

MINISTRY OF FINANCE AND ECONOMIC PLANNING



RWANDA FISCAL RISK STATEMENT FY 2025/26

April 2025

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I. INTRODUCTION

The Government of Rwanda is publishing its 6th Fiscal Risk Statement (FRS), prepared by the Ministry of Finance and Economic Planning (MINECOFIN). This publication is in line with global best practice as well as a fulfilment of Rwanda's commitment with IMF and World Bank and a continuous East African Community Monetary Union requirement.

The publication of the annual Fiscal Risk Statement outlines risks with a fiscal impact stemming from various sources and the Government's mitigating measures to reduce the impact. This demonstrates the Government's commitment to sustain its main policy objectives of promoting economic development and social cohesion whilst maintaining Macro-economic stability.

For the purpose of this document, **fiscal risks refer to the possibility of deviations in fiscal variables from what was expected at the time of the budget or other forecasts.** Specifically stated, fiscal risks are events that can cause public finance outcomes to deviate from what was expected at the time of the budget, or in other Macroeconomic forecasts.

Such risks include but are not limited to **climate change, unforeseen spending pressures, revenue shortfalls, terms of trade shocks, exchange rate volatility, natural disasters, and calls on Government guarantees.**

Table 1: Fiscal Risk Framework

Macroeconomic risks	▪ Internal and External Risks ▪ Macroeconomic shock simulation ▪ Fiscal analysis: forecast performance
Climate change risks	▪ Climate change fiscal risks ▪ Including on SoEs and PPPs
Specific risks and contingent liabilities	▪ Public Corporations ▪ Public debt-related risks ▪ Government guarantees ▪ Public-Private Partnerships ▪ Pension liabilities ▪ Local Government ▪ Financial sector ▪ Natural disasters

The principal objective of this statement is to identify the fiscal risks facing Rwanda, and outline steps to mitigate such risks where appropriate, as sound management of fiscal risks contributes to the Macroeconomic stability.

This Fiscal Risk Statement (FRS) has been prepared during a time of ongoing geopolitical tensions, including the Ukraine-Russia war, new conflicts in the Middle East (such as in Gaza), the ongoing conflict in Eastern DRC, and USA trade war with China. These situations are putting pressures on Global economic activity, disrupting trade, and

slowing the return to normal economic activity. It is evident that these events impact Rwanda's economic activity in various ways.

However, given the uncertainty stemming from economic policy shifts and geopolitical tensions, which could continue to affect global commodity prices, the government assesses the overall level of fiscal risks as moderate. It is deemed necessary to implement fiscal and other economic policies to address these identified risks.

The Statement clusters fiscal risks into three categories: **Macroeconomic, Climate change, and specific risks**. These risks are discussed in the rest of the document. The Government publishes a Fiscal Risks Statement annually, and particularly, **this Fiscal Risk Statement expanded its quantitative risk analysis to include in-depth forward-looking financial assessments of at least 5 SoEs**, as well as mitigation measures to address the identified risks.

II. MACROECONOMIC RISKS

1. Global Economic Outlook

Global growth¹ is projected to decline after a period of steady but underwhelming performance, amid policy shifts and uncertainties. Global growth is estimated at 2.8 percent in 2025 and 3.0 percent in 2026 from 3.3 percent in 2024, while Global inflation is expected to decline at a pace that is slightly slower than what was expected in January, reaching 4.3 percent in 2025 and 3.6 percent in 2026. With a notable upward revision for advanced economies and slight downward revisions for emerging market and developing economies in 2025. Growth in Sub-Saharan Africa is projected to decline to 3.8 percent in 2025 from 4.0 percent observed in 2024.

Escalating trade tensions and elevated policy-induced uncertainty may further hinder growth. Shifting policies could lead to abrupt tightening of global financial conditions and capital outflows, particularly impacting emerging markets. More limited international development assistance may increase the pressure on low-income countries, pushing them deeper into debt or necessitating significant fiscal adjustments, with immediate consequences for growth and living standards.

Intensifying downside risks dominate the outlook. Heightening trade war, along with even more elevated trade policy uncertainty, could further reduce near- and long-term growth, while eroded policy buffers weaken resilience to future shocks. Divergent and rapidly shifting policy stances or deteriorating sentiment could trigger additional repricing of assets beyond what took place after the announcement of sweeping US tariffs on April 2 and sharp adjustments in foreign exchange rates and capital flows, especially for economies already facing debt distress.

¹ <https://www.imf.org/en/Publications/WEO/Issues/2025/04/22/world-economic-outlook-april-2025>

Restoring fiscal space and putting public debt on a sustainable path remain important priorities, while meeting critical spending needs to ensure national and economic security requires adherence to credible medium-term fiscal consolidation plans. At this critical juncture, policies need to be calibrated to foster international cooperation while ensuring internal economic stability, thereby helping reduce global imbalances.

2. External and domestic risks

The primary macroeconomic risks for Rwanda's economic performance are predominantly external, linked to ongoing geopolitical tensions such as the Ukraine-Russia conflict, issues in the Middle East, and unrest in Eastern DRC. Additionally, U.S. tariffs impact Rwanda by increasing import costs, driving imported inflation, causing exchange rate depreciation due to global commodity price fluctuations, and reducing demand for Rwandan exports affected by these tariffs.

On the domestic front, transmission channels of risks, including climate shocks, i.e., weather shocks induced by floods, drought, and irregularities in precipitation, heavily affect Rwanda's economic performance through distorted agriculture production and food inflation pressures, which in turn affect private consumption and tax base. In the fiscal/government sector, the fiscal risks mainly evolve from uncertainty about committed external support disbursements, i.e., cuts in foreign aid/grants and bilateral cooperations related to conflicts are assumed to affect the size of the budget and Balance of Payments.

Global commodity price volatility creates significant uncertainty and risks to the domestic economy. Rwanda imports a big share of raw materials and finished products from the region or further afield. Being landlocked makes transport costs from sea ports (i.e., Mombasa, Dar es Salaam) generally high. Exports of Coffee, Tea, and minerals are major sources of foreign reserves, which are also susceptible to the Global economic environment.

The other main risk on the domestic front is linked to the increasing frequency of weather and climate irregularities and shocks (e.g., drought and floods), which could harm agricultural production and directly affect households in Rwanda. Decreased production could potentially lead to higher food prices, reduce the purchasing power of consumers, and affect vulnerable households. Materialization of all domestic weather shocks would not only expose the economy to high inflation through food prices (affecting household consumption and saving) but also affect the government budget in terms of spending² and savings (from fiscal response with extra resources (mostly external) to more borrowing and debt accumulation)

² The April–May 2023 flood disaster increased spending related to the reconstruction efforts. The total reconstruction spending is anticipated to be around 3 percent of GDP over the next five years, of which two-thirds will be executed in FY2023/24 and FY2024/25. See Rwanda Economic Update for February 2024, <https://www.worldbank.org/en/news/press-release/2024/02/28/rwanda-afe-economic-performance-strengthened-in-2023-despite-continued-challenges#:~:text=Rwanda's%20Economic%20Performance%20Strengthened%20in%202023%20Despite%20Continued%20Challenges,Share%20more&text=Kigali%2C%20February%2028%2C%202024%20%2D,in%20infrastructure%20in%20April%20May%202023.>

Simulated impact of risks underlying macroeconomic outlook³

Rwanda's macroeconomic projections as of March 2025(baseline) partially took into account the combined effect of highlighted risks in the above section. The baseline of the March 2025 projection already embeds lingering effects of the ongoing Ukraine-Russia war and other identified uncertainty in the external and domestic environment, while the alternative scenario simulates the possible materialization of risks that underlines and not covered in the March 2025 projection. This section empirically discusses the effect and transmission channels of the expected materialization of those shocks into the economy. The risks include simulated economic and geopolitical (Regional—DRC/M23 and Middle East conflicts, Trade/tariff war, and budget fiscal financing shocks—Cut in foreign aid and cooperation.

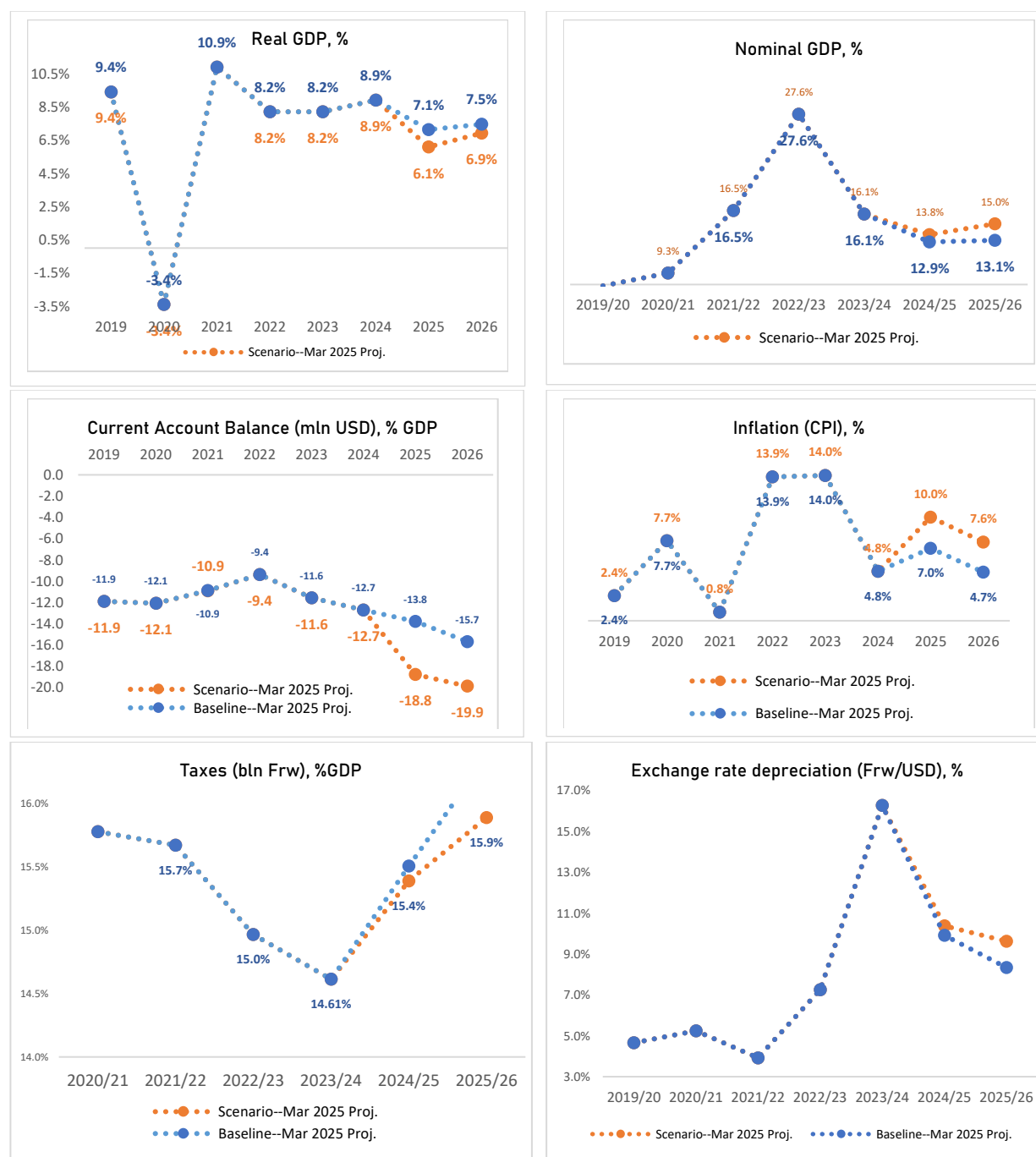
In the charts below, the scenario projections (forecast) (which have additional risks/shocks not fully covered in baseline or March 2025 projection) were compared to baseline projections (outcome) to quantitatively illustrate the main transmission channels of the effect of the risks/shocks on economic performance. The simulated risks contribute to a lower real GDP growth coming from lower agriculture food production, lower revenues/taxes (reduction in grants revenues), more deteriorated current account balance (due to higher imports bill & exchange rate depreciation) and fiscal deficit (net lending/borrowing including grants) through higher spending & less revenues.

