460
Taxes on goods and services	123	257	1 475	1 237
Communities and Regions and local authorities	20	82	438	n.
Non-recurrent measures	-109	-413	-5	n.
of which:				
Tax regularisation	488	-837	-276	n.
Tax agreements and court decisions	-159	174	-25	n.
Energy sector contribution for unutilised sites	0	0	120	n.
Liquidation levy	0	-367	-124	n.
Registration fees:				
anticipatory effect of mortgage interest relief reform	150	-150	0	n.
Excess profit rulings	0	0	500	n.
Measures on social contributions ⁽²⁾	-285	-174	-2 011	-1 872
Total	-76	-608	-1 027	-1 516
<i>p.m. In % of GDP</i>	<i>0.0</i>	<i>-0.1</i>	<i>-0.2</i>	<i>-0.4</i>

Sources: Budget documents, NBB.

(1) This generally concerns the presumed influence of measures shown in budget documents. The final impact may be different.

(2) Of which the reduction in social contributions amounting to € 764 million was funded by lowering wage subsidies through incomplete transfer of withholding tax.

TABLE 22 GENERAL GOVERNMENT PRIMARY EXPENDITURE
(deflated by the GDP deflator, percentage changes compared to the previous year, unless otherwise stated)

	2012	2013	2014	2015	2016 e	Average 2000-2015
Level recorded ⁽¹⁾	52.2	52.4	51.8	50.9	51.0	47.4
1. Real recorded growth	2.9	0.3	0.5	-0.4	1.6	2.6
2. Influence of non-recurrent or fiscally neutral factors ⁽²⁾	1.1	-1.4	0.3	-0.3	0.3	0.0
3. Influence of cyclical factors ⁽²⁾	0.1	0.1	-0.1	-0.1	-0.1	0.0
4. Indexation effect ^{(2),(3)}	0.3	0.6	-0.4	0.0	0.3	0.0
5. Adjusted real growth (1 – 2 – 3 – 4)	1.4	1.0	0.6	0.0	1.0	2.6

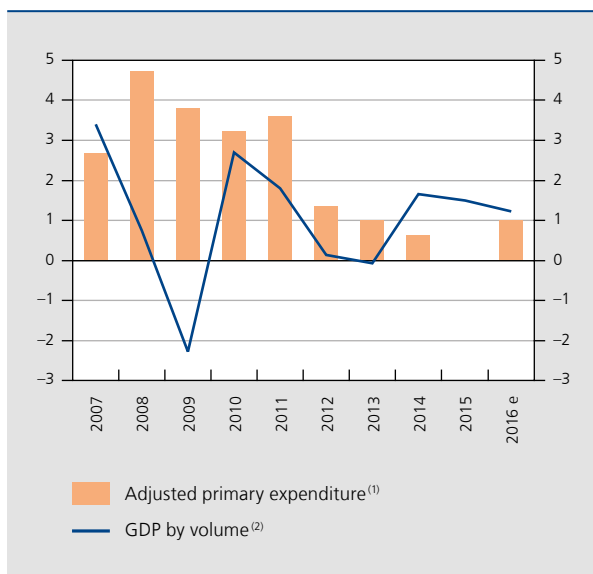
Sources: DGS, NAI, NBB.

(1) In % of GDP.

(2) Contribution to real recorded growth of primary expenditure.

(3) Effect caused by the difference between the actual indexation (or the theoretical indexation for 2015 and 2016 in view of the index jump) of public sector wages and social security benefits and the rise in the GDP deflator. The other effects due to differences between inflation measured by the GDP deflator and the movement in price factors influencing other expenditure categories – whether these are attributable to the indexation mechanisms or to divergent patterns in the prices of certain expenditure categories – are not adjusted, owing to the absence of sufficient information.

CHART 63 GENERAL GOVERNMENT PRIMARY EXPENDITURE AND GDP
(percentage changes compared with previous year)



Sources: NAI, NBB.

(1) Primary expenditure deflated by the GDP deflator and adjusted for cyclical and non-recurrent or budget-neutral factors, and for the indexation effect. The latter is caused by the difference between the actual indexation (or the theoretical indexation for 2015 and 2016 in view of the agreed index jump) of public sector wages and social security benefits and the rise in the GDP deflator.

(2) Calendar adjusted data.

factors in 2016, including an exceptional effort, totalling around 0.2% of GDP, in security measures and combating terrorism, and in accommodating asylum-seekers. A number of non-recurrent factors also pushed up expenditure, including court orders for tax refunds to Ethias and Elia and the recapitalisation by Dexia of its subsidiary Dexia Crédit Local. The time lag between the indexation of social security benefits and public sector wages on the one hand and inflation on the other were also behind the growth in primary expenditure. Conversely, there was a slight downward cyclical effect on primary expenditure in the form of a reduction in unemployment benefits.

Adjusted for the influence of temporary factors and the cyclical effect, as well as the time lag between inflation and indexation, real primary expenditure went up by 1% in 2016. This was in line with the modest rate of increase in recent years, and was lower than the growth in GDP in volume terms.

