Autoridad Independiente de Responsabilidad Fiscal

Debt Monitor
July 2021

I. Recent evolution and medium-term projections

- *The Spanish debt-to-GDP ratio stood at 120% in 2020, an increase of 24.5 points on the level of the previous year. The sharp fall in GDP, the denominator of the ratio, contributed 10.5 points to this increase, while the public deficit added a further 11 points. In addition, the reclassification of the debt of Sareb has added €34.15bn to government debt, accounting for most of the three points of the stock-flow adjustment.*

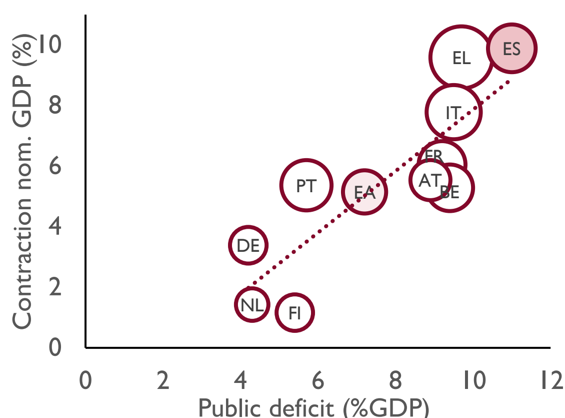
- *In the first quarter of 2021, public debt continued to rise sharply, adding €47.13 billion to stand at €1.39 trillion. This has led to an increase in the debt ratio of 5.2 points compared with year-end 2020, to reach a new record of 125.2% of GDP. The upturn in economic activity expected over the coming quarters indicates that it may have reached a ceiling in the short term.*

- *In the medium term, according to the macro-fiscal forecasts produced by AIReF, the projection is for a reduction in the debt-to-GDP ratio of 7.6 points by the year 2024, at which point the debt ratio would stand at 112.4%. The expected rebound in economic activity driven by the Recovery, Transformation Resilience Plan (RTRP), the improvement in the cyclical component of the public balance and the gradual elimination of the emergency measures related to the pandemic serve as the basis for the projected reduction in the debt ratio.*

- *In the absence of a medium-term consolidation plan, the high level of economic growth estimated for the coming years will be the main factor in reducing and stabilising the debt ratio. Meanwhile, the context of low interest rates will help contain the debt ratio, while the substantial primary deficits projected during the period will continue to push in the opposite direction.*

Evolution of Spanish debt

Contraction in GDP, deficit and size of debt of the main Euro area economies (2020).



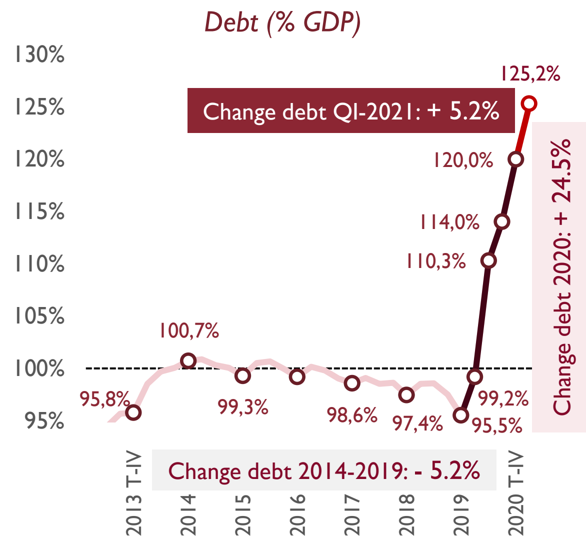
Source: Eurostat

Spain's debt-to-GDP ratio stood at 119.9% in 2020, an increase of 24.4 percentage points on the previous year. The substantial downturn in GDP, the denominator of the ratio, contributed 10.5 points to this increase, while the public deficit added a further 11 points. Furthermore, the reclassification of Sareb debt added €34.12bn to the public debt, accounting for the bulk of the stock-flow adjustment in 2020 (3 points).

In this regard, **Spain was more harshly affected by the pandemic than any other European Union economy**, recording the highest public deficit and greatest GDP contraction in 2020.

Evolution of Spanish debt

In the first quarter of 2021, public debt continued to grow at pace, adding €47.29bn to rise to a total of 1.39 trillion. This meant an increase in the debt ratio of **5.3 points** compared with the close of 2020, reaching a new maximum of **125.2% of GDP**. This significant variation mainly occurred because of the traditional build-up of Treasury bond issues in the early part of the year, and because of a denominator effect (1 point out of the 5.3) because of the downturn in GDP in the first quarter (-0.4% in terms of volume). The expected upturn in economic activity over the coming quarters indicates that a ceiling may have been reached in the short term.

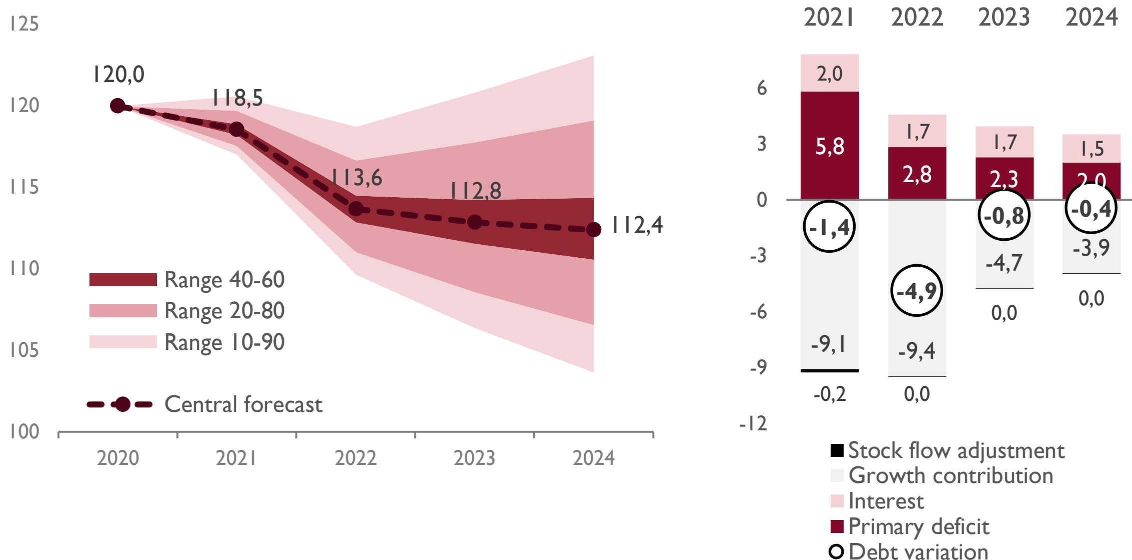


Source: Bank of Spain

Medium-term forecasts

In the medium term, according to the macro-fiscal forecasts produced by AIReF, the projection is for a reduction in the debt-to-GDP ratio of 7.6 points by the year 2024, at which point the debt ratio would stand at 112.4%. The expected rebound in economic activity driven by the RTRP, the improvement in the cyclical component of the public balance and the gradual elimination of the emergency measures related to the pandemic provide the basis for a projected reduction in the debt ratio of between 5.6 and 9.4 points by 2024, within the central band of the stochastic projections[1] by AIReF. This would give a debt-to-GDP ratio within a range of between 110.5 and 114.3%. Most of the debt ratio reduction (6.3 of the 7.6 points) takes place in the first two years, while stabilisation is projected from the third year onwards.

The high level of economic growth estimated over the coming years will be the main factor in reducing and stabilising the debt ratio. The strong rebound in economic activity expected over the next two years will drive the short-term debt ratio reduction. Meanwhile, the context of low interest rates will help contain the debt ratio, while the substantial primary deficits projected during the period will continue to push in the opposite direction.



Source: Government and AIReF

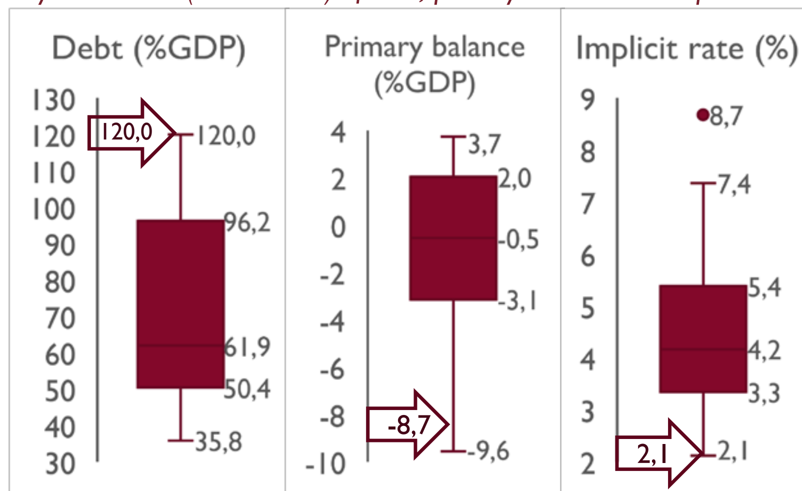
[1] The technique comprises simulating a very high number of debt trajectories, incorporating the shocks observed in the past to determine a probabilistic future distribution grouped around a central pathway by means of the variance-covariance matrix of the shocks of a VAR model. The central band corresponds to a range of 40-60 of these projections.

II. Sustainability and risk analysis

- *The significant increase in the stock of public debt as a legacy of this crisis, combined with the high starting point, place public finance sustainability in a particularly vulnerable position.*
- *The high levels of public debt mean that once the crisis has been overcome, consolidation plans will need to be designed to generate a sustained reduction in the debt ratio to more prudent levels. The expectation of a lasting environment of low interest rates offers greater room for manoeuvre in designing the consolidation strategy, allowing the restoration of budgetary balance to be addressed more gradually, without harming growth.*
- *The maintenance of a structural deficit similar to the level in 2024, in other words between 3.5 and 4.5% of GDP would stabilise the debt ratio at levels of between 110 and 130% of GDP. A gradual and sustained reduction of the public deficit towards structural balance would give rise to a debt ratio reduction path, positioning the ratio at pre-pandemic levels over the course of the next decade.*
- *The current level of interest rates, close to historic minimums, supports debt sustainability. Nonetheless, given the high level of indebtedness, an upturn in interest rates could rapidly lead to a rising dynamic in the ratio, which would need to be offset by additional fiscal cutbacks in order not to become unsustainable.*

The significant increase in the stock of public debt as a legacy of this crisis, combined with the high starting position, place public finance sustainability in a particularly vulnerable position. The previous financial crisis led to an increase of over 65 percentage points in the debt of General Government between 2008 and 2014, leading to a level of 100% of GDP. In the five years prior to the COVID crisis, there was a largely insignificant reduction in this (5 points) despite the favourable tailwinds (sustained growth and a substantial drop in interest rates). The contraction of economic activity and the substantial increase in funding needs caused by the pandemic placed public finance sustainability in a highly vulnerable position, stressing the fiscal variables - both flows (deficit) and stocks (debt) - to maximum levels, within an unbeatable climate for financing.

Frequency distribution (1995-2020) of debt, primary balance and implicit interest rate.



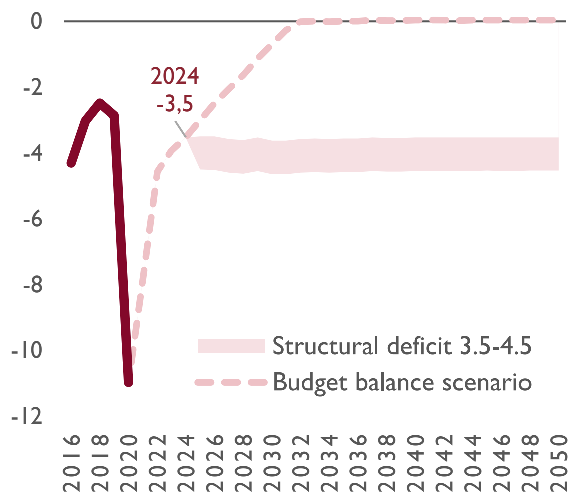
Source: AIReF

Budgetary balance and sustainability in the medium term

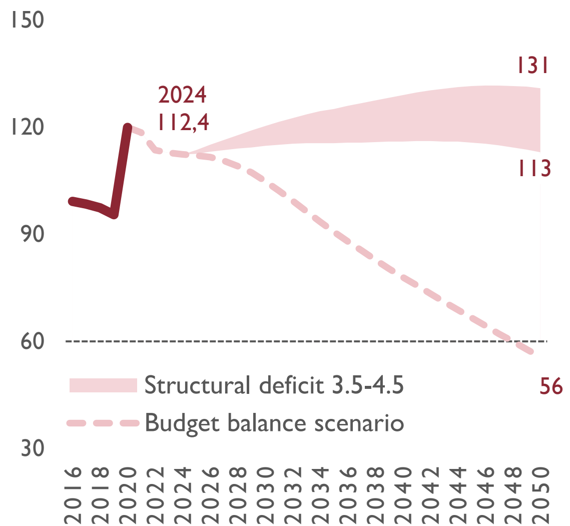
As the simulations conducted by AIReF indicate, the high levels of public debt mean that once the crisis has been overcome, consolidation plans will need to be designed to generate a sustained downward path in the debt ratio to more prudent levels. Beyond the containment and stabilisation of the level of debt generated by the economic recovery once the pandemic is overcome, the financial sustainability of public accounts will need to follow a path reducing the debt ratio to a much more comfortable position. The tailwind of a foreseeable scenario with economic growth higher than the implicit interest rate of the debt will be a necessary condition, but will not in itself be sufficient to generate a downward dynamic in the debt ratio, which will in any event require a correction of the structural imbalances in the public accounts.