The resulting combined effect of the mentioned shocks includes more required extra fiscal response in terms of higher spending on social protection programs, government goods and services bill, interest payments, and grants to local government. The risks are simulated as deviations from the baseline, one-off shocks, and are expected to potentially affect the economy in July-December 2025 and 2026 or 2025/26, and economic indicators are expected to return to their baseline path or March 2025 Projection as shocks fade out in the medium-term.

The effects are simulated to spark off a reduction in Real GDP (6.1%& 6.9% in 2025 & 2026) induced by a contraction in agricultural food production due to weather shocks. The nominal GDP increases despite a contraction in real GDP as shocks-induced prices or inflation surges, which in turn reduce the household consumption purchasing power and lower tax revenue collection as the tax base shrinks. The increase in imports bill and reduction in exports are affected by global trade and geopolitical-trade related shocks (i.e., trade tariff war and DRC-conflicts induced bilateral trade agreement distortions) coupled with exchange rate depreciation leads to (-18.8%& -19.9% for 2025 or 2026) deterioration in current account deficit (percent of GDP).

³ The Russia-Ukraine crisis assumes a prolonged period of instability and uncertainties, plus red sea and probable East Asia tensions, drought in the South African region, all may affect the medium-term macroeconomic projections through higher inflation (higher energy, food and other commodity prices), an increase in the cost of doing business and making investment, pressures on the exchange rate as well as moderate GDP growths than previously projected.

Figure 1. Combined simulated macroeconomic effects of shocks



Source: MINECOFIN

3. Forecast performance

Forecast errors (deviations between the forecast and outcome/realizations) can also be a source of fiscal risk, which is due to possible events that were not taken into account in the past. Revenue shortfalls against forecast, or expenditure overruns, can lead to

unanticipated debt borrowing. This section reviews the performance of several key fiscal and macroeconomic indicators in terms of forecast errors between forecasts against realizations.

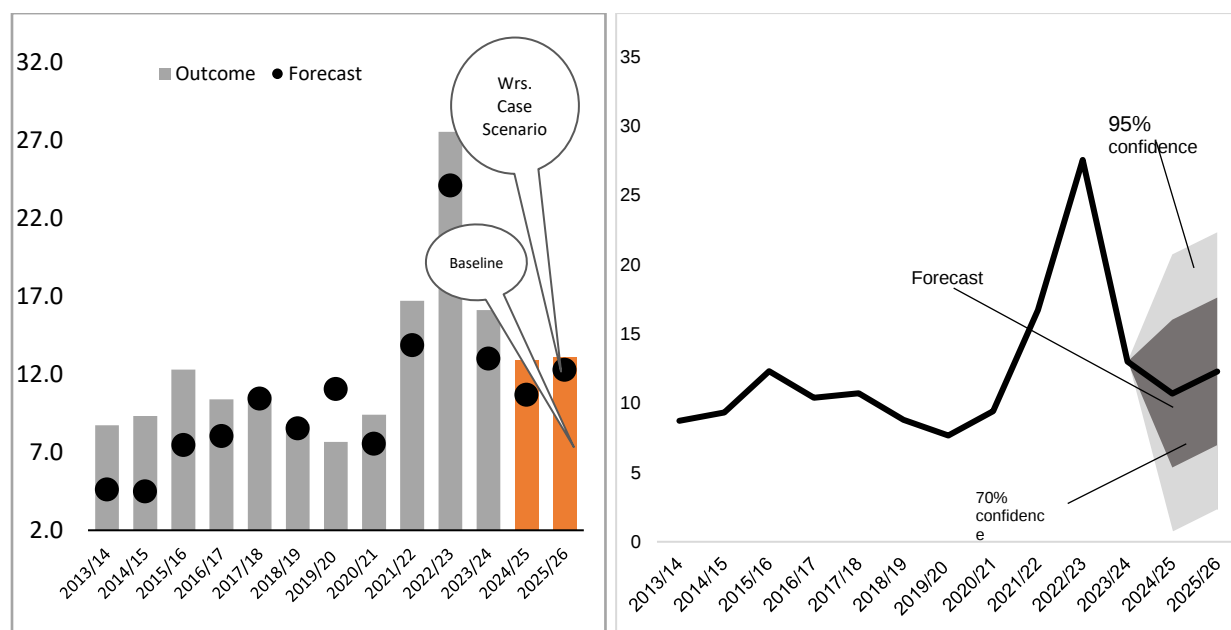
In general, forecast performance has been satisfactory (with minor deviations) over the past several years, but with several notable exceptions (outlying deviations) which are gradually minimized toward zero, mainly for the post COVID-Period. The shocks used for the forecast are related to poor performance of agriculture, mainly food production, due to weather-related shocks like heavy rains, floods, and droughts (relatively longer periods of sun). The charts below illustrate possible effects if the anticipated development takes place may lead to the risk of food insecurity in the country while also exacerbating inflationary pressures. The resulting high inflation would affect spending on social protection, goods and services bill, interest payments and probably grants to local government.

Nominal GDP

Based on historical forecast errors (i.e. the difference between forecast and actual outcome), the nominal GDP growth outcome was mostly higher than projected, and forecasting performance has been improving however become relatively higher for FY 2019/20 as uncertainty was high due to COVID-19, pandemic and actual nominal GDP level lower than forecasts. The forecast performance becomes fairly normal from 2020/21 to 2023/24. For the FY 2023/24, the nominal GDP growth forecasts fall below actual outturns as the actual GDP for 2024 was observed to be higher than projected in October 2024.

The current FY 2024/25 forecasted (Revised projection October 2024) nominal GDP recorded 10.7% lower than the 12.9% recorded for the end-year estimate outcome (March 2025 projection). For the Worst case scenario (deviation of current simulated/shocked (2025/26) from previous end-year estimate (2024/25) of March 2025 projection), FY2025/26 in which weather shocks are assumed to materialize (i.e., floods, irregularity in rainfall), nominal GDP will grow around 12.3% compared to 13.1% in outcome of March 2025 projection (deviation of baseline current year (2025/26) from previous end-year estimate (2024/25) of March 2025 projection) within a 70% probability of uncertainty (Figure 1 RHS).

Figure 2 : Nominal GDP growth, Forecast⁴ and outcome (% change)

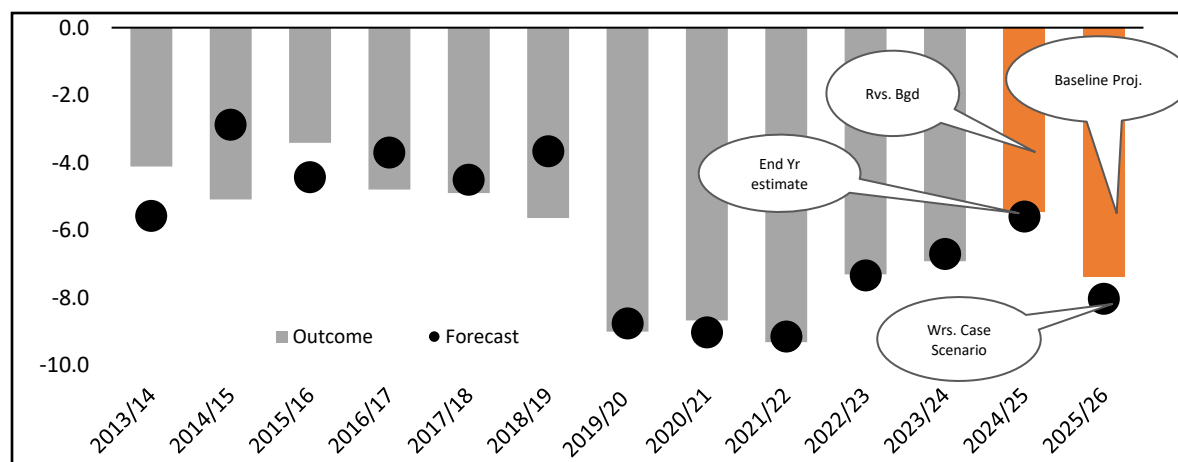


Source: MINECOFIN

Overall fiscal balance

The overall balance or fiscal deficit, from 2016/17 to 2019/20, was slightly larger than forecast due to increased expenditure on new recruitment in the public service, advance payments for peacekeeping operations in the pre-pandemic period, and unexpected COVID-19 pandemic-related costs for the government. From 2013/14 to 2014/15, volatility in foreign aid disbursements led to major deviations between outcomes (realizations) and forecasts (revised budget projections).

Figure 3: Overall balance forecast and outcome (% of GDP)



⁴ The fun chart illustrates the forecast uncertainty (confidence interval) around the forecast period (2024/25-2025/26), which gets wider as the forecast horizon increases. The setting of confidence interval based on hypothesis associated with probabilities ($\pm 70\%$ & $\pm 95\%$) of hitting, falling above or below the forecast or target (i.e., 18.5% for 2024/25). The confidence intervals show the uncertainty around the forecast, which implies the possible alternative options available associated with not hitting the target forecast. For instance, in 2024/25 for $\pm 95\%$ confidence, the forecast becomes 19.9% or 17.0%, and for 70% confidence it becomes 19.2% or 17.7%.

The continued economic recovery from the pandemic faced challenges due to uncertainty in global economic conditions and the tight financial situation. In principle, tax revenue collection would be expected to co-move with the pace of nominal GDP, but it is deviated by a large share agriculture sector, which is exempt from taxes. the FY 2024/25 fiscal deficit was revised slightly down, end-of-year estimate lower than revised budget estimates (5.5% vs. 5.6% of GDP) as a result of a reduction in foreign-financed projects and an increase in tax revenue.

The fiscal deficit (% GDP) for FY 2025/26 (worst-case scenario) estimated at 8% from 7.4% of baseline scenario reflecting first, the effect of GDP to revenues collection as tax revenues not significantly changed following lower nominal tax base while higher inflation coming not followed by proportion tax collection since it is coming from exempted agriculture sector and second, the increased government spending as result of a simulated fiscal response to risks & climate/weather induced shocks as well as depreciation of exchange rate, and third a lower nominal GDP than baseline (as deficit is measured as ratio to GDP).