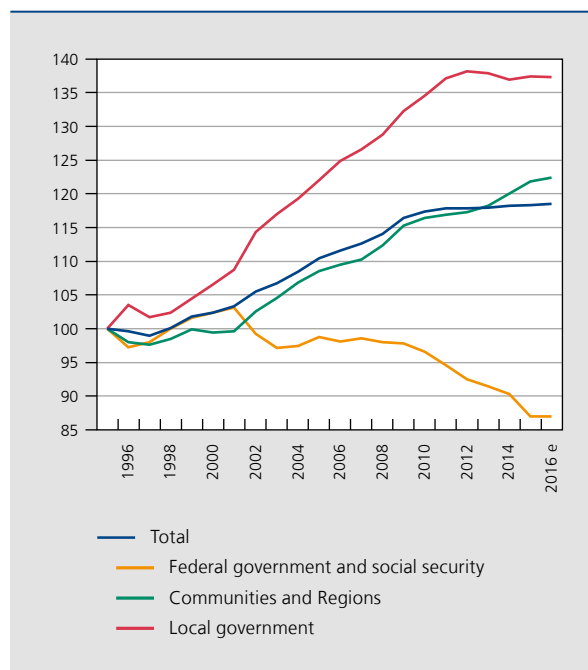
Public sector pay accounted for a quarter of primary expenditure in 2016, or 12.4% of GDP. This reflects the relatively high employment level in the Belgian public sector: almost 850,000 people are employed in the general government sector, 45% of whom work for the Communities and Regions, 37% in local government

and just 18% in the federal government and social security. This distribution has undergone radical changes in the past due to transfers of powers between government sub-sectors, particularly at the time of the 1988 State reform, and to a lesser extent following the police reforms in 2001. The other State reforms involved fewer transfers of civil servants. Drawing all strands together, the number of people employed in the public sector increased sharply between 2000 and 2010, and it is only since 2011 that the total number of civil servants has remained relatively stable.

Besides employment, other determinants of the public sector wage bill also barely moved in 2016, for example conventional pay rises and the wage drift, both of which were virtually zero. By contrast, wage indexation was introduced midway through the year, after the threshold index figure was passed in May. Due to the 2015 index jump, the previous indexation of public sector pay dated from early 2013. Overall, public sector wages fell by 0.1 percentage point of GDP compared with 2015.

Other current expenditure categories rose in 2016. Purchases of goods and services, like wages, turned out higher due to additional spending on security and measures to combat terrorism. These exceptional expenditure items cancelled out the effect of the earlier austerity

CHART 64 PUBLIC SECTOR EMPLOYMENT BY SUB-SECTOR
(Annual averages, index figure 1995 = 100)



Sources: NAI, NBB.

measures taken by the federal government, mainly consisting of a structural reduction in operating budgets. Business subsidies also rose substantially compared with the previous year, among other things due to payments

by the Energy Fund to transmission system operators in the Flemish Region. Current transfers also went up, partly thanks to the temporary increase in Belgium's contribution to the EU budget.

Box 6 – Making government more efficient

Efficiency can be described as the ability to achieve the best possible results with the fewest possible resources. The public sector needs to strive for efficiency. To do this, government could improve its services to the community, cap public spending or seek to achieve both goals simultaneously.

Public sector efficiency is difficult to analyse, and measuring output is not easy due to the frequent lack of data on its quality. Since public services are, by definition, not market services, there is also no pricing mechanism to enable their value to be quantified objectively. Nonetheless, relevant indicators can be designed for a number of functions, such as health care, education, security and mobility. These individual indicators can be combined to form a composite index for each function. Examples of indicators that can be used for health care are life expectancy, child mortality and the accessibility of medical care. Examples in the field of education include school student scores in the OECD's PISA tests, as well as the share of the population with a secondary or higher education qualification. When it comes to security, the index is based only on survey results, for example on the perceived impartiality of the legal system or the percentage of respondents who feel they have been victims of aggression or theft. The output of the mobility function is approximated using a composite index published by the World Economic Forum (WEF) for transport infrastructure (roads, rail, water, air). Here, an attempt is made to assess the relative efficiency of Belgium on these four functions compared with other Western European countries.