Maintaining a structural deficit similar to 2024 in the long term, in other words between 3.5 and 4.5% of GDP, would stabilise the debt ratio at levels significantly above 100% of GDP. A gradual and sustained reduction of the public deficit towards structural balance, as indicated by the fiscal framework in force, will lead to a sharper path reducing the debt ratio, positioning it at pre-pandemic levels over the course of the next decade. Current expectations of a long-lived environment of low interest rates offer greater room for manoeuvre in the design of a medium-term consolidation strategy, and in principle allow the restoration of structural budget balance to be addressed gradually, without harming growth

Scenarios for evolution of structural public deficit (% GDP)



Simulation of debt (% GDP) under structural deficit evolution scenarios

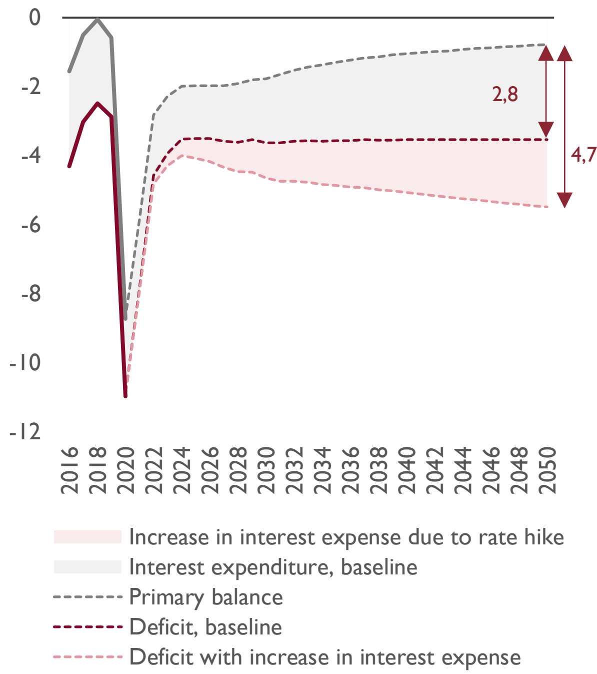


Source: AIReF

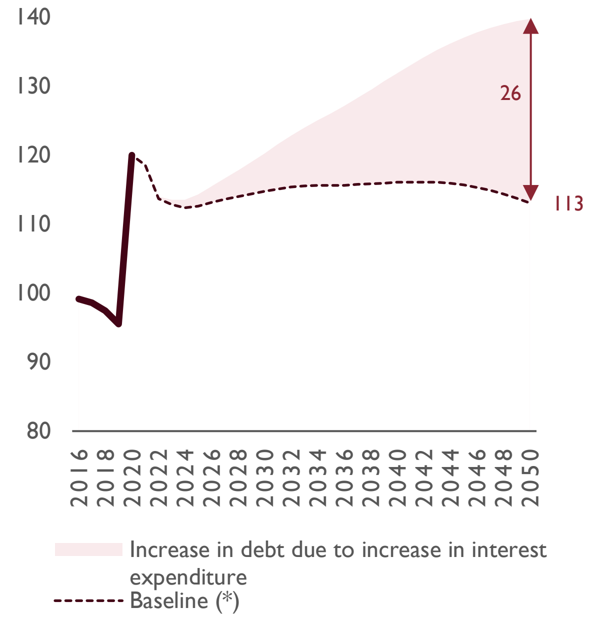
Interest rates and debt dynamic

Dependence on a low interest-rate environment over a long time-frame has become one of the most prominent aspects related to the debt sustainability dynamic. The current level of interest rates close to historical minimums supports debt sustainability, and even allows the debt ratio to stabilise under a certain primary deficit. However, given the high level of indebtedness, **an upturn in interest rates could rapidly lead to a rising dynamic in the ratio**, which would need to be offset by additional fiscal cutbacks **in order not to become unsustainable**. An upturn of 100 b.p. in interest rate expectations over the course of 2021 would thus entail an increase in the financial burden of 1 point of GDP in 2030, 1.5 in 2040, and almost 2 points in 2050, placing the items corresponding to interest costs at 2.9%, 4% and 4.7% of GDP, respectively. This would result in a 6-point increase in the debt ratio by 2030, 16 points by 2040, and 26 by 2050.

Primary balance and deficit scenarios associated with the evolution of interest rates (+100 b.p.)



Debt simulation (% GDP) according to interest cost evolution scenarios



(*) The baseline scenario is built under the assumption of maintaining a long-term deficit similar to that projected for 2024, that is, 3.5%. The deficit resulting from the scenario with a higher interest expenditure calculated on the assumption of a 100 bp rise in future expectations of all sections of the curve is then added.

Source: AIReF

III. Projection of debt and sustainability in the Regions

- *The macro-fiscal forecasts generated by AIReF project a cumulative reduction in the regional debt ratio of 1.6 points of GDP by 2021, placing the sub-sector ratio at 25.5% in said year.*
- *The high level of economic growth estimated over the coming years will be the main factor in reducing and stabilising the regional debt ratio. Meanwhile, the forecast is for a substantial worsening of the regional balance in 2022, which would result in a greater need for financing than before the crisis.*
- *Macro-fiscal forecasts at a regional level indicate an unequal reduction in the debt ratio across the different Autonomous Regions. Valencia, the Balearic Islands and Murcia are the regions that would see the greatest increase in their debt in 2021 compared with 2019, rising from prior levels that were themselves high.*
- *The forecast for the coming years is that both the Basque Country and the Canary Islands would be at the reference level of 13%, while Madrid and Navarre would have values close to this level. With a debt ratio of nearly 50% of its GDP, Valencia would be the most vulnerable region of all.*
- *Containment and stabilisation of the regional debt ratio will demand convergence with a balanced budget in the future, although the adjustment path must be appropriate so as not to compromise growth in the short and long term.*
- *Under a primary deficit correction scenario, the level of debt registered at the end of 2019 (23.7%) would again be restored by the end of the decade.*
- *In contrast with the scenarios projected by AIReF prior to the crisis, where the 13% reference limit would have been obtained by around 2035, this limit is not projected to be reached before 2044, even if a slight budgetary surplus is maintained for the sub-sector as a whole.*

The increase in the stock of public debt as a legacy of the COVID-19 crisis, combined with the high starting point and the foreseeable worsening of the fiscal balance over the coming years, place the financial sustainability of the Autonomous Regions as an overall sub-sector in a more vulnerable position. As a consequence of the previous financial crisis, the debt-to-GDP ratio rose by over 19 points from the minimum attained in 2007, stabilising at levels around 24 per cent in the years prior to the outbreak of the pandemic. The evolution of GDP and the fiscal balance linked to the health crisis project a slight increase in the ratio in the coming years, delaying the process of deleveraging and increasing the public finance sustainability risk.

AIReF estimates that in accordance with their real financing needs, the Autonomous Regions sub-sector could slightly reduce its level of debt to GDP to 25.5% by the end of 2021[2]. Starting off from a debt-to-GDP ratio in the Autonomous Regions sub-sector of 27.1% at the close of 2020, this indicator could improve slightly, driven by growth in GDP, which would offset the expected fiscal deterioration.

[2] AIReF makes its debt forecasts by taking into account real financing needs and assuming the fulfilment of AIReF recommendations in terms of the offsetting of excess finance and the application of surpluses.

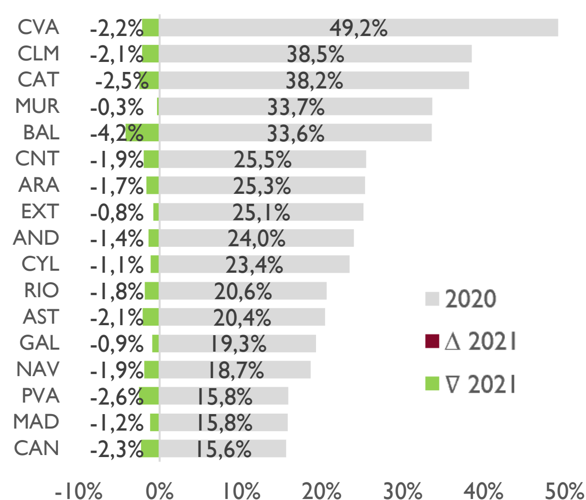
The main factor explaining this debt reduction will be the strong expected growth in GDP, as the estimation of fiscal deterioration is maintained for the sub-sector as a whole. The GDP growth estimation is established as the lever driving the reduction in the debt-to-GDP ratio, contributing a reduction of 2 points of the level of debt which will offset the fiscal deterioration, the impact of which is estimated as an increase of 0.65 in the ratio.

The situation could worsen in 2022. Although the expected growth in 2022 will serve to attenuate the growth in the debt-to-GDP ratio, the possible deterioration of the balance in 2022 will lead to a delay in the process of reducing levels of debt.

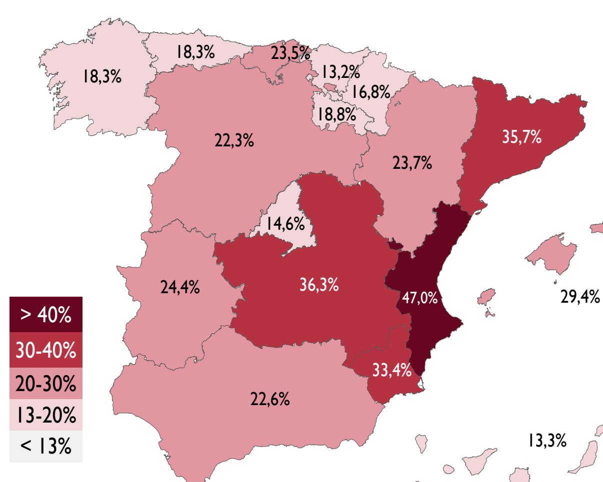
The increase in the debt ratio will be unequal across the different Autonomous Regions. Valencia, the Balearic Islands and Murcia would see the greatest increase in their debt in 2021 compared with 2019, rising from prior levels that were themselves high. In 2021, no region will fulfil the 13% reference limit, with the Canary Islands, Madrid and the Basque Country being the regions that would be closest to the legal reference rate.

The ratio of debt to current revenue will maintain the positive trend seen in 2020 as a consequence of the extraordinary transfers likewise approved for 2021. The ratio of debt to revenue will again register an improvement in 2021, influenced by the additional resources transferred to the Autonomous Regions from the State. This is nonetheless seen as a short-term improvement associated with support mechanisms structured by the State, which does not reflect a structural improvement in the payment capacity of the regions.

Ratio of debt to regional GDP, 2020, and variation in 2021



Ratio of debt to regional GDP, 2021



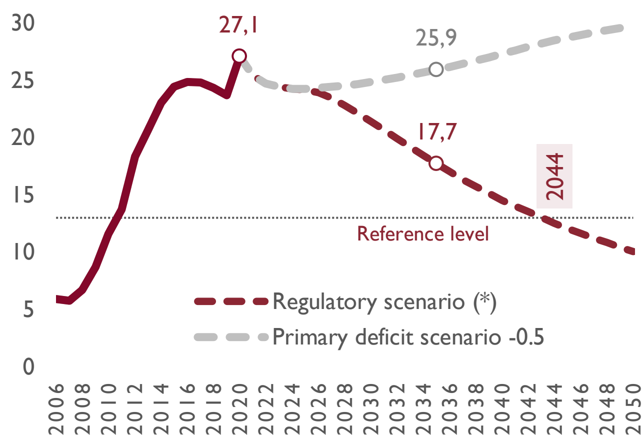
Source: Bank of Spain and AIReF

Containment and stabilisation of the regional debt ratio will demand convergence with a balanced budget in the future, although the adjustment path must be appropriate so as not to compromise growth in the short and long term.

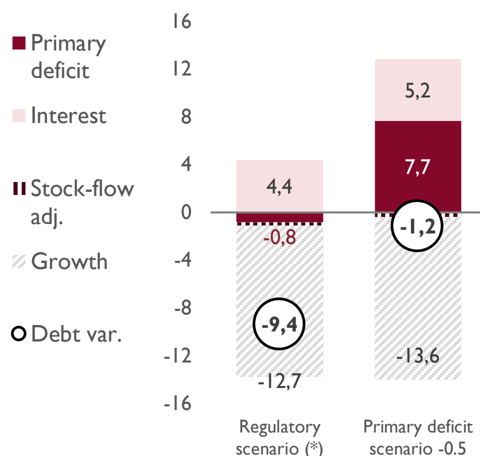
Under the assumptions of a regulatory scenario[3], where a worsening is projected for the primary balance for 2022, with a correction of the balance from said year onwards, the calculated reduction in the debt ratio is 9.4 points of GDP over the next 15 years, attaining the pre-pandemic level towards the end of the decade. Under an alternative scenario maintaining a constant primary deficit (of 0.5% of GDP) from 2024 onwards, the debt ratio reveals a stabilised profile, with the ratio declining by 1.2 points over this period. On both scenarios, economic growth will be a decisive factor in reducing the ratio, although it is clear that a reduction in regional debt demands convergence with a balanced budget in the medium term.

[3] The regulatory scenario entails an annual improvement in the primary balance of each Autonomous Region of 0.25% of GDP, until a surplus of 0.75% is achieved, to be maintained while the debt ratio remains above the level of 13% of GDP. Once this limit is attained, the primary surplus will be equal to the financial burden, projecting a sustained balanced budget scenario.

Debt projections (% GDP) of and year of attainment of the 13% reference level



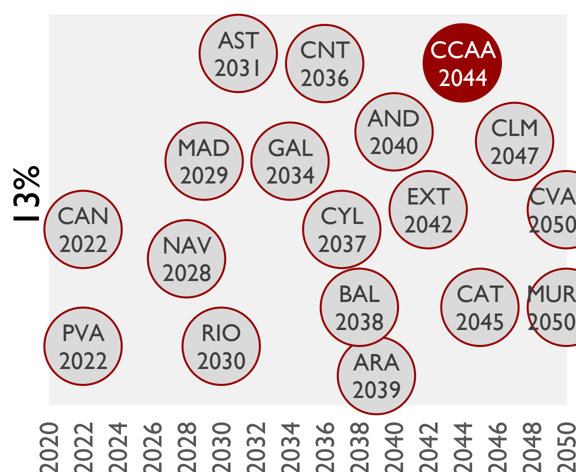
Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



13% reference limit

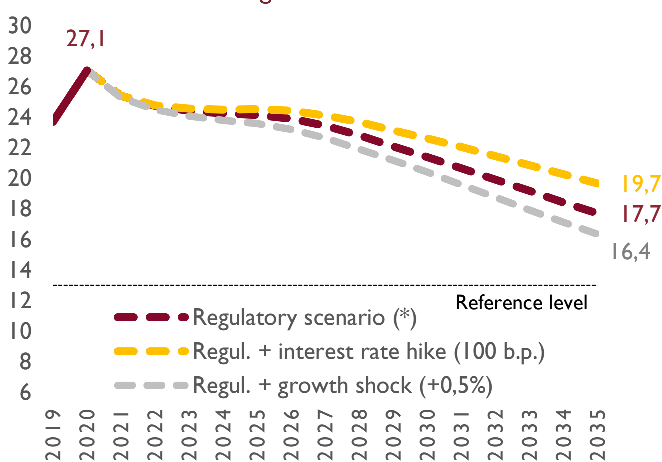
Under a regulatory scenario, the projection is that the 13% reference limit will take more than two decades to attain. In contrast with the scenarios projected by AIReF prior to the crisis, where the 13% level would have been attained around 2035, this limit is not projected to be attained before 2044, even if a balanced budget is maintained for the sub-sector as a whole. At the individual level, the forecast is that both the Basque Country and the Canary Islands will lie below the 13% reference level over the coming years, while Madrid and Navarre would have figures close to but slightly above this level. With a debt ratio of nearly 50% of its GDP, Valencia stands out as the most vulnerable of all the regions.