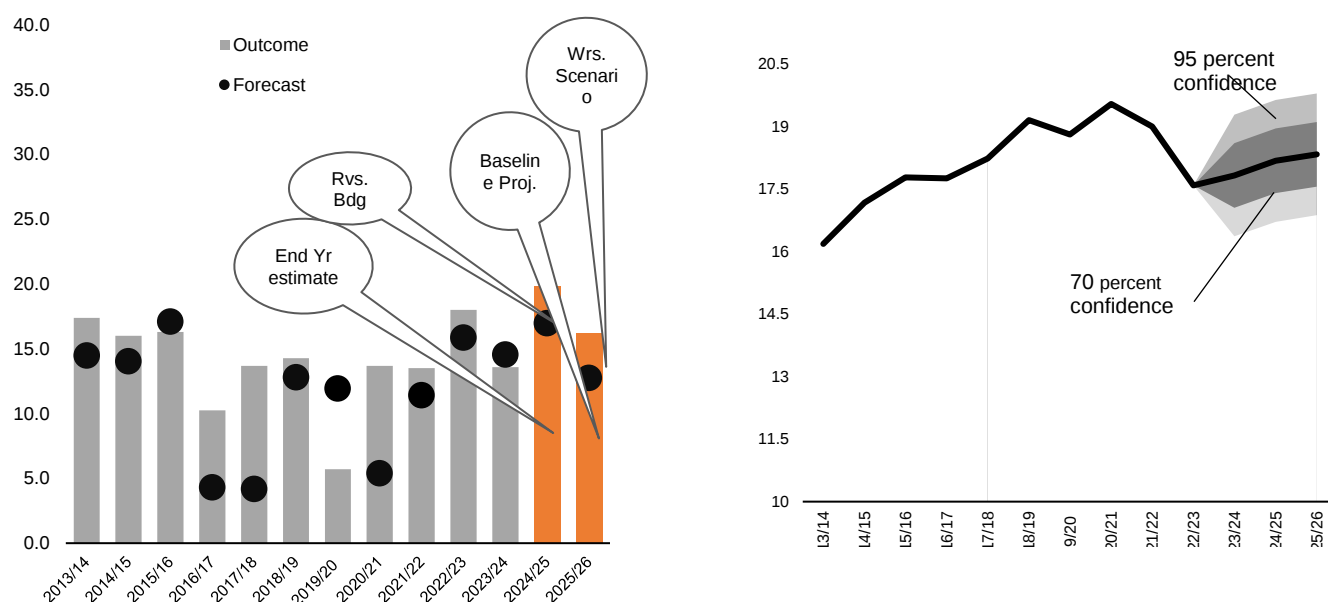
Revenue

The total domestic revenue is a combination of tax and non-tax revenue, excluding grants. Tax revenues are highly sensitive to macroeconomic changes and effective revenue administration measures by the Rwanda Revenue Authority. The MINECOFIN estimations of elasticity show that for every percentage point increase in nominal GDP growth, tax revenue increases by 1.1%, which emphasizes the importance of accurate macroeconomic forecasting in the budget process estimates.

The better-than-expected revenue performance over FY 2018/19 (before contraction during Covid-19 and regained the normal performance post-Covid-19) is largely explained by an association of continued structural administrative measures implemented by the Rwanda Revenue Authority and structural tax policy changes that generated additional revenue. For FY 2019/20 revenue forecasts were maintained slightly close to the same level as of previous year but actual realization was lower than that of the previous year, following the uncertainty associated with COVID-19 pandemic, however the reverse was observed post Covid-19 since 2021/22 as the pandemic fades out and recovery takes over.

For 2024/25, significant tax policy reform changes were approved by the cabinet with the main aim of expanding the tax base. Their implementation shows the government's continued commitment to strengthening domestic revenue mobilization to support fiscal sustainability and economic growth. Reimbursements from Rwanda's participation in United Nations peacekeeping operations have been significantly contributing to post-pandemic revenue performance through non-tax revenue.

Figure 4: Revenue forecast and outcome, (% change & % to GDP)



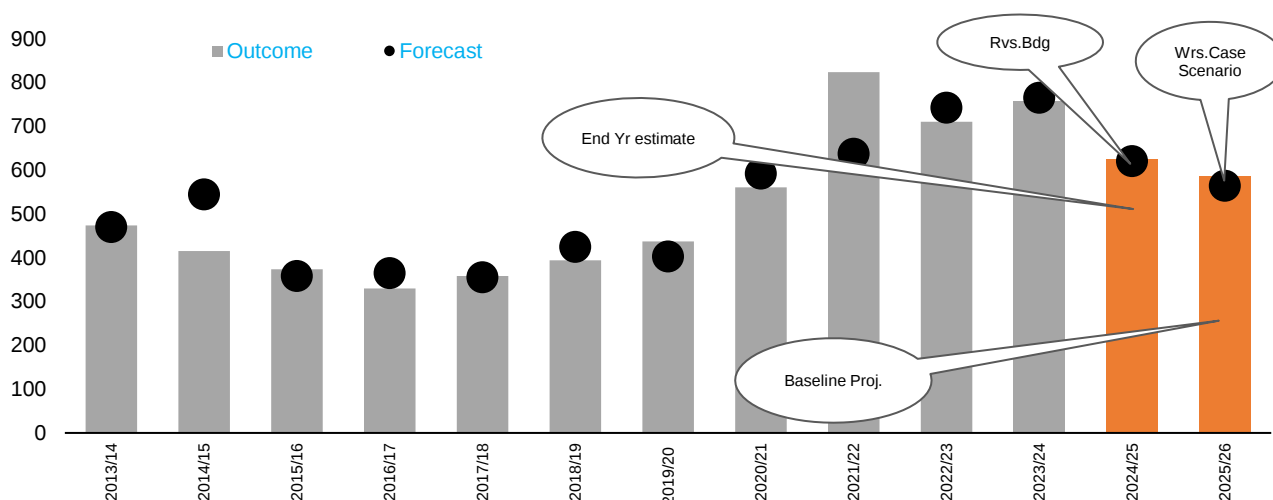
Source: MINECOFIN

Figure 4 (LHS) revenue growth for end FY 2024/25 to FY 2025/26 is expected to follow economic growth developments, and most importantly, the domestic revenue mobilization efforts being implemented under the recent tax policy reforms, in addition to continuous administration measures. Therefore, FY 2024/25 Domestic Revenue was revised slightly up—end year estimate higher than revised budget estimates (18.3% vs. 18.2% of GDP) as a result of the ongoing performance of domestic revenue collection, recent approved tax policy measures, and economic performance.

The domestic Revenue (% GDP) for FY 2025/26 (worst-case scenario) estimated at 18.3% from 18.8% of baseline scenario reflecting the effect of GDP to revenues collection as tax revenues not significantly changed following lower nominal tax base while anticipated higher inflation is not followed by proportion tax collection since it is coming from exempted agriculture sector.

Grants revenue forecasting is declining following a reduction in bilateral budget support. As a result, FY 2025/26 is slightly under the worst-case scenario, reaching 2.5 % of GDP compared to 2.6% of GDP in the baseline.

Figure 5: Grants forecast and outcome (FRW billions)

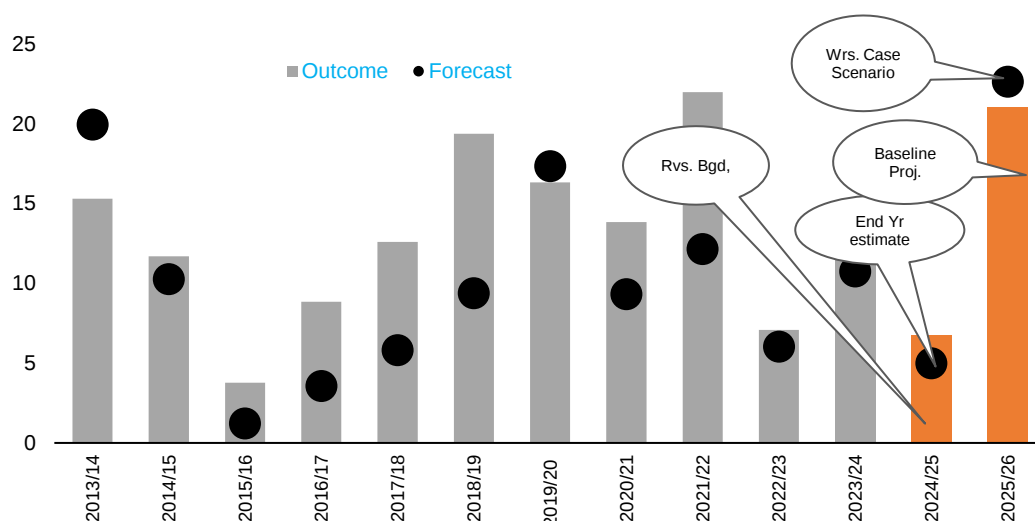


Source: MINECOFIN

Expenditure

Expenditure growth outcomes have been higher than forecasted for the past 4 years since FY 2020/21. In FY 2020/21, government expenditure was higher due to higher COVID-19-related spending, including vaccines and other health facilities, which continued in FY 2021/22 as well, and for 2022/23 main deviation was due to flood-related spending.

Figure 6: Expenditure growth forecast and outcome (Percentage)



Source: MINECOFIN

For FY 2024/25, government expenditure end-of-year estimates (outcome) are expected to be in line with the revised budget. However, the government expenditure forecast

(worst-case scenario) for FY 2025/26 is expected to be at 29.3% of GDP higher than the baseline of 28.7% of GDP. The increased government spending is anticipated on goods and services and capital investment, which is associated with external risks, weather shocks, and exchange rate depreciation.

III. QUANTITATIVE CLIMATE CHANGE FISCAL RISK ANALYSIS

Climate change in Rwanda

Rwanda is experiencing rising temperatures, in line with global and continental patterns, and while rainfall has remained steady, its pattern through the year has become more extreme. Average temperatures are approximately 1.25 to 1.5°C higher than pre-industrial times and have accelerated since the 1990s. More detailed analysis reveals some regional variation in rainfall and an intensification of rainfall extremes, but no changes in droughts. These trends are consistent with broader regional patterns.

The main climate-related natural disasters that adversely affect the population are floods and landslides, with prolonged dry seasons more frequent and drought also possible. Floods and landslides in particular are associated with damage to infrastructure, loss of lives and property, including crops, soil erosion, water pollution, etc.⁵ This was demonstrated by the impact of the extreme rainfall, flooding, and landslides experienced in May 2023. As economic development is rapidly changing land-use, the observed increase in frequency of landslides and floods reflects both the intensification of rainfall and changes in the land that those rains fall on, notably the hillsides of the north and west of the country.

A further rise in temperature across Rwanda is expected in the coming years. The exact change will depend on the global efforts to reduce emissions. Best estimates based on plausible emission scenarios indicate a potential for additional warming of between 1 and 3 °C, but higher warming cannot be ruled out.

Precipitation scenarios are very uncertain, with extremes in rainfall over short periods expected to become more frequent. Projections of droughts at the national level are very uncertain, but they can increase locally, especially in the eastern part of the country. High global emission scenarios and a more accentuated warming response can lead to emerging risks from extreme temperatures and an intensification of precipitation in the second half of the century.

Long-term climate change fiscal risks

Rising temperatures associated with climate change will have increasing long-term impacts for both the economy and the sustainability of the public finances, increasing fiscal risks. The impact of higher temperatures on economic growth is assessed based on empirical analysis of past temperature changes on growth, and the consequent impact of slower economic growth on fiscal projections to assess building fiscal

⁵ (GoR, 2017b; REMA, 2015).

pressures. The assessment of the impacts of climate change is undertaken through to the end of the century, given the long-term implications of climate change on the economy and public finances.

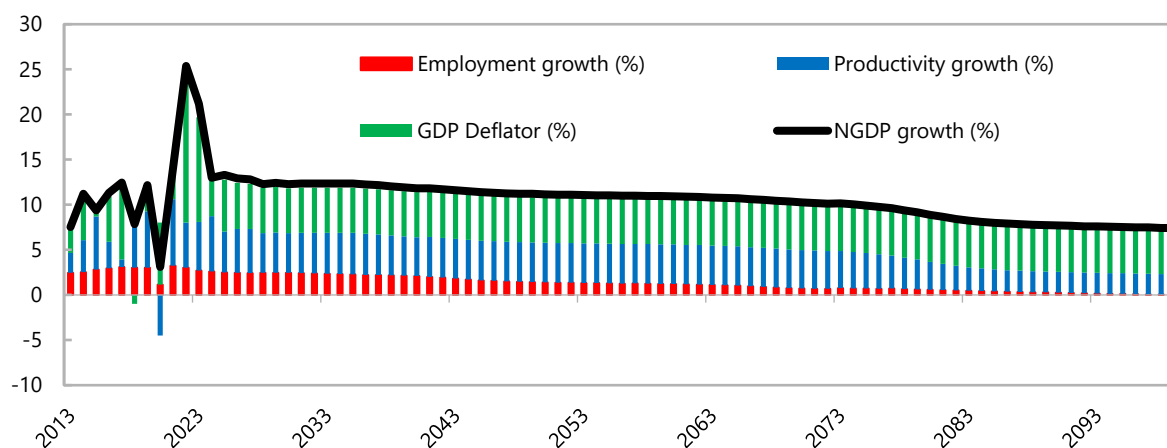
The analysis demonstrates the impact of four different scenarios of increasingly severe climate change impacts, against a baseline that reflects the continuation of the current economic and fiscal path in the absence of further climate change.