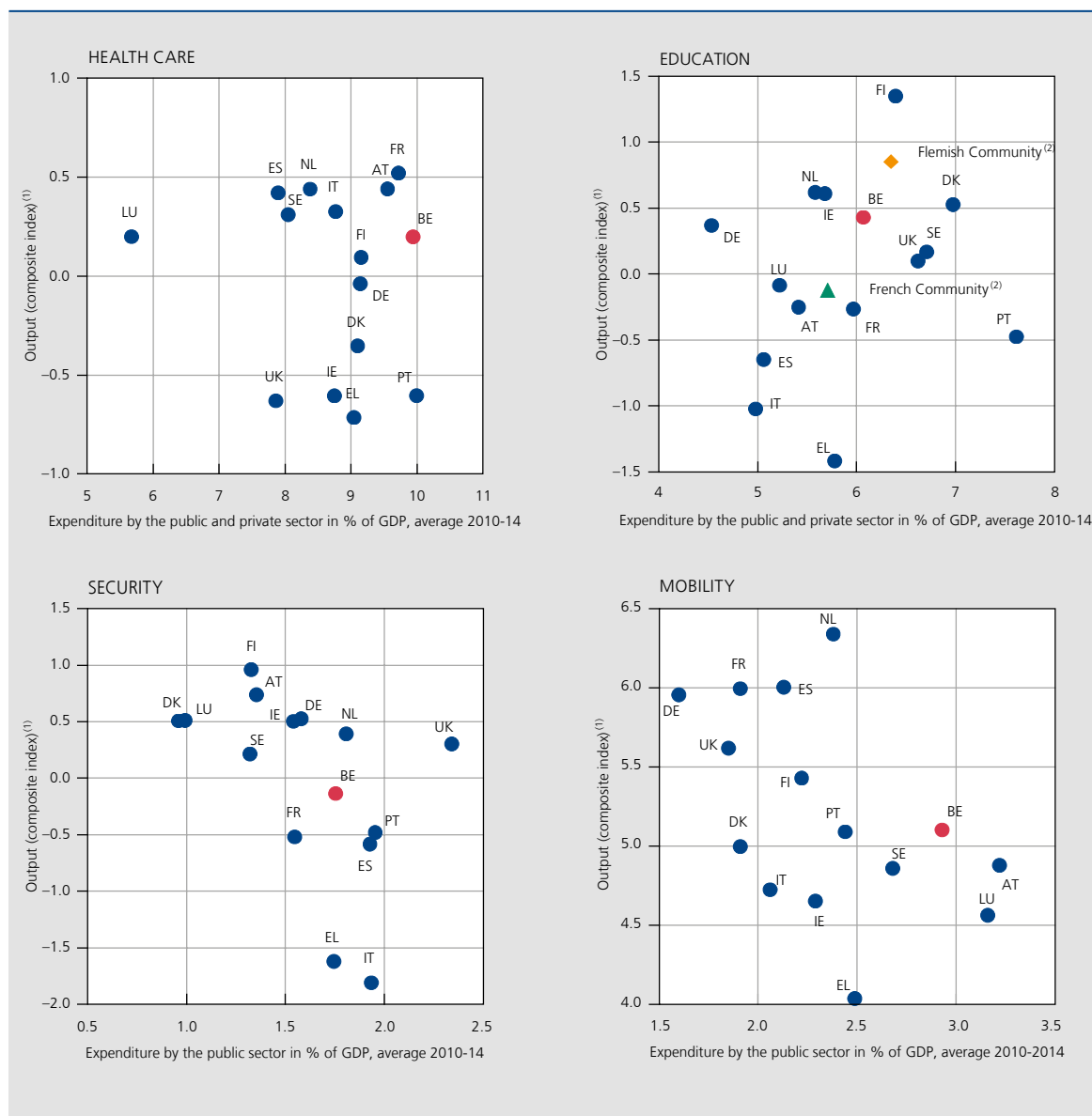
Unlike output, input can be measured rather simply on the basis of expenditure. The comparison is based on the COFOG classification (Classification of the Functions of Government) drawn from the national accounts, in which public expenditure is broken down across the different functions. In some areas, however, households also account for a not insubstantial portion of the expenditure. Since it is not possible to separate out the respective share of government and private households in the final result, to avoid distorting the analysis, the output obtained then needs to be compared against the total expenditure. To do this, information on household expenditure from the COICOP classification (Classification of Individual Consumption by Purpose) is added to total public expenditure. Average expenditure over the last 15 years is also taken into account, since current outcomes are often the result of expenditure spread over a relatively long period. Each recent change in the expenditure trend – for example due to Europe's great recession and sovereign debt crisis, as well as the measures taken by government in the wake of these events – is therefore weakened somewhat in the measured input.

Belgium scores fairly well on health care. That is partly due to the quality of the health infrastructure and the general satisfaction of recipients of health care, but also to the short waiting times when arranging medical appointments. However, this good result does come at very high costs – only one country spends more on health care than Belgium.

When it comes to education, the analysis shows Germany and Finland to be the most efficient of all the countries studied. Expenditure in the countries of Southern Europe varies widely, but overall this region achieves the weakest results. Belgium occupies an intermediate position, aligning fairly closely with the relatively efficient countries: its expenditure and results are below those of Finland but better than Germany's. An above-average share of the Belgian population has a higher education qualification, but Belgium's score is average for the percentage of people with a secondary education qualification. There is wide disparity in the results in the different Belgian communities; in the PISA survey, which tests the knowledge and skills of school students, students in the Flemish Community achieve a higher average score than their peers in the French Community.



EFFICIENCY OF THE PUBLIC SECTOR



Sources: EC, WEF, NBB.

(1) With the exception of the "mobility" function, for which the output is derived from a WEF survey, the composite indices developed to measure output are based on those described in Eugène, B. (2008), "The efficiency frontier as a method for gauging the performance of public expenditure: A Belgian case study", NBB Working Paper 138, September.

(2) Not all the indicators used for the international comparison were available for the Flemish and French Communities. In terms of output, their results were therefore approximated on the basis of the results of the 2015 PISA survey, while the input measurement was based on an estimate of the spending per student in 2012.