Year of attainment of the 13% reference under the regulatory scenario

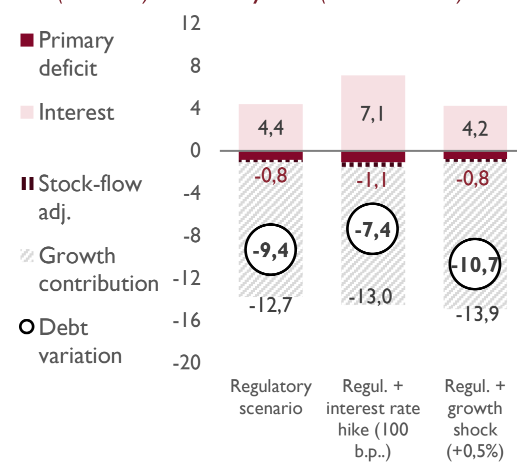


A sensitivity analysis indicates that an interest rate increase of 100 b.p. would entail a cumulative increase in the financial burden of almost 3 points over the next 15 years. Meanwhile, a scenario entailing greater potential economic growth of 0.5% p.p. would contribute to a debt ratio reduction of an additional 1.3 points over the same period.

Debt projections (% GDP) and sensitivity to rate rises and growth shock



Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)

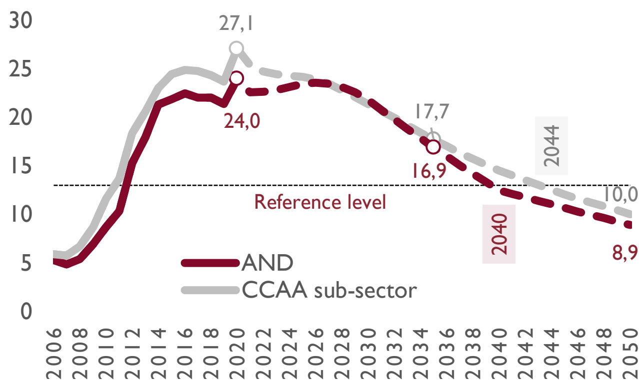


ANDALUSIA

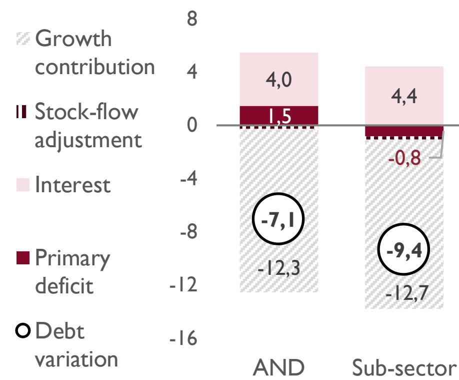
The increase in the stock of public debt as a legacy of the COVID-19 crisis, combined with the high starting point and the foreseeable worsening of the fiscal balance over the coming years, place the financial sustainability of Andalusia in a more vulnerable position. As a consequence of the previous financial crisis, the debt-to-GDP ratio rose by more than 17 points from the minimum attained in 2007, stabilising at levels slightly above 20 per cent in the years prior to the outbreak of the pandemic. The evolution of GDP and the fiscal balance linked to the health crisis project a further increase in the ratio in the coming years, increasing the public finance sustainability risk.

Under the suppositions of a regulatory scenario[4], where a worsening is projected for the primary balance for 2022, with a correction of the balance from said year onwards, the calculated reduction in the debt ratio is 7.1 points of GDP over the next 15 years, attaining the pre-pandemic level in the year 2031. Under the same suppositions, the reduction for the sub-sector as a whole is calculated as 9.4 points. In both cases, economic growth and the lower financial burden will be decisive factors in reducing the debt.

Debt projections (% GDP) on the regulatory scenario and year of attainment of the 13% reference level



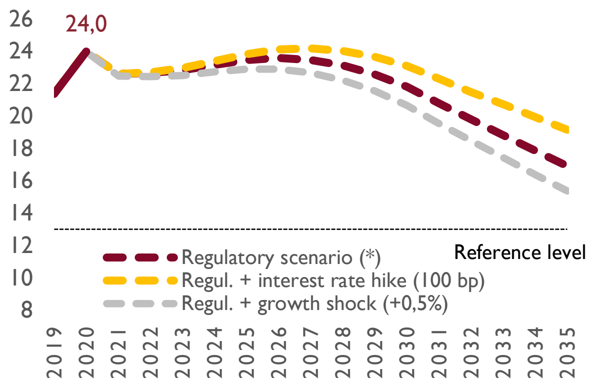
Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



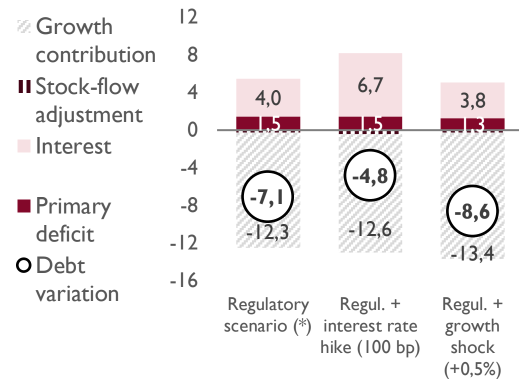
Under a regulatory scenario, the projection is that the 13% reference limit will take two decades to attain. In contrast with the scenarios projected by AIReF prior to the crisis, where the 13% level would have been attained around the year 2028, this limit is not projected to be attained before 2040 even if a slight budget surplus is maintained, while for the sub-sector as a whole the level would be attained in 2044.

A sensitivity analysis indicates that an interest rate increase of 100 b.p. would entail a cumulative increase in the financial burden of 2.7 points over 15 years. Meanwhile, a scenario entailing greater potential economic growth of 0.5% p.p. would contribute to a debt ratio reduction of an additional 1.5 points over the same period.

Debt projections (% GDP) and sensitivity to rate rises and growth shock



Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



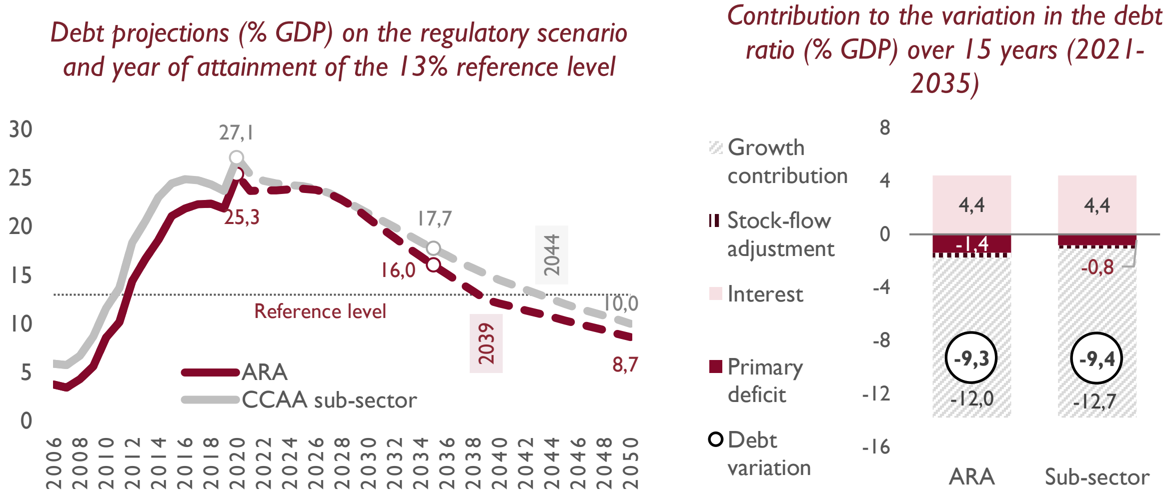
The rating agencies maintain the long-term debt within the investment-grade category at the lower medium level: - Baa2 (Moody's), BBB+ (S&P) and BBB- (Fitch).

[4] The regulatory scenario entails an annual improvement in the primary balance of 0.25 points of GDP until a surplus of 0.75% is attained, and this will be maintained for as long as the debt ratio remains above the level of 13% of GDP. Once this limit is attained, the primary surplus will be equal to the financial burden, projecting a sustained balanced-budget scenario.

ARAGON

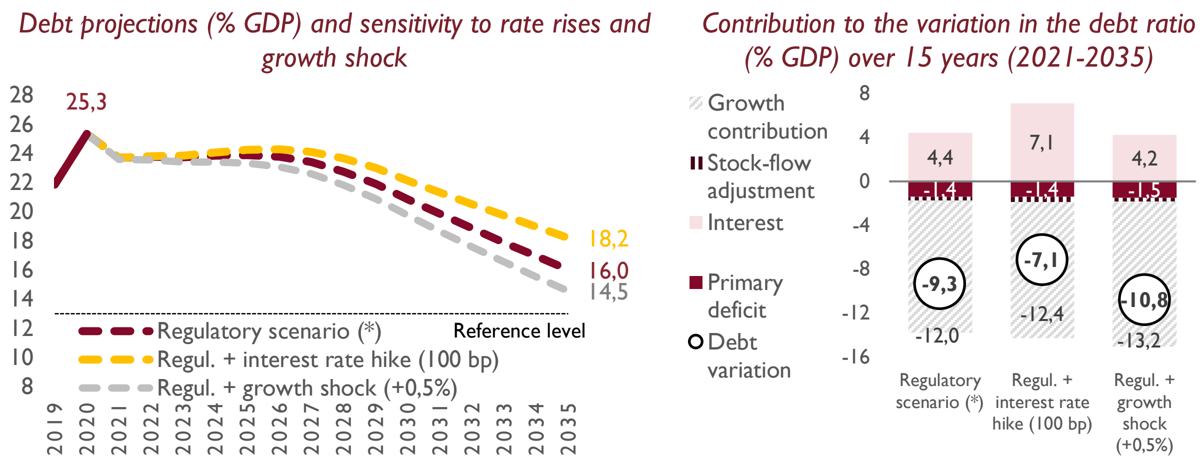
The increase in the stock of public debt as a legacy of the COVID-19 crisis, combined with the high starting point and the foreseeable worsening of the fiscal balance over the coming years, place the financial sustainability of Aragon in a more vulnerable position. As a consequence of the previous financial crisis, the debt-to-GDP ratio rose by more than 18 points from the minimum attained in 2007, stabilising at levels slightly above 20 per cent in the years prior to the outbreak of the pandemic. The evolution of GDP and the fiscal balance linked to the health crisis project a further increase in the ratio in the coming years, increasing the public finance sustainability risk.

Under the suppositions of a regulatory scenario[5], where a worsening is projected for the primary balance for 2022, with a correction of the balance from said year onwards, the calculated reduction in the debt ratio is 9.3 points of GDP over the next 15 years, attaining the pre-pandemic level in the year 2030. Under the same suppositions, the reduction for the sub-sector as a whole is calculated as 9.4 points. In both cases, economic growth and the lower financial burden will be decisive factors in reducing the debt.



Under the regulatory scenario, the projection is that it will take almost two decades to attain the reference limit of 13%. In contrast with the scenarios projected by AIReF prior to the crisis, where the 13% level would have been attained around the year 2030, this limit is not projected to be attained before 2039 even if a slight budget surplus is maintained, while for the sub-sector as a whole the level would be attained in 2044.

A sensitivity analysis indicates that an interest rate increase of 100 b.p. would entail a cumulative increase in the financial burden of 2.7 points over 15 years. Meanwhile, a scenario entailing greater potential economic growth of 0.5% p.p. would contribute to a debt ratio reduction of an additional 1.5 points over the same period.



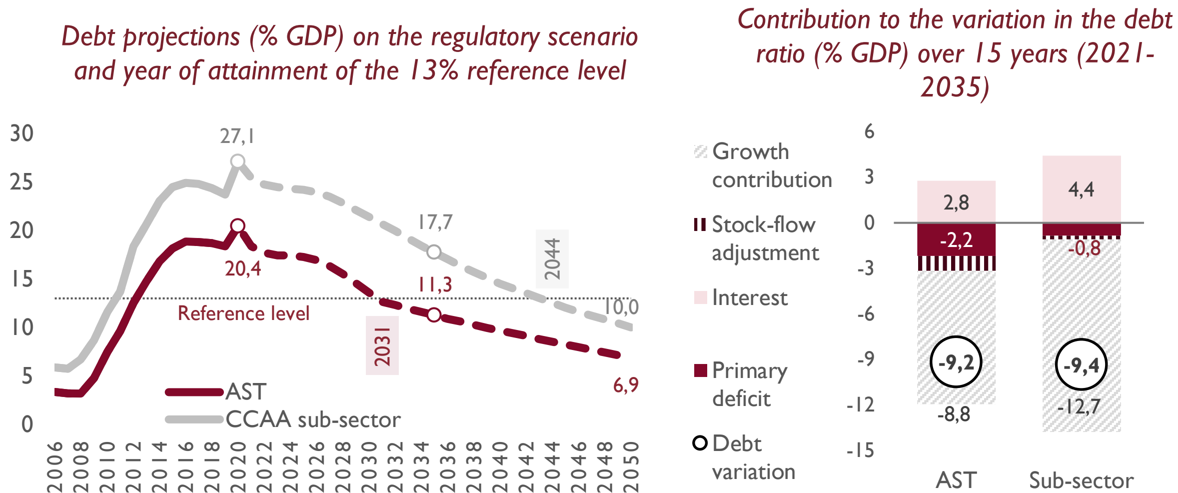
The ratings agency S&P maintains the long-term debt within the investment-grade category (BBB+).

[5] The regulatory scenario entails an annual improvement in the primary balance of 0.25% of GDP, until a surplus of 0.75% is achieved, to be maintained while the debt ratio remains above the level of 13% of GDP. Once this limit is attained, the primary surplus will be equal to the financial burden, projecting a sustained balanced-budget scenario.

ASTURIAS

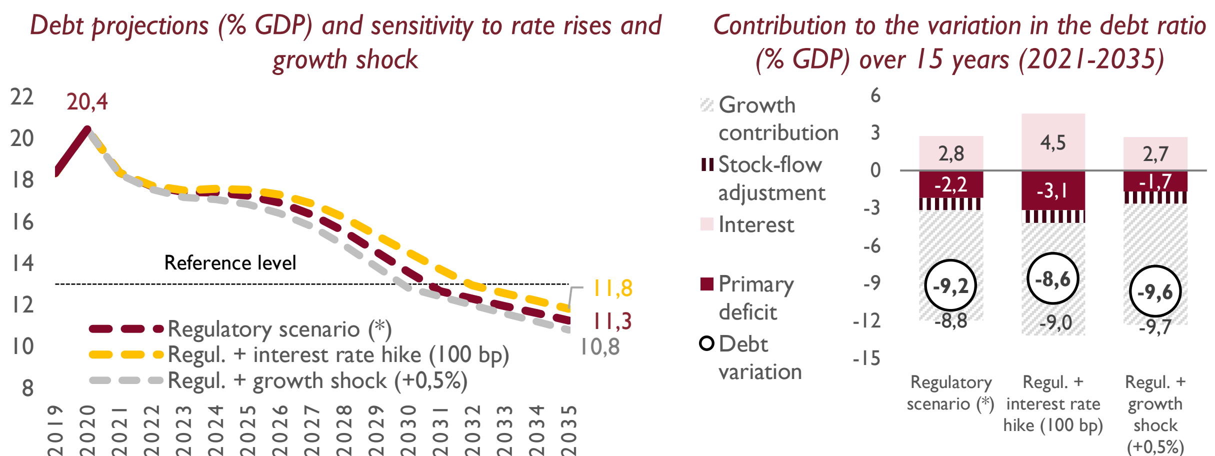
The increase in the stock of public debt is a legacy of the COVID-19 crisis, combined with the high starting level and foreseeable deterioration in the fiscal balance over the coming years, increase the financial sustainability risk of Asturias. As a consequence of the previous financial crisis, the debt-to-GDP ratio rose by more than 15 points from the minimum attained in 2007, stabilising at levels around 18 per cent in the years prior to the outbreak of the pandemic. The evolution of GDP and the fiscal balance linked to the health crisis project a stabilisation of the ratio in the coming years, delaying the process of deleveraging and thus increasing the public finance sustainability risk.