The scenarios are:

- **Baseline scenario:** the continuation of unchanged current economic and fiscal policies (business as usual) and observed climate trends. The key drivers of long-term economic growth are the economic fundamentals of growth in the working-age population and participation (the level of employment) and productivity (output per person). The decomposition of long-term growth is given in Chart 1.
- **Paris:** based on the SSP1-2.6 IPCC scenario and keeps global temperature increase above its pre-industrial level below 2°C at the end of the century.⁶
- **Moderate:** based on the SSP2-4.5 IPCC scenario. Global emissions continue increasing in line with the continuation of present trends and stabilize by the end of the century. This scenario assumes that climate mitigation policies continue along the observed trend, but countries do not take more aggressive actions to fulfill their Paris commitments.
- **High:** based on the SSP3-7.0 IPCC scenario. Rather than intensifying climate mitigation efforts, countries start scaling back their implemented policies in a world with limited energy efficiency improvements and continued use of fossil fuels.
- **Hot:** global emissions are as in the high scenario, but it uses the 90th percentile of temperature increases among all climate models that used SSP3-7.0 emissions, instead of the average temperature projection.

⁶ The IPCC calculates warming at the end of the century by comparing the 2081-2020 average temperature to the average temperature in the pre-industrial period. The increase in temperature for each scenario in this section is the IPCC “Best Estimate”, which is the average of the projected temperature increase over all climate models for a specific emission scenario.

Figure 7: *Decomposition of Nominal GDP Growth and Drivers*



Source: MINECOFIN

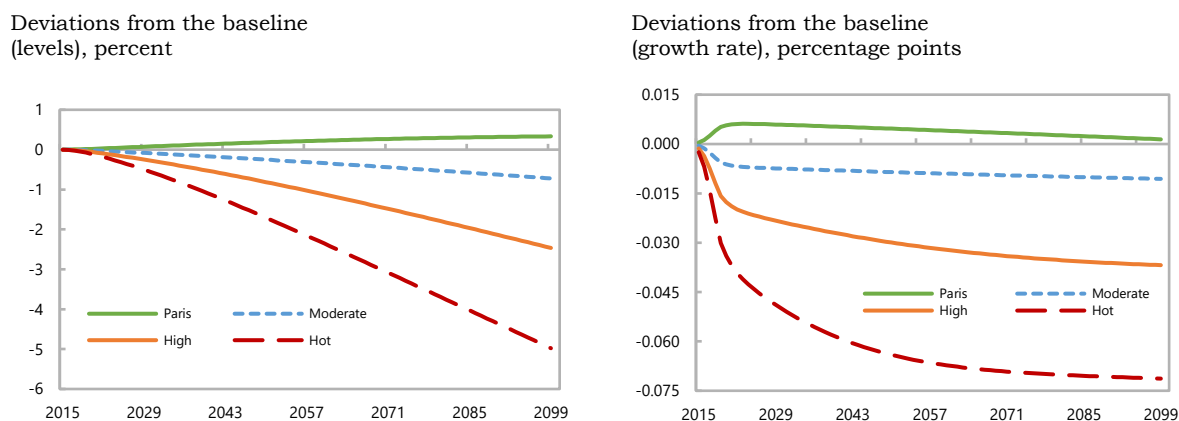
The impact of climate change reduces GDP growth through several transmission channels, with more severe climate impacts associated with larger reductions in GDP. Key transmission mechanisms include:

- **Higher depreciation of the public and private capital stock.** Higher and more volatile temperatures and changing precipitation will degrade roads, power transmission lines, machinery, and equipment, while floods and landslides can damage or destroy assets (as was the case in 2023's devastating flooding), all of which degrade the capital stock.
- **More frequent and severe climate-induced natural disasters.** Rwanda experiences floods, droughts, and landslides. Increases in the frequency and severity of these events would be expected to lead to more adverse economic outcomes.
- **Reduced hours worked and effort.** Hotter days can reduce productivity by reducing the number of days or hours employees can work effectively and may also result in worsening health outcomes (including increased spread of diseases such as malaria), although the impact would be expected to be relatively subdued given Rwanda's temperate climate.
- **Other longer-term effects on economic structure and productivity.** For example, in a relatively worse climate scenario, particular sectors can be adversely affected, such as high-value-added agriculture (reduction in yields) or tourism. As a country highly dependent on both sectors, this could have a significant impact in Rwanda.

Macroeconomic impacts of climate change

Apart from the Paris scenario, which sees a marginal improvement in GDP growth and level, under each of the climate change scenarios, there is a compounding reduction in annual GDP growth and the level of GDP. Under the hot scenario, GDP growth would decline by 0.07 percentage points a year, lower than baseline by 2073, which would compound to a level of GDP that is 3.2 percent lower than baseline by 2073 and 5 percent lower by 2100 (**Figure 8**).

Figure 8: Macroeconomic Effects of Climate Change

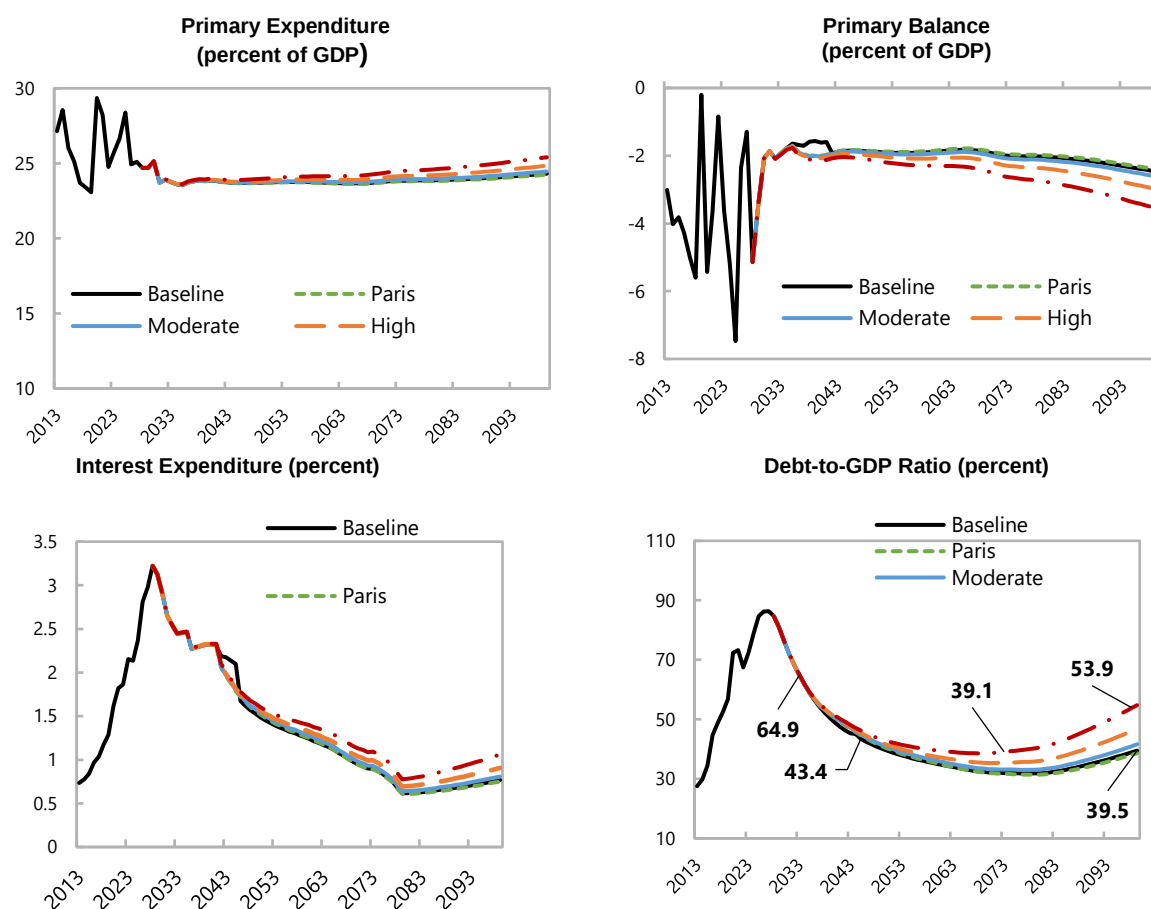


Source: MINECOFIN

Effects of climate change on fiscal projections

Based on an assumption of unchanged expenditure against baseline, and declining revenue in line with the lower levels of GDP, the primary deficit increases under each scenario except Paris, leading to an increase in net borrowing and the debt-to-GDP ratio. In line with the relatively modest impact on GDP, these adverse fiscal consequences remain relatively moderate (Figure 9), but would still require some fiscal adjustment to ensure finances remain on a sustainable path.

Figure 8: Effects of Climate Change on Fiscal Projections (2013-2099)



Source: MINECOFIN

Under the hot scenario, the primary deficit in 2075 increases to 2.7 percent of GDP from 2 percent of GDP under the baseline. The increase in the primary deficit leads to an increase in borrowing under all scenarios except Paris, and the debt-to-GDP ratio declines from 2033 below the current anchor of 65 percent. Under the hot scenario, the debt-to-GDP ratio reaches 39.1 percent of GDP by 2073, 7.1 percent of GDP higher than the baseline. The fiscal effects of climate change become more visible by the end of the century, where under the hot scenario, the primary deficit is 3.6 percent of GDP, 1.1 percent of GDP higher than the baseline, and the debt-to-GDP ratio would reach 54.8 percent, higher by 15.3 percent of GDP compared to the baseline.

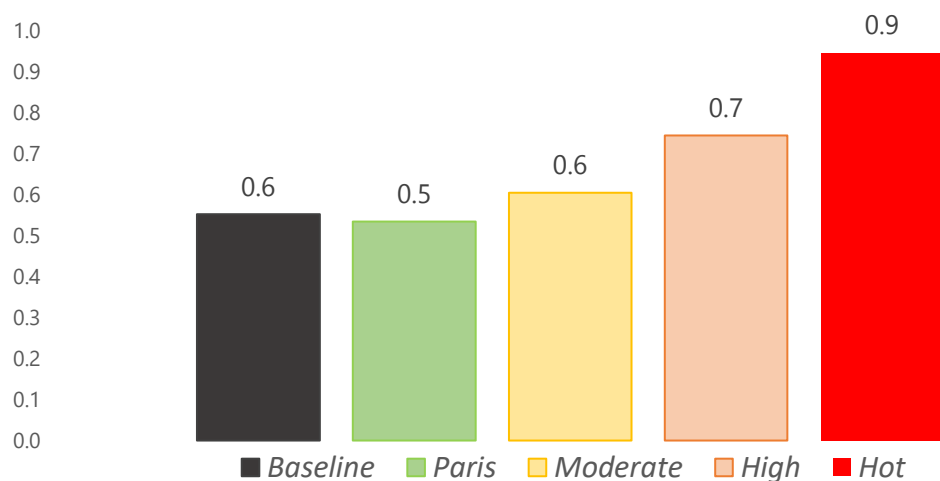
Under the hot scenario, the fiscal consolidation required would be 0.2 percent of GDP by 2075, rising to 0.9 percent of GDP by 2099 (Table 1). Adjustment of either expenditure or revenue through the projection period would reduce the end level of consolidation required.