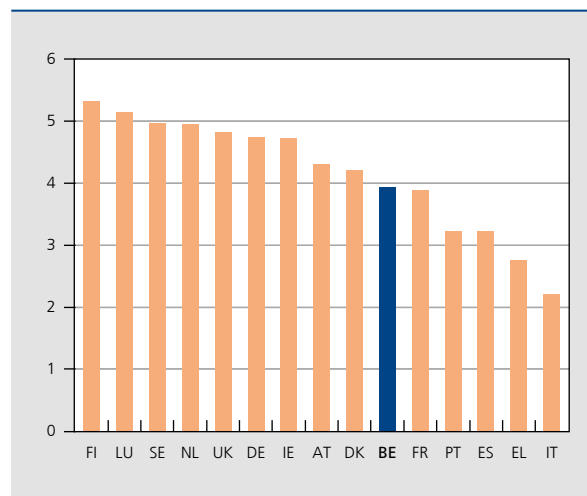
Belgium also occupies a middle-of-the-road position on the security front, with seven countries proving more efficient, i.e. achieving better results with lower expenditure. Denmark and Finland are among the most efficient countries for public order and security, closely followed by Austria and Luxembourg. France and the United Kingdom are comparable to Belgium in terms of efficiency, though each tackles this issue in very different ways, with France spending less and achieving worse results, and the UK spending more and achieving better results. The countries of Southern Europe, finally, bring up the rear.

Public spending on mobility is fairly inefficient in Belgium, with the considerable resources invested delivering only modest results. Austria and Luxembourg are even less efficient than Belgium, while Germany, France, the Netherlands, Spain, the United Kingdom and Finland all perform better in terms of both expenditure and quality. The other countries spend less than Belgium but also achieve less good results.

Belgium is not among the most efficient countries for any of the four functions measured, but also never falls into the least efficient group. In other words, Belgium achieves an average score for efficiency. This conclusion largely matches the results of a WEF survey in 2015, in which Belgium achieved a comparable score to France for efficiency, ahead of the Southern European countries but lagging behind the rest of the EU15.

GENERAL EFFICIENCY OF THE PUBLIC SECTOR

(Assessed by respondents on a scale from 1 to 7; survey conducted in 2015)



Source: WEF (Global Competitiveness Report).

There is no doubt, therefore, that the Belgian public sector could make major efficiency gains in each of the four functions studied. The precise nature of the potential efficiency gains differs depending on the function.

There is a need to control costs in health care, an area in which Belgium achieves good results. More specifically, the challenge lies in curbing the upward trend in spending without adversely impacting the quality of care. Unfortunately, the analysis of the ailment tells us nothing about the cure. At best, it can be observed that, relatively speaking, spending on hospitals is highest in Belgium.

It should be possible to improve public sector performance on functions such as education and mobility without increasing their budgets. The question of which might be the best methods of achieving this falls outside the scope of this analysis, though a number of possible routes can be outlined based on the expenditure profiles of the most efficient countries. Seen from this perspective, the data appear to suggest that, with regard to mobility, Belgium might consider boosting investment while at the same time reducing operating costs and associated subsidies.

Turning to public order and security, Belgium is possibly at a disadvantage due to factors over which it has no control, such as its central location, which facilitates all kinds of trafficking. Against this backdrop, it is difficult to compare the results with those of widely differing countries. There can be no doubt, however, that this is another area where there is scope for efficiency gains.



Improving the efficiency of the public sector should in any event be a core objective for all layers of the Belgian government over the coming years. First off, a structural approach will be needed to analyse all public sector tasks and enable choices to be made. The next step will be to investigate which policy level would be most suited for carrying out these tasks, with a view to eliminating overlaps and seeking benefits of scale. Lastly, the various government departments need to be organised as effectively as possible, partly by making optimum use of IT applications and by simplifying procedures. Any necessary reforms should be viewed from a long-term perspective and rigorously implemented.

At 2.4% of GDP, investment in 2016 still accounted for only a small part of public spending. This is below the average across the EU, and moreover barely compensates for the depreciation of earlier public investment. As a consequence, net investment – which reflects developments in the capital stock – is stuck at virtually zero. As gross fixed capital formation can substantially boost the economy's growth potential, initiatives to raise it would be decidedly welcome.

Social benefits, accounting for almost half of primary expenditure, remained unchanged as a proportion of GDP. However, this masks diverging trends in the various branches of social security. The rise in spending on sickness and incapacity benefits remains a concern, though it moderated in 2016 compared with the preceding years. Conversely, unemployment benefits fell for the third

successive year thanks to positive labour market dynamics as well as a range of austerity measures aimed at restricting entitlement to benefits.