Under the assumptions of a regulatory scenario[6], where a worsening is projected for the primary balance for 2022, with a correction of the balance from said year onwards, the calculated reduction in the debt ratio is 9.2 points of GDP over the next 15 years, attaining the pre-pandemic level in the year 2022. Under the same suppositions, the reduction for the sub-sector as a whole is calculated as 9.4 points. In both cases, economic growth and the lower financial burden will be decisive factors in reducing the debt.



Under the regulatory scenario, the projection is that it will take a decade to attain the 13% reference level. In contrast with the scenarios projected by AIReF prior to the crisis, where the 13% level would have been attained around the year 2026, this limit is not projected to be attained before 2031, while for the sub-sector as a whole the level would be attained in 2044.

A sensitivity analysis indicates that an interest rate increase of 100 b.p. would entail a cumulative increase in the financial burden of 1.7 points over 15 years. Meanwhile, a scenario entailing greater potential economic growth of 0.5% p.p. would help to bring forward attainment of the reference limit of 13% by one year.



The ratings agency Moody's maintains the long-term debt within the investment-grade category (Baa1).

---

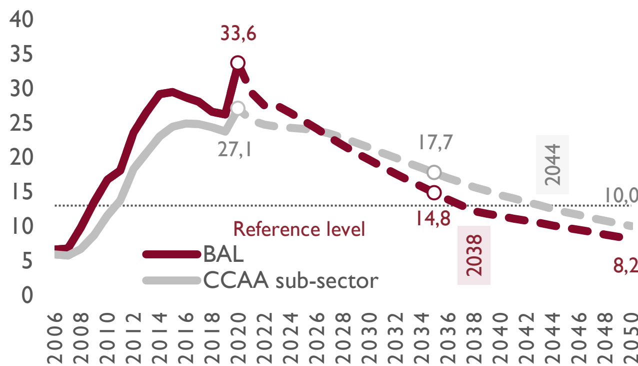
[6] The regulatory scenario entails an annual improvement in the primary balance of 0.25% of GDP, until a surplus of 0.75% is achieved, to be maintained while the debt ratio remains above the level of 13% of GDP. Once this limit is attained, the primary surplus will be equal to the financial burden, projecting a sustained balanced-budget scenario.

BALEARIC ISLANDS

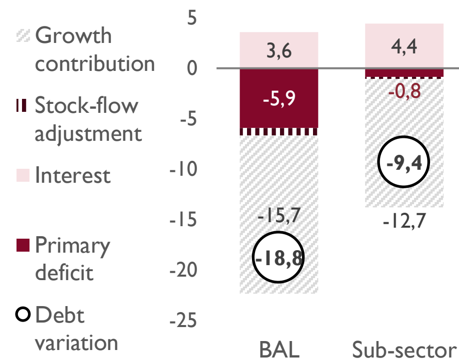
The increase in the stock of public debt as a legacy of the COVID-19 crisis, combined with the high starting point and the foreseeable worsening of the fiscal balance over the coming years, place the financial sustainability of Balearic Islands in a more vulnerable position. As a consequence of the previous financial crisis, the debt-to-GDP ratio increased by more than 23 points after 2007, although in the years prior to the outbreak of the pandemic the ratio had begun a downward path. The evolution of GDP and the fiscal balance linked to the health crisis project a slight increase in the ratio in the coming years, delaying the process of deleveraging and increasing the public finance sustainability risk.

Under the suppositions of a regulatory scenario[7], where a worsening is projected for the primary balance for 2022, with a correction of the balance from said year onwards, the calculated reduction in the debt ratio is 18.8 points of GDP over the next 15 years, attaining the pre-pandemic level in the year 2025. Under the same suppositions, the reduction for the sub-sector as a whole is calculated as 9.4 points. In both cases, economic growth as well as the reduced financial burden will be decisive factors in bringing the debt down, in addition to the contribution of primary surpluses in the case of the Balearic Islands.

Debt projections (% GDP) on the regulatory scenario and year of attainment of the 13% reference level



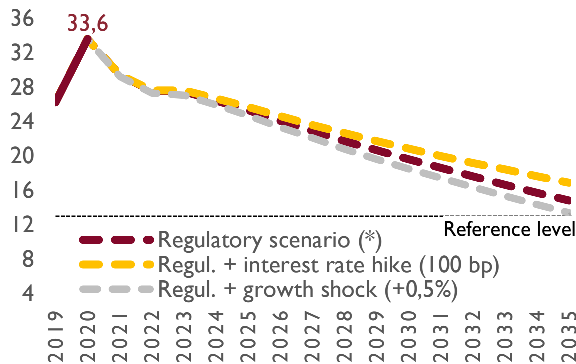
Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



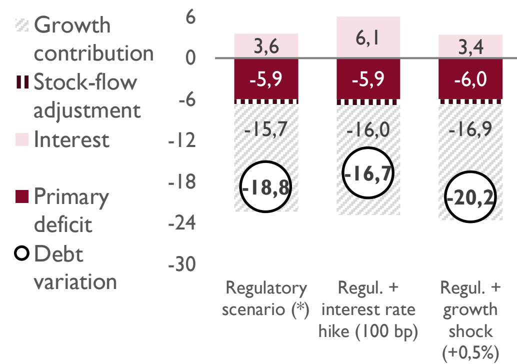
Under the regulatory scenario, the projection is that it will take almost two decades to attain the reference limit of 13%. In contrast with the scenarios projected by AIReF prior to the crisis, where the 13% level would have been attained around the year 2033, this limit is not projected to be attained before 2038, while for the sub-sector as a whole the level would be attained in 2044.

A sensitivity analysis indicates that an interest rate increase of 100 b.p. would entail a cumulative increase in the financial burden of 2.5 points over 15 years. Meanwhile, a scenario entailing greater potential economic growth of 0.5% p.p. would contribute to a debt ratio reduction of an additional 1.4 points over the same period.

Debt projections (% GDP) and sensitivity to rate rises and growth shock



Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)

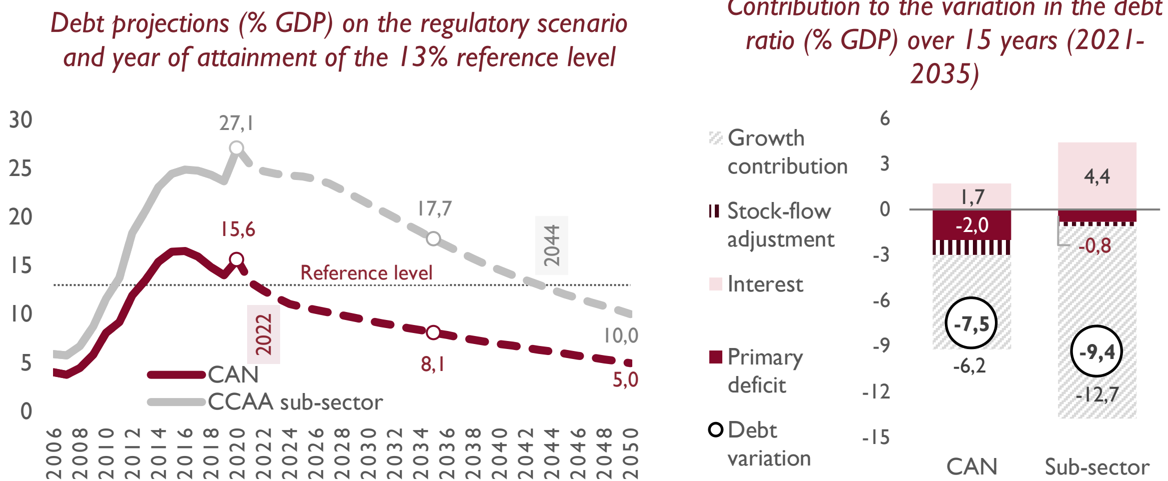


The ratings agency S&P maintains the long-term debt within the investment-grade category (BBB +) at the lower-medium level.

[7] The regulatory scenario entails an annual improvement in the primary balance of 0.25% of GDP, until a surplus of 0.75% is achieved, to be maintained while the debt ratio remains above the level of 13% of GDP. Once this limit is attained, the primary surplus will be equal to the financial burden, projecting a sustained balanced-budget scenario.

The increase in the public debt ratio together with the deterioration of the fiscal balance as a legacy of the COVID-19 crisis will delay the process of deleveraging in the Canary Islands. As a consequence of the previous financial crisis the debt-to-GDP ratio rose by over 12 points from 2007, up to the maximum attained in 2016. In 2017, the ratio began on a downward path, which the evolution of GDP and the fiscal balance linked to the health crisis halted, delaying the process of deleveraging and thus increasing the public finance sustainability risk.

Under the suppositions of a regulatory scenario[8], projecting a deterioration in the primary balance for 2022 and a correction in the balance from that year onwards, the calculated reduction in the debt ratio is 7.5 points of GDP over the next 15 years, attaining figures similar to the pre-pandemic level as early as 2021, and attaining the 13% reference level in 2022. Under the same suppositions, the reduction for the sub-sector as a whole is calculated as 9.4 points. In both cases, economic growth and the lower financial burden will be decisive factors in reducing the debt.



The ratings agencies S&P and Fitch maintain the long-term debt in the investment-grade category with ratings of A and BBB- respectively, although the latter revised the rating two notches downwards last September (from 'BBB+'), bringing the Canary Islands in line with the other Spanish Autonomous Regions which it rates.

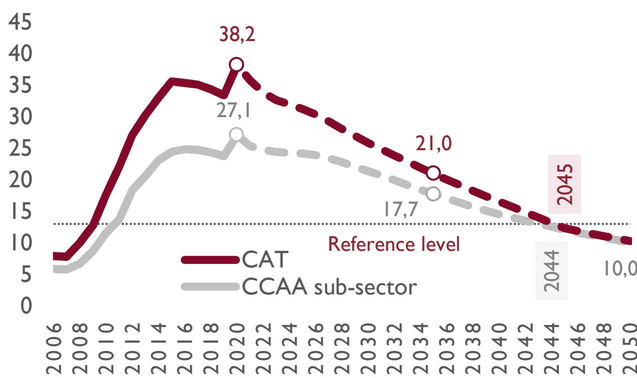
[8] The regulatory scenario entails an annual improvement in the primary balance of 0.25% of GDP, until a surplus of 0.75% is achieved, to be maintained while the debt ratio remains above the level of 13% of GDP. Once this limit is attained, the primary surplus will be equal to the financial burden, projecting a sustained balanced-budget scenario.

CATALONIA

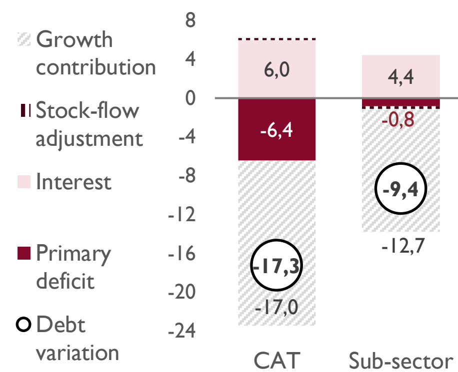
The increase in the stock of public debt as a legacy of the COVID-19 crisis, combined with the high starting point and the foreseeable worsening of the fiscal balance over the coming years, place the financial sustainability of Catalonia in a more vulnerable position. As a consequence of the previous financial crisis, the debt-to-GDP ratio rose by more than 27 points from the minimum attained in 2007, stabilising at levels slightly above 33 per cent in the years prior to the outbreak of the pandemic. The evolution of GDP and the fiscal balance linked to the health crisis project a slight increase in the ratio in the coming years, delaying the process of deleveraging and increasing the public finance sustainability risk.

Under the suppositions of a regulatory scenario[9], where a worsening is projected for the primary balance for 2022, with a correction of the balance from said year onwards, the calculated reduction in the debt ratio is 17.3 points of GDP over the next 15 years, attaining the pre-pandemic level in the year 2023. Under the same suppositions, the reduction for the sub-sector as a whole is calculated as 9.4 points. In both cases, economic growth will be the decisive factor in reducing the debt, while in the case of Catalonia primary surpluses will also make a contribution.

Debt projections (% GDP) on the regulatory scenario and year of attainment of the 13% reference level



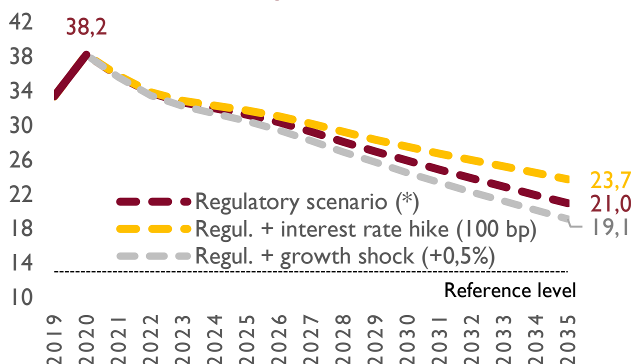
Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



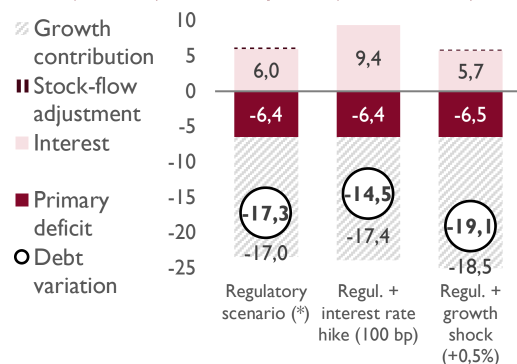
Under a regulatory scenario, the projection is that the 13% reference limit will take more than two decades to attain. In contrast with the scenarios projected by AIReF prior to the crisis, where the 13% level would have been attained around the year 2038, this limit is not projected to be attained before 2045 even if a slight budget surplus is maintained, while for the sub-sector as a whole the level would be attained in 2044.

A sensitivity analysis indicates that an interest rate increase of 100 b.p. would entail a cumulative increase in the financial burden of 3.4 points over 15 years. Meanwhile, a scenario entailing greater potential economic growth of 0.5% p.p. would contribute to a debt ratio reduction of almost 2 additional points over the same period.