Table 2: Recalibration requirements to stabilize the debt-to-GDP ratio

Debt Stabilizing Primary Balance	2025			2050			2075			2099		
	PB	PB*	PB Gap	PB	PB*	PB Gap	PB	PB*	PB Gap	PB	PB*	PB Gap
Baseline	-7.5	-6.5	1.0	-1.9	-2.5	-0.7	-2.0	-2.0	0.0	-2.5	-1.9	0.6
Paris				-1.9	-2.6	-0.7	-2.0	-2.0	-0.1	-2.4	-1.9	0.5
Moderate				-1.9	-2.6	-0.7	-2.1	-2.1	0.0	-2.6	-2.0	0.6
High				-2.0	-2.7	-0.6	-2.3	-2.3	0.1	-3.0	-2.3	0.7
Hot				-2.2	-2.7	-0.6	-2.7	-2.5	0.2	-3.6	-2.6	0.9

All in percent of GDP. PB = primary balance. PB* = debt-stabilising primary balance.
PB Gap = fiscal consolidation needed to stabilise the debt-GDP ratio.

Primary balance Gap 2099, %NGDP



Source: MINECOFIN

Specific Fiscal Risks

Specific fiscal risks arise from the exposure of the government budget to natural hazards and climate change risks. A specific risk relates to a situation that may or may not occur, but if it did could adversely affect the government's assets and liabilities and its spending and revenues.

There are two key types of fiscal risks of concern:

- **Direct physical risks**, for example, landslides causing damage to key public infrastructure. These risks can be acute because of extreme weather events, or chronic because of gradual changes to the environment that could increase the number or severity of natural hazards.

- **Transition risks** that may arise when transitioning to a carbon-neutral economy, which could affect the value of government assets, and the potential need for support to adjust operations to climate-neutral production, outside of current transition plans.

While the overall fiscal risks from the macroeconomic effects of climate change are expected to be relatively modest, at least over the next 30 years, the impact from specific fiscal risks could be significant. These risks are already being felt with unprecedented amounts of rain falling on 2-3 May 2023, causing devastating flooding and landslides that cost lives, and damaged homes, infrastructure, and livelihoods.

Rwanda is particularly subject to floods and landslides (in the Western and Northern regions), and to a lesser extent, prolonged dry spells and drought in the Eastern region. Other climate-related hazards, such as wildfires and extreme temperatures, are considered a lesser risk in Rwanda.

These events can have a severe impact on government-owned assets and finances, for example through the destruction or impairment of those assets (either those that are directly owned, like the roads network, or that are owned through SOEs and PPPs, like the power and water/sanitation sectors), and through a requirement for government to support affected communities. These channels of fiscal risk have all been experienced over the past year as a consequence of the severe flooding and landslides in May 2023.

Direct Risks

Transport infrastructure is probably the most significant source of climate-related fiscal risk in Rwanda. The Government is responsible for Rwanda's [12,000] kms of roads, of which over [1,000 kms are paved. The road network is particularly vulnerable to landslides during periods of heavy rainfall and flooding. In the May 2023 floods, damaged infrastructure included 20 national roads, 21 district roads, and 47 bridges, with transport infrastructure accounting for 60 percent of the overall estimated loss and damage. The cost of reconstruction and improving climate resilience falls to the government, with financial and other support from development partners.

Agriculture accounts for almost two-thirds of employment in Rwanda. Agricultural production and assets are at risk from flooding and landslides, prolonged dry seasons, and drought. The May 2023 flooding and landslides caused tremendous damage to both crop and livestock farming. Support for those affected included foodstuffs, seeds and fertilizers, livestock restocking, and rehabilitation of damaged infrastructure. Material costs have fallen to the government, with support from development partners.

SOEs & PPPs

All public investments are financed through the government development budget, with a portion allocated to fund Public Corporations' capital stock. These corporations play a crucial role in delivering and operating critical infrastructure and services, despite many of them exhibiting poor financial performance. Climate change can be expected to

exacerbate the fiscal risk posed to the government. This is especially the case for the energy and water sectors, where SOEs dominate production and supply. Weak financial performance of an SOE (as noted in section III) is likely to increase the fiscal risk to the government as the SOE is less likely to be able to absorb climate-related shocks.

Seven key sectors have been identified as being subject to climate change risk. These are energy, water and sanitation, transport, agriculture, tourism, construction, and health. Measured by the size of SOEs' balance sheets, the SOE sector is dominated by three sectors: transport (RwandAir and airports), energy (Rwanda Energy Group), and tourism (Prime Holdings and Ultimate Concepts). The water and sanitation sector (WASAC) is comparatively small, but remains a significant fiscal risk given its role as a critical utility and poor financial performance. As described in section III, PPPs are dominated by power purchase agreements in the energy sector, which account for 54 out of 59 PPPs and \$2.1bn out of \$2.3bn of project value associated with PPPs. Table 2 provides details of the main SOEs operating in each sector, key climate change risks, financial exposure, and climate and fiscal risk mitigation measures.

Overall, among the 10 State-Owned Enterprises (SOEs) analyzed, REG and WASAC are the most exposed to climate-related risks. Their operations would be significantly disrupted by common climate shocks, such as floods, landslides, and droughts.

The other SOEs listed in Table 3 are less vulnerable to climate events. This is either because they have mitigation systems in place (e.g., Bella Flower, Gabiro Agri Holding) or because their direct exposure to climate events can be relatively contained through the implementation of specific resilience and adaptive measures (e.g., ATL & RwandAir, Prime Holdings, RITCO, and King Faisal Hospital).

Regarding Public-Private Partnerships (PPPs), they are mainly concentrated in the energy sector. The climate-related fiscal risks associated with PPPs are equally high due to the high climate risk exposure observed in the energy sector.

Table 3: Specific Climate Change Fiscal Risks from SOEs and PPPs

Sector	SOEs / PPPs	Climate impact	Exposure	Risk management measures	
Energy	REG (Electricity generation, distribution and sales)	<i>Flood, landslides and drought:</i> Hydro dominated power generation is at risk of both floods and drought which impair the ability to produce energy due to siltation or loss of reservoir storage capacity. Alternative energy sources such as peat are unable to be harvested during flooding. Structural damage to dams, hydro plants and transmission and distribution assets can occur during flooding and landslides.	SOE fixed assets: FRW bn 1,017.4 (5.4% of GDP) Total borrowings: RWF bn 254.6 (1.4% of GDP), of which guaranteed debt RWF bn 14 (0.1% of GDP).	<i>Climate risk reduction:</i> Expansion of the hydro network through IPPs (which will double existing hydro generation capacity) will reduce risks by raising the share of renewables generation and reducing the average unit cost across all generation capacity. <i>Fiscal risk reduction:</i> The ability to access electricity from the East Africa interconnector reduces the need to use high-cost alternative power sources	high
	Energy PPPs	<i>Flood, landslides and drought</i> The vast majority of PPPs in Rwanda are in the energy sector through Independent Power Producers (IPPs) and Power Purchasing Agreements (PPAs), most of which are involved in hydropower production. These are subject to the same risks as own-source generation above.	Total PPA project values: FRW 2251.37 bn (14.7% of GDP)	<i>Climate risk reduction:</i> Development of dams and infrastructure design to increase resilience to drought and mitigate flood risks. Tree planting in key areas to mitigate risk of landslide and siltation. <i>Fiscal risk reduction:</i> PPAs only require payment for power produced, which limits fiscal exposure to PPAs where domestic generation is unavailable.	Medium
Water	WASAC (Water and sanitation generation, distribution and sales)	<i>Flood, landslides and drought</i> Floods and landslides result in damage to operations through reducing available water or requiring additional purification at higher cost. Both can also cause damage to infrastructure, including treatment plants and distribution assets.	SOE fixed assets: FRW bn 249.8 (1.3% of GDP) Total debt: RWF bn 134.00 (0.7% of GDP)	<i>Climate risk reduction:</i> a climate resilience and action plan has been developed. measures taken include to develop Contingency plans for disasters, developing and implementing a risk-based asset management system, protection of priority assets (intake structures, pumping stations and conveyance pipes) against climate hazards and revising and adhering to design norms and standards. <i>Fiscal risk reduction:</i> Improving profitability through improving the distribution network to reduce non-revenue water losses, which would reduce overall fiscal risk.	

	WASAC – Kigali Bulk Water PPP	Flooding means Kigali Bulk Water cannot produce water.	Total PPP project valued at RWF 75.5 bn	<i>Fiscal risk reduction:</i> Purchase agreement already structured to minimize risk from variable output.	Medium
Health	KFHR (Referral and teaching hospital)	<i>Disease</i> Exposed via vector-borne diseases that could become more prevalent due to climate change. Fiscal risk because services are provided at a loss. <i>Natural hazards</i> Drought causing water scarcity or poor water quality can affect vital hospital operations. High temperatures can cause heat stress for patients and affect patient care.	SOE fixed assets: FRW bn 33 (0.18% of GDP) Total debt: RWF bn 9 (0.05% of GDP)	<i>Climate risk reduction:</i> Improve operations to make it climate resilient including water conservation and green building design in construction of the expansion. <i>Fiscal risk reduction:</i> KFHR to opt for a disaster risk transfer mechanism such as insurance.	Low
Transport	Rwandair (Air transport provider)	<i>Natural hazards</i> Climate events such as increased turbulence, higher temperatures and severe precipitation affect airline operations, damaging assets and leading to increased costs. Increased climate events could disrupt tourism related activities. <i>Regulatory environment</i> International regulations to address climate change and greenhouse gas emissions may lead to higher costs for fuel and other operating expenses and reduce demand for air travel.	SOE fixed assets: FRW bn 152.5 (0.8% of GDP) Liability: RWF bn 616.5 (3.3% of GDP) in borrowings, FRW bn 323 in other liabilities. FRW bn 25 in guaranteed loans.	<i>Climate risk reduction:</i> Mitigate the impact of natural hazards on operations through investing in climate resilient infrastructure to reduce weather related disruptions, investing in fuel efficient technologies and diversifying routes and operations. <i>Fiscal risk reduction:</i> Strengthen fiscal performance through cost reduction, diversifying revenue streams, accessing insurance and consideration of fuel hedging.	Medium
	ATL/ Airport	<i>Natural hazards</i> Climate events such as temperatures, precipitations and winds affect airport infrastructure and operations, leading to increased costs. Wider effect on natural environment could reduce demand for tourism related travel. <i>Regulatory environment</i> International regulations to address climate change and greenhouse gas emissions may lead to higher costs for fuel and other operating expenses and reduce demand for air travel.	SOE fixed assets: FRW bn 411 (2.69% of GDP) Liability: RWF bn 363 (2.38% of GDP) in guaranteed loans.	<i>Climate risk reduction:</i> Mitigate the impact of natural hazards on airports infrastructure and operations through investing in climate resilient infrastructure to reduce weather related risks. <i>Fiscal risk reduction:</i> Strengthen fiscal performance through cost reduction, diversifying revenue streams, accessing insurance and consideration of fuel hedging.	Medium
	RITCO (Rural bus service provider)	<i>Flooding and landslides</i>	SOE fixed assets: FRW bn 12.9 (0.08% of GDP)	<i>Climate risk reduction:</i> Explore options to upgrade vehicle fleet to reduce carbon emissions and dependency on	Low