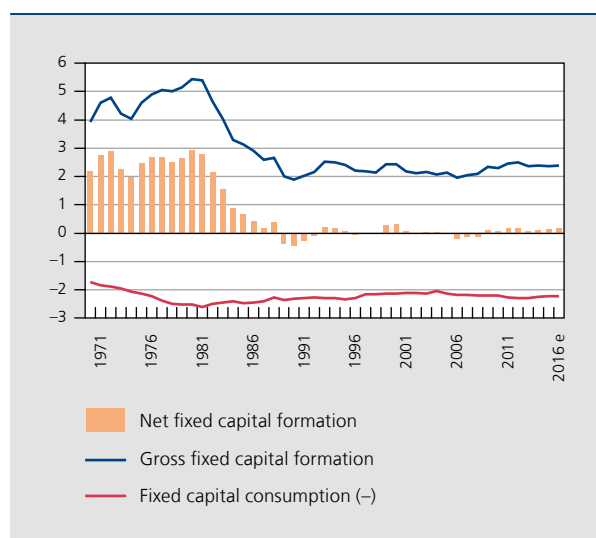
Rising pension expenditure due to population ageing

Population ageing has been reflected in public expenditure for several years now, and this trend is set to continue in the coming decades. The Study Committee on Ageing, for example, forecast in its 2016 report that total spending on pensions and health care will rise by four percentage points of GDP in the 2016-60 period. That compares with a reduction of 1.8 percentage points of GDP in aggregate spending on other social benefits, especially expenditure on unemployment benefits and family allowances. The rise in spending on pensions and health care therefore needs to be kept under control to guarantee the sustainability of public finances and assure the viability of the social protection system for the long term.

The number of pensioners has risen sharply since 2011, by between 1.5% and just over 2% per year, compared with a very limited increase in the first decade of the new millennium. Public spending on pensions has consequently risen from 9.3% of GDP in 2010 to 10.3% in 2016. In nominal terms, this expenditure rose by 3.7% in the latter year. Population ageing naturally makes it more difficult to wipe out the budget deficit.

Against the backdrop of population ageing, when the federal government took office in October 2014, it announced a raft of measures aimed at reforming the pension system further. These reforms, which in essence come down to keeping employees in work for longer, are intended to reduce spending on pensions, boost employment and support economic activity. The government had already taken various important measures in 2015, raising the statutory retirement age while imposing further constraints on early retirement, limiting the number of people entitled to survivor pensions and abolishing the pension

CHART 65 PUBLIC INVESTMENT BARELY OFFSETS DEPRECIATION
(in % of GDP)



Sources: NAI, NBB.

CHART 66 HEALTH CARE, SICKNESS/DISABILITY, UNEMPLOYMENT AND LIVING WAGE

(data deflated by the GDP deflator; percentage changes compared with the previous year, unless otherwise stated)



Sources: Budget documents, NAI, NBB.

(1) Expenditure adjusted for the indexation effect, caused by the difference between the actual indexation (or theoretical indexation for 2015 and 2016 in view of the agreed index jump) of public sector wages and social security benefits and the rise in the GDP deflator.

bonus. It also approved a number of changes to civil service pensions and introduced stricter conditions governing unemployment benefit with employer top-up.

The government introduced a further series of pension reforms in 2016, including measures to harmonise the 'diploma bonus' system for pension calculations in the three main pension systems, abolishing the preferential *tantièmes* and schemes in the civil service pension scheme, introduction of a mixed pension in the public sector (contract agent/civil servant), and reforming the disability pensions for civil servants. However, the conditions under which these proposals would apply have not yet been worked out and are still being discussed by the various stakeholders. In addition, the National Pension Committee was charged with paving the way for a range of reforms by looking at how the strenuousness of the

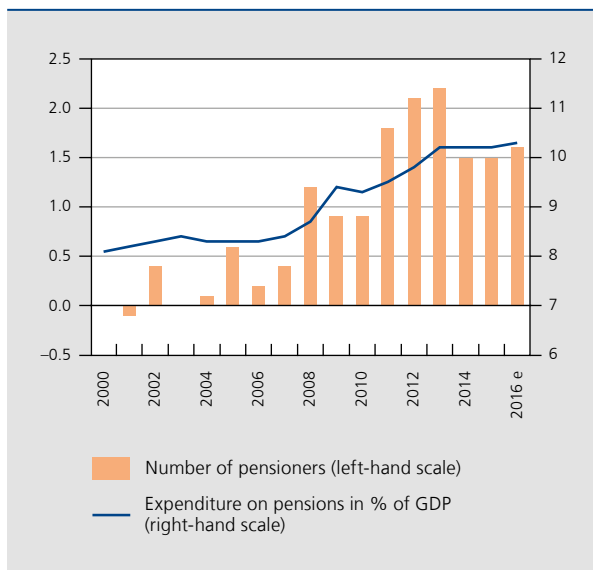
job can be taken into account in calculating pension entitlements, whether a system of part-time pensions could be created and how a points-based pension system could be introduced.

Health care spending must be kept under control

Public spending on health care will be influenced in the coming decades by new needs on the part of the growing older population. Demand for health care will increase, partly due to the need for special facilities for the diagnosis and treatment of certain age-specific disorders and diseases. However, it is important to note that population ageing is just one of the factors behind growth in health care expenditure. Other factors relate to rising affluence and the concomitant growing demand for health care, as well as the rising costs of treatments, partly due to rapid technological progress.

CHART 67 SHARP INCREASE IN PENSIONER NUMBERS OVER SEVERAL YEARS

(percentage changes on an annual basis, unless otherwise stated)



Sources: National Pensions Office, NAI, NBB.