Debt projections (% GDP) and sensitivity to rate rises and growth shock



Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



Last March, the ratings agency Moody's adjusted the long-term debt rating upwards from Ba3 to Ba2, while Fitch maintained its rating of BB. In both cases the long-term debt lies within the speculative grade category.

---

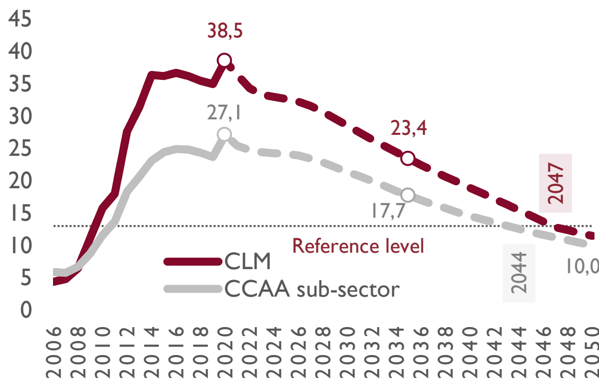
[9] The regulatory scenario entails an annual improvement in the primary balance of 0.25% of GDP, until a surplus of 0.75% is achieved, to be maintained while the debt ratio remains above the level of 13% of GDP. Once this limit is attained, the primary surplus will be equal to the financial burden, projecting a sustained balanced-budget scenario.

CASTILE-LA MANCHA

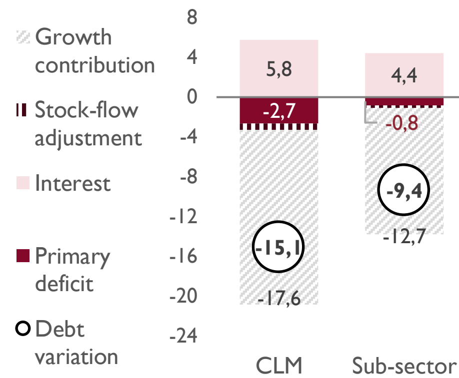
The increase in the stock of public debt as a legacy of the COVID-19 crisis, combined with the high starting point and the foreseeable worsening of the fiscal balance over the coming years, place the financial sustainability of Castile-La Mancha in a more vulnerable position. As a consequence of the previous financial crisis, the debt-to-GDP ratio rose 32 points from 2007, stabilising at values slightly above 35% in the years prior to the outbreak of the pandemic. The evolution of GDP and the fiscal balance linked to the health crisis project a slight increase in the ratio in the coming years, delaying the process of deleveraging and increasing the public finance sustainability risk.

Under the suppositions of a regulatory scenario[10], where a worsening is projected for the primary balance for 2022, with a correction of the balance from said year onwards, the calculated reduction in the debt ratio is 15.1 points of GDP over the next 15 years, attaining the pre-pandemic level in the year 2022. Under the same suppositions, the reduction for the sub-sector as a whole is calculated as 9.4 points. In both cases economic growth will be the decisive factor in reducing the debt.

Debt projections (% GDP) on the regulatory scenario and year of attainment of the 13% reference level



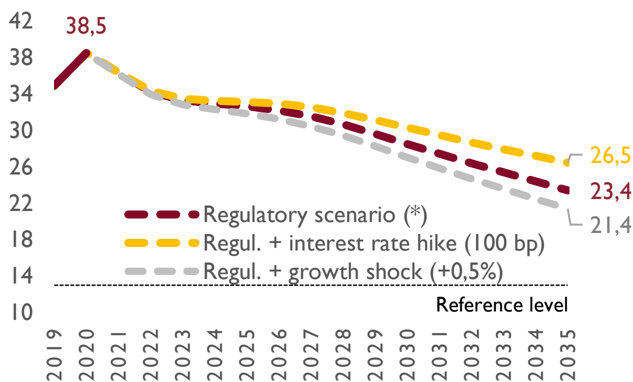
Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



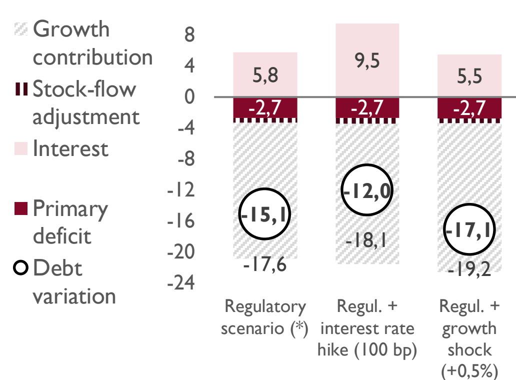
Under the regulatory scenario, the projection is that it will take almost three decades to attain the reference limit of 13%. In contrast with the scenarios projected by AIReF prior to the crisis, where the 13% level would have been attained around the year 2042, this limit is not projected to be attained before 2047 even if a slight budget surplus is maintained, while for the sub-sector as a whole the level would be attained in 2044.

A sensitivity analysis indicates that an interest rate increase of 100 b.p. would entail a cumulative increase in the financial burden of 3.7 points over 15 years. In contrast, a scenario entailing greater potential economic growth of 0.5% p.p. would contribute to a debt ratio reduction of an additional 2 points over the same period.

Debt projections (% GDP) and sensitivity to rate rises and growth shock



Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



The rating agency Moody's maintains long-term debt within the speculative-grade category (Ba1), while Fitch considers it to be investment grade (BBB-), although at the lower limit.

---

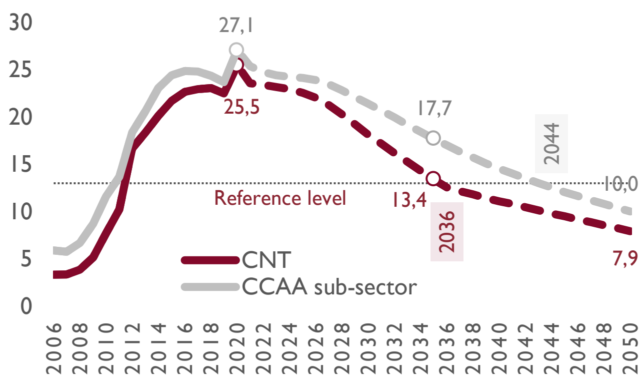
[10] The regulatory scenario entails an annual improvement in the primary balance of 0.25% of GDP, until a surplus of 0.75% is achieved, to be maintained while the debt ratio remains above the level of 13% of GDP. Once this limit is attained, the primary surplus will be equal to the financial burden, projecting a sustained balanced-budget scenario.

CANTABRIA

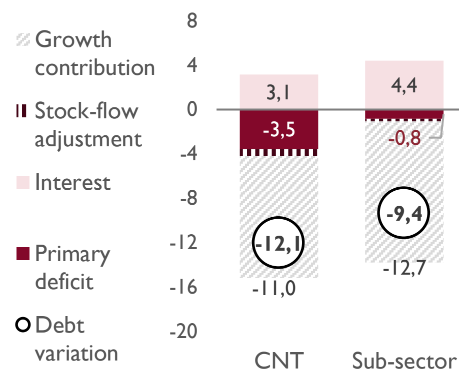
The increase in the stock of public debt as a legacy of the COVID-19 crisis, combined with the high starting point and the foreseeable worsening of the fiscal balance over the coming years, place the financial sustainability of Cantabria in a more vulnerable position. As a consequence of the previous financial crisis, the debt-to-GDP ratio rose by almost 20 points from the minimum attained in 2007, stabilising at levels around 22 per cent in the years prior to the outbreak of the pandemic. The evolution of GDP and the fiscal balance linked to the health crisis project a slight increase in the ratio in the coming years, delaying the process of deleveraging and increasing the public finance sustainability risk.

Under the suppositions of a regulatory scenario[11], where a worsening is projected for the primary balance for 2022, with a correction of the balance from said year onwards, the calculated reduction in the debt ratio is 12.1 points of GDP over the next 15 years, attaining the pre-pandemic level in the year 2026. Under the same suppositions, the reduction for the sub-sector as a whole is calculated as 9.4 points. In both cases, economic growth as well as the reduced financial burden will be decisive factors in bringing the debt down, in addition to the contribution of primary surpluses in the case of Cantabria.

Debt projections (% GDP) on the regulatory scenario and year of attainment of the 13% reference level



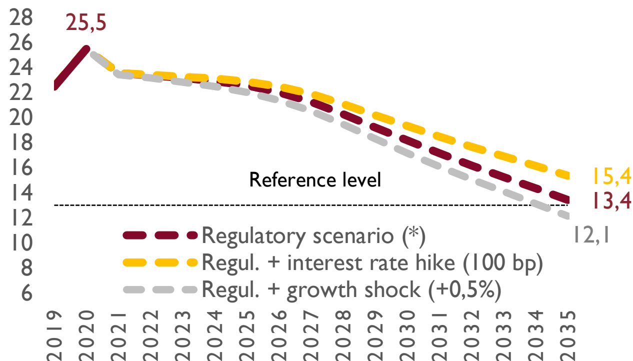
Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



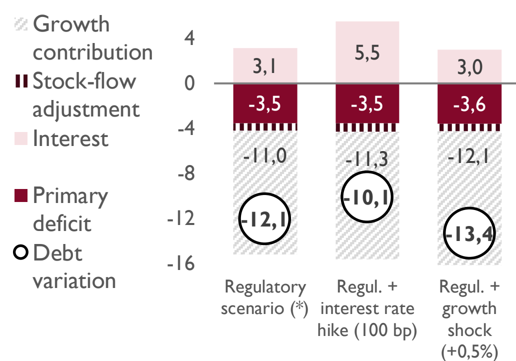
Under the regulatory scenario, the projection is that the 13% reference limit will take around 15 years to attain. In contrast with the scenarios projected by AIReF prior to the crisis, where the 13% level would have been attained around the year 2030, this limit is not projected to be attained before 2036 even if a slight budget surplus is maintained, while for the sub-sector as a whole the level would be attained in 2044.

A sensitivity analysis indicates that an interest rate increase of 100 b.p. would entail a cumulative increase in the financial burden of 2.4 points over 15 years. Meanwhile, a scenario entailing greater potential economic growth of 0.5% p.p. would help attain the 13% reference limit one year earlier, in other words in 2035.

Debt projections (% GDP) and sensitivity to rate rises and growth shock



Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



The ratings agency Fitch has since May 2020 maintained the long-term debt within the lower-medium level of investment grade, with a rating of 'BBB-'.

---

[11] The regulatory scenario entails an annual improvement in the primary balance of 0.25% of GDP, until a surplus of 0.75% is achieved, to be maintained while the debt ratio remains above the level of 13% of GDP. Once this limit is attained, the primary surplus will be equal to the financial burden, projecting a sustained balanced-budget scenario.

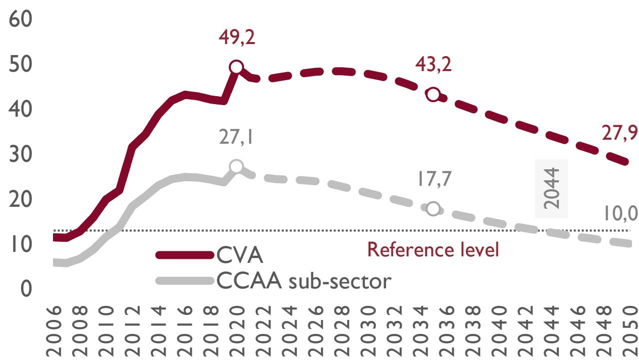
VALENCIA

The increase in the stock of public debt as a legacy of the COVID-19 crisis, combined with the high starting point and the foreseeable worsening of the fiscal balance over the coming years, place the financial sustainability of Valencia in a more vulnerable position. As a consequence of the previous financial crisis, the debt ratio of Valencia grew more than any other Autonomous Region, rising by 31 points since 2007 and stabilising at values slightly above 42 per cent in the years prior to the outbreak of the pandemic. The evolution of GDP and the fiscal balance linked to the health crisis project a slight increase in the ratio in the coming years, delaying the process of deleveraging and increasing the public finance sustainability risk.

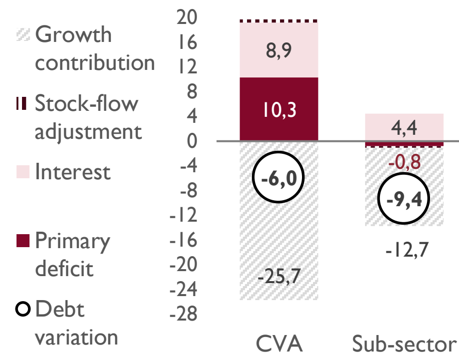
Under the suppositions of a regulatory scenario[12], where a worsening is projected for the primary balance for 2022, with a correction of the balance from said year onwards, the calculated reduction in the debt ratio is 6 points of GDP over the next 15 years, attaining the pre-pandemic level in the year 2037. Under the same suppositions, the reduction for the sub-sector as a whole is calculated as 9.4 points. In both cases, economic growth will be the decisive factor in reducing the debt, although in the case of Valencia Region will be particularly significant given the high level of the ratio. Furthermore, the projected deficits for the period in this autonomous region will act as a drag on any sharper reduction in the level of debt.

Under a regulatory scenario, the projection is that the 13% reference limit will not be attained before midway through the century. As on the scenarios projected by AIReF prior to the crisis, the level of 13% will still not be attained before 2050, even with a slight budget surplus being maintained, while for the sub-sector as a whole this level would be attained in 2044.

Debt projections (% GDP) on the regulatory scenario and year of attainment of the 13% reference level

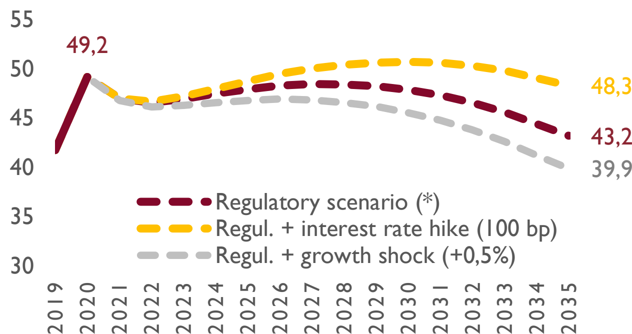


Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)

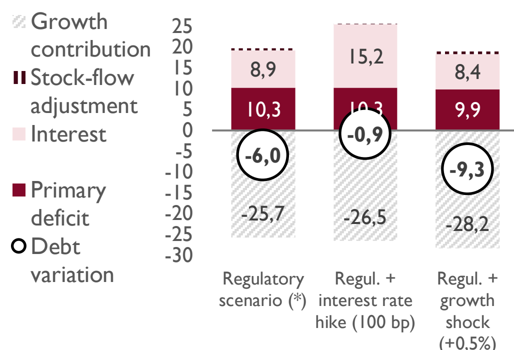


A sensitivity analysis indicates that an interest rate increase of 100 b.p. would entail a cumulative increase in the financial burden of 6.3 points over 15 years. Meanwhile, a scenario entailing greater potential economic growth of 0.5% p.p. would help to reduce the debt ratio right by slightly more than 3 further points over the same period.

