Ministero dell'Economia e delle Finanze

ECONOMIC AND FINANCIAL DOCUMENT 2019

Section I **Italy's Stability Programme**

MINISTERO DELL'ECONOMIA E DELLE FINANZE

ECONOMIC AND FINANCIAL DOCUMENT 2019

Section I Italy's Stability Programme

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INTRODUCTION

The Economic and Financial Document 2019, the first of the new Government, examines the results achieved in ten intense months of activity and traces the budgetary and reform policy strategy for the next three years. The Government has fully realised the initial economic and social reform programme described in early autumn in the Update of the EFD 2018. This happened in an international and European economic context that has become increasingly difficult and in the presence of periods of tension in the government bond market. The Government has tackled the situation by modifying its initial budgetary plan in order to reach an agreement with the European Commission at the end of last year, but that has not prevented the realisation of its reform and social inclusion goals.

Albeit in a deeply changed and more complex short-term economic context, with this document the Government confirms the fundamental objectives of its action: gradually reducing the growth gap vis-à-vis the European average that has characterised the Italian economy especially in the last decade, while at the same time lowering the debt-to-GDP ratio. To this end, the Government's strategy reaffirms the role of public investment as a crucial factor for growth, innovation, social development and increased competitiveness of the production system; tax reform in a gradual transition towards a flat tax system as an important component of a more balanced growth model; support to companies engaged in technological innovation and the simultaneous strengthening of the social protection and inclusion system.

The difficult economic situation that we face today is characterised by a decline in manufacturing activity that has particularly affected both Germany and Italy due to their production specialisation and their high export orientation. International relations have changed greatly in the last two years and the evolution of world trade has reflected this to a growing extent. This is compounded by the slowdown of some major emerging economies, the depreciation of the respective exchange rates, continuing uncertainty surrounding Brexit and the regulatory and technological changes that have affected the automotive industry. These trends have resulted in a marked slowdown of European growth, which is accompanied by persistent conditions of low inflation. These conditions are more favourable for the countries most affected by the crisis at the beginning of the decade, such as Italy.

In this context, our country's performance shows that employment and the value added of services have been maintained, but this has not been sufficient to

ensure an adequate rate of growth in Gross Domestic Product. Year 2018 ended with an increase in real GDP of 0.9 percent, affected by the unfavourable dynamics of the second half of the year that also determined a slightly negative carryover effect on 2019. Because of changes in the internal and external conditions, the growth projection for this year has been revised downwards from 1 percent in the year-end forecast to 0.1 percent in the present document.

Overcoming this phase of low nominal growth in our economy depends on the evolution of the international economy and the effectiveness of growth-stimulating policies, both macroeconomic and for structural reform, which we are implementing.

There is also a need for a change at European level to move to a growth model that, without prejudice to the competitiveness of the EU countries, is based more on the promotion of domestic demand. The extremely high trade surpluses of some European countries represent the macroeconomic imbalances that are the source of excessive exposure to shocks *external to the Union, especially in an historical time in which globally we are witnessing a possible change of approach with respect to international trade and multilateralism. Therefore, at European level the Government will promote a reappraisal of the economic policy approach, from the budgetary rules to industrial, trade, investment and innovation policies.*

The current phase of cyclical weakness of the economy makes it necessary to sustain economic activity and in particular public and private investment, which, though recovering, stood at 18 percent of GDP in 2018, compared to levels above 20 percent in the years before the crisis.

The Government has put in place two packages of measures to support investment. The first, the 'Growth' Decree Law, focuses on measures to stimulate the accumulation of capital and investments. Among other measures super-depreciation is reintroduced, modified so as to favour small and medium-sized enterprises, the mini-IRES (corporate income tax) is replaced with a reduction in the rates of direct taxes on income attributable to profits retained in the undertaking and the procedures to benefit from the patent box *tax relief are simplified. The measures to support private investment are accompanied by an increase in budgetary resources for investment by local and regional authorities. Resources that are added to the expected positive effects in terms of greater investment attributable to the measures to release surpluses introduced with the Budget Law for 2019.*

The second measure, the 'Sblocca cantieri' ('Unlock sites') Decree Law, aims to boost the resumption of the construction sector, streamlining the existing legislation relating to the award of contracts, integrated contracts, subcontracting, rules on planning, public-private partnership and the procedures

for the approval of project variations. Investment in construction increased last year by 2.6 percent and the number of building permits considerably increased. The improvement of the regulatory framework resulting from the legislative intervention, together with the Government's commitment to increase resources for public investment and incentives for the building renovation, including for earthquake protection, should therefore create the conditions for a true recovery of a sector that is still crucial for employment and the general trend of the economy.

These interventions have a neutral impact on public finances, testifying the Government's attention to budgetary discipline. In the year-end agreement with the European Commission, the Government had indicated a net borrowing forecast for 2019 of 2 percent of GDP. The Budget Law contains a clause, which in case of deviation from the net borrowing target envisages a block on two billion of public expenditure. Based on new forecasts published in this document, this scenario now appears likely. The Government will therefore implement this expenditure reduction.

Because of activating the expenditure reduction laid down by the legislation in force (which does not therefore constitute an 'additional measure'), the deficit for this year is estimated at 2.4 percent of GDP. In structural terms, i.e. net of cyclical component and temporary measures, this result would give rise to a variation in the net borrowing of only -0.1 percentage points. Taking into account the flexibility agreed with the Commission in relation to extraordinary expenditure to tackle hydrogeological risks and extraordinary interventions on infrastructure, as well as the negative level of the output gap, the result for this year would fall within the limits of the Stability and Growth Pact (SGP).

For subsequent years, the Stability Programme traces a public finance path that gradually reduces the deficit of the general government to 1.5 percent in 2022, with a reduction of 0.3 percentage points per year that determines an almost equivalent improvement in the structural balance. According to the new official projections, the structural deficit would fall by 1.5 percent of GDP this year to 0.8 percent in 2022, in line with a gradual convergence toward the structural balanced position. The planned policy objectives are in line with the SGP while setting more contained improvements in the structural balance in comparison to a literal interpretation of the rules, as imposed by the still difficult conditions in which our economy finds itself and the recent cyclical weakening.

The expected trend of inflation and the GDP deflator for the current year and the next three years remains marked by a strong moderation, making it more difficult to attain a high nominal growth and a marked reduction of the public

debt ratio. The new official forecasts indicate an increase in the debt-to-GDP ratio for 2019, which moderately increased last year. For the next few years, the Stability Programme aims for a reduction of the debt-to-GDP ratio, which would be close to 129 percent in the final year of the forecast.

As regards the internal budgetary policy targets, the policy scenario presented here expects an increase in public investment over the next three years, which would rise from 2.1 percent of GDP recorded in 2018 to 2.6 percent of GDP in 2022.

In line with the Government Contract, it is also intended to continue, in the draft Budget Law for next year, the process of reform of income taxes ('flat tax') and general simplification of the tax system, by alleviating the taxation of middle classes. This in compliance with the public finance targets defined in this document.

The profile outlined for the net borrowing, also in light of the costs necessary for the refinancing of so-called unchanged policies (peace missions, public employment, investments), will require the identification of large incremental resources. The existing legislation on tax matters is now confirmed pending the definition of alternative deficit-reducing measures and tax reform measures in the course of the next few months, in preparation of the 2020 Budget Law.

The GDP growth forecast in the policy scenario, although affected by budgetary constraints, is higher than that of the scenario based on unchanged legislation except in the final year, amounting to 0.2 percent in 2019 and then increased to 0.8 percent in the three following years (compared to a scenario at unchanged legislation that reflects real growth rates of 0.6 percent in 2020, 0.7 percent in 2021 and 0.9 percent in 2022). Looking at the most recent forecasts of international institutions, it is observed that, although in a context of slowdown, in 2020 our economy is expected to reduce the growth gap compared with the average of the countries of the euro area and the major European economies (France and Germany).

In general it is appropriate to reiterate what has already been stated in the past, i.e. that the official forecasts are and must be of a prudential nature, as they are aimed at building a reliable and shared public finance framework. The Government aims to achieve much more significant results in terms of economic growth within an approach that pays attention to the dimension of fair and sustainable well-being.

Reforms are the best way to enhance the economy's growth potential. This year's National Reform Programme, the first presented by the new Government,

reflects the various measures and reforms already undertaken and sets forth the strategy for the next three years.

The Government has prioritised social inclusion, fighting poverty, helping the inactive population find employment and improving education and training. The 'Dignity' decree aims to reduce job insecurity by discouraging the excessive use of fixed-term contracts and promoting the use of permanent contracts. Citizenship Income has the dual purpose of fighting poverty and helping beneficiaries in terms of job seeking and training paths.

The revision of the pension system through the so-called 'Quota 100' intends to allow easier access to the pension, also favouring generational turnover and the innovation and productivity of businesses and public administrations.

The theme of the work will continue to have a central place in the Government's economic policy action over the next few years with the aim of ensuring fairer working conditions for Italian citizens and adequate wages. The introduction of a minimum hourly wage for those sectors not covered by collective bargaining and the provision of fair treatment for apprenticeships in free professions will be subject to evaluation. Measures will be also considered to reduce the tax wedge on labour and cut administrative costs, including through digitisation.

In addition to investment in physical infrastructure, economic development requires also a large effort in the field of technological innovation and research. The Government will draw up National Strategies for Artificial Intelligence and for Blockchain. Significant resources will be invested in the diffusion of broadband and the development of the 5G network. The measures of the 'Impresa 4.0' Plan and those to support innovation in small and medium enterprises were also refinanced.

The Government will re-launch Italy's industrial policy, with the aim not only of revitalising sectors that have been in crisis for some time, but also to give Italy a leading role in industries that are at the centre of the transition toward a sustainable development model. The passage to higher ecological standards represents a real opportunity for growth for Italy, which must be pursued by incentivising the research, design and production of means of transport with low environmental impact in our country. The Government will strengthen its support for trialling and adopting digital transformations and enabling technologies that offer solutions for more sustainable and circular production. Green finance can provide an important contribution to the growth of these activities and the Government will support their development.

Administrative simplification actions will be part of a more general measure to accelerate growth that the Government intends to launch in the coming months, which will involve the recognition, typing and reduction of permission

regimes, identifying the non-essential authorisation procedures and eliminating unnecessary administrative burdens.

The efficiency of justice represents a decisive factor for economic recovery and for renewing citizens' confidence in the law. In this context, interventions aimed at speeding up civil and criminal judicial proceedings have been implemented, such as the comprehensive reform of insolvency proceedings, in addition to the important resources allocated to solve staff shortages of administrative staff and the judiciary.

In addition, Italy has been characterised for years by the decline in the birth rates and low female participation in the labour market. The Government intends to continue the efforts to reduce tax burden and allocating more resources in favour of families, with particular regard to large ones and those with a family member with disabilities. Future initiatives will focus primarily on reorganising the subsidies for birth rates and parenthood, promoting corporate welfare for relatives, improving the healthcare system and the related infrastructure.

Finally, one of the main policy-scenario targets of the Government's action is to support school and university education and research through measures to finance their development, with particular attention to human capital and infrastructure.

In summary, the key objective of the Government's programme is a return to a phase of economic development marked by an improvement of social inclusion and quality of life, ensuring the reduction of poverty and guaranteeing access to training and employment, while acting also in the perspective of reversing the negative demographic trend. Regarding competitiveness, the Italian economy will be strengthened by the improvement of the productive environment caused by the reduction in costs for businesses, both fiscal costs and more generally those inherent in the bureaucratic system.

Giovanni Tria

Minister of Economy and Finance

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I. OVERALL FRAMEWORK AND BUDGTARY POLICY OBJECTIVES

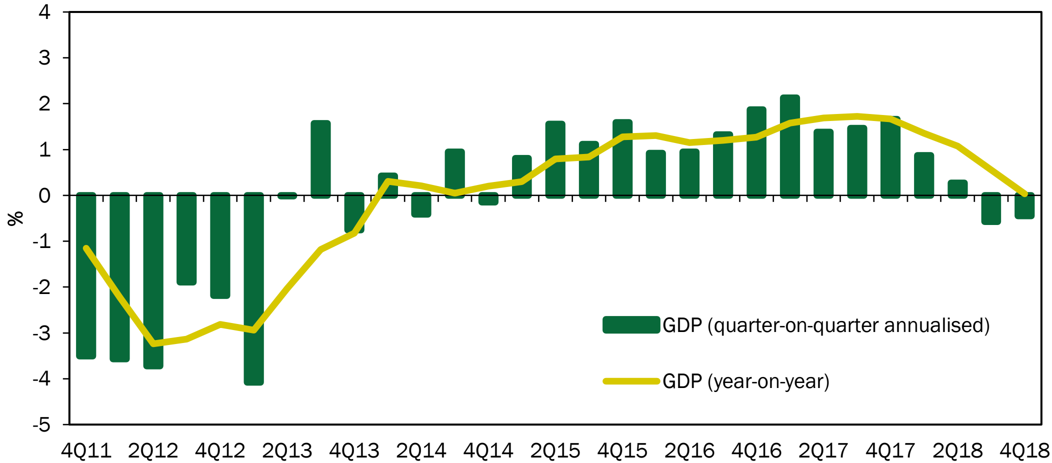
I.1 RECENT TRENDS AND PROSPECTS FOR THE ITALIAN ECONOMY

The Italian economy has lost momentum over the last year, recording an overall real GDP growth of 0.9 percent, down from 1.7 percent in 2017. In fact, modest real GDP gains in the first two quarters were followed by slight declines in the third and fourth quarter.

Overall, the economic indicators available to date and *nowcasting* estimates with internal models suggest that the contraction in economic activity has paused in the first quarter of 2019. In January, employment, industrial production, exports of goods and retail sales have shown a considerable rebound. On the other hand, the business and consumer confidence indices have continued to fall in January and February, recovering only slightly in March in services and construction.

Companies' expectations are cautious, particularly in the case of the manufacturing sector. In the face of these developments in the scenario under unchanged legislation, the forecast of average GDP growth in real terms for 2019 stood at 0.1 percent (1.0 percent in the scenario of the most recent official document[1]). This estimate is affected by the negative carryover (-0.1 percentage points) from the quarterly data for 2018. Cyclical prospects are also adversely affected by the current configuration of the exogenous forecasting variables, including a lower expected growth of world trade.

FIGURE I.1: GROSS DOMESTIC PRODUCT (percentage growth rate)



Source: ISTAT.

[1] Update of the Macroeconomic and Public Finance Framework, December 2018.

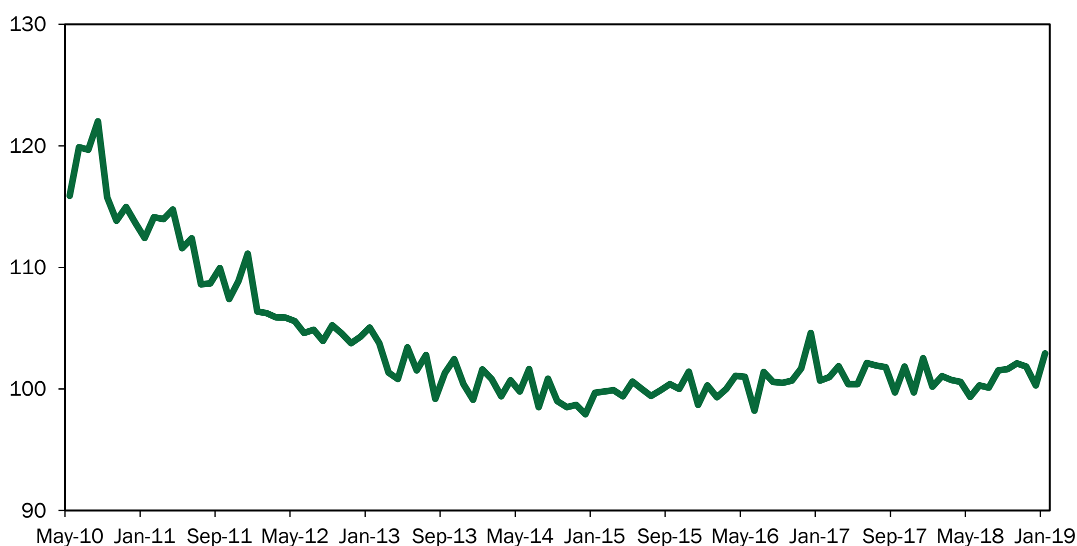
As regards nominal GDP, the estimate at unchanged legislation envisaged for 2019 stands at 1.2 percent. To the dynamics highlighted above we must also add a marginal reduction of the GDP deflator, the increase of which drops from 1.1 to 1.0 percent in the presence of weak inflationary pressures.

It should be noted that the new forecast at unchanged legislation for 2019 is based on the expectation of a gradual resumption of quarterly GDP growth that would rise to an annualised rate of 1.2 percent in the second half from just above zero in the first two quarters of the year.

The slowdown in recent quarters was mainly due to the sharp decline in the growth of world trade and a fall in industrial production in Europe, in particular in Germany. Exports of goods and services from Italy increased by only 1.9 percent in 2018 after having grown by 5.9 percent in real terms in 2017. The fall of exports occurred at the beginning of 2018 and over the year resulted in a downward revision of companies' investment programmes and to a decline in industrial production, which was however slightly more modest than that recorded in Germany.

From the second quarter, these external factors were joined by a marked rise in yields on government bonds, which was accompanied by greater caution among businesses and households. The growth of household consumption essentially halted starting from the second quarter, while gross fixed capital formation generally fell in the second half of the year, so that its growth trend went from an average of 5.7 percent in the first half to only 0.9 percent in the second half of the year.

FIGURE I.2: RELATIVE INDUSTRIAL PRODUCTION INDEX, GERMANY VS ITALY



Source: MEF calculations on ISTAT and Destatis data.

I.2 MACROECONOMIC SCENARIO AND PUBLIC FINANCE TRENDS

The forecasts on the performance of world trade issued by major international organisations have also recently suffered a continuous downward revision. The growth expectations for the main trading partners in Italy are positive, but they have a lower rate than 2018 and a lower drive from the manufacturing sector, also due to uncertainty on the trade policies of the USA and China.

As regards domestic factors, before considering the most recent economic policy initiatives taken by the Government, discussed within the policy scenario, the improvement of financial conditions should be noted. The yields on government bonds, although high in relation to the background data of the Italian economy, decreased significantly with respect to the final months of 2018. There have also been positive developments in the stock market, which has recovered most of the losses recorded in the second half of 2018.

In this context, it should also be borne in mind that the most important expansionary measures laid down by 2019 Budget Law will begin to drive economic activity in the coming months. The delivery of the benefits envisaged by the Citizenship Income (RdC for its Italian acronym) began in April. This should provide a stimulus to consumption of less well-off families, who have a higher than average propensity to consumption. Therefore, the impact on cyclical growth of household consumption is expected from the second quarter of this year. Considering the delay with which the other main macroeconomic variables respond to the increase in consumption, the incremental stimulus to GDP growth will persist for several quarters, also influencing average GDP growth in 2020. Overall, the RdC should raise real GDP growth by 0.2 percentage points both in 2019 and in 2020; the changes to the welfare system would have a neutral effect this year and would instead increase growth by 0.1 percentage points in 2020[2].

The 2019 Budget Law also provides for more resources for public investment in comparison to last year, as well as the creation of coordination and planning units for public investment. According to the most updated scenario at unchanged legislation of the general government's accounts, in 2019 public investment will increase by 5.2 percent. In the forecast, it was assumed that the stimulus from this increase would occur starting from the second quarter of the year. Overall, the increase provided for in the scenario based on unchanged legislation should provide a contribution to real GDP of more than 0.1 percentage points.

This said, it must be emphasised that the GDP growth forecast for year 2019 is subject to downside risks, linked in particular to the uncertainty surrounding international trade, the threat of protectionism, geopolitical factors and paradigm shifts in key industries such as the automotive and componentry sectors.

[2] See the focus on the macro characteristics and impacts of the two measures in Chapter II of this document.

TABLE I.1: SUMMARY OF MACROECONOMIC FRAMEWORK BASED ON UNCHANGED LEGISLATION (percentage variations, except where otherwise indicated) (1)

	2018	2019	2020	2021	2022
GDP	0.9	0.1	0.6	0.7	0.9
GDP deflator	0.8	1.0	1.9	1.7	1.5
Consumption deflator	1.1	1.0	2.3	1.8	1.5
Nominal GDP	1.7	1.2	2.6	2.5	2.4
Employment (FTEs) (2)	0.8	-0.2	0.2	0.5	0.6
Employment (labour force) (3)	0.8	-0.3	-0.1	0.5	0.6
Unemployment rate	10.6	11.0	11.2	10.9	10.6
Unemployment rate net of the activation effect (4)	10.6	10.5	9.7	9.3	9.0
Current account balance (balance in % of GDP)	2.6	2.6	2.5	2.5	2.5

(1) Discrepancies, if any, are due to rounding.
(2) Employment expressed in terms of Full-time equivalent units.
(3) Number of employees based on the sample survey of the Continuous Labour Force Survey (CLFS).
(4) Estimate of the unemployment rate net of the activation effect of the new labour force incentivised by Citizenship Income.

Looking beyond the current year, the profile of real GDP growth is also revised downwards for the 2020-2021 period, albeit considerably less accentuated than for the year in progress. The path of nominal GDP falls significantly in comparison to the previous official forecast, which also reflects a lowering of the deflator forecasts.

If the new forecasts are compared with those of the DEF 2018, the different configuration of exogenous variables accounts for most of the downward revision. Within the exogenous variables, the less favourable growth prospects of the rest of the world and of international trade are the most decisive factor for the worsening of the forecast, especially for 2019. The weighted exchange rate of the euro and the price of oil also have a negative effect, although only until 2020. From 2019 onwards the high level of the *spread* on government bonds negatively, and to an increasing extent, affects the downward revision.

The real GDP growth rate in 2022, forecast for the first time, is expected to be 0.9 percent. This forecast takes account of the fact that the main international predictors envisage a deceleration of world growth on a three-four year horizon and that it is common practice to converge the GDP forecast toward the potential GDP growth rate where there is a longer forecasting horizon[3].

As regards nominal GDP, growth would accelerate from 1.2 percent in 2019 to 2.6 percent in 2020 and then slow down slightly to 2.5 percent in 2021 and to 2.4 percent in 2022.

[3] The main international organisations estimate a potential Italian real GDP growth rate of between 0.5 (European Commission, forecast for 2020 in the Ageing Report 2018) and 0.8 percent (International Monetary Fund, Italy 2017 Article IV Consultation). Matters relating to the estimation of potential GDP according to the Community methodology are discussed in paragraph III.2 of this document.

When reading the trend forecast one must take account of the fact that the unchanged legislation, as amended by the 2019 Budget Law, provides for an increase in VAT rates in January 2020 and January 2021, as well as a slight increase of excise duties on fuels in January 2020. According to estimates obtained with the Treasury's econometric model (ITEM), the increase in indirect taxes would lead to lower GDP growth in real terms and a rise in inflation - both in terms of GDP deflator and in terms of consumer prices - with respect to a scenario of no fiscal change. These impacts would be concentrated in the years 2020 and 2021, but would also persist to a lesser extent in 2022 through the ITEM structure of delays.

The macroeconomic forecast based on unchanged legislation was validated by the Parliamentary Budgetary Office on 25 March 2019.

Regarding public finance forecast at unchanged legislation, the net borrowing forecasts for 2019-2022 have been revised in light of the new macro framework and new final data published by ISTAT[4]. In 2018, the general government balance has recorded a deficit of 2.1 percent of GDP, down from 2.4 percent in 2017. The primary balance (i.e. excluding interest payments) stood at 1.6 percent of GDP, an improvement of 1.4 percent over 2017. Although the estimate of the nominal deficit for 2018 is greater than indicated in the official December forecast (which was equal to -1.9 percent of GDP), the variation of the structural balance (i.e. adjusted for cyclical factors and temporary measures) in 2018 is equal to zero, after having recorded a decrease of 0.4 percentage points in 2017.

In 2018, the debt-to-GDP ratio rose to 132.2 percent, from 131.4 percent in 2017. This trend is due to the low growth of nominal GDP and, for a further 0.3 points, to the increase in the Treasury's liquidity stock at year-end.

As regards 2019, the net borrowing at unchanged legislation is currently forecast at 2.4 percent of GDP (2.0 percent of GDP in the Update presented in December). For 0.4 percentage points, the upward revision reflects the expected lower nominal growth and for 0.1 points, it reflects a different assessment of tax refunds and compensations, while the block on two billion of public expenditure introduced by the Budget Law reduces the net borrowing by about 0.1 points. It is recalled that regulations envisage that the expenditure in question may be authorised in the middle of the year only as a result of the check on the consistency of the evolution of public accounts with the policy scenario objective of 2 percent of GDP.

In 2019, the debt-to-GDP ratio is estimated at 132.8 percent of GDP, including privatisations proceeds equal to 1 percent of GDP. This is due to the combined effect of an unfavourable differential between average implicit cost of debt financing and nominal growth and a drop in the primary surplus to 1.2 percent of GDP, from 1.6 percent last year.

[4] ISTAT, GDP and general government net borrowing: update, April 9, 2019.

Over the 2020-2022 period, the public finance scenario based on unchanged legislation is characterised by a decline in the general government deficit to 2 percent of GDP in 2020 and to 1.8 percent in 2021 and then close to 1.9 percent in 2022. In correspondence with these nominal balances, the structural deficit is expected to widen to 0.1 percentage points in 2019, but compliance with the target in terms of structural balance would still be guaranteed considering the flexibility clause for exceptional events agreed at the end of the year with the European Commission[5]. This would therefore improve by 0.4 points in 2020 and 0.2 points in 2021, and then worsen by 0.1 points in 2022. The main reason for which the balances in both nominal and structural terms would worsen in 2022 is that the tax burden under unchanged legislation would be reduced by 0.2 percentage points, while the interest expenditure as a ratio to GDP would rise to 3.9 percent in 2022 from 3.7 percent in 2021 because of the increase in expected yields on government securities in issue[6].

The debt-to-GDP ratio in the scenario based on unchanged legislation would reduce from 132.8 percent in 2019 to 131.7 percent in 2020, and then settle at 129.6 percent in 2022. The debt rule would not be complied with either prospectively (forward-looking) or a posteriori (backward-looking), which highlights the difficulty of achieving substantial reductions in the debt-to-GDP ratio in the presence of low nominal growth, relatively high real yields and a primary surplus that would remain slightly below 2 percent of GDP even in the final year of the forecast.

This said the debt-to-GDP ratio forecasts must be contextualised in any case, since the implementation of the public finance framework outlined here would probably lead to a drop in government bond yields, which would improve both the estimates of deficits and those relating to the debt-to-GDP ratio.

I.3 PUBLIC FINANCE POLICY SCENARIO AND OFFICIAL MACROECONOMIC FORECAST

In the face of the trends described above, the policy scenario revises some capital revenue items upwards and, at the same time, the refinancing of so-called unchanged policies.

Moreover, in conjunction with the publication of the present Stability Programme, the Government has approved two decree-laws containing, respectively, measures to stimulate private investment and the territorial administrations ('Growth' Decree-Law) and measures to simplify the procedures for the approval of public works and private construction projects ('Unlock sites' Decree-Law). The new measures are illustrated in detail in the National Reform

[5] The agreement with the European Commission considers exceptional expenditure for 0.18 percentage points of GDP, relating to interventions to protect against hydrogeological risk and safeguarding of viaducts, bridges and tunnels. The flexibility clause must be applied to the structural adjustment required by the Stability and Growth Pact, which for 2019 is 0.6 percentage points of GDP according to the recommendation of the Council but is reduced to 0.25 points in the presence of the cyclical conditions outlined in this document. See paragraph III.2 below.

[6] As is common practice, interest expenditure is projected based on forecasts of primary surpluses and maturing government bonds together with yield levels on the securities in issue calculated as forward rates based on the yield curve observed in the period prior to closing the forecast.

Programme. The overall impact of the two measures on the economy is prudently estimated at 0.1 percentage points of additional real GDP growth in 2019. GDP growth in the policy scenario is therefore equal to 0.2 percent in real terms and 1.2 percent in nominal terms. In comparison to the forecast at unchanged legislation, gross fixed capital formation is the main component that explains the higher GDP growth.

The general government net borrowing objective for 2019 is confirmed to stand at 2.4 percent of GDP. The structural balance will deteriorate by 0.1 percentage points, but this does not constitute a significant deviation in light of the economy's cyclical conditions and the aforementioned clause for exceptional events.

As regards the next three years, according to the policy scenario the general government net borrowing is at 2.1 percent in 2020 and then 1.8 percent in 2021 and 1.5 percent in 2022. The structural balance is expected to improve by 0.2 percentage points of GDP in 2020 and 0.3 per year in 2021 and in 2022, down from -1.5 percent of GDP in 2019 to -0.8 percent in 2022, in line with a gradual convergence toward the structural balance.

The policy scenario reflects greater public investment in comparison to the scenario based on unchanged legislation, to an increasing extent in the course of the three-year period (projections under unchanged legislation already envisage a considerable increase in public investment in 2020). Public investment will rise from 2.1 percent of GDP in 2018 up to 2.6 percent of GDP in 2021 and 2022.

The existing legislation on tax measures is confirmed pending the definition of alternative measures in the course of the next few months, in preparation for the 2020 Budget Law. Additional increases in revenue are also expected in 2021 and in 2022, which would arise mainly from measures to strengthen the fight against tax evasion.

In addition to revenue measures, a programme for the comprehensive review of public expenditure will also be implemented, with increasing effects over time.

TABLE I.2: SUMMARY OF MACROECONOMIC FRAMEWORK BASED ON POLICY SCENARIO (percentage variations, except where otherwise indicated) (1)

	2018	2019	2020	2021	2022
GDP	0.9	0.2	0.8	0.8	0.8
GDP deflator	0.8	1.0	2.0	1.8	1.6
Consumption deflator	1.1	1.0	2.3	1.9	1.6
Nominal GDP	1.7	1.2	2.8	2.6	2.3
Employment FTEs (2)	0.8	-0.1	0.3	0.6	0.5
Employment (labour force) (3)	0.8	-0.2	0.1	0.6	0.6
Unemployment rate	10.6	11.0	11.1	10.7	10.4
Unemployment rate net of the activation effect (4)	10.6	10.5	9.6	9.0	8.8
Current account balance (balance in percent of GDP)	2.6	2.5	2.4	2.4	2.4

(1) Possible inaccuracies from rounding.
(2) Employment expressed in terms of Full-time equivalent units.
(3) Number of employees based on the sample survey of the Continuous Labour Force Survey (CLFS).
(4) Estimate of the unemployment rate net of the activation effect of the new labour force incentivised by Citizenship Income.

The streamlining of procedures for public contracts and private construction and the highest level of public investment in the policy scenario, even in the presence of financial hedging measures, ensure a positive differential of GDP growth in comparison to the scenario under unchanged legislation equal to 0.2 percentage points in 2020 and 0.1 points in 2021. GDP growth would only be lower than the forecast at unchanged legislation by 0.1 percentage points in the last year of the forecast, 2022, due to a more challenging deficit target.

As regards compliance with the national budget rules and the Stability and Growth Pact (SGP), it is worth noting the deviation recorded in 2018, the year in which, as has been shown above, the structural balance remained unchanged compared to an improvement of 0.3 percentage points that the previous Government had negotiated with the European Commission[7]. With regard to 2019, considering that the Government's forecasts estimate a growth lower than the potential growth and a negative output gap by over 1.5 percentage points (-1.7 to be precise), the improvement in the structural balance required by the SGP would be equal to 0.25 percentage points. Subtracting the clause of 0.18 points that was granted for exceptional events from this value, one obtains a required improvement of 0.07 points. With respect to this benchmark, the forecast variation in the structural balance of 2019 does not significantly deviate.

Finally, as described in detail in paragraph III.2 of this document, the policy scenario objectives outlined here are in line with the dictates of the SGP while generally aiming for more contained improvements in the structural balance in comparison to a literal interpretation of the rules.

The debt-to-GDP ratio under the policy scenario will rise from 132.2 percent in 2018 to 132.6 percent at the end of 2019. A gradual descent is instead expected for the next three years, to 131.3 percent in 2020, 130.2 percent in 2021 and finally to 128.9 percent in 2022.

The substantial compliance of the public finance policy scenario outlined here with the preventive arm of the SGP will constitute a significant factor for the evaluation of Italy's compliance with the debt rule, which the European Commission will carry out based on the final estimates for 2018.

[7] The preventive arm of the SGP would have required the structural balance to improve by 0.6 percentage points, given the cyclical conditions in which Italy found itself in 2018. However, in 2017 the European Commission decided to apply a margin of discretion in formulating its recommendation for the Council Recommendation concerning 2018. This resulted in the indication of an improvement of 0.3 percent for 2018.

TABLE I.3: PUBLIC FINANCE INDICATORS (as percentage of GDP) (1)

	2017	2018	2019	2020	2021	2022
POLICY SCENARIO						
Net borrowing	-2.4	-2.1	-2.4	-2.1	-1.8	-1.5
Primary balance	1.4	1.6	1.2	1.5	1.9	2.3
Interest	3.8	3.7	3.6	3.6	3.7	3.8
Structural net borrowing (2)	-1.4	-1.4	-1.5	-1.4	-1.1	-0.8
Variation in the structural balance	-0.4	0.0	-0.1	0.2	0.3	0.3
Public debt (gross of support) (3)	131.4	132.2	132.6	131.3	130.2	128.9
Public debt (net of support) (3)	128.0	128.8	129.4	128.1	127.2	125.9
Proceeds from privatisation	0.0	0.0	1.0	0.3	0.0	0.0
SCENARIO BASED ON UNCHANGED LEGISLATION						
Net borrowing	-2.4	-2.1	-2.4	-2.0	-1.8	-1.9
Primary balance	1.4	1.6	1.2	1.6	1.9	2.0
Interest	3.8	3.7	3.6	3.6	3.7	3.9
Structural net borrowing (2)	-1.4	-1.5	-1.6	-1.2	-1.0	-1.2
Variation in the structural balance	-0.4	0.0	-0.1	0.4	0.2	-0.2
Public debt (gross of support) (3)	131.4	132.2	132.8	131.7	130.6	129.6
Public debt (net of support) (3)	128.0	128.8	129.5	128.5	127.6	126.6
MEMO: Update of the Public Finance Framework (December 2018)						
Net borrowing based on unchanged legislation		-1.9	-2.0	-1.8	-1.5	
Structural net borrowing (2)		-1.1	-1.3	-1.2	-1.0	
Public debt (4)		131.7	130.7	129.2	128.2	
MEMO: Update of DEF 2018 (September 2018)						
Net borrowing	-2.4	-1.8	-2.4	-2.1	-1.8	
Primary balance	1.4	1.8	1.3	1.7	2.1	
Interest	3.8	3.6	3.7	3.8	3.9	
Structural net borrowing (2)	-1.1	-0.9	-1.7	-1.7	-1.7	
Variation in the structural balance	-0.2	0.2	-0.8	0.0	0.0	
Public debt (5)	131.2	130.9	130.0	128.1	126.7	
Nominal GDP based on unchanged legislation (absolute val. x 1,000)	*1727.4*	*1757.0*	*1777.9*	*1823.3*	*1868.9*	*1914.5*
Nominal GDP based on policy scenario (absolute val. x 1,000)	*1727.4*	*1757.0*	*1778.6*	*1828.4*	*1875.5*	*1918.9*

(1) Discrepancies, if any, are due to rounding.

(2) Net of one-offs and the cyclical component.

(3) Gross or net of Italy's relevant shares of the loans to Member States of the EMU, bilateral or through the EFSF, and of the contribution to the capital of the ESM. At the end of 2018, the amount of these shares was equal to approximately 58.2 billion, of which 43.9 billion for bilateral loans and through the EFSF and 14.3 billion for the ESM programme (see Bank of Italy, 'Statistical Bulletin - The Public Finances, borrowing requirement and debt' of March 15, 2019). The estimates consider proceeds from privatisation and other financial income equal to 1 percent of GDP in 2019, 0.3 percent of GDP in 2020 and 0 in subsequent years. Moreover, a reduction of the MEF's liquidities of 0.1 percent of GDP for each year from 2019 to 2021 is assumed. The interest rates scenario used for the estimates are based on the implicit forecasts resulting from the forward rates on Italian government bonds of the period for the compilation of the present document.

(4) Gross of Italy's relevant shares of the loans to Member States of the EMU, bilateral or through the EFSF, and of the contribution to the capital of the ESM. The estimates consider proceeds from privatisation and further savings intended to fund depreciation equal to 1.0 percent of GDP in 2019 and to 0.3 percent of GDP in 2020.

(5) Gross of Italy's relevant shares of the loans to Member States of the EMU, bilateral or through the EFSF, and of the contribution to the capital of the ESM. The estimates consider proceeds from privatisation and further savings intended to fund depreciation equal to 0.3 percent of GDP in 2019 and in 2020.

To complete the budgetary measures, the Government confirms the draft laws indicated in the previous planning document, and indicates the following draft laws connected to the public finance measures for 2020:

- Draft law to delegate to the Government for the adoption of provisions for fighting violence at sporting events (Chamber Act 1603-TER);
- Draft law containing delegations to the Government for the improvement of Public Administrations (Senate Act 1122).

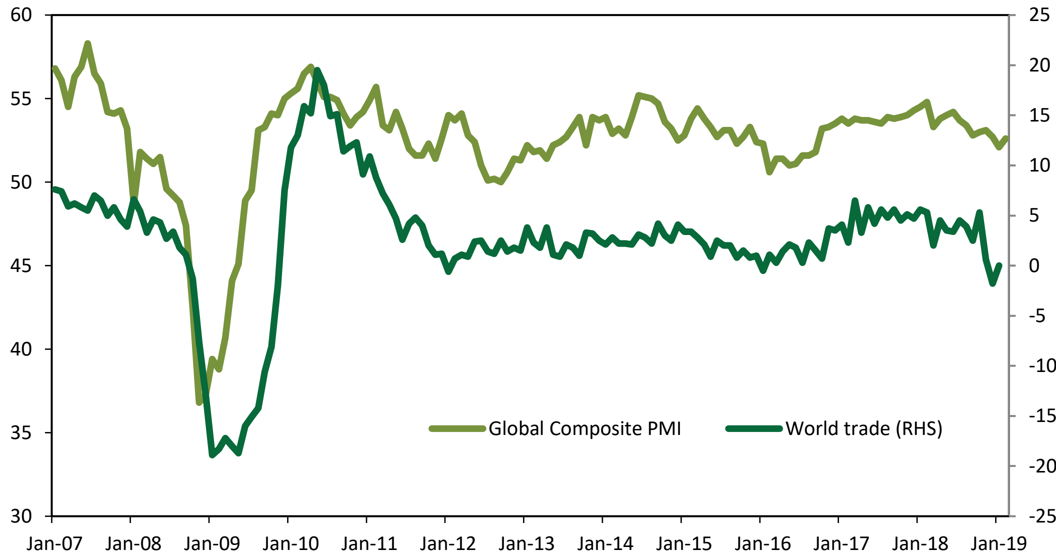
II. MACROECONOMIC FRAMEWORK

II.1 THE INTERNATIONAL ECONOMY

In 2018, the trend of the world economy was characterized by a slowdown in growth mainly due to a lower dynamism in international trade, which had instead been a powerful driver in the previous year.

The slowdown was triggered mainly by the intensification of trade tensions between the United States and China, which, together with the emergence of geopolitical tensions in other important countries and the increased socio-economic instability within some emerging countries, strongly influenced business and financial markets confidence, leading to the adoption of wait-and-see strategies for investment programmes amidst growing uncertainty. In the second semester of last year, the effects of these developments began to spread to domestic demand in the more developed countries through a significant fall in investment and lower consumer spending. As a result, manufacturing stalled, especially the production of investment goods, with economies still highly specialized in the industrial sector, such as in the case of Germany, proving to be particularly vulnerable.

FIGURE II.1: GLOBAL COMPOSITE PMI AND WORLD TRADE (index; % var. y/y RHS)



Source: CPB and Markit.

The outlook for manufacturing remains weak for the current year as well; the global composite PMI index, excluding the euro zone, has continued to record a contraction of production in manufacturing, especially in those countries whose economic cycle now appears to be mature. The services sector seems more resilient, although it has moderated compared to last year and in recent months has been just above the expansion threshold.

According to the latest official estimates of the International Monetary Fund, in 2018 world growth stopped at 3.6 percent, down from the 3.8 percent in the previous year, bearing negative effects on the current year due to the increased slowdown in the second semester of 2018. As a consequence, the updated 2019 projections, the result of a series of downward revisions, predict a slower expansion, of 3.3 percent, mainly tied to the weakened cycle of advanced countries (1.8 percent, down from 2.2 percent in 2018).

In the last two years, the US economy has benefited from the effects of a major tax stimulus that started, however, at an advanced stage of the expansionary cycle. At any rate, the first signs of weakening appeared at the end of last year, pointing to the risk of an economic cool down in 2019 for the United States, which is burdened with a heavy public debt. In 2018, the US economy continued to expand at a sustained pace of 2.9 percent, very close to the 3 percent government target, thanks to robust investment and increased consumption, which benefited from an excellent labour market and a stable unemployment rate, around 4 percent, at its historical minimum. The pressure from inflation remained substantially low as well, thanks to moderate energy prices, leading consumer inflation to around 1.7 percent at year's end. However, the pace of growth slowed down in the second half of 2018, giving less momentum to current year prospects; in Q4 2018, the GDP grew by 2.2 percent on an annual basis, slightly below expectations and decelerating in comparison to the previous quarters (3.4 percent in 3Q and 4.2 percent in 2Q).
Accordingly, the IMF predicts that this year's growth of 2.3 percent will slow down even further to 1.9 percent in 2020. These expectations are justified mainly by the weakening of fiscal policy stimulus over the past two years; the US Congressional Budget Office (CBO) predicts a 0.8 pp growth rate slowdown of the US economy this year and another slowdown, by 0.6 pp, in the following year; the weakening factors being identified in reduced private investment in conjunction with the greatly reduced federal spending foreseen by the legislation in force in the last quarter of last year. The CBO also estimates that, from last year, the US economy has been growing above its potential, causing salaries, prices and interest rates to rise.

On the other hand, the US economy's growth potential could benefit from the repatriation of retained earnings of American multinationals stimulated by the tax reform; compared to the previous year, in 2018 there was a fall in profits reinvested by American multinationals of over 360 billion dollars, which was the main cause for the broad contraction of FDI flows to advanced economies in the same period (-40 percent)[1]. Actual gain in terms of growth potential expansion

[1] UNCTAD 'Investment Trade Monitor', January 2019.

will depend in any case on how these multinationals will decide to employ the repatriated earnings on national territory.

The concerns triggered on the financial markets by bullish expectations for interest rates related to the sustainability of the high federal public debt were calmed by the FED’s decision to reconsider the normalization of monetary policy; departing from the two policy-rate increases initially planned for the current year, the consensus within the FOMC (Federal Open Market Committee, which decides monetary policy) has shifted towards maintaining the current federal funds rate at 2.25-2.5 percent. The FOMC also announced that its balance sheet would be normalized by next September, reaching over 3.500 billion dollars.

Still in terms of advanced economies, Europe is also showing even greater signs of an economic slowdown: GDP growth stalled at 1.8 percent in 2018, against 2.3 percent in 2017. Starting from early last year, there has been a progressive deterioration in the performance of the main euro zone economies, initially triggered by the absence of impetus towards foreign trade and spreading to domestic demand over the months, especially as regards private investment. Since the downturn concerned mainly the manufacturing industry, while the service sector showed greater resilience, countries such as Germany and Italy, whose economies are industry driven, were the most affected. Business confidence and investment choices were also greatly influenced by the uncertainty caused by the United Kingdom's exit from the EU, the developments of which are still being defined.

As for the monetary policy, the European Central Bank (ECB) budget expansion phase, trough the Quantitative Easing (QE) programme, concluded with the end of 2018, though the ECB confirmed its commitment to reinvest the capital repaid on the securities maturing for an extended period of time, i.e. even after the first policy rate increase. The ECB responded to signs of a cyclical weakening and an inflation rate that persists under the two percent target, especially in the ‘underlying’ component (i.e. excluding fresh food and energy), by changing its forward guidance (indications to markets about the timing of a possible rate hike) and announcing new long-term refinancing operations. According to the Governing Council’s latest statements, there will be no increase in policy rates before the end of this year and for as long as a substantial degree of monetary accommodation is deemed necessary. Furthermore, starting September 2019 and every three months until March 2021, support for growth will also be guaranteed through new longer-term targeted refinancing operations (TLTRO III) with two-year maturity, aimed at preserving favourable bank credit conditions.

The latest business confidence surveys show that the euro zone will continue to experience modest growth in the short term. PMI surveys indeed report a contraction of the manufacturing sector in the main EU countries in the first three months of 2019, which seems set to continue into the next quarter and is no longer duly offset by the solidity of the tertiary sector. The most worrying aspect is the impact that fewer orders are beginning to have on the investment plans and employment decisions made by companies.

On the other hand, considering that in recent months performance has been affected by specific and potentially temporary factors, such as the shock to the automotive industry caused by the revised anti-pollution regulations and social unrest in France, and provided that no new external factors come up, European

economies could prove more resilient in the upcoming months. An example of this is Germany, whose automotive market took quite a hit recently, but has a fundamentally healthy economy: after several months of negative figures, the IFO business survey, despite confirming the weakness of the manufacturing industry, also detected room for improvement and recovery in the months to come, with renewed improvements in business expectations. All in all, modest growth is expected for the current year as well, along with the gradual stabilization of the cycle in the subsequent years. The IMF estimates moderate euro zone growth (1.3 percent) in the year underway and a slight recovery in 2020 (1.5 percent).

The slowdown of the main Asian economies continues to exert pressure on global growth in 2019. Observers have been expecting China’s gradual economic cool down for quite some time now. China’s GDP has indeed shown a gradual deceleration in 2018, more so in the second semester, leading to a 6.6 percent annual growth down from 6.8 percent in 2017 (the National Institute of Statistics revised this result down from the initial 6.9 percent). This is the lowest annual average growth rate since 1990, albeit slightly higher than the target set by the Government at the beginning of the year (6.5 percent). The worsening trade relations with the United States, involving gradually higher duties on imported goods, although not as high as initially announced, is undoubtedly partially responsible for these results.

In addition, domestic demand and especially investment were affected by a restrictive debt-reduction tax policy, more rigorous checks over the approval process of local public investment projects, and a squeeze on the shadow banking system, which is a group of unofficial financial intermediaries highly exposed to credit risks. All these measures depressed internal demand, leading the Central Bank to intervene in early 2019 to rebalance the market and provide credit to the private sector through two channels: the strong injection of liquidity into the banking system for the record amount of 560 billion yuan (83 billion dollars); and cutting banks’ compulsory reserve ratios by 100 basis points for the fifth straight time in the past twelve months, which should have freed up over one hundred billion dollars for new loans.

China’s fiscal policy will also guarantee support to the economy; Premier Li Keqiang announced at the opening of the National People's Congress that tax cuts and support for employment (under pressure due to the transformation of production processes) will be two of the main pillars of the economic policy strategies for the near future. The goal is to reduce the tax burden on businesses in addition to cutting value added tax. Local authorities will also contribute by issuing new debt for infrastructure financing. Overall, the main international forecasters remain positive, with gradual moderation of growth towards sustainable levels in the medium to long term, achievable in part thanks to China’s gradual wage alignment.

As for Japan, whose economy had regained momentum in 2017, closing with an acceleration of 0.8 pp as compared to the previous year, it too recorded a slowdown in GDP growth, which is estimated to have stalled at 0.8 percent in 2018, under the burden of major natural disasters that affected economic activity in the second part of the year. Japan’s economy is also amongst those most affected by international trade tensions; since the autumn of last year, the dip in

foreign demand by China has been damaging markedly the dynamics of Japanese exports with significant repercussions on industrial activity.

According to the most recent surveys on the confidence climate of Japanese businesses, operators are increasingly concerned about the reduction in orders from China, which is leading to an overall slowdown in investment, much of which has been either postponed or downsized, especially in the fields of robotics and industrial machinery. Looking ahead, fears are rising that the slowdown may also affect the coming months, when fiscal policies could also have a negative impact on the economic cycle, given the planned increase in consumption taxes that could lead to a reduction in domestic demand too.

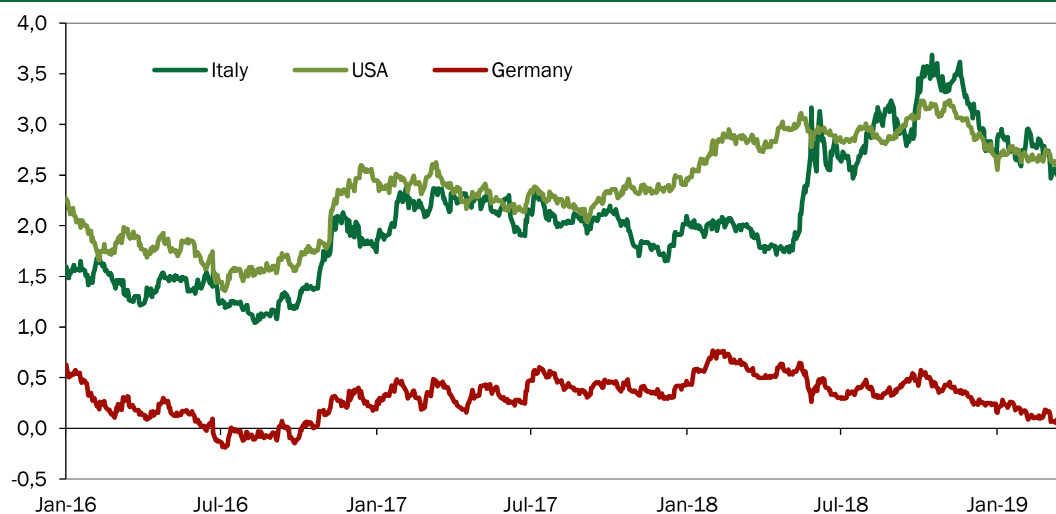
Based on the above, both the Government and the Central Bank have revised downwards their growth expectations for the current year, though without contemplating the risk of recession. On the monetary policy front, this has meant confirmation of a policy that is still accommodative, with unchanged rates and the commitment to additional measures according to the demands of economic trends. On the fiscal policy front, the Government's draft budget for the current year includes the undertaking of expansionary policies, postponing the primary surplus target to 2025; for the years 2019-2020, in fact, the deficit and macroeconomic impact of the consumption tax increase scheduled for October will be substantially neutralized by the decision to use half of the increased revenue for new spending programmes. The overall expectations for the current year are therefore favourable, as domestic demand should contribute to a new growth rate acceleration of around 1 percent, thanks to new tax breaks and wage increases that were already implemented in the second half of 2018 due to the reduced production capacity.

Therefore, at the global level, fiscal policy strategies will differ depending on the specific economic conditions of individual countries, but no restrictive measures of such magnitude as to jeopardize economic expansion are expected. In the United States too, where last year's tax reform more than exhausted the available fiscal space, a budget policy is predicted[2] that may prove moderately restrictive only in the last part of the year due to a reduction in federal funding under current legislation. The current Government will focus on preserving the margins for fiscal manoeuvres that are still available for the beginning of next year, in order to use them to fuel the upcoming 2020 presidential campaign.

On the other hand, the monetary policy should also prove to be accommodative overall, considering the restructuring of the FED strategy and the confirmation of the current stance by all the other main central banks. This also eases the pressure on emerging countries, whose economies were strongly affected by the appreciation of the dollar in 2018 triggered by the increases in policy rates established by the FED. The accommodating attitude of the central banks also seems to have had a strong stabilizing effect on the markets, the volatility of which remains essentially limited, despite the negative signals of macroeconomic indicators.

[2] CBO, 'The Budget and Economic Outlook: 2019 to 2029', January 2019.

FIGURE II.2: PERFORMANCE OF 10 YEAR GOVERNMENT SECUTIRITES

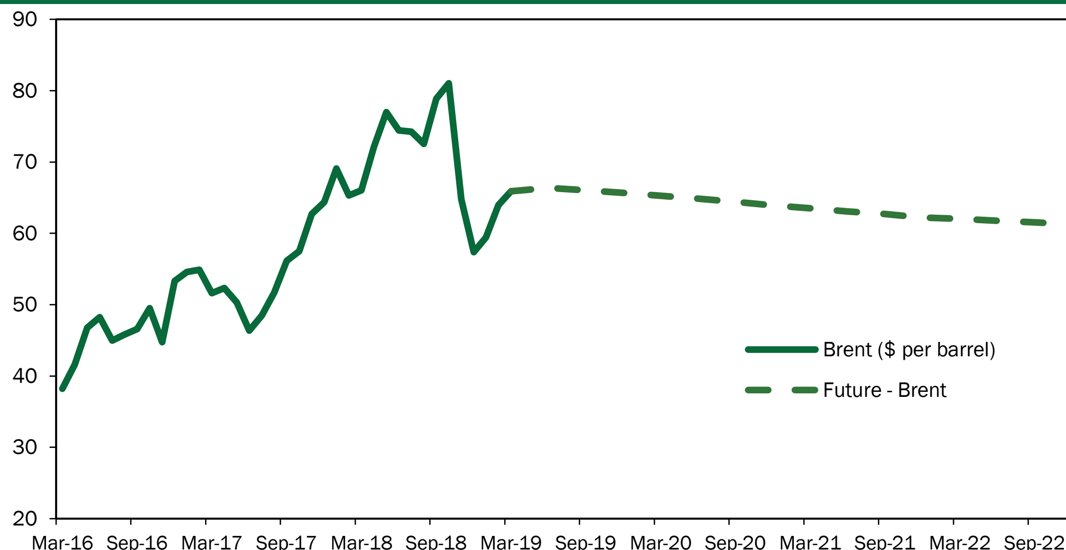


Source: Bloomberg.