		Damage to roads and bridges disrupts bus operations and revenue. Increased maintenance and repair costs for bus fleet.	Long-term liability: RWF bn 10.1 (0.05% of GDP)	fossil fuels. To benefit from government efforts to strengthen transport infrastructure and reduce risk of flooding and landslides (especially in north and western part of Rwanda). <i>Fiscal risk reduction:</i> Explore options to diversify revenue streams and access insurance options for climate related events.	
Tourism	Prime Holding (Provision of hotel and other buildings to promote tourism)	<i>Degradation of natural environment</i> Extreme weather events and environmental degradation limit the appeal of tourism destinations, which is particularly critical for Kenya natural environmental resources are a key driver for tourism. This leads to decreased visitor numbers and revenue. <i>Floods and landslides</i> Some PHL properties are at more at risk of structural damage from these events (e.g. Serena Kivu due to its low-lying aspect and lake proximity). <i>Disease</i> Higher incidence of vector-borne diseases would reduce tourism demand.	SOE fixed assets: FRW bn 265.03 (1.4% of GDP) Total debt: RWF bn 19 (0.10% of GDP)	<i>Climate risk reduction:</i> Improving building resilience to extreme weather events and investment in flood prevention mechanisms, and mitigating risk of vector borne diseases through improving ventilation and pest control. Concentration on business related events reduces risk from any climate-related tourism downturn. <i>Fiscal risk reduction:</i> Explore options to diversify revenue streams and access insurance options for climate related events.	Medium
Construction	Horizon Construction (Construction for infrastructure development including road, housing, energy and water resources)	<i>Flooding and landslides</i> Construction is vulnerable to these events which can disrupt construction schedules, damage infrastructure and increase project costs. Globally other climate events can disrupt supply chains. This can lead to project delays and increased costs. <i>Regulatory environment</i> Changing rules to provide for climate resilient design and work practices can increase costs. Higher cost of insurance due to increased frequency of climate related events.	SOE fixed assets: FRW bn 9.4 (0.01% of GDP) Long-term liability: RWF bn 37.9 (0.2% of GDP)	<i>Climate risk reduction:</i> Strengthen capacity to deliver climate resilient infrastructure and incorporate design and cost into contract. <i>Fiscal risk reduction:</i> Explore options to diversify revenue streams and access insurance options for climate related events.	
Agriculture	GAKO Meet Company Ltd (GMC) (cattle farming and beef production and crop production)	<i>Drought</i> Bugesera district where GMC is located is mainly vulnerable to drought, affecting the productivity of both cattle and crops <i>Flooding</i>	GAKO fixed assets: FRW bn 16 (0.09% of GDP) Liabilities: FRW	<i>Climate risk reduction:</i> GMC has Invested in resilient infrastructures such as irrigation systems, roads and electricity network	Low

		Gako being a low land area is vulnerable to flooding in the event of frequent and intensity of heavy rainfall, damaging infrastructure such as irrigation systems, roads, and other facilities. The region is also vulnerable to storm winds as well.	bn 2.6 (0.02% of GDP)	to mitigate the effects of climate change. <i>Fiscal risk reduction:</i> GMC has an Insurance cover in case of extreme weather events. Access is also available to disaster risk financing such as Africa Disaster Risk Financing (ADRF) and National Agricultural Insurance Scheme.	
Gabiro Agri Hub (Provision of ‘ready-to-farm’ land for agribusiness)	<i>Drought</i> Assets in the Eastern Province where Gabiro is situated are vulnerable to drought, which affects water availability for irrigation and hence agricultural productivity. Higher temperatures increase the deterioration of roads, buildings and other agricultural infrastructure. <i>Flooding</i> Increased frequency and intensity of heavy rainfall can lead to flooding, damaging infrastructure such as irrigation systems, roads, and storage facilities.	SOE fixed assets: FRW bn 93 (0.5% of GDP) Total liability (short-term liabilities): RWF bn 8.3 (0.04% of GDP)	<i>Climate risk reduction:</i> GAHL has Invested in resilient infrastructures such as dams, canals, irrigation systems, roads and electricity network to mitigate the effects of climate change. <i>Fiscal risk reduction:</i> Insurance coverage has been purchased in case of extreme weather events. Access is also available to disaster risk financing such as Africa Disaster Risk Financing (ADRF) and National Agricultural Insurance Scheme.	Low	
Horizon Sopyrwa (production and commercialization of pyrethrum, seeds and oil products)	<i>Flooding</i> Agricultural Assets in northern part of Rwanda are vulnerable to frequent and heavy rainfall that causes landslides, flooding and soil erosion poses significant threat to SOPYRWA crops and assets	SOE fixed assets: FRW: bn 23.2 (0.2% of GDP) Liabilities: FRW 5.2 bn (0.12% of GDP)	<i>Climate risk reduction:</i> SOPYRWA has developed agriculture infrastructures, including green houses to mitigate the impact of the climate change. The company is currently pursuing ISO 14000 certification, thus adhering to international standards related to environmental management. <i>Fiscal risk reduction:</i> SOPYRWA has got an Insurance cover in case of extreme weather events. Access is also available to disaster risk financing such as Africa Disaster Risk Financing (ADRF) and National Agricultural Insurance Scheme.	Low	

IV. SPECIFIC RISKS AND CONTINGENT LIABILITIES⁷

1. Public Corporations

There are currently 32 public corporations, comprising 27 non-financial corporations and 5 financial corporations, as listed in the table below. These entities play a crucial role in executing the government's socio-economic policies and strategies. Government business enterprises operate across various sectors and are exposed to diverse types of risks.

Table 4: Public Corporations Classification

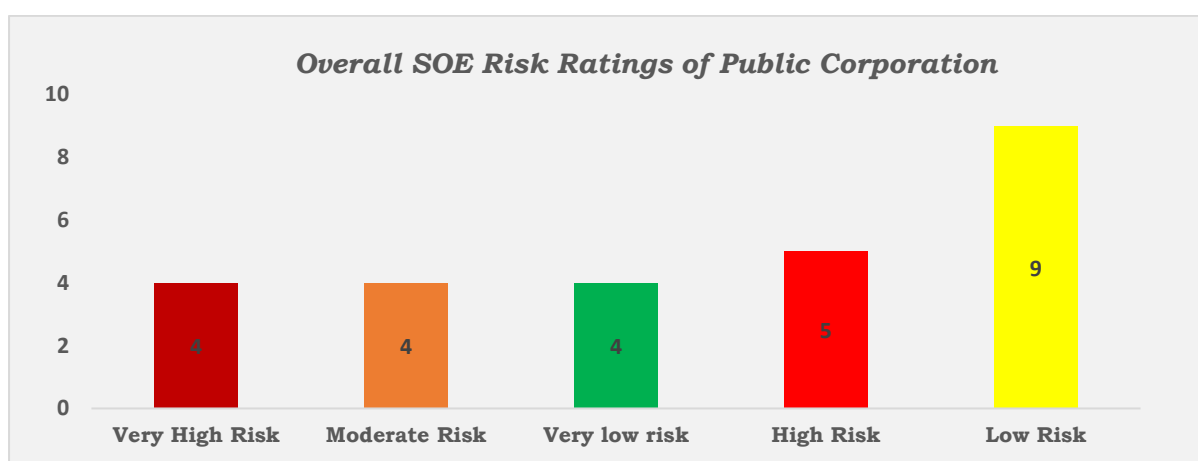
Non-Financial Public Corporations	27
Non-commercial Public Institution	2
State-Owned Companies	25
Special Organs	0
Financial Public Corporations	5
Non-commercial Public Institution	1
Commercial State-Owned Companies	1
Special Organs	3
Total	32

Source: Portfolio oversight

1.1 Health Check: General overview of Public Corporations' risk ratings

Performing health checks on Public Corporations helps assess the fiscal risk exposure of state-owned companies. This assessment involves examining the financial performance and position of these entities to assess their overall financial health. Through such evaluations, a comprehensive picture of Government investment risk exposure is depicted, encompassing both collective and individual enterprise analysis.

Figure 9: Public Corporations risk rating⁸



Source: SOEs Health Check

⁷ Contingent Liabilities are obligations that arise or are triggered by discrete but uncertain future events that may or may not occur in the future. Realisation of these risks may require the Government to make substantial and unexpected payments.

The figure above illustrates the comprehensive risk ratings. Each enterprise's risk exposure is evaluated across various categories, including profitability, solvency, and liquidity, resulting in an overall risk assessment. Among the companies examined, four enterprises were classified as having very low risk, nine as low risk, four as moderate risk, five as high risk, and four as very high risk.

It is crucial to note that the health check revealed that the five enterprises rated as high risk and the four rated as very high risk often exhibit very high risk across multiple scrutinized categories, such as liquidity, solvency, and profitability. Therefore, a more thorough examination has been conducted to understand the underlying causes of these risks and recommended appropriate remedial actions.

Health Check: Sectoral Analysis

At the sector level, the table below demonstrates that losses, debt accumulation, and liquidity challenges are predominantly concentrated in the transport, infrastructure, health, and agribusiness sectors.

Table 5: States Owned Enterprises Sectoral analysis

Sector	SOE	Profitability		Liquidity		Solvency	
		Return on Assets	Return on Equity	Current Ratio	Quick Ratio	Debt to Assets	Debt to Equity
Transportation	ATL	-5%	-54%	74%	74%	92%	1096%
Infrastructure/Utility	WASAC	0%	1%	66%	53%	70%	229%
	REG	-4%		0.9	0.6	109%	
Health	KFHR	-7%	-55%	37%	31%	87%	657%
Agribusiness	GAHL	-2%	-2%	9%	8%	9%	10%

Source: Portfolio Oversight

Health Check: Quasi-fiscal activities

Table 6: Public Corporations with quasi-fiscal activities (billion Frw)

		2020	2021	2022	2023	2024
Rwanda Energy Group	Total Revenue	148.9	155.4	177.7	230.9	257.1
	Government Grants Received	39.9	36	42.7	53.2	63.9
	GoR Contribution (%)	27%	23%	24%	23%	25%
Water and Sanitation Corporation	Total Revenue	35.8	37.7	38	42	46
	Government Grants Received	13.9	13.6	7.9	8.6	9.9
	GoR Contribution (%)	39%	36%	21%	20%	22%
RwandAir	Total Revenue	300	271	341	465.2	545.8
	Government Grants Received	132	146	144	144.1	146.6
	GoR Contribution (%)	44%	44%	42%	31%	27%
Aggregate	Total Revenue	484.7	464.1	556.7	738.1	848.9
	Government Grants Received	185.8	195.6	194.6	205.9	220.4
	GoR Contribution (%)	38%	42%	35%	28%	26%

Source: portfolio oversight

The infrastructure sector, encompassing energy and transport, along with key state-owned companies such as Rwanda Energy Group (REG), Rwandair, and Water and Sanitation Corporation, receives significant government subsidies and grants owing to their pivotal role in the country's development.

It's noteworthy that these highlighted state-owned companies are progressively reducing their fiscal risks by augmenting their own revenues. Particularly, Rwandair saw a substantial increase in its revenues by 17%.

1.2. Forward-looking assessment (Stress test)

In response to the concerning financial health highlighted in the recent State-Owned Enterprises (SOEs) health checks, which provide a backward-looking assessment, a forward-looking analysis was initiated through a comprehensive stress testing exercise.

This assessment provides a forward-looking assessment of the resilience of the SOE's financial position under a range of alternative scenarios. Five SOEs, namely: King Faisal Hospital Rwanda, Rwanda Energy Group, Water and Sanitation Corporation, Muhabura Multichoice Company, and AfriPrecast, were examined. The analysis included financial forecasting to assess how these entities would perform under combined macroeconomic shocks, including fluctuations in foreign exchange rates, interest rates, and GDP growth.