Debt projections (% GDP) and sensitivity to rate rises and growth shock



Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



The ratings agencies have not revised this Autonomous Region's rating, with two of the three major agencies placing the long-term debt within the speculative-grade category (Ba1 (Moody's), BB (S&P)), while the third (Fitch) considers it to be investment grade (BBB-), albeit at the lower limit.

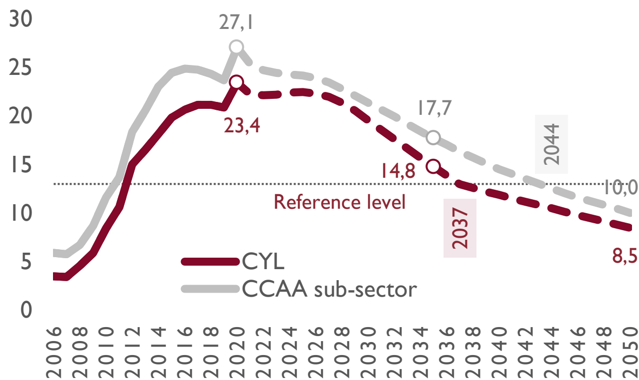
[12] The regulatory scenario entails an annual improvement in the primary balance of 0.25% of GDP, until a surplus of 0.75% is achieved, to be maintained while the debt ratio remains above the level of 13% of GDP. Once this limit is attained, the primary surplus will be equal to the financial burden, projecting a sustained balanced-budget scenario.

CASTILE and LEON

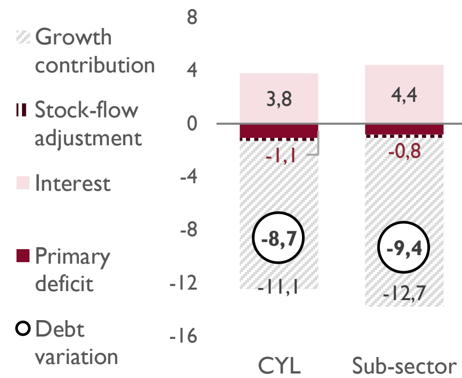
The increase in the stock of public debt as a legacy of the COVID-19 crisis, combined with the high starting point and the foreseeable worsening of the fiscal balance over the coming years, place the financial sustainability of Castile and Leon in a more vulnerable position. As a consequence of the previous financial crisis, the debt-to-GDP ratio rose by almost 18 points from 2007, stabilising at values slightly higher than 20 per cent in the years prior to the outbreak of the pandemic. The evolution of GDP and the fiscal balance linked to the health crisis project a further increase in the ratio in the coming years, increasing the public finance sustainability risk.

Under the suppositions of a regulatory scenario[13], where a worsening is projected for the primary balance for 2022, with a correction of the balance from said year onwards, the calculated reduction in the debt ratio is 8.7 points of GDP over the next 15 years, attaining the pre-pandemic level in the year 2029. Under the same suppositions, the reduction for the sub-sector as a whole is calculated as 9.4 points. In both cases, economic growth and the lower financial burden will be decisive factors in reducing the debt.

Debt projections (% GDP) on the regulatory scenario and year of attainment of the 13% reference level



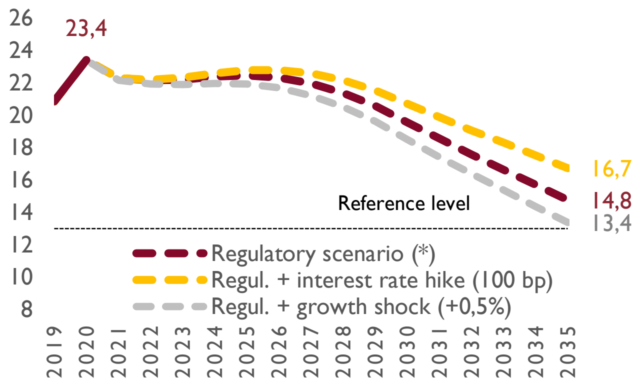
Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



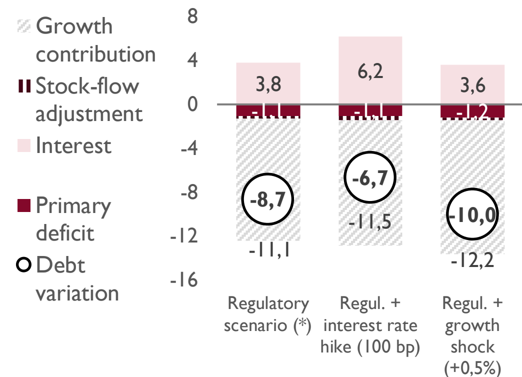
Under the regulatory scenario, the projection is that it will take almost two decades to attain the reference limit of 13%. In contrast with the scenarios projected by AIReF prior to the crisis, where the 13% level would have been attained around the year 2028, this limit is not projected to be attained before 2037 even if a slight budget surplus is maintained, while for the sub-sector as a whole the level would be attained in 2044.

A sensitivity analysis indicates that an interest rate increase of 100 b.p. would entail a cumulative increase in the financial burden of 2.4 points over 15 years. Meanwhile, a scenario entailing greater potential economic growth of 0.5% p.p. would contribute to a debt ratio reduction of an additional 1.4 points over the same period.

Debt projections (% GDP) and sensitivity to rate rises and growth shock



Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



The ratings agency Moody's maintains the long-term debt within the investment-grade category (Baa1) at the lower-medium level.

---

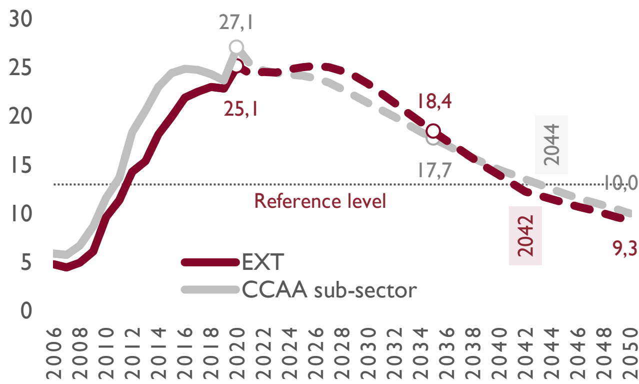
[13] The regulatory scenario entails an annual improvement in the primary balance of 0.25% of GDP, until a surplus of 0.75% is achieved, to be maintained while the debt ratio remains above the level of 13% of GDP. Once this limit is attained, the primary surplus will be equal to the financial burden, projecting a sustained balanced-budget scenario.

EXTREMADURA

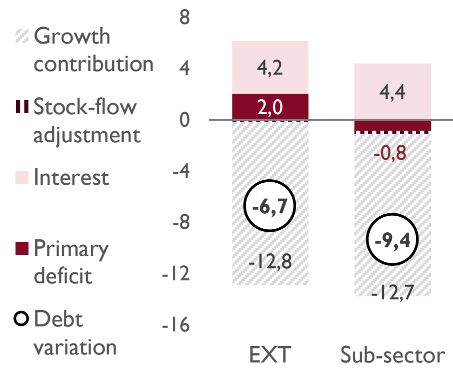
The increase in the stock of public debt as a legacy of the COVID-19 crisis, combined with the high starting point and the foreseeable worsening of the fiscal balance over the coming years, place the financial sustainability of Extremadura in a more vulnerable position. As a consequence of the previous financial crisis, the debt-to-GDP ratio rose by almost 18 points from the minimum attained in 2007, stabilising at levels slightly above 22 per cent in the years prior to the outbreak of the pandemic. The evolution of GDP and the fiscal balance linked to the health crisis project a further increase in the ratio in the coming years, increasing the public finance sustainability risk.

Under the suppositions of a regulatory scenario[14], where a worsening is projected for the primary balance for 2022, with a correction of the balance from said year onwards, the calculated reduction in the debt ratio is 6.7 points of GDP over the next 15 years, attaining the pre-pandemic level in the year 2031. Under the same suppositions, the reduction for the sub-sector as a whole is calculated as 9.4 points. In both cases, economic growth and the lower financial burden will be decisive factors in reducing the debt.

Debt projections (% GDP) on the regulatory scenario and year of attainment of the 13% reference level



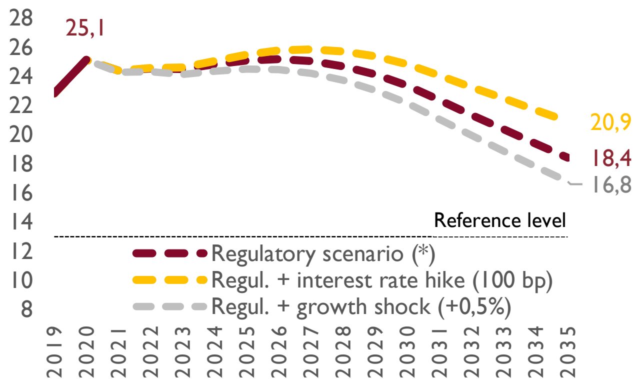
Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



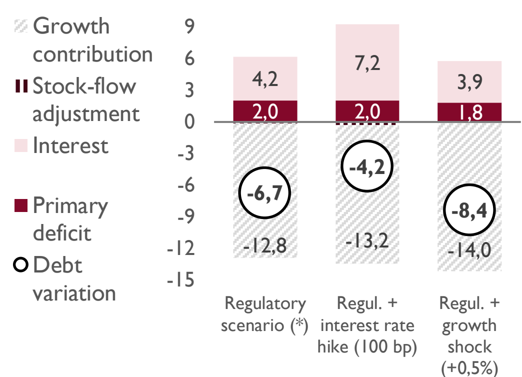
Under the regulatory scenario, the projection is that it will take at least two decades to attain the reference limit of 13%. In contrast with the scenarios projected by AIReF prior to the crisis, where the 13% level would have been attained around the year 2032, this limit is not projected to be attained before 2042 even if a slight budget surplus is maintained, while for the sub-sector as a whole the level would be attained in 2044.

A sensitivity analysis indicates that an interest rate increase of 100 b.p. would entail a cumulative increase in the financial burden of 3 points over 15 years. Meanwhile, a scenario entailing greater potential economic growth of 0.5% p.p. would contribute to a debt ratio reduction of an additional 1.6 points over the same period.

Debt projections (% GDP) and sensitivity to rate rises and growth shock



Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



The ratings agencies Moody's and S&P maintain the long-term debt within the investment-grade category (lower-medium level), with ratings of Baa2 and BBB, respectively.

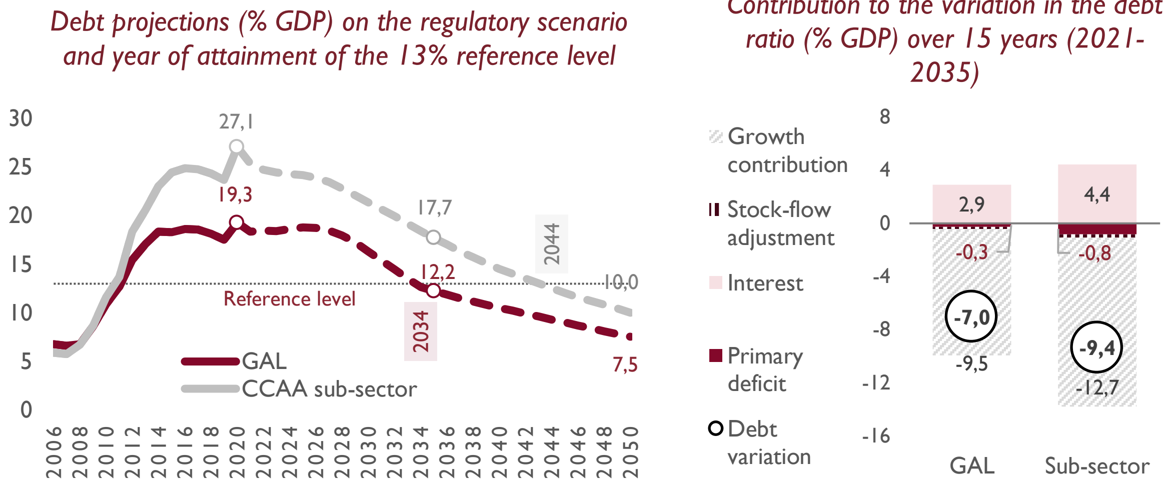
---

[14] The regulatory scenario entails an annual improvement in the primary balance of 0.25% of GDP, until a surplus of 0.75% is achieved, to be maintained while the debt ratio remains above the level of 13% of GDP. Once this limit is attained, the primary surplus will be equal to the financial burden, projecting a sustained balanced-budget scenario.

GALICIA

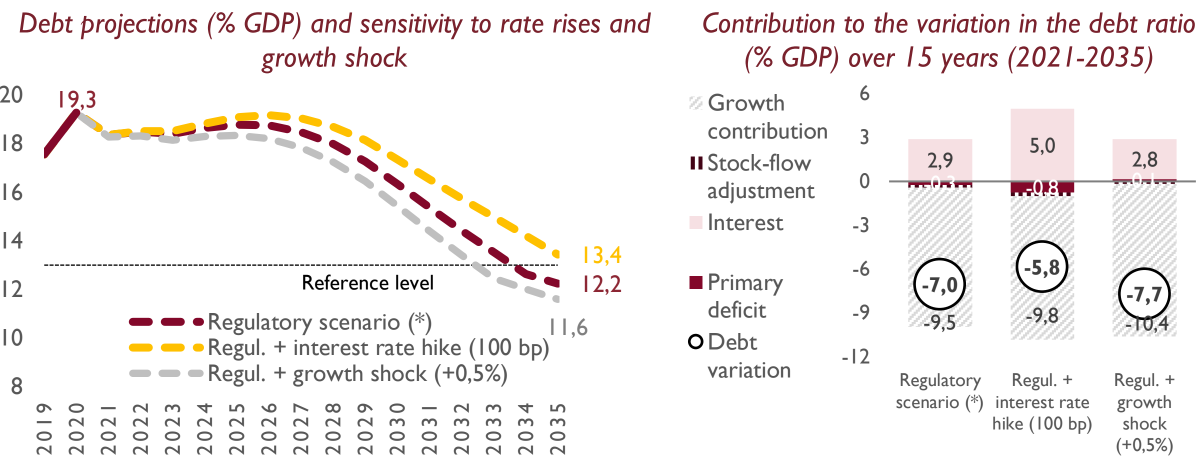
The increase in the stock of public debt as a legacy of the COVID-19 crisis, combined with the high starting point and the foreseeable worsening of the fiscal balance over the coming years, place the financial sustainability of Galicia in a more vulnerable position. As a consequence of the previous financial crisis, the debt-to-GDP ratio rose by over 12 points from the minimum attained in 2007, stabilising at levels around 18 per cent in the years prior to the outbreak of the pandemic. The evolution of GDP and the fiscal balance linked to the health crisis project a further increase in the ratio in the coming years, increasing the public finance sustainability risk.