Public spending on health care in a narrow sense (according to the definition used in the national accounts) amounted to 7 % of GDP in 2016. The increase in this spending was

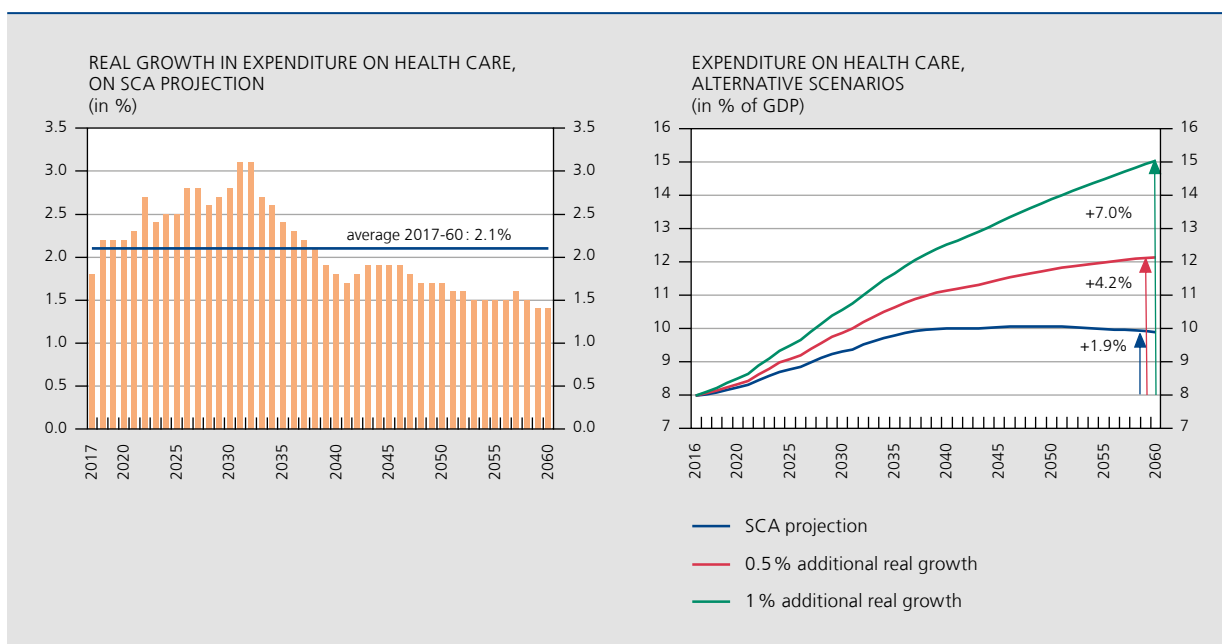
modest compared with the rapid growth still recorded a few years ago. Spending was kept under control thanks to new austerity measures, such as the non-indexation of medical fees in 2016, and the introduction of the 'patent cliff' mechanism, by which reimbursement for drugs drops off sharply as soon as a patent expires.

On projections by the SCA, average spending on health care in a broad sense is set to grow by 2.1 % per annum in real terms in the 2017-60 period, while the potential economic growth over the same period should average 1.6 %. As a result, the SCA projects an increase in health spending of 1.9 percentage points of GDP by the end of this period. If health care spending were to rise more quickly than anticipated, ageing costs would go up sharply. For example, expenditure growth of 2.6 % or 3.1 % per annum would boost the impact to 4.2 and 7 percentage points of GDP, respectively. It is thus essential to maintain strict control over the rise in health care expenditure.

Further decline in interest charges thanks to very low or even negative interest rates

Interest charges fell further in 2016, by 0.3 percentage points of GDP. As the debt ratio remained virtually unchanged, this decline – as in 2015 – was due entirely to the reduction in the implicit interest rate. This rate, which is the computed interest charge as a proportion