1.2.1. King Faisal Hospital Rwanda

Using the health check tool, King Faisal Hospital Rwanda (KFHR) was assessed and classified as a high-risk entity. An analysis of the institution's financial data over the past years revealed significant vulnerabilities in profitability, liquidity, and solvency, raising concerns about its overall financial sustainability. As a result, a forward-looking stress test was conducted. Under a combined macroeconomic shock scenario, KFHR's financial outlook is characterized as follows:

Table 7: KFHR risk rating

Shock Scenario		Actuals			Projections			
RATIO ANALYSIS		2022	2023	2024	2025	2026	2027	2028
Liquidity	Quick ratio	Very high risk	Very high risk	High risk	Very high risk	High risk	Moderate risk	Low risk
	Current ratio	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Moderate risk
Profitability	EBITDA margin	High risk	High risk	Moderate risk	Moderate risk	Low risk	Low risk	Low risk
	Net profit margin	Very high risk	Very high risk	High risk	Very high risk	High risk	High risk	Low risk
	ROE	Very high risk	Very high risk	Low risk	Very high risk	Moderate risk	Low risk	Very low risk
	ROA	High risk	High risk	Moderate risk	High risk	Moderate risk	Moderate risk	Very low risk
Solvency	Debt to Assets	Moderate risk	Moderate risk	High risk	Moderate risk	Moderate risk	Moderate risk	Moderate risk
	Debt to Equity	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	High risk
	Debt to EBITDA	Very high risk	Very high risk	Very high risk	Very high risk	High risk	High risk	Moderate risk
	Interest Coverage	Very low risk	Very low risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk
Overall Risk Rating		High risk	High risk	High risk	Very high risk	High risk	High risk	Moderate risk

Source: SOEs Fiscal Risk Assessment

❖ Summary of risk analysis

Key risk	Current Status		Forecast Status	
Profitability		Weak, with persistent losses		Expected to deteriorate further without increased revenues generation
Solvency		Weak, with rising debt and declining equity		High risk of financial distress without restructuring
Liquidity		Poor, dependent on government transfers		Expected to worsen unless reforms are introduced

❖ Main risks and Mitigation measures

KFHR faces growing financial strain due to revenue constraints and rising costs. Likelihood of occurrence (High)

The hospital's tariffs have remained unchanged despite increasing operational expenditures, creating a widening gap between revenue generation and service provision costs. Additionally, delays in insurance reimbursements and government payments further exacerbate financial instability. Without strategic interventions, revenue shortfalls will continue to pressure the hospital's financial sustainability.

Mitigation/policy measure

Revenue and Cost Pressures

- Generating more revenues, including considering tariff differentiation, and going with high-quality medical services.
- Implementation of **cost efficiency measures** (procurement from manufacturers, outsourcing non-core activities to service providers, and implementing strong internal controls).
- Consider more frequent review of tariffs given the cost-of-service provision.

KFHR's liquidity position remains fragile, with increasing dependence on government transfers to meet short-term and long-term obligations. Likelihood of occurrence (High)

The hospital struggles to maintain sufficient cash flow due to the misalignment of revenue inflows and operating expenses. As debt obligations rise and short-term financing becomes more constrained, liquidity risks are expected to intensify, threatening the hospital's ability to sustain uninterrupted service delivery.

Mitigation/policy measure

Liquidity and Debt Repayment Risks

- The government is to establish a **sustainable funding model** for the hospital.
- Assess potential tariff adjustments and exploration of increased revenue streams

- Improved **financial management and operational efficiency** (optimization of hospital operations, streamlining processes, and reducing non-essential expenses)
- Exploring **long-term financing mechanisms**. to reduce reliance on government transfers.

1.2.2. Rwanda Energy Group (REG)

The health check for the financial year ended June 2023 assessed and classified REG as a high-risk entity. An analysis of the institution's three-year financial data exposed risk exposures related to profitability, liquidity, and solvency, prompting concern about its overall financial health. As a result, a forward-looking stress test was conducted. Under a combined macroeconomic shock scenario, REG's financial health is as illustrated below.

Table 8: REG risk

Shock Scenario		Actuals				Projections			
RATIO ANALYSIS		2021	2022	2023	2024	2025	2026	2027	2028
Liquidity	Quick ratio	Moderate risk	Low risk	Moderate risk	Very high risk	High risk	Moderate risk	Low risk	Very low risk
	Current ratio	Moderate risk	Moderate risk	High risk	Very high risk	Very high risk	High risk	Moderate risk	Low risk
Profitability	EBITDA margin	Moderate risk	High risk	Very high risk	Very high risk	High risk	High risk	Moderate risk	Low risk
	Net profit margin	High risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Moderate risk
	ROE	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk
	ROA	Moderate risk	High risk	High risk	High risk	High risk	High risk	High risk	Moderate risk
Solvency	Debt to Assets	High risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk
	Debt to Equity	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk
	Debt to EBITDA	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk
	Interest Coverage	Very high risk	Moderate risk	Very low risk	Low risk	Very high risk	Very high risk	Very high risk	Very high risk
Overall Risk Rating		High risk	High risk	High risk	Very high risk	Very high risk	Very high risk	High risk	High risk

Source: SOEs Fiscal Risk Assessment

❖ Summary of risk analysis

Key risk	Current Status		Forecast Status	
Profitability		The profitability of REG has persistently deteriorated despite Government support in terms of grants and/or subsidies, which in 2023, accounted for about 25% of the total revenues. The company's negative profitability is mainly triggered by the high costs for the purchase of electricity, and the accumulated losses led to equity decline in negative from 2022 onwards.		Continuous negative profitability is expected, and dependence on grants and subsidies would be maintained, without which the group would not survive, and if the cost of electricity generation is not reduced, or the tariff is not revised upward, the company's profitability would even worsen. The group's shareholders' equity would continue to decline, and hence, financial sustainability is unassured, and severe financial distress is expected if no intervention is made.
Solvency		High solvency risk with high ratios and with negative equity,		The solvency of REG would keep deteriorating unless critical financial reforms and/or

		the company's solvency is at risk.		restructuring are made and implemented.
Liquidity	●	Liquidity position remains moderate, supported by government grants and new loan tranches.	●	The liquidity position of REG is expected to progressively improve

❖ **Main risks and Mitigation measures**

REG's overall performance is projected to remain challenging. This outlook is based on the anticipated continued decline in solvency and profitability, while liquidity is forecasted to improve gradually. This trend holds for both the baseline and shock scenarios.

Insolvency Risks [High]

Due to the high cost of electricity, the company consistently incurs losses, leading to negative equity. As a result, it relies on financial transfers from the government to keep its operations running; without this support, it could be considered insolvent.

Mitigation/policy measure

Revenues

- Keep notifying relevant authorities about the review of tariffs to reflect all costs of power production
- Improved Government subsidies to offset revenue losses from low tariffs
- Exploring diversification of revenues streams that can reduce reliance on government support.
- Explore the use of alternative cheaper sources of energy

Costs

- Renegotiating certain Power Purchase Agreements (PPAs) where feasible
- Restructuring loans
- Explore currency hedging strategies to reduce forex losses through use of forward contracts with suppliers.

Liquidity risk (Moderate).

The company receives grants and other transfers from the government annually, providing short-term liquidity. However, given the group's low profitability and high leverage, this approach is not sustainable in the long run.

Mitigation/policy measure

The government might consider implementing a recapitalization program alongside initiatives to enhance revenue generation and address operational inefficiencies, ensuring long-term financial sustainability for the group.

1.2.3. AFRIPRECAST

AfriPrecast's health check analysis classified it as a high-risk entity. An analysis of the institution's three-year financial data revealed vulnerabilities in profitability, liquidity, and solvency, prompting concern about its overall financial health, which led to do a stress test, a forward-looking assessment was conducted. Under a combined macroeconomic shock scenario, AfriPrecast's financial health is demonstrated as below:

Table 9: REG risk ratings

Shock Scenario		Actuals				Forecasts			
RATIO ANALYSIS		2021	2022	2023	2024	2025	2026	2027	2028
Liquidity	Quick ratio	Very high risk	Very high risk	Very high risk	Moderate risk	Very low risk	Very low risk	Very low risk	Very low risk
	Current ratio	Very high risk	Very high risk	Very high risk	Very high risk	Moderate risk	Low risk	Very low risk	Very low risk
Profitability	EBITDA margin	Very high risk	Very high risk	Very high risk	High risk	Moderate risk	Moderate risk	Low risk	Low risk
	Net profit margin	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	High risk	Moderate risk	Low risk
	ROE	Very high risk	Very high risk	Very high risk	Very high risk	Moderate risk	Very high risk	Very high risk	Very high risk
	ROA	Very high risk	Very high risk	Very high risk	High risk	High risk	Moderate risk	Moderate risk	Moderate risk
Solvency	Debt to Assets	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk
	Debt to Equity	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk
	Debt to EBITDA	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk
	Interest Coverage	Very Low risk	High risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk
Overall Risk Rating		Very high risk	Very high risk	Very high risk	Very high risk	High risk	High risk	High risk	Moderate risk

Source: SOEs Fiscal Risk Assessment

❖ Summary of fiscal risk analysis

Key risk	Current Status		Forecast Status	
Profitability	●	AfriPrecast has been loss-making for several years, with limited possibilities to expand its revenues and improve its margins.	●	Profitability is likely to stay at risk, except if the company is able to find additional projects or develop new business lines.
Solvency	●	AfriPrecast has negative equity and is relying on the Government to cover its loan repayment.	●	With negative equity, the solvency position of AfriPrecast is projected to remain unsustainable going forward, except if some capital injection is made by the Government.
Liquidity	●	Liquidity has deteriorated, as AfriPrecast does not receive enough liquidity from its operating activities.	●	The forecast indicates some improvement in the liquidity position

❖ Main risks and Mitigation measures

Expenditure and revenue risks. Likelihood of occurrence (High)

Increasing costs of goods sold and a weak pipeline of projects significantly impact AfriPrecast's profitability.

Mitigation/policy measure
Expenditure and capital investment ❖ Reassess the business model to align to market needs and forces and implement turnaround strategies ❖ Redesigning competitive products ❖ Implementing efficient procurement measures, considering bulk buying to limit the costs of materials. ❖ Improvement of raw materials sourcing ❖ Limit labour costs through project-based employment (and project-based remuneration) and reducing excess labour. ❖ Improved cost monitoring ❖ Improvement of project identification and selection
Revenues ❖ Identification of new / more profitable projects ❖ Development of new lines of revenue

Liquidity and debt repayment risks. Likelihood of occurrence (High)

AfriPrecast has hit its maximum debt capacity and is struggling to generate sufficient revenue to cover operational costs or meet its loan repayment obligations

Mitigation/policy measure
Debt repayment and further arrears: ❖ Implementing a turnaround strategy ❖ Development of new projects / new business lines to improve operating revenues and support financing costs.