Under the suppositions of a regulatory scenario[15], where a worsening is projected for the primary balance for 2022, with a correction of the balance from said year onwards, the calculated reduction in the debt ratio is 7 points of GDP over the next 15 years, attaining the pre-pandemic level in the year 2029. Under the same suppositions, the reduction for the sub-sector as a whole is calculated as 9.4 points. In both cases, economic growth and the lower financial burden will be decisive factors in reducing the debt.



Under the regulatory scenario, the projection is that it will take over a decade to attain the 13% reference level. In contrast with the scenarios projected by AIReF prior to the crisis, where the 13% level would have been attained around the year 2025, this limit is not projected to be attained before 2034 even if a slight budget surplus is maintained, while for the sub-sector as a whole the level would be attained in 2044.

A sensitivity analysis indicates that an interest rate increase of 100 b.p. would entail a cumulative increase in the financial burden of 2.1 points over 15 years. Meanwhile, a scenario entailing greater potential economic growth of 0.5% p.p. would help to attain the 13% reference limit one year earlier, in other words in 2033.



The ratings agencies Moody's and S&P maintain the long-term debt within the investment-grade category, with ratings of Baa1 and A, respectively.

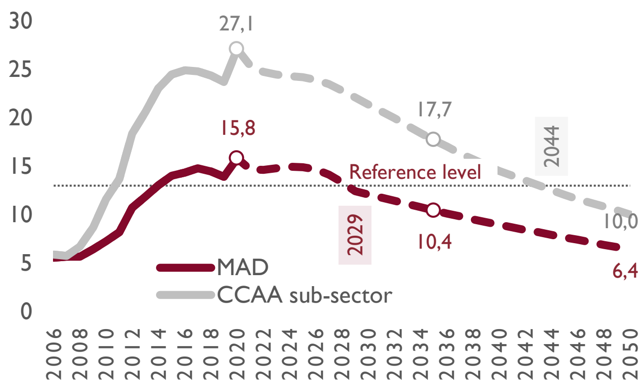
[15] The regulatory scenario entails an annual improvement in the primary balance of 0.25% of GDP, until a surplus of 0.75% is achieved, to be maintained while the debt ratio remains above the level of 13% of GDP. Once this limit is attained, the primary surplus will be equal to the financial burden, projecting a sustained balanced-budget scenario.

MADRID

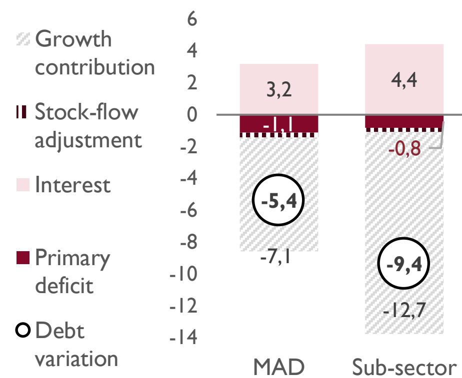
The increase in the stock of public debt is a legacy of the COVID-19 crisis, in combination with the foreseeable deterioration in the fiscal balance over the coming years, will delay the process of deleveraging in Madrid. As a consequence of the previous financial crisis, the debt-to-GDP ratio rose by more than 9 points from 2007, stabilising at values slightly higher than 14 per cent in the years prior to the outbreak of the pandemic. The evolution of GDP and the fiscal balance linked to the health crisis project a stabilisation of the ratio in the coming years, delaying the process of deleveraging and so increasing the public finance sustainability risk.

Under the suppositions of a regulatory scenario[16], with the projection of a deterioration in the primary balance for 2022 and a correction of the balance from that year onwards, the calculation is for a reduction in the debt ratio of 5.4 points of GDP over the next 15 years, stabilising at values similar to the pre-pandemic level in the coming years. Under the same suppositions, the reduction for the sub-sector as a whole is calculated as 9.4 points. In both cases, economic growth and the lower financial burden will be decisive factors in reducing the debt.

Debt projections (% GDP) on the regulatory scenario and year of attainment of the 13% reference level



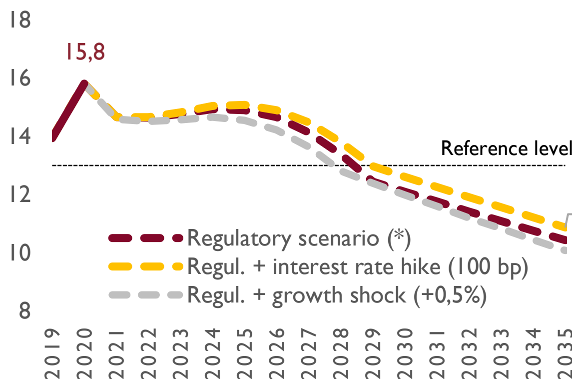
Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



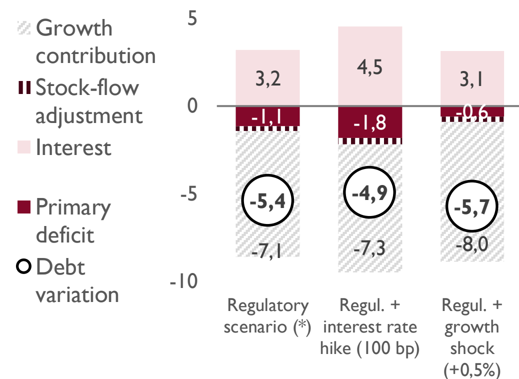
Under the regulatory scenario, the projection is that the 13% reference limit would be attained towards the end of the decade. In contrast with the scenarios projected by AIReF prior to the crisis, where the 13% level would have been attained around the year 2021, this limit is not projected to be attained before 2029, while for the sub-sector as a whole the level would be attained in 2044.

A sensitivity analysis indicates that an interest rate increase of 100 b.p. would have a limited impact, entailing a cumulative increase in the financial burden of 1.3 points over 15 years. Meanwhile, a scenario entailing greater potential economic growth of 0.5% p.p. would help to bring forward attainment of the reference limit of 13% by one year.

Debt projections (% GDP) and sensitivity to rate rises and growth shock



Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



The ratings agencies maintain the long-term debt within the investment-grade category: 'Baa1' (Moody's), 'A-' (S&P) and 'BBB' (Fitch), which recently upgraded the rating which it had previously downgraded in June 2020.

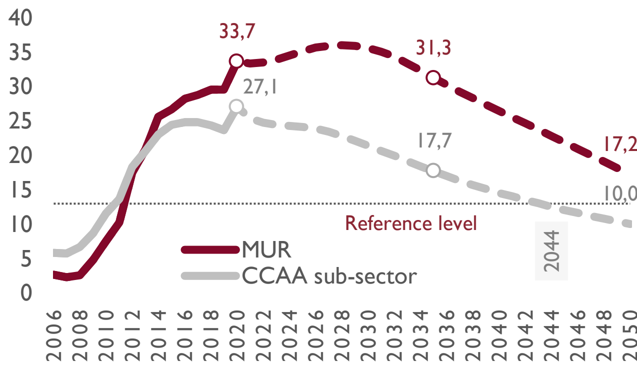
---

[16] The regulatory scenario entails an annual improvement in the primary balance of 0.25% of GDP, until a surplus of 0.75% is achieved, to be maintained while the debt ratio remains above the level of 13% of GDP. Once this limit is attained, the primary surplus will be equal to the financial burden, projecting a sustained balanced-budget scenario.

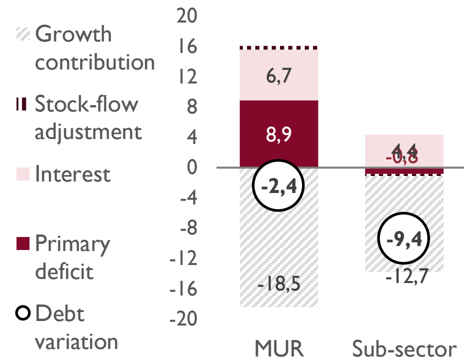
The increase in the stock of public debt as a legacy of the COVID-19 crisis, combined with the high starting point and the foreseeable worsening of the fiscal balance over the coming years, place the financial sustainability of the Murcia in a more vulnerable position. As a consequence of the previous financial crisis, the debt-to-GDP ratio rose by more than 27 points from the minimum attained in 2007. In the years prior to the outbreak of the pandemic, the ratio continued to increase up to a level of around 30%, despite cumulative growth during this period. The evolution of GDP and the fiscal balance linked to the health crisis project a further increase in the ratio in the coming years, increasing the public finance sustainability risk.

Under the suppositions of a regulatory scenario[17], where a worsening is projected for the primary balance for 2022, with a correction of the balance from said year onwards, the calculated reduction in the debt ratio is 2.4 points of GDP over the next 15 years, attaining the pre-pandemic level in the year 2037. Under the same suppositions, the reduction for the sub-sector as a whole is calculated as 9.4 points. In Murcia, growth will make a particularly significant contribution to reducing the ratio given the high level of debt, although the deficits projected for the period will offset practically all of this denominator effect.

Debt projections (% GDP) on the regulatory scenario and year of attainment of the 13% reference level



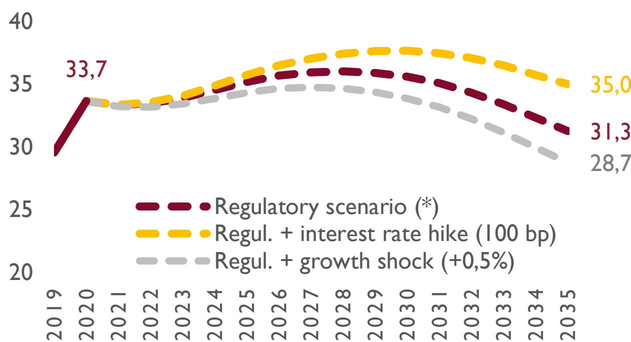
Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



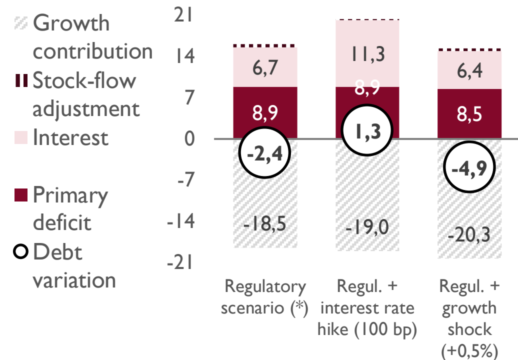
Under the regulatory scenario, the projection is that the 13% reference limit will not be attained before midway through the century. In contrast with the scenarios projected by AIReF prior to the crisis, where the 13% level would have been attained around the year 2041, this limit is not projected to be attained before 2050 even if a slight budget surplus is maintained, while for the sub-sector as a whole the level would be attained in 2044.

A sensitivity analysis indicates that an interest rate increase of 100 b.p. would entail a cumulative increase in the financial burden of 4.6 points over 15 years. Meanwhile, a scenario entailing greater potential economic growth of 0.5% p.p. would contribute to a debt ratio reduction of an additional 2.6 points over the same period.

Debt projections (% GDP) and sensitivity to rate rises and growth shock



Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



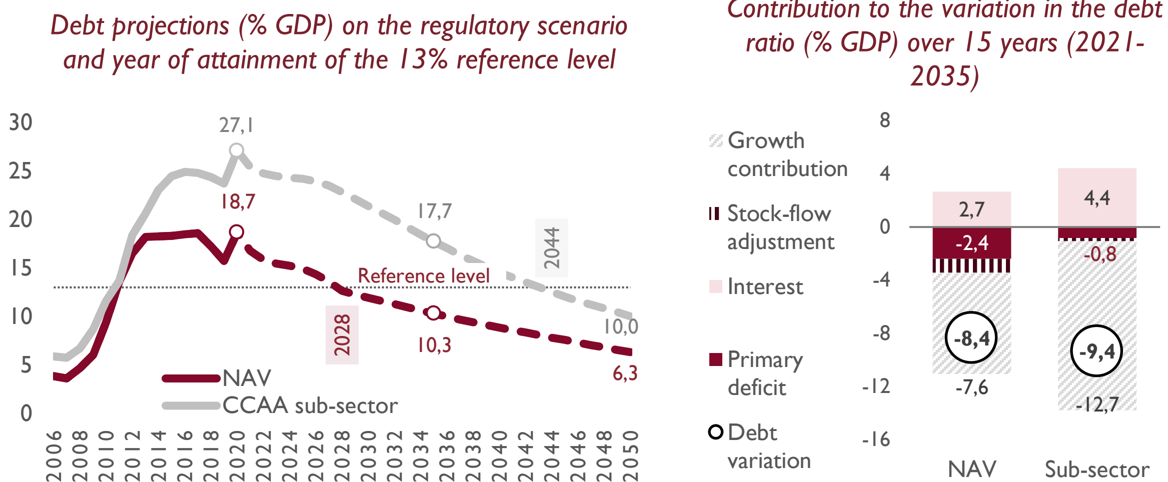
The ratings agencies have not revised the rating of this Autonomous Region, with Moody's placing the long-term debt in the speculative-grade category (Ba1), while Fitch considers it to be investment grade (BBB-), albeit at the lower limit.

[17] The regulatory scenario entails an annual improvement in the primary balance of 0.25% of GDP, until a surplus of 0.75% is achieved, to be maintained while the debt ratio remains above the level of 13% of GDP. Once this limit is attained, the primary surplus will be equal to the financial burden, projecting a sustained balanced-budget scenario.

NAVARRE

The increase in the public debt ratio together with the deterioration of the fiscal balance as a legacy of the COVID-19 crisis will delay the process of deleveraging in Navarre. As a consequence of the previous financial crisis, the debt-to-GDP ratio rose by almost 15 points from the minimum attained in 2007, stabilising at levels slightly above 18 per cent in the years prior to the outbreak of the pandemic. In 2018, the ratio began on a downward path, which the evolution of GDP and the fiscal balance linked to the health crisis halted, delaying the process of deleveraging and thus increasing the public finance sustainability risk.

Under the suppositions of a regulatory scenario[18], where a worsening is projected for the primary balance for 2022, with a correction of the balance from said year onwards, the calculated reduction in the debt ratio is 8.4 points of GDP over the next 15 years, attaining the pre-pandemic level in the year 2023. Under the same suppositions, the reduction for the sub-sector as a whole is calculated as 9.4 points. In both cases, economic growth and the lower financial burden will be decisive factors in reducing the debt.



Under the regulatory scenario, the projection is that the 13% reference limit would be attained towards the end of the decade. The crisis has delayed attainment of the 13% reference level by a few years, and this will now be attained towards the end of the decade rather than half-way through, while the level would be attained for the sub-sector as a whole in 2044.

The ratings agency S&P maintained the long-term debt within the higher level of the investment-grade category ('AA-').