An accommodative monetary policy is also allowed by low inflation rates in almost all the advanced economies at the beginning of the year, due to a significant cost reduction of energy goods that occurred late in the previous year, and as a reflection of the overall economic slowdown. In almost all countries, in fact, consumer inflation stands at levels far removed from the targets of the main central banks. The only exceptions are the United States and the United Kingdom, where consumer price growth is averaging above 2 percent. On the other hand, wage growth remains modest in all the advanced economies, despite the fact that in many of these economies, first and foremost the United States, the labour market has achieved positive results at all-time highs. The same goes for emerging countries, where, because of the global economic slowdown, inflation fell sharply to its lowest levels in the past ten years after peaking no later than last October. This triggered expectations that central banks would lower policy rates, primarily in countries like Russia and Mexico, after the increases introduced in the autumn of last year in conjunction with the peak in inflation and some localized depreciation.

As for the energy products and commodities market, in 2018, after an initial rise in fuel prices, there was a marked deceleration, more so late in the year, due to multiple factors. On the one hand, pressure came from supply factors such as the temporary shield granted by the United States to eight major importers of crude oil in connection to the sanctions imposed on Iran and the record US production of shale oil; on the other, there was the effect on global demand of the economic slowdown. However, since early this year, there has been a renewed upward trend, mainly due to the supply restrictions brought about by the Venezuelan crisis and the continuing tensions with Iran, whose temporary shield from sanctions will expire on 4 May.

FIGURE II.3: BRENT AND FUTURES PRICE



Source: Thomson Reuters Datastream.

The tensions that had affected the financial markets in 2018, especially until the autumn of last year, abated significantly after the recent monetary policy announcements by the central banks of the main advanced countries, which, as mentioned, took a much more gradual path of monetary normalization. This provided breathing space for emerging countries as well, whose yields on sovereign debt securities and related spreads with advanced countries are gradually retreating after the peaks recorded in late 2018. Following the dip, the rate curves flattened out; in particular, the US curve now shows a slightly negative trend, which is normally indicative of recession. In consideration of the substantial stability of financial volatility indicators, it would seem that at present the markets are more focused on an accommodative monetary policy stance rather than on the risk of a much more marked slowdown or recession.

Forecast risks

In recent months, there has been a progressive deterioration in the expectations of international observers, with an increasingly downward trend in risk scenarios. On the other hand, the most recent signals from the economic seem to paint a less grim picture than that predicted late last year. All in all, there is a situation of uncertainty such as to render future risk scenarios more balanced.

The uncertainty over the evolution of international trade continues to bear on business decisions of investment and production. Whereas 2019 began with signs of relaxation between the United States and China, there are fears of worsening trade relations between America and Europe in the near future.

The expectations of weaker global demand are also influenced by concerns of a faster than expected slowdown of the main world economies, namely the United States, China and Europe. However, China's latest macroeconomic data show resilient domestic demand and a reorganization of trade flows in exports in Asian,

which could lead to greater stabilization. Chinese GDP dynamics should also benefit from clearly favourable monetary and fiscal policies.

As for the slowdown in the euro zone, there are prospects of a moderation in growth but the risks of an actual recession appear to be relatively limited; in the event of recovery in international trade thanks to progress in international negotiations, the recovery in foreign demand could generate renewed support for European economies that have been most penalized so far. On the other hand, the monetary policy instruments still effectively available to the ECB are at present much more limited than those available at the time of the sovereign debt crisis.

In terms of financial markets, the ups and downs recorded at the end of 2018 calmed down after the announcements of the ECB and especially of the FED. However, if the current economic slowdown should prove to be worse than currently expected or unforeseen events were to lead to a sudden change in expectations, this could trigger sharp and dangerous corrections on financial markets.

II.2 THE ITALIAN ECONOMY

In 2018, the Italian economy grew by 0.9 percent, slowing down compared to the previous year. After modest growth in the first quarter of 2018 (0.2 percent Q/Q), the GDP slowed further in the second quarter (0.1 percent Q/Q) and experienced slightly negative growth in the second half of the year (-0.1 percent Q/Q in the third and fourth quarters). Domestic demand net of inventories continued to expand, albeit at lower rates than in 2017, while inventories made a zero contribution. On the other hand, net exports subtracted 0.1 percentage points from growth due to global trade tensions.

In further detail, growth in private consumption more than halved (0.6 percent down from 1.5 percent), despite the dynamic trend of real disposable income driven by renewed contracts in the public sector and favourable credit eligibility conditions. Indeed, the propensity to save increased over the year, reaching a peak in 2Q18 (8.5 percent up from 7.8 in 1Q18) and then gradually fell to 7.6 percent in 4Q18. On average, the propensity to save stood at 8.0 percent, lower than the average of the last 10 years (9.0 percent). The slowdown in consumption may have been influenced by a reduction in wealth, with a contraction of around 130 billion in 4Q18 compared to 3Q18; empirical evidence shows that changes in financial wealth have an impact on household consumption[3].

The wealth position of households remains solid; household debt in the third quarter of 2018 was stable at 61.3 percent of disposable income, well below the euro zone average (94.8 percent)[4]. Debt sustainability was also favoured by continuing low interest rates.

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[3] In particular, low propensity for consumption is more affected by a decline or increase in financial wealth than changes in real wealth. See, for example, A. Bassanetti & F. Zollino (2010) The Effects of Housing and Financial Wealth on Personal Consumption: Aggregate Evidence for Italian Households. In: de Bandt O., Knetsch T., Peñalosa J., Zollino F. (eds) Housing Markets in Europe. Springer, Berlin, Heidelberg.

[4] Bank of Italy, Economic Bulletin, January 2019.

As for the type of spending, the growth in consumption of goods equalled that of services (0.7 percent). Spending on durable goods slowed down while on semi-durable goods it grew more than the previous year. Non-durable goods were also down compared to the previous year due to the higher pressure of inflation.

Investment continued to expand (3.4 percent), thanks to the average performance recorded in the first part of the year. In contrast to the previous years, the contribution of the transport vehicles component was greatly reduced following the contraction of the car market, which had driven the recovery of previous years. The Italian car and components industry, which engages 250.000 workers (directly and indirectly) and almost 6000 companies[5], recorded a drop in production in 2018 compared to the previous year (-3.4 percent), as well as in turnover and number of orders (-2.1 and -2.4 percent respectively).

Investment in machinery slowed down compared to 2017. As to the construction industry, there was an acceleration compared to 2017; investment in construction was driven by housing, while the increase in infrastructure investment was modest. Investment in housing was in turn driven by the home renovation business, which now accounts for 37 percent of construction investment[6].

As for the real estate market, housing prices were back down. The most recent surveys[7] confirm that quotations have continued to fall in the fourth quarter of 2018 (-0.2 percent) and are 0.6 percent lower than the corresponding period of 2017. Overall, the prices of existing houses fell by 1.0 percent in 2018, while those of new homes increased by 1.0 percent[8]. Real estate sales, probably positively affected by the price reduction, showed a simultaneous recovery during 2018.

The construction industry, especially of real estate, continues to be an important driver of economic recovery, in part due to its positive influence on consumption and employment. Furthermore, the trend in real estate prices has a direct effect on household wealth. Data on non-financial assets show that houses constitute almost the totality of real household wealth[9]; a recovery in prices could have a favourable effect on consumption.

Foreign demand, on the other hand, was weakened by the slowdown in world trade due to tensions caused by stricter import duties. After a sharp decline in 1Q18, probably linked to the uncertainty deriving from the announcement of duties, exports returned above zero but did not reach the peaks of the previous year. Imports also slowed down, following the weakening of domestic demand and of the industrial production cycle in particular.

On the supply side, the manufacturing industry continued to grow but at decidedly lower rates (2.1 percent down from 3.6 percent in 2017). In 2018, the

[5] Source: ANFIA.
[6] ANCE Report http://www.ance.it/docs/docDownload.aspx?id=48610
[7] See: ISTAT, 'Home prices', April 2018 and Bank of Italy, 'Economic Bulletin', April 2018.
[8] ISTAT, https://www.istat.it/it/archivio/228988
[9] In 2017, real estate assets owned by households accounted for over 92 percent of the total real estate value, of which 81 percent used as homes or second homes. The decline in house prices has led to a reduction in the value of housing wealth (-1.4 percent annual average over the period 2011-2017). However, this trend is slowing down: -0.8 percent in 2017 down from -1.3 percent in 2016. ISTAT, 'Non-financial assets of institutional sectors', March 2019.

industrial production index (adjusted for calendar effects) show a marked slowdown from 3.6 percent, registered in 2017, to 0.8 percent. The different sectors show heterogeneous trends; even though they decelerated, non-durable capital goods and consumer goods still recorded positive performances, while the production of durable intermediate and consumer goods decreased. The automotive and car components sector recorded a sharp drop in production compared to the previous year. The construction sector is gradually improving, however growth is still weak (1.7 percent). The agriculture value added growth is back in positive territory (however, this sector has limited effect on the GDP).

The services industry proved to be more resilient than manufacturing over the year, but it too slowed down; growth in value added more than halved in 2018 compared to the previous year (0.6 percent compared to 1.4 percent). However, the various sectors showed uneven trends. In the sectors of trade, accommodation and restaurants, transport and storage and real estate, growth remained positive (1.9 and 1.6 percent, respectively), while the value added of finance, insurance, information and communication services fell back below zero (-1.3 and -2.7 percent, respectively); professional activities were only just above zero (0.4 percent).

As to non-financial companies, the fall in profit share (defined by the ratio between gross operating profit and value added) continued, albeit gradually, in 2018, reaching a value of 41.6 (down from 42.7 in 2017 and 43.3 in 2016). The latest data published by the Bank of Italy for the third quarter of 2018 indicate that corporate debt as a percentage of GDP has fallen further, standing at 70.9 percent (down from 71.1 percent at the end of June 2018)[10].

The positive trend of the labour market continued in the first half of 2018 and then partially reversed in the second half of the year. Overall, employment growth, as recorded by the national accounts, stood at 0.9 percent, driven by employee numbers, whereas the numbers of self-employed workers continued to fall for the eighth consecutive year. Hours worked increased by 1.1 percent, with hours worked per-capita increasing by 0.2 percent, after the drop of the previous year.

Based on the results of the workforce survey, employment grew by 0.8 percent. The employment rate reached 58.5 percent, only 0.1 point off the peak of 2008. The increase was driven by dependent employment (1.2 percent), in turn driven exclusively by temporary employment, while permanent employment was down for the first time in four years (-0.7 percent). In terms of hours of work, full-time employment increased and there was a slight reduction in part-time. Involuntary part-time employment continued to increase, however (5.0 percent), up to 64.1 percent of total part-time employment. Improvements in the labour market were reflected in the fall in unemployment (to 10.6 down from 11.2 percent). Another positive factor was the decline in the unemployed not seeking employment (-0.9 percent) and those who no longer seek employment (-11.5 percent).

After the moderation of recent years, per capita incomes returned to growth (2.0 percent up from 0.3 percent in 2017) due to renewed contracts in many

[10] Bank of Italy, Economic Bulletin, January 2019.

sectors, including the public sector, and the gradual depletion of the tax relief schemes introduced in 2015. Unit labour cost showed a significant recovery (1.9 percent up from -0.5 percent in 2017) thanks to the substantial stability of labour productivity.

Inflation remained substantially unchanged compared to the previous year (1.2 percent compared to 1.3 percent), still driven by the volatile components; the underlying component was in fact more limited and slowed slightly compared to the previous year (0.7 percent down from 0.8 percent). Domestic inflation, however, measured by the GDP deflator, accelerated slightly (0.8 percent up from 0.4 percent) due to renewed PA contracts and payments of arrears.

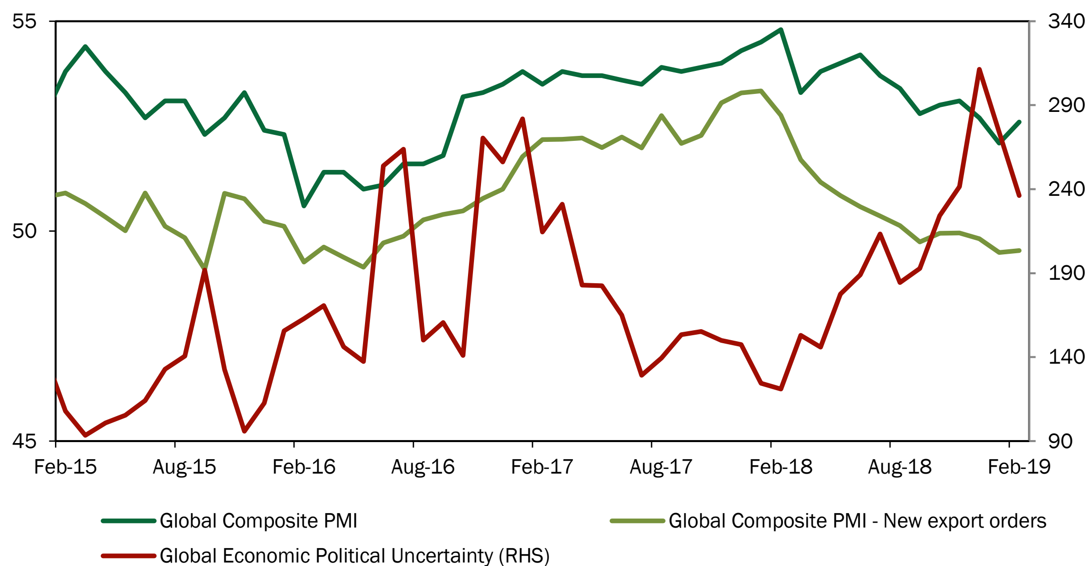
Foreign trade

During 2018, the profound change in the international economic situation was largely related to the further tightening of trade policies, a phenomenon that has been underway since 2012. The crisis of confidence triggered by the new tariffs introduced by the United States, especially towards China, generated negative repercussions on global economic performance; trade and industrial production both grew just over 3 percent, decelerating by 1.4 and 0.3 percentage points respectively compared to 2017[11]. The uncertainty of the global scenario led to a wait-and-see attitude by business, as shown by the global PMI and by the foreign orders component in particular, resulting in lower investments. According to the latest UNCTAD estimates, Foreign Direct Investment (FDI) decreased even in 2018, especially towards Europe,[12] largely due to the tax reform introduced in the United States to encourage the repatriation of overseas profits made by multinationals.

[11] Source: CPB Netherlands Bureau for Economic Policy Analysis, 'World Trade Monitor', 25 March 2018.

[12] FDI is estimated to have fallen by 19 percent worldwide in 2018, with a greater reduction in Europe (-73 percent) than in North America (-13 percent); on the other hand, investment in developing economies appears to have increased slightly (3 percent). (Source: UNCTAD, 'Investment Trends Monitor', January 2019).

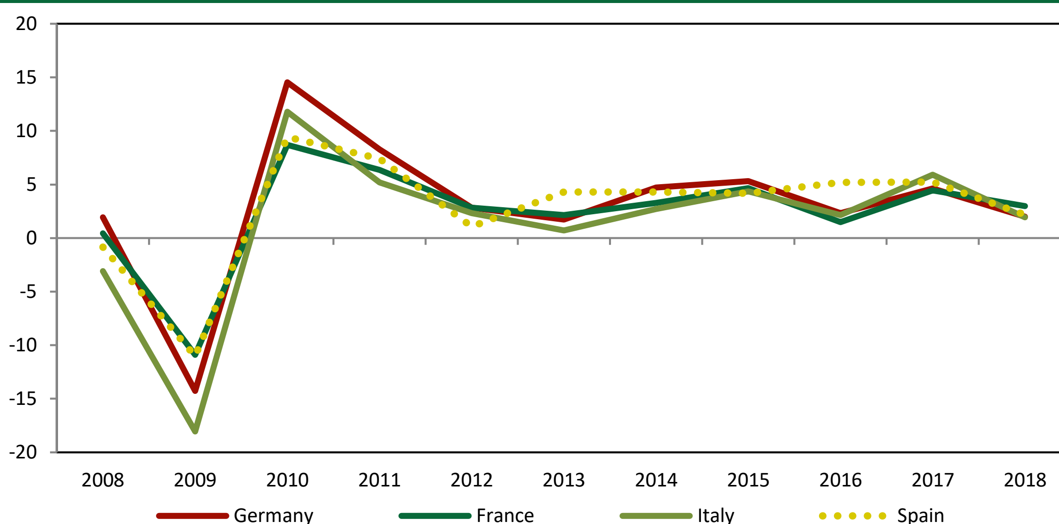
FIGURE II.4: PMI AND GLOBAL ECONOMIC POLICY UNCERTAINTY INDEX



Source: Markit, S.R. Baker, N. Bloom & S. J. Davis www.PolicyUncertainty.com

Italy's national accounting statistics show that, after having recorded the best performance in the last ten years in 2017 (with a growth rate close to 6 percent), exports increased by less than 2 percent in 2018, showing a more pronounced moderation than the other partners. Among other major EU countries, French exports showed a greater resilience (3.0 percent growth rate), even though they slowed down by 1.5 pp. Germany and Spain, however, experienced greater deceleration; their foreign sales increased by around 2 percent, slowing by 2.6 pp and just over 3 pp, respectively.

FIGURE II.5: EXPORTS OF GOODS AND SERVICES FROM ITALY AND OTHER MAJOR EU COUNTRIES (national accounting data, percentage changes, value data)

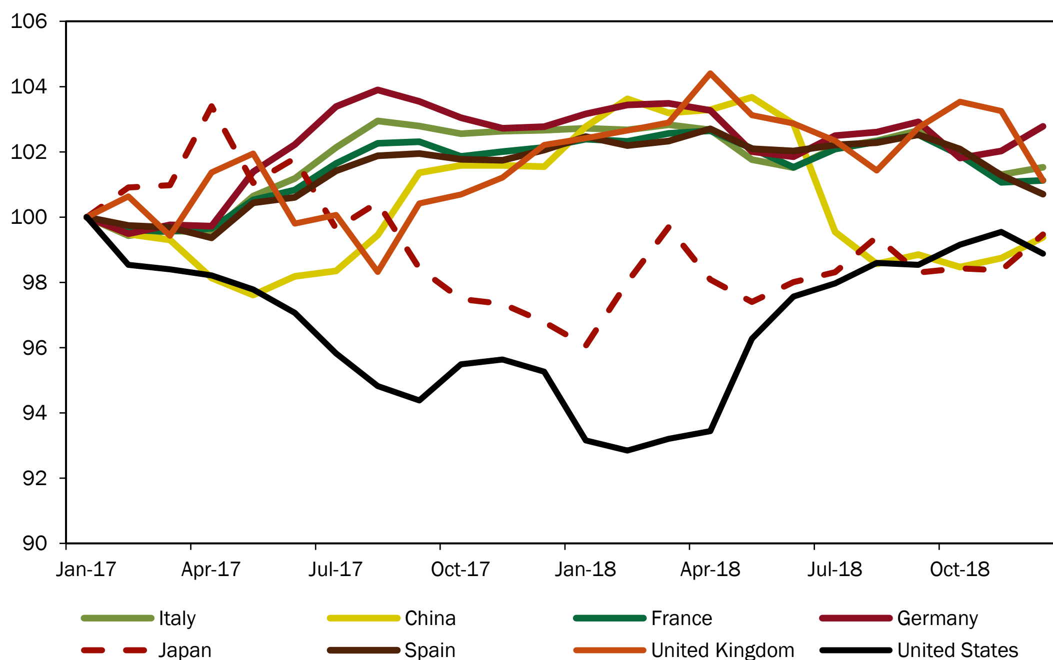


Source: Eurostat.

If we consider the data on foreign trade of goods, the sales growth rates of Germany, Italy and Spain were equal to or just above 3 percent in 2018, halving in the first case and decelerating by about 5 percentage points for the other two countries. Results in France, however, were more stable, with a 4 percent increase, down by just over half a percentage point. Like for the other EU partners, Italy's change in export values was largely supported by the EU zone (4.1 percent down from 7.2 percent in 2017) than by non-EU countries (1.7 down from 8.2 percent), the latter possibly affected by lower price competitiveness.

As for total Italian exports to foreign markets, the United States confirmed to be the most dynamic destination (5 percent), followed by Switzerland (8.7 percent). When it came to the EU zone, despite the slowdown, exports to major partners continued to hold strong, with a 3.6 percent increase to Germany and 4.5 percent to France. Sales to Spain grew by more than 3 percent but slowed by over 7 percentage points; the same goes for the UK (down to 1.1 from 2.3 percent in the previous year), reflecting the uncertainties surrounding Brexit. On the other hand, the contraction in exports to the main emerging economies (Turkey, Russia and China) was quite significant, while, among the energy producing countries, the reduction in sales to the OPEC area has more than doubled (-7.6 percent); Southern Common Market sales were also down, but to a lesser extent (by around 2 percent).

FIGURE II.6: PRICE COMPETITIVENESS INDEXES (January 2017 indexes = 100, based on producer prices in manufacturing)



Source: Analysis based on Bank of Italy data.

FIGURE II.7: EXPORTS OF ITALIAN GOODS TO MAJOR EU COUNTRIES (January 2017 indexes = 100, seasonally adjusted data)

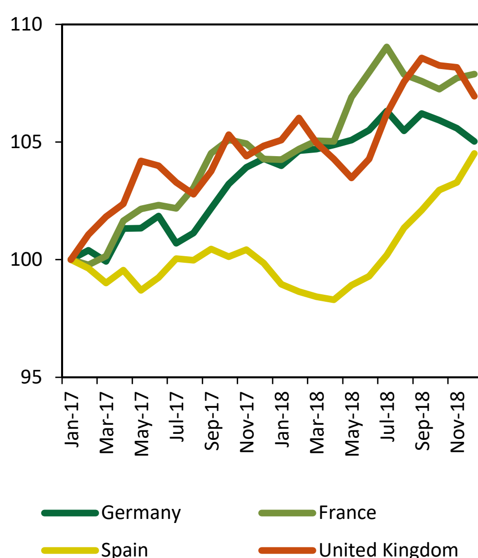
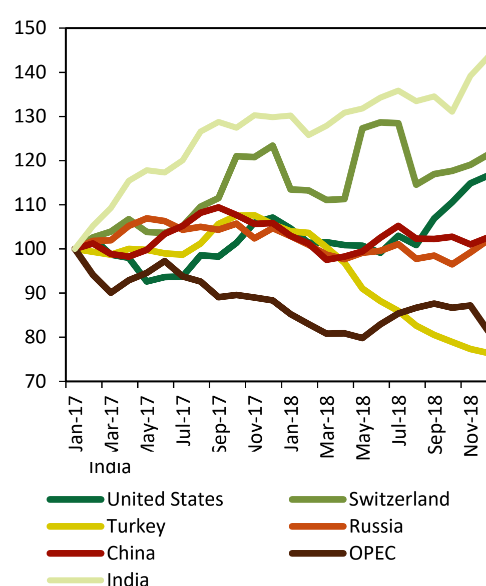


FIGURE II.8: EXPORTS OF ITALIAN GOODS TO MAJOR NON-EU COUNTRIES (January 2017 indexes = 100, seasonally adjusted data)



Source: Analysis based on ISTAT Coeweb data

Looking at sector performances, exports grew for all compared to 2017, although the pharmaceutical and transport sectors showed a more evident slowdown. Pharmaceutical sales increased by 4.7 percent (decelerating by over 10 percentage points), with a more robust increase in the non-EU area (by over 7 percent), albeit with substantial reductions in exports to the United States (-6.5 percent), Turkey (-9.9 percent) and Russia (-7 percent). In the European market, there was an increase in sales close to 3 percent, but with negative variations between 8 and 9 percent in exports to Belgium and the United Kingdom.

In the transport sector, sales fell after five consecutive years of expansion (-0.1 percent down from 7.2 percent in 2017), largely due to the contraction of the car sector (5.5 percent down from 11.5 percent in the previous year), especially in non-European markets (-15.1 percent); the largest reductions were in the United States (-1.0 percent), Turkey (-28.4 percent) and China (-60.3 percent). Within the EU, this sector grew by almost 3 percent. As for the other sectors, exports of chemicals, machinery and electrical appliances increased by around 3 percent, although the deceleration in chemical exports was more than double (more than 6 percentage points) that of the other two sectors. Computer exports accelerated slightly (to 6.7 percent), while among the traditional ‘Made in Italy’ sectors, textiles showed greater resilience (3.3 percent) compared to food, beverage and tobacco (2.5 percent).

Overall, Italy's trade balance (equal to about 39 billion, down from 47.6 billion in 2017) remains among the highest in the European Union after Germany,

the Netherlands and Ireland[13], despite it dropping to the lowest value in the past five years. The energy deficit rose to 42.6 billion, an increase of over 10 billion compared to the previous year, due to higher imports and energy prices. The results in terms of current account balances remain positive (2.8 percent of GDP), substantially in line with the previous two years.

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Performance of Italian exports: obstacles and the impact of external shocks

Among the various aspects relating to the performance of Italian exports, the recent ISTAT Report[14] indicates the factors that have most influenced export company activity and the transmission of external shocks onto the various sectors. Turnover improved for 43 percent of Italian enterprises, thanks to higher investment and an increase in employment, including of highly qualified personnel; however, the companies reporting a decrease rose to 22 percent (+2 pp). Manufacturing companies (about one third) believe that foreign competition was the factor that worsened foreign turnover the most, while the pressure on prices by other Italian companies or bureaucratic obstacles (including tariff barriers) are considered of little importance (12.4 and 11.1 percent respectively).

Sectoral competition among Italian businesses is a negative factor, especially when it comes to non-metallic mineral products and leather goods; there is still pressure from foreign competitors in various sectors (oil and wood products, processing of non-metallic minerals, metallurgy, metal products and machinery). About 40 and 20 percent of the companies in the automotive and metallurgy sectors report having suffered from the ‘war of duties’.

Moving on to the effect of economic shocks on sector trends, the Social Network Analysis of international interconnections allows us to determine to what extent the Italian foreign sector absorbs changes pertaining to the economic cycle or technological progress. Investigations into the relationships of the Italian exporting sectors with Germany, the United States and China for the year 2014 reveal that four industry sectors (machinery, chemicals, motor vehicles, metallurgy and metal products) have very close import/export ties with these three countries. Other sectors (construction, non-metallic mineral products and health services) are shown to be significant for foreign sales in relation to their high degree of interconnection with the markets considered; the service sector appears to be less important.

To summarise, the most advanced sectors of Italian industry and services have a greater weight in connections with foreign countries than in domestic connections, with connections with Germany and the US being the most significant. For construction and services (market and public), domestic inter-sectoral ties are predominant.

Looking at the short-term prospects, international downside risks persist, linked to the uncertainty of the Sino-US trade relations, whose most recent developments could lead to a settlement. However, the dialogue between the United States and the EU is still open, especially in the motor vehicle sector, which well represents their mutual commercial ties and within which Italy constitutes the third largest exporter with 4.6 billion dollars in 2018, after Germany and the United Kingdom[15]. Further opportunities could open up with the

[13] Source: Eurostat, 15 February 2018.
[14] ISTAT, ‘Report on the competitiveness of productive sectors’, 25 March 2019.
[15] Source: ACEA (European Automobile Manufacturers’ Association), ‘EU-US automobile trade: facts and figures’, 18 March 2019.’

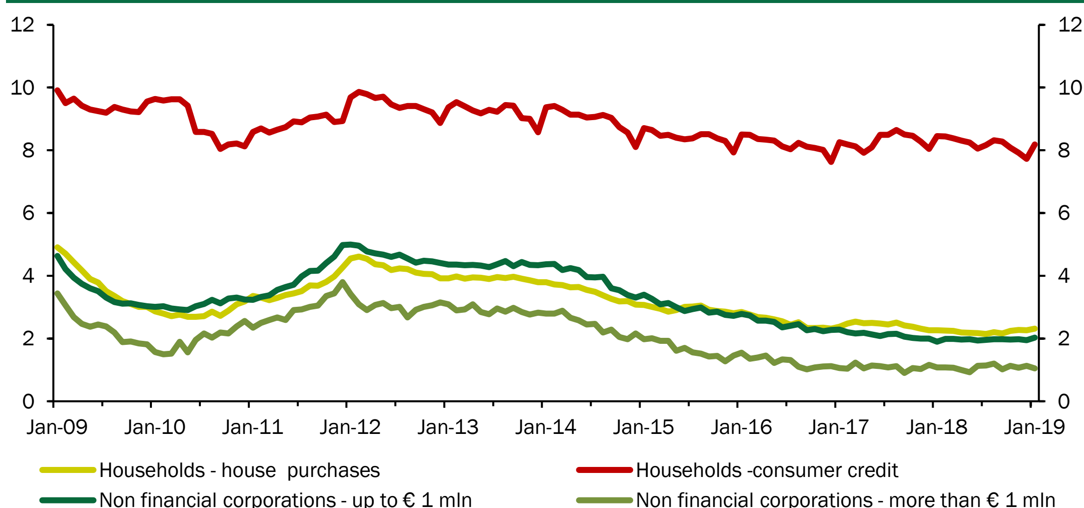
recent initiatives involving China, in line with the negotiating rounds already undertaken by the EU[16].

Credit trend

The positive trend of loans to the private sector continued during 2018 and the most recent surveys confirm credit expansion even in early 2019. The preliminary data for the month of January released by the Bank of Italy show an overall offer increase of 1 percent at unchanged legislation, driven by growing credit to households (2.6 percent y/y). However, there was a decrease in loans to non-financial companies (-0.7 percent year on year), which interrupted the series of increases that began in late 2017.

Interest rates remained at limited and stable levels. At the beginning of 2019, the harmonized rate applied to households for new mortgages was 2.3 percent, while that applied to consumer credit was 8.2 percent. Regarding new business loans, the average rate under one million euro was just over 2 percent, while above this threshold the rate was equal to 1.04 percent.

FIGURE II.9: INTEREST RATES FOR NON-FINANCIAL CORPORTATIONS AND HOUSEHOLDS (%)

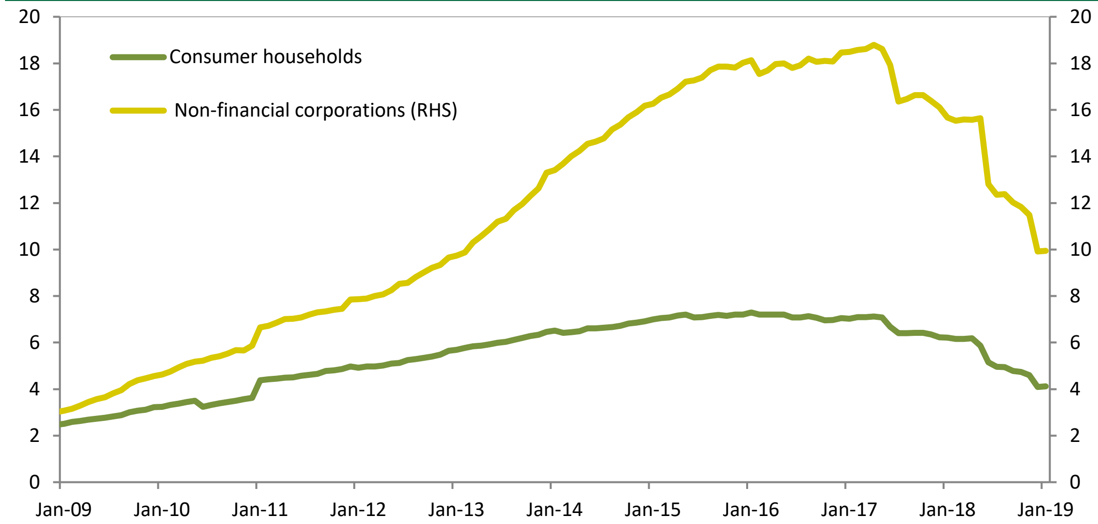


Note: The data refer to the harmonized rates applied to new loans in euros.
Source: Bank of Italy.

Credit quality continues to improve, and there was a further decrease in the incidence of impaired loans. Indeed, there was a sustained contraction in non-performing loans, marking a reduction of over 32 percentage points at unchanged legislation in January. In particular, over the last year, impaired exposures with regard to non-financial companies fell slightly below 10 percent of total loans, (returning to the values seen in late 2013), while household bad debts corresponded to around 4 percent of loans, comparable to 2011.

[16] Source: European Commission, 'Report of the 20th round of negotiations for the EU-China Investment Agreement', 1 March 2019 (http://trade.ec.europa.eu/doclib/docs/2019/march/tradoc_157772.pdf).

FIGURE II.10: NON-PERFORMING LOANS TO RESIDENTS (as a percentage of total loans)



Source: Bank of Italy.

The most recent survey on bank credit in the euro zone (Bank Lending Survey), published in January, shows a slight tightening of eligibility criteria for loans to Italian households and businesses. For the first quarter of the year, intermediaries' expectations suggest substantially unchanged credit offer policies. The demand for business loans increased, mostly due to low interest rates and spending connected to inventory and working capital. Similarly, the demand for mortgages by households is rising slightly thanks to low interest rates and still low house prices.

Prospects for the Italian economy

Scenario under unchanged legislation

The most recent quantitative and qualitative information confirms the continuation of a weak cyclical phase for the Italian economy, but with a slight improvement compared to the second half of 2018. The available indices confirm a darker picture for the manufacturing sector and a more favourable and resilient picture for the services sector.

Confidence climate surveys of manufacturing companies show a fall below average for the fourth quarter. Stocks of finished products also increased in the first quarter. The PMI remained below the expansion threshold for six months. Industrial production increased beyond expectations in January (1.7 percent m/m) after the decline recorded in December; in terms of sectors, there was a strong cyclical increase recorded in energy and non-durable consumer goods. Considering the most recent information, a flat industrial production trend is estimated for the first quarter.

For the construction sector, the latest production indications show weak cyclical increases. Positive signals come from the housing sector, still favoured by

new mortgage rates; furthermore, confidence increased significantly at the end of 1Q19, approaching record levels.

Turning to the services sector, the most recent estimates point to a modest recovery in 1Q19 after the slight increase recorded in 4Q18; the available economic indices show a gradual increase in confidence. In February, the PMI returned above the expansion threshold, 50.4, and in March it rose further to 53.1, confirming the ISTAT survey indications.

Consumer confidence surveys show a gradual decline from the second half of 2018, reaching the lowest level since August 2017 in March 2019. In the first part of the year, consumers will enjoy greater purchasing power thanks to a consumer price level still close to 1 percent (1.1 percent in March); however, core inflation, however, remains at 0.5 percent.

As for foreign demand, the available indications show overall modest growth thanks to the stability of non-EU foreign trade recorded on an annual basis. Encouraging signs come from expectations of export turnover improvements in the first quarter of 2019.

Growth for 2019 is revised downwards to 0.1 percent in real terms from the 1.0 percent estimated last December (see the box below, ‘Forecast errors for 2018 and revision of estimates for 2019 and the following years’). It is estimated that the real growth rate will gradually progress in 2020, 2021 and 2022, and that GDP will grow by 0.6 percent in 2020, 0.7 percent in 2021 and 0.9 percent in 2022. Overall, the forecasts for 2019 and 2020 do not differ substantially from the average reported by Consensus Forecasts.

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Forecast errors for 2018 and revision of estimates for 2019 and the following years[17]

This is an in-depth analysis of the revision of growth forecasts formulated in the Update to the Macroeconomic and Public Finance Framework published last December.

Firstly, we will analyse the deviations between the values forecast for 2018 and the final figures published by ISTAT in March. These deviations are shown below in Table R1 (**Column C**, Forecast error). Please bear in mind that the previous forecasts for 2018 were formulated in December and included the results of the third quarter and that the ISTAT data published in March also include subsequent revisions; the differential reported in Column c is therefore attributable to both the fourth quarter forecast error and the revision of the previous quarters.

As to the GDP, the forecasts were slightly higher than the final ISTAT figures, mainly due to the 4Q18 performance, which was worse than expected. Based on the analysis of the aggregate demand components, which show worse than expected final data on investments, the Italian economy was particularly penalized by the slowdown in the manufacturing sector globally and in particular in Germany. Italy’s production of investment goods is closely linked to global demand and the supply chains in which Germany participates.

For 2019, it is possible to formulate indications on the scenario based on unchanged legislation of the EFD (Italy’s Economic Planning Document) considering not only the data update but also the new assumptions on the international macroeconomic scenario.

[17] This box refers to the quarterly income statement data published on 5 March 2019 adjusted for working days. The annual raw data, not adjusted for working days, of the 2018 GDP growth is 0.9 percent because there were 3 more working days. In 2019, the number of working days is the same as in 2018.

TABLE R1: MACROECONOMIC SCENARIO KEY VARIABLES (seasonally adjusted data)									
	2018			2019					
	Forecasts and results			Factors accounting for revision of the growth estimates (differences of growth rates)		Forecast		Delta - forecast and other factors	
	Update December 2018	Actual	*Forecast error*	Delta - carry-over effect	Delta - international scenario	Update December 2018	*DEF 2019*	DEF - Update December 2018	*Other factors*
	a	b	c = b-a	d	e	f	*g*	h = g-f	*i=h-d-e*
GDP	0.9	0.8	-0.2	-0.2	-0.2	1.0	*0.1*	-0.81	-0.4
Imports of goods and services	1.9	1.8	-0.1	-0.3	-0.4	2.3	*2.3*	0.0	*0.7*
Household consumption	0.6	0.6	0.0	0.0	0.0	0.8	*0.6*	-0.2	*-0.2*
Gross fixed investment	4.0	3.2	-0.8	-0.4	0.1	2.5	*0.7*	-1.9	*-1.5*
Exports of goods and services	0.9	1.4	0.5	0.4	-1.0	2.4	*2.1*	-0.3	*0.4*
GDP deflator	1.1	0.8	-0.3	-0.2	0.0	1.4	*0.9*	-0.4	*-0.2*
Private Consumption deflator	1.1	1.1	0.0	0.0	0.2	1.4	*1.0*	-0.4	*-0.6*

Column D (Delta -carry-over effect) shows the difference of the statistical carry-over effect of 2018 on 2019 between the value estimated in the last official update and the final value; in essence, this value shows how much the 2019 annual forecast would change due to the updating of the 2018 data with the same previous growth assumptions in each quarter of 2019. For the GDP, the carry-over effect change is negative at -0.2 percentage points. The result below expectations of 4Q18 (-0.1 percent Q/Q) weighs on the carry-over effect. The carry-over on the growth rate of the GDP deflator is also slightly negative, with repercussions on the nominal GDP estimate.

The revision of the international situation for December is explained in Column E (Delta - International scenario), which shows the impact on the main variables estimated using the econometric model of the Treasury Department. The effect of the new international framework is also negative and is affected by the significant downward revision of global demand gauged for Italy.

To summarise, the combined effect of the two variations explains half of the downward GDP revision as shown in Column I (Other factors), which shows the difference between the actual forecast revision (Column H = EFD-DBP) and the revision amount suggested by data analysis. The other half of the revision is linked to the still modest trend in GDP expected for the first half of 2019, which is explained by an increased level of uncertainty and the slowdown in European manufacturing, especially in Germany, still not fully considered by international exogenous variables.

Table R2 summarizes the impact on GDP growth of international developments, comparing it with the assumptions made in the December 2018 Update.

Foreign demand dynamics gauged for Italy in the last quarter of 2018 resulted weaker than those forecast in December and the estimates for 2019 were revised downwards from 3.9 percent to 2.3 percent. Consequently, the negative impact of global demand on Italian exports and thus on GDP turns out to be greater in 2019, with a reduction in growth of 0.3 percent in 2019 and 0.1 percent in 2020. However, for 2021, a 0.1 point growth increase is estimated.

Late 2018 was characterized by a sudden fall of the oil prices ending in December; while in early 2019, prices rose again. The current projections based on futures contracts foresee a modest reduction in oil price until 2022. In contrast to December's predictions, prices are slightly higher over the whole forecast horizon, especially in 2019 and 2020. This would lead to an impact of -0.1 points on GDP in 2020.

On the exchange rates front, in 2018, there was a depreciation of the euro against the dollar, which seems to be persisting into early 2019. For the currency forecast, we adopted a technical assumption that requires the exchange rate to remain unchanged over time and equal to the average of the last 10 working days. The update of the effective nominal exchange rate compared to December shows a 0.6 percent greater depreciation of the euro compared to other currencies in 2019. The macroeconomic impact is up by 0.1 percentage points on GDP growth in 2019 and 2020.

The profile of the interest rates on government bonds proves most accommodating for the economy in the three-year period 2019-2021. Furthermore, a reduction is foreseen in the differential between BTP and ten-year BUND and improved credit conditions. According to econometric model estimates, these effects would bring a growth benefit of 0.2 points in 2020 and 0.3 points in 2021.

Altogether, the new international setting is less favourable with respect to the December update in 2019, due to the slowdown in global demand, only partially offset by the benefits deriving from euro depreciation. According to econometric model estimates, the economy will benefit from 0.4 points growth in 2021 due to the more favourable interest rates.

TABLE R2: ESTIMATED EFFECT OF CHANGES IN INTERNATIONAL EXOGENOUS VARIABLES (IMPACT ON GROWTH RATES)

	2018	2019	2020	2021
1. World trade	0.0	-0.3	-0.1	0.1
2. Nominal effective exchange rate	0.0	0.1	0.1	0.0
3. Oil price	0.0	0.0	-0.1	0.0
4. Interest rate assumptions	0.0	0.0	0.2	0.3

Risk (or sensitivity) analysis of exogenous variables

The international scenario envisaged in terms of general macroeconomic trends contributes decisively to the evolution of the Italian economy, notoriously open towards foreign trade. World trade dynamics, exchange rates, oil prices and financial market conditions outline the international scenario and the profile of these variables reflects standard projection methods employed at major national and international forecasting centres. Since these variables appear to have uncertain trends, it seems appropriate to provide an assessment of some of the risks inherent in the overview at unchanged legislation. Using the ITEM econometric model, we simulated some alternative scenarios with main international exogenous variables different from those foreseen in the overview based on unchanged legislation, in order to assess possible impacts on the growth of the Italian economy. We designed four alternative scenarios, each focusing on a specific element of (positive and negative) risk for the national economy. The first three simulations refer to exogenous variables of the international framework: global demand, nominal effective exchange rate for Italy and oil price.

The second half of 2018 was characterized by the gradual slowdown in world trade leading to a downward revision of its growth prospects for 2019. For the current year, the predicted growth rate of global demand for Italy is 2.3 percent lower than both in 2018 and envisaged for this year in the last EFD Update. In this context, the dynamics of global demand accelerates in 2020 (3.9 percent) and stabilizes in the following two years (3.8 and 3.7 percent, respectively). However, uncertainty about the growth prospects of some emerging economies leads us to consider a further unfavourable scenario in which the global demand

growth rate gauged for Italy is 0.3 points lower than the baseline scenario in 2019 and one percentage point lower in the following three years[18].

With regard to the trend in exchange rates, the framework at unchanged legislation adopts the technical assumption of constant exchange rates over the forecast horizon[19]; the alternative scenario, on the other hand, uses bilateral forward exchange rates with different contractual maturities until 2022. This approach gives rise to a lower depreciation of the nominal effective exchange rate in 2019 compared to the baseline scenario (by 0.7 and 0.4 percent, respectively). In the following three years there is instead an overall 3.2 percent appreciation of the euro (understood as a change in the nominal effective exchange rate) as opposed to the lack of change predicted in the scenario based on unchanged legislation.

The third risk scenario concerns oil prices. The scenario at unchanged legislation is based on the price of crude oil futures contracts and foresees a gradual reduction in oil price from $64.8 a barrel in 2019 to $61.7 in 2022. The alternative scenario assumes crude oil prices that are $10 higher than the reference scenario, starting in the second quarter of 2019 (for example, a $72 per barrel oil price is assumed for 2019).

Lastly, with regard to the financial conditions of the economy, a more favourable scenario is considered compared to the scenario at unchanged legislation. A scenario of greater saver and financial operator confidence is assumed in which, from the second quarter of 2019, the rate of return on ten-year BTPs is 100 basis points lower than the corresponding baseline scenario. Therefore, in this scenario, the lower BTP-BUND spread would affect the interest rates charged by banks, making the terms of loans to private individuals more favourable.

The results of the risk sensitivity analysis of the macroeconomic scenario at unchanged legislation are shown in Table R1. Reduced growth in global demand weakens Italian export dynamics and leads to a fall in product growth in the four-year period 2019-2022. In 2022, GDP stands at around 0.7 percentage points lower than the corresponding baseline scenario. The appreciation of the euro (in particular the nominal effective exchange rate for the Italian economy) and the increase in oil prices may also slow growth in the coming years. In terms of financial conditions, the assumption of a more favourable scenario associated with lower risk premiums demanded by investors has favourable effects on GDP as well as on consumption and investment.

In conclusion, due to the uncertainty of the international scenario, three risk scenarios were assumed that weaken the growth of the Italian economy through less lively foreign demand or a less favourable trend in exchange rates and crude oil prices. On the other hand, improved financial conditions would generate benefits that would be transferred primarily to domestic demand.

TABLE R1: IMPACT OF RISK SCENARIOS ON GDP (impact on growth rates)

	2019	2020	2021	2022
World trade	-0.1	-0.2	-0.2	-0.2
Nominal effective exchange rate	0.0	-0.2	-0.4	-0.3
Oil price	-0.1	-0.3	-0.1	0.0
More favourable financial conditions	0.0	0.3	0.4	0.4

The downward revision also takes into account the assessment of medium-term geopolitical risks. In the final year of the forecast, GDP growth is estimated at less than 1 percent; the greater degree of forecast uncertainty, connected to a

[18] The new global demand gauged for Italy is the result of a 0.25 percent reduction in growth compared to the previous quarter, starting from the second quarter of 2019.

[19] We consider the average of the most recent daily quotations, recorded in the last ten working days.

longer time horizon, makes it appropriate to adopt a technical approach based on which the trend in economic growth converges towards that of the potential product. During the entire forecast period, the main driver of growth is domestic demand, while foreign demand provides a marginally positive contribution only at the end of the period.

In the scenario based on unchanged legislation, starting from the end of the second quarter of 2019, household consumption spending will be sustained by the entry into force of the two measures of Law 26/2019, *Reddito di Cittadinanza* (Citizen's Income) and early retirement (so-called 'Quota 100') thanks to the generational turnover of those in employment. The effect of these measures on GDP and the main components is described in the two boxes below.

On the other hand, in 2020-2021, the positive effect of the two measures is in part reduced by the VAT increase under the 2019 Budget Law. Although it is not assumed that the hike in VAT will be fully transferred to product prices, any increase in consumer prices affects real disposable income and the propensity to consume; the savings rate falls slightly to just over 8 percent at the end of the period.

With a gradual slowdown from the second half of 2018, investments are expected to increase only slightly in 2019 and then return to modest expansion in subsequent years.

For the current year, weak investment in machinery is affected by the uncertain global context, in particular due to the ongoing commercial tensions between the USA and China, though it may also be influenced by less favourable credit conditions. In January, data on business loans fell below zero; in addition, bank credit surveys revealed a slight contraction in loans to businesses. From 2020, there is the positive impact of the recovery in exports.

Investment in construction grows at a moderate rate thanks to real estate being favoured by accommodative monetary policies and renovation incentives.

Exports increase on average at a rate lower than that of the foreign markets relevant to Italy due to the uncertainty generated by commercial tensions. Imports also experience moderate growth, in line with domestic demand. The current account balance stands at 2.5 percentage points of GDP at the end of the period.

Labour market dynamics are influenced by the weak cyclical phase and the effects of Law 26 of 28 March 2019 on Citizen's Income and Quota 100. Workforce employment numbers decrease by 0.3 percent and then return above zero with growth of 0.6 percent at the end of the period. In 2019, hours worked per employee continue to increase, as only a partial replacement of Quota 100 retirees is initially assumed. Both Citizen's Income and Quota 100 have an impact on labour supply; the former will lead to a bigger workforce and the latter will do the opposite. Taking into account the assumptions adopted for the simulations and the weak cyclical phase, the unemployment rate is expected to increase slightly in 2019 (11.0 percent) and in 2020 (11.2 percent) and then decrease gradually, returning to the 2018 levels at the end of the period. Per capita wage dynamics will slow down in 2019 compared to 2018 and remain modest in the following three years. The growth rate of unit labour costs, influenced by the moderate growth in productivity, will increase on average by 1 percent over the forecast horizon (2019-2022).

Inflation will remain contained in 2019 (1.0 percent) due to the fall in energy prices and the slowdown in domestic demand. In 2020 and 2021, price growth will be affected by the VAT increase.

FOCUS

An assessment of the macroeconomic impact of the Citizen's Income measures

The purpose of this box is to evaluate the macroeconomic effects of the Government's actions concerning citizen's income and pension adopted by Decree Law 4 of 28 January 2019, later amended and converted into Law 26 of 28 March 2019. Citizen's Income is an income support scheme for poor households accompanied by measures to encourage beneficiaries to engage in the labour market and find employment.

The provision defines the intended beneficiaries of the benefit, the financial eligibility requirements and the total annual sum provided, which depends on the household, income and home ownership status. In 2019, the Budget Law allocated 7.1 billion of public funding to the scheme, of which 5.6 billion for Citizen's Income and 274 million for the continuation of the Inclusion Income. The remaining amount was considered higher expenditure for improving job centres and active labour market policies. In 2020 and 2021, the overall allocations amount to 8.1 and 8.3 billion, of which 7.2 and 7.4 billion for benefit disbursement and the rest for job centres and active employment policies. A total cost of 8.3 billion has been forecast for 2022 and the years following.

According to ISTAT estimates, the recipients of citizen's income and pension could reach 2.706 million, of which 1.791 million of working age (16-64); of these, 57 percent are either employed or seeking employment. Because eligibility for Citizen's Income is subject to actively seeking work, this measure should immediately increase participation in the labour market through recourse to job centres by persons previously not seeking employment. ISTAT has estimated that the national workforce will increase by 470,000 thanks to this Government action.

The macroeconomic impact of the Citizen's Income was evaluated using the ITEM econometric model. The simulation was drawn as follows: the payment of citizen's income and pension is assimilated to a current transfer to households assuming that they will increase compared to the baseline scenario from the second quarter of 2019. The costs of improving job centres are classified as higher public spending to increase the number of centre operators. In line with the ISTAT estimate, we also assume an exogenous increase in workforce compared to the baseline scenario from the second quarter of 2019, reaching 470,000 units in the second quarter of 2020 and remaining at this level in the years following. This increase occurs gradually, also due to the technical characteristics of the ISTAT sample survey, which form the basis of the statistical employment and unemployment data considered in the macroeconomic forecast.

The assessment involved certain additional assumptions. Firstly, the assumption of a marginal propensity to consume in relation to disposable income of 0.8, from the very beginning. This level coincides with that implicit in the model, although in the model it is reached more gradually over time. This decision takes into account the evidence that less well-off individuals, for whom the measure was put in place, have a higher than average propensity to consume, including in the short term, and the fact that ITEM, as an aggregate model, is unable to illustrate the variations in behaviour according to individual income. Furthermore, the provision envisages penalties in the event that the monthly payment of the financial benefit does not result in consumption expenditure for the same month. On the other hand, a 0.8 propensity to consume is consistent with the hypothesis that some beneficiaries may increase their propensity to save on incomes other than the Citizen's Income.

Another aspect concerns the trend in average wages and employment. In general, an exogenous increase in labour market participation should lead to an increase in

unemployment and, consequently, wage deflation. Both the increase in labour supply compared to the baseline scenario and the lower bargaining power of workers due to higher unemployment contribute to this effect in the model. However, in the simulation of the model, it was assumed that salaries would remain unchanged with respect to the baseline scenario for the first two years of the simulation horizon, given that the exogenous increase in labour supply associated with enrolment at job centres is initially purely statistical and will become reality over time. On the contrary, starting from the third year (2021), salaries are allowed to vary endogenously in the model; these tend to decrease compared to the baseline scenario, in part because the entry level wages for new employees are often lower than the national average salary. This occurs despite the fact that the provision established a minimum wage (858 euro) to be used as a benchmark for assessing offers of work, against which refusal to accept a job leads to loss of Citizen's Income.

Furthermore, it is reasonable to assume that strengthening job centres may partly improve the functioning of the labour market, with a positive impact on employment from the third year, in addition to that of the first year pertaining to the greater aggregate demand triggered by the scheme. An increase in the demand for work tends to reabsorb in part the unemployment rate compared to the baseline scenario and goes hand in hand with lower salary levels. It is hoped that the effect of active employment policies, such as higher training, together with the effect of the minimum wage defined in the provision as a benchmark for an appropriate job offer, will lift wages above the baseline scenario in the medium to long term. This would reduce the population eligible for the Citizen's Income, insofar as more low-income workers would earn salaries above the income support threshold.

The macroeconomic impact of the Citizen's Income is shown in Table R1. The percentage variation in GDP increases by 0.2 percentage points compared to the baseline scenario in 2019 and in 2020 and by 0.1 percentage points in 2021. After four years, in 2022, the level of the product is 0.5 percentage points higher than that of the baseline scenario. Considering that the overall costs of public funding of the measure ex ante is around 0.4 percentage points of GDP each year, the results recorded in Table R1 reflect an implicit multiplier on the product of 0.6 in the first year, 1 in the second and 1.1 in the third.