CHART 68 PUBLIC EXPENDITURE ON HEALTH CARE IN A BROAD SENSE⁽¹⁾

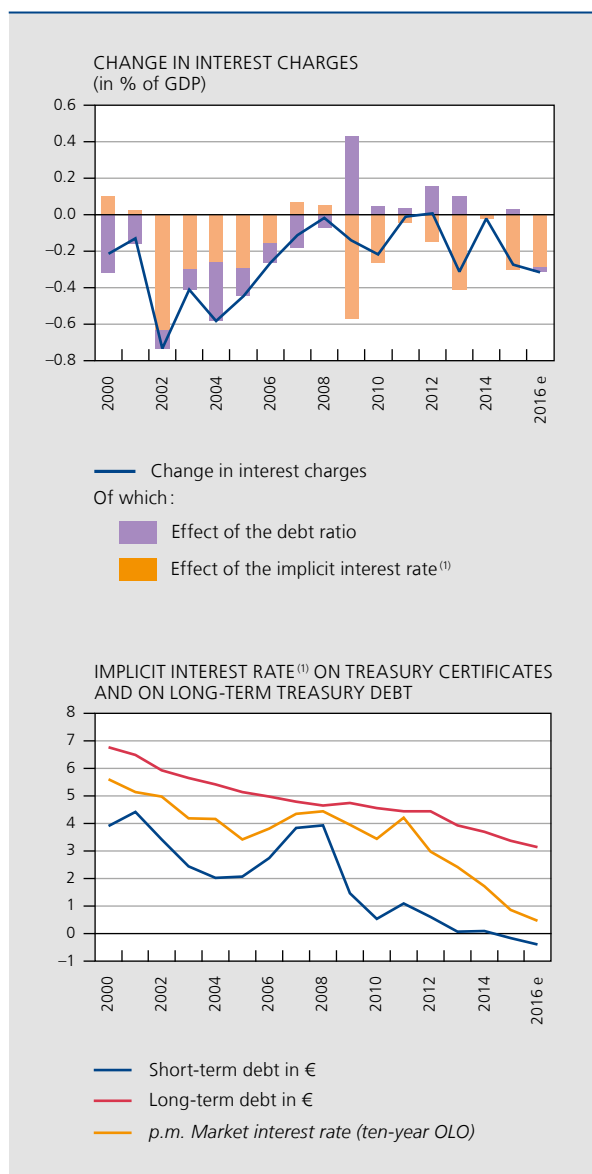


Sources: SCA, NBB.

(1) Definition used for public expenditure on health care by the SCA in its 2016 annual report. As well as spending on medical care as shown in the national accounts, this definition includes other spending items, including most other social benefits in kind and the Flemish health care insurance fund (*Zorgfonds*).

CHART 69 DECLINE IN INTEREST CHARGES ATTRIBUTABLE TO FURTHER REDUCTION IN IMPLICIT INTEREST RATE

(in %, unless otherwise stated)



Sources: FPS Finance, NAI, NBB.

(1) Interest charges in the current year as a proportion of the debt at the end of the preceding year.

of the outstanding public sector debt at the end of the previous year, will continue to trend downwards as long as market interest rates on new issues remain lower than yields on mature securities and government loans. This was once again the case in 2016. In the short term, the negative yields that persisted throughout the year enabled the government to generate some funds through the issuance of Treasury bills with maturities of less than one year. For the medium term, too, the Treasury was able to issue five-year linear bonds with a negative

coupon. Yields on ten-year reference bonds hovered around the 1 % mark throughout 2016, slumping to an average low of 0.15 % in August before rising again in the fourth quarter.

5.4 Debt ratio trend yet to reach turning point

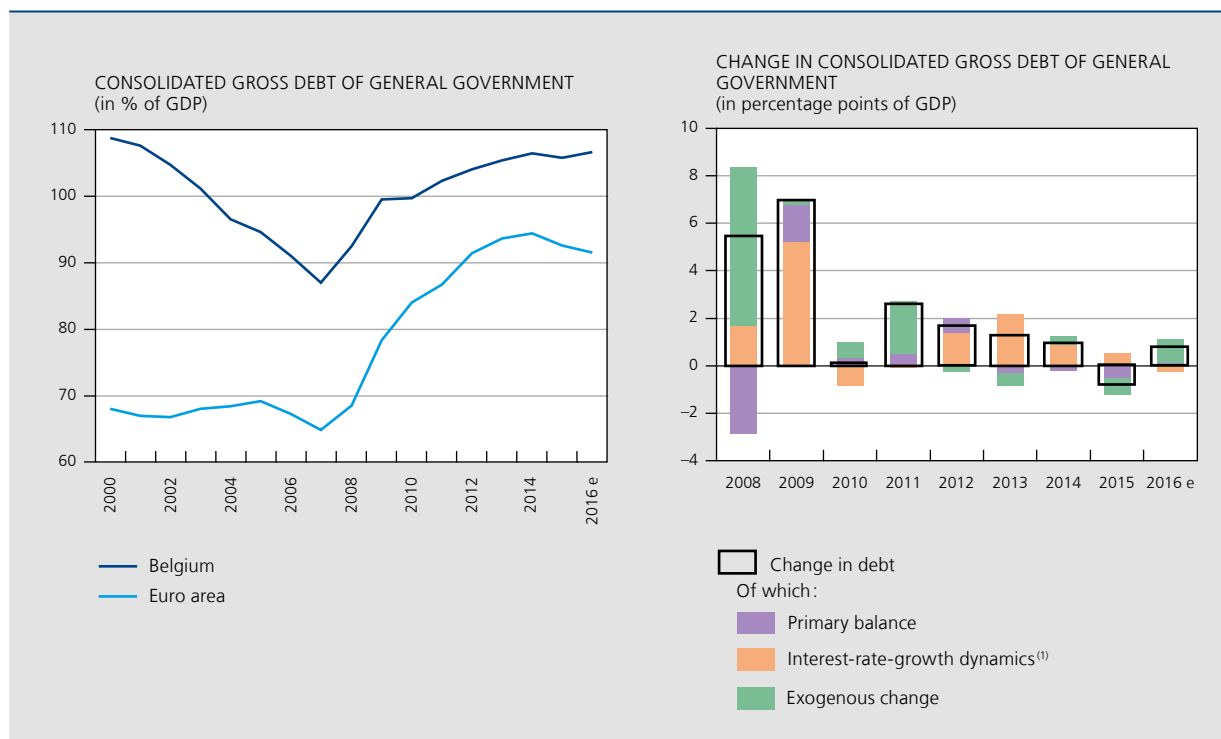
Belgium's public debt had risen to 106.6 % of GDP by the end of 2016, indicating that Belgium has not yet managed to reverse the upward trend in the debt ratio which began following the onset of the financial crisis in 2008. In the rest of the euro area, by contrast, the debt ratio has been falling since 2015.