---

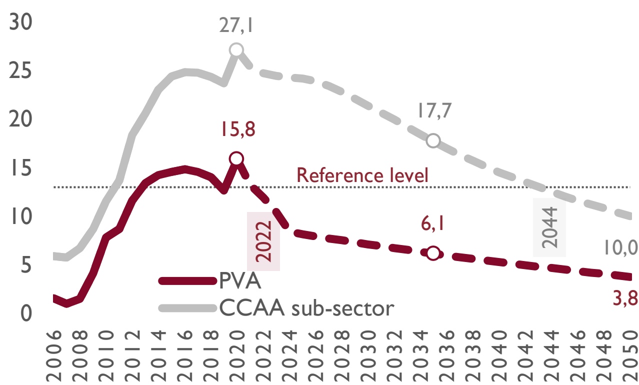
[18] The regulatory scenario entails an annual improvement in the primary balance of 0.25% of GDP, until a surplus of 0.75% is achieved, to be maintained while the debt ratio remains above the level of 13% of GDP. Once this limit is attained, the primary surplus will be equal to the financial burden, projecting a sustained balanced-budget scenario.

BASQUE COUNTRY

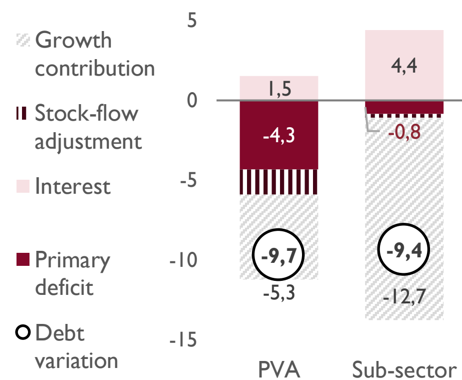
The increase in the public debt ratio together with the deterioration of the fiscal balance as a legacy of the COVID-19 crisis will delay the process of deleveraging in the Basque Country. As a consequence of the previous financial crisis, the debt-to-GDP ratio rose by almost 14 points from 2007, up to the maximum attained in 2016. In the years prior to the pandemic, with the onset of the economic recovery the debt ratio had stabilised at values slightly above 14 per cent, beginning a downward path in 2019. The evolution of GDP and the fiscal balance tied to the health crisis have delayed the process of deleveraging, thus increasing the public finance sustainability risk.

Under the suppositions of a regulatory scenario[19], with the projection of an improvement in the primary balance as early as 2021, the calculated reduction in the debt ratio is 9.7 points of GDP over the next 15 years, attaining values similar to the pre-pandemic level in 2022. Under the same suppositions, the reduction for the sub-sector as a whole is calculated as 9.4 points. In both cases, economic growth and the lower financial burden will be decisive factors in reducing the debt. Furthermore, the primary surpluses projected for the period will accelerate the debt reduction in the Basque Country.

Debt projections (% GDP) on the regulatory scenario and year of attainment of the 13% reference level



Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



Under the macro-fiscal forecasts produced by AIReF, the projection is that the 13% reference limit will again be attained in 2022. The rebound in economic activity, combined with the improved public balance expected as early as 2021, will serve to position the debt ratio once again at a level around 13% of GDP at the close of the next financial year, as had already occurred in 2019. Meanwhile, the total for the sub-sector is not forecast to attain a similar level until 2044.

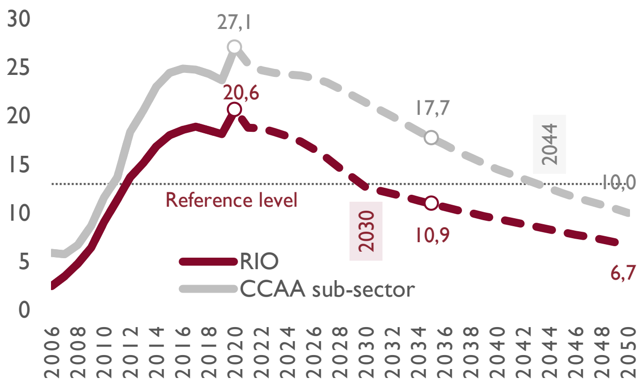
The ratings agencies maintain the long-term debt within the investment-grade category, at the medium level in the case of Moody's and Fitch ('A3' and 'A-', respectively), and a high level in the case of S&P (AA-).

[19] The regulatory scenario entails an annual improvement in the primary balance of 0.25% of GDP, until a surplus of 0.75% is achieved, to be maintained while the debt ratio remains above the level of 13% of GDP. Once this limit is attained, the primary surplus will be equal to the financial burden, projecting a sustained balanced-budget scenario.

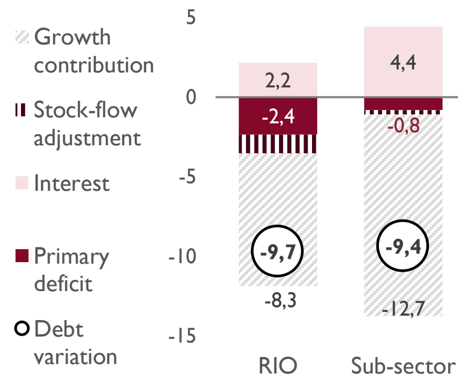
The increase in the stock of public debt is a legacy of the COVID-19 crisis, combined with the high starting level and foreseeable deterioration in the fiscal balance over the coming years, increase the financial sustainability risk of Rioja. As a consequence of the previous financial crisis, the debt-to-GDP ratio rose by over 15 points from 2007, stabilising at values slightly higher than 18 per cent in the years prior to the outbreak of the pandemic. The evolution of GDP and the fiscal balance linked to the health crisis project a further increase in the ratio in the short term, delaying the process of deleveraging and increasing the public finance sustainability risk.

Under the suppositions of a regulatory scenario[20], where a worsening is projected for the primary balance for 2022, with a correction of the balance from said year onwards, the calculated reduction in the debt ratio is 9.7 points of GDP over the next 15 years, attaining the pre-pandemic level in the year 2024. Under the same suppositions, the reduction for the sub-sector as a whole is calculated as 9.4 points. In both cases, economic growth and the lower financial burden will be decisive factors in reducing the debt.

Debt projections (% GDP) on the regulatory scenario and year of attainment of the 13% reference level



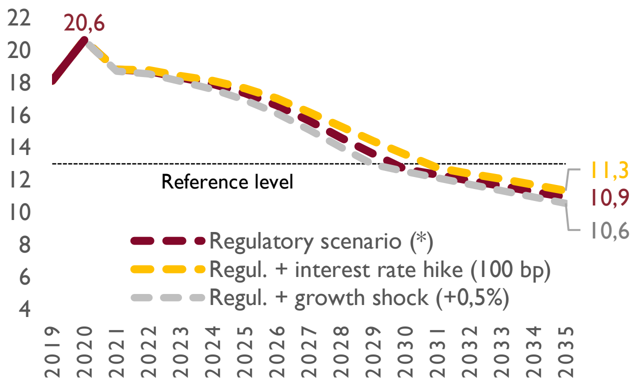
Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



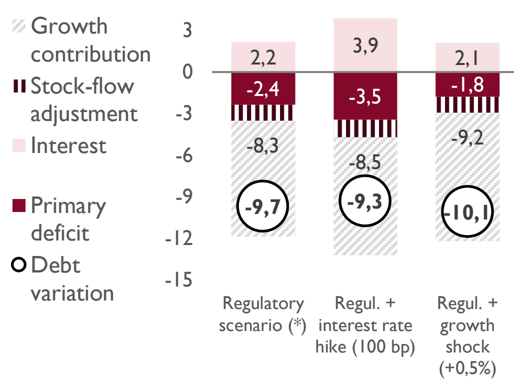
Under the regulatory scenario, the projection is that the 13% reference limit would be attained towards the end of the decade. In contrast with the scenarios projected by AIReF prior to the crisis, where the 13% level would have been attained around the year 2026, this limit is not projected to be attained before 2030 even if a slight budget surplus is maintained, while for the sub-sector as a whole the level would be attained in 2044.

A sensitivity analysis indicates that an interest rate increase of 100 b.p. would have a limited impact, entailing a cumulative increase in the financial burden of 1.7 points over 15 years. Meanwhile, a scenario entailing greater potential economic growth of 0.5% p.p. would help to attain the 13% reference limit one year earlier, in other words in 2029.

Debt projections (% GDP) and sensitivity to rate rises and growth shock



Contribution to the variation in the debt ratio (% GDP) over 15 years (2021-2035)



The ratings agency Fitch has since May 2022 maintained the long-term debt within the lower-medium level of investment grade, with a rating of 'BBB-'.

[20] The regulatory scenario entails an annual improvement in the primary balance of 0.25% of GDP, until a surplus of 0.75% is achieved, to be maintained while the debt ratio remains above the level of 13% of GDP. Once this limit is attained, the primary surplus will be equal to the financial burden, projecting a sustained balanced-budget scenario.

LOCAL GOVERNMENT

The AIReF forecast is that the local sub-sector would attain a debt-to-GDP level of close to 2% at the close of 2021. The most recent debt and deposit data for this sub-sector published by the Bank of Spain corresponding to the end of the first quarter of 2021 reflect a reduction in the debt compared with the same period in 2020, close to €800 million, as well as an increase in the deposits that local corporations hold at financial institutions, close to €2.3bn. As of this date, local corporations maintain a debt-to-GDP ratio of 1.8%, 0.2% lower than at the end of 2020. Although the advanced data corresponding to the debt situation at the end of April reflect an increase in the debt during that month of around €600 million, AIReF forecasts a ratio close to 1.7% by the end of the year, although this estimate is subject to uncertainty as to the level of expenditure that Local Governments will ultimately incur through application of the surpluses from previous years permitted under the current absence of fiscal rules.

With regard to bank deposits, AIReF estimates an increase at the end of 2021 similar to that seen in 2020. In 2020, despite the financial consequences of the pandemic, Local Governments increased their deposits by €2.5bn, a trend which is expected to continue, although to a lesser extent, as a consequence of the increase in expenditure estimated for the sub-sector, funded through cash surpluses. The net deposit debt, which has been negative since the year 2018, which was when deposits exceeded debt, and closed 2020 at a level of €8.7bn, is forecast to continue to increase, but by a lesser amount than in 2020.

The following graph shows the evolution of the data observed for debt, deposits and the net liability position of Local Governments (as a percentage of GDP), from 2012 to 2020. This also shows the AIReF closing forecast for 2021.

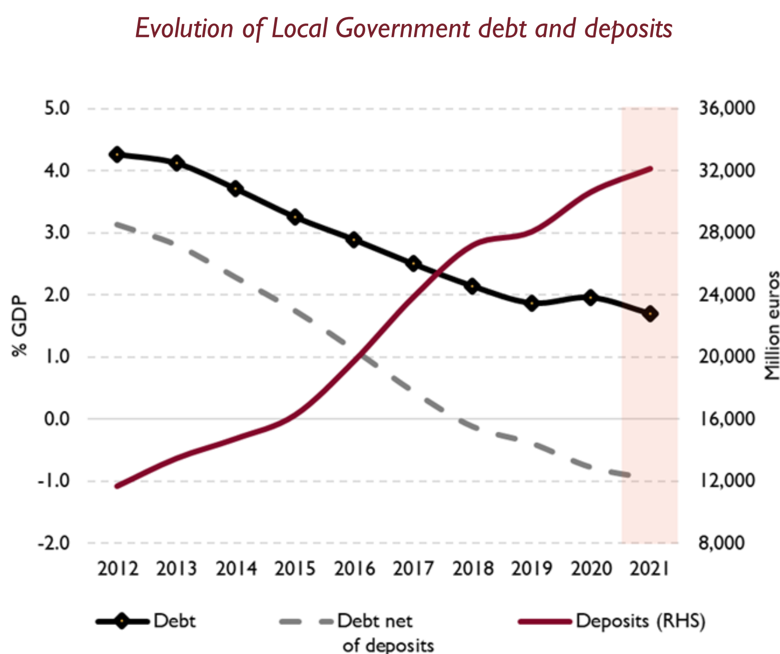


Table of regional indicators

Debt	2003	2008	2013	2018	2019	2020	Projections 2021	Rating [4] Moody's	S&P	Fitch	Debt cost 2019 Implicit rate	%GDP	Public financing mechanisms (% debt) 2020-IV
Total Regions [2]	6,1	6,7	20,6	24,4	23,7	27,1	25,5	-	-	-	1,2	0,3	61,1
ANDALUCIA	6,8	5,4	18,0	22,1	21,4	24,0	22,6	Baa2	BBB+	BBB-	1,1	0,3	75,8
ARAGÓN	4,4	4,3	16,7	22,4	21,9	25,3	23,7	-	BBB+	-	1,6	0,4	51,8
P. DE ASTURIAS	5,1	3,2	14,7	18,7	18,3	20,4	18,3	Baa1	-	-	1,1	0,2	25,0
ILLES BALEARS	4,3	9,8	26,5	26,6	26,2	33,6	29,4	-	BBB+	-	1,1	0,3	68,8
CANARIAS	3,5	4,5	13,5	14,9	14,0	15,6	13,3	-	A	BBB-	0,8	0,1	76,6
CANTABRIA	3,8	3,9	18,4	23,1	22,5	25,5	23,5	-	-	BBB	1,1	0,3	86,3
CASTILLA Y LEÓN	3,4	4,6	16,6	21,1	20,9	23,4	22,3	Baa1	-	-	1,4	0,3	27,4
CASTILLA –LA MANCHA	2,9	6,5	31,4	35,4	34,9	38,5	36,3	Ba1	-	BBB-	1,0	0,4	74,3
CATALUÑA	7,2	10,0	30,3	34,3	33,4	38,2	35,7	Ba2	-	BB	1,4	0,5	75,5
EXTREMADURA	6,0	5,0	15,4	23,0	22,8	25,1	24,4	Baa2	BBB	-	1,1	0,3	61,9
GALICIA	7,7	6,8	17,1	18,2	17,6	19,3	18,3	Baa1	A	-	0,9	0,2	49,7
COMUNIDAD DE MADRID	6,3	5,7	11,9	14,5	13,9	15,8	14,6	Baa1	A-	BBB	2,0	0,3	4,3
REGIÓN DE MURCIA	3,4	2,6	20,9	29,6	29,6	33,7	33,4	Ba1	-	BBB-	1,2	0,4	88,9
C. FORAL DE NAVARRA	4,8	4,7	18,2	17,2	15,7	18,7	16,8	-	AA-	-	2,0	0,3	-
PAÍS VASCO	3,1	1,5	13,4	14,0	12,7	15,8	13,2	A3	AA-	A-	1,3	0,2	-
LA RIOJA	3,1	4,8	15,2	18,5	18,1	20,6	18,8	-	-	BBB-	0,1	0,0	34,9
COMUNITAT VALENCIANA	10,3	12,7	34,4	42,1	41,8	49,2	47,0	-	BB	BBB-	0,8	0,4	84,2