TABLE R1: ASSESSMENT OF THE MACROECONOMIC IMPACT OF CITIZEN'S INCOME (differences in percentage variation rates compared to the baseline scenario)

	2019	2020	2021	2022
GDP	0.2	0.2	0.1	0.0
GDP deflator	0.1	0.0	0.0	0.0
Consumption deflator	0.0	0.0	0.1	0.0
Consumption	0.5	0.2	0.1	0.1
Investment	0.1	0.4	0.0	0.0
Exports	0.0	0.0	0.0	0.0
Imports	0.1	0.4	0.0	0.2
Employment	0.1	0.2	0.4	0.4
Participation rate (*)	0.4	1.2	1.3	1.5
Unemployment rate (*)	0.4	1.3	1.2	0.9

(*) Difference compared to the baseline scenario

The expansive effect on economic activity is determined by consumption deriving from higher disposable income due to the income support scheme and greater employment. In

2022, employment is up by 1.1 percentage points compared to the baseline scenario, with an increase of 260,000 in work[20]. The unemployment rate increases, reaching a 1.3 percentage points higher than the baseline scenario in 2020. This gap gradually narrows n the following years.

FOCUS

An assessment of the macroeconomic effects of pension measures

Legislative Decree 4 of 28 January 2019, converted with amendments into Law 26 of 28 March 2019, includes several retirement pension measures in addition to the Citizen's Income. The principal regulatory amendment concerns the new access channel to pensions, introducing the joint requirement of at least 38 years of pension contributions and being at least 62 years of age (known as 'Quota 100'). The possibility of early retirement through the 'Quota 100' mechanism is only granted to those who meet the requirements between 2019 and 2021. Furthermore, the years of contributions for early retirement is reduced by five months, bringing it to 42 years and 10 months for men and 41 years and 10 months for women. It is also established that these requisites shall not be adjusted for life expectancy increases until 2026[21]. The decree technical report, based on estimates of the early retirement take-up rate, predicts the greatest number of retirement benefits at the end of each year in relation to the provision, together with the corresponding annual cost for public finance. In particular, the greatest number of pensions associated with the provision is estimated at 290,000 at the end of 2019, 327,000 at the end of 2020 and 356,000 and 296,000 at the end of 2021 and 2022. In the first four years, the greatest expense would amount to 3.8 billion in 2019. 7.9 billion in 2020, 8.4 billion in 2021 and 7.9 billion in 2022. For private employees who benefit from retirement under the new requirements, early severance indemnity devolved to the INPS management fund must also be considered. The effects of this aspect for public finance constitute costs of 585 million in 2019, while they are lower in 2020 and 2021; for the following years, the effects are of savings instead.

This box shows the results of the assessment of the macroeconomic impact of the measure, performed using the ITEM econometric model. The increase in number of pensions was distributed according to type of worker according to the estimates of the technical report, which distinguishes at the end of each year early retirement figures for employees in the private sector, self-employed workers and state employees. These methods thus included the exogenous decrease in employment for each of the three sectors.

All other conditions being equal, the contraction in the number of persons in employment following the new retirement scheme would leads to a corresponding reduction in the workforce. A similar decrease in both employment and workforce would push the unemployment rate above the baseline scenario. However, the generational turnover, i.e. the replacement of workers who opted for 'Quota 100' with new recruits, pushes in the

[20] This increase could be considered too optimistic if we take into account the recent empirical evidence on the impact of job vacancies on numbers in employment (vacancy rate) in Italy. This impact is around 1.2 percentage points, only slightly below the expected percentage increase in employment in the fourth year of the simulation horizon (1.1 percent). It is noted, however, that the other measure included in the decree currently being converted into law, on pensions, called 'Quota 100', could cause, by its nature, a significant increase in vacancy rate in conjunction with individual pre-retirement decisions.

[21] With respect to the maturity date of the requisite, Law 26/2019 provides for a three-month window for private sector workers to access retirement with the first effective date on 1 April 2019. For public sector employees, the window is six months with the first effective date on 1 August 2019 (1 September for workers in the school sector only). The law includes various other measures that affect pension spending. Among these, the women's option, the extension of the social EPA and the suspension to 2026 of the adjustment to the increase in life expectancy of the pension requirements for early-starting workers. Assessment of the macroeconomic impact of pension measures also considered these measures.

opposite direction. If we assume that the new recruits come entirely from among the unemployed, a replacement rate of 10 percent would be enough to guarantee the unemployment rate stays the same. Therefore, if, as is plausible, the generational turnover is above 10 percent, the unemployment rate will drop with other conditions being equal.

The results are shown in Table R1. The percentage variation in GDP remains unchanged in 2019 compared to the baseline scenario, increases by 0.1 percentage points both in 2020 and 2021 and remains unchanged in 2022. After four years, in 2022, the product level therefore increases by 0.2 percentage points compared to the baseline scenario. The 2019 GDP trend is negatively affected by the decrease in public sector value added, measured based on employee numbers in the general government sector.

TABLE R1: ASSESSMENT OF THE MACROECONOMIC IMPACT OF SOCIAL SECURITY MEASURES (differences in percentage variation compared to the baseline scenario)

	2019	2020	2021	2022
GDP	0.0	0.1	0.1	0.0
GDP deflator	-0.1	0.0	0.1	0.2
Consumption deflator	-0.1	-0.1	0.1	0.2
Consumption	0.1	0.2	0.2	0.0
Employment	-0.3	-0.2	0.1	0.1
Participation rate (*)	-0.1	-0.3	-0.3	-0.3
Unemployment rate (*)	-0.2	-0.6	-0.8	-0.9

(*) Difference compared to the baseline scenario.

The employment trend in the second half of 2019 is affected by the exit from the labour market of subscribers to the scheme and their partial replacement by new recruits. The replacement rate is estimated by the ITEM model at around 35 percent. In subsequent years, the percentage replacement estimated by the model stands at between 70 and 80 percent of early retirement[22]. The gradual reduction in unemployment compared to the baseline scenario, reaches 0.9 percentage points in the fourth year (2022). This, together with the fact that lower unemployment generates a slight upward pressure on wages, has a positive effect on private consumption, which, after three years, is 0.5 percentage points greater than the baseline scenario.

The results obtained show an increase in labour productivity compared to the baseline scenario, which reaches 0.5 percentage points in the third year. This increase can be attributed to a greater intensity of use of the labour factor, especially at the beginning of the simulation period. Subsequently, the gradual introduction of new recruits to the production process brings productivity back down to baseline scenario levels. The effects on the average salary are initially negative (due to the change in composition of employees), whereas they become positive later on. This is also reflected in the variation in GDP deflator, slightly lower than the baseline scenario in the first year, zero in the second and positive in 2021 and 2022.

[22] The effects of the measure to introduce the Citizen's Income and the reform of job centres, included under Law 26/2019, should generate an increase in employment opportunities, thus helping to fill positions left vacant by early retirement.

TABLE II.1: MACROECONOMIC SCENARIO based on unchanged legislation (percentage variations, unless otherwise indicated) (1)

	2018	2019	2020	2021	2022
INTERNATIONAI EXOGENEOUS VARIABLES					
World Trade	3.8	2.5	3.7	3.8	3.9
Oil Price (Brent, USD/barrel, futures)	71.3	64.8	64.6	62.9	61.7
USD/EUR exchange rate	1.181	1.135	1.134	1.134	1.134
ITALY MACRO DATA (VOLUMES)					
GDP	0.9	0.1	0.6	0.7	0.9
Imports	2.3	2.2	2.5	2.5	2.5
Domestic final consumption	0.5	0.4	0.6	0.6	0.6
Household consumption and NPISH	0.6	0.6	0.6	0.7	0.8
Government expenditure	0.2	-0.3	0.4	0.1	0.0
Investment	3.4	0.7	1.2	1.3	1.5
- machinery, equipment and intangible assets	2.1	0.1	1.1	1.3	1.6
- transportation means	14.5	-1.4	1.3	1.4	1.4
- construction	2.6	1.4	1.3	1.3	1.4
Exports	*1.9*	*2.1*	*2.3*	*2.5*	*2.6*
Memo item: Current account balance (% of GDP)	2.6	2.6	2.5	2.5	2.5
CONTRIBUTIONS TO GDP GROWTH (1)					
Net exports	-0.1	0.0	0.0	0.0	0.1
Inventories	0.0	-0.2	0.0	0.0	0.0
Domestic demand net of inventories	1.0	0.4	0.7	0.7	0.8
PRICES					
Imports deflator	2.9	1.7	1.8	1.7	1.6
Exports deflator	1.7	1.4	1.7	1.6	1.6
GDP deflator	0.8	1.0	1.9	1.7	1.5
Nominal GDP	*1.7*	*1.2*	*2.6*	*2.5*	*2.4*
Consumption deflator	*1.1*	*1.0*	*2.3*	*1.8*	*1.5*
LABOUR					
Cost of Labour	2.0	1.2	1.3	1.2	1.6
Productivity (measured on GDP)	0.1	0.3	0.4	0.3	0.3
ULC (measured on GDP)	1.9	0.9	0.9	1.0	1.3
Employment (FTEs)	0.8	-0.2	0.2	0.5	0.6
Unemployment rate	10.6	11.0	11.2	10.9	10.6
Employment rate (age 15-64)	*58.5*	*58.7*	*58.9*	*59.3*	*59.8*
Memo item: Nominal GDP (absolute values in millions of euro)	*1,756,982*	*1,777,899*	*1,823,329*	*1,868,945*	*1,914,457*

(1) Discrepancies, if any, are due to rounding.

(2) Source: ISTAT.

Note: The macroeconomic scenario relating to international exogenous variables was developed based on the information available as at 9 April 2019.
GDP and components by volume (chained values in reference year 2010), data not adjusted for business days.

Policy scenario

As described in chapter 1, the policy scenario includes the effects on the Italian economy of the two legislative decrees presented at the same time as the Stability Plan, including measures to stimulate private investment and local government investment (‘Growth’ Leg. D.) and measures to streamline public work approval procedures (‘Unlock Sites’ Leg. D.). The policy scenario confirms current tax legislation pending the definition of alternative measures in the

upcoming months, in preparation of the 2020 Budget Law. Greater public investment is also predicted, especially for 2020 and 2021.

TABLE II.2: BASE ASSUMPTIONS

	2018	2019	2020	2021	2022
Short-term interest rate (1)	n.a.	-0.01	0.85	1.75	2.39
Long-term interest rate	2.54	2.73	3.13	3.49	3.77
USD/EUR exchange rates	1.181	1.135	1.134	1.134	1.134
Change in the nominal effective exchange rate	2.8	-0.7	0.0	0.0	0.0
World GDP, excluding EU	3.9	3.3	3.5	3.6	3.6
EU GDP	1.9	1.5	1.7	1.6	1.6
Global demand weighted for Italy	3.9	2.3	3.9	3.8	3.7
World imports volumes, , excluding EU	3.9	2.4	4.0	4.1	4.1
Oil price (Brent, USD/barrel)	71.3	64.8	64.6	62.9	61.7

(1) Short-term interest rate is understood to mean the average of the rates applied to 3-month government bonds issued during the year. Long-term interest rate is understood to mean the average of the rates applied to 10-year government bonds issued during the year.

TABLE II.3a: MACROECONOMIC PROSPECTS

	2018	2018	2019	2020	2021	2022
	Level (1)	% Variations				
Real GDP	1,614,865	0.9	0.2	0.8	0.8	0.8
Nominal GDP	1,756,982	1.7	1.2	2.8	2.6	2.3
REAL GDP COMPONENTS						
Private consumption (2)	969,098	0.6	0.6	0.7	0.7	0.6
Public spending (3)	314,173	0.2	-0.4	0.8	0.1	-0.1
Gross fixed investment	296,078	3.4	1.4	2.0	1.8	1.6
Inventories (% of GDP)		0.0	-0.2	0.0	0.0	0.0
Exports of goods and services	517,576	1.9	2.1	2.3	2.4	2.6
Imports of goods and services	484,721	2.3	2.2	2.7	2.6	2.5
CONTRIBUTIONS TO REAL GDP GROWTH						
Domestic demand	-	1.0	0.5	0.9	0.8	0.7
Change in inventories	-	0.0	-0.2	0.0	0.0	0.0
Net exports	-	-0.1	0.0	-0.1	0.0	0.1

(1) Millions.
(2) Final consumption spending of households and non-profit private social institutions serving households (I.S.P.).
(3) Public administrations.
Note: Discrepancies, if any, are due to rounding.

The effects of the above measures on the economy will result in additional GDP growth of 0.1 percentage points in 2019, 0.2 percentage points in 2020 and 0.1 percentage points in 2021. On the other hand, in the last year of the forecast, 2022, GDP growth is 0.1 percentage points lower than the figure at unchanged legislation, due to a more challenging deficit target and measures to reduce public expenditure and combat tax evasion.

Therefore, real GDP growth will be 0.2 percent in 2019 and 0.8 percent in the three years after that. Compared to the macroeconomic overview based on unchanged legislation, the greater growth in 2019-2021 comes essentially from the gross fixed investment component.

TABLE II.3b: PRICES

	2018 Level	2018	2019	2020	2021	2022
GDP deflator	108.8	0.8	1.0	2.0	1.8	1.6
Private consumption deflator	110.1	1.1	1.0	2.3	1.9	1.6
HICP	102.5	1.1	1.0	2.3	1.9	1.6
Public consumption deflator	105.3	2.1	0.7	1.2	0.0	0.4
Investment deflator	106.6	0.5	0.6	1.6	1.9	1.7
Export deflator	107.8	1.7	1.4	1.7	1.7	1.6
Import deflator	106.0	2.9	1.7	1.8	1.7	1.5

TABLE II.3c: LABOUR MARKET

	2018 Level	2018	2019	2020	2021	2022
Employment (national accounts)	25,335	0.9	-0.3	0.2	0.7	0.6
Total hours worked	43,641,891	1.1	-0.2	0.3	0.7	0.6
Unemployment rate		10.6	11.0	11.1	10.7	10.4
Labour productivity measured on the employment	63,739	0.0	0.6	0.6	0.0	0.0
Labour productivity measured on hours worked	37.0	-0.2	0.4	0.5	0.1	0.1
Compensation of employees	706,934	3.3	1.3	1.8	1.9	2.2
Compensation per employee	41,265	2.0	1.2	1.5	1.3	1.6

(1) Units of measurement: thousands of units for employed in national accounts and total hours worked; euro at constant values for labour productivity; millions of euro at current values for income from employment and euro for labour costs.

TABLE II.3D: SECTORAL ACCOUNTS

% of GDP	2018	2019	2020	2021	2022
Net lending/borrowing with the rest of the world	2.3	2.3	2.2	2.1	2.1
Balance of goods and services	2.5	2.5	2.3	2.3	2.4
Balance of primary income and transfers	-0.1	-0.1	-0.1	-0.1	-0.2
Capital account	-0.1	-0.1	-0.1	-0.1	-0.1
Borrowing/surplus of the private sector	4.5	4.7	4.3	4.0	3.6
Borrowing/surplus of the public administrations	-2.1	-2.4	-2.1	-1.8	-1.5

III. NET BORROWING AND PUBLIC DEBT

III.1 FINAL DATA AND FORECASTS AT UNCHANGED LEGISLATION

According to the provisional estimates published by ISTAT on 9 April, the ratio of general government net borrowing to GDP is at 2.1 percent in 2018, with an improvement of around 0.3 percentage points compared with the previous year. This estimate differs from the deficit objective revised to 1.9 percent in the Update of the Macroeconomic and Public Finance Framework of last December.

In 2018, the preliminary estimate of general government net borrowing is around 37.5 billion, improving by almost 4 billion compared to 2017. The decline in interest burden accounted for over 0.6 billion and the improvement of the primary surplus for approximately 3.2 billion[1].

Interest expenditure declined, although by a contained rate, for the sixth consecutive year, at 64.9 billion. The ratio of interest expenditure to GDP fell from 3.8 percent of 2017 to 3.7 percent in 2018, a reduction in line with the forecasts made in December last year.

The primary surplus was at 1.6 percent of GDP in 2018, slightly below the expectations of last December (1.8 percent of GDP), posting an improvement of about 0.17 percentage points compared to 2017.

The maintenance of a high primary surplus continues to be a mitigating factor in the dynamics of public debt-to-GDP ratio. According to the most recent data published by the European Commission, Italy is confirmed among the countries with a primary surplus above the average in the Euro Area and the European Union, in both cases amounting to 1.2 percent of GDP[2]. In Italy, the ratio of primary surplus to GDP in the period 2010-2018 was on average among the highest in the Euro Area, at 1.4 percent.

[1] The revisions of the historical series carried out by ISTAT for the period 2015-2017 (due to the consolidation of the basic information compared to that available in September 2018 and to changes in the perimeter of the general government sector as defined by Eurostat) despite having improved the net borrowing of 2015 and 2016, and worsened that of 2017 in absolute terms, left the ratio to GDP unchanged.

[2] AMECO data.

In 2018, total revenues were 46.4 percent of GDP, slightly below the figure recorded in 2017 (46.5 percent). Current revenue, totalling 46.2 percent of GDP, reflect the increases in social security contributions (+4.2 percent) and indirect taxes (+2.1 percent). The dynamic of indirect taxes reflects the trend of VAT revenue on internal transactions that has benefited from the broadening of the application scope of the split payment to the transactions performed in relation to all general government units included in the consolidated economic account, of companies controlled by central and local general governments, as well as listed companies (Decree Law No. 50/2017). VAT collections on imports recorded an overall increase of 6.3 percent in the period, due to higher oil prices.

Direct taxes recorded a reduction of 0.7 percent. The result is influenced by: i) the substantial revenue recorded in 2017 coming from discounted early settlement of tax debts; ii) the financial effects of the 3.5 percentage point reduction in corporate income tax rate[3]; iii) the extension to June 2018 of the tax benefits relating to the deduction of depreciations for investments in new and hi-tech capital goods (so-called super and hyper depreciation), provided for in the 2017 Budget Law. The reduction in tax revenues has also been affected by the fall in capital revenue arising from the Voluntary Disclosure Programme of financial assets and properties held abroad.

The tax burden in 2018 stood at 42.1 percent, in line with that recorded the previous year.

In 2018, total primary expenditure increased compared to the previous year (+1.2 percent), while its ratio to GDP fell by 0.2 percentage points. Current primary expenditure increased in nominal terms (+2.6 percent) compared to the previous year, and its impact on GDP, of 41.6 percent, grew by 0.4 percentage points, interrupting the downward trend. The nominal increase is due to direct purchases (intermediate consumption grew by 1.2 percent and social benefits in kind increased by 2.2 percent) and monetary transfers (social benefits in cash increased by 2.2 percent). Compensation of employees grew by 3.1 percent, sustained by the dynamics of employment and gross wages per capita in 2018.

[3] Stability Law for 2016.

TABLE III.1 GENERAL GOVERNMENTS BUDGETARY PROSPECTS (1)

	2018		2019	2020	2021	2022
	Level (2)	As % GDP	As % GDP			
Net borrowing by sector						
1. General government	-37,505	-2.1	-2.4	-2.0	-1.8	-1.9
2. Central government	-44,184	-2.5	-2.7	-2.2	-2.0	-2.1
3. State						
4. Local government	3,835	0.2	0.2	0.1	0.1	0.1
5. Social security funds	2,844	0.2	0.1	0.1	0.1	0.1
General government						
6. Total revenue	816,113	46.4	46.5	47.1	47.0	46.6
7. Total expenditure	853,618	48.6	48.9	49.1	48.8	48.5
8. Net borrowing	-37,505	-2.1	-2.4	-2.0	-1.8	-1.9
9. Interest payments	64,979	3.7	3.6	3.6	3.7	3.9
10. Primary surplus	27,474	1.6	1.2	1.6	1.9	2.0
11. One-off measures (3)	1,665	0.1	0.1	0.1	0.1	0.1
Selected components of revenue						
12. Total tax revenue	503,961	28.7	28.5	29.4	29.4	29.2
12a. Indirect taxation	253,607	14.4	14.5	15.6	15.7	15.6
12b. Direct taxation	248,876	14.2	14.0	13.7	13.7	13.5
12c. Capital tax	1,478	0.1	0.1	0.1	0.1	0.1
13. Social security contributions	234,964	13.4	13.5	13.4	13.3	13.2
14. Income from property	13,949	0.8	0.8	0.7	0.7	0.6
15. Other revenue	63,239	3.6	3.7	3.6	3.6	3.6
15.a Other current revenue	61,025	3.5	3.5	3.5	3.4	3.4
15.b Other capital revenue	2,214	0.1	0.2	0.1	0.1	0.1
16. Total revenue	816,113	46.4	46.5	47.1	47.0	46.6
p.m.: fiscal pressure		*42.1*	42.0	42.7	42.7	42.5
Selected components of expenditure						
17.Compensation of employees + intermediate consumption	269,793	15.4	15.2	15.1	14.7	14.5
17a. Compensation employees	171,826	9.8	9.7	9.5	9.3	9.1
17b. Intermediate consumption	97,967	5.6	5.5	5.6	5.4	5.4
18. Total social transfers	394,781	22.5	23.1	23.2	23.3	23.2
of which: Unemployment benefits	*13,137*	*0.7*	*0.8*	*0.8*	*0.7*	*0.7*
18a. Social transfers in kind	45,888	2.6	2.6	2.5	2.5	2.5
18b. Social benefits not in kind	348,893	19.9	20.5	20.7	20.8	20.7
19. Interest expenditure	64,979	3.7	3.6	3.6	3.7	3.9
20. Production levies	26,113	1.5	1.5	1.5	1.5	1.4
21. Gross fixed capital formation	37,081	2.1	2.2	2.4	2.4	2.5
22. Capital transfers	20,839	1.2	1.0	1.0	1.0	0.9
23. Other expenditure	40,032	2.3	2.3	2.2	2.2	2.2
23a. Other current expenditure	39,587	2.3	2.3	2.2	2.2	2.1
23b. Other capital expenditure	445	0.0	0.0	0.0	0.0	0.0
24. Total expenditure	853,618	48.6	48.9	49.1	48.8	48.5
Primary current expenditure	*730,274*	*41.6*	*42.1*	*42.1*	*41.6*	*41.3*
Total primary expenditure	*788,639*	*44.9*	*45.3*	*45.5*	*45.1*	*44.7*

(1) The values show estimates at unchanged legislation. Discrepancies, if any, are due to rounding.
(2) Values in millions.
(3) The positive sign indicates one-off measures to reduce the deficit.

In 2018, capital expenditure recorded a decrease in both nominal terms (-13.1 percent) and in terms of GDP (to 3.3 percent down from 3.9 percent in the previous year). Investment grants showed a decrease of 24.9 percent. Gross fixed capital formation recorded a decline in nominal terms of 4.3 percent, against the 2.2 percent increase forecast last autumn. As a percentage of GDP the level reached is 2.1 percent, compared to 2.2 percent in 2017.

The significant decline in other capital expenditure (-33.6 percent) is related to the absence in 2018 of one-off measures in favour of the banking sector introduced in 2017 in response to the crisis among some Italian banks.

For 2019, net borrowing estimate at unchanged legislation is 2.4 percent of GDP, around 0.2 percentage points worse than in 2018. For the following two years, the deficit will improve by reaching 1.8 percent of GDP in 2021, while a slight worsening to 1.9 percent of GDP is forecast for 2022. The primary surplus will rise from 1.2 percent of GDP in 2019 to 2.0 percent in 2022. Interest payment will reduce to 3.6 percent of GDP in 2019 and in 2020, rising again in 2021 and 2022 to 3.7 and 3.9 percent of GDP respectively.

The ratio of tax revenue at unchanged legislation to GDP is expected to reduce to 28.5 percent in 2019, to increase to 29.4 percent for 2020 and 2021 and then to decrease again to 29.2 percent in the following year. The reduction of 2019 is due to the effects of the measures introduced with the 2019 Budget Law[4], which provided for, among other things: i) the deactivation of the safeguard clauses[5]; ii) the broadening of the application scope of the facilitated flat-tax scheme and taxation in favour of companies that plough their profits back into capital goods and to provide more jobs; iii) the increase in the deductibility of the IMU (Single Municipal Property Tax) for owner-occupied property; iv) and the extension to 2019 of tax deductions for expenditure for the purpose of improving energy efficiency.

In the following years, the dynamics of tax revenue are affected by the provisions that have updated from 2020 the automatic increases in VAT and excise duties, the obligation to transmit payments electronically to the Revenue Agency, and agreed the definition of easier terms for tax disputes and pending tax disputes. In accordance with the legislation in force, the ratio of indirect taxes to GDP will rise from 14.5 percent in 2019 to 15.6 percent in 2020 and to 15.7 percent in 2021, while returning to 15.6 percent in 2022. Direct taxes in 2019 will mark a slight decline of 0.1 percent but in 2020 will return to growth. As a ratio to GDP, however, they will fall from 14.0 percent in 2019 to 13.5 percent of GDP at the end of the period.

Social security contributions are expected to grow by 2.4 percent in 2019, while in 2020 and 2021 growth will slow, with rates of 1.5 percent and 1.7 percent. In 2022, they will grow at a faster pace of 2.1 percent. This trend is due to the combined effect of the evolution of compensation of employees, the absence of the economic effects of the contribution exemption measures provided for by the 2015 and 2016 Stability Laws for new recruits on permanent contracts,

[4] Law No. 145/2018.

[5] With respect to current legislation, the expected financial effects are approximately 23 billion in 2020 (approx. 1.3 percentage points of GDP) and 28.7 billion as from 2021.

the measures facilitating the recruitment of young people introduced with the 2018 Budget Law and the employment-related measures established by the 2019 Budget Law. As a ratio to GDP, social security contributions will rise to 13.5 percent in 2019 and then fall gradually to 13.2 percent in 2022.

Fiscal pressure is expected to fall by 0.1 percentage points in 2019, standing at 42.0 percent of GDP. In 2020 and 2021, recovery is forecast at 42.7 percent, with a subsequent decrease to 42.5 percent at the end of the period. The growth dynamic from 2020 feels the effects of the planned implementation of the safeguard clause.

According to the forecasts under unchanged legislation, the impact of total primary expenditure on GDP will mark progressive falls, from 45.3 percent in 2019 to 44.7 percent in 2022. The trend towards reduction will be favoured by the decline of primary current expenditure, which will fall from 42.1 percent of GDP in 2019 to 41.3 percent of GDP in 2022. Compensation of employees and intermediate consumption are expected to reach 9.1 and 5.4 percent of GDP, respectively, in 2022. Compensation of employees will grow to 0.4 percent in 2019 and 0.8 percent in 2020 while in the two subsequent years, a decrease of 0.2 percent and new growth of 0.6 percent at the end of the period are expected, respectively. This dynamic considers the effects of contract renewals and the resources allocated by the last Budget Law, recruitment in derogation, impact on public employment of the so-called ‘Quota 100’ and the absence of financing of certain measures under the unchanged legislation.

In the face of the trends described above, and in particular the upward revision of the estimated net borrowing for the ongoing year, the Government intends to implement the procedure included in the 2019 Budget Law, according to which two billion euro of expenditure will remain frozen in the second half of the year.

In the three year period 2019-2021, the expenditure component relating to social benefits not in kind will grow by 4.4 percent in 2019, 3.5 percent in 2020 and 2.9 percent in 2021, also reflecting the effects of the entry into force of the Citizen's Income foreseen by the 2019 Budget Law[6] and the measures facilitating access to early retirement schemes (including the so-called ‘Quota 100’), which is also introduced by the 2019 Budget Law.

The evolution of gross fixed capital formation in the coming years shows a resumption in spending, with nominal growth of 5.2 percent in 2019 that will reach 10.3 percent in 2020. Dynamics slow over the next two years, with expected growth of 6.3 percent in 2021 and 3.2 percent in 2022. The 2019 Budget Law has refinanced an ad hoc fund, with a multiannual allocation of 43.6 billion over the period 2019-2033 in support of investment by central administrations of the State (ministries) for the execution of works to reduce hydrogeological risk and for relaunching investment by local and regional authorities by unfreezing administrative surpluses for the execution of public works and for reconstruction following earthquakes and floods.

[6] Decree Law No. 4/2019 converted into law by Law No. 26 of 28 March 2019: the measures to reform the pension system and introduce the Citizen's Income will enter into force from 1 April 2019.

In the Autumn Forecast published by the European Commission in November 2018, Italian net borrowing was estimated at 1.9 percent of GDP in 2018, while the data published on 9 April by ISTAT indicate a deficit/GDP ratio of 2.1 percent. For 2019, the Commission's deficit estimate was 2.9 percent, while the update of this Document indicates a deficit at 2.4 percent of GDP. In November, the Commission forecast a greater growth of real GDP in 2019 (1.2 percent), which it also revised downwards to 0.2 percent with the Winter Forecast last January. This would tend to worsen the deficit prediction. Conversely, the Commission's forecast did not take account of the subsequent amendment to the Budget Law presented by the Government with the objective of decreasing net borrowing. The assumptions on interest payments were based on the very high levels reached by the market last October. In 2020, according to the Commission estimates at unchanged policies, the deficit will reach -3.1 percent of GDP despite growth in the economy of 1.3 percent, since the greater revenues deriving from the implementation of the VAT clause are not considered. The Winter Forecast of last January also revised downwards the growth of GDP in 2020 (to 0.8 percent)[7].

FOCUS

Main measures to relaunch public investment of the fiscal package 2019-2021

The 2019-2021 fiscal package places the relaunch of public investment among the main objectives of Government action. In this direction, the measures shall provide for an increase in the resources to be allocated to public investment compared to previous forecasts and, at the same time, seek to encourage programming and to strengthen investment planning and achievement, through the removal of administrative and regulatory barriers, and the establishment of specific support structures.

A substantial proportion of the resources intended for Italian investment and development is allocated to the funds for investment by central administrations of the State (ministries) and regional and local authorities. The fiscal package allocates 43.6 billion euro to the central administrations of the State fund for the period 2019 to 2033, to be divided up on the basis of sector programmes presented by each administration for their relative areas of expertise. In particular, the fund provides the allocation of 0.7 billion euro in 2019, 1.3 billion in 2020 and 1.6 billion in 2021. In subsequent years, the allocation of resources increases by over 3 billion euro each year. This provision operates in continuity with the initiatives to strengthen public investment already pursued by the previous budget laws and is added to that already established in the 2017 and 2018 Budget Laws. Overall, the resources allocated to the financing of public investment at central level in the 2017-2033 period amount to over 124 billion euro. The allocation of financial resources for a long time period helps to facilitate the programming of investments that, by their nature, require a multi-annual timeline, such as large infrastructures, improvements to public property (including schools and healthcare buildings), land protection, the development of cutting-edge technologies, research and safety.

A total of 35.1 billion is set aside in favour of regional and local authorities over the 2019-2033 period and 1.5 billion euro with effect from 2034, to finance: the 'unfreezing' of the administrative surpluses of regional and local authorities (in terms of net borrowing of general government, approximately 0.4 billion in 2020 and 0.7 billion in 2021); multi-annual safety plans for the maintenance and improved safety of roads and schools; measures to reward regional authority investment and the design review of the works of the underground

[7] The comparison of forecasts under unchanged legislation of this Economic and Finance Document with the more up-to-date forecasts of the Commission is undertaken in compliance with EU Directive No. 85/2011.

line C and the strengthening and extraordinary maintenance of the underground lines A and B and of the road network of the city of Rome (a total of around 1 billion in 2019, 0,6 billion in 2020 and 1.2 billion in 2021). In addition, greater resources are allocated for constructing healthcare facilities and modernising technology (4 billion from 2021 to 2033) and for uprating technological infrastructures for electronic reservation systems for access to health care facilities (0.4 billion in the three-year period 2019-2021).

In addition to such measures, the fiscal package provides for capital resources for emerging events for a total of 1.4 billion in 2019 and 0.3 billion in 2020. This context includes, among other things, interventions for the reconstruction of the areas hit by seismic events, the prevention of seismic risk, the establishment, with the Presidency of the Council, of a fund for investment in the regions and autonomous provinces affected by the floods of September and October 2018, the implementation of port development plans, for, intermodality and integration between the city and the port of Genoa following the collapse of the Polcevera Viaduct and the refinancing of the fund for national emergencies. Additional resources are provided for the mitigation of hydraulic and hydrogeological risk (0.8 billion in 2019, 0.9 billion in both 2020 and 2021) and the implementation of a first part of the national plan of operations in the water sector, already provided for in the 2018 Budget Law (0.1 billion annually from 2019 to 2028).

An additional 4 billion euro are also allocated for the period 2019-2034 for the programming of operations to be financed by the Development and Cohesion Fund.

The budget law ordered the establishment of a mission structure called 'Investitalia', with the task of coordinating government policies on public and private investment, with the aim of promoting investment and reducing the execution time of public works. The structure should report directly to the President of the Council of Ministers in collaboration with the already existing steering committee, called ‘Strategia Italia’. In order to ensure adequate support to general government, there is also the requirement of establishing an ad hoc structure for the planning of public assets and buildings, which may be used by the central government and local authorities concerned.

Finally, changes were introduced to adapt the regulatory system and overcome some of the difficulties of application related to the recent reform of the code of public contracts. In particular, the raising of the threshold from 1,000 to 5,000 euro, above which public administrations must refer to the electronic market for their purchases, and the derogation to the procedures for awarding public contracts below the European threshold (until 31 December 2019, pending an overall revision of the code of public contracts), which raises the threshold for contracting works using the direct procedure to 150,000 euro and allows negotiated procedures for works from 150,000 to 350,000 euro.

III.2 PUBLIC FINANCE: POLICY SCENARIO

Budget planning for the coming years

In the face of the trends described above, the policy scenario for 2019 revises certain capital revenue items upwards and, at the same time, the refinancing of so-called unchanged policies.

Moreover, in conjunction with the publication of this Stability Programme, the Government has approved two decree-laws including, respectively, measures to stimulate private investment and the investment by local governments (Decree Law ‘Crescita’) and measures to streamline the procedures for approving public works and private construction projects (Decree Law ‘Sblocca Cantieri’). The new

measures are illustrated in detail in the National Reform Programme. The net borrowing of general government in 2019 is confirmed at 2.4 percent of GDP.

As regards the next three years, the policy scenario targets net borrowing of general government of 2.1 percent in 2020 and then 1.8 percent in 2021 and 1.5 percent in 2022. The structural balance improves by 0.2 percentage points of GDP in 2020 and 0.3 per year in 2021 and in 2022, down from -1.5 percent of GDP in 2019 to -0.8 percent in 2022, in line with a gradual convergence towards the structural balanced position.

The policy scenario reflects greater public investment compared with the scenario at unchanged legislation, increasing over the course of the three-year period (projections under unchanged legislation already take into account a considerable increase in public investment in 2020). Public investment will rise from 2.1 percent of GDP in 2018 up to 2.6 percent of GDP in 2021 and 2022.

TABLE III.2: DIFFERENCES COMPARED TO THE PREVIOUS STABILITY PROGRAMME (1)

	2018	2019	2020	2021
REAL GDP GROWTH RATE				
Stability Programme 2018	1.5	1.4	1.3	1.2
Stability Programme 2019	0.9	0.2	0.8	0.8
Difference	-0.6	-1.2	-0.5	-0.4
NET BORROWING (%GDP)				
Stability Programme 2018	-1.6	-0.8	0.0	0.2
Stability Programme 2019	-2.1	-2.4	-2.1	-1.8
Difference	-0.5	-1.6	-2.1	-2.0
PUBLIC DEBT (%GDP)				
Stability Programme 2018	130.8	128.0	124.7	122.0
Stability Programme 2019	132.2	132.6	131.3	130.2
Difference	1.3	4.6	6.6	8.2

1) Discrepancies, if any, are due to rounding. Forecasts based on unchanged legislation for the Stability Programme 2018, policy-scenario objectives for the Stability Programme 2019.

The existing tax legislation is confirmed pending the definition of alternative measures in the next few months, in the preparation for the 2020 Budget Law. Additional increases in revenue are also forecast for 2021 and 2022, deriving mainly from measures to strengthen the fight against tax evasion.

In addition to the measures in terms of revenue, a comprehensive review of public expenditure will also be implemented with growing effects over time.

TABLE III.3: CASH BALANCES OF THE STATE SECTOR AND THE PUBLIC SECTOR (1)

	2018		2019	2020	2021	2022
	Level (2)	As % of GDP	As % of GDP			
Public Sector	-41,107	-2.3	-3.2	-2.4	-2.1	-1.3
Central government	-43,610	-2.5	-3.4	-2.5	-2.2	-1.9
State sector	-45,219	-2.6	-3.4	-2.5	-2.2	-1.9
Local government	2,504	0.1	0.1	0.1	0.1	0.1
Social security funds	0	0.0	0.0	0.0	0.0	0.0

(1) The first row shows policy scenario objectives, the remaining values describe the trends under unchanged legislation.
(2) Values in millions.

Results achieved in terms of structural balance and expenditure rule

The European rules require each Member State in the European Economic and Monetary Union to achieve the medium-term objective (MTO) of structural balance, such as to ensure the sustainability of public finances and compliance with the debt and deficit parameters agreed at European level even during cyclical fluctuations of the economy. Law 243/2012, which lays down detailed rules for the implementation of the budget balance of art. 81 of the Italian Constitution[8], has identified the balanced budget as the MTO[9]. If the structural budget balance foreseen for the year in progress does not correspond to the MTO, Italian legislation, in line with the European framework, requires the Government to establish a gradual path of convergence to reach this balance.

Each Member State has a specific medium term objective of structural balance calculated every three years on the basis of a methodology agreed at a European level. The value resulting from the revision of the MTO is considered a minimum level, therefore Member States may choose to pursue more ambitious objectives. To date, Italy had chosen a target coinciding with the structural balanced budget, despite the fact that, according to official calculations, the MTO for the period 2017-2019 corresponded to a structural balance of -0.5 percent of GDP. In January 2019, the European Commission revised the reference MTO estimates for the period 2020-2022. For Italy, the new reference value is a structural surplus of 0.5 percent of GDP. The revision was influenced in a decisive manner by the deteriorating forecasts for long-term economic growth and demographic forecasts (with an increase in expenditure linked to the cost ageing). As a result of the recalculation, this Stability Programme adopts the new value of 0.5 percent of GDP as reference MTO from the 2020 fiscal year; for 2019, the reference value that forms the basis of the path of convergence is the MTO 2017-2019 (balanced budget).

FOCUS

The three-year review of the Medium Term Objective of structural balance

EC Regulation 1466/97 on ‘Strengthening of the surveillance of budgetary positions and the surveillance and coordination of economic policies’, as amended in 2011, provides for an MTO review every three years, following the updating of the Ageing Report[10]. The MTO is the most stringent of the three different structural balances that serve different but complementary purposes: i) the ‘Minimum Benchmark’ (MB)[11]: the minimum structural

[8] Introduced by Constitutional Law No. 1/2012.

[9] Law No. 243/2012 ‘Provisions for the implementation of the principle of a balanced budget pursuant to article 81, paragraph 6 of the Constitution’, published in Official Journal No. 12 of 15 January 2013.

[10] European Commission, 2018 Ageing Report: Economic & Budgetary Projections for the 28 EU Member States (2016-2070): https://ec.europa.eu/info/publications/economy-finance/2018-ageing-report-economic-and-budgetary-projections-eu-member-states-2016-2070_en.

[11] The Minimum Benchmark is revised annually. According to the Commission’s calculation methodology, the MB for Italy has gone from -1.7 (estimated in 2012) to -0.8 (valid for 2019) in just a few years. In the past, the MB fluctuated significantly. Similar problems have also occurred in other European countries, generally those more affected by the crisis over a prolonged period (e.g.: Spain, Greece). In order to obtain less volatile MB estimates, the Commission, in agreement with the Member States, has modified the methodology used to take into greater account the volatility of the economic cycle of the various countries. The MB for Italy in 2020 recalculated using the new methodology is -1.4. It is recalled that the MB is of considerable significance because, in addition to its potential effect on the MTO, it also affects the possibility of obtaining a flexibility clause for investments or structural reforms in the path of adjustment towards the MTO. One of the requirements for the request is indeed to achieve a structural balance that is better than the MB in the year in progress.

balance that ensures, with a high degree of probability, that, in the event of a recession, the nominal deficit does not exceed the threshold of 3 percent of GDP; (ii) the 'Medium-Term Objective Implicit Liabilities and Debt' (MTOILD): the budget balance that ensures the sustainability of public finances taking into account: a) the effort required to stabilize debt at 60 percent of GDP; b) for countries with a debt of more than 60 percent of GDP, the extra effort needed to bring the debt within this threshold; c) a percentage (33 percent) of greater expenditure (implicit liabilities) linked to population ageing; finally, iii) for countries in the Euro area the structural deficit cannot fall below 1 percent of GDP (-0.5 percent for the signatories of the *Fiscal Compact*).

In the calculation of the new MTO, for Italy the most stringent criterion is the MTOILD, (case ii), calculated as the arithmetic sum of the three components a), b) and c). The transition from -0.5 percent to +0.5 percent is principally linked to the updating of the indicator that estimates the dynamics of ageing-related public spending (cost of ageing), component c. In the past, this component had a high, negative value and served to reduce the sum of the three components. The new long-term growth and demographic projections have significantly altered this positive effect: the cost of ageing has risen from -0.4 to 1.1.

During the European semester, within the context of the preventive arm of the Stability Pact, the European Commission assesses the trend in structural budget and public balances policy targets for subsequent years and verifies the consistency with the path of convergence to the MTO in the medium term. The speed of convergence depends on the initial level of debt and by the cyclical conditions of the economy, evaluated on the basis of real growth and the distance between the real GDP and the specific potential GDP for each country. In the event of unfavourable cyclical conditions, the wider the (negative) gap between the actual and potential product, the smaller the fiscal adjustment effort required. In addition, other factors being equal, effort increases for countries with a debt-to-GDP ratio above 60 percent.

In addition to consistency with the MTO, the other criteria used for the European Commission's assessment of the budget plan is the expenditure rule. This criterion requires the rate of growth of the 'relevant' aggregate of public spending to be below a certain threshold based on the average growth rate of potential GDP. It should be noted that any deviations from the path of convergence to the MTO and to the expenditure rule are deemed significant only if greater than a tolerance threshold established by the European fiscal framework. For more details, see the Focus 'Assessment of significant deviations from convergence to the MTO and the expenditure rule'.

FOCUS

Assessment of significant deviations from convergence to the MTO and the expenditure rule

The preventive arm of the Stability and Growth Pact (SGP) requires that the path of convergence to the Medium Term Objective be assessed on the basis of two criteria: (i) the variation in structural balance and (ii) the expenditure rule.

As regards the **structural balance variation** criterion, the annual size of the fiscal adjustment required is extrapolated on the basis of a matrix that considers the following parameters[12]: (i) the cyclical conditions of the economy as summarised by the output gap and real growth;

[12] See the matrix that specifies the annual adjustment towards the MTO on the basis of the situation of the economic cycle outlined in the Commission Communication '*Making the best use of flexibility within the existing rules of the Stability and Growth Pact*' of 13 January 2015.

(ii) the level of the debt-to-GDP ratio; and (iii) the existence of medium-term risks to the sustainability of public finances assessed on the basis of the S1 index[13]. The annual adjustments modulated on the basis of cyclical conditions may be reduced by the application of the flexibility clauses[14], following the Commission guidelines issued in January 2015.

The **matrix of convergence towards the MTO** requires greater balance adjustment for Member States that are in a favourable economic situation, i.e. when their gap between the actual and potential product is estimated to be at least 1.5 percent. In this cyclical condition, Member States that pose a risk to the sustainability of the budget or whose debt-to-GDP ratio is higher than 60 percent, are obliged to implement a structural balance adjustment of at least 0.75 percent of GDP (1 in the case of real growth higher than potential growth). In periods of normal economic situation (when the gap between actual and potential product is between -1.5 and +1.5 percent), the States with a high level of debt must implement adjustment greater than 0.5 percent of GDP. In times of economic recession (i.e. when the gap between the actual and potential product is between -3 and -1.5 percent), the required adjustment is 0.25 percent of GDP (0.5 when economic growth exceeds potential). In periods of severe economic recession (when the gap between the actual and potential product is between -4 and -3 percent) the Member States with high debt must implement balance adjustment of 0.25 percent of GDP. In periods of exceptionally severe recession, defined as periods characterized by a gap between the actual and real product of less than -4 percent or in the case of contraction of real GDP, all Member States, regardless of the level of debt, are temporarily exempted from making budgetary efforts.

The latest Commission output gap projections (included in the 2018 Autumn Forecast) estimate an output gap for Italy above -1.5 percent as early as 2017. Therefore, according to the Commission estimate, Italy has already enjoyed normal cyclical conditions for two years. Consequently, the matrix quantifying the fiscal adjustments required according to the cyclical conditions of the economy and of the level of public debt requires Italy to improve the structural balance each year by at least 0.6 percentage points of GDP. In the event that the distance between the structural balance and the MTO is less than the requirement according to the matrix (as happened for Italy in 2015), this distance is taken as a reference for the necessary adjustment[15].

With regard to the **expenditure rule**, the European regulations[16] stipulate that, for the countries that have not yet achieved their MTO, the aggregate reference expenditure[17] may grow at a rate equal to the difference between the average growth rate of potential GDP[18] and the so-called convergence margin. The convergence margin is in turn calibrated in

[13] For example, in 'normal' cyclical conditions represented by an output gap of between -1.5 percent and 1.5 percent of potential GDP, a country that has a debt-to-GDP ratio above 60 percent and medium sustainability risks (according to S1) must converge to its MTO by means of reducing the structural balance by over 0.5 percentage points of GDP.

[14] Flexibility is granted in response to structural reforms and investment or following unusual events outside government control, such as: serious recessions or earthquakes or the materialization of migrant-related expenditure.

[15] For more details, see the annual publication of the European Commission, Vademecum on the Stability and Growth Pact, 2018 Edition, Box 1.6 'Defining the appropriate adjustment path'.

[16] Transposed into national legislation by Law No. 243/2012.

[17] This aggregate is obtained by deducting, each year, from total public expenditure: interest expenditure; investment spending in the current year smoothed on the basis of the trend of the previous four years; expenditure for EU programs financed by the Community budget; the cyclical component of unemployment benefits and the variation in Discretionary Revenue Measures.

[18] The average growth rate of potential is calculated on the basis of the production function methodology agreed at European level, considering a ten-year average of the European Commission Forecasts centred on the year in which the assessment is performed. The ten-year average therefore includes the four years preceding the year of the evaluation and the following five years (two-year forecast and mechanical extrapolation for the following three).

relation to the cyclical conditions of the economy[19] and further revised in the case of the application of the flexibility clauses.

Finally, it is recalled that the assessment relating to the path of convergence of the structural balance towards the MTO and evolution of expenditure is performed both for the individual single year, and for the two-year average. European Regulation No. 1466/97 requires that a margin of tolerance is applied when assessing whether a deviation from the MTO and the expenditure rule benchmark is significant. The deviation should be at least 0.5 percent of GDP on an annual basis and 0.25 percent of GDP on a two yearly basis in order to be significant and activate the corrective arm of the excessive deficit procedure. This means that, if the margin of tolerance with respect to the annual criterion is used in a given year, it must be offset by greater structural effort in the following year.

From 2015, the required improvement in terms of structural balance has been mitigated by the margins of flexibility granted to Italy by the European Commission to finance structural reforms, infrastructure investments and to cope with exceptional events that have led to unexpected costs (such as natural disasters and the influx of migrants). For a detailed quantification of the flexibility afforded, see Table III.4.

TABLE III.4: FLEXIBILITY GRANTED TO ITALY IN THE STABILITY PACT (1)

	2015	2016	2017	2018	2019	2020	2021	2022
Output gap EFD 2019 (% of potential GDP)	-4.34	-3.15	-1.80	-1.53	-1.72	-1.56	-1.63	-1.57
Cyclical conditions	Exceptionally bad	Very bad	Negative	Negative	Negative	Negative	Negative	Negative
Estimated adjustment on the basis of cyclical conditions and the level of debt (pp of GDP)	0.08	0.25	0.50	0.50	0.25	0.50	0.25	0.50
Flexibility granted (pp. of GDP) of which:	0.03	0.83	0.39(1)	0.00	0.18	0.00	0.00	0.00
a) for activation of flexibility clauses:								
structural reforms	0.00	0.50	0.00	0.00	0.00	0.00	0.00	0.00
investments	0.00	0.21	0.00	0.00	0.00	0.00	0.00	0.00
b) for activation of the clauses for unusual events:								
refugees	0.03	0.06	0.16	0.00	0.00	0.00	0.00	0.00
security costs	0.00	0.06	0.00	0.00	0.00	0.00	0.00	0.00
costs of protecting and securing national territory	0.00	0.00	0.19	0.00	0.18	0.00	0.00	0.00
Estimated adjustment corrected for flexibility clauses and unusual events (pp. of GDP)	0.05	-0.58	0.11	0.50	0.07	0.50	0.25	0.50
Margin of discretion				0.30				

(1) In accordance with the calculation procedures established by the European Commission, for 2017, the calculation of flexibility granted takes into account the structural balance at t-1, the distance from the MTO and the clauses granted in the last three years, being more favourable than the simple sum of the clauses granted for the same year.

[19] For example, under 'normal' cyclical conditions, the aggregate reference expenditure must be reduced so as to ensure an annual improvement in the structural balance of at least 0.6 percent of GDP.

FOCUS

Flexibility request for exceptional events: early actions

With the Update of the Macroeconomic and Public Finance Framework in December 2018, the Government asked the European Commission to grant Italy budget flexibility for the year 2019 for a total of around 3.7 billion (corresponding to just under 0.2 percent of GDP), for an extraordinary plan of actions to counteract hydrogeological instability and exceptional measures to improve the safety of the Italian connection network. Main initiatives adopted to date are the following.

Extraordinary plan of actions to improve the safety of the Italian territory and population against the risks of hydrogeological instability: Prime Ministerial Decree 'ProteggItalia'

Prime Ministerial Decree of February 20 2019 ('ProteggItalia') adopted the 'National Plan for the mitigation of hydrogeological risks, the restoration and protection of the environment'. It aimed to define, among other things, the specific areas and actions to be taken, a unitary framework concerning the requirements, the distribution among the aforesaid areas and actions to be taken, the system of governance and the schedule of activities. The Prime Ministerial Decree establishes an immediate plan for 2019 outlining the urgent and non-deferrable actions up to the contribution of an overall amount 3 billion euro. The overall financial resources available amount to over 14 billion. The first 3.3 billion had already been used for the annual allocation of resources to the Commissioner-Delegates, foreseeing the possibility of financing the planning to be undertaken in 2019 alone, as well as methods to simplify and speed up procedures, such as the transfer of an advance share of 30 percent of the allocation for the year 2019 and the immediate reprogramming of unused resources. Even for ordinary interventions, the Ministry of the Environment has proposed regulatory measures to simplify and rationalize existing procedures in order to reduce national and regional authorisation times and to tackle planning deficiencies and to strengthen the governance of the Commissioners. The acceleration measures introduced are intended to allow the actual implementation of actions for a total estimated expenditure of approximately 2.5 billion in 2019.

Extraordinary plan for improving the safety and maintaining the infrastructure of the Italian connection network

Under the programme agreement between the Ministry of Infrastructures and ANAS S.p.A. 2016-2020, following a recon of the security status of the national road network, the most urgent maintenance and safety measures were identified, with particular regard to bridges, viaducts and tunnels, with an additional extraordinary maintenance plan for the current three-year period of a total value of between 1.7 and 2 billion. These resources are in addition to those intended for securing measures to be implemented for local road networks and public buildings assigned directly to municipal and regional authorities and allocated by the Budget Law for 2019, which amount to just under 2 billion overall for the three-year period 2019-2021. These measures described aim to enabling the implementation of actions to improve the network for a total estimated expenditure of around 1 billion in 2019.

If, based on the assessment of the Commission, the Council considers it appropriate to reinforce public finance objectives, it may invite the Member State to amend the planning through a Commission Recommendation, as laid down by articles 5.2 and 9.2 of European Regulation No. 1466/97.

Following the presentation of the 2019 Draft Budgetary Plan, the Commission found a non-significant deviation from the path of convergence to the MTO for both 2016 that 2017[20].

[20] European Commission, Report from the Commission - Italy. Report prepared in accordance with Article 126(3) of the Treaty on the functioning of the European Union. COM (2018) 809 final. It should be noted that in

The next evaluation on compliance with the path of convergence to the MTO and the expenditure rule will be undertaken by the Commission on the basis of this Stability Programme, which Italy, like the other Member Countries, will send to the Council of the European Union and the Commission by 30 April. In particular, the Commission will assess compliance with the MTO or the consistency of the adjustment path toward this objective: i) *ex post* for 2018; (ii) on the basis of the data available for the current year, 2019; and (iii) *ex ante*, for the following three years (2020 - 2022).

For 2018, the Commission has confirmed that already stated in July 2017[21] i.e. in the case of Italy, its intention to apply a 'margin of discretion' to the fiscal adjustment necessary for achieving the MTO in order to combine the requirements of sustainability of public finances and stabilization of the economy. In concrete terms, fiscal adjustment of 0.3 percent of GDP will be deemed appropriate for Italy in view of the fact that greater fiscal effort would have severe implications for economic recovery[22].