This is despite the favourable interest-rate-growth dynamics in 2016, when, for the first time since 2011, nominal GDP growth exceeded the implicit interest rate on the public debt, automatically reducing the public debt as a percentage of GDP – though this effect was partially cancelled out by a small primary budget deficit.

The increase in the debt ratio can be ascribed entirely to exogenous factors, which impact on debt but not on the overall balance. For example, government debt was pushed up by an increase in loans granted under social housing policy, while taxes assessed but not yet collected and state pension liabilities related to pension funds taken over from corporations in the past also had an upward effect. The debt management process also pushed up debt due to costs of interest rate swaps and other derivatives contracts agreed in the autumn of 2014 for the issue of government bonds at then applicable rates in 2015 and 2016. Interest payments on a cash basis also exceeded those on a transaction basis, which serve as the reference value for interest charges in the general government accounts. The reason was the issuance of bonds in earlier years with nominal coupons above market interest rates; this has a downward effect on debt in the year of issue up to the amount of the issue premiums, because the issue price of securities is higher than their nominal values. However, this effect gradually peters out as higher coupons are paid. Substantial issue premiums were again realised in 2016, mitigating the upward effect of other debt management-related factors.

Bringing about a structural reduction in the debt ratio will require substantial and sustained primary surpluses. The EC calculated that, to meet the debt criterion – i.e. lowering the debt ratio by 1/20th of the difference between the present debt ratio and the 60%-of-GDP threshold – Belgium would have needed to increase the structural

CHART 70 DEBT RATIO UP AGAIN IN 2016



Sources: EC, NAI, NBB.

(1) The difference between the implicit interest on debt and nominal GDP growth, multiplied by the ratio of debt at the end of the preceding year to the GDP over the period under consideration.

balance by 2.6 % of GDP in 2016. So from this perspective too, achieving a structural balance is essential.

Further increase in average maturity of government debt

The federal government accounts for by far the largest share of Belgium’s total general government debt: around 85 %. The gross federal government balance to be financed totalled € 43.5 billion in 2016, slightly up on the previous year. Although medium and long-term debt maturing in 2016 was lower, the budget deficit widened substantially in cash terms.

To a greater extent than in the previous two years, financing requirements were met in 2016 primarily through the issue of linear bonds (OLOs). Nearly 90% of OLOs issued in 2016 have a maturity of at least ten years, while some have 50-year maturities, enabling the Treasury to fix the low yield rate on government bonds for a long period. The volume of Treasury certificates – short-term debt instruments – rose by € 1.2 billion, but was still low compared with the volumes issued during the financial crisis. All in all, the average maturity of the debt portfolio increased for the seventh year in succession, to 8.7 years. That compares with less than six years in 2009.

TABLE 23 FINANCING REQUIREMENTS AND RESOURCES OF THE FEDERAL GOVERNMENT

(in € billion)

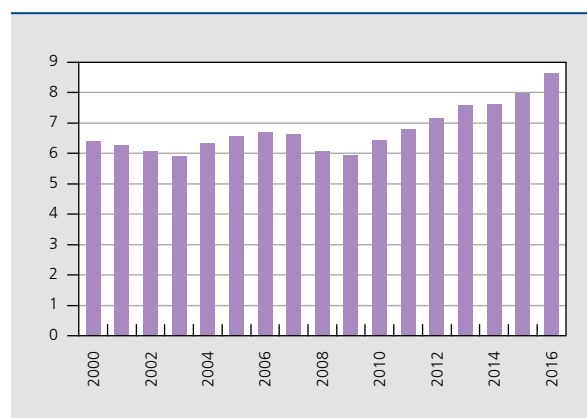
	2014	2015	2016
Gross balance to be financed . . .	38.2	41.0	43.5
Gross financing requirements	32.9	37.0	38.5
Budget deficit (+) or surplus (-) ⁽¹⁾	10.5	9.0	12.6
Medium- and long-term debt maturing during the year	22.4	28.0	25.9
In euro	22.4	28.0	25.9
In foreign currencies	0.0	0.0	0.0
Buy-backs (securities maturing the next year or beyond)	5.3	4.0	5.0
Other financing requirements	0.0	0.3	0.0
Funding resources	35.7	40.7	42.3
Linear bonds (OLOs)	31.8	35.6	37.6
State notes and others	3.8	5.1	4.7
Net change in the short-term debt in foreign currencies	0.0	0.0	0.0
Change in the outstanding amount of Treasury Certificates	1.8	-1.1	1.2
Net change in other short-term debts in € and in financial assets	1.4	1.4	0.1

Source: FPS Finance.

(1) The overall balance is calculated on a cash basis and takes account of financial transactions which are not included in the overall balance of general government which, in accordance with ESA 2010, is calculated on a transaction basis.

CHART 71 FURTHER INCREASE IN AVERAGE MATURITY OF FEDERAL GOVERNMENT DEBT

(average maturity of federal government debt, in years)



Source: FPS Finance.