Based on the data released by ISTAT on 9 April 2019[23], in 2018 the net borrowing of general government was 2.1 percent of GDP higher than the estimate of 1.9 percent of GDP declared in the Update of the Macroeconomic and Public Finance Framework published in December 2018. The variation in structural balance was instead zero and, in the first place, it deviates from the planned objective for the nominal component, due to the occurrence of capital expenditure above expectations.

The structural balance was also penalised by the reduction of the adjustment of the nominal balance due to the effects of the economic cycle. The unexpected and drastic downward revision of the forecast of real growth for the years following 2018 led to the adjustment of potential GDP and the output gap. This had a significant and unforeseeable impact on the cyclical component of the budget balance for 2018. If the evaluation of the gap between real GDP and potential GDP for 2018 had remained at -1.7 percentage points, as forecast in the Update of the Macroeconomic and Public Finance Framework submitted last December, the balance of the structural budget would have been -1.3 percent of GDP instead of the -1.4 obtained with the new estimates. The fiscal effort for 2018 would therefore have stood at 0.1 points of GDP.

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the ex post evaluation for 2017, Italy was granted higher expenditure of 0.4 percent of GDP for the exceptional and urgent measures linked to the reception of migrants, earthquake prevention and safeguarding national territory. In consideration of this, the fiscal effort required to achieve the MTO in 2017 was reduced by the same amount.

[21] Recommendation of the Council of the European Union of 11 July 2017 on Italy's 2017 National Reform Programme that formulates a Council opinion on Italy’s 2017 Stability Programme (2017/C 261/11): https://eur-lex.europa.eu/legal-content/IT/TXT/PDF/?uri=CELEX percent3A32017H0809 percent2811 percent29

[22] Within the opinion on the DBP 2018, the Commission asked the Government 'to implement this adjustment without deviations of any sort, in such a way as to combine the demands of stabilizing the economy with the challenges of public finance sustainability'. In the context of the Communications on the implementation of the European Semester 2017, the Commission considered it useful to specify that the assessment of compliance of the budgetary measures to be adopted for 2018with the requirements of the Stability and Growth Pact was carried out on the basis of a margin of discretion in order to take into account the objective of achieving a fiscal stance capable of strengthening the prospects for growth and at the same time ensuring the sustainability of public finances in the Euro Area. See the document of the European Commission.

[23] ISTAT, GDP and Net Borrowing of General Government: Update, 9 April 2019: https://www.istat.it/it/archivio/229326

Finally, the structural balance for 2018 was further deteriorated by a variation in temporary measures (one-off measures) that must be separated from the budget balance because they are not structural. Compared to the DBP 2019, these measures recorded an increase in revenue and a reduction in one-off expenses.

With reference to 2019, following consultations with the Commission and the agreement reached (see Focus ‘Dialogue with the European Commission on the 2019 Draft Budgetary Plan’), the Italian Government undertook to achieve a zero variation in the structural balance of the budget. The agreed target takes account of an extraordinary plan of actions intended to counteract hydrogeological risk and to improve the security of road network infrastructures, such as viaducts, bridges and tunnels. The impact of these costs on the 2019 budget is around 0.2 percent of GDP. Because of their exceptional and urgent nature, the Government asked the Commission to grant and equal amount in budget flexibility, and retain the option to request such flexibility also for the exceptional costs that it will face post 2019[24]. The Commission acknowledged the request and expressed its willingness to accept it. For 2019, a flexibility of 0.18 percent of GDP was agreed on an *ex ante* basis; in the next few months, dialogue will continue with the Commission with regard to the following years.

The Ministry of Economy and Finance estimates that the net borrowing for 2019 will be at 2.4 percent of GDP. A first reading of the variation in structural balance shows a deterioration of 0.1 percent, an improvement compared to Government forecasts in December. This variation is less than the amount of expenditure required to implement the actions motivating the request for flexibility; the commitment made towards the European Commission is therefore upheld. In addition to this, the structural adjustment required by the matrix is 0.25 percentage points due to the fact that, according to the Government forecasts, real growth that is lower than potential growth and the output gap is less than -1.5 percent. Taking into account the flexibility granted, the required adjustment is thus reduced to 0.07 (see Table III.4). The structural deviation for 2019 with regard to this benchmark is not significant.

For subsequent years, in the face of reduced expectations of growth compared with forecasts in December, the nominal budget balance continues to record increasing primary surpluses. Starting from 2020 and for all the subsequent years, because of the budget plan illustrated at the beginning of the paragraph, the structural balance is expected to improve, as highlighted in Table III.5. The fiscal adjustment for 2020 stands at 0.2 percent of GDP. For the period 2021-2022, the projected adjustment is 0.3 for each year. For the full period of the EFD, Italy, while not following the strictest interpretation of the convergence criteria towards the MTO, does not exhibit any excessive deviation. The current cyclical conditions to achieve full compliance with the rules would require excessively restrictive actions that would be counter-productive for the economy; however,

[24] Annex No. 4 of the letter sent by the Italian Government to the European Commission on 18 December 2018: Data sheet illustrating the request for flexibility to improve the safety of road infrastructures (roads and viaducts) and to mitigate hydrogeological risks: http://www.mef.gov.it/documenti-allegati/2018/Allegato_4_-_richiesta_di_flessibilitx.pdf.

the improvement of the budget balance will be carried forward in both nominal and structural terms.

For the purposes of compliance with the constraints of the so-called 'preventive arm', it is sufficient to demonstrate non-significant deviation from the criterion of convergence towards the MTO. However, the tables below duly outline the public finance policy scenario as regards the expenditure rule.

In relation to the expenditure rule for 2019, the Commission indicated a nominal rate of growth of aggregate expenditure no higher than 0.1 percent.

TABLE III.5: CYCLICALLY ADJUSTED PUBLIC FINANCE (as percentage of GDP)

	2016	2017	2018	2019	2020	2021	2022
1. Growth rate of GDP at constant prices	1.1	1.7	0.9	0.2	0.8	0.8	0.8
2. Net borrowing	-2.5	-2.4	-2.1	-2.4	-2.1	-1.8	-1.5
3. Interest expenditure	3.9	3.8	3.7	3.6	3.6	3.7	3.8
4. One-off measures (2)	0.2	0.0	0.1	0.1	0.1	0.1	0.1
of which: *Revenue measures*	0.3	0.5	0.2	0.1	0.1	0.1	0.1
Expenditure measures	-0.1	-0.6	-0.1	0.0	0.0	0.0	0.0
5. Growth rate of potential GDP	-0.1	0.3	0.6	0.4	0.7	0.8	0.7
Factor contributions to potential growth:							
Labour	-0.1	0.2	0.4	0.1	0.3	0.3	0.1
Capital	-0.1	0.0	0.1	0.1	0.1	0.2	0.2
Total Factor Productivity	0.0	0.1	0.1	0.2	0.3	0.3	0.4
6. Output gap	-3.1	-1.8	-1.5	-1.7	-1.6	-1.6	-1.6
7. Cyclical component of the budget balance	-1.7	-1.0	-0.8	-0.9	-0.8	-0.9	-0.9
8. Cyclically adjusted budget balance	-0.8	-1.4	-1.3	-1.4	-1.2	-0.9	-0.7
9. Cyclically adjusted primary surplus	3.1	2.4	2.4	2.2	2.4	2.8	3.2
10. Structural budget balance (3)	-1.0	-1.4	-1.4	-1.5	-1.4	-1.1	-0.8
11. Structural primary surplus (3)	2.9	2.4	2.3	2.1	2.2	2.6	3.1
12. Variation in structural budget balance	-0.9	-0.4	0.0	-0.1	0.2	0.3	0.3
13. Variation in structural primary surplus	-1.1	-0.5	-0.1	-0.2	0.2	0.4	0.4

(1) Discrepancies, if any, are due to rounding.
(2) The positive sign indicates one-off measures to reduce the deficit.
(3) Cyclically adjusted net of one-off and other temporary measures.

The revision of growth estimates and the output gap, and the request for flexibility for expenditure related to hydrogeological risk and operations to improve the road network led to readjust the public spending convergence path, allowing an increase of up to 1.3 percent on the previous year. From current estimates, public spending will be up 1.7 percent in 2019, creating a non-significant annual deviation. The deviation is significant compared to the 2018-2019 average but the distance from the recommended path, net of tolerance margins, is not great. There is a significant deviation full for 2020, both on an annual basis and for the two-year period, but the policy scenario is better off than that based on unchanged legislation.

TABLE III.6: EXPENDITURE TO BE EXCLUDED FROM THE EXPENDITURE RULE

	2018		2019	2020	2021	2022
	Level (1)	% of GDP	% of GDP			
Expenditure for EU programmes fully covered by EU funds	1,575	0.1	0.1	0.1	0.1	0.1
- *of which expenditure for investments fully covered by EU funds*	708	0.0	0.1	0.1	0.1	0.1
Cyclical expenditure component for unemployment benefits (2)	933	0.1	0.1	0.1	0.0	0.0
Discretionary revenue (3)	1,124	0.1	0.2	1.0	0.1	-0.1
Revenue increases already identified by law	0.0	0.0	0.0	0.0	0.0	0.0

(1) Values in millions.

(2) The cyclical expenditure component for unemployment benefits was calculated using the methodology currently used by the European Commission, based on the unemployment gap.

(3) Discretionary contribution revenue is included.

TABLE III.7: SCENARIO AT UNCHANGED POLICIES

	2018		2019	2020	2021	2022
	Level (1)	% of GDP	% of GDP			
Total revenue under unchanged policies	816,113	46.4	46.5	47.1	47.0	46.7
Total expenditure under unchanged policies	853,618	48.6	48.9	49.3	49.1	49.0
Detailed items of expenditure						
Current expenditure	795,253	45.3	45.7	45.8	45.6	45.4
of which:						
Compensation of employees	171,826	9.8	9.7	9.6	9.4	9.3
Intermediate consumption	143,855	8.2	8.1	8.1	8.0	7.9
Capital expenditure	58,365	3.3	3.2	3.5	3.5	3.6
of which:						
Gross fixed capital formation	37,081	2.1	2.2	2.4	2.5	2.6
Investment grants	13,899	0.8	0.7	0.8	0.8	0.8

(1) Values in millions.

The tables below provide more detailed information on the convergence to the MTO in the policy scenario and on compliance with the expenditure rule.

TABLE III. 8: SIGNIFICANT DEVIATIONS

Convergence of the structural balance towards the MTO	2016	2017	2018*	2019	2020	
					Policy scenario	At unchanged legislation
Net borrowing	-2.52	-2.39	-2.13	-2.37	-2.09	-1.97
Medium-Term Objective (MTO)	0.00	0.00	0.00	0.00	0.50	0.50
Structural Balance	-1.02	-1.37	-1.40	-1.54	-1.36	-1.21
Annual variation in structural balance(**)	-0.75	-0.36	-0.02	-0.14	0.17	0.36
Requested variation in structural balance	-0.58	0.11	0.30	0.07	0.50	0.50
Deviation of the structural balance from the annual variation requested (<0.5 pp.)	-0.42	-0.47	-0.32	-0.21	-0.33	-0.14
Average variation in structural balance (over two years)	-0.30	-0.55		-0.08	0.02	0.13
Average variation requested	-0.26	-0.24		0.19	0.29	0.29
Deviation of the structural balance from the average variation requested (<0.25 pp.)	-0.04	-0.32		-0.27	-0.27	-0.16

Expenditure rule	2016	2017	2018*	2019	2020	
					Policy scenario	At unchanged legislation
Rate of growth of the reference aggregate expenditure (***) (%)	0.89	0.25	1.79	1.72	0.54	0.40
Benchmark modulated on the prevailing cyclical conditions (***) (%)	1.29	-0.35	0.50	1.31	0.50	0.28
Deviation of aggregate expenditure from the annual variation requested (<0.5 pp.)	0.10	-0.31	-0.56	-0.18	-0.02	-0.05
Deviation of aggregate expenditure from the average variation requested over 2 years (<0.25 pp.)	0.27	-0.10		- 0.37	- 0.10	-0.13

* In 2018, the variation requested is 0.3 for discretion margin.
** As regards the assessment of the convergence towards the MTO and compliance with the expenditure rule, in line with the procedures agreed at Community level, for the years prior to 2018, the values calculated by the European Commission in its forecast years are taken as reference.
*** In real terms up to 2017, nominal terms from 2018.

FOCUS

Dialogue with the European Commission on the 2019 Draft Budgetary Plan

In May 2018, in assessing compliance with the tax rules, the Commission concluded that Italy had failed to comply with the debt reduction criterion. On the basis of the economic forecasts published by the European Commission in Spring 2018 (Spring Forecast 2018), the Italian public debt for both 2016 and 2017 failed to pursue a path of reduction such as to guarantee the achievement of the objective of a debt-to-GDP ratio of 60 percent in 20 years. This deviation also seemed to be confirmed for subsequent years: in fact, the debt-to-GDP ratio forecast for 2018 and 2019 was greater than the reference value that would have allowed the gradual convergence towards the debt target established in the Stability and Growth Pact.

As required by article 126, paragraph 3 of the Treaty on the Functioning of the European Union (hereinafter referred to as the Treaty), the Government submitted to the attention of the Commission certain relevant factors justifying the temporary deviation. In particular: i) the improvement of the growth prospects that would ensure debt reduction, ii) compliance with the adjustment path towards the MTO in 2017; iii) the launch and implementation of certain important structural reforms that would strengthen economic growth.

In the final report of 23 May 2018, the Commission went back on its judgement, concluding that Italy was meeting the debt criterion, although the structural effort for 2018 had to be amplified so as not to deviate from the path of the MTO. On this occasion, the Commission

reiterated the crucial nature of the ex post evaluation of 2018 to be performed in the spring of the following year.

On the occasion of the 2019 Draft Budgetary Plan (DBP), the Government revised the public finance objectives and the economic planning strategy, expanding them to accompany economic recovery and revive consumption. This strategy immediately highlighted a deterioration of the structural deficit for 2019 of 0.9 percent of GDP. It is recalled that on July 13 2018 the Council of the European Union had recommended to Italy a structural adjustment of 0.6 points of GDP for 2019. In the primary evaluation of the DBP, the Commission encountered the failure to comply with the adjustment required to converge to the MTO and, on October 23, requested a revision of budgetary plan through a new DBP. On November 13, the Italian Government submitted a new version of the DBP to the Commission, in which it confirmed the expansionary fiscal trend.

On November 21 2018, the Commission adopted a second opinion confirming the particularly serious non- compliance with recommendations made to Italy by the Council and confirming the risk of significant deviation from the path of adjustment towards the MTO for 2018 and 2019. Given that Italy's budgetary plan for 2019 substantially modified the relevant factors analysed in the previous report of May 2018, the European Commission updated the report pursuant to article 126, para. 3 of the Treaty. As a result of that analysis, the Commission amended its judgement regarding compliance with the debt criterion in 2017 and proposed the opening of an infringement proceedings for excessive debt. On November 29, the Economic and Finance Committee drafted an opinion pursuant to article 126, para. 4 of the Treaty, in which it confirmed the conclusions of the Commission and expressed its hope for constructive dialogue between the Commission and the Italian authorities. On December 3, the Eurogroup also shared the Commission's assessment, recommending that Italy adopt the necessary measures to comply with the Stability and Growth Pact and expressing its support for the ongoing dialogue between the Commission and the Italian authorities.

The intense negotiations between the Commission and the Government led to the adoption of additional fiscal measures in the 2019 Budget Law, such as to enable the Commission to avoid launching infringement proceedings. In the letter of December 18, the Italian Government reiterated its willingness to make improvements to the final balances included in the 2019 budget, in compliance with the findings of the Commission and further technical evaluations. At that time, the Government also asked to use the flexibility clause for 2019 to finance a plan of extraordinary action to counteract hydrogeological instability and to improve the safety of the Italian connection network infrastructure. In the letter of reply sent on 19 December 2018, the Commission acknowledged the budgetary measures that the Italian Government intended to submit to Parliament as an amendment to the draft 2019 Budget Law. The adoption of such measures - including the safeguard clause that foresees the provision of 2 billion euro and the relative accounts monitoring system - in the 2019 Budget Law (Law No. 145 of 30 December 2018) thus enabled the Commission to avoid recommending the opening of proceedings for excessive deficit at this stage. The Commission will continue its fiscal monitoring with particular focus on the execution of the budget for 2019, in the context of the European semester and the coordination of economic policies at European level.

III.3 FINANCIAL IMPACT OF THE MEASURES OF THE NATIONAL REFORM PROGRAMME (NRP)

The legislative measures considered in this section in order to measure their financial impact are divided into ten policy areas. They refer to the measures that completed the parliamentary process from April 2018 to March 2019.

The financial effects are assessed in terms of higher/lower revenue and higher/lower expenditure for both the State Budget and the general government, and are quantified with reference to the relative balances. The estimation of measures' impact, with the exception of certain cases, highlights the 'costs' and 'benefits' of the public finance measures, regardless of the financing found in every measure. The impact on the balance of the State Budget (net balance to be financed)[25] is reported, for each area, in the following table, which includes all the provisions that affect public finance in the period of observation.

In particular, for the three-year period 2019-2021, the most significant updates, from a financial point of view, are:

- an increase in total expenditure of around 133 billion relating mainly to 'Labour and Pensions'. In particular, we highlight the costs of introducing the 'Citizen's Income' and 'Quota 100', the two main actions in support of employment, the fight against poverty and social exclusion. These provisions also comply with EU Recommendation No. 4/2018 on labour and poverty. We also highlight the measures in favour of the relaunch of public investment and the Regional and Local Authority Investment Fund.
- a reduction in expenditure of around 16.6 billion for the State Budget. One of the most significant measures is the contribution to public finance by regional authorities under ordinary statute introduced by Law No. 145/2018 in art. 1, paragraph 841 ('Infrastructure and Development').
- a reduction in revenue of around 47.5 billion during the period under examination. The measures which give rise to lower revenue for the State Budget refer mainly to 'Public expenditure and taxation' and relate, inter alia, to the sterilization of the clauses on VAT rate and excise duty in the year 2019, the abrogation of the optional regime of corporate income tax (IRI; which also has a significant impact in terms of increased revenue) and the adoption of the flat-rate contribution scheme for natural persons performing business, artistic or professional activities ('Flat Tax').
- an increase in revenue of around 50.8 billion was mainly due to both the repeal of the optional corporate income tax regime (IRI) and the provisions of the Budget Law on VAT hikes and excise rates (from 2020).

[25] This choice is mainly due to the importance of central government in the definition and implementation of the measures.

TABLE III.9: FINANCIAL IMPACT OF THE MEASURES IN THE NRP GRIDS (in millions)

	2019	2020	2021
Administrative efficiency			
Higher revenue	0	0	0
Higher expenditure	159	303	329
Lower revenue	0	0	0
Lower expenditure	9	7	7
Energy and environment			
Higher revenue	223	698	92
Higher expenditure	915	1,047	1,074
Lower revenue	105	1,116	959
Lower expenditure	36	83	36
Federalism			
Higher revenue	0	415	222
Higher expenditure	0	12	10
Lower revenue	261	629	506
Lower expenditure	0	0	0
Infrastructure and development			
Higher revenue	0	0	1
Higher expenditure	7,932	7,080	4,310
Lower revenue	2,502	2,511	10
Lower expenditure	2,723	1,956	330
Innovation and human capital			
Higher revenue	0	0	0
Higher expenditure	525	865	884
Lower revenue	0	0	0
Lower expenditure	88	396	423
Work and pensions			
Higher revenue	299	56	111
Higher expenditure	23,729	34,469	35,436
Lower revenue	175	523	817
Lower expenditure	1,073	2,085	2,942
Market for products and competition			
Higher revenue	234	318	351
Higher expenditure	234	74	0
Lower revenue	150	201	201
Lower expenditure	0	0	0
Financial system			
Higher revenue	1,506	15	19
Higher expenditure	556	575	575
Lower revenue	45	195	184
Lower expenditure	165	3	2
Support for enterprises			
Higher revenue	18	2,156	1,228
Higher expenditure	375	344	206
Lower revenue	388	2,664	3,018
Lower expenditure	391	396	398
Public expenditure and taxation			
Higher revenue	11,261	12,255	19,275
Higher expenditure	2,478	4,791	3,925
Lower revenue	16,679	6,530	7,109
Lower expenditure	893	724	1,438

NB: The effects of Law No. 145/2018 (State Budget for the financial year 2019 and Multi-annual Budget 2019-2021) in terms of higher/lower revenue and higher/lower outgoings only refer to Section I.
Source: RGS analysis on data from Annexes 3, the technical reports and information given in official documents. The resources of action and cohesion programmes and of the various funds allocated for European measures are excluded.

III.4 TREND OF DEBT-TO-GDP RATIO

The data of the last few years outline a stabilisation trend of the debt-to-GDP ratio. Following the statistical revisions of GDP and the definition of general government perimeter performed by ISTAT[26], and those of the debt stock provided by the Bank of Italy[27], the debt-to-GDP ratio stood at 131.4 percent in 2016 and 2017. The 2016 figure remains unchanged compared to the previous September estimate of 131.4 percent, while that of 2017 is revised upwards compared with the previous value of 131.2 percent of GDP.

In 2018, the estimated increase in debt-to-GDP ratio on 2017 is 0.8 percentage points. The preliminary data of 132.2 percent is higher than the target of 131.7 percent indicated in the Update to the Macroeconomic and Public Finance Framework published in December 2018 following the dialogue with the European Commission. This divergence is due to lower-than-expected nominal growth of 1.7 percent compared to the 2.1 percent forecast in December 2018.

The increase in the debt-to-GDP ratio in 2018 as compared to 2017 is due to the increase in the borrowing requirement of the public sector but also to the increase in the Treasury's available liquidity of around 0.32 percent of GDP, an increase widely forecast in preceding planning documents to take account of the higher maturities of securities in 2019.

Other technical factors have also driven this trend, such as issue discounts and the so-called 'up-lift', i.e. the effect of the revaluation of securities indexed to inflation. The two factors see overall growth compared to 2017, with an impact of nearly 0.4 percent of GDP. In 2018, in fact, the increase in government securities issuing rates gave rise to a significant volume of issues performed below par, while higher Italian and European inflation than the previous year helped to increase the size of the revaluation. Finally, in 2018, as in 2017, there was a lack of privatisations proceeds that instead were assumed in the preceding policy objectives.

Looking to the determinants of debt, we can see that the increase in the debt-to-GDP ratio of 2018 is accompanied by a strengthening of the primary surplus, estimated at 1.6 percent of GDP, which mitigates the overall effect of the snowball component (quantifying the automatic impact of the difference between the interests and the nominal growth of GDP on the trend in debt-to-GDP ratio) and of the stock-flow adjustment. The renewed increase in the snowball effect is attributable to the lower nominal growth than in 2017, despite the slight fall in interest payable, to 3.7 percent of GDP.

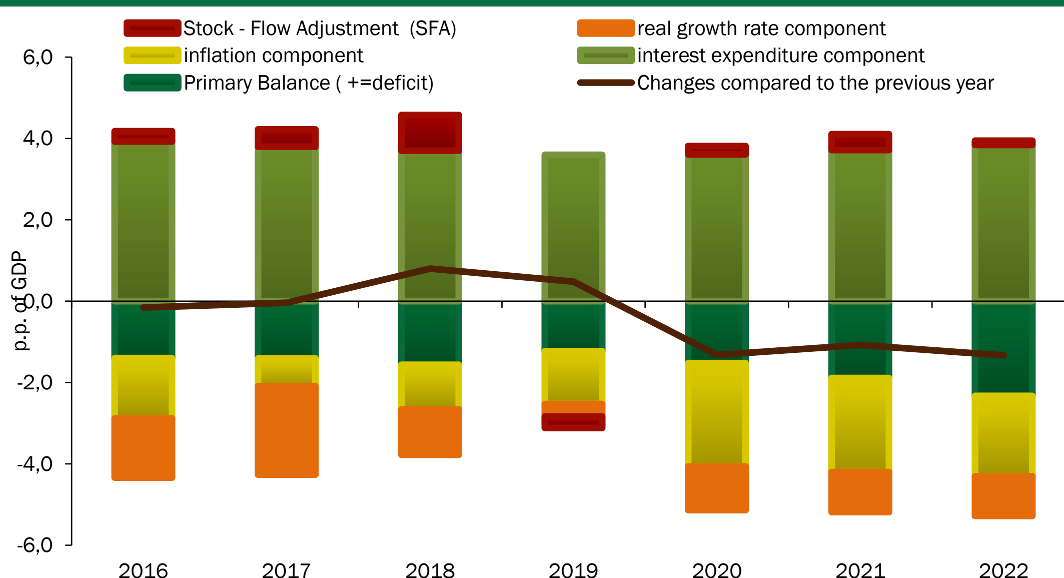
[26] ISTAT release of March 1 2019 'GDP and general government net borrowing', of April 4 2019 'Quarterly general government account, household income and savings and company profits' and of April 9 2019 'GDP and general government net borrowing: update'.

[27] Press Release of Bank of Italy of April 9 2019 'Revised estimates of general government debt for the period 2015-2018'. With regard to the data published in the bulletin of March 15 2019, the broader perimeter of general government led, in particular, to an upward revision of the debt stock of almost 800 million in 2016, over 5.6 billion in 2017 and over 5.9 billion in 2018.

In 2019, the debt-to-GDP ratio forecast stands at 132.6 percent, deferring to the following year the trend reversal expected in the Update to the Macroeconomic and Public Finance Framework, with an increase of around 0.5 percentage points compared to 2018[28]. The upward revision (+2.0 percentage points) of the debt-to-GDP ratio with respect to the latest forecasts[29], is affected in part by the higher level of debt, up by around 0.2 percentage points, mainly resulting from the reclassification inherited from previous years recalled above, and for the remaining part by the significant slowdown in the growth of nominal GDP from the 2.3 percent estimated in December 2018 to the current 1.2 percent.

Treasury's liquidity, which is expected to decrease by about 0.1 percent of GDP, and the assumptions of realization of privatisation proceeds, amounting to 1 percent of GDP, remain in line with that stated in the Update of the Macroeconomic and Public Finance Framework published last December.

FIGURE III.1: PUBLIC DEBT DETERMINANTS (as a percentage of GDP)



Source: From 2019, policy scenario forecasts of the EFD.

In 2019, debt accumulation is fully explained by the snowball effect, which is positive and growing due to the slowdown in nominal growth and an interest-expenditure component stable at 3.6 percent of GDP. In fact, in 2019, a sign reversal is expected in the stock-flow component, which results in a reduction of about 0.3 points of GDP, also due to the effect of the assumptions on proceeds from privatisation.

The trend reversal in debt-to-GDP ratio is expected in 2020, with a value of 131.3 percent, due to a sharp decline expected in public sector borrowing requirement of 2.4 percent of GDP (about 0.7 percentage points of GDP less than in 2019) and a nominal growth accelerating to 2.8 percent. On the other hand, in

[28] Discrepancies, if any, are due to rounding.
[29] Discrepancies, if any, are due to rounding.

2020 the primary surplus will improve by around 0.3 percentage points of GDP, while the snowball effect is expected to reduce significantly, thanks to the growth of nominal GDP and the stabilisation of interest. The decrease in the level of debt also derives from the further reduction in the Treasury's cash availability by around 0.1 percent of GDP and from the proceeds expected from privatisation and other financial gains for 0.3 percentage points of GDP, in line with the assumptions made in December 2018.

In 2021, the debt-to-GDP ratio will continue to decline, settling at 130.2 percent. The improvement compared to 2020 (around 1.1 percentage points) is due, all other factors being equal, to the reduction in public sector borrowing requirement of around 0.4 percentage points of GDP[30] and to the expected 2.6 percent increase in nominal growth. The snowball effect and the stock-flow component will contribute to an increase in the debt-to-GDP ratio, while the primary surplus will act in the opposite direction and will continue to improve, instead, to 1.9 percent of GDP.

A further reduction in the debt-to-GDP ratio is expected in 2022, down to 128.9 percent, confirming the downward trend beginning in 2020. The drop will be substantially in line with the previous year, despite the marked reduction in the borrowing requirement (by about 0.8 percentage points of GDP) and a nominal growth slightly down to 2.3 percent. The reduction in debt-to-GDP ratio compared to the previous year is explained by an increase in the primary surplus, reaching 2.3 percent of GDP, from a change in composition of the overall effect of stock-flow adjustment and of the snowball component. In particular, the decrease in stock-flow component will offset almost all the increase in the snowball component, explained in turn by the renewed increase in interest expenditure accompanied by lower growth.

Net of Italy's shares of the loans to the EMU Member States (bilateral or through the EFSF) and of the capital contribution of the ESM, the 2018 final debt-to-GDP ratio stood at 128.8 percent of GDP and it is estimated that it will fall to 125.9 percent of GDP in 2022.

[30] For more detail on public sector account forecasts, see Section II of the EFD.

TABLE III.10: PUBLIC DEBT DETERMINANTS (in percentage of GDP) (1)

	2018	2019	2020	2021	2022
Level (including support) (2)	132.2	132.6	131.3	130.2	128.9
Changes compared to previous year	0.8	0.5	-1.3	-1.1	-1.3
Factors that determine the variations in public debt:					
Primary surplus (accrual)	-1.6	-1.2	-1.5	-1.9	-2.3
Snowball effect	1.5	2.0	0.0	0.4	0.9
of which: Interest (accrual)	*3.7*	*3.6*	*3.6*	*3.7*	*3.8*
Stock-flow adjustment	0.9	-0.3	0.2	0.4	0.1
of which: Difference between cash and accruals	*0.2*	*0.4*	*0.0*	*0.0*	*-0.8*
Net accumulation of financial assets (3)	*0.2*	*-0.7*	*0.0*	*0.3*	*0.5*
of which: Privatisation proceeds	*0.0*	*-1.0*	*-0.3*	*0.0*	*0.0*
Impact of debt valuation	*0.2*	*-0.1*	*0.2*	*0.2*	*0.3*
Other (4)	*0.3*	*0.0*	*0.0*	*-0.1*	*0.0*
p. m. Implicit Interest rate on debt	2.9	2.8	2.8	2.9	3.0

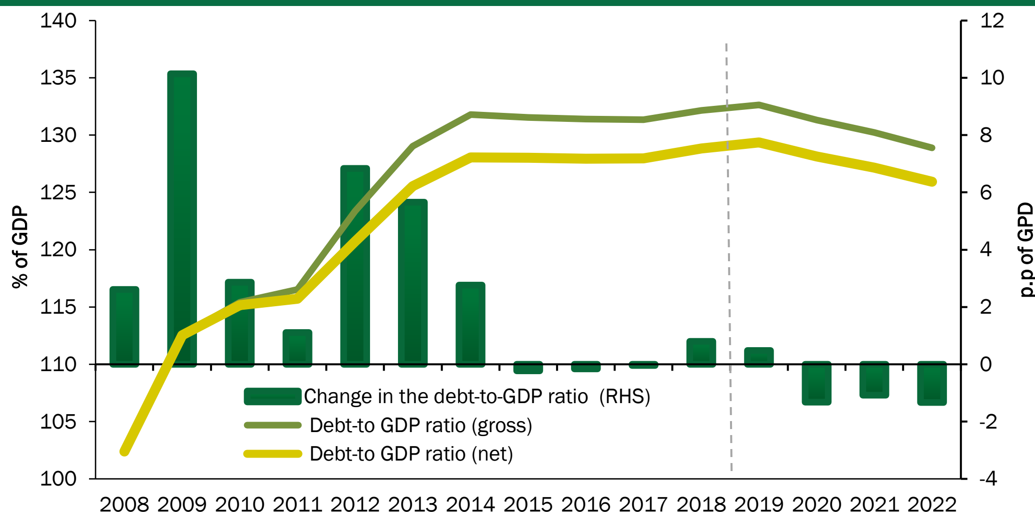
1) Discrepancies, if any, are due to rounding.
2) Inclusive of shares relevant to Italy of loans to the EMU Member States, (bilateral or through the EFSF) and of the capital contribution of the ESM. Throughout 2018, the amount of these shares was equal to approximately 58.2 billion, of which 43.9 billion for bilateral loans and loans through the EFSF and 14.3 billion for the ESM programme (see Bank of Italy, 'Statistical Bulletin - public finance, borrowing requirement and debt' of March 15, 2019). The estimates consider proceeds from privatisation and other financial income totalling 1 percent of GDP in 2019, 0.3 percent of GDP in 2020 and 0 in subsequent years. In addition, a reduction in MEF liquidity stocks is assumed of 0.1 percent of GDP for each year from 2019 to 2021. The interest rate scenario used for the estimates is based on the implicit forecasts resulting from the forward rates on the Italian government bonds for the period of compilation of this present document.
3) Includes the effects of contributions for GLF and the ESM programme.
4) The item 'Other', residual compared to the preceding items, includes: variations in MEF liquidity; statistical discrepancies; Eurostat reclassifications; contributions in support of the Euro Area envisaged by the EFSF programme.

TABLE III.11: GENERAL GOVERNMENT DEBT BY SUBSECTOR (1) (in millions and in percentage of GDP)

	2018	2019	2020	2021	2022
Level including Euro Area financial support (2)					
General government	2,321,957	2,359,097	2,401,013	2,442,577	2,473,609
% GDP	*132.2*	*132.6*	*131.3*	*130.2*	*128.9*
Central government (3)	2,245,888	2,285,396	2,329,784	2,373,801	2,407,326
Local government (3)	126,096	123,728	121,257	118,804	116,312
Social security funds	126	126	126	126	126
Impact of support in % GDP (4)	*3.3*	*3.3*	*3.2*	*3.1*	*3.0*
Level excluding Euro Area financial support (2)					
General government	2,263,726	2,300,866	2,342,915	2,384,872	2,416,404
% GDP	*128.8*	*129.4*	*128.1*	*127.2*	*125.9*
Central government (3)	2,187,656	2,227,164	2,271,686	2,316,096	2,350,121
Local government (3)	126,096	123,728	121,257	118,804	116,312
Social security funds	126	126	126	126	126

1) Discrepancies, if any, are due to rounding.
2) Inclusive or exclusive of shares relevant to Italy of loans to the EMU Member States, (bilateral or through the EFSF) and of the capital contribution of the ESM. Throughout 2018 the amount of these shares was equal to approximately 58.2 billion, of which 43.9 billion for bilateral loans and loans through the EFSF and 14.3 billion for the ESM programme (see Bank of Italy 2018 Statistical Bulletin - public finance, borrowing requirement and debt' of March 15, 2019). The estimates consider proceeds from privatisation and other financial income totalling 1 percent of GDP in 2019, 0.3 percent of GDP in 2020 and 0 in subsequent years. In addition, a reduction in MEF liquidity stocks is assumed of 0.1 percent of GDP for each year from 2019 to 2021. The interest rate scenario used for the estimates is based on the implicit forecasts resulting from the forward rates on the Italian government bonds for the period of compilation of this present document.
3) Including liabilities towards the other sub-sectors.
4) Including the effects of the Italian contribution in support of the Euro Area: contributions to Greek Loan Facility (GLF) programme, EFSF and ESM.

FIGURE III.2: TREND OF THE DEBT-TO-GDP RATIO (inclusive and exclusive of support to Euro Area Countries)



Source: ISTAT and the Bank of Italy. From 2019, policy scenario forecasts.

III.5 THE DEBT RULE AND THE OTHER RELEVANT FACTORS

It is important to ensure the sustainability of public debt and aim towards its gradual reduction, especially if it assumes particularly high values in relation to GDP. In such circumstances, debt takes away important resources from public finance, because they are allocated to paying interest, and is a burden for future generations. The objective of debt reduction can be achieved on the one hand by investing in economic growth (and hence on the ratio denominator), and on the other hand by improving the balance sheet in public accounts[31] through a careful budgetary policy.

European regulations require the planning of public budgets to ensure over time the achievement of a debt-to-GDP ratio of 60 percent following a rule that dictates the timeline for the reduction. The European Commission, as part of its supervisory role, is called upon to assess compliance with this rule as laid down in general by the Treaty on the Functioning of the European Union (TFEU) (see box 'The Debt Rule').

In recent years, the deep economic crisis and the weakness of the recovery, in a context of low inflation, discouraged manoeuvres of fiscal adjustment that were too pronounced and ultimately would have been deflationary and counter-productive in terms of debt dynamics. Therefore, since the rule was established, Italy has rarely presented a public finance plan that is formally in line with it.

[31] The dynamics of debt are also affected by the capital proceeds and other items that reduce the general government borrowing requirement.

Since 2015, the European Commission has found that the dynamics of Italian public debt were - *prima facie* - non-compliant with the debt rule. Having initiated dialogue with Italy, the Commission has repeatedly and substantially accepted the reasons put forward by the Italian Government for failing to comply with the debt rule and decided not to launch infringement proceedings. According to the Commission's interpretation, compliance with the preventive arm of the Stability and Growth Pact and the adoption and implementation of appropriate reforms to increase potential growth and improve debt sustainability played to Italy's advantage. In one case (in 2017), however, the Commission did ask to make a structural correction to the public accounts in order to ensure convergence towards the MTO. The recommendation was implemented by the Italian Government, which presented, at the same time as the adoption of the EFD 2017, a package of measures designed to reduce the structural deficit[32].

FOCUS

The debt rule

The debt rule was introduced to European Regulation from the so-called Six Pack and was transposed at national level with the implementing law of the principle of budgetary equilibrium in the Constitution (Law No. 243/2012). Fiscal discipline on debt became fully operational in 2015, after a period of transition started for Italy in 2012, with the exit from the procedure for excessive deficits.

The debt rule requires that, in order to ensure the debt-to-GDP ratio is reduced at a satisfactory pace towards the threshold of 60 percent of GDP, the programming of the public budget must comply with at least one of the following criteria:

a. the part of debt in excess of the reference value of 60 percent of GDP should be reduced on an annual basis to 1/20 of the average of the values of the three years prior to the current value (backward-looking criterion) or in the two years following the year of reference (forward-looking criterion).

b. the excess debt in relation to the backward-looking benchmark must be attributable to the economic cycle (using an index that expresses the debt-to-GDP ratio that would have been obtained if in the preceding three years the numerator had been adjusted according to the impact of the economic cycle and the nominal GDP denominator had grown at the same pace as the potential GDP).

Starting from the 2016 Stability Programme, compliance with the debt rule based on the backward-looking configuration or that adjusted according to the economic cycle is fully evaluated for the consolidated data provided by ISTAT (the Italian National Statistics Bureau). The evaluation of the debt rule is carried out in relation to the more favourable benchmark determined based on the criteria described above. Based on current data, the more favourable benchmark proves to be the forward-looking benchmark in which compliance with the rule in the reference year is measured by quantifying the gap produced on the basis of the debt-to-GDP projections for the two subsequent years.

If from initial analysis there is evidence of non-compliance with the debt or deficit rule, the Commission prepares an in-depth report pursuant to art. 126.3 of the Treaty on the Functioning of the European Union (TFEU), in which all the factors[33] justifying the deviation

[32] Measures included in Decree Law No. 50/2017 converted into Law No. 96/2017, O.J. 144/2017.

[33] European legislation establishes that the Commission can desist from launching proceedings for excessive deficit, taking account of the existence of relevant factors such as: the medium-term economic situation, compliance with the rules dictated by the stability and growth pact, the trend and sustainability of public debt in

are considered. On this occasion, the country under observation can send its own reasons justifying the failure to achieve the required fiscal consolidation. In issuing its opinion, the Commission may conclude that, because of an overall assessment, the country is not found to be in deviation and does not therefore recommend the launch of excessive deficit proceedings.

From 2015, the first year in which the European Commission drew up the report pursuant to art.126.3 of the Treaty in relation to Italy, the choice of Italian Governments was to draw up and publish a very detailed analysis of the factors explaining the evolution of public debt and the failure to reach the benchmark[34]. For a summary of the dialogue between 2015 and 2017, refer to the box entitled 'The debt rule and the report on the relevant factors' found on page 52 of the 2018 EFD Update Memorandum. The assessment carried out by the European Commission in May 2018 is treated in the following box 'Judgement of the European Commission on compliance with the debt rule'.

The 'window of evaluation' for the debt profile is still open for the three-year period 2017-2019. In May 2018, the Commission found that the stock of Italian debt in 2017 was above the reference threshold of 60 percent of GDP established by the Treaty. At the same time, in addition to failing to achieve the reduction objectives imposed by the debt rule for 2017, the projections for the years 2018 and 2019 seemed to confirm the failure of the adjustment for the following years too. In its spring judgement, the Commission upheld that the cyclical conditions of the Italian economy had improved and that therefore the weak economic recovery could no longer be cause of the failure to adjust to the forward-looking benchmark. However, *ex post* compliance was acknowledged in 2017 of the preventive arm of the SGP in relation to convergence towards the MTO and progress was recognised in the adoption and implementation of the structural reforms in support of growth. Based on these considerations, Italy was not in violation of the debt rule. However, the Commission recommended to achieve a more pronounced fiscal adjustment for 2018, in order not to deviate from the path of convergence towards the MTO[35]. A new evaluation was to be carried out at the time of the presentation of the Draft Budgetary Plan in October 2018.

The Draft Budgetary Plan 2019, presented in October 2018, demonstrated the Government's intention to follow a more expansive fiscal approach compared with the balances at unchanged legislation, i.e. the public finance scenario inherited from the previous legislature. The decision came from the desire to implement gradually the Government programme, funding significant and particularly qualifying operations, and to resume spending for investments. This change in budgetary policy led the Commission to question its judgement on compliance with the debt rule for 2017. In particular, the Commission noted a significant

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the medium term. In addition, each Member State may propose to the Council and the Commission specific factors justifying the deviation from compliance with the rules.

[34] The analyses drawn up by the government and the reports pursuant to article 126(3) of the Treaty can be consulted in chronological order at the following link: https://ec.europa.eu/info/business-economy-Euro/economic-and-fiscal-policy-coordination/eu-economic-governance-monitoring-prevention-correction/stability-and-growth-pact/corrective-arm-excessive-deficit-procedure/closed-excessive-deficit-procedures/italy_en.

[35] Recommendation of the Council of the European Union of 13 July 2018 on Italy's 2018 national reform programme and formulating a Council opinion on the Italian stability programme for 2018: https://eur-lex.europa.eu/legal-content/IT/TXT/PDF/?uri=CELEX:32018H0910(11)&from=EN

deviation from the structural effort of 0.6 percent of GDP required in 2019 in order to converge towards the MTO.

The reservations expressed by the Commission gave rise to an intense phase of dialogue between the two parties, as provided for by EU law (refer to focus 'Dialogue with the European Commission on the 2019 Draft Budgetary Plan' in para. III.2). In addition to the request for clarification on the DBP, the Commission considered it appropriate to update the report on the relevant factors pursuant to art. 126.3 of the Treaty. As a result of this, Italy sent a new Draft Budgetary Plan, reiterating the public finance objectives, and responded to the requirement to justify the reasons for the failure to comply with the debt rule (see box 'Judgement of the European Commission on compliance with the debt rule'). The Commission report of November 2018[36] drawn up pursuant to art. 126.3 of the Treaty nevertheless concluded that the relevant factors put forward by Italy were not sufficient to justify deviation from the path indicated by the debt rule. Consequently, the Commission believed there was due justification for opening an excessive deficit procedure.

The dialogue between the Commission and the Government in the weeks that followed enabled the negotiation of a new public finance convergence path that reconciled the demands of public finance sustainability with the Government Contract objectives.[37]. This negotiation prevented the opening of an infringement procedure and postponed the assessment in the spring of 2019 as foreseen by the calendar of the European semester.

FOCUS

The judgement of the European Commission on the debt rule

In its overall assessment on the evolution of Italian public debt conducted pursuant to art. 126.3 of the TFEU and published in May 2018, the Commission had concluded that the debt criterion should be considered respected for the moment. The Commission pointed out the need to implement higher fiscal adjustment for 2018 in order to ensure the path of convergence towards the MTO. In November, the Commission decided to re-examine compliance with the debt rule with an update of the report pursuant to art. 126.3 of the Treaty. The expansive revision of the public finance objectives included in the 2019 Draft Budgetary Plan had changed the information base on which the judgement of May 2018 was delivered. In particular, the deterioration of the structural deficit for 2019 announced by the Government was going in the opposite direction to the fiscal consolidation indicated by European rules.

In response, the Government therefore put forward a series of important factors in support of an overall assessment (including quality) of the trend in public accounts and debt. The first factor is the cyclical situation: in 2018, the Euro area suffered a slowdown in exports and industrial production; the Italian manufacturing industry was hard hit by the decline in international trade and the increasing wave of protectionism. This cyclical situation is added to years of weak growth during which the restrictive fiscal policies have improved the numerator of the debt-to-GDP ratio through increasing primary surpluses but have not contributed to revitalising the denominator (i.e. nominal GDP). In fact, the economy has found it difficult to return to its full potential, with high rates of unemployment and low

[36] European Commission report drawn up pursuant to art. 126.3 https://ec.europa.eu/info/sites/info/files/economy-finance/1263_commission_report_211118_-_italy_en_1.pdf

[37] For a detailed report, see the focus 'Dialogue with the European Commission on the 2019 Draft Budgetary Plan' in paragraph III.2.

inflation. The second important factor is focused on the fact that the Italian economy suffers from a much wider output gap than that identified by the methodology agreed at European level. Taking into account MEF estimates, the structural budget is in line with the forecasts of the European fiscal regulations. The third important factor is based on the urgent need to promote social inclusion and revitalise public investment. The expansive approach of the fiscal policy proposal in the DBP 2019 supports own key measures such as Citizen's Income and 'Quota 100', as well as important infrastructural investments. The measures, not only of a fiscal nature, envisaged by the Government aim to stimulate both supply and aggregate demand. Another very important factor is the fact that debt sustainability, using alternative measures of potential growth, is not at risk in either the medium or long term. The nature of the public debt characterised by long maturities and fixed rates ensures a certain resilience to the volatility of the financial market. Moreover, Italy has a very low level of contingent liabilities.

In fact, in its final judgement, the Commission retained that the relevant factors presented by the Italian Government were not sufficient to justify the failure to adjust public debt. In particular: (i) the deterioration of macroeconomic conditions did not justify the gap in relation to the reduction of the debt established by European rule, given the growth of nominal GDP of more than 2 percent in 2016; (ii) the measures presented by the Government were a step backwards compared to certain reforms implemented recently, first and foremost in the area of pension expenditure; and, finally, iii) forecast data of the Commission and data contained in the DBP2019 underscored the risk of a significant deviation from the adjustment path towards the MTO recommended for 2018 and the risk of serious non-attainment of the structural adjustment for 2019 of 0.6 percent of GDP foreseen by the adjustment matrix agreed within the Stability and Growth Pact and recommended by the Council to the Italian Government. Overall, therefore, the final report suggested that the debt criterion as defined by the Treaty and by EC Regulation No. 1467/97 was to be regarded as not respected and that this justified the launch of an excessive deficit procedure.

The evolution of the debt-to-GDP ratio highlights a narrowing of the gap with the path of convergence to the threshold of 60 percent in the forward-looking configuration for 2018 and 2019 of the cyclically adjusted debt for 2020. In detail, compliance with the rule for 2018 is assessed on the basis of the 2020 debt-to-GDP ratio forecast, which is 131.3 percent. The debt rule indicates a convergence path that implies, in the forward-looking configuration, a debt-to-GDP ratio of 125.1 percent. The gap with the forward-looking benchmark is therefore 6.2 percent of GDP (in any case more favourable than the other debt rule configurations). In the same way, compliance with the rule in 2019 is evaluated using the forward-looking configuration. In the policy scenario, the debt-to-GDP ratio would be at 130.2 percent that compared with a benchmark of 125.1 percent to achieve in the *forward-looking* configuration, points out a deviation of 5.2 percent. In 2020, the debt-to-GDP distance is minimal in the cyclically-adjusted debt configuration, with a gap of 3.9 percent.

TABLE III.12 COMPLIANCE WITH THE DEBT RULE: FORWARD LOOKING CRITERION AND CYCLICALLY ADJUSTED DEBT

	Scenario					
	At unchanged legislation			Policy scenario		
	2018	2019	2020	2018	2019	2020
Debt in year t+2 (% percent of GDP)	131.7	130.6	129.6	131.3	130.2	128.9
Gap in relation to the forward-looking benchmark (% of GDP)	6.5	5.4	4.9	6.2	5.2	4.4
Gap in relation to cyclically adjusted debt (% of GDP)	8.2	7.3	4.0	7.9	7.1	3.9

Thus, the difficulty remains in complying with the debt rule, even in the presence of a medium-term path to adjust both the nominal and structural deficit. In fact, the economic policy pursued by the Government has to deal with lower nominal growth, caused by the deterioration of the international macroeconomic scenario and a real cost of debt that is still quite high. Consolidation manoeuvres that raise the primary surplus *ex-ante* prove once again to be counter-productive, assuming a pro-cyclical nature. It should however be noted that growth projections are very cautious and reflect the drastic revision of the prospects of international trade that could in future be revised upwards. The impact of the reforms that will be implemented in the next few months by the Government must also not be overlooked. It is then plausible to assume a fall in yields on government bonds. A more favourable context would make it much easier to achieve compliance with the debt rule.

FOCUS

Assessment of the impact of measures relating to Citizen's Income and Quota 100 on potential GDP and on the output gap

Pursuant to the European and national legislation in force, the output gap contributes to the quantification of the cyclically adjusted budget balance and thus to the estimate of the so-called structural balance. This estimate is a crucial figure in assessing the European Countries’ compliance with the fiscal rules enshrined in the Stability and Growth Pact of the European Union and those in force nationally (for Italy, Law 243/2012). An overall assessment of the effects on the economy of the measures relating to the Citizen's Income (RDC) and to the so-called Quota 100 (contained in Decree Law No. 4/2019) was presented in a Focus of this Stability Programme and - in a more articulated manner - in the National Reform Programme, to which we refer. This Focus concentrates on the estimated impact of the two measures on potential GDP and on the output gap.

The evaluation is carried out as follows: potential GDP and the output gap (OG) corresponding to the scenario at unchanged legislation (which includes the RDC and Quota 100) are calculated and to alternative ad hoc constructed scenarios. These ad hoc scenarios refer to the macroeconomic scenarios obtained by subtracting the effects on the economy of the cited measures, estimated using the ITEM econometric model, from the scenario at unchanged legislation. Macroeconomic scenarios that exclude the impact of the RDC, Quota 100 and both measures are considered separately. The impact on potential GDP and on the output gap is thus calculated as the difference between the estimates produced by the alternative scenario considered and those produced by the scenario at unchanged legislation, i.e. *estimated impact on OG = OG alternative scenario - OG at*

unchanged legislation.

The calculations made follow the official production function methodology[38]. One evaluation component is found upstream of the financial year in the estimate of the economic impact of the measures. The results obtained show that, overall, the measures have a positive effect on potential growth; the impact is not immediate but spread over time. The most important estimate for the purposes of European fiscal surveillance, however, is not potential GDP, but the output gap; from this point of view, it is estimated that the two measures have contributed to broadening it, but only moderately.

Finally, it is important to emphasize that the effects of the measures on potential growth are not immediately detectable by performing a comparison between the estimates for the macroeconomic scenario at unchanged legislation relating to this Stability Programme and the estimates submitted in previous official documents. Potential GDP is a function of the overall macroeconomic scenario and is influenced by the trend in gross domestic product, in turn a function of a changing exogenous scenario of reference.

The following Focus sections briefly illustrate the characteristics of the methodology for estimating potential GDP and the output gap and then analyse the impact of the measures, both separately and jointly. Particular attention is paid on the different caveats underlying the estimates, a full understanding of which is crucial for grasping the uncertainty of the precise estimates presented and the purely indicative intention of the exercise.

Estimate of potential GDP and the output gap

The output gap is defined as the distance between the real product (Y) of an economy and its respective potential ($\overline{Y}$), expressed as a percentage of the latter. In the formula:

$$\mathrm{YGAP} = \left(\frac{\mathrm{Y}}{\overline{\mathrm{Y}}} - 1\right) * 100 \qquad (1)$$

The potential product is the maximum output obtainable from an economy without incurring inflation and is therefore a non-observable (‘latent’) variable whose estimation requires a theoretical model. The potential GDP estimation model perfected by the European Commission is based on a Cobb-Douglas production function. The GDP of the economy can be represented a product weighed using the factors of production: labour (L), capital (K) and total factor productivity (TFP, so-called Solow residual). To summarise

$$\mathrm{Y} = \mathrm{TFP} * \mathrm{L}^{\alpha} * \mathrm{K}^{1-\alpha} \qquad (2)$$

where the weight of the labour factor (α) is set at 0.65.

According to the methodology agreed at European level, the Labour factor is in turn obtained as follows:

$$\mathrm{L} = \big(\mathrm{POPW} * \mathrm{PART} * (1 - \mathrm{UR})\big) * \mathrm{HOURS} \qquad (3)$$

where POPW is the population of working-age (15-74), PART is the participation rate, UR the unemployment rate and HOURS the hours worked per employed individual.

To switch from real GDP to potential GDP, the actual values (or forecast values for future years) of the factors of production are replaced by the corresponding potential values obtained through statistical filters that allow the trend component to be taken out. In the case of the labour factor, all the variables of the (3) are filtered out except POPW. The trend

[38] It should be noted that the estimate is sensitive to the choice of some initial parameters, such as the priors of TFP and the bounds of the NAWRU.

in PART and HOURS variables is obtained using a Hodrick-Prescott filter[39]. To obtain the unemployment trend, on the other hand, a Kalman filter is used in which the trend-cycle breakdown is 'guided' by an equation illustrating the relationship between wage inflation and unemployment cycle (according to the Phillips curve model). The value thus obtained corresponds to the NAWRU (Non-Accelerating Wage Rate of Unemployment), namely the rate of unemployment to which economic theory associates an absence of pressures of inflation. To summarise

$$\overline{L} = \left(POPW * \overline{PART} * (1 - NAWRU)\right) * \overline{HOURS} \quad (4)$$

Where $\overline{L}$ is the potential labour and the other variables, with the exception of POPW, are trend components.

The Capital factor is not filtered because it is assumed that the maximum contribution to capital potential is given by the full use of the capital stock in an economy (therefore $K = \overline{K}$).

To obtain the potential level of Total Factor Productivity, a Bayesian Kalman filter is used in which the trend/cycle breakdown is guided by a composite variable of used capacity (CUBS).

The potential product is thus given by:

$$\overline{Y} = \overline{TFP} * \overline{L}^{\alpha} * K^{1-\alpha} \quad (5)$$

where $\overline{TFP}$is the trend in Total Factor Productivity.

The effects of the measure using the official methodology

Methodological premises

As said above, the impact of the adoption of Decree Law No 4/2019 on the output gap is relevant for considerations regarding the fiscal surveillance carried out within the context of the European semester. It is the output gap, in fact, that is used for the cyclical adjustment of the nominal budget balance and to obtain the structural balance. It is therefore especially important to assess the impact on this value for the reference year t (currently corresponding to 2019) and the following year (2020): this is the two-year period subject to greater attention from the European Commission. However, the effects on the year t-1 (2018)[40] and on the last two years of the planning horizon (2021-2022) are also significant for verifying the convergence of the structural balance towards the Medium Term Objective.

Another premise is that the effects of the measures only affect the different components of the potential product gradually (labour and total factor productivity, as per equation (5), given that there is a delay in the transfer of an increase in the actual variables to their trend values (generated by statistical filters). By way of example, Figure A shows that, considering an immediate and permanent rise in the participation rate in 2019, its trend component$(\overline{PART})$, shown by the dotted line, reacts more slowly; the post-shock values are shown in black, the initial values in green. The increase in trend variable reaches the value of the underlying actual variable (PART) only after 3 years, in 2021[41]. The full impact on the

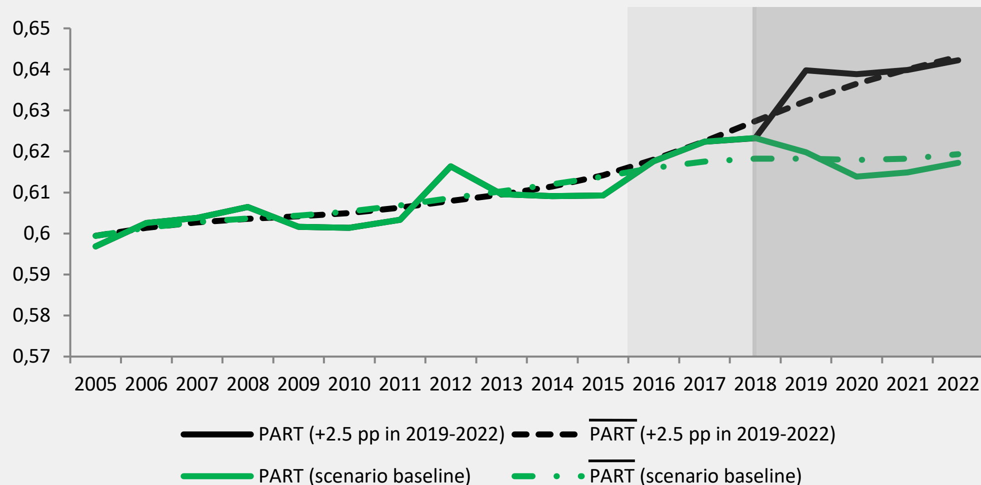
[39] The Lambda value applied by the European Commission to filter PARTS and HOURS is 10.

[40] It is recalled that a revision of potential growth estimates has an impact on the entire estimate horizon, not just on the years subject to forecasting.

[41] It should also be observed that a variation in PART also has an impact on the past values of the variable $\overline{PART}$.

trend variable is further delayed if the shock on PART is modulated gradually over time rather than showing a sudden increase. It is also to be noted that the different value of the participation rate implies a change of the filtered variable even in the past (i.e. in the years prior to 2019).

FIGURE A: UNFILTERED SERIES OF PARTICIPATION (PART) RATE WITH SHOCK OF 2.5 PP AND RELATIVE FILTERED SERIES ($\overline{PART}$)



Source: MEF analysis.

Focusing our attention on the output gap, as defined by (1) and observing the equations (2) to (5), it may be inferred that the gap between Y e $\overline{Y}$ is the result of the deviation between each factor of production and its trend value.

More specifically, considering that the capital K is always equal to its potential value, the output gap can be broken down into the sum of Labour gap and TFP gap (expressed in logarithms). In turn, the Labour gap can be broken down into the sum of: deviation between real hours worked and filtered total hours ($HOURS_{GAP}$), deviation between the real participation rate and filtered participation rate ($PART_{GAP}$) and the deviation between unemployment rate and NAWRU (corresponding in (6) to $UNEMPL_{GAP}$).

Therefore, YGAP can be represented as follows:

$$YGAP = \alpha(HOURS_{GAP} + PART_{GAP} + UNEMPL_{GAP}) + TFP_{GAP} \quad (6)$$

Citizen's Income

We use this approach to assess, primarily, the effects of the Citizen's Income. The rewarding element of the measure on the supply side consists of introducing a proportion of inactive workers to the labour force by increasing the rate of participation (PART) and, in part, the hours worked per employed person (HOURS). At the same time, however, the measure also leads to an increase – at least initially – in the unemployment rate. Those who receive the benefit must declare themselves willing to work in the immediate future; at this point, no longer inactive and not finding employment immediately, they would be classified as

unemployed[42].

In order to estimate the impact of the Citizen's Income on potential product and the output gap, by using the official methodology, the potential output was estimated in relation to a macroeconomic scenario that does not include the effects of the measure. The estimates are compared with estimates relating to the scenario at unchanged legislation that, instead, includes the effects of the measure. The macroeconomic effects to be 'subtracted' from the scenario at unchanged legislation are aligned with the evaluations performed using the ITEM econometric model shown in the box in Chapter II, 'An assessment of the macroeconomic impact of Citizen's Income measures'.

Table A shows the deviations between the two estimates of potential GDP and output gap attributable to the measure. The first two rows show the deviations between the actual and potential growth rates of the two scenarios, the remaining rows indicate the deviations between the output gap and the different sub-components.

TABLE A: DIFFERENCE IN TERMS OF REAL GROWTH, POTENTIAL GROWTH, OUTPUT GAP AND ITS COMPONENTS, BETWEEN SCENARIOS WITH AND WITHOUT CITIZEN'S INCOME

	2017	2018	2019	2020	2021	2022
Real Growth	0.0	0.0	0.2	0.2	0.1	0.0
Potential Growth	0.1	0.2	0.2	0.0	0.4	0.2
Output gap	0.1	-0.1	-0.1	0.1	-0.2	-0.4
Labour gap	0.0	-0.2	-0.4	-0.2	-0.3	-0.3
Unemployment gap	0.2	0.1	-0.1	-0.5	-0.5	-0.4
Hours worked gap	0.0	0.0	0.0	0.0	0.0	0.0
Participation rate gap	-0.2	-0.3	-0.2	0.3	0.2	0.2
TFP gap	0.1	0.1	0.3	0.3	0.1	-0.1

The scenario that includes the effects of the measure shows a higher GDP growth rate, fully aligned with the ITEM evaluation, totalling on average around 0.15 percent in the period 2019-2021. The variations in potential GDP are not immediately aligned (year on year) to those in the underlying GDP and are, always on average, greater. Reverse variations are also encountered for potential GDP, as can be seen from the difference of 0.3 percentage points in potential growth in 2018 in the scenario that includes the effects of the Citizen's Income.

The output gap increases in absolute value, becoming more negative from 2017 and for the whole forecast horizon (with the exception of 2020). With reference to the financial year under examination, the broadening of the output gap - denoted by minus signs Table A[43] - is due to the increase in the Labour gap. Within this Labour gap, the component that has the greatest impact is the Unemployment gap. Figure B shows how, by comparing the macroeconomic scenario that includes the Citizen's Income ('with RDC') and an alternative scenario without the measure ('without RDC'), a sudden increase in the unemployment rate corresponds to a proportionally smaller variation in the NAWRU. The increase in unemployment, greater than the increase in NAWRU, is characterized as cyclical unemployment. In contrast, the Participation gap acts in the opposite direction to the

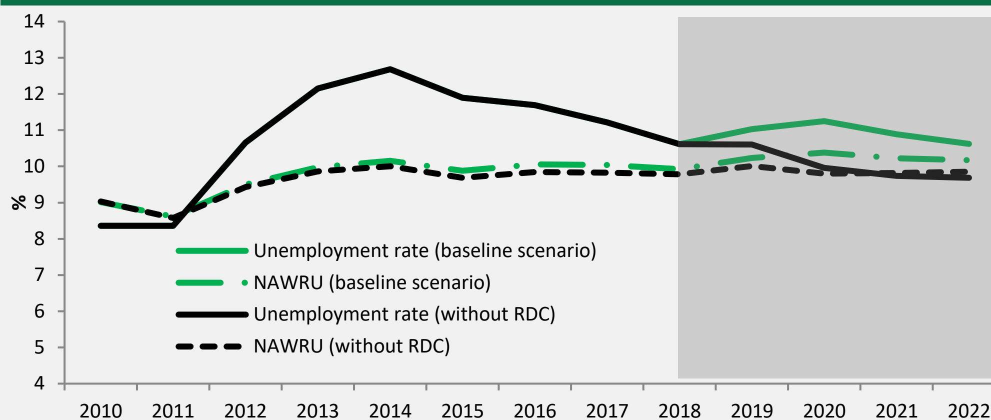
[42] The three conditions for classification as seeking employment in the harmonized European data collection on the labour force are: 1) being unemployed (a person is employed when he or she in the week of survey has done at least one hour of paid work); 2) having actively sought work in the last 4 weeks; 3) being available to start a job within two weeks from the week of the survey.

[43] Negative numbers indicate a widening of the output gap because the period considered starts with negative values, with GDP below its potential.

Unemployment gap since the significant increase in participation rate is assigned by the HP filter to the cyclical component (Figure C).

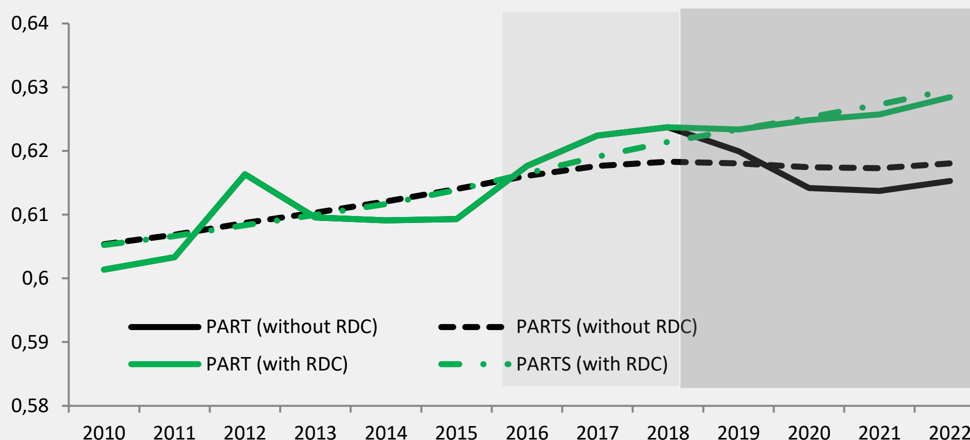
In most of the simulation, the overall widening of the output gap compared to the simulation without RDC is limited by a narrowing of the TFP gap. The upstream evaluation performed using the ITEM model attributes to the measure a positive variation in productivity as a result of its expansive effect; more precisely, the increase in GDP is higher - in an initial phase - than the increase in employment. However, once reflected in the production function methodology, the increase in TFP is greater than that of its trend component.

FIGURE B: COMPARISON BETWEEN THE UNEMPLOYMENT RATE SERIES IN SCENARIOS WITH AND WITHOUT CITIZEN'S INCOME AND THE NAWRU SERIES IN SCENARIOS WITH AND WITHOUT CITIZEN'S INCOME



Source: MEF analysis.

FIGURE C: COMPARISON BETWEEN THE UNFILTERED AND FILTERED SERIES OF THE PARTICIPATION RATE IN SCENARIOS WITH AND WITHOUT CITIZEN'S INCOME



Source: MEF analysis.

Quota 100

Decree Law No. 4/2019 in laying down urgent provisions on Citizen's Income and pensions also provides for the introduction of a measure that allows access to retirement for workers with at least 38 years of pension contributions and of at least 62 years of age (Quota 100), thus reducing the statutory retirement age.

For the purposes of evaluating the potential, in order to better interpret the results that will be shown, we will begin with certain observations on the impact of the measure on the labour market. An initial and immediate consequence is the reduction in participation in the age group affected by the measure (elderly workers) and, in the absence of simultaneous replacement recruitment; this would result in a corresponding reduction in employment. However, the number of employed will tend to rise both due to the effect of 'replacement' of retired workers (direct effect), and due to the general impact of the measure on the economy (indirect effect).

This measure also was evaluated using ITEM (see the Focus of Chapter II entitled 'An assessment of the macroeconomic effects of pension measures'). With reference to the variables that form part of the equation (5), an initial indication is confirmation of the reduction in Labour factor *L* (lower employment and reduction of the rate of participation). However, this effect decreases over time (between 2019 and 2022): in the first place, the lower participation is gradually offset by a recovery in employment; secondly, the unemployment rate falls as early as the first year[44]. Finally, the ITEM model estimates an effect of slight expansion of the measure on economic growth: the fall in employment observed, combined with an albeit slight increase in GDP, consequently generates an increase in productivity (remember (2)).

The same approach used for the Citizen's Income is also used to assess the impact of the Quota 100 on potential GDP and on the output gap. In this case too, an alternative scenario to the scenario at unchanged legislation is constructed using the ITEM evaluations. Table B shows the effects estimated as the difference between the two potential variable estimates. An initial result is that, overall, the reduced labour factor and the increase in TFP offset one another and the effects on the potential product are substantially neutral, with a slightly negative effect at the end of the period.

TABLE B: THE DIFFERENCE IN TERMS OF REAL GROWTH, POTENTIAL GROWTH , OUTPUT GAP AND ITS COMPONENTS, BETWEEN SCENARIOS WITH AND WITHOUT QUOTA 100

	2017	2018	2019	2020	2021	2022
Real growth	0.0	0.0	0.0	0.1	0.1	0.0
Potential Growth	0.0	-0.1	-0.1	0.0	-0.1	-0.1
Output gap	-0.2	-0.1	-0.1	0.0	0.2	0.3
Labour gap	-0.1	0.1	0.0	-0.1	0.1	0.2
Unemployment gap	-0.2	-0.2	-0.1	0.1	0.3	0.3
Hours worked gap	0.0	0.0	0.0	0.0	0.0	0.0
Participation rate gap	0.1	0.2	0.1	-0.2	-0.2	-0.1
TFP gap	-0.2	-0.2	-0.1	0.1	0.1	0.0

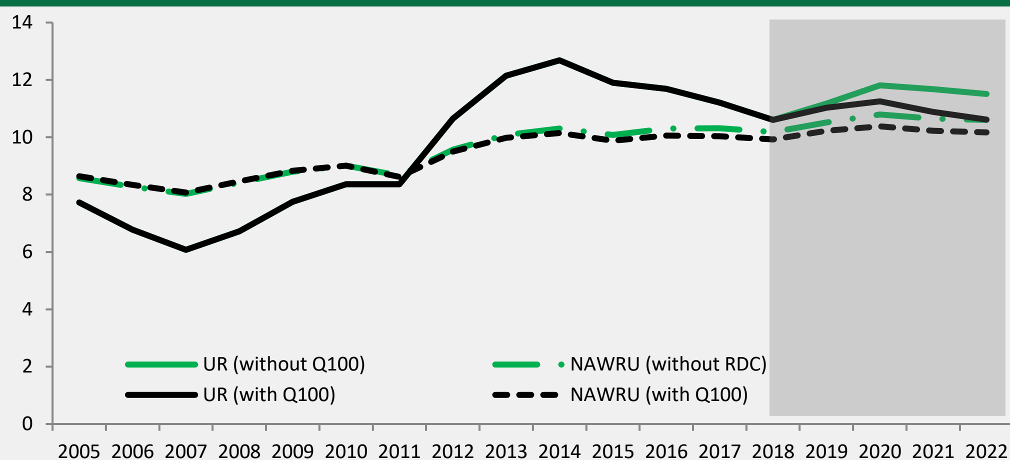
In this case too, what happens in terms of output gap is of less immediate interpretation. The overall result is that, while in an initial phase it expands, at the end of the period it decreases in absolute value. The narrowing of the output gap - shown by positive values in the table - is due in large measure to what happens to the Labour gap, and especially to the

[44] The intuition behind this statement becomes clear by observing the following identity relative to the unemployment rate (UR): *UR=UNEMPL/ACTIVE=(ACTIVE-EMPLOYED)/ACTIVE (7)*

With the numerator remaining unchanged (active workers and those in employment will reduce by same amount), a reduction of the denominator (active workers) leads to an increase in unemployment rate. However, even a modest increase in workers in employment is enough to achieve a reduction in the ratio. Given the current levels of unemployment and the number of active workers, turnover needs to cover just 10 percent or more of the numbers going into retirement to achieve a reduction in the rate of unemployment in the face of the retirement of an actual 350,000.

Unemployment gap. The scenario that includes Quota 100 forecasts, as mentioned before, a progressive reduction in the unemployment rate. However, only part of the reduction in unemployment rate is considered structural (the reduction in the NAWRU is lower). This interpretation by the production function methodology tends to narrow the Unemployment gap in final simulated years. The increase in productivity recorded by the simulations helps to raise the potential, by counteracting the effects of labour component[45]. However, the TFP component helps to narrow the output gap: the increase in productivity is considered largely cyclical by the statistical filter used (the Kalman Filter).

FIGURE D: COMPARISON BETWEEN THE SERIES OF THE UNEMPLOYMENT RATE AND THE NAWRU IN SCENARIOS WITH AND WITHOUT QUOTA 100



Source: MEF analysis.

Joint effects and conclusions

If the effects of both measures (Citizen's Income and Quota 100) are considered together, by subtracting the overall effects of the two measures estimated using ITEM from the scenario at unchanged legislation, we obtain an intermediate result between the two presented. The effects on the potential GDP and on the output gap tend to offset one another but, as shown in Table C, there is a prevailing favourable effect on the potential growth rate and we see an widening of the output gap in the first years analysed and in 2022.

TABLE C: THE DIFFERENCE IN TERMS OF REAL GROWTH, POTENTIAL GROWTH, OUTPUT GAP AND ITS COMPONENTS, BETWEEN SCENARIOS WITH AND WITHOUT CITIZEN'S INCOME AND QUOTA 100

	2017	2018	2019	2020	2021	2022
Real Growth	0.0	0.0	0.2	0.2	0.2	0.0
Potential Growth	0.1	0.1	0.1	0.0	0.3	0.2
Output gap	-0.2	-0.4	-0.2	0.0	0.0	-0.2
Labour gap	-0.1	-0.1	-0.3	-0.3	-0.2	0.0
Unemployment gap	0.0	0.0	-0.2	-0.4	-0.2	-0.1
Hours worked gap	0.0	0.0	0.0	0.0	0.0	0.0
Participation rate gap	0.0	-0.1	-0.1	0.1	0.1	0.1
TFP gap	-0.2	-0.2	0.1	0.3	0.2	-0.2

[45] In terms of effects on the potential, the greater trend productivity offsets the effects of the reduction in jobs available. This leads to the substantially neutral response just mentioned.

The estimates presented are subject to various caveats. Firstly, we note that the joint impact of the two measures is not linear, i.e. the values in Table C are not exactly the sum of Tables A and B. This is a characteristic of the methodology underlying the estimation of the potential. It must also be pointed out that the results are 'base dependent', i.e. the differences in potential observed between the base scenario (in our case at unchanged legislation) and the comparison scenario depend on the choice of base scenario. Therefore, starting from a different macroeconomic scenario would change the results obtained, even applying the same variations. The estimates are also a function of the time interval over which the potential product is calculated; traditionally, with a view to medium term planning, Italy goes as far as year t+3; the Commission, on the other hand, stops at t+1 (or t+2 in the case of Autumn Forecast). In conclusion, we recall the question of the choice of the initial parameters to filter the original variables such as the priors of TFP and the bounds of the NAWRU. The priors chosen are consistent with those used to estimate potential GDP in this planning document. We do not present here a systematic analysis of comparison with the results obtained by choosing different priors; however, certain tests performed gave similar results in terms of quality.

Medium-long term impacts

For the purposes of assessing the impact of the measures in question on potential GDP, we must consider the effects that the measures, especially Citizen's Income, will have on the estimate of the medium term parameter to which the structural unemployment tends to converge (NAWRU 'anchor'[46]), a parameter used to estimate potential GDP in the short and medium term and in sustainability analysis.

Specifically, the amounts derived from the Citizen's Income received by individuals recorded as unemployed who have declared income from work within the preceding five years will be considered for calculating the rate of replacement of unemployment benefits, used to estimate the NAWRU anchor and positively correlated with this anchor. On the other hand, structural unemployment is negatively affected by the Active Labour Market Policies (ALMP), also used to estimate the anchor, the scope of which is expected to grow due to the effect of the measure in question. The combined effect of the two opposing trends can be estimated by means of further analysis. Finally, we recall that analysis on the effects of the measure, disregarding the context of estimating the NAWRU anchor, are presented in the National Reform Programme.

[46] In the medium term (t+10), the value of the NAWRU is converged to an 'anchor' parameter obtained through a regression panel that comprises 13 Member Countries of the European Union ('old Member States'). This parameter, re-estimated on each forecast round, affects both the estimation of the short-term NAWRU (and therefore potential GDP and the output gap) and medium-long term fiscal sustainability indexes. While the NAWRU corresponds to the unemployment rate in the absence of inflationary pressures, the anchor represents the long-term structural unemployment rate.

The regression panel obtains the anchor using seven explanatory variables. The 'structural' variables are: Rate of Replacement of Unemployment Benefit, Tax Wedge, Active Labour Market Policies Index, and Union Density. The 'non-structural' variables are: Total Factor Productivity, Real Interest Rate, and Construction Industry Cyclical Index.

IV. SENSITIVITY AND SUSTAINABILITY OF PUBLIC FINANCES

IV.1 SHORT-TERM SCENARIOS

This section contains a short-term sensitivity analysis of public finance targets in relation to different macroeconomic shocks. Different approaches are used. The first part presents an analysis of the interest expenditure sensitivity to shocks on the yield curve. Subsequently, the effects on the debt-to-GDP ratio of shocks that simultaneously affect economic growth, the primary balance and the yield curve are shown; the analysis in question is performed via the stochastic simulation of the evolution of the debt-to-GDP ratio. Finally, using a methodology developed by the European Commission, the overall risk of fiscal stress for public finances is assessed; to do this, a risk index is used that provides information on the probability of fiscal and macro-financial crises in the short term (for the current year and the year immediately following).

Sensitivity to interest rates

Year 2018 was particularly challenging for public debt management, whose objective is to ensure financing of the borrowing requirement of the State sector and the refinancing of maturing securities in order to achieve an efficient risk-return combination. In fact, in marked discontinuity with respect to 2017, year 2018 featured the predominant role of both national and international geopolitical events, which mainly occurred in the second half of the year. The contest between the USA and China on the issue of duties, with a consequent slowdown in world trade, the political events that marked the formation of the Italian Government after the national elections of 4 March 2018, as well as the preparation of the new government agenda, gave rise to strong tensions on the government bond market with the consequent widening of the yield differential with respect to the main countries of the euro zone and a significant increase in the volatility of security prices. Although to varying degrees, both phenomena persisted throughout the rest of the year with a non-negligible impact on the issuance of new debt.

The composition of the government bond stock at the end of 2018 was largely in line with the trend of recent years, although there were some more marked differences. Indeed, it is confirmed the reduction in short-term instruments such as BOTs (approximately 0.1 percent), while compared to the previous year, there was a slight increase in the share of medium and long-term securities (approximately 0.3 percent), which is the result of an increase in the medium-term component and a modest reduction in the long-term component, as part of which, however, a new BTP benchmark with a 20-year maturity was issued.

The inflation-linked bond component, both those linked to the HICP[1], i.e. European inflation, and those linked to the FOI[2], i.e. Italian inflation, recorded a slight increase (about 0.4 percent), as a result of the increase in the share of both BTP Italia and BTP€i of the total government bond stock. In fact, in 2018, two new BTP Italia bonds were issued (May and November 2018) and a new BTP€i with a 5-year maturity (March 2018), against zero maturities, although the linker segment was subject to repurchases (approximately 4.5 billion euro), performed to ease the total number of maturities in the coming years.

The variable-rate component indexed to the 6-month Euribor (CCTeu) decreased as compared to last year (by approximately 0.4 percent), as a result of market conditions that enabled lower issues in the sector (down approximately 1.5 percent), to which were associated maturities (for approximately 22 billion euro) and repurchases (for approximately 5.5 billion euro).

As in previous years, foreign securities decreased (by approximately 0.2 percent), as a result of the lack of new issues of international format during the year, due to market conditions that were not favourable for this type of security, and the size of the maturities (for approximately 3.5 billion euro).

Because of the market turbulence that occurred in 2018, the issues made, although lower in absolute terms than in the previous year, were characterised by certain discontinuities as compared to 2017, also due to the lower volume of maturing securities. Short-term issues (BOTs) increased (by approximately 2.3 percent), but it was above all in the area of medium/long-term fixed-rate bonds that there were changes to the composition of issues were found. In fact, although there was an increase (approximately 0.69 percent) in the number of instruments with maturities of 2-3-5 years, in contrast to 2017, there was an increase in issuance in the 7-10 year segment (up by approximately 1.37 percent) and a decrease in the segment with maturities over 10 years (of approximately 2.6 percent).

[1] Harmonised Consumer Price Index for the euro area, excluding tobacco.

[2] National index of consumer prices for Families of Manual Workers and Non-Manual Workers, excluding tobacco.

The overall average life of the government bond stock as at 31 December 2018 was 6.78 years, in line, although decreasing, with 2017, at 6.90 years and in any case such as to continue to guarantee a low risk of debt refinancing and exposure to sudden increases in issue rates. The Average Refixing Period (ARP)[3], the main index used to measure interest rate risk, only slightly decreased from 5.76 years at the end of 2017 to 5.67 years at the end of 2018 (the figure including derivatives went from 6.25 to 6.11 years); the average financial duration of the government bond stock went from 5.5 years at the end of 2017 to 5.3 years at the end of 2018 (the figure including derivatives went from 6.01 to 5.79 years). The decrease in the ARP is a consequence of the reduction in the Average Life of Debt, which in part also justifies the decrease in duration. In fact, as indicated above, although between 2018 and 2017 there was a reduction in CCTeus on the public debt stock, the increase in market interest rates on Italian government bonds, linked to the lower issues on the sector with maturities of 15-50 years, more than offset the effect of a reduction in the variable component, so much so as to determine a reduction in the duration referred to above.

In line with previous years, in 2018 these indexes thus indicate that the issuance policy has confirmed, in substance, the results achieved in recent years in terms of reducing exposure to refinancing and interest rate risks. As proof of this trend, sensitivity to interest rates was analysed, an index that analyses the effects on interest expense over the next four years (calculated on the SEC 2010 accruals basis), deriving from a significant shock on the yield curve of government bonds. The financial year was calculated considering the entire stock of government bonds issued and the existing derivatives portfolio. Taking into account both the current and future composition of the security stock, deriving from the assumptions on issues and management consistent with those underlying the estimates for interest expense, and assuming passive management of the existing derivatives portfolio for the coming years, a permanent shock of 100 basis points was applied to the entire yield curve, as well as to the Euribor rate, for the next four years.

The result shows an increase in interest expenditure in relation to GDP of 0.12 percent in the first year, 0.27 percent in the second year, 0.39 percent in the third year and 0.51 percent in the fourth year. These results are broadly in line with those of the EFD 2018, although with some slight increases[4]. These values therefore confirm that the impact of a significant and permanent market shock on net debt continues to be largely watered down over time.

The average cost at issuance in 2018 of 1.07 increased significantly compared to 2017 (0.68 percent) because of the significant increase in the yield curve for

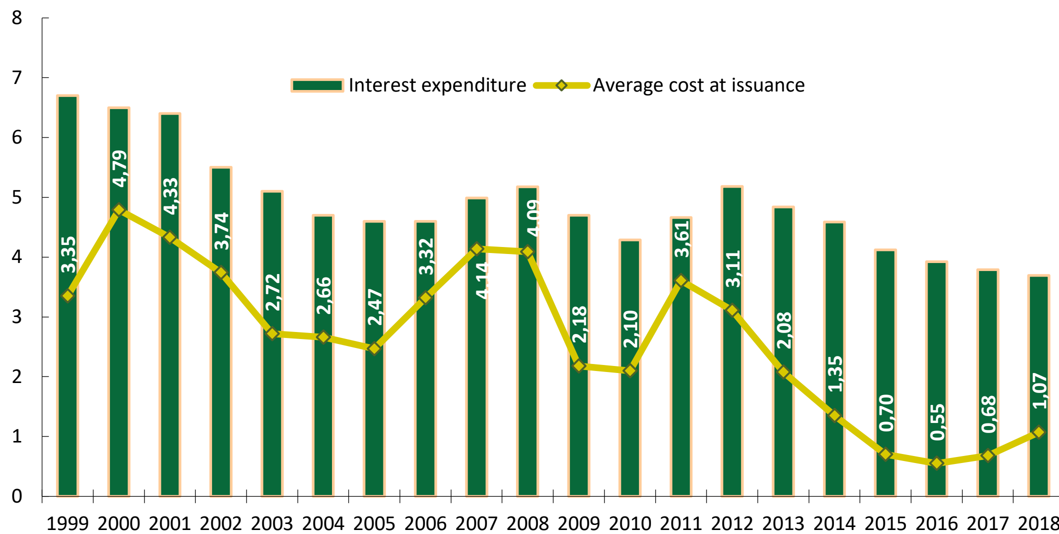
[3] The Average Refixing Period (ARP) measures the average time over which the debt becomes subject to market interest rates. For zero coupon or fixed coupon bonds, this corresponds to the residual maturity. For securities with variable coupons, this is the time remaining until the next coupon is fixed.

[4] It should be noted that comparison with the EFD 2018 figures must take into account the fact that, in this document, the financial year was calculated for the stock of domestic securities, without taking into account foreign securities and the derivatives portfolio. On the other hand, it should be noted that domestic securities as at 31-12-2018 accounted for more than 97 percent of the stock of securities issued and that, as at the same date, the notional value of the derivatives portfolio was 5.6 percent of the same stock.

Italian government bonds from mid-May onwards. However, this new level is still very modest in relation to past figures.

The interest expenditure of the general government sector, calculated according to the SEC 2010 accruals basis, stood at just under 65 billion euro in 2018, a decrease of around 619 million euro compared to the total figure for 2017. In terms of percentage of GDP, the interest expense of general government in 2018 was 3.7 percent, a fall of 0.1 percent compared to the previous year.

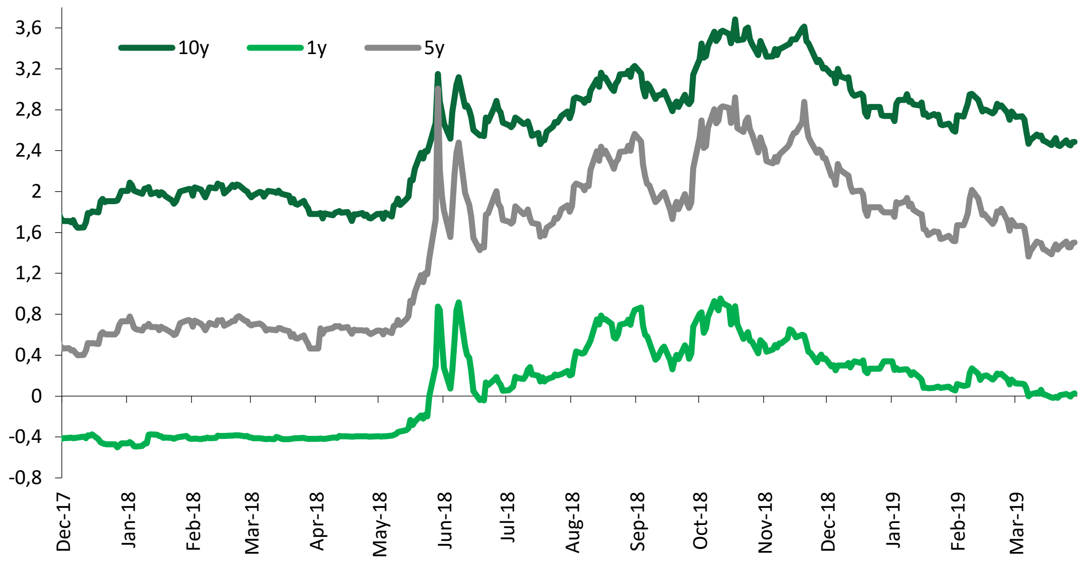
FIGURE IV.1: INTEREST EXPENDITURE AS A PERCENTAGE OF GDP AND WEIGHTED AVERAGE COST AT ISSUANCE



Source: MEF analysis.

The various components of the central government aggregate reveal that domestic securities decreased by approximately 121 million euro, foreign securities by 66 million and interest bearing postal warrants (BPFs) pertaining to the MEF by approximately 582 million. Similarly to 2017, interest expenditure on instruments other than securities instead increased, although to a lesser extent: interest on liquidity stock held in the Treasury account by entities not part of the general government increased by around 669 million euro, partly offset by the reduction in other interest on government loans, which, unlike the previous year, fell by around 336 million euro.

FIGURE IV.2: TREND OF GOVERNMENT SECURITIES YIELDS AT 1, 5 AND 10-YEAR MATURITIES



Source: MEF analysis.

FIGURE IV.3: BTP-BUND YIELD DIFFERENTIAL:- 10 YEAR BENCHMARK

Source: MEF analysis.

The reduction in interest expenditure deriving from government bonds (domestic and foreign) was very small, if compared with the reduction in 2017 compared to 2016, which was around 1.4 billion euro. As described above, the changed conditions in the government bond market led to a significant increase in the cost of debt at issuance in 2018: BOTs and CTZs were issued at positive rates, while higher European and national inflation had a significant effect on indexed securities (BTP€i and BTP Italia); for the entire nominal BTP segment, issues were made at cost conditions in line with the increases in rates on the secondary market; only CCTeus recorded a reduction in interest expenditure, of approximately 259 million euro, due to lower issues and maturities occurring

during 2018. It follows from these considerations that, despite the significant increase in the cost of new issues from the second half of May, interest on the government bond stock suffered the consequences only in terms of a smaller reduction compared to the previous year: this result is almost entirely attributable to the structure of outstanding securities, whose average life allows the effects of a sudden increase in interest rates demanded by the market to be spread over a long period.

The projected interest expenditure estimates based on the policy scenario for the period 2019-2022, in line with the usual methodology, were prepared on the basis of an interest rate scenario consistent with the expected rates implicit in the Italian yield curve (forward rates) observed during the estimation preparation period. Over the estimate period, the scenario assumes gradual rate growth on all maturities, with a downward slope in the yield curve that tends to decrease in the final years of the forecast.

The assumptions on European and Italian inflation, necessary to estimate the impact on interest expenditure of real securities (BTP€i and BTP Italia), were assumed to be consistent with the macroeconomic policy scenario.

The forecasts for issues were drawn up in such a way as to guarantee both the refinancing of maturing securities and the payment of the borrowing requirements of the State Sector, which are assumed to decrease over the estimate period: from 3.3 percent of GDP in 2019 to 1.4 percent of GDP in 2022.

Interest expenditure of the general government, according to the SEC 2010 criterion, is estimated to decrease slightly in 2019, by approximately 996 million euro, compared to 2018, mainly as a result of savings from government bonds indexed to the HICP, by virtue of the expected inflation assumptions. In 2020, interest expenditure appears to be in line with the previous year, at 3.6 percent of GDP, or just 0.1 percent of GDP more than in 2019 due to the trend in interest rates. This growth trend, although modest, has also been confirmed in the last two years, amounting to 0.2 percent of GDP in both 2021 and 2022, which can be explained by the effect of the increase in interest rates, by a significant volume of maturing bonds in both years and by the cumulative effect of the borrowing requirements of the State sector in the estimate period, which contribute to an increase in the debt stock at the end of the forecast period.

The comparison with the estimates prepared for the EFD in 2018, i.e. before the significant change in market conditions that occurred in mid-May of the same year, shows that this aggregate under unchanged legislation rose by 0.1 percentage points of GDP in 2019 and 2020 and by 0.2 percentage points in 2022.

Stochastic simulations of debt dynamics

In order to provide a short-term sensitivity analysis of the trend in the debt-to-GDP ratio, stochastic simulations were performed incorporating the historical volatility of short and long-term interest rates and of economic growth in nominal terms. The simulations were conducted using the Monte Carlo method, applying shocks on interest rates and nominal growth to the dynamics of the debt-to-GDP

ratio for the policy scenario. These shocks are based on the historical volatility of (short and long-term) yields and the nominal GDP[5] growth rate, and are obtained by performing 2000 extractions starting with a normal distribution with a zero average and variance-covariance matrix observed over the period 1999-2018. This approach therefore allows the uncertainty inherent in both yield curve and economic growth forecasts to be taken into account simultaneously. More specifically, there are two assumed cases: in the first, the interest rate shocks are temporary; in the second, they are permanent. As regards the shocks on nominal growth (always temporary), it is assumed that they also have an impact on the cyclical component of the primary surplus. As a result, for each projection year of the macroeconomic scenario and for each type of interest rate shock (temporary and permanent) the distribution of the debt-to-GDP ratio can be identified, represented as probabilities using a fan chart (Figures IV.1A and 1B).

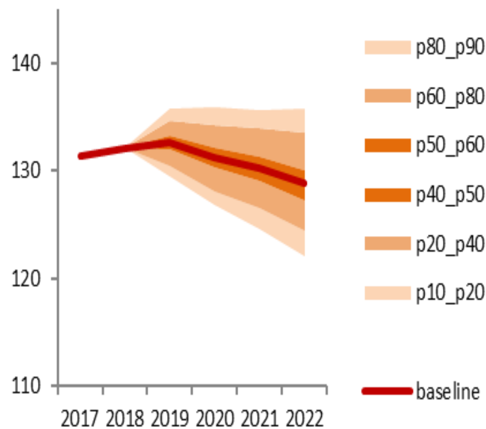
In the case of temporary shocks, the debt is distributed around a median value equal to around 129 percent of GDP at the end of the time horizon. The uncertainty recorded for the 2022 results is relatively low, as shown by a difference of about 15.4 percentage points between the tenth and ninetieth percentile of the resulting distribution of the expected debt. The debt-to-GDP ratio shows a downward trend from 2019 for the first 40 percentiles and from 2020 from the fiftieth to the eightieth percentile. For the more severe shocks (which are above the ninetieth percentile), the debt-to-GDP ratio is on the increase, albeit slightly.

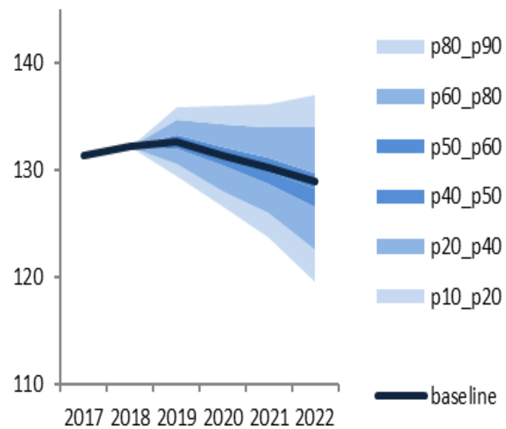
The permanent shock results in a wider distribution of debt-to-GDP ratio values around the central scenario, but assumes a similar dynamic to that obtained with temporary shocks for the first sixty percentiles. Starting from the ninetieth percentile, the dynamics of the debt-to-GDP ratio are on the increase. In the case of permanent shocks, the uncertainty recorded for the 2022 results is higher, with a difference of around 17.6 percentage points between the tenth and ninetieth percentile of distribution.

Compared to that reported in the EFD 2018, the key difference in the simulations is due to the changed forecast in dynamics of the debt-to-GDP ratio in the baseline scenario, while the distribution of shocks around this scenario remains of similar magnitude.

[5] For further information on the methodology adopted, see Berti K., (2013), ‘Stochastic public debt projections using the historical variance-covariance matrix approach for EU countries’, Economic Papers 480.

FIGURE IV.4A: STOCHASTIC PROJECTION OF THE DEBT-TO-GDP RATIO WITH TEMPORARY SHOCKS	FIGURE IV.4B: STOCHASTIC PROJECTION OF THE DEBT-TO-GDP RATIO WITH PERMANENT SHOCKS





Note: The graphs show the 10th, 20th, 40th, 50th, 60th, 80th and 90th percentiles of the distribution of the debt-to-GDP ratio obtained by stochastic simulation.
Source: MEF analysis.

In order to assess the effects of the higher volatility of short and long-term interest rates observed in the post-crisis period on the dynamics of the debt-to-GDP ratio, the stochastic analysis was replicated, narrowing the period used to extract the matrix of variance and covariance of the observed interest rates and nominal growth. The new period covered is from 2008 to 2018. It has been found that, although the variability of the two series of interest rates has increased, this effect is counteracted by the decrease in variability of nominal growth. As a result, the dispersion of the debt-GDP ratio around the median value remains broadly identical to that of the simulations presented.

Overall analysis of short-term fiscal risks

The European Commission has introduced the S0 index to its sustainability analysis in order to identify risks related to fiscal sustainability in the short term. The analysis focuses on immediate risks, with a time horizon of about 12 months. The methodology differs from that used to quantify risks in the medium and long term, described in the following sections, because no fiscal gaps are taken into account. Rather, reference is made to a composite probability index, built based on a wide range of fiscal and financial variables that in the past have proven to offer early warnings for episodes of stress.

More precisely, the methodology for constructing the S0[6] index is based on a statistical signal extraction technique applied to 25 variables. A threshold is estimated for each variable that, when reached, maximises the probability that the event will occur. The S0 index is calculated as a weighted average of the variables considered (where the weights are given by their relative predictive capacity); there are two sub-indices, one fiscal and one financial. The overall value of the S0 index together with that of the sub-indices, compared with their respective thresholds, are used to measure the probability of an imminent shock. In particular, for the S0 index, a value above the threshold indicates a potential risk in the short term, while sub-index values above the thresholds indicate a risk concentrated in the respective areas (fiscal or macro-financial).

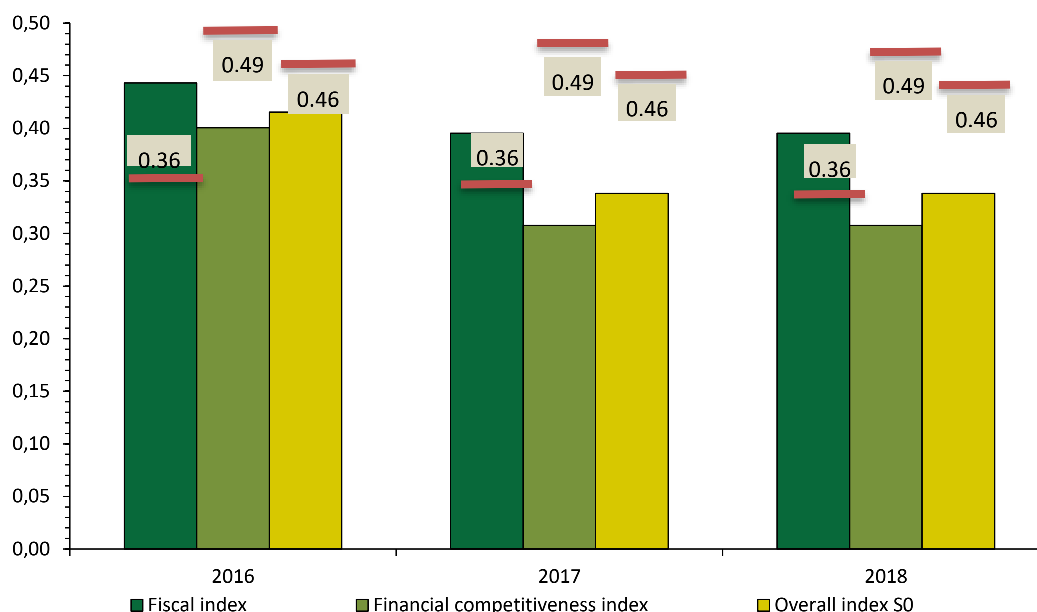
With reference to the values assumed by the index over time, it can be reported that, after the peak reached in 2009 (0.58 the value of the overall S0 index), the subsequent decrease, and further increase in 2012, the index time series showed a marked decrease until 2015 (0.19 the value of the overall S0 index). The index values until 2015 are not shown because, starting from 2016, there was a discontinuity in the methodology; the set of variables considered fell from 28 to 25 and the reference threshold values were modified, making the results not fully comparable.

Figure IV.5 shows how, for 2017, the short-term risks were limited and down on the previous year; these results had already been commented on in the previous Economic and Financial Document. The overall index stood at 0.34 (compared to 0.42 in 2016), and remained below the threshold of 0.46, above which the probability of a crisis occurring in the year following the year of analysis would be considered high. The tax component was 0.40, above the threshold of 0.36 (but with an improvement as compared to 0.44 in 2016), while the macro-financial component did not report problems and stood at a value of 0.31 (below the threshold of 0.49 and a clear improvement compared to 0.40 in 2016), effectively counterbalancing the risk on the tax side, as highlighted by the heat map (Table IV.1). The values of the 25 variables were fully updated for 2018, but the value of the S0 index does not change because the position of each sub-component with respect to the critical thresholds did not change. The results are in line with that reported in the European Commission's 2018[7] Fiscal Sustainability Report.

[6] Berti, K., Salto, M. and Lequien, M., (2012), 'An early-detection index of fiscal stress for EU countries', European Economy Economic Papers No. 475.

[7] See: European Commission 'Fiscal Sustainability Report 2018, Volume 2 – Country Analysis', Institutional Paper 094, https://ec.europa.eu/info/sites/info/files/economy-finance/ip094_en_vol_2.pdf.

FIGURE IV.5: THE S0 INDICATOR AND SUB-COMPONENTS



Source: MEF analysis on 2019 EFD, AMECO, WEO, EUROSTAT data.

TABLE IV.1: HEAT MAP FOR THE VARIABLES UNDERLYING THE S0 INDICATOR FOR 2018

Short-term risk from tax variables	Net debt (%GDP)	Primary balance (%GDP)	Cyclically adjusted budget balance (%GDP)	Stabilising primary balance (%GDP)	Gross public debt (%GDP)	Variation in public gross debt (%GDP)
	Net public debt (%GDP)	Gross requirements (%GDP)	Interest-growth differential	Variation in public expenditure (%GDP)	Variation in final consumption of PA (%GDP)	Short term public debt (%GDP)

Short-term risk from macro-financial variables	L1. International net investments (%GDP)	L1. Net savings of households (%GDP)	L1. Private sector debt (%GDP)	L1. Private sector credit flow (%GDP)	L1. Short-term debt of non-financial corporations (%GDP)	L1. Short-term debt of households (%GDP) (*)	
	L1. Added value in the construction sector (total %AV)	L1. Current account balance (3-year backward moving average) (%GDP)	L1. Variation (3 years) in REER (based on the export deflator)	L1. Variation in nominal unit labour cost	Yield curve	Real GDP growth rate	GDP per capita in PPP (%US$)

Note: The colours red and green indicate, respectively, the variables above and below the optimal threshold, calculated periodically by the European Commission and published in the Debt Sustainability Monitor. The code L1 indicates that the variable is reported with the lagged value of one period.
Source: MEF analysis.

IV.2 MEDIUM-TERM SCENARIOS

This section presents the sensitivity analysis of the debt-to-GDP ratio based on deterministic projection scenarios. A set of assumptions (alternative scenarios) is used that collectively impact on GDP growth, the yield curve and primary budget balances and allow the extrapolation of the dynamics of the debt-to-GDP ratio over a horizon extending to 2030.

Until 2022, the reference scenario (or baseline) coincides with the policy scenario of this Economic and Financial Document. In the medium term, economic growth is aligned with that of potential GDP and the primary balance in relation to GDP is maintained at the value forecast for 2022; the annual interest expenditure which, in addition to the primary surplus of the general government, is used to estimate the dynamics of the debt, is calculated using the SAPE model of the Treasury, which is fed by the database of the stock of current and forecast government bonds. The debt-to-GDP ratio is extended by taking as a starting point the composition and maturity structure of the underlying debt stock in the last year (2022) of the EFD.

The sensitivity analysis is aimed at outlining the possible alternative path of debt dynamics over the next ten years, assuming different growth profiles in relation to different interest rate assumptions.

Therefore, an optimistic and a pessimistic scenario are constructed around the baseline scenario, based primarily on alternative assumptions for the trend of the yield curve for public debt securities. In the short term (time horizon of the EFD macroeconomic scenario), the impact of the sensitivity assumptions is estimated by the Treasury's macroeconomic model (ITEM). Unlike the sensitivity exercises presented in the latest planning documents, the variations in rates have an endogenous impact on nominal growth and therefore on the primary surplus of the general government[8]. In the medium term, the assumptions underlying the analysis are more stylised so that gross domestic product growth is affected by exogenous alternative assumptions on the behaviour of total factor productivity (TFP) and the structural unemployment rate (NAWRU).

As regards the characteristics of the different scenarios in terms of assumptions on the yield curve, it is noted first that the baseline scenario incorporates the current levels of market rates and the consequent forward rates implicit in the current yield curve. Moreover, in the elaboration of estimates, precisely from a prudential point of view, the slope of the yield curve - calculated starting from the forward rates - on very long maturities ranging from 30 to 50 years was modified, bringing it back to the average levels found on the market since the introduction of the 50-year maturity. In other words, the current reversal between 30 and 50 years arising by considering only forward rates has been eliminated from the generation of future rates; this reversal has indeed never been matched in the actual market data of forward rates beyond two years of existence of the 50-year maturity.

[8] Within the Treasury Department's econometric model, a rise in long-term rates, assuming that German rates remain at baseline level, leads to an increase in the spread. Financial restriction is triggered through the channel of rates charged by banks to their customers and this has a depressive effect on demand. Lowering rates, of course, has the opposite effect.

In the optimistic scenario, a parallel reduction of the entire Italian government bond rate curve of 100 basis points is assumed at the end of 2019, to remain unchanged in the subsequent period. Conversely, in the pessimistic scenario, the yield curve is assumed to rise by 100 basis points in parallel at the end of 2019 and for the entire forecast period. For both high and low growth assumptions, in December 2022 rates start to converge again at baseline level and remain anchored to the baseline from then on.

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Medium-term sensitivity assumptions

The medium-term simulations presented below include:

i) A baseline scenario that incorporates, in the period 2019-2022, the real and potential GDP growth rates of the macroeconomic scenario underlying this Economic and Financial Document. For the years following 2022, in line with the 'T+10' methodology currently used by the European Commission and discussed at the EPC-Output Gap Working Group (OGWG), the growth rate of the potential product is projected according to the production function model, extrapolating the variables related to the individual production factors using statistical techniques (e.g. the Total Factor Productivity, TFP, which in 2030 reaches a growth rate of around 0.5 percent) or assuming that they converge in 2030 towards structural parameters (e.g. the Non-Accelerating Wage Rate of Unemployment, NAWRU, which converges to an anchor value of around 9.76 percent, as shown in Table R.1). The output gap closes following a linear trend in the three years following 2022 (it closes to zero in 2025). Again since 2022, the yield curve remains constant until the end of the forecast horizon, while the growth rate of the GDP deflator and the inflation rate calculated on the consumer price index converge to 2.0 percent in 2025[9]. Moreover, in line with the assumption of unchanged policies, the cyclically-adjusted primary balance for 2022 remains constant at the reference level of 2.4 percent of GDP until 2030.

ii) A pessimistic scenario that assumes a sudden increase in the yield curve of around 100 basis points above the reference scenario curve. This shock is reabsorbed at the end of 2022. From 2022, the yield curve remains constant until the end of the forecast horizon. As a result of the increase in the interest rate curve as compared to the reference scenario, GDP growth decelerates by 0.03 in 2019, 0.3 percentage points in 2020 and 0.4 in 2021 and 2022[10]. The potential GDP series for the years 2019-2022 is obtained by applying the usual methodology of the production function agreed at European level[11]. From 2022, the NAWRU sets off on a convergence path that ends in 2030 at 1 percentage point above the baseline scenario anchor, while the TFP growth rate converges to 0.5 percentage points below the baseline scenario level in 2030, i.e. at a negative value of 0. The output gap closes following a linear trend in 2025. Because of lower growth, the primary surplus[12] decreases correspondingly in the period 2019-2022 and subsequently remains constant at its structural level until the end of the forecast horizon. The growth rate of the GDP deflator and the rate of consumer price inflation converge to 2.0 percent in 2025.

iii) An optimistic scenario that assumes a sudden reduction in the yield curve of 100 basis

[9] In the three simulation scenarios, the inflation rate is invariably expected to converge to the policy objective of 2 percent, because the growth path is always assumed to align itself with the potential path by 2025.

[10] With regard to the impact of sensitivity assumptions in the short term, the Treasury macroeconometric model (ITEM) estimates that the exogenous variation in interest rates affects economic growth through the channel of domestic demand, i.e. investments and consumption.

[11] See in this regard the Methodological Note annexed to Section III1 of the EFD 2019.

[12] For more details on how the alternative series of the primary surplus in the high and low growth scenarios is obtained, see the Methodological Note annexed to Section III.3 of the EFD 2019.

points below the reference scenario curve. This shock is reabsorbed at the end of 2022. From 2022, the yield curve remains constant until the end of the forecast horizon. Because of the decrease of the curve of interest rates, compared to the reference scenario, GDP grows by additional 0.03 percentage points in 2019, 0.3 percentage points in 2020 and 0.4 in 2021 and 2022. The potential GDP series for the years 2019-2022 is obtained by applying the production function methodology agreed at European level. From 2022, the NAWRU sets off on a convergence path that ends in 2030 at a value of 1 percentage point lower than the baseline scenario anchor, while the growth rate of the TFP converges to 0.5 percentage points above the level recorded in the baseline scenario in 2030, i.e. at approximately 1.0 percent. The output gap closes line-by-line in 2025. As a result of higher growth, the primary surplus increases correspondingly in the period 2019-2022 while for the following years it remains constant at its structural level until the end of the forecast period. The growth rate of the GDP deflator and the rate of consumer price inflation converge to 2.0 percent in 2025.

Table R.1 illustrates schematically the characteristics of the shocks applied to the main macroeconomic and public finance variables underlying the dynamics of the debt-to-GDP ratio.

TABLE R.1: SUMMARY OF MACRO-FISCAL SHOCKS

	Scenario		
	Optimistic	Reference	Pessimistic
Yield curve	(a) yield curve of the reference scenario reduced line-by-line by 100 bp from April to December 2019. b) in December 2022 convergence to yield curve values of the reference scenario. Constant baseline scenario from 2023.	(a) yield curve of the EFD policy scenario (2019-2022) b) Constant yield curve from 2023	(a) the yield curve of the reference scenario increases line-by-line by 100 bps from April to December 2019. b) in December 2022 convergence to yield curve values of the reference scenario. Constant baseline scenario from 2023.
GDP	a) -0.03 p.p. growth for 2019; -0.3 p.p. for 2020 and -0.4 p.p. for 2021-2022 b) Convergence from 2022 to 2030 to a NAWRU value of 1 p.p. lower than the baseline and to a TFP growth rate of 0.5 p.p. higher than the baseline.	(a) baseline scenario of Update to EFD 2018-2021 b) Convergence by 2030 to parameters of the OGWG T+10 scenario (NAWRU at 9.8%, TFP growth rate at 0.5%)	a) +0.03 p.p. growth for 2019; +0.3 p.p. for 2020 and +0.4 p.p. for 2021-2022 (b) Convergence from 2022 to 2030 to a NAWRU value of 1 p.p. higher than the baseline and a TFP growth rate of 0.5 p.p. lower than the baseline.
Primary surplus	(a) restatement of the primary surplus on the basis of elasticities (sensitivity analysis) over the period 2019-2022 (b) in 2023-2030 a constant structural primary surplus at the level of 2022	(a) primary surplus of the policy scenario of the Update to EFD (2019-2022) (b) in 2023-2030 a constant structural primary surplus at the level of 2022	(a) restatement of the primary surplus on the basis of elasticities (sensitivity analysis) over the period 2019-2022 (b) in 2023-2030 a constant structural primary surplus at the level of 2022
Inflation	(a) increase as in the optimistic scenario in the period 2019 to 2022 (b) convergence to 2% between 2022 and 2025	(a) baseline scenario from 2019 to 2022 (b) convergence to 2% between 2022 and 2025	(a) reduction as per low growth scenario in the period 2019 to 2022 (b) convergence to 2% between 2022 and 2025

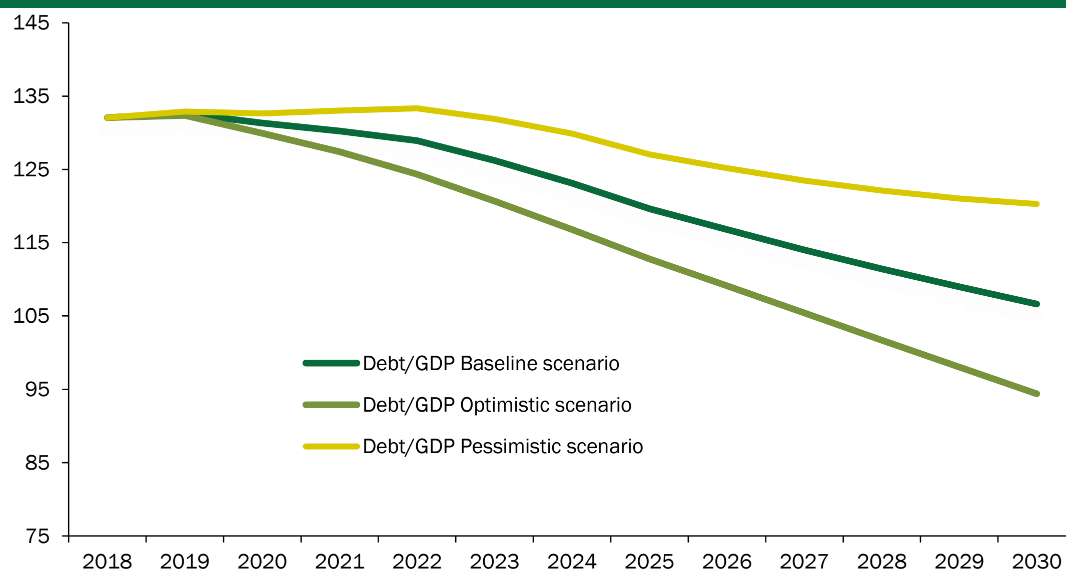
Table IV.2 shows the estimates of the main macroeconomic and public finance variables in the various scenarios for the period 2019-2022 and the convergence values at the end of the medium-term forecast horizon in 2030.

TABLE IV.2: SENSITIVITY TO GROWTH (percentage values)

		2019	2020	2021	2022	Average 2023-2029	2030
Nominal GDP growth rate	Optimistic scenario	1.3	3.1	3.1	2.9	3.2	3.4
	Baseline scenario	1.2	2.8	2.6	2.3	2.9	2.6
	Pessimistic Scenario	1.2	2.5	2.1	1.7	2.7	1.8
Real GDP growth rate	Optimistic scenario	0.3	1.1	1.2	1.2	1.2	1.3
	Baseline scenario	0.2	0.8	0.8	0.8	0.9	0.6
	Pessimistic scenario	0.2	0.5	0.3	0.4	0.7	-0.1
Potential GDP growth rate	Optimistic scenario	0.5	0.7	1.0	0.8	1.0	1.3
	Baseline scenario	0.4	0.7	0.8	0.7	0.8	0.6
	Pessimistic scenario	0.3	0.5	0.7	0.5	0.5	-0.1
Output gap	Optimistic scenario	-1.7	-1.4	-1.2	-0.8	-0.1	0.0
	Baseline scenario	-1.7	-1.6	-1.6	-1.6	-0.2	0.0
	Pessimistic scenario	-1.6	-1.6	-2.0	-2.1	-0.4	0.0
Net borrowing	Optimistic scenario	-2.3	-1.7	-1.0	-0.3	0.0	0.2
	Baseline scenario	-2.4	-2.1	-1.8	-1.5	-1.0	-0.7
	Pessimistic scenario	-2.4	-2.5	-2.7	-2.8	-2.0	-1.7
Cyclically adjusted net borrowing	Optimistic scenario	-1.4	-1.0	-0.4	0.2	0.0	0.2
	Baseline scenario	-1.4	-1.2	-0.9	-0.7	-0.8	-0.7
	Pessimistic scenario	-1.5	-1.6	-1.6	-1.6	-1.8	-1.7
Primary surplus	Optimistic scenario	1.3	1.7	2.4	3.1	3.6	3.6
	Baseline scenario	1.2	1.5	1.9	2.3	3.0	3.2
	Pessimistic scenario	1.2	1.3	1.4	1.5	2.5	2.7
Cyclically adjusted primary surplus	Optimistic scenario	2.2	2.5	3.0	3.6	3.6	3.6
	Baseline scenario	2.2	2.4	2.8	3.2	3.2	3.2
	Pessimistic scenario	2.1	2.2	2.5	2.7	2.7	2.7
Implicit interest rate	Optimistic scenario	2.7	2.7	2.7	2.7	3.3	3.6
	Baseline scenario	2.8	2.8	2.9	3.0	3.4	3.7
	Pessimistic scenario	2.8	2.9	3.1	3.3	3.6	3.7
Public debt	Optimistic scenario	132.4	129.9	127.4	124.4	109.2	94.4
	Baseline scenario	132.6	131.3	130.2	128.9	117.2	106.6
	Pessimistic scenario	132.9	132.6	133.0	133.3	125.8	120.3

Based on the macroeconomic and public finance assumptions considered, Figure IV.6 confirms the downward trend in the debt-GDP ratio over the medium term in the three scenarios proposed, albeit at different rates. In the reference scenario, the debt converges to a level of 106.6 percent of GDP in 2030, without reducing to the pace required by the debt rule benchmark. In the optimistic scenario, the debt-to-GDP ratio falls more rapidly to reach a value of 94.4 percent of GDP in 2030, about 12 percentage points below the baseline scenario figure. In the pessimistic scenario, however, the debt-to-GDP ratio, after reaching a peak of 133.3 in 2022, enters a downward path, falling to a value of 120.3 in 2030.

FIGURE IV.6: MEDIUM-TERM PROJECTION OF DEBT-TO-GDP RATIO IN ALTERNATIVE SCENARIOS



Source: MEF.

IV.3 LONG-TERM SCENARIOS

This section presents the results of the medium/long-term fiscal sustainability analysis. The analysis follows the methodology developed by the EPC-WGA (Economic Policy Committee - Working Group on Ageing) to update the projections of expenditure related to the demographic evolution of the population. The projections use Eurostat’s demographic projections (with base year 2015) and, according to certain underlying macroeconomic assumptions (e.g. labour productivity), also update the GDP and debt-GDP ratio projections over a reference horizon as far as 2070.

The update from the previous assessment cycle (2015 to 2017), of both macroeconomic assumptions and demographic trends, had a negative impact on the evolution of the long-term labour factor and GDP growth. Consequently, as already highlighted in last year's Stability Programme, there has been a marked deterioration in the ratio of total age-related expenditure to GDP compared to previous estimates. Nevertheless, the long-term sustainability of Italy’s public finances is confirmed.

The impact of ageing on fiscal sustainability

The medium-/long-term forecasts of public expenditure on pensions[13], health care, Long-Term Care (LTC), social safety nets and education for analysing the

[13] The forecasts are made on the assumption that, as already assumed in the public finance documents, that the early retirement loan program guaranteed by future pension benefit streams (so-called market APE) is qualified and classified in the national accounts as a loan and not as a direct monetary transfer to households

medium to long-term sustainability of public finances are drawn up in line with the methodological guidelines defined at European level under the EPC-WGA. These forecasts include national accounts data up to 2018 and for the following four years, the expenditure forecasts included in the public finance scenario under unchanged legislation. The scenario assumptions are consistent with the macroeconomic scenario based on unchanged legislation prepared for the EFD 2019. In the medium to long term, the forecast scenarios defined under the EPC-WGA for the 2018 forecast round were adopted, amended to take account of the impact of the structural pension measures adopted by Decree Law No. 4/2019 on the stay at work rates and appropriately linked to the short-term scenarios[14].

The demographic assumptions are based on the central scenario developed by Eurostat for 2015. This scenario envisages for Italy: i) a net flow of immigrants of around 190,000 average units per year, increasing until 2040 and then falling; ii) life expectancy in 2070 of 86.9 years for men and 90.9 years for women; iii) a total fertility rate in 2070 of 1.66.

As far as macroeconomic variables are concerned, the national accounts data was incorporated for the two-year period 2017-2018. Instead, for the four-year period 2019-2022, growth assumptions were adopted, both at constant and current prices, in line with the indications of the macroeconomic scenario at unchanged legislation of the EFD 2019. For the following period, the structural assumptions of the 2018 EPC-WGA baseline scenario were adopted, amended to reflect the impact on staying in work of the structural measures adopted by Decree Law No. 4/2019. These assumptions were linked, in the transitional phase, with the short-term dynamics[15].

The long-term dynamics of macroeconomic variables, as inferred from the assumptions agreed in the EPC WGA (EPC-WGA baseline 2018 scenario) forecast an average annual rate of change in real labour productivity that will increase until 2045, when it stands at around 1.6 percent, before falling to approximately 1.5 percent of GDP at the end of the forecast period. On the employment front, the employment rate in the 15-64 age group is expected to increase from 58.8 percent in 2018 to 62.2 percent in 2070. The interaction of these assumptions with demographic dynamics determines a growth rate of real GDP, which, in the period 2023-2070, stands at an average of around 1 percent per year. Starting from 2025,

and, in the same way, that the provisions of article 23 of Decree Law No. 4/2019 on access to credit for TFS advances for civil servants are qualified and classified in the National Accounts as a loan and do not lead to a reclassification as an advance direct monetary transfer to households also as a result of the provisions of article 24 of the same decree.

[14] The medium/long-term scenarios defined for the purposes of preparing the age-related public expenditure forecasts EPC-WGA 2018 were published in 'The 2018 Ageing Report: Underlying Assumptions and Projection Methodologies' - European Commission Directorate-General for Economic and Financial Affairs and provided in advance to the Member States at the end of May 2017. In relation to the Ageing Report scenarios, the assumptions underlying the current projections were amended to take into account the impact on labour market participation rates of the 9-month reduction in retirement age due to the block in adjustments, for the years 2019-2026, for life expectancy of the contributory retirement age requirement for the early retirement channel independent of age, as provided for by Decree Law No. 4/2019. In relation to the WGA Baseline scenario, the new activity rates are around 0.1 percentage points lower.

[15] The employment differences highlighted in 2022, when comparing the EPC-WGA baseline scenario with the short-term macroeconomic scenario of the 2019 EFD, were progressively reduced to zero. In particular, both activity rates and unemployment rates have been gradually realigned over a five-year period. As regards productivity dynamics, the assumptions of the EPC-WGA baseline scenario were substantially confirmed from 2022.

the GDP deflator and the inflation rate are assumed to be 2 percent, a value reached line-by-line from the 1.5 percent in 2022.

The forecasts in Table IV.3 are updated on the basis of the current legislation, including both the measures adopted by the Budget Law 2019 (Law No. 145/2018) and the social security measures included in Decree Law No. 4/2019, implementing the provisions included in the Budget Law[16].

In particular, the projections of pension expenditure take into account the regulatory measures included in the 2019 Budget Law[17] (Law No. 145/2018), including the introduction of the new system of indexation of pension benefits in force in the period 2019-2021 and the application in the five-year period 2019-2024 of the reduction rate for pensions exceeding €100,000 gross. Moreover, the projections include all the effects of the provisions of Decree Law No. 4/2019, including those deriving from the introduction of the new early retirement scheme 'Quota 100', which, for the period 2019-2021, in the event of the combined requirement of an age of at least 62 years and no fewer than 38 years of contributions, allows access to pension benefits even by combining the non-corresponding insurance periods found in two or more of the managements indicated by the regulation and administered by the INPS[18]. Finally, the projections of pension expenditure include, for the early retirement scheme independent of age requirements and for 'early-starting' workers (*lavoratori precoci*), the non-application of life expectancy adjustments for the period 2019-2026. During this interval, regulations allow access to early retirement regardless of age, having accrued contributions at least 42 years and 10 months for men and 41 years and 10 months for women[19]. For early-starting workers[20], access to pension benefits is possible once they have accrued at least 41 years' contributions.

As regards healthcare expenditure, the forecast discounts the financial effects associated with the postponement to 2019 of the burden for the non-renewal, for 2018 only, of the agreements for general medical care and for outpatient medical professionals, as well as the contractual costs, for the three-year period 2016-2018, for managerial employees only, following the failure to sign the relevant contracts, as provided for by the 2018 Budget Law. The forecast

[16] The institution of the Citizens' Income contained in Decree Law No. 4/2019 and converted into law on 27 March 2019, is not classified as a social security benefit. In fact, it is a support welfare service for families in a situation of financial hardship also aimed at reintegration into the world of work and social inclusion, and is compatible with income from work and concurrent redundancy support services. For this reason, it is not included in the calculation of the expenditure aggregate considered here, which takes into account the items relating to pensions, healthcare, Long-Term Care, redundancy arrangements and education.

[17] Paragraph 256 of Budget Law 145/2018 established the 'Fund for the revision of the early retirement system and to encourage the hiring of young workers', which has a budget of 7,000 million per year from 2024. The greater financial burden resulting from the social security provisions of Decree Law No. 4/2019 was financed by the substantial zeroing of the expenditure allocation under examination until 2023. In the following years, under unchanged legislation, the above-mentioned expenditure authorisation includes increasing residual amounts reaching around 5 billion euro per year from 2028. In this context, these residual allocations, not yet defined by law, are not attributed to specific structural measures in the field of pensions.

[18] The law provides for a system of starting points (mobile windows), every three months for private workers and six months for public workers.

[19] The right to start receiving a pension is finalised three months after meeting the aforementioned requirements.

[20] Even for early-starting workers, the right to start receiving a pension is finalised three months after meeting these requirements.

also discounts the costs of renewing contracts and agreements for the three-year period 2019-2021, in accordance with the 2019 Budget Law[21].

With regard to social safety nets, the forecast also takes into account the progressive effects of strengthening the protection of social safety nets provided for by the legislative decrees implementing Law No. 183/2014 (in particular Legislative Decrees No. 22/2015 and No. 148/2015).

With regard to the education system, the forecast takes into account the costs of renewing contracts for the three-year period 2019-2021, pursuant to the 2019 Budget Law, as well as the different methods of funding the actual workforce, the effects of which are rendered neutral in the long term.

Table IV.3 includes information on projections for expenditure for pensions and other social benefits. According to the new demographic and macroeconomic assumptions, total age-related expenditure decreases slightly from 27.9 percent of GDP in 2015 to 27.7 percent in 2020. Subsequently, this expenditure aggregate gradually increases to reach a peak of 30.9 percent of GDP in 2045. In the final part of the forecast horizon, the ratio falls again to 27 percent of GDP in 2070.

With regard to the individual components of age-related expenditure, after the increase recorded in previous years, the ratio of pension expenditure to GDP decreases from 2015 for about three years to reach 15.3 percent in 2018, thanks to a more favourable growth trend and the gradual continuation of the process of raising the minimum requirements for retirement. Subsequently, the ratio resumes growth, reaching 18.4 percent in 2042. In the final phase of the forecast period, the pension expenditure-to-GDP ratio declines rapidly to 14.7 percent in 2060 and 13.8 percent in 2070.

As far as healthcare expenditure is concerned, the forecast was based on the reference scenario methodology[22]. In addition to the effects of demographic ageing, this methodology also takes into account the effects of additional explanatory factors that can have a significant impact on the dynamics of healthcare expenditure. After an initial reduction as a result of measures to contain expenditure dynamics, the forecast of the ratio of healthcare expenditure to GDP increases from 2022 and stands at around 7.9 percent in 2060 and 7.7 percent of GDP in 2070.

[21] For further information, please refer to the detailed analysis found in Section II of EFD 2019.

[22] The reference scenario, applied from 2023, envisages, in particular, for the acute component of healthcare expenditure: i) the ‘‘partial’ application of the dynamic equilibrium methodology, according to which increases in life expectancy are translated into years lived in good health at a ratio of 50 percent (instead of 100 percent as in the case of the ‘full’ application); ii) the dynamics of the unit cost ‘linked’ to the GDP per capita; iii) the elasticity of the unit cost with respect to the GDP per capita higher than the unit (it decreases line-by-line in the forecast period from the initial 1.1 to 1 in 2070). For the Long Term Care component of healthcare expenditure, the reference scenario envisages: i) the ‘partial’ application of the dynamic equilibrium methodology, as for the acute component of healthcare expenditure; ii) the dynamics of the unit cost ‘linked’ to productivity; iii) the elasticity of the unit cost to productivity above the unit (it decreases line-by-line in the forecast period, going from the initial 1.1 to 1 in 2070).

TABLE IV.3 EXPENDITURE FOR PENSIONS, HEALTHCARE, CARE FOR THE ELDERLY, EDUCATION AND UNEMPLOYMENT BENEFITS (2010-2070)

	2010	2015	2020	2025	2030	2035	2040	2045	2050	2055	2060	2065	2070
Total expenditure	49.9	50.3	49.1	49.9	51.9	54.0	55.5	56.4	56.3	55.5	55.0	54.5	54.2
of which:													
- Age-related expenditure	27.5	27.9	27.7	27.6	28.7	29.8	30.7	30.9	30.1	28.9	28.1	27.5	27.0
Pension expenditure	14.8	15.7	15.8	16.0	16.8	17.8	18.3	18.1	16.9	15.6	14.7	14.1	13.8
Healthcare expenditure	7.1	6.7	6.6	6.6	6.9	7.1	7.4	7.6	7.8	7.8	7.9	7.8	7.7
of which LTC - health	0.8	0.7	0.7	0.7	0.7	0.8	0.9	0.9	1.0	1.1	1.1	1.1	1.1
LTC - social/assistance	1.0	1.0	1.0	1.1	1.1	1.2	1.2	1.3	1.5	1.6	1.6	1.6	1.6
Education expenditure	3.9	3.6	3.5	3.3	3.2	3.1	3.1	3.3	3.3	3.4	3.4	3.3	3.4
Unemployment benefits	0.7	0.9	0.8	0.7	0.7	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6
- Interest expenditure	4.3	4.1	3.6	4.4	5.5	6.3	7.0	7.7	8.4	8.8	9.1	9.2	9.3
Total Revenue	45.6	47.7	47.0	46.8	46.8	46.8	46.8	46.7	46.7	46.7	46.7	46.7	46.7
of which: Property income	0.6	0.7	0.7	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.4	0.4
ASSUMPTION (%)													
Labour productivity growth rate	2.6	0.3	0.4	0.2	0.6	0.9	1.2	1.6	1.6	1.6	1.6	1.6	1.5
Real GDP growth rate	1.7	0.9	0.6	0.8	0.3	0.4	0.5	1.1	1.3	1.6	1.2	1.4	1.1
Male participation rate (20-64)	78.4	79.5	80.4	80.3	80.2	80.3	80.3	80.6	80.6	80.5	80.5	80.4	80.4
Female participation rate (20-64)	54.6	57.8	60.7	62.6	63.7	64.2	64.5	64.6	64.7	64.7	64.7	64.7	64.8
Total participation rate (20-64)	66.3	68.6	70.5	71.4	72	72.3	72.5	72.8	72.8	72.8	72.8	72.8	72.8
Unemployment rate	8.4	11.9	11.2	9.3	8.5	8.1	7.8	7.6	7.4	7.4	7.3	7.3	7.3
Population of age 65 and over/ total population	20.4	21.7	23.1	24.7	27.1	29.8	32.1	33.5	33.8	33.7	33.4	32.9	32.8
Elderly dependency ratio (65 and over/[20-64])	33.6	36.4	39.1	42.5	47.9	54.8	61.8	66.3	67.7	67.5	66.6	65.4	65.4

Notes: (1) For the four-year period 2019-2022, growth assumptions were adopted in line with the indications of the macroeconomic scenario at unchanged legislation underlying the EFD 2019. For the following period, the scenario is adopted that the EPC-WGA prepared for the age-related expenditure forecasts for the 2018 round. (2) Until 2018, expenditure on social benefits refers to National Accounting data. For the period 2019-2022, the forecast values are in line with those underlying the forecast of the public finance scenario. (3) Paragraph 256 of Budget Law No. 145/2018 established the 'Fund for the revision of the early retirement system and to encourage the hiring of young workers', which has a budget of 7,000 million per year from 2024. The greater financial burden resulting from the social security provisions of Decree Law No. 4/2019 are financed by the substantial zeroing of the expenditure allocation under examination until 2023. In the following years, under unchanged legislation, the above-mentioned expenditure authorisation includes increasing residual amounts reaching around 5 billion euro per year from 2028. In this context, these residual allocations, not yet defined by law, are not attributed to specific structural measures in the field of pensions. (4) The forecast is based on the reference scenario methodology. (5) For 2010, the data does not discount the different accounting of the interest expense, entirely excluded from the aggregate of health expenditure for an annual amount of between 250 and 300 million. (6) The aggregate includes ISCED levels 1-8 according to the OECD classification (ISCED 2011 level). It does not include expenditure for adult education (lifelong learning) and pre-school (pre-primary). (7) Rounding up to the first decimal place may lead to inconsistencies with the values shown in the table.
Source: MEF data processing using the Long Term Forecast Model of the State General Accounting Office.

The social/assistance component of public expenditure for long-term care (LTC) consists of around 4/5 cash benefits and around 1/5 local social/assistance services[23]. With regard to the latter, the expenditure/GDP ratio forecast was based on the assumptions underlying the reference scenario as defined for the health component of LTC expenditure.

[23] For more details, see the Ministry of Economy and Finance-RGS (2018), Report No. 19, chapter 4.

With regard to cash benefits, in consideration of the specific nature of the service consisting of monetary amounts paid to the beneficiary and not the purchase of goods and services, the amount of the benefits was structurally 'linked' to the dynamics of GDP per capita from 2023[24]. After an initial phase of substantial stability, the social/assistance component of LTC expenditure presents a growing profile in terms of GDP, which extends over the entire forecast period, reaching 1.6 in 2070.

The projection of expenditure for social safety nets in relation to GDP rises from 0.7 percent in 2010 to 0.9 percent in 2015, before gradually decreasing and reaching a value of approximately 0.6 percent from the second half of the forecast period.

The expenditure projection for education as a percentage of GDP[25] is consistent with the expenditure aggregate defined in the EPC WGA. The expenditure-to-GDP ratio shows a gradually decreasing trend that continues for about fifteen years. Starting from 2022, this fall is essentially driven by the drop in student numbers caused by demographic dynamics. The ratio starts to grow slightly again in the final part of the forecast period, reaching around 3.4 percent in 2070.

FOCUS

Medium-long term trends of the Italian pension system

In implementation of the provisions included in the 2019 Budget Law (Law No. 145/2018), Decree Law No. 4/2019[26] has established, on an experimental basis and only for the period 2019-2021, a new channel of early retirement that can be accessed by all workers who meet the following combined requirements: age of at least 62 years and at least 38 years' accrued contributions.

The law envisages different rules for retirement for workers in the private sector and for those in the public sector. For the former, postponement is foreseen of the first effective date of pension benefits of three months from the date of meeting these combined requirements. For workers in the public sector, with the exception of the school sector, for which specific provisions apply, access to pension benefits is finalised 6 months after these combined requirements have been met[27]. Decree Law No. 4/2019 provides for further measures in the field of pensions. In particular, the regulations impose a reduction to the

[24] In line with the methodological indications agreed in the EPC-WGA for the preparation of the 2018 forecast round, the elasticity of the unit cost with respect to GDP per capita rises from 1.1 to 1 over the entire forecast period.

[25] The definition of education expenditure agreed within the EPC-WGA includes ISCED levels 1 to 8 according to the 2011 ISCED classification (from 1 to 6 according to the 1997 ISCED classification), excluding pre-school (pre-primary), which corresponds to ISCED level 0, and lifelong learning (See European Commission, Special Report No. 1/2006). The expenditure aggregate is built on UNESCO/OECD/EUROSTAT (UOE) data. The forecast includes UOE data updated to the financial year 2015.

[26] Implementing the provisions of Law No. 145/2018 (2019 Budget Law) in terms of related financial planning. Paragraph 256 of Budget Law No. 145/2018 established the 'Fund for the revision of the early retirement system and to encourage the hiring of young workers', which has a budget of 7000 million per year from 2024. The greater financial burden resulting from the social security provisions of Decree Law No. 4/2019 were covered by the substantial zeroing of the allocation of the expenditure authorisation under examination until 2023. In the following years, under unchanged legislation, the above-mentioned expenditure authorisation includes increasing residual amounts reaching around 5 billion euro per year from 2028. In this context, these residual allocations, not yet defined by law, are not attributed to specific structural measures in the field of pensions.

[27] Pension benefits obtained according to the new early retirement scheme at least 62 years of age and with at least 38 years of contributions cannot be combined, until reaching old-age retirement age, with income from employment or self-employment, with the exception of income from occasional self-employment up to a maximum of 5,000 euro gross per year.

2018 level, i.e. 42 years and 10 months for men and 41 years and 10 months for women, of the years' contribution requirement for the channel of early retirement independent of age and the freezing, for the period 2019-2026, of the related adjustments to life expectancy. This channel is also subject to the system of starting dates, so that the right to start receiving the pension is finalised 3 months after meeting the contributions requirement.

The non-application of life expectancy adjustments for the period 2019-2026 is also foreseen for so-called 'early-starting' workers who are eligible for retirement once they have accrued at least 41 years' contributions[28]. Finally, Decree Law No. 4/2019 strengthens the 'Women's Option' measure by allowing female workers who reach 58 years of age by 31 December 2018 for employees and 59 years for self-employed workers and at least 35 years of contributions to take early retirement, with the calculation of retirement benefits[29] entirely under the contribution system.

Despite having a significant financial impact, the new rules introduced by Decree Law No. 4/2019 have the purpose of making access to early retirement temporarily easier.

The extension of the contribution system to all workers, including those who, according to the previous legislation, would have received a pension calculated according to the wage system (i.e. those who had more than 18 years of contributions as at 31/12/1995), is confirmed with effect from 2012. Moreover, in line with the regulatory and institutional structures found in most European countries, the Italian pension system maintains two channels of access to retirement[30]: (a) an old-age pension with at least 20 years' contributions and a legal age requirement that, for 2019, is 67 years[31]; (b) early retirement, with 20 years' contributions, allowed up to three years before the old-age pension age for workers hired after 1 January 1996 and subject to reaching a sufficiently high[32] level of pension contributions, or regardless of age and date of recruitment but with a longer contribution period.

Starting in 2013, all age requirements (including those for access to the social allowance) and contribution requirements for access to early retirement, regardless of age, are indexed to changes in life expectancy as measured by ISTAT. Aside from that recently established by Decree Law No. 4/2019, which, for the channel of early retirement independent of age, requires the non-application for the period 2019-2026 of the adjustments for life expectancy; for all the other requirements for access to retirement, these adjustments are made every two years, according to a procedure entirely administrative in nature[33].

[28] Even for early-starting workers, the right to start receiving a pension is finalised three months after meeting these requirements.

[29] The law also provides for the postponement of the first effective date of pension benefits by 12 months from meeting the requirements for female employees and by 18 months for self-employed women.

[30] Safeguard measures have also been envisaged to ensure a more gradual implementation of the 2011 reform, i.e. taking account of specific details in relation to the proximity to retirement and difficult situations related to staying in the labour market, cases which have all been specifically identified at regulatory level.

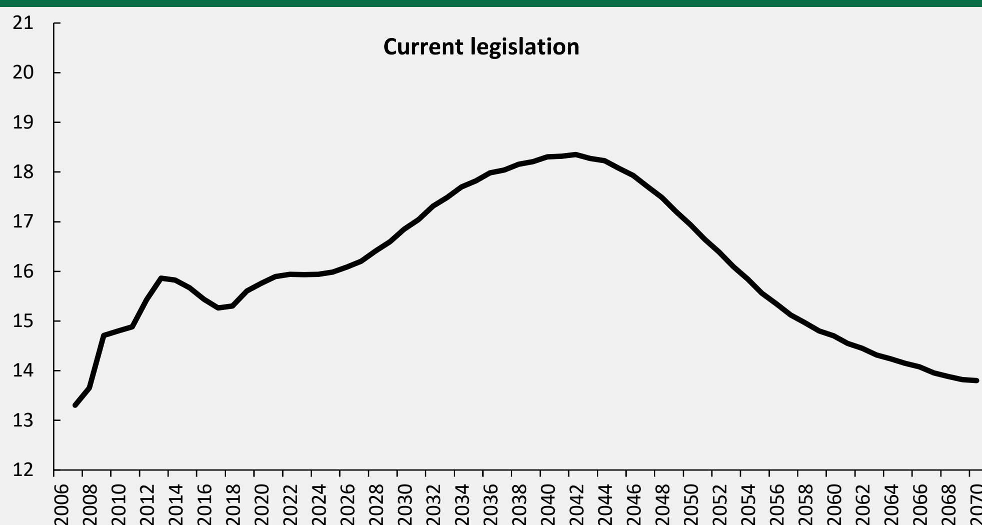
[31] In addition, for workers recruited after 1 January 1996, for whom the pension is fully calculated using the contributions system, access to old-age retirement is also subject reaching a minimum pension amount of 1.5 times the 2012 social allowance revalued on the basis of GDP trends.

[32] For these workers, for whom the pension is fully calculated using the contribution system, access to early retirement is also subject to achieving a minimum pension amount of 2.8 times the social allowance revalued on the basis of GDP trends.

[33]The adjustment of the requirements starting in 2016 (4 additional months), in compliance with the provisions of the law (article 12, paragraph 12-bis, of Decree Law No. 78 of 31 May 2010, converted with amendments by Law No. 122 of 30 July 2010), was adopted at least twelve months before the start of the adjustment by Directorial Decree of 16 December 2014, published in the Official Journal on 30 December 2014, and that of the conversion coefficients by Directorial Decree of 22 June 2015, published in the Official Journal on 6 July 2015. The adjustment of the requirements starting in 2019 (additional 5 months), in compliance with the provisions of the law, was adopted at least twelve months before the adjustment started with Directorial Decree dated 5 December 2017, published in the Official Journal on 12 December 2017. The current legislation provides for a guarantee clause according to which the minimum old-age requirement may not be less than 67 years for

Moreover, from 2013, the calculation of the conversion coefficients[34] at the time of retirement was extended to the old-age requirement age plus four years.
According to this regulatory framework, the figure below shows the forecast of pension expenditure as a percentage of GDP at unchanged legislation[35], based on the EPC-WGA Baseline scenario[36].

FIGURE R.1: PUBLIC EXPENDITURE FOR PENSIONS AS A PERCENTAGE OF GDP



Notes: The EPC-WGA Baseline scenario incorporates, in the short term, the general trends indicated in the 2019 Stability Programme.
Source: Long Term Forecast Model of the State General Accounting Office.

After the growth recorded between 2008 and 2014, exclusively due to the continuation of the recessionary phases of the economic cycle, from 2015, thanks to the more favourable economic growth and to the gradual continuation of the process of raising the minimum retirement requirements and the pro-rata application of the contribution calculation system, the ratio of pension expenditure to GDP decreases for around three years. Subsequently, the ratio of pension expenditure to GDP begins a long period of growth that lasts until 2042, reaching a peak of 18.4 percent. In the first phase, this increase is explained in part by the slowdown in the dynamics of short-term gross domestic product and that assumed in the

those who are eligible for retirement as of the first effective date from 2021. In any case, according to ISTAT's demographic forecasts, the aforementioned objective could be assured as early as 2019.

[34] The conversion factor is also adjusted in accordance with the same timetable as for the adjustment of the eligibility requirements for retirement. The adjustment, effective from 1 January 2016, was adopted by Directorial Decree of 22/06/2015, published in Official Journal No. 154 of 6 July 2015, while the adjustment of 2019 was approved by Directorial Decree of 15 May 2018, published in Official Journal No. 131 of 8 June 2018.

[35] The forecasts are elaborated on the assumption that the institution of the pension guarantee financial advance (so-called market APE) is qualified and classified in the national accounts as a loan and not as a direct monetary transfer to households and, in the same way, that the provisions of article 23 of Decree Law No. 4/2019 on access to credit for advance TFS for civil servants are qualified and classified in the National Accounts as a loan and do not involve a reclassification as an advance of direct monetary transfer to households also as a result of the provisions of article 24 of the same decree.

[36] The pension expenditure forecasts as a ratio of GDP take into account, for the four-year period 2019-2022, the growth assumptions, both at constant prices and at current prices, of the short-term macroeconomic scenario at unchanged legislation defined for the EFD 2019. For the following period, the structural assumptions of the 2018 EPC-WGA baseline scenario were adopted, amended to reflect the impact of the structural measures adopted by Decree Law No. 4/2019 on time at work.

EPC-WGA Baseline[37] scenario and, in part, by greater recourse to retirement, because of the measures provided for by Decree Law No. 4/2019. In a second phase, after 2030, the growth in the ratio between pension expenditure and GDP is attributable to the increase in the number of pensions compared to the number of employees due to the retirement of the baby boom generations, which is only partly offset by the increase in the minimum pension requirements and by the effect of limiting the pension amounts exerted by the gradual application of the system for calculating contributions over the entire working life.

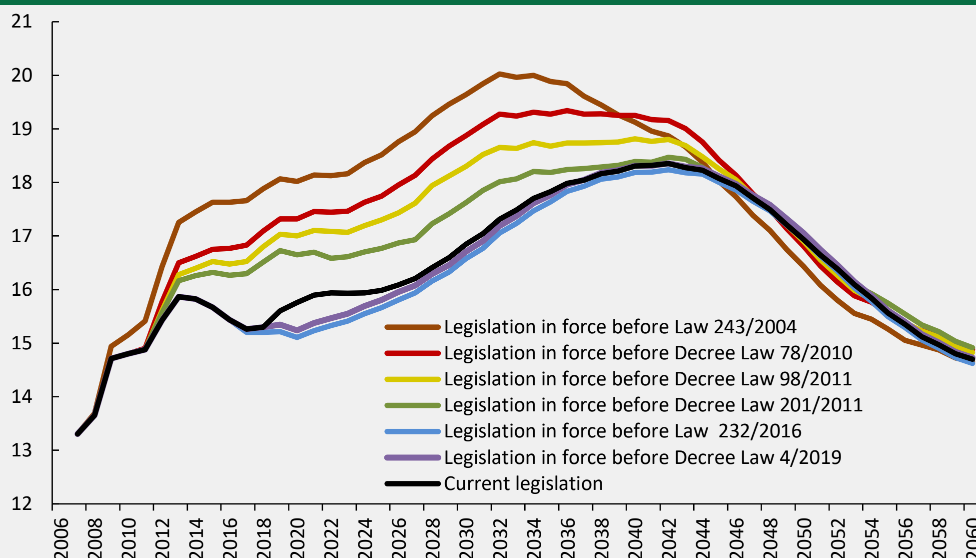
After the peak in 2042, the ratio of pension expenditure to GDP falls rapidly to 16.9 percent in 2050 and 14.7 percent in 2060, converging to 13.8 percent in 2070, with an almost constant deceleration over the entire period. The rapid reduction in the ratio between pension expenditure and GDP in the final phase of the forecast period is due to the generalised application of the contribution calculation, which is accompanied by the stabilisation and subsequent trend reversal of the ratio between the number of pensions and the number of people in employment.

This trend is explained both by the gradual exit of the baby-boom generations and by the automatic adjustment of the minimum retirement requirements according to life expectancy.

The figure below presents the forecast of pension expenditure as a share of GDP under unchanged legislation and compares it with that which would have occurred as a result of the schemes preceding the main reform measures. Compared to the immediately preceding legislation, in the period 2019-2036, the measures found in Decree Law No. 4/2019 and in the Budget Law for 2019 (Law No. 145/2018) included in the scenario at unchanged legislation generate an increase in the incidence of pension expenditure as a percentage of GDP equal of an average 0.2 points per year, progressively decreasing from the first years of the forecast, where there is a greater incidence of expenditure as a percentage of GDP. In the long term, thanks to the overall reform process implemented from 2004, the average retirement age (taking into account both the old-age retirement age and the requirements for early retirement) increases from 60-61 during the period 2006-2010 to about 63 in 2017, 67 in 2040 and then about 68 in 2050. Cumulatively, the lower expenditure to GDP ratio resulting from the overall reform process launched in 2004 amounts to around 60 percentage points of GDP by 2060.

[37] As already outlined in the Update Note to the 2017 EFD, in the 2018 EFD (Section I, 2018 Stability Programme) and in the 2018 Update Note to the 2018 EFD, the EPC-WGA Baseline scenario prepared for the 2018 forecast round showed significant deterioration in Italy compared to the previous one (2015 round), attributable to the revision of the demographic scenario by Eurostat and of the medium-term macroeconomic scenario by the European Commission.

FIGURE R.2: PUBLIC EXPENDITURE FOR PENSIONS AS A PERCENTAGE OF GDP UNDER DIFFERENT REGULATORY ASSUMPTIONS



Notes: The EPC-WGA Baseline scenario incorporates, in the short term, the general trends indicated in the 2019 Stability Programme.
Source: Long Term Forecast Model of the State General Accounting Office.

Long-term debt dynamics and fiscal sustainability indexes

The use of age-related expenditure and GDP projections over the long term, together with additional public finance assumptions, makes it possible, again in accordance with the fiscal surveillance methodology used by the European Commission, to obtain debt forecasts until 2070. Following this approach, tax revenues are assumed constant in relation to GDP, at the 2022 level, throughout the forecast period. Public expenditure, on the other hand, as already mentioned, varies according to the population dynamics. Finally, the GDP deflator converges to 2.0 percent from 2023 and the real interest rate, starting from the 2022 level, converges to 3.0 percent in ten years[38].

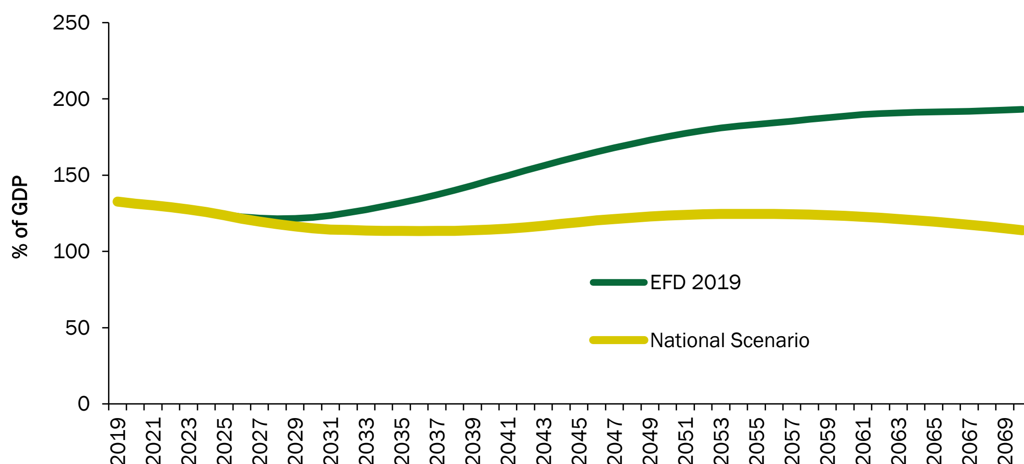
As shown in Figure IV.7, the long-term forecasts of debt-to-GDP in the reference scenario of this document outline a growing trend, with debt forecast to be around 193.1 percent of GDP in 2070. This is worse than the national scenario forecasts, which predict a debt-to-GDP ratio of 113.8 percent in 2070[39].

[38] European Commission, 2017, The 2018 Ageing Report: Underlying assumptions and Projection Methodologies, European Economy, Institutional Papers, No. 65 (https://ec.europa.eu/info/sites/info/files/economy-finance/ip065_en.pdf).

[39] The long-term projections for the national scenario are based, for the demographic assumptions, on the ISTAT median scenario for 2017. This scenario envisages: i) an annual net flow of immigrants of an average 165,000 units; ii) life expectancy in 2070 of 86.5 years for men and 90.6 years for women; iii) a total fertility rate in 2070 of 1.61. With regard to macroeconomic variables, for the two-year period 2016-2017, the national accounting data has been incorporated, and for the four-year period 2019-2022, the growth forecasts of the overall macroeconomic trends of the EFD 2019 were adopted, at both constant and current prices. For the subsequent period, the macroeconomic trends of the national scenario discounts the productivity growth rate

Comparison between the national scenario and the EFD 2019 scenario reveals a different debt trend, deriving from the demographic assumptions underlying the estimated evolution of public spending and economic growth. As has been pointed out on several occasions, the update of the demographic scenario under the EPC-AWG, together with the revision of the macroeconomic assumptions, contributed significantly to changing the expected dynamics of the debt/GDP ratio.

FIGURE IV.7: DEBT-TO-GDP RATIO: COMPARISON OF PROJECTION SCENARIOS



Source: MEF analysis based on the Long Term Forecast Model of the State General Accounting Office.

The baseline scenario is also used to calculate the medium and long-term indexes (S1 and S2) used by the European Commission to estimate the adjustment needed to achieve fiscal sustainability, also taking into account the impact of implicit liabilities related to population ageing. In particular, the medium-term S1 index measures the adjustment of the structural primary balance to be achieved in cumulative terms over the five years following the last year of the forecast, so as to ensure, if kept constant in subsequent years, that a 60 percent debt-to-GDP ratio is reached within fifteen years and that the higher age-related costs are also financed. As a result of its construction, the parameters of the S1 index are established with respect to the public debt target set out in the Stability and Growth Pact. The long-term S2 sustainability index, on the other hand, shows the fiscal adjustment in terms of the structural primary balance, which, if achieved and maintained from the last year of the forecast onwards, would maintain the interim balance of the budget over an infinite period of time.

In the Commission's interpretation, the higher and more positive the values of the S1 and S2 sustainability indexes, the greater the fiscal adjustment required to achieve the objective of debt sustainability and therefore the risk of fiscal

that gradually increases from 0.4 percent in 2020 to a peak of 1.6 percent in 2045 and then falls to 1.5 percent in the final part of the forecast period. The activity rate in the 20-64 age group increases from 68.6 percent in 2015 to 76 percent in 2070, while, at the end of the forecast period, the unemployment rate converges to 5.5 percent. According to these demographic and macroeconomic assumptions, the growth rate of real GDP is around 1.2 percent per year on average in the long term, with an increasing trend in the first decade, decreasing in the following twenty years and recovering slightly in the final part of the forecast period. For further details, see RGS, 2018, Report on Medium-Long-Term Trends in the Pension, Social Care and Healthcare System, No. 19.

sustainability. Ultimately, the fiscal risk reflects the initial structural primary balance, the value of current debt and the projected dynamics of age-related public expenditure costs. Both indexes are based on the projected growth and budget balances of the EFD 2019 and incorporate medium to long-term forecasts of age-related expenditure.

Table IV.5 shows the results of the S1 and S2 indexes and their respective components estimated by the Ministry of Economy and Finance in the latest Stability Programmes and by the European Commission in the Fiscal Sustainability Report[40] and the Debt Sustainability Monitor[41].

The value of the S1 index estimated by the Ministry of the Economy and Finance shows a deterioration compared to previous documents, largely due to the updating of demographic projections and the revision of macroeconomic assumptions. The breakdown of S1 by sub-component shows that the adjustment needed to stabilise the debt-to-GDP ratio at the current level is -0.8 GDP points, which almost offsets the component related to the costs of population ageing. The component that most affects the index is the adjustment needed to reduce the debt ratio from its initial level to 60 percent of GDP in 2034. This component assumes a cumulative fiscal adjustment over the five-year period 2022 - 2026 of 5.1 p.p. of GDP. The overall value of the index is 6.1 p.p. of GDP, higher than the medium-term high risk threshold set by the European methodology at 2.5 p.p. of GDP.

The S1 index estimated by the European Commission and presented in the Fiscal Sustainability Report 2018 differs from the index estimated by the Ministry of the Economy and Finance mainly for the different and more unfavourable forecasts of public finance and underlying macroeconomic conditions[42]. It should be noted that the public finance forecast starts from the last year of the time horizon, which for the MEF is 2022, whereas for the Commission it is 2020. In the analysis of the Commission, the initial structural primary surplus is 0.4 percent of GDP; in the same year, the Ministry of the Economy and Finance estimates a structural primary surplus of 2.2 percent of GDP. Given these considerations, according to the Commission's estimates, it would be necessary to achieve a cumulative structural primary surplus over the period 2021-2025 of 9.4 percentage points of GDP, i.e. an average annual consolidation of around 2 p.p. of GDP, in order to lower the debt-to-GDP ratio to 60 percent in 2033. The adjustment cost is due for 4.9 p.p. to the distance between the current debt-to-GDP ratio and the target to be achieved, for 2 p.p. to the stabilisation of the debt-to-GDP ratio given the initial fiscal position and for 1.6 p.p. to the additional cost due delays in fiscal adjustment. The higher expenditure related to demographic dynamics represents around 0.9 p.p. of GDP.

[40] European Commission, 2019, Fiscal Sustainability Report 2018, Institutional Papers 094. January 2019, available at: https://ec.europa.eu/info/publications/economy-finance/fiscal-sustainability-report-2018_en

[41] European Commission, 2019, Debt Sustainability Monitor 2017, Institutional Papers 071. January 2018, available at: https://ec.europa.eu/info/sites/info/files/economy-finance/ip071_en.pdf

[42] S1 estimates also differ over a different time horizon: the debt/GDP target of 60 percent must be achieved over fifteen years, with 2019 as the base year, while in this document the base year is 2019. In addition, the Commission adopts forecasts with no policy changes, while the EFD uses the policy scenario.

TABLE IV.4: SUSTAINABILITY INDICATORS (points of GDP)

	EFD 2019	2018 Fiscal Sustainability Report	EFD 2018	Debt Sustainability Monitor 2017	EFD 2017	2015 Fiscal Sustainability Report	EFD 2016
S1 Index							
Total adjustment	6.1	9.4	6.4	6.7	3.9	4.2	3.9
of which:							
For debt/GDP ratio stabilisation	-0.8	2.0	-1.6	0.4	-2.8	-1.4	-2.8
For the adjustment delay	1.1	1.6	1.3	1.1	0.7	0.7	0.7
To reach the 60% target	5.1	4.9	5.6	5.1	5.6	5.1	5.6
For ageing costs	0.8	0.9	1.0	0.1	0.3	-0.2	0.3
S2 Index							
Total adjustment	0.2	2.9	0.2	0.6	-1.9	-0.9	-1.9
of which:							
For debt/GDP ratio stabilisation	-0.6	1.8	-1.3	0.5	-2.0	-0.8	-2.0
For ageing costs	0.8	1.1	1.5	0.1	0.1	-0.1	0.1

Source: MEF data analysis.

In the long term, on the other hand, Italy confirms its ability to meet its debt obligations. In fact, the S2 index used in European fiscal surveillance, both in the Ministry of the Economy and Finance's and the Commission's estimates, is far from the critical high-risk threshold (characterised by the necessary fiscal consolidation of 6 p.p. of GDP). The overall value of the S2 index estimated by the Ministry of the Economy and Finance is 0.2 percent, which is below the threshold of 2 p.p. of GDP, under which a country is considered to be at low risk in the long term. This value is due to the higher costs linked to population ageing. On the other hand, the value of the component that measures the adjustment needed to stabilise the debt-to-GDP ratio at the 2022 level is -0.6 GDP points. In the Fiscal Sustainability Report 2018, the European Commission estimates a cumulative fiscal consolidation of 2.9 p.p. of GDP of the structural primary balance necessary to stabilise the debt-to-GDP ratio over the long term and under unchanged policy conditions[43].

Sensitivity analysis of long-term debt dynamics

In order to test the strength of the long-term debt-to-GDP ratio forecast in the baseline scenario against its characteristic uncertainty, certain sensitivity scenarios are constructed to measure the debt-to-GDP ratio's response to demographic, macroeconomic and fiscal shocks. The following scenarios therefore replicate the assumptions underlying the sensitivity exercises presented in the last 2018 Ageing Report by the European Commission.

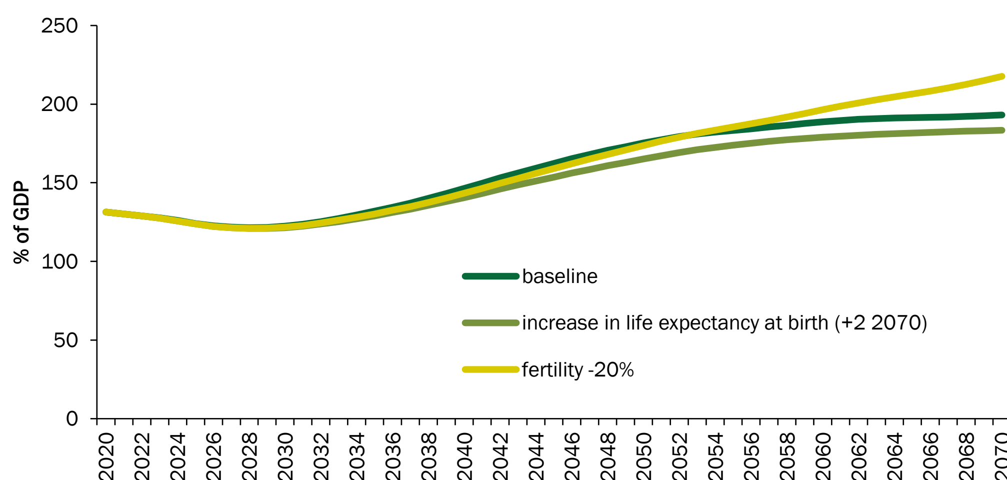
[43] From this edition, the Fiscal Sustainability Report 2018 bases the assessment of long-term fiscal sustainability on the joint use of debt sustainability analysis (DSA) and the S2 index. Overall, Italy is now at high risk; in fact, the S2 index indicates a medium risk level (not lower, as in the 2015 Fiscal Sustainability Report) while the DSA indicates a high risk.

Simulations with regard to demographic variables

Population ageing and migratory flows are among the most critical issues that Italy will have to face in the coming decades. In this regard, it is particularly important to assess the impact of the main determinants of demographic change separately, namely: i) the increase in life expectancy; ii) the trend in the fertility rate of the population and iii) the net flow of immigration. These factors have an impact on public spending and hence on the evolution of debt in the long run.

Figure IV.8 shows the long-term evolution of debt following the alteration of the assumptions on demographic variables of fertility and longevity. As already mentioned, the demographic assumptions of the EPC-AWG scenario envisage the following for Italy: i) a level of life expectancy in 2070 of 86.9 years for men and 90.9 years for women; ii) a total fertility rate in 2070 of 1.66. Assuming a deviation from the baseline scenario due to the progressive reduction in the fertility rate of 20 percent from 2019 onwards, the effect observed is an increase in the debt-to-GDP ratio, which is an average 2.9 GDP points for the projection horizon 2023-2070, increasing at the end of the period. In a scenario that discounts the assumptions of a progressive increase in life expectancy at birth of around 2 years higher in 2070 than in the reference scenario, the debt-to-GDP ratio decreases, in the period 2023-2070, by an average 6.6 points of GDP compared to the baseline scenario.

FIGURE IV.8: SENSITIVITY OF PUBLIC DEBT TO A RISE IN LIFE EXPECTANCY AND A REDUCTION IN THE FERTILITY RATE (as a percentage of GDP)

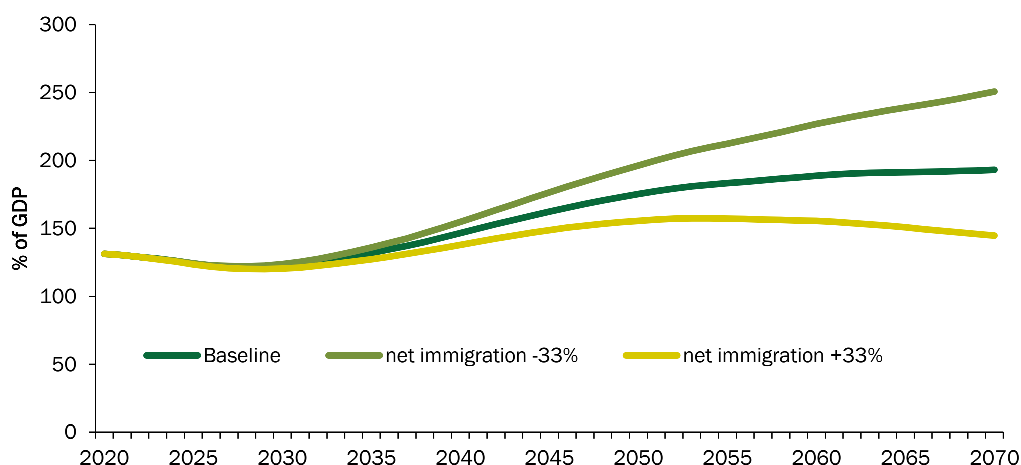


Source: MEF analysis based on the Long Term Forecast Model of the State General Accounting Office.

In line with the assumptions agreed under the EPC-AWG and according to a demographic scenario developed ad hoc by Eurostat, the net flow of immigrants is around 190,000 annual average units, increasing to 2040 and decreasing thereafter. The sensitivity exercise assumes two alternative scenarios for the period 2023-2070: i) a 33 percent decrease in the average net annual flow of immigrants compared to the base assumptions, starting in 2019; ii) a 33 percent increase in the net flow of immigrants, again starting in 2019. The evolution of public debt in the two alternative scenarios is compared with that of the

reference scenario in Figure IV.9. With the same structural primary balance as in 2022 and given the initial debt, an increase in net migration flows of 33 percent from 2019 would allow the debt-to-GDP ratio to be significantly reduced with respect to the baseline, with an average reduction of around 18.5 GDP points over the period 2023-2070.

FIGURE IV.9: SENSITIVITY OF PUBLIC DEBT TO AN INCREASE/REDUCTION OF THE NET FLOW OF IMMIGRANTS (as a percentage of GDP)



Source: MEF analysis based on the Long Term Forecast Model of the State General Accounting Office.

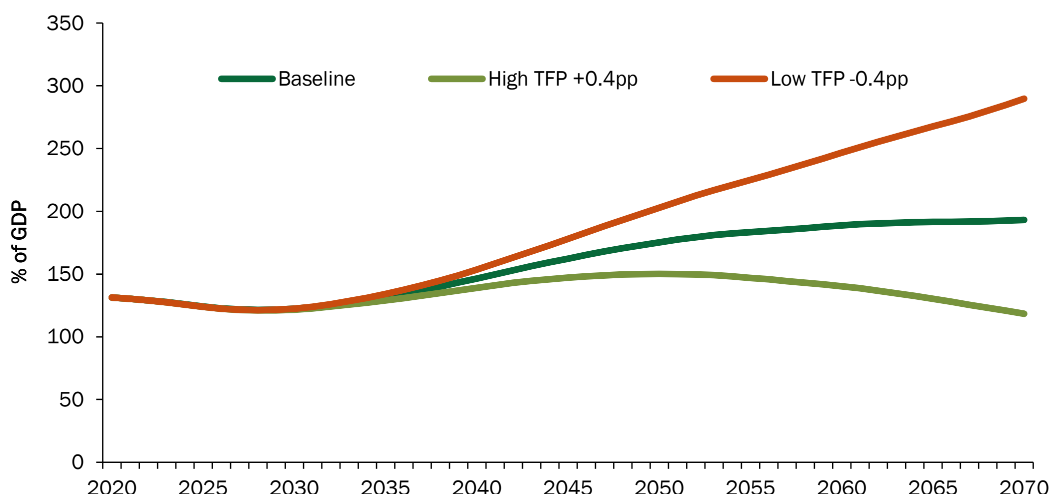
On the other hand, the decrease in net migration flows from 2019 would have the effect of increasing debt, with an average increase over the baseline of around 20.5 GDP points from 2023 to 2070.

Simulations with regard to macroeconomic variables

The sensitivity analysis of macroeconomic variables aims to test the strength of the debt-to-GDP ratio forecasts against alternative assumptions on more or less favourable dynamics of Total Factor Productivity (TFP) and total employment rate.

With regard to TFP, the simulation exercise envisages two alternative scenarios in which it is assumed that TFP growth is, respectively, 0.4 percentage points higher or lower (gradually from 2026 and standard from 2045) than in the baseline scenario. In the baseline scenario, labour productivity growth for 2020 is estimated at 0.5 percentage points, rising to 1.6 percentage points in 2045. The impact on sustainability of a greater (worse) TFP dynamic is quite small in the short and medium term but becomes substantial over a longer horizon (Figure IV.10). In the event of low TFP growth, the debt-to-GDP ratio would be higher than the baseline by an average 29.6 percent of GDP in the period 2023-2070, while in the event of high TFP growth, the debt would reduce by an average 25.1 percent of GDP vis-à-vis the baseline scenario.

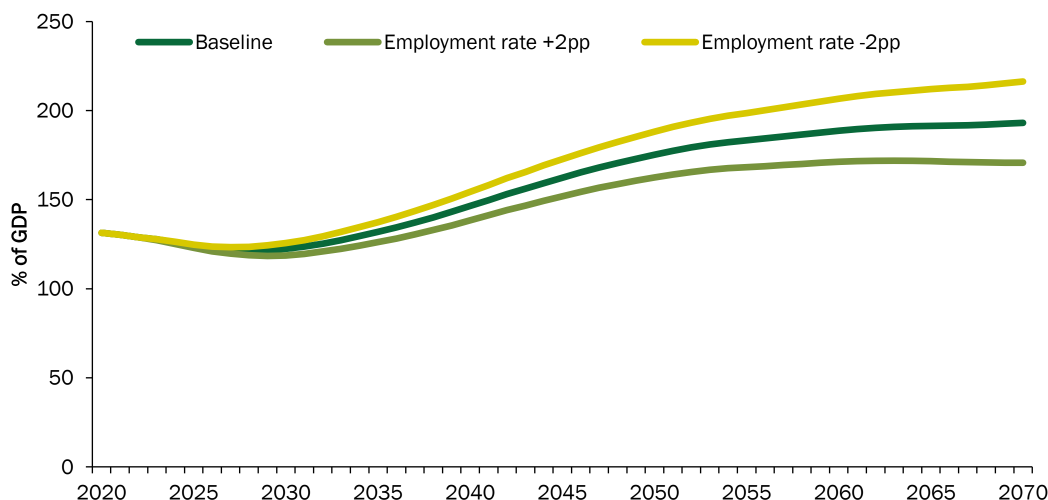
FIGURE IV.10: SENSITIVITY OF PUBLIC DEBT TO MACROECONOMIC ASSUMPTIONS, HIGHER AND LOWER GROWTH OF TOTAL FACTOR PRODUCTIVITY (as a percentage of GDP)



Source: MEF analysis based on the Long Term Forecast Model of the State General Accounting Office.

Another simulation scenario assumes that the employment rate, calculated on the 20-64 population, will increase/decrease gradually from 2019 onwards, compared to the baseline assumption, to 2 percentage points in 2030, and remain at this level for the remainder of the period. In the event of a decrease in the employment rate, the debt-to-GDP ratio dynamics would be around 11.2 percent of GDP higher than the baseline for the period 2023-2070, while, at the same time, an increase would reduce the debt-to-GDP ratio by an average 11.3 percent of GDP compared to the baseline (Figure IV.11).

FIGURE IV.11: SENSITIVITY OF PUBLIC DEBT TO MACROECONOMIC ASSUMPTIONS, EMPLOYMENT RATE (as a percentage of GDP)

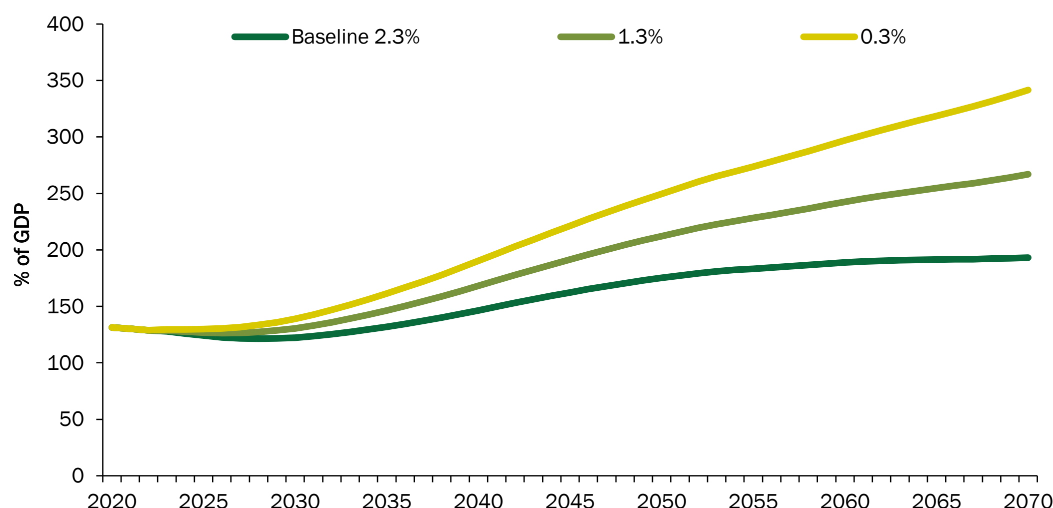


Source: MEF analysis based on the Long Term Forecast Model of the State General Accounting Office.

Simulations with regard to the primary surplus

This simulation assesses the strength of the public finance sustainability results against a deterioration in the primary surplus in 2022. To this end, the value of the primary surplus in the baseline scenario of this Economic and Financial Document, equal to 2.3 percent of GDP in 2022, is reduced by 1 and 2 GDP points, falling to 1.3 and 0.3 percent respectively (Figure IV.12).

FIGURE IV.12: SENSITIVITY OF PUBLIC DEBT TO THE PRIMARY SURPLUS (as a percentage of GDP)



Source: MEF analysis based on the Long Term Forecast Model of the State General Accounting Office.

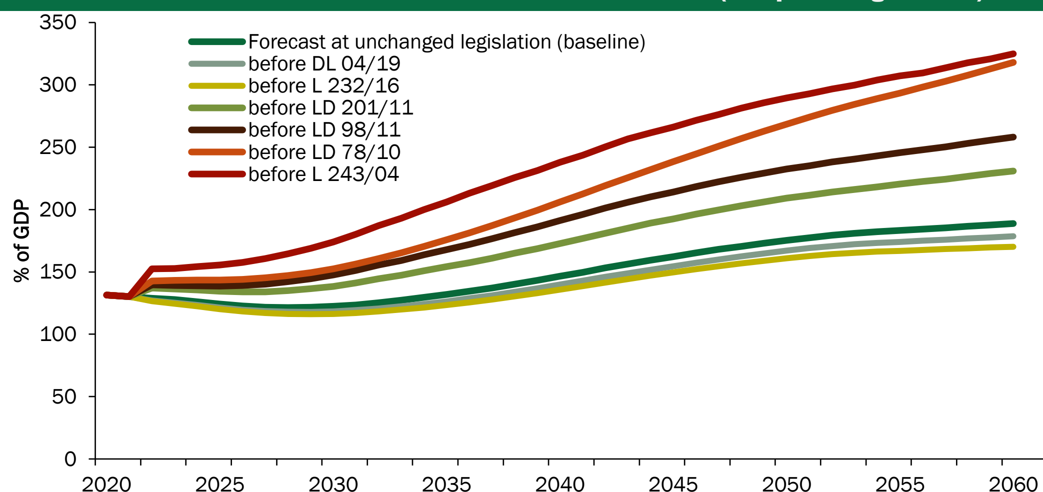
Public debt dynamics change significantly because of the deterioration of the primary surplus in 2022. In fact, it should be noted that, for an initial primary surplus reduced by 1 percentage point of GDP, public debt is around 33.2 points higher than the baseline in the period 2023-2070. If the event that the primary surplus in 2022 is permanently reduced by 2 GDP points compared to the baseline, the debt-to-GDP ratio increases on average by about 66.8 points over the period 2023-2070.

Simulations with regard to pension reforms

This section presents a prospective assessment of the financial effects of the intense season of social security reforms in the last two decades. These reforms have contributed significantly to reducing the projected costs of population ageing.

In this regard, Figure IV.13 describes the effect on the debt-to-GDP ratio of the various legislative measures adopted from 2004 until the last intervention approved by Decree Law No. 4/2019 by virtue of a counterfactual exercise that recalculates the initial debt and primary surplus in the absence of the pension reform in question.

FIGURE IV.13: IMPACT OF THE REFORMS ON THE DEBT-TO-GDP RATIO (as a percentage of GDP)



Source: MEF analysis based on the Long Term Forecast Model of the State General Accounting Office.

Excluding the measures approved at the beginning of 2019 and at the end of 2016, which involved a slight upward revision of the long-term debt projections, all previous reform measures, from 2004 onwards, have clearly reduced the ratio of pension expenditure to GDP compared to the projections of previous legislation, thus affecting the current expected expenditure flows (see Focus 'Medium/long-term trends of the Italian pension system').

The results show that, in the scenario discounting the absence of the reforms adopted since 2004, the debt-to-GDP ratio would increase substantially over the entire forecast period, reaching levels higher than those of the reference scenario, which instead incorporates the effects of all the reforms subsequently implemented.

FOCUS

Guarantees granted by the State

As at 31 December 2018, the stock of guarantees granted by the State had reached 74.4 billion, or 4.2 percent of GDP. The increase of approximately 6.5 billion compared to the previous year is mainly due to the increase in GACS (+6.3 billion) and guarantees for non-market risks in favour of SACE (+5.8 billion). The increase was also due to the guarantees relating to bond issues by *Cassa Depositi e Prestiti* S.p.A. and guarantees in favour of households for first homes and small and medium-sized enterprises, which increased by a total of 7.3 billion compared to 2017. Overall, guarantees granted to financial sector institutions, including banks, GACS and those relating to *Cassa Depositi e Prestiti*, amounted to approximately 21 billion (1.2 percent of GDP), down by 4.2 billion compared to 2017. In particular, the absence of guarantees in favour of Italian banks (-12.5 billion) more than offset the increase in GACS.

TABLE R.1: PUBLIC GUARANTEES (in millions)

	2018	
	Level	As a % of GDP
Guarantee stock	74,379	4.2
of which: financial sector	*20,850*	*1.2*

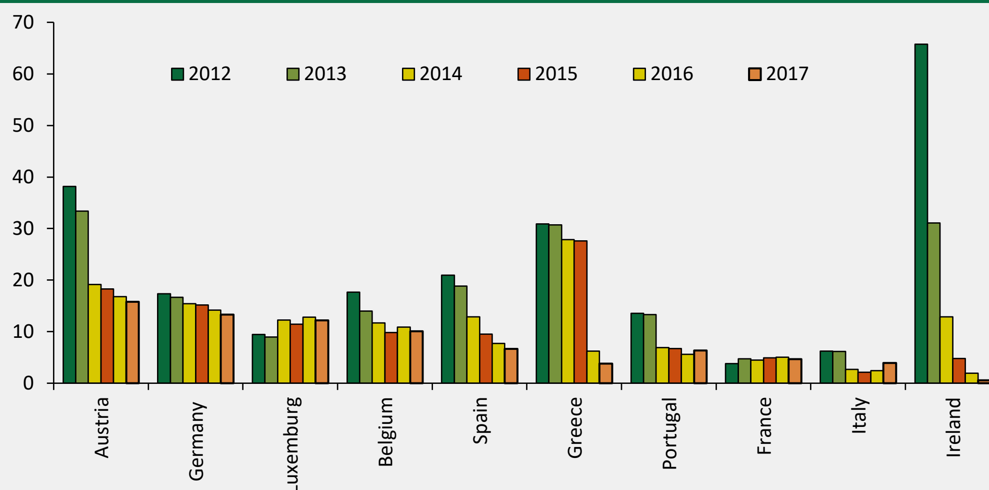
The following components contributed to the total amount:

- *Central Guarantee Fund for small and medium-sized enterprises*. This is an industrial policy instrument of the Ministry of Economic Development that benefits from the State guarantee and operates through three distinct actions: direct guarantee,granted to banks and financial intermediaries; reinsurance/counter-guarantee for guarantees awarded by Confidi and other guarantee funds; co-guarantee granted directly in favour of the financing subjects and jointly with Confidi and other guarantee funds or guarantee funds established within the EU or co-financed by it. It has taken on a central role in counter-cyclical economic policy measures. As at 31 December 2018, the residual debt guaranteed amounts to approximately 25,735 million.
- *TAV S.p.A*. The Ministry of Economy and Finance guarantees that *Ferrovie dello Stato* S.p.A. will fulfil its obligations towards TAV S.p.A. in relation to the concession, construction and management of the High Speed system. This is a guarantee aimed at securing the financial resources from the market needed to build the high-speed network. As at 31 December 2018 the residual debt guaranteed amounted to approximately 1,352 million.
- *GACS (Guarantee on the securitisation of non-performing loans).* This is a tool that the Treasury makes available to credit and finance operators to facilitate the disposal of non-performing bank loans. The State only guarantees the senior segments of the securitised Non Performing Loans portfolios, i.e. the safest ones, which ultimately bear any losses arising from sub-expected loan recoveries: the riskiest segments cannot be repaid unless the senior tranches guaranteed by the State have been repaid in full in advance. The price of the guarantee is market-based, as also recognised by the European Commission, which agrees that the scheme does not provide for State aid that could be detrimental to competition. As at 31 December 2018, the residual debt guaranteed is 7,734 million.
- *Guarantees provided by local authorities*. The data relating to guarantees granted by local authorities are provided by the Bank of Italy, which collects them through the information transmitted, by means of supervisory reports, directly from the financial institutions that benefit from them. As at 31 December 2018 the residual debt guaranteed amounted to approximately 2,750 million.
- *Italian banks*. These guarantees are granted by the State on the Italian banks' liabilities in relation to bonds issued by credit institutions. As at 31 December 2018, the residual debt guaranteed amounted to approximately 8,616 million.
- *Bond issues by Cassa Depositi e Prestiti S.p.A.*. By Decree of the Minister of the Economy and Finance No. 2545027 of 24 December 2015, a State guarantee was granted on the bond issues of *Cassa Depositi e Prestiti* S.p.A. for a maximum amount of 5 billion, in order to ensure that the resources were raised for the performance of public financing activities. As at 31 December 2018, guarantees were granted for a total of 4,500 million.
- *Guarantee fund for first homes* (art. 1, paragraph 48, letter c of the Stability Law 2014), which guarantees 50 percent of mortgage loans for the purchase, renovation and energy efficiency improvements of buildings used as main residence. In 2018, compared to 46,784 new loans granted by the banking system for a total of 5,230 million, new guarantees were granted for approximately 2,615 million, thus the guarantees outstanding amount to 4,348 million.
- *Guarantee for non-market risks in favour of SACE.* The State reinsures, upon consideration, part of the non-market risks already assumed by SACE S.p.A. for transactions involving strategic sectors of the Italian economy or companies of significant national interest in terms of employment levels, turnover or repercussions for the national productive economic system, which determine high concentration risks for SACE towards individual counterparties, groups of connected counterparties or destination countries and amount to 18,944 million. The estimate is preliminary insofar as it is based on data available as at 30 September 2018.

- *State guarantees in favour of ILVA.* The guarantees are granted on loans of up to 400 million issued by the banking system in favour of the commissioner of ILVA S.p.A., in order to perform the investments necessary for environmental remediation, as well as those intended for research, development and innovation, training and employment. As at 31 December 2018, guarantees were granted for a total of 400 million.

In comparison with its main European partners, in 2017 Italy was confirmed as one of the countries with the lowest level of public guarantees. The stock of guarantees, as in most EU countries, is smaller than observed in the two years following the financial crisis of 2011, due to the progressive reduction of guarantees in favour of the financial system, which were substantial in the countries most affected by the crisis. In 2017, Italy was one of the countries that made the least use of guarantees to manage the financial crisis and only a small proportion of the total guarantee stock was directed at the banking sector (approximately 1.2 percent of GDP vis-à-vis total3.9 percent overall).

FIGURA R.1: PUBLIC GUARANTEES IN EU COUNTRIES (% of GDP)



Source: Eurostat.

V. QUALITY OF PUBLIC FINANCES

V.1 ACTIONS TAKEN AND TRENDS FOR THE FUTURE YEARS

Measures adopted in 2018

Various urgent measures were adopted in the course of 2018. The main ones provide for additional measures in favour of people living in the areas affected by the earthquakes of 2016 and 2017, actions to counteract job insecurity and protect employment levels and provisions for fiscal simplification and the extension of legal deadlines. Specific measures were also envisaged to deal with the state of emergency following the collapse of the Polcevera Overpass in the city of Genoa, along with provisions on international protection, immigration and public safety and actions of support and simplification for businesses and local government. Overall, for the period under consideration, these measures lead to slight improvements for all public finance balances (Table V.1).

TABLE V.1 - CUMULATIVE EFFECTS OF THE LATEST MEASURES IMPLEMENTED IN 2018 ON GENERAL GOVERNMENT NET BORROWING (before netting out induced effects; in € mn)

	2018	2019	2020	2021
Decree-Law No. 55/2018 (converted by Law No. 89/2018)	0	0	0	0
Decree-Law No. 87/2018 (converted by Law No. 96/2018)	4	29	0	0
Decree-Law No. 91/2018 (converted by Law No. 108/2018)	0	1	0	0
Decree-Law No. 109/2018 (converted by Law No. 130/2018)	30	15	12	16
Decree-Law No. 113/2018 (converted by Law No. 132/2018)	3	8	9	7
Decree-Law No. 135/2018 (converted by Law No. 12/2019)	0	0	1	0
NET BORROWING	38	52	22	23
% of GDP	*0.0*	*0.0*	*0.0*	*0.0*
BORROWING REQUIREMENT	8	42	22	23
% of GDP	*0.0*	*0.0*	*0.0*	*0.0*
NET BALANCE TO BE FINANCED	40	120	11	19
% of GDP	*0.0*	*0.0*	*0.0*	*0.0*

Note: Discrepancies, if any, are due to rounding.

Incremental resources (higher revenue and lower expenditure) amount to approximately 0.7 billion in 2018, 1.9 billion in 2019, 1.5 billion in 2020 and 1.4 billion in 2021 (Table V.2). The actions taken (higher expenditure and lower revenue) amount to approximately 0.7 billion in 2018, 1.9 billion in 2019, 1.5 billion in 2020 and 1.4 billion in 2021.

TABLE V.2 - CUMULATIVE EFFECTS OF THE LATEST MEASURES IMPLEMENTED IN 2018 ON GENERAL GOVERNMENT NET BORROWING (before netting out induced effects; in € mn)

	2018	2019	2020	2021
Incremental resources	748	1,920	1,518	1,368
Higher revenue	181	523	627	674
Lower expenditure	567	1,397	890	694
- current expenditure	*274*	*585*	*301*	*258*
- capital expenditure	*292*	*811*	*590*	*436*
Use of resources	710	1,868	1,496	1,346
Lower revenue	276	662	659	596
Higher expenditure	434	1,207	837	749
- current expenditure	*153*	*396*	*238*	*314*
- capital expenditure	*281*	*811*	*599*	*436*
Impact on net borrowing	38	52	22	23
Net change in revenue	*-95*	*-138*	*-32*	*78*
Net change in expenditure	*-133*	*-190*	*-53*	*55*
- current expenditure	*-121*	*-189*	*-63*	*55*
- capital expenditure	*-12*	*-1*	*10*	*0*

Note: Discrepancies, if any, are due to rounding.

With regard to the subsectors of general government (Table V.3), the measures adopted improve the net borrowing of central government. The provisions include, in particular, those that determine an increase in the taxes applicable to online gambling devices and reductions in certain State budget funds. The deficit of local governments deteriorates slightly from 2019 to 2021, primarily due to the following measures: establishment of a cash-only fund to finance investments by local authorities through the use of administration results of previous years, actions towards urban security and the allocation of resources for the reconstruction of the municipalities affected by the earthquake of 21 August 2017. The negative impact on the budget balance of social security funds is due to the measures in the field of labour and employment.

TABLE V.3 - CUMULATIVE EFFECTS OF THE LATEST MEASURES IMPLEMENTED IN 2018 ON GENERAL GOVERNMENT NET BORROWING BY SUBSECTOR (before netting out induced effects; in € mn)

	2018	2019	2020	2021
CENTRAL GOVERNMENT	22	153	98	139
-net change in revenue	-46	-85	53	167
-net change in expenditure	-68	-238	-45	28
LOCAL GOVERNMENT	52	-19	-11	-41
-net change in revenue	-6	-1	11	15
-net change in expenditure	-58	18	22	56
SOCIAL SECURITY FUNDS	-36	-82	-65	-74
-net change in revenue	-43	-53	-95	-103
-net change in expenditure	-7	29	-30	-29
EFFECTS ON NET BORROWING	38	52	22	23

Note: Discrepancies, if any, are due to rounding.

Several measures are directed towards dealing with emergency needs. After the collapse of a section of the Polcevera Overpass in the city of Genoa, resources

were made available for an urgent action plan to remove and dispose of the rubble, design and rebuild the road infrastructure and restore the road system in the regional capital of Liguria[1].

Measures were also taken to help the people in the areas of Lazio, Marche, Umbria, Abruzzo and Campania affected by earthquakes in 2016 and 2017[2]. These include, in particular, extensions and suspensions of tax and social security payments, and the opportunity to pay the sums due in instalments, in certain cases. At the same time, mortgage payments due on loans granted by Cassa Depositi e Prestiti S.p.a. to the towns hit by the earthquakes were deferred. For the immediate implementation of remedial and security measures on motorways A24 and A25, also affected by the seismic events of recent years, the resources originally set aside for 2022-2025 were brought forward to 2018 and 2019[3].

In the private sector of the labour market, the total duration of fixed-term employment contracts was reduced from 36 to 24 months and the 50 percent exemption on total social security contributions was extended (except for premiums or contributions due to INAIL) for employers who in 2019 and 2020 hire workers under thirty-five under permanent progressive entitlement contracts[4]. The benefit is issued for a maximum of 36 months, up to a maximum of 3,000 euro annually. For fixed-term employment contracts, with the exception of domestic work, there was an increase of 0.5 percentage points in additional social security contribution to finance the NASpI, to be paid by the employer, equal to 1.4 per cent of the compensation subject to social security contributions[5].

Several simplification provisions were enacted in the area of taxation, including the deferral to 1 January 2019 of the electronic invoicing obligation for automotive fuel purchases made at roadside petrol stations by persons liable for VAT, in order to standardize this sector with the general framework deadlines set for other private operators. The provisions on the exemption from the VAT reporting obligation, currently provided only for residents of mountainous areas, were extended to all agricultural producers. The split payment mechanism for professional services provided to public administrations was abolished[6]. In order to counteract VAT avoidance and evasion in business transactions, the reverse tax charge mechanism was also extended to persons offering the use of online platforms, portals or similar means for the sale of electronic products to third parties[7]. The entry into effect of the provisions repealing the reduction in IRES (CIT, Corporate Income Tax) for some third sector organizations is deferred[8].

[1] Decree-Law No. 109/2018 converted with amendments by Law No. 130/2018.

[2] Decree-Law No. 55/2018 converted with amendments by Law No. 89/2018 and Decree-Law No. 109/2018 converted with amendments by Law No. 130/2018.

[3] Decree-Law No. 109/2018 converted with amendments by Law No. 130/2018.

[4] Decree-Law No. 87/2018 converted with amendments by Law No. 96/2018.

[5] Other measures in the labour market, provided for by Decree-Law No. 87/2018, also include the increase of the maximum and minimum compensation in the event of unlawful dismissal.

[6] Additional tax simplification measures, for which no financial effects on the General Government account are foreseen, provide for procedural changes concerning the institution of the synthetic verification of total income (*redditometro*, or 'incomemeter') and the review of certain deadlines for the transmission of data for invoices issued and received (spesometro, or 'spendometer') by persons liable for VAT.

[7] Decree-Law No. 135/2018 converted with amendments by Law No. 12/2019.

[8] The repeal of the 50 percent reduction in CIT was initially provided for by Article 1, paragraphs 51 and 52 of the 2019 Budget Law. Law 12 of February 2019 under conversion into Decree-Law No. 135/2019 into law deferred the run date of this repeal until the entry into force of provisions, to be identified with subsequent measures, in favour of non-profit socially minded organizations and individuals.

To limit gambling disorders, a ban was imposed on any form of advertising, by any means, of gambling and betting with winnings in cash, establishing appropriate penalties in the event of violation[9].

Public safety measures include, among others, improving the technical-logistic devices of the State Police and National Firefighters, establishing a fund for the adoption of legislative measures for the reorganization of the roles and careers of police and armed forces and increasing the resources allocated to municipal authorities for the installation of video surveillance systems[10].

For the continued support of Italian exports in 2018, the fund managed by Simest S.p.a and used for the stabilisation of interest rates and exchange rates in export credit transactions was refinanced[11].

Lastly, the deadline for repayment of the interest bearing loan granted to Alitalia S.p.a. was extended to 30 June 2019[12] and, for 2019, a contribution was allocated to municipal authorities to make up for lost revenue due to the IMU first home tax being replaced by TASI (tax on indivisible municipal services) on all property[13].

[9] Decree-Law No. 87/2018 converted with amendments by Law No. 96/2018.

[10] Decree-Law No. 113/2018 converted with amendments by Law No. 132/2018 and Decree-Law No. 135/2018 converted with amendments by Law 12/2019.

[11] Decree-Law No. 91/2018 converted with amendments by Law No. 108/2018.

[12] Decree-Law No. 135/2018 converted with amendments by Law No. 12/2019. Since this concerns the extension of the payment deadline for the 900 million loan already foreseen under Legislative Decree No. 50/2017 and Decree-Law No. 148/2017, the only financial effects of the measure are in terms of requirements.

[13] Decree-Law No. 135/2018 converted with amendments by Law No. 12/2019.

TABLE V.4 - EFFECTS OF DECREE-LAW NO.109/2018 ON GENERAL GOVERNMENT NET BORROWING (before netting out induced effects; in € mn)

	2018	2019	2020	2021
INCREMENTAL RESOURCES	210	502	199	130
Higher revenue	53	11	14	17
Sanctions imposed by the Italian Competition Authority charged to the budget	*49*	*0*	*0*	*0*
National Agency for the Safety of Railways and Road and Highway Infrastructure - effects of taxes and charges	*0*	*6*	*9*	*9*
Other	*4*	*5*	*4*	*8*
Lower expenditure	156	491	185	113
Reduction of Investment Fund	*33*	*185*	*67*	*50*
Change in Development and Cohesion Fund	*50*	*142*	*0*	*0*
Reduction of Multiannual Contribution Fund	*52*	*50*	*20*	*0*
Reduction of Fund for structural economic policy measures	*0*	*10*	*50*	*21*
Reduction of Special Capital Account Fund	*0*	*21*	*20*	*20*
Reduction of payments to INAIL for building innovative schools and children's centres	*9*	*14*	*14*	*0*
Reduction of Special Current Account Fund	*0*	*33*	*1*	*1*
Other	*12*	*37*	*14*	*21*
USE OF RESOURCES	179	487	187	114
Lower revenues	17	29	29	0
Suspension of deadlines for payment of RAI television fee, social security and welfare contributions, premiums for compulsory insurance and payment due notices in municipalities hit by the earthquake of 21 August 2017	*7*	*28*	*28*	*0*
Urban Free Trade Zone in the metropolitan city of Genoa to support businesses affected by the disaster	*10*	*0*	*0*	*0*
Other	*0*	*1*	*1*	*0*
Higher expenditure	162	458	159	114
Expenditure to reconstruct the infrastructure and restore the road system after the collapse of part of the Polcevera Overpass	*40*	*180*	*80*	*0*
Restoration and implementation of safety measures for motorways A24 and A25 after the earthquakes of 2009, 2016 and 2017	*50*	*142*	*0*	*0*
Provisions on local public transport, road haulage and road conditions for the city of Genoa	*26*	*43*	*0*	*0*
Increase of Fund for reconstruction operations in the municipalities of Casamicciola Terme, Forio and Lacco Ameno hit by the earthquake of 21 August 2017	*0*	*20*	*20*	*20*
National Agency for the Safety of Railways and Road and Highway Infrastructure	*0*	*14*	*22*	*22*
Increase of Multiannual Contribution Fund	*0*	*0*	*0*	*50*
Design of innovative schools and children's centres	*9*	*14*	*14*	*0*
Optimization of logistic traffic flows in the port of Genoa	*8*	*15*	*7*	*0*
Other	*30*	*30*	*16*	*21*
IMPACT ON NET BORROWING	30	15	12	16

Note: Discrepancies, if any, are due to rounding.

TABLE V.5 - EFFECTS OF DECREE-LAW NO.113/2018 ON GENERAL GOVERNMENT NET BORROWING (before netting out induced effects; in € mn)

	2018	2019	2020	2021
INCREMENTAL RESOURCES	101	128	145	147
Higher revenue	25	15	16	14
Fund for the reorganisation of the roles and careers of police and armed forces - effects of taxes and charges	*24*	*10*	*10*	*10*
Other	*1*	*6*	*7*	*4*
Lower expenditure	76	112	128	133
Reduction of Special Capital Account Fund	*17*	*64*	*74*	*74*
Reduction of Public Employee Contract Fund	*45*	*15*	*15*	*15*
Reduction of Special Current Account Fund	*5*	*6*	*5*	*5*
Other	*9*	*27*	*34*	*39*
USE OF RESOURCES	98	120	136	141
Lower revenue	22	7	7	7
Fund for public employee contracts - effects of taxes and charges	*22*	*7*	*7*	*7*
Higher expenditure	76	112	128	133
Purchase and improvement of information systems for combating international terrorism and financing the extraordinary maintenance and adaptation of structures and installations - State Police and Fire Brigade	*15*	*49*	*49*	*49*
Fund for the reorganization of the roles and careers of police and armed forces	*50*	*20*	*20*	*20*
Measures for improving and implementing safety measures for prison facilities	*7*	*15*	*25*	*25*
Urban safety operations: installation of video surveillance systems by Municipal Authorities	*0*	*10*	*17*	*27*
Other	*4*	*18*	*17*	*12*
IMPACT ON NET BORROWING	3	8	9	7

Note: Discrepancies, if any, are due to rounding.

TABLE V.6 - EFFECTS OF DECREE-LAW NO.135/2018 ON GENERAL GOVERNMENT NET BORROWING (before netting out induced effects; in € mn)

	2018	2019	2020	2021
INCREMENTAL RESOURCES	12	351	273	274
Higher revenue	4	77	103	102
Counteracting VAT avoidance and evasion in business transactions performed through online trading platforms	*0*	*72*	*86*	*86*
Other	*4*	*5*	*17*	*16*
Lower expenditure	8	274	169	171
Reduction of Fund for structural economic policy measures	*0*	*108*	*131*	*78*
Reduction of Fund to meet non-deferrable expenditure	*0*	*0*	*12*	*86*
Reduction of Citizen's Income Fund	*0*	*90*	*0*	*0*
Reduction of Government Programme Implementation Fund	*0*	*20*	*17*	*0*
Other	*8*	*55*	*10*	*8*
USE OF RESOURCES	12	351	272	274
Lower revenue	4	123	158	159
Deferral of effective date of reduction in CIT subsidies for non-commercial bodies	*0*	*118*	*158*	*158*
Other	*4*	*4*	*0*	*1*
Higher expenditure	8	228	114	115
Increase of Government Programme Implementation Fund	*0*	*72*	*86*	*86*
Contribution to Municipal Authorities to make up for lower revenue due to the introduction of the TASI	*0*	*110*	*0*	*0*
Plan for the transition to sustainable energy	*0*	*1*	*16*	*15*
Increase in funds for urban safety	*0*	*20*	*0*	*0*
Other	*8*	*25*	*12*	*14*
IMPACT ON NET BORROWING	0	0	1	0

Note: Discrepancies, if any, are due to rounding.

The 2019-2021 public finance Budget and initial measures in 2019: impact on balances

The public finance Budget for 2019-2021 is composed of the provisions of the 2019 Budget Law[14], as well as the financial effects of Decree-Law No. 119/2018[15] laying down urgent tax and financial provisions.

Overall, the public finance Budget and the first measures undertaken in 2019[16] (Table V.7) lead to an increase in net borrowing of approximately 11.5

[14] Law No. 145/2018.
[15] Converted with amendments by Law No. 136/2018.
[16] In the course of 2019, other measures were also adopted with substantially neutral effects on public finance balances. These include Decree-

billion in 2019, 14.4 billion in 2020 and 9.2 billion in 2021. The expected deterioration in the borrowing requirement is approximately 12.8 billion in 2019, 15.6 billion in 2020 and 9.5 billion in 2021. The State budget shows an increase in the net balance to be financed of approximately 19.5 billion in 2019 and 14.3 billion in 2020 and in 2021[17].

TABLE V.7 - EFFECTS OF THE 2019-2021 PUBLIC FINANCE BUDGET AND INITIAL MEASURES IN 2019 (before netting out induced effects; in € mn)

	2018	2019	2020	2021
2019 Budget Law (Law No.145/2018)	0	-11,586	-14,551	-9,290
Decree-Law No.119/2018 (cvt. by Law No.136/2018)	7	42	43	55
Decree-Law No. 4/2019 (cvt. by Law No. 26/2019)	0	7	77	54
NET BORROWING	7	-11,537	-14,431	-9,180
% of GDP	*0.0*	*-0.6*	*-0.8*	*-0.5*
BORROWING REQUIREMENT	442	-12,822	-15,554	-9,542
% of GDP	*0.0*	*-0.7*	*-0.9*	*-0.5*
NET BALANCE TO BE FINANCED	177	-19,450	-14,315	-14,283
% of GDP	*0.0*	*-1.1*	*-0.8*	*-0.8*

Note: Discrepancies, if any, are due to rounding.

In terms of accounting, funding for the public finance Budget (higher revenue and lower expenditure) amounted to approximately 29.7 billion in 2019, 34.9 billion in 2020 and 40.3 billion in 2021 (Table V.8). The actions financed (lower revenue and higher expenditure), equal to approximately 41.2 billion in 2019, 49.4 billion in 2020 and 49.5 billion in 2021, are aimed at supporting economic growth by reducing the tax burden and reviving private and public investment and at providing new social security and social inclusion measures, the implementation of which is defined by Decree-Law No. 4/2019 (Table V.8a) through the use of resources allocated in special State budget funds.

Law No. 1/2019 converted with amendments by Law No.16/2019 laying down urgent measures to support Banca Carige S.p.a. - Cassa di Risparmio di Genova e Imperia, Decree-Law No. 22/2019 laying down urgent measures to ensure the safety, financial stability and integrity of markets as well as the protection of the health and freedom of residence of Italian and British citizens in the event of withdrawal of the UK from the European Union and Decree-Law No. 27/2019 laying down urgent provisions to revive the agricultural sectors in crisis and support farms affected by particularly extreme weather events and for the emergency situation at the Stoppani factory in Cogoleto.

[17] The different impact on State budget requirement and net balance to be financed with regard to net borrowing is due to the different accounting criteria for transactions carried out on these aggregates and to the fact that they refer to different institutional aggregates.

TABLE V.8 - EFFECTS OF THE 2019-2021 PUBLIC FINANCE BUDGET ON GENERAL GOVERNMENT NET BORROWING (before netting out induced effects; in € mn)

	2018	2019	2020	2021
INCREMENTAL RESOURCES	1,797	29,691	34,862	40,276
Higher revenue	223	14,286	21,014	25,654
Lower expenditure	1,574	15,405	13,848	14,622
current expenditure	*1,047*	*7,864*	*9,672*	*10,495*
capital expenditure	*527*	*7,541*	*4,176*	*4,126*
USE OF RESOURCES	1,790	41,235	49,370	49,511
Lower revenue	565	18,229	12,804	13,871
Higher expenditure	1,225	23,006	36,566	35,640
current expenditure	*170*	*17,524*	*26,128*	*24,392*
capital expenditure	*1,055*	*5,482*	*10,439*	*11,248*
IMPACT ON NET BORROWING	7	-11,544	-14,508	-9,235
Change net in revenue	*-342*	*-3,943*	*8,210*	*11,784*
Change net in expenditure	*-349*	*7,601*	*22,719*	*21,018*
current expenditure	*-877*	*9,660*	*16,456*	*13,897*
capital expenditure	*528*	*-2,059*	*6,263*	*7,122*

Note: Discrepancies, if any, are due to rounding.
The 2019-2021 public finance Budget includes the effects of the 2019 Budget Law and Decree-Law No. 119/2018 converted by Law No. 136/2018.

TABLE V.8A - EFFECTS OF DECREE-LAW NO. 4/2019 ON GENERAL GOVERNMENT NET BORROWING (before netting out induced effects; values in € m)

	2018	2019	2020	2021
INCREMENTAL RESOURCES	0	11,204	16,594	17,309
Higher revenue	0	748	672	678
Lower expenditure	0	10,456	15,922	16,631
current expenditure	*0*	*10,447*	*15,922*	*16,631*
capital expenditure	*0*	*9*	*0*	*0*
USE OF RESOURCES	0	11,198	16,517	17,254
Lower revenue	0	14	170	278
Higher expenditure	0	11,183	16,347	16,976
current expenditure	*0*	*11,183*	*16,347*	*16,976*
capital expenditure	*0*	*0*	*0*	*0*
IMPACT ON NET BORROWING	0	7	77	54
Change net in revenue	*0*	*734*	*502*	*400*
Change net in expenditure	*0*	*727*	*425*	*346*
current expenditure	*0*	*737*	*425*	*346*
capital expenditure	*0*	*-9*	*0*	*0*

Note: Discrepancies, if any, are due to rounding.

With regard to general government subsectors, the Budget Law and Decree-Law No. 4/2019 are substantially neutral on the budget balance of central government in 2019 and entail an improvement of around 3.6 billion in 2020 and 8.5 billion in 2021. This result depends predominantly on the deactivation of the safeguard clauses for the 2019 and their recalculation with effect from 2020. Moreover, the review of certain transfers and funds of the State budget and the resources for financing investment by the central administrations of the State and for contract renewals and recruitment of personnel in the public sector all have an impact on spending.

These measures involve a deficit increase for local government of around 1.2 billion in 2019, 4.3 billion in 2020 and 4.0 billion in 2021, due essentially to the provisions to stimulate the revival of investment by regional and local authorities.

The negative impact on the deficit of Social security funds is approximately 10.3 billion in 2019, 13.8 billion in 2020 and 13.7 billion in 2021, as a result of the new early retirement provision and the institution of Citizen's Income.

TABLE V.9 - EFFECTS OF THE 2019-2021 PUBLIC FINANCE BUDGET AND INITIAL MEASURES IN 2019 ON GENERAL GOVERNMENT NET BORROWING BY SUBSECTOR (before netting out induced effects; in € mn)

	2018	2019	2020	2021
CENTRAL GOVERNMENT	-209	-32	3,599	8,519
change in net revenue	*-241*	*-4,097*	*7,637*	*11,593*
change in net expenditure	*-32*	*-4,065*	*4,037*	*3,074*
LOCAL GOVERNMENT	298	-1,188	-4,258	-3,983
change in net revenue	*-1*	*1,084*	*456*	*77*
change in net expenditure	*-298*	*2,271*	*4,714*	*4,059*
Table				
SOCIAL SECURITY FUNDS	-81	-10,317	-13,773	-13,717
change in net revenue	*-100*	*-195*	*619*	*514*
change in net expenditure	*-19*	*10,122*	*14,392*	*14,231*
EFFECTS ON NET BORROWING	7	-11,537	-14,431	-9,180

Note: Discrepancies, if any, are due to rounding.

The 2019-2021 public finance Budget: main measures

The 2019-2021 public finance Budget (Table V.10) provides for a series of actions to reduce the tax burden on citizens and businesses.

These include the complete deactivation of the so-called safeguard clauses (automatic increases in VAT rates and excise duties on fuel) for 2019 for a total of 12.5 billion. At the same time, the scope of the subsidised flat-rate tax scheme is extended, raising the eligibility threshold of revenue and remunerations to 65,000 euro (in net terms, 0.3 billion in 2019, 1.8 billion in 2020 and 1.4 billion in 2021), while a single 20 percent income tax rate is introduced, replacing current taxes for individual business entrepreneurs, artists and professionals earning 65,000 to 100,000 euro (approximately 0.1 billion in 2020 and 1.13 billion in 2021). To help businesses, a subsidised 15 percent tax rate is applied to income reinvested to purchase exclusively tangible capital goods (excluding non-company property and vehicles) and to increase fixed-term and permanent employment (approximately 1.9 billion in 2020 and 1.8 billion in 2021). In addition, the proportion of IMU property tax paid on company property deductible for CIT and PIT (Personal Income Tax) purposes is increased from 20 to 40 percent (0.3 billion in 2020 and 0.2 billion in 2021).

To promote competitiveness and development, tax deductions are extended to 2019 for expenses due to energy efficiency operations, building renovations,

the purchase of furniture and re-greening (approximately 0.6 billion in 2020 and 0.9 billion in 2021), as well as subsidies for investments in new tangible capital assets and intangible asset for the technological transformation of businesses (also known as ‘hyper-amortisation’), envisaging the simultaneous restructuring of the tax benefit granted, and subsidies for the purchase of intangible capital goods that are classified within the category of specific software (also known as ‘super-amortisation’) with an overall impact of approximately 0.4 billion in 2020 and 0.8 billion in 2021. A reduction in the rate of premiums against accidents at work and occupational diseases managed by INAIL is also envisaged for the 3-year period 2019-2021 only (in net terms, approximately 0.4 billion in 2019 and 2020 and 0.5 billion in 2021).

As for welfare and assistance, special funds are foreseen for the introduction of the Citizen's Income and Citizen's Pension (approximately 7.1 billion in 2019, 8.1 billion in 2020 and 8.2 billion in 2021) and for the definition of additional types of early retirement (approximately 4 billion in 2019, 8.3 billion in 2020 and 8.7 billion in 2021). Decree-Law No. 4/2019 has identified the implementing measures for disbursing the expenditure (see the next paragraph for more details).

Furthermore, in terms of social measures, the following funds are refinanced: the fund for dependants and caregivers (0.1 billion annually from 2019); the fund for social policies (0.1 billion annually from 2019); the fund for family policies (0.1 billion annually from 2019); and the fund for supporting students with physical and sensory disabilities (0.1 billion annually for the period 2019-2021). In addition, the maternity allowance, also known as the ‘Baby bonus’, is also extended to 2019 (approximately 0.2 billion in 2019 and 2020).

As for public employment, resources have been set aside for: the national collective bargaining for 2019-2021 and economic improvements for central government employees (approximately 0.7 billion in 2019, 0.9 billion in 2020 and 1.3 billion in 2021, which, net of taxes and social security contributions, correspond to 0.3 billion in 2019, 0.5 billion in 2020 and 0.7 billion starting from 2021); and for the recruitment of State sector personnel (also considering the costs of insolvency proceedings, approximately 0.3 billion in 2019, 0.9 billion in 2020 and 1.1 billion in 2021, which, net of taxes and social security contributions, correspond to 0.1 billion in 2019, 0.5 billion in 2020 and 0.6 billion in 2021).

To sustain the investments of central administrations of the Stare, a special fund is established, to be divided with one or more decrees by the Prime Minister, with an impact on net borrowing of approximately 0.4 billion in 2019, 1.2 billion in 2020 and 1.7 billion in 2021 (against State budget allocations of approximately 43.6 billion in the period 2019-2033). Furthermore, expenditure is foreseen to mitigate hydraulic and hydrogeological risks (0.6 billion in 2019, 0.8 billion in 2020 and 0.9 billion in 2021) and to implement the initial step of the National Plan of Operations in the Water Sector provided by the 2018 Budget Law (0.1 billion per year from 2019 to 2028).

The following are envisaged to boost investment by local governments: ‘release’ of the administration surpluses of regional and local authorities (0.4 billion in 2020 and 0.7 billion in 2021); reduction of the ordinary-statute regions’ contributions to public finance for 2019 and 2020, ordering the simultaneous assignment of a contribution and the obligation to achieve a positive budget

balance (altogether, around 0.8 billion in 2019, 1.7 billion in 2020 and 1 billion in 2021) and other measures for a total of 0.9 billion in 2019, 0,7 billion in 2020 and 1.2 billion in 2021, including the maintenance and security of roads, schools and the measures for rewarding regional investment.

Resources are also provided for emergencies, in particular in relation to the recent earthquakes and floods, support for the people of Genova for the damage caused by the collapse of the Polcevera Overpass and seismic risk prevention measures (a total of about 1 billion in 2019 and 0.6 billion in 2020 and 2021).

Finally, other actions include the 1.5 billion refinancing of international missions for 2020 (1.1 billion net of taxes and social security contributions) and new measures to refund investors who have suffered unjust damage as a result of purchasing financial instruments issued by banks subjected to resolution (in net terms, around 0.05 billion in 2019, 0.3 billion in 2020 and 0.4 billion in 2021 compared to the corresponding budgetary allocation of about 0.5 billion per year in the three-year period).

TABLE V.10 - EFFECTS OF THE 2019-2021 PUBLIC FINANCE BUDGET ON GENERAL GOVERNMENT NET BORROWING (before netting out induced effects; in € mn)

	2018	2019	2020	2021
INCREMENTAL RESOURCES	1,797	29,691	34,862	40,276
Higher revenue	223	14,286	21,014	25,654
Revision of VAT clauses and excise duties for fuel	0	0	3,910	9,182
Repeal of optional corporate income tax (IRI) regime	0	5,332	3,112	3,116
Repeal of ACE	0	228	2,373	1,453
Extension of facilitated tax regime to individuals with revenue up to 65,000 euro	0	232	2,150	1,229
Obligation to store and transmit fees electronically	0	337	1,356	1,912
Restructuring of deduction of start-up amortisation and other intangible assets	0	1,308	926	658
Subsidised definition of collection agent charges	0	37	1,083	1,385
Substitute tax for individual entrepreneurs and artists and professionals	0	0	280	1,918
Provisions on gambling	0	768	695	695
Formalisation of infringements, non-conformities, irregularities or fulfilments of a formal nature	0	810	540	0
Web tax	0	150	600	600
Regulation of the deductibility of credit write-downs in the first application of IFRS 9	0	1,170	0	0
Revaluation of insurance tax account	0	832	0	320
Deferment to 2026 of 10% deductibility of credit write-downs	0	950	0	0
Extension of deductions for building renovation energy efficiency improvements, re-greening and purchase of furniture and household electrical goods	0	157	697	0
Revaluation of value of non-traded equity interests and land	0	341	185	185
Broadband - greater revenue from 5G frequencies	0	200	200	200
Flat-rate tax on income from letting commercial property	0	0	396	203
Reduction in CIT subsidies for non-commercial entities	0	118	158	158
Increase in tobacco excise duties	0	135	135	135
Revision of the tariffs of INAIL premiums and contributions for insurance against accidents at work and occupational diseases - tax effects	0	0	174	147
Pending litigation	0	78	104	104
Increase in rates of replacement tax on the revaluation of land and equity interest	0	116	63	63
Tax on the purchase of highly polluting vehicles	0	62	74	74
Tax on money transfers abroad		63	63	63
Subsidised definition of formal reports and notices	0	51	68	68
Change of accounts of flat-rate tax on rents	0	0	0	116
Balance and write-off of collection agent charges from 2000 to 2017 for persons with ISEE < 20,000 euro	0	43	43	17
Job centre recruitment - effects of taxes and charges	0	150	150	228
Recruitment in national government - effects of taxes and charges	0	127	449	547
Study grants for specialist trainee doctors - effects of taxes and charges	0	11	22	33
Emergency requirements - effects of taxes and charges	0	30	40	0
Fund for international missions - effects of taxes and charges	41	0	350	0
Fund for ordinary financing of universities - effects of taxes and charges	0	10	28	28
Renewal of public employee contracts for 2019-2021 - effects of taxes and charges	0	315	449	618
Reorganization of the roles and careers of police and armed forces - effects of taxes and charges	0	0	49	49
Other	182	128	93	151

Note: Discrepancies, if any, are due to rounding. The 2019-2021 public finance Budget includes the effects of the 2019 Budget Law and Decree-Law No. 119/2018 converted by Law No. 136/2018.

TABLE V.10 (CONTINUED 1)- EFFECTS OF THE 2019-2021 PUBLIC FINANCE BUDGET ON GENERAL GOVERNMENT NET BORROWING (before netting out induced effects; in € mn)

	2018	2019	2020	2021
Lower expenditure	1,574	15,405	13,848	14,622
Poverty Fund (share merged into the Citizen's Income Fund)	*0*	*2,198*	*2,158*	*2,130*
Local Authority Investment Fund (reduction for measures in favour of Local Authorities)	*0*	*1,080*	*2,342*	*2,249*
Fund for reducing the tax burden	*0*	*390*	*1,639*	*2,472*
Reduction of ordinary-statute regional authority contributions to public finances (non-transfer of the contribution to boost public investment and achievement of a positive budget balance)	*0*	*2,496*	*1,746*	*0*
Pension indexation cooling	*0*	*415*	*1,222*	*2,014*
Ministry spending rationalization measures	*819*	*915*	*930*	*892*
Reprogramming of State transfers	*0*	*2,340*	*0*	*0*
Reduction of fund for implementing multiannual contributions	*0*	*33*	*802*	*992*
Development and Cohesion Fund	*300*	*1,335*	*0*	*0*
Rationalization of expenditure for the management of immigration centres	*0*	*400*	*550*	*650*
Decommissioning of public property	*0*	*950*	*150*	*150*
Determination of trend at unchanged legislation of National Health Service financing 2019-2021	*0*	*0*	*175*	*1,000*
Complementary programmes for action and cohesion plans	*0*	*850*	*0*	*0*
Amendment to research and development tax credit regulations	*0*	*0*	*300*	*300*
Fund for the purchase of cleaning services in schools	*0*	*0*	*280*	*280*
Repeal of tax credit for IRAP (regional tax on productive activities) taxpayers without employees	*0*	*163*	*163*	*163*
Reduction of annual pensions exceeding 100,000 euro gross	*0*	*138*	*145*	*152*
Reduction of structural resources provided by INAIL for the financing of investment and training projects on occupational safety and health	*0*	*110*	*100*	*100*
Reduction and reprogramming of military expenditure	*0*	*103*	*120*	*76*
Deferment of public sector recruitment	*0*	*198*	*0*	*0*
Citizen's Income Fund	*0*	*0*	*0*	*160*
Reduction of Fund to meet non-deferrable expenditure	*5*	*0*	*0*	*130*
Investor Compensation Fund	*0*	*26*	*26*	*26*
Other	*451*	*1,264*	*999*	*686*

Note: Discrepancies, if any, are due to rounding. The 2019-2021 public finance Budget includes the effects of the 2019 Budget Law and Decree-Law No. 119/2018 converted by Law No 136/2018.

TABLE V.10 (CONTINUED 2) - EFFECTS OF THE 2019-2021 PUBLIC FINANCE BUDGET ON GENERAL GOVERNMENT NET BORROWING (before netting out induced effects; in € mn)

	2018	2019	2020	2021
USE OF RESOURCES	1,790	41,235	49,370	49,511
Lower revenue	565	18,229	12,804	13,871
Sterilization of VAT clauses and excise duties for fuel	*0*	*12,472*	*0*	*0*
Extension of facilitated tax regime to individuals with revenue up to 65,000 euro	*0*	*563*	*3,971*	*2,603*
Repeal of optional regime of corporate income tax (IRI)	*0*	*3,345*	*1,876*	*1,857*
Subsidised 15% taxation on the proportion of income corresponding to profits invested in capital assets	*0*	*0*	*1,948*	*1,808*
Substitute tax for individual entrepreneurs and artists and professionals	*0*	*0*	*389*	*3,050*
Extension of deductions for building renovation, energy efficiency improvements, re-greening and purchase of furniture and household electrical goods	*0*	*121*	*1,292*	*887*
Revision of the rates for INAIL premiums and contributions for insurance against accidents at work and occupational diseases	*0*	*410*	*525*	*600*
Pension indexation cooling - tax effects	*0*	*162*	*477*	*786*
Extension of hyper-amortisation and super-amortisation	*0*	*0*	*405*	*810*
Flat-rate tax on income from letting commercial property	*0*	*261*	*369*	*367*
Up to 40% deductibility of IMU for company property for RES and PIT purposes	*0*	*0*	*290*	*167*
Repeal of increase in excise duties for fuels	*0*	*141*	*146*	*148*
Subsidised definition of collection agent charges	*355*	*20*	*13*	*11*
Formalisation of infringements, non-conformities, irregularities or fulfilments of a formal nature	*0*	*130*	*130*	*130*
Revaluation of insurance tax account	*0*	*0*	*320*	*0*
Regulation of deductibility of credit write-downs in the first application of IFRS 9	*0*	*0*	*130*	*130*
Review of the regulation of reportable tax losses	*0*	*143*	*12*	*102*
Emergency requirements	*0*	*119*	*86*	*35*
Tax on the consumption of tobacco substitutes	*0*	*70*	*70*	*70*
Reduction of annual pensions exceeding 100,000 euro gross - tax effects	*0*	*62*	*65*	*68*
Other investment support measures	*0*	*10*	*48*	*38*
Balance and write-off of collection agent charges from 2000 to 2017 for persons with ISEE < 20,000 euro	*0*	*5*	*5*	*25*
Deferment of public sector recruitment - effects of taxes and charges	*0*	*97*	*0*	*0*
Ministry expenditure rationalization - effects of taxes and charges	*6*	*11*	*34*	*34*
Other	*204*	*87*	*201*	*146*

Note: Discrepancies, if any, are due to rounding.
The 2019-2021 public finance Budget includes the effects of the 2019 Budget Law and Decree-Law No. 119/2018 converted by Law No. 136/2018.

Table V.10 (CONTINUED 3): EFFECTS OF THE 2019-2021 PUBLIC FINANCE BUDGET ON GENERAL GOVERNMENT NET BORROWING before netting out induced effects; in € mn)

	2018	2019	2020	2021
Higher expenditure	1,225	23,006	36,566	35,640
*Citizen's Income Fund**	*0*	*7,100*	*8,055*	*8,317*
*Pension System Review Fund**	*0*	*3,968*	*8,336*	*8,684*
Local Authority Investment Fund	*0*	*1,080*	*2,342*	*2,249*
Fund for reducing the tax burden	*0*	*390*	*1,639*	*2,472*
Central Government Investment Fund	*0*	*415*	*1,185*	*1,700*
Reduction of ordinary statute Regional Authority contributions to public finances and compensation for Judgement 103/2018	*0*	*2,496*	*2,496*	*0*
Renewal of government employee contracts for 2019-2021	*0*	*650*	*925*	*1,275*
Measures in favour of regional and local authorities for the maintenance and improved safety of local areas and public infrastructure	*0*	*882*	*655*	*1,234*
Contribution to Regional Authorities under ordinary-statute to boost public investment	*0*	*800*	*908*	*1,033*
Recruitment in Government	*0*	*267*	*929*	*1,128*
Increase of Fund for implementing multiannual contributions	*0*	*0*	*700*	*900*
Emergency requirements	*0*	*959*	*583*	*560*
Investment fund for the mitigation of hydraulic and hydrogeological risks	*0*	*600*	*800*	*900*
Use of the administration result for Local Authorities	*0*	*0*	*404*	*711*
Reprogramming State transfers	*640*	*100*	*600*	*440*
International Mission Fund	*130*	*0*	*1,450*	*0*
Investor Compensation Fund	*0*	*75*	*325*	*425*
Other investment support measures	*0*	*207*	*213*	*216*
Refinancing of Special Current Account Fund	*0*	*146*	*148*	*179*
Fund for ordinary financing of universities	*0*	*60*	*159*	*159*
Social Policy Fund	*0*	*120*	*120*	*120*
Baby Bonus	*0*	*204*	*240*	*0*
Refinancing of Special Capital Account Fund	*0*	*48*	*124*	*135*
SME Guarantee Fund	*435*	*0*	*0*	*0*
Implementation of initial step of the National Plan of Operations in for the Water Sector	*0*	*100*	*100*	*100*
Dependants Fund	*0*	*100*	*100*	*100*
Family Policy Fund	*0*	*100*	*100*	*100*
Implementation of technological infrastructures for electronic booking systems for accessing health care facilities	*0*	*75*	*125*	*100*
EU Directive Implementation Fund	*0*	*75*	*100*	*100*
Job centre recruitment	*0*	*0*	*0*	*160*
Contribution to Regional Authorities for supporting the independence of students with disabilities	*0*	*100*	*100*	*100*
Reorganization of the roles and careers of police and armed forces	*0*	*0*	*100*	*100*
Increase of Fund to meet non-deferrable expenditure	*0*	*14*	*11*	*102*
Study grants for specialist trainee doctors and specialist training	*0*	*33*	*55*	*78*
Fund for the operation of schools	*0*	*0*	*174*	*80*
Tax credit for training costs	*0*	*0*	*250*	*0*
Obligation to store and transmit fees electronically - tax credit	*0*	*36*	*196*	*0*
Contributions for the purchase of electric, hybrid and low CO2 emission vehicles	*0*	*70*	*70*	*70*
Financing of healthcare facility construction programmes	*0*	*0*	*0*	*100*
Fund for the implementation of safety measures for the bridges over the River Po Basin	*0*	*50*	*50*	*50*
Extension of Fund to combat education poverty among children	*0*	*55*	*55*	*55*
Government Programme Implementation Fund	*0*	*44*	*17*	*58*
Complementary programmes for action and cohesion plans	*0*	*0*	*150*	*150*
Programme for upgrading the energy efficiency of General Government property	*0*	*25*	*40*	*40*
School maintenance and furnishing services and increase in spending limit for purchasing cleaning materials	*0*	*94*	*10*	*10*
Contribution to the National Research Council	*0*	*30*	*30*	*30*
Increase of Fund for the enhancement of urban safety initiatives	*0*	*25*	*15*	*15*
Health Research	*0*	*10*	*25*	*20*
Other	*20*	*1,402*	*1,356*	*1,083*
IMPACT ON NET BORROWING	7	-11,544	-14,508	-9,235

Note: Discrepancies, if any, are due to rounding. The 2019-2021 public finance budget includes the effects of the 2019 Budget Law and Decree-Law No. 119/2018 converted by Law No. 136/2018.
* For more details on how the funds are used, see Table V.11

The initial measures adopted in 2019: introduction of the Citizen's Income and new types of early retirement

In January 2019, it was adopted[18] the legislative provision that gives effect to the institution of the Citizen's Income and identifies new ways to access early retirement (Table. V.11).

The Citizen's Income (5.6 billion in 2019, 7.2 billion in 2020 and 7.4 billion in 2021) takes the form of a benefit, which comprises two components: an income supplement to reach a certain threshold and a rent support for households that do not own property. The benefit amount varies depending on household size and may not exceed the total of 9,360 euro per year (multiplied by the corresponding equivalence scale parameter, reduced according to household income), nor be less than 480 euro per year, and has a maximum continuous duration of 18 months, renewable after a month of suspension. This benefit takes the name of Citizen's Pension for households consisting exclusively of one or more members aged 67 years and older, adjusted to life expectancy increases. In both cases, the households of the beneficiaries must have: an equivalent economic situation index (ISEE) lower than 9,360 euro; real estate assets, as defined by the ISEE, not exceeding 30,000 euro; and movable assets, defined by the ISEE not exceeding 6,000 euro, which is increased according to the number of household members.

Citizen's Income beneficiaries must adhere to a reintegration path (work, completing education, vocational training, etc.) and accept at least one of three appropriate job offers. Within the limits of the abovementioned authorized resources, after suitable provisioning, exemptions from social security contributions are provided for businesses who hire Citizen's Income beneficiaries, as well as incentives for training institutions, which take on a beneficiary and lead them to gainful employment, and for those who start self-employed work within the first 12 months of receiving the benefit. Specific provisions are adopted to launch the Citizen's Income and to implement an extraordinary plan to improve job centres and active labour policies. For these purposes, ANPAL *Servizi* S.p.A is authorized to conclude collaboration contracts and to give permanent contracts to existing fixed-term employees and its operating resources are increased. At the same time, recruitment is envisaged by regional and autonomous provinces of staff to be assigned to job centres, for which the resources previously made available shall be revised by the budget law (overall, the effects of these measures amount to approximately 0.29 billion in 2019, 0.42 billion in 2020 and 0.36[19] billion in 2021, which, net of taxes and charges, correspond to approximately 0.2 billion per year in 2019 and 2020 and 0.3 billion in 2021).

Additional recruitment pertains to INPS, to enable checks of beneficiary requirements and monitoring of Citizen's Income payments (about 0.15 billion in the three years, amounting to approximately 0.08 billion net of taxes and charges).

In conjunction with the introduction of the Citizen's Income, starting from April 2019, the Inclusion Income (REI) can no longer be awarded or renewed.

[18] Decree-Law No. 4/2019, converted with amendments by Law No. 26/2019.

[19] Based on the provisions of Article 1, paragraph 258 of Law No. 145/2018, 0.16 billion from 2021 intended for staff recruitment in job centres are added to this amount.

Consequently, to respond to REI applications made prior to the entry into force of the Citizen's Income, costs are estimated at approximately 0.3 billion in 2019-2020.

As regards social security, the experimental legislation is enacted for the three-year period 2019-2021 to give the right to achieve early retirement at age 62 with at least 38 years of social security contributions, whilst also providing specific rules that set the effective date of retirement and the possibility of combination with income from work, freezing from 2019 until 2026 the life expectancy adjustment of the contribution requirement for access to early retirement regardless of age. At the same time, the first effective payment date of the pension will be deferred for three months, as of 2019, from date of meeting the contribution requirements (overall, considering also the effects of the severance advance for workers who are eligible for this type of early retirement, approximately 4.2 billion in 2019, 7.9 billion in 2020 and 8.4 billion in 2021).

Those who meet the contribution requirements as calculated will also be able to redeem—in whole or in part and for up to five years—previous periods not covered by contributions in forms of compulsory pension pillar, providing for contribution payments in instalments of up to 120 months and 50 percent deductibility of the cost in five annual instalments.

The optional scheme for the early retirement of women (also known as women’s option)[20] is extended to women who reach at least 35 years of social security contributions and are at least 58 years old (for dependent employees) and 59 years old (for the self-employed) by 31 December 2018, with a consequent financial impact of around 0.25 billion in 2019, 0.4 billion in 2020 and 0.5 billion in 2021.

There are also provisions for: the extension to 31 December 2019 of the social APE, the pension advance scheme for approximately 0.1 billion in 2019, 0.2 billion in 2020 and 0.17 billion in 2021; the de-taxation of severance pay for public sector employees (0.2 billion overall in 2020-2021); and the freezing from 2019 until 2026 of adjustment to life expectancy for contribution requirements for early retirement regardless of the workers’ age for workers entering the work force at an early age (who worked for at least one year before the age of 19); here too, the first effective payment date of the pension is deferred for three months from the maturity date of the contribution requirements, starting in 2019 (about 0.13 billion overall in the period considered). Lastly, for 2019, it is ordered that 50 percent of the increase in additional municipal tax on boarding fees be donated to the Air Transport Solidarity Fund (0.13 billion in 2019).

[20] In such cases, the pension is determined entirely by the contribution system and the first effective payment date is deferred by 12 months for female employees and 18 months for self-employed women from the date of meeting the requirements.

Table V.11: EFFECTS OF DECREE-LAW NO. 4/2019 ON GENERAL GOVERNMENT NET BORROWING (before netting out induced effects; in € mn)

	2018	2019	2020	2021
INCREMENTAL RESOURCES	0	11,204	16,594	17,309
Higher revenue	0	748	672	678
Provisions on gambling	*0*	*407*	*377*	*356*
Job centre recruitment - effects of taxes and charges	*0*	*58*	*136*	*147*
Early disbursement of severance indemnity (TFR)devolved to the Treasury Fund - tax effects	*0*	*152*	*20*	*4*
Extraordinary plan to improve job centres and active policies - effects of taxes and charges	*0*	*78*	*63*	*24*
Right to redeem periods not covered by contributions - tax effects	*0*	*17*	*35*	*54*
INPS recruitment - effects of taxes and charges	*0*	*24*	*24*	*24*
Women's option - tax effects	*0*	*0*	*0*	*48*
Other	*0*	*13*	*18*	*21*
Lower expenditure	0	10,456	15,922	16,631
Reduction of Citizen's Income Fund	*0*	*6,366*	*7,490*	*7,880*
Reduction of Pension System Revision Fund	*0*	*3,968*	*8,336*	*8,684*
Job centre recruitment	*0*	*10*	*0*	*0*
Other	*0*	*112*	*96*	*66*
USE OF RESOURCES	0	11,198	16,517	17,254
Lower revenue	0	14	170	278
De-taxation of severance indemnity	*0*	*0*	*75*	*93*
Job centre recruitment - effects of taxes and charges	*0*	*5*	*0*	*147*
Provisions on gambling - accounts surcharge recovery, PREU (sole applicable taxes) 2019	*0*	*0*	*70*	*0*
Right to redeem periods not covered by contribution - tax effects	*0*	*8*	*18*	*29*
Other	*0*	*1*	*7*	*9*
Higher expenditure	0	11,183	16,347	16,976
Citizen's Income and Pensions	*0*	*5,633*	*7,159*	*7,391*
Early retirement with 62/38 age and contribution requirement and freeze until 2026 on the adjustment of contribution requirement to life expectancy for access to early retirement	*0*	*3,781*	*7,860*	*8,397*
Women's option	*0*	*250*	*396*	*538*
Job centre recruitment	*0*	*120*	*280*	*304*
Early disbursement of severance indemnity (TFR) devolved to the Treasury Fund	*0*	*585*	*75*	*14*
Extension of 'APE sociale' early retirement payment mechanism	*0*	*98*	*199*	*168*
Extraordinary plan to improve job centres and active policies	*0*	*160*	*130*	*50*
Inclusion Income - no longer awarded from April 2019	*0*	*274*	*8*	*0*
Recruitment for INPS	*0*	*50*	*50*	*50*
Freeze until 2026 on the adjustment of the contribution requirement to life expectancy for access to early retirement	*0*	*31*	*54*	*50*
Air Transport Solidarity Fund	*0*	*125*	*0*	*0*
Fund for structural economic policy measures	*0*	*0*	*117*	*0*
ANPAL Servizi Spa - making temporary staff permanent and operating expenditure	*0*	*21*	*11*	*6*
Tax Advice Centres affiliated with INPS	*0*	*35*	*0*	*0*
Other	*0*	*21*	*8*	*10*
IMPACT ON NET BORROWING	0	7	77	54

Note: Discrepancies, if any, are due to rounding.

FOCUS

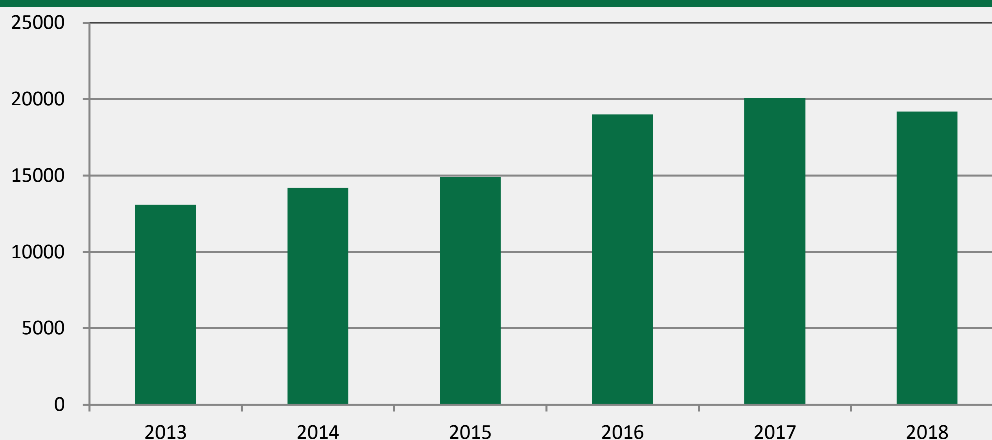
Measures to fight tax evasion

In the course of 2018, the Italian Revenue Agency collected over 16 billion from 'ordinary' control activities, 11 percent more than in 2017 (14.5 billion). Of these, 11.25 billion came from direct payments on orders issued by the Authority (+10 percent), approximately 1.8 billion were the result of compliance promotion (+38 percent) and 3.1 billion were recovered by enforced collection (+4 percent).

On the other hand, a negative 46 percent variation was recorded for recovery resulting from 'extraordinary' measures, at 3 billion against 5.6 in 2017. Of these, 100 million (-87 percent compared to 2017) came from tax dispute settlements, 2.59 billion (-41 percent compared to 2017) from the 'scrapping' of Italian Revenue Agency tax debts, 300 million (-25 percent compared to 2017) from voluntary disclosure and 50 million from the settlement procedure referred to in Article 2 of Decree-Law No. 119/2018.

Altogether, in the course of 2018, evasion recovery activities recorded takings of 19.2 billion, down 4.5 percent compared to 2017 (see Figure R.1).

FIGURE R.1: RESULTS OF THE FIGHT AGAINST EVASION: TAX DUE TO THE TREASURY AND NON-TREASURY TAX REVENUE (in € mn)



Source: Revenue Agency.

The Government has paid close attention to its overall tax compliance strategy, focusing its efforts on the implementation of the tax decree for transparency, fairness and growth (Law 23 of 2014) and on changing its approach towards taxpayers. In general, the fight on tax evasion was aimed at strengthening and enhancing preventive interaction between tax authority and taxpayer, with the intent of improving the propensity towards spontaneous compliance (the *indirect effect* of fighting tax evasion), and of recovering revenue through investigations and controls (the *direct effect* of fighting tax evasion).

With the objective of satisfying the need to change its approach to tax administration and relations with taxpayers, and given the findings of the OECD and IMF reports on the state of the Italian finance administration, the Italian Revenue Agency made far-reaching innovative changes to its organizational system in 2018. The new, more efficient set-up includes three central management offices within the taxpayers department, each of them in charge of a specific type of taxpayer (natural persons, non-commercial bodies and self-employed; small and medium-sized enterprises; big taxpayers). This solution, which supersedes the preceding operational approach, based on taxpayer type as opposed to process type, is designed to encourage consultations and more targeted and thus more effective control. Similarly, the tasks of the three central management offices are no longer limited to the traditional function of guiding and coordinating investigations and controls, instead, in line with the new organisation, now include consultancy, requests and litigation, thus covering

the full management of fiscal relations with the different types of taxpayer.

In implementation of the tax decree and for the purposes of monitoring and producing an official estimate of tax and contribution evasion[21], the Government is obliged to: i) submit an annual a report, as part of the budgetary procedure, on the results achieved concerning measures to combat tax and contribution evasion; (ii) use, to write this report, the results of the 'Report on non-observed economy and tax and contribution evasion' prepared by the Commission established ad hoc by decree of the Minister of Economy and Finance[22]. This report estimates the extent and diffusion of tax and contribution evasion and provides official estimates of the amount of revenue subtracted from the public budget.

The official estimate of the total tax revenue and social security contributions subtracted from the public budget calculates the tax gap between taxes and contributions actually paid and those that taxpayers would have paid in a situation of full compliance with current tax legislation. On the basis of internationally established and shared practices, the Commission quantified the tax gap of the main taxes and contributions, distinguishing, where possible, between the tax gap net of missed payments (assessment gap) and the tax gap due to missed payments (collected gap).

Based on the latest available data, for 2016, tax and contribution evasion was estimated at 107,522 million, of which tax evasion alone [23] was 96,330 million; on average over the period 2014-2016, tax and contribution evasion stood at 108,977 million, and the tax component[24] alone was 97,607 million. In 2016, the tax gap increased by 709 million compared to 2015, while gap propensity decreased by 0.1 percentage points, down from 21.2 percent in 2015 to 21.1 percent in 2016; specifically, the VAT tax gap increased by 412 million and the IRAP gap decreased by 297 million. The CIT tax gap increased by around 909 million and the PIT gap increased by around 1.2 billion (with a decrease of 115 million for dependent workers and an increase of 1.3 billion for self-employed workers and businesses). Moreover, compared to 2015, the propensity towards PIT evasion fell by 0.1 percentage points for both self-employed workers and businesses and irregular dependent workers, whilst IRAP evasion propensity was down by 0.4 percentage points; however, CIT evasion propensity increased by 1.8 percentage points.

Further tax gap improvements are expected in the coming years because of the new measures to combat tax and contribution evasion introduced with the latest measures.

Starting on 1 January 2019, the electronic invoicing obligation came into force for all transactions between VAT payers (B2B) and towards end consumers (B2C), which was introduced by the 2018 Budget Law. This measure extends considerably the obligation of electronic invoicing, which had already been provided in 2015 for business transactions with the general government (B2G) and from 1 July 2018 for public subcontracting and the mineral oils sector.

Mandatory electronic invoicing carried out through the Exchange System allows the Financial Authority to acquire the information included in the invoices issued and received between businesses in real time, enabling the tax authorities can carry out timely and automatic checks on the consistency between declared and paid VAT, as well as driving digitisation and the simplification of administration.

Prior to the introduction of this obligation, it would take the tax authorities approximately 18 months to ascertain the existence of an operator guilty of VAT fraud. Immediately available electronic invoices reduce this time to three months, so that 'fraudulent chains' of economic operators may be tackled more quickly than in the past, thus increasing the effectiveness of

[21] Art. 3 of Law No. 23/2014.
[22] Art. 10a.1 of Law No. 196/2009, introduced by Decree-Law No. 160/2015.
[23] The value reported is considered net of TASI (tax on indivisible municipal services).
[24] The value reported is considered net of TASI (tax on indivisible municipal services).

this action to combat evasion. The effect expected from the introduction of the electronic invoicing obligation is mainly the reduction of evasion by failure to declare (evasion without consent). The effectiveness of this instrument may be attested to by the initial risk analyses based on e-invoices and data from the Invoices and Receipts portal, which in little more than two months in 2019 exposed a complex fraudulent system carried out through false invoicing among paper mill companies, intercepting and preventing significant amounts of false VAT credits.

In addition, mandatory electronic invoicing presents numerous advantages: automatic invoice storage obligation, more efficient accounting processes when integrated with invoicing systems, availability of precise, real-time data (not just VAT summaries) with the option of constant pre-declaration dialogue with taxpayers, and greater transparency, with invoices made available in the Invoices and Receipts portal of the Italian Revenue Agency website.

The Tax Decree[25] strengthens the electronic invoicing legislative framework in force, providing for the obligation of computer storage and telematic transmission of receipts to the Italian Revenue Agency for transactions with end consumers (B2C). The new obligation is foreseen from 1 July 2019 for businesses with a turnover exceeding 400,000 euro and from 1 January 2020 for other businesses.

The new requirement is introduced along with measures intended to simplify administrative procedures and the awarding of tax credits equal to 50 percent of the costs sustained to adapt or replace of fiscal meters, for a maximum of 250 euro in case of purchase and 50 euro in case of adaptation, for each instrument.

The introduction of the obligation to transmit payments by computer is linked to the ‘receipts lottery’. To participate in the lottery, customers must provide their tax code to sellers, who will then transmit the purchase data to the Revenue Agency. This measure is intended to fight tax evasion by the non-certification of payments agreed between the buyer and seller by introducing of a ‘conflict of interests’ between the two parties that should stimulate tax compliance.

Moreover, the ‘Dignity Decree’[26], is intended to simplify and reduce the administrative burden on taxpayers without weakening the instruments to combat tax evasion adopted so far. The institution of the 'incomemeter' (*redditometro*) will be subject to review in order to gear it towards fighting tax evasion more effectively; new elements indicating contribution capacity will be identified after consulting ISTAT and the most representative consumer associations.[27]

The introduction of Synthetic Reliability Indexes or SRIs, to replace sector studies and parameters, responds to the need to strengthen the collaboration between tax authority and taxpayer and encourage tax compliance, transparency and dialogue.[28]

The SRIs are processed according to the analysis of data and information relating to several tax periods; with reference to the individual tax periods, the positioning of each taxpayer in relation to the reliability of his/her/its tax behaviour. This is a simple average of the result of applying elementary reliability and irregularity indicators and has a value ranging from 1 to 10.

[25] Decree-Law No. 119 of 23 October 2018 - Urgent provisions on taxation and finance.
[26] Decree-Law No. 87 of 12 July 2018 - Urgent provisions for the dignity of workers and enterprises.
[27] Other measures provided for by the ‘Dignity Decree’ in favour of citizens and businesses included: the deferment of the expiry of the 'spendometer' (*spesometro*); repeal of the split payment for professionals; deferment of the electronic invoicing obligation for roadside service stations.
[28] Article 9a of Decree-Law No. 50 of 24 April 2017, converted with amendments by Law No. 96 of 21 June 2017, introduced the Synthetic Reliability Index (SRI) protocol. Subsequently, Art. 1, paragraph 931, of the 2018 Budget Law (Law No. 205/2017) established that the Synthetic Reliability Indexes of taxation shall apply starting from the tax period ongoing as at 31 December 2018, replacing sector studies and parameters.

Viewing the results of applying elementary indicators and the synthetic reliability index allows taxpayers who have a low degree of reliability to change their behaviour promptly to improve their accounting and income profile when declaring their income, which gives them access to multiple rewards. Indeed, a multiple-level reward mechanism is envisaged in cases of high reliability.

The Government also focuses on consolidating the governance of tax administration, by strengthening the general coordination and improving the strategic management of tax agencies, enabling them to combat evasion by providing incentives to comply with tax obligations and promoting spontaneous tax declarations over the traditional ex-post checks and investigations. This objective must also be achieved by simplifying and digitizing the fulfilment of obligations, reducing the tax gap and improving the collection system.

Lastly, the fight against tax evasion and avoidance has also been improved through increasingly effective international administrative cooperation. The entry into force of the international Common Reporting Standard (CRS) for the automatic exchange of information on financial assets held abroad by taxpayers residing in each of the 92 jurisdictions that have subscribed to international agreements, as at 17 August 2017, is very significant operating instrument that allows the tax authorities of the participating States to receive information on financial accounts held abroad as at 31 December of each year by 1 October of the following year. The first automatic exchange of financial data between tax authorities took place in September 2017 between 47 jurisdictions whose national and international legal framework was in line with the new international standard. Another 53 jurisdictions have undertaken to carry out the first information exchange by 30 September 2018. The network of jurisdictions subscribing to the CRS was subsequently expanded to include 8 jurisdictions that undertook to carry out the exchange by 30 September 2019 or 2020, in addition to 45 developing countries that, though they are part of the CRS network, have not yet defined when they will start the exchange. As regards Italy, the international network includes, to date, 103 partners that have undertaken to transmit CRS data. The data quality is especially high, considering the obligations of due diligence that require the financial intermediaries who send the information to the tax authorities to apply the CRS rules for identifying the holders of financial accounts; these rules are modelled on the international anti-money laundering regulations. The data from foreign sources can be used to analyse the risk of evasion, by cross-referencing the fiscal data found in tax registers.

FOCUS

Public Aid for Development (PDA)

Based on preliminary estimates, PDA in Italy stood at 4.24 billion in 2018, equal to 0.24 percent of Gross National Income (GNI), down from the 5.2 billion recorded in 2017. This decrease is attributable largely to the considerable decrease in expenditure for the temporary reception of refugees and asylum seekers in Italy.

Taking these (as yet provisional) data into account, the Government confirms the need for Italy to realign with international standards on PDA and continue on the path towards the objective of 0.7 percent of GNI set in 2015 by the 2030 Agenda for Sustainable Development.

In this regard, we reiterate the need to ensure, from a multiannual perspective, gradual increases in the funds allocated to national authorities for cooperative action towards development, in line with the provisions of Art. 30 of Law No. 125/2014, with particular reference to the resources allocated to the Ministry of Foreign Affairs and International Cooperation (MAECI) for cooperative action towards development.

At the same time, we reaffirm the need to promote the greater coordination of public policies in the area of international cooperation, with the objective of improving the quality and consistency of Italy's action on the issue of PDA by promoting, in particular, the instruments provided for by Law No. 125/2014.

VI. INSTITUTIONAL ASPECTS OF PUBLIC FINANCE

VI.1 RECENT LEGISLATIVE DEVELOPMENTS ON THE REFORM OF THE STATE BUDGET

Following the presentation of the 2018 Economy and Finance Document, the implementing measures for completing the State budget reform continued.

In particular, last September, a legislative provision was approved[1] to correct the provisions concerning the structure of the State budget and the regulation of the accounts operating in the treasury accounts.

The main innovations introduced concern the following:

- the provision of a statement, annexed to the budget law, that, in relation to expenditure and with reference to each Ministry, will distinguish between mandatory charges, legislative factors and adjustment to borrowing requirement, separately for current and capital account allocations;
- the process of updating of the 'actions' that can take place both in the experimental stage and subsequently, by decree of the Minister of Economy and Finance, while still allowing the budget variation decrees, resulting from the approval of new laws, to establish new actions and modify existing ones. Furthermore, it was established that the additional notes to the State budget must be drawn up with reference specifically to the actions and not to the elementary units of the budget (budget chapters);
- the refinement of the standards of flexibility and regulation of certain accounting situations close to the end of the financial year;
- the preparation, in relation to the finalised revenue, of an information annex to the State financial statements , for each Ministry and elementary unit of the budget of revenue and expenditure, which illustrates the revenue and spending for the year in relation to the services and activities provided by central administrations of the State in favour of public or private entities, with separate indication of each item of expenditure;
- the revision of the regulation of the so-called 'spare funds', established in the budgets of the Ministries responsible for national defence, public order and safety and rescue, to meet mandatory charges, by means of advance financial resources in favour of the bodies responsible for these functions, to fund temporary cash deficiencies;
- the administrative review and management of the accounts of central administrations of the State held in banks and post offices;

[1] Legislative Decree No. 116 of 12 September 2018, published in Official Journal No. 235 of 9 October 2018, which brought changes to Legislative Decree No. 90 of 12 May 2016, on completing the structural revision of the State budget.

- the reformulation of the accounting principles to bring them in line with the new approach outlined by the reform and, in particular, with the new concept of spending commitment and that of the qualified assessment of revenue;
- The establishment, at the Ministry of Economy and Finance, of a committee to define the methodological guidelines for the adoption of the gender budget.

At the end of 2018, a further legislative provision[2] was adopted that defines the structure of the integrated chart of accounts of central administrations of the State. Subject to prior experimentation, this instrument allows the introduction of an integrated accounting system by placing, for knowledge purposes, economic accounting alongside financial accounting. The purpose is to ensure the harmonisation of the accounting systems of the different entities of the general government, strengthen the consolidation (during forecasting, management and reporting) of accounting information and ensure greater traceability and transparency. The Ministerial Decree governing the experimentation of integrated accounting and the new integrated chart of accounts is under publication in the Official Journal, in order to assess the effects before its final adoption.

Within the perspective of strengthening the cash balance sheet, the new concept of spending commitment entered into force starting 1 January 2019, based on which the legal obligation is ascribed to the accounts for financial year in which it is due. At the same time, experimentation is ongoing on the new concept of qualified assessment, which requires the entry of revenue in the State budget based on the amount that will presumably be collected in the course of the year[3].

A broader and more detailed discussion of these issues is provided in the Report on the status of implementation of the accounting and public finance reform annexed to this planning document.

VI.2 BUDGETARY RULES FOR LOCAL GOVERNMENT

Balanced budget rule

In 2018, following Constitutional Court Rulings 247/2017 and 101/2018, the legislator simplified significantly the rule of public finance that requires the contribution of regions, autonomous provinces of Trento and Bolzano, the metropolitan city, provincial and municipal authorities in order to reach the net borrowing objective pursued at the national level in compliance with the Stability and Growth Pact. Introduced in 2012, reformed in 2016[4] and implemented by the

[2] Presidential Decree No. 140 of 12 November 2018, published in Official Journal No. 299 of 27 December 2018.

[3] Decree of the Minister of Economy and Finance of 25 May 2018 published in Official Journal No. 210 of 10 September 2018 setting the procedures and schedule for the experimentation of the new concept of qualified assessment.

[4] Law No. 164/2016 implementing the constitutional reform provided by Const. Law No. 1/2012, which revised Chapter IV of Law No. 243/2012.

provisions of the 2017 Budget Law[5], this rule identified a single non-negative balance between final revenue and final expenditure, net of items pertaining to receiving or repaying loans and administration surplus or deficit, in both the forecasting and statement stages. The reform of 2016 had also extended the possibility of financing regional and local investment, beyond recourse to borrowing, by including the use of the administration results of previous years (previous surpluses) and the inclusion in the non-negative balance between final revenue and expenditure of the *Fondo Pluriennale Vincolato* (Restricted Long-Term Fund, RLTF), net of the share financed by borrowing, under both revenue and expenditure[6].

With Ruling No. 247 of 29 November 2017, despite finding unfounded the questions of constitutional legitimacy proposed by the regional authorities with regard to Article 1, para. 1, point b of Law No. 164 of 2016 (non-negative balance between final revenue and expenditure), the Constitutional Court provided an interpretation according to which the budget surplus and the RLTF cannot be restricted in use, while also expressing in several points of the ruling, a preference for the accounting principles and budget balances covered by Decree Law No. 118 of 2011 on accounting reform/harmonisation. According to the Constitutional Court, Legislative Decree No. 118/2011—which also requires compliance with final and current account budget balance in accrual terms, and final cash balance for all regions and local governments—guarantees all local authorities the full implementation of Articles 81 and 97 of the Constitution and their contribution to public finance targets.

Whereas, on the one hand, superseding the so-called 'twin-track' (i.e. the existence of balances introduced by Decree Law No. 118/2011 and by Law No. 243/2012 as reformed by Law No. 164/2016), means the simplification for local authorities and an incentive to local public investment, on the other hand, it could have been a risk in terms of the impact on net borrowing.

Therefore, the full implementation of the Constitutional Court ruling required resources to be found in terms of borrowing requirement and net borrowing, pursuant to the law on accounting and public finance[7], which establishes that: '*where the Minister of Economy and Finance finds that the implementation of laws is detrimental to the achievement of public finance targets, he shall promptly adopt the consequent legislative measures to ensure compliance with Article 81 of the Constitution. The same procedure is applied in the case of final judgements by courts and the Constitutional Court involving interpretations of existing legislation likely to determine greater costs, without prejudice to the personnel provisions set out by Article 61 of Legislative Decree 165 of 30 March 2001*'. The relative funding was then identified by Decree Law No. 91 of 2018[8] and Article 1, para. 826 of the 2019 Budget Law[9].

For ordinary-statute regions, having considered the agreement ratified by the Government-Regions Conference of 15 October 2018 concerning the '*regional*

[5] Law No. 232/2016, Art. 1, para. 466.

[6] This fund is made up of resources already established in the course of the year but set aside for the financing of bond liabilities in subsequent years

[7] Law No. 196/2009, Art. 17, para. 13.

[8] Established by Article 13, para. 4.

[9] Law No. 145/2018.

contribution to public finance, relaunch of public investment and agreement to the allocation of the fund for financing investment and national infrastructure development, in implementation of the judgements of the Constitutional Court', the new public finance rules were postponed to 2021. In particular, the regions agreed on the application of Constitutional Court Rulings No. 247/2017 and No. 101/2018 on the full use of administration surpluses starting in 2021, in order to retain the possibility of making use of the positive balance of public finances[10] to make up part of their contribution[11], equal to 2,496.2 million for 2019 and 1,746.2 million in 2020. In implementation of the agreement of 15 October 2018, the 2019 Budget Law[12] has established that ordinary-statute regions will contribute to public finances through a positive balance of 1,696.2 million in 2019 and 837.8 million in 2020.

With effect from 2019 (2021 for ordinary-stature regions), the new framework outlined by the legislator establishes the following for all regions and local authorities:

- compliance with balanced budget rule (non-negative final and current account results in accrual terms, and final cash balance) and the other accounting principles introduced by Legislative Decree No. 118/2011, consequently finally superseding the aforementioned 'twin-track';
- simplification of monitoring and certification requirements, thus making more efficient use of human resources;
- option of planning own financial resources in the medium-long term to ensure the recovery of local investment, including through unlimited use of administration surpluses and multi-year restricted funds.

With a view to medium-long term sustainability and the finalisation of re-course to new debt, the following general principles hold true:

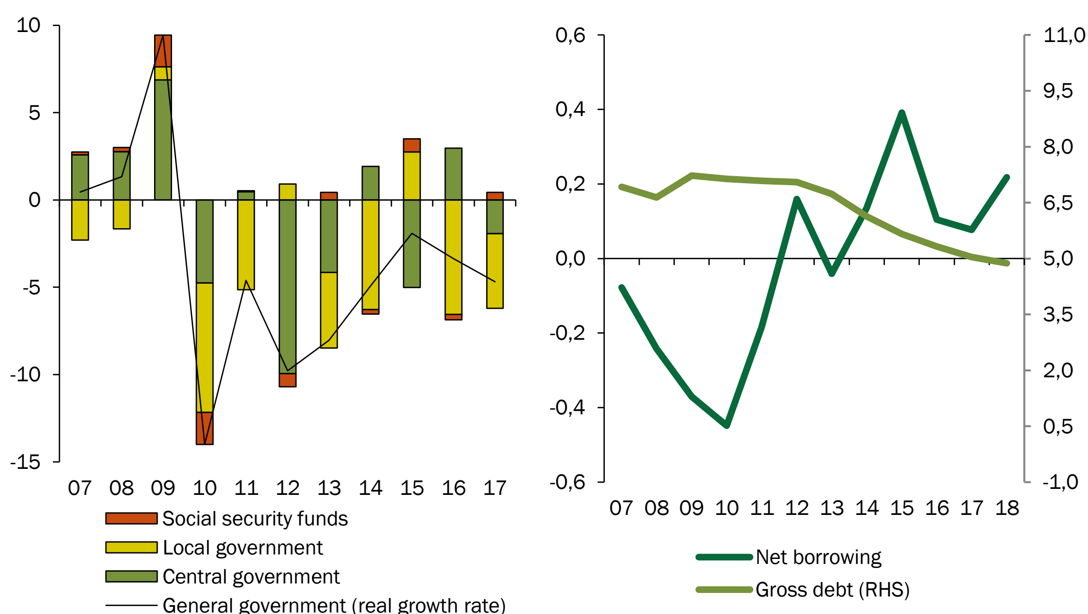
- local authorities can use borrowing only to finance investment spending, within the limits provided for by State law;
- borrowing transactions must be accompanied by amortisation plans not exceeding the useful life of the investment and highlighting the costs to be incurred and sources of funds in the individual financial years.

[10] Law No. 232/2016, Art. 1, para. 466 (2017 Budget Law).
[11] From Article 46, para. 6, of Decree-Law No. 66/2014.
[12] Article 1, para. 841.

Given that the entry into force of the 2019 Budget Law eliminated the requirements of regions and local authorities concerning the monitoring and certification of pre-existing public finance trends[13], the verification of public finance trends in the course of the year shall be performed through the Public Authority Transaction Information System (SIOPE)[14], in part to simplify authority requirements; whilst the following check will be carried out through information transmitted to the General Government Database (*Banca Dati delle Amministrazioni Pubbliche*, BDAP) set up at the MEF[15]. Additionally, to make sure local authorities deliver their information on estimated budgets and management reports, a penalty system was implemented (staff recruitment freeze and, for local authorities only, transfer freeze, until the accounting data is delivered[16]). This is in order to ensure timely monitoring of trends in public finance.

The simplification that results from the application of the aforementioned Constitutional Court rulings and the measures provided for by the latest Budget Laws will help to revive investment by local governments, whose contribution to the real growth of general government investment has almost always been negative since the crisis of 2009.

FIGURE VI.1: NET BORROWING AND LOCAL GOVERNMENT BORROWING (% of GDP) AND CONTRIBUTIONS TO REAL GROWTH OF GENERAL GOVERNMENT GROSS FIXED INVESTMENT (data at 2010 prices)



Source: MEF analysis based on ISTAT and Bank of Italy data.

13 Law No. 232/2016, Art. 1, para. 469.
14 Introduced by Art. 28 of Law No. 289/2002, as governed by Art. 14 of Law No. 196/2009.
15 Provided by Art. 13 of Law No.196 of 2009.
16 Article 9, paragraph 1-d, Decree-Law No. 113/2016 (staff recruitment freeze) and Art. 161, para. 4, Decree-Law No. 267/2000 (transfer freeze for local authorities).

In order to promote investment across the country, the 2019 Budget Law[17] strengthens the investment measures for local governments launched in 2017-2018. The first actions focused on financing the final and executive planning of municipalities in Seismic Hazard Zone 1 (extended to Seismic Hazard Zone 2 in 2018)[18], including 5 million for 2017, 25 million for 2018 and 30 million for 2019); next, the 2018 Budget Law provided for investment grants for public works to improve the security of buildings and land, within an overall limit of 150 million for 2018, 300 million for 2019 and 400 million for 2020.

In recognising the sector and the procedure for identifying the beneficiary entities, the 2019 Budget Law provides for the following additional medium-long term financial measures[19]:

- contributions to municipal authorities for small works within the overall limit of 400 million for 2019 (Art. 1, para. 107 to 114);
- contributions granted to ordinary-statute regions towards for public works to improve the safety of buildings and the local area, within the overall limit of 135 million per annum for the period 2021-2025, 270 million for 2026, 315 million per annum for the period 2027-2032 and 360 million for 2033 (Art. 1, para. 134 to 138);
- contributions granted to municipalities towards public works to improve the safety of buildings and the local area, in the overall limit of 250 million per annum for the period 2021-2025, 400 million for 2026, 450 million per annum for the period 2027-2031 and 500 million for 2032 (Art. 1, para. 139 to 148);
- contributions towards the construction of healthcare facilities, within the overall limit of 100 million per annum for 2021 and 2022, 300 million per annum for the period 2023-2025, 400 million per annum for the period 2026-2031, 300 million for 2032 and 200 million for 2033 (Art. 1, para. 555 and 556);
- contribution granted to the provincial authorities of ordinary-statute regions for roads and schools, for a total of 250 million per annum for the period 2019-2033 (Art. 1, c. 889 and 890);
- investment contributions granted to ordinary-statute regions of 800 million for 2019, 908 million for 2020, 1,033 million per annum for 2021-2022 and 468 million for 2033 (Art.1, para. 833 et seq);
- investment contributions granted under the Agreements with Special Autonomous Regions, for a total of 2.486 million in the period 2019-2033 (Art. 1, para. 126 and 875 et seq.);
- contributions towards improving bridge safe, for a total of 50 million per annum for the period 2019-2023 (Art. 1, para. 891);
- contributions granted to Roma Capitale towards the extraordinary restoration of the surface of major roads and the planning review for the completion of Rome’s Metro Line C, within the overall limit of 95 million for 2019, 85 million for 2020 and 20 million for 2021 (Art. 1, para. 931 and 933).

[17] Law No. 145/2018.

[18] Laid down by Article 41a of Decree Law No. 50/2017.

[19] Paragraphs 95 (Investment fund of central administrations of the State) and 1028 (Hydrogeological Risk) provide resources additional to these measures.

Health Pact and ceilings on pharmaceutical expenditure

Regional healthcare spending is subject to the rules contained in the Health Pact, an agreement with a three-year time horizon between the State, regions and the Autonomous Provinces of Trento and Bolzano. Since 2000, these agreements have established the total resources to be allocated to the financing of the National Health Service (SSN) in order to ensure the resources needed for medium-term planning, establishing the sector's governance tools and the procedures to monitor these tools.

SSN State funding requires the regions to ensure balance in the health sector by fully funding any deficits. Automatic corrective measures are provided in the event of deviation from balance, such as increased additional regional taxation on individual income and IRAP and the ban on retired staff turnover. An essential tool of governance is the requirement to produce a Recovery Plan if the regional healthcare sector has a deficit exceeding a certain threshold established by law or, even if the deficit is below the aforesaid threshold, if the region has no means of funding or presents significant deficiencies in the quality of care[20]. The Plan includes measures to be implemented to restore a balanced budget over a time horizon of three years and the definition of the instruments for monitoring and verifying its implementation. Lastly, the legislation requires healthcare sector to be placed under external administration if the Recovery Plan is inadequately prepared or not implemented according to the planned schedule and procedures. It has recently been introduced that whoever holds the role of Commissioner must not hold any other institutional position in the regional authority under administration[21]. Since 2016, the submission of Recovery Plans is also compulsory for hospitals, including university hospitals, public care and treatment institutes and other entities that provide care and treatment services, should they report significant imbalances between revenues and costs[22] or fail to comply with care quality and effectiveness standards[23].

The latest Health Pact was stipulated on 10 July 2014 for the period 2014-2016. The agreement defined the level of financing contributed by the State and dealt with aspects of SSN organisation and regulation. The Pact was transposed in the Stability Law for 2015. For the years following 2016, the most recent legislation amendments have redefined the level of SSN financing, even in the absence of a new agreement. Specifically, the 2019 Budget Law defines the level of SSN financing for the three-year period 2019-2021[24] at 114,474, 116,474 and 117,974 million, respectively; however, access to the increases foreseen for the years 2020 and 2021, as compared to 2019, is subject to the conclusion of a new Health for the period 2019-2021. The provisions also identify the main areas of intervention, which should be covered by the Pact. Dialogue between central

[20] The 5 percent threshold is given by the ratio between the nominal regional deficit and the total resources allocated by the State to finance the regional health service.

[21] Art. 25g of Decree-Law No. 119/2018, converted by Law No. 136/2018.

[22] Deviation between costs and revenues greater than 7 percent of revenues or equal to at least 7 million in absolute value.

[23] Art. 1, para. 521-536, Law No. 208/2015 (2016 Stability Law).

[24] Art. 1, para. 514, 518 and 526, Law No. 145/2018 (2019 Budget Law).

government and regional authorities are currently in progress to reach agreement on the issues.

Since 2017, part of the standard national health financing requirement, equal to 1 billion, has been earmarked for the purchase of particular types of drugs, of which 500 million for innovative drugs and 500 million for cancer drugs.

The ceilings on pharmaceutical spending, substantially modified by the 2017 Budget Law, are confirmed. Specifically, the existing ceilings are set at 7.96 percent of SSN financing for pharmaceutical spending under the national healthcare system[25] and 6.89 percent for direct purchases[26].

The automatic correction mechanism (payback) remains in force in case of ceilings overrun. In the event of overrun of the ceiling of pharmaceutical spending under the national healthcare system, the excess must be funded by the chain of pharmaceutical operators (producers, wholesalers, pharmacies); for overruns of ceiling on pharmaceutical spending for direct purchases, 50 percent of the excess is charged to the regional authorities and the remaining 50 percent to the pharmaceutical companies. With effect from 2019, the 2019 Budget Law introduced simplified procedures to determine the pharmaceutical spending payback for direct purchases, which require inter alia that the Italian Drug Agency (AIFA) use data from electronic invoices to monitor expenditure. This should make basic information more reliable and should therefore prevent, or at least limit, the ongoing litigation that the pharmaceutical companies began in 2013. The final settlement of the aforementioned litigation should instead be ensured by the provisions introduced by Decree-Law No. 135/2018, converted by Law No. 12/2019[27], which establish that, in the event that the pharmaceutical companies pay into the State budget a total of 2,378 million by 30 April 2019, including sums already paid for the period 2013-2017, the litigation concerning the above-mentioned annuities shall be understood to be expired due to termination of cause for litigation.

[25] Pharmaceutical spending under the national healthcare system refers to spending on refundable medicines, excluding patient contributions, distributed through affiliated public and private pharmacies.

[26] Pharmaceutical spending for direct purchases refers to spending on drugs purchased directly by healthcare companies, distributed in hospitals or distributed directly by these companies in the local area. This distribution can also be undertaken through specific agreements with affiliated pharmacies. The one billion share of spending set aside for innovative and cancer drugs from 2017 is excluded from ceiling calculations.

[27] Art. 9a, para. 3-6.

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