1.2.4. Muhabura Multichoice Company Ltd. (MMC Ltd.)

Muhabura Multichoice Company (MMC) was evaluated using the health check tool, which identified it as a high-risk entity. A review of the company's financial performance over the past three years revealed significant weaknesses in profitability, liquidity, and solvency, raising concerns about its financial stability. In response, a forward-looking stress test was undertaken to assess the company's resilience under adverse conditions. Under a combined macroeconomic shock scenario, MMC's financial outlook is outlined as follows:

Table 10: MMC risk ratings

Shock Scenario									
RATIO ANALYSIS		Actuals				Forecasts			
		2021	2022	2023	2024	2025	2026	2027	2028
Liquidity	Quick ratio	High risk	Moderate risk	Moderate risk	Low risk	Moderate risk	Moderate risk	Low risk	Very Low risk
	Current ratio	High risk	Very high risk	High risk	Moderate risk	High risk	High risk	High risk	Moderate risk
Profitability	EBITDA margin	Very high risk	Very high risk	Moderate risk	Low risk	Low risk	Very Low risk	Very Low risk	Very Low risk
	Net profit margin	Very high risk	Very high risk	High risk	Very Low risk	Very Low risk	Very Low risk	Very Low risk	Very Low risk
	ROE	Very high risk	Very high risk	Very Low risk	Very Low risk	Very Low risk	Very Low risk	Very Low risk	Very Low risk
	ROA	Very high risk	Very high risk	Moderate risk	Very Low risk	Very Low risk	Very Low risk	Very Low risk	Very Low risk
Solvency	Debt to Assets	Moderate risk	High risk	High risk	Moderate risk	Low risk	Very Low risk	Very Low risk	Very Low risk
	Debt to Equity	Very high risk	Very high risk	Very high risk	Very high risk	Low risk	Very Low risk	Very Low risk	Very Low risk
	Debt to EBITDA	Very high risk	Very high risk	Very high risk	Moderate risk	Very Low risk	Very Low risk	Very high risk	Very high risk
	Interest Coverage	Very Low risk		Very high risk					
Overall Risk Rating		High risk	Very high risk	High risk	Low risk	Low risk	Low risk	Low risk	Low risk

Source: SOEs Fiscal Risk Assessment

❖ Summary of risk analysis

Key risk	Current Status		Forecast Status	
Profitability	●	Profitability has improved, but is at a low level. Improving revenues needs to be confirmed, while costs should be properly managed.	●	Profitability should improve in the coming years, benefiting from a favorable economic environment (provided costs are contained and there are no adverse shocks, such as droughts). This also depends on the effectiveness of the restructuring plan (refocusing business lines).
Solvency	●	Solvency has deteriorated, given the new loan and low profitability.	●	As profitability improves, the solvency situation of MMC should also improve, barring any new loans (e.g., for investment purposes).
Liquidity	●	Liquidity situation is deteriorating, suffering from a low level of receivables collection, and negatively impacting working capital	●	Liquidity risks are expected to remain low, highlighting the need for specific measures to be put in place (e.g., improvement of receivables collection).

❖ Main risks and Mitigation measures

Expenditure and revenue risks. Likelihood of occurrence (Medium)

MMC operates multiple business lines; however, its revenue generation and operational efficiency have proven to be unsustainable.

Mitigation/policy measure

Expenditure and capital investment

- ❖ A study is currently underway to explore potential restructuring options aimed at improving the company's performance and long-term sustainability.
- ❖ Bulk buying to limit costs
- ❖ Improvement of raw materials sourcing
- ❖ Improved monitoring and evaluation of cost efficiency
- ❖ Improvement of project identification and selection

Revenues

- ❖ Refocus activity (current restructuring plan) and increase production activities in the main business lines
- ❖ Identification of alternative and more profitable uses of land

Liquidity and debt repayment risks. Likelihood of occurrence (High)

Mitigation/policy measure

Debt repayment and further arrears:

- ❖ Improve recovery strategy.
- ❖ Loan renegotiation

1.2.5. Water and Sanitation Corporation (WASAC)

Using the health check tool, WASAC was assessed and classified as a high-risk entity. An analysis of the institution's financial data over the past years revealed significant vulnerabilities in profitability, liquidity, and solvency, raising concerns about its overall financial sustainability. As a result, a forward-looking stress test was conducted. Under a combined macroeconomic shock scenario, WASAC's financial outlook is characterized as follows:

Table 11: WASAC risk ratings

Shock Scenario									
RATIO ANALYSIS		Actuals				Forecasts			
		2021	2022	2023	2024	2025	2026	2027	2028
Liquidity	Quick ratio	Very low risk	Very high risk	Very high risk	Very low risk	Very low risk	Very low risk	Very low risk	Very low risk
	Current ratio	Low risk	Very high risk	Very high risk	Moderate risk	Moderate risk	Low risk	Very low risk	Very low risk
Profitability	EBITDA margin	Moderate risk	Moderate risk	Moderate risk	Low risk	Low risk	Very low risk	Very low risk	Very low risk
	Net profit margin	Very high risk	High risk	High risk	Moderate risk	Very high risk	Very high risk	Very high risk	Very low risk
	ROE	Very high risk	Moderate risk	Very low risk	Moderate risk	Very high risk	Very high risk	Very high risk	Very high risk
	ROA	High risk	Moderate risk	Moderate risk	Moderate risk	High risk	Very high risk	Very high risk	Low risk
Solvency	Debt to Assets	High risk	High risk	Moderate risk	Moderate risk	Moderate risk	Very high risk	Very high risk	Very high risk
	Debt to Equity	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk
	Debt to EBITDA	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk
	Interest Coverage	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk	Very high risk
Overall Risk Rating		High risk	High risk	High risk	Moderate risk	High risk	High risk	High risk	Moderate risk

Source: SOEs Fiscal Risk Assessment

❖ Summary of risk analysis

Key risk	Current Status		Forecast Status	
Profitability		Profitability has improved, but is at a low level. Improvement in revenues needs to be maintained without further increasing costs.		Low levels of profitability are expected, and without government grant income, the financial position could be worse. finance costs denominated in foreign currency pose a threat to the financial sustainability of WASAC.
Solvency		Poor solvency position across all solvency indicators. The grace period of the current loan denominated in foreign currency is coming to an end in 2025.		WASAC's solvency position is projected to deteriorate significantly, with equity expected to turn negative, reaching Frw 78.7 billion by 2028, if operational efficiency is not improved. This projected decline is primarily attributed to the company's substantial exposure to long-term loans denominated in foreign currencies, which it may struggle to service under adverse conditions.
Liquidity		The liquidity position has deteriorated, mainly due to the continuous increase in trade payables		The liquidity position is expected to improve over the forecasted period from a current ratio of 0.65 in 2023 to a ratio of 1.47 and beyond during the projected period.

❖ **Main risks and Mitigation measures**

Expenditure and revenue risks. Likelihood of occurrence (High).

Increasing input costs from chemicals and electricity, which are not expected to be resolved in the near term. Customer tariffs have not been increased since 2019, affecting revenue growth. The performance is also affected by the higher level of non-revenue water losses estimated at **39.5%**, thus persistently affecting the company's revenue generation. All these have been affecting WASAC's profitability.

Mitigation/policy measure
Expenditures and capital investment: ❖ To explore alternative, possibly cheaper energy sources, such as solar, to reduce the cost of electricity. Improve (faster) leak detection and repair. Look at water distribution scheduling to reduce the use of electricity during peak hours. ❖ To hedge against foreign exchange risks by embarking on FX forward contracts with WASAC Group Suppliers. Revenues: ❖ Increase Monitoring and implement rapid intervention when there is a reported case of leakage,

Mitigation/policy measure
❖ Implementing an IT monitoring system to detect where leakages are in the network ❖ Assess customers' capacity to pay for water to inform potential innovative tariffs revision, negotiation, and targeted subsidies. ❖ Effective implementation of the Water distribution network revamping plan specified in its 5-year strategic plan (i.e., 2024/2025 -2028/2029 Strategic plan).

Liquidity and debt repayment risks. Likelihood of occurrence (High)

The expiration of the loan's grace period, which is denominated in foreign currency, will heighten repayment risk and strain WASAC's liquidity position. Given the company's limited ability to generate sufficient resources starting next year, meeting its debt obligations may become challenging.

Mitigation/policy measure
❖ In the short term, the government may need to recapitalize or enhance subsidies to assist the company in servicing the loan, if tariffs are not adjusted sufficiently to reflect costs. While in the long-term, boosting WASAC revenue generation through ideal tariffs regime implementation.

1.3. Climate Change Fiscal Risk

1.3.1 Climate Change Fiscal Risk Analysis for WASAC

Climate Change Vulnerabilities

WASAC has identified several climate change risks and has elaborated a 10-year Climate Resilience Strategy and Action Plan to address the specific challenges the Water Supply and Sanitation (WASH) sector in Rwanda is facing. These principally relate to vulnerabilities of Water Quantity, water quality, and infrastructure.

- ***Vulnerable water quantity:*** Prolonged periods of drought leading to the lowering of groundwater levels and depletion of aquifers, resulting in dry springs, lower productivity of boreholes, and lower water levels in streams and rivers.
- ***Vulnerable water quality:*** Lower raw water quality of surface water sources during periods of heavy rainfall with associated high soil erosion and surface runoff rates (turbidity, pesticides, etc.), and during prolonged dry periods linked to lower discharge rates (organic matter, domestic and industrial effluents, etc.). The quality of groundwater sources deteriorates when and where flooding is common, groundwater recharge rates are high, and catchment protection is not in place. Depending on the specifics, this leads to intake and production stops, higher use of chemicals with corresponding associated expenses, and, to a lesser extent, a decrease in water quality supplied to clients.

- **Vulnerable infrastructure:** Physical damage to intake, treatment, storage, conveyance, and support infrastructure, resulting in production interruptions, and costly repair and rehabilitation projects.

Specific fiscal risks

The Western and Northern regions are experiencing increased precipitation, including very heavy rains in short periods, in line with various climate change scenarios.

Heavy rainfall also leads to river flooding and erosion that comes from West to East. This increases erosion and siltation and creates turbidity, including in Kigali. This increases the cost of purification and can lead to shutdowns in purification plants.

Central and Eastern regions of the country are experiencing more extended dry periods. This results in reduced water flow in groundwater and natural springs, the main source of water in rural areas.

The total cost of the 2023 flood was estimated to be around Frw 3.2bn (around 8.5 percent of total WASAC expenditure). The majority of this (Frw billion) is capital expenditure reflecting damage to more than 69 water supply systems (WSS) and 6 water treatment plants (WTP).

Fiscal Exposure

The SOE Health Check (2024) records Frw 240bn of assets on WASAC's balance sheet (2024), of which Frw 249bn are fixed and other long-term assets. These are potentially vulnerable to flooding and landslides.

Climate Change Mitigation Measures

WASAC has created a function to address climate change issues and incorporate planning into future development. As part of this, a strategy and action plan for climate-resilient WASH Services in Rwanda has been developed.

Climate resilience is being mainstreamed in all projects. The following measures have been recommended to reduce infrastructure vulnerabilities:

- Contingency plans for disasters
- Developing and implementing a risk-based asset management system.
- Protection of priority assets (intake structures, pumping stations, and conveyance pipes) against climate hazards
- Revising and adhering to design norms and standards

Fiscal Risk Mitigation Measures

- Improving profitability through improving the distribution network to reduce non-revenue water losses, which would reduce overall fiscal risk.
- Consider the level of tariffs, which balance WASAC's financial resilience with other policy priorities.

1.3.2 Climate Change Fiscal Risk Analysis for Rwanda Energy Group

Climate Change Vulnerabilities

Total installed capacity continues to be dominated by hydro power plants as new plants come on stream. This implies exposure to climate change vulnerabilities such as prolonged dry seasons and the consequences of heavy rainfall in more extreme flooding, landslides, and strong winds. The impact of climate change was witnessed in 2024 as a consequence of the unprecedented rainfall, flooding, and landslides. As REG's 2022-23 Annual Report states, "Hydropower generating stations were characterized by water shortage in their stream due to prolonged dry season and heavy rainfall of 2 to 3 May 2023 that affected many hydropower plants of Northern and Western regions." Generation from peat is also at risk of flooding, since peat cannot be harvested during flood conditions.

The cost of remediation following damage done to energy-sector assets by the May 2023 floods and landslides was estimated at Frw 4.2bn—equivalent to 0.8 percent of REG's combined generation, transmission, and distribution assets. This comprised Frw 2.0bn in respect of hydro plants (12 were damaged and 2 destroyed out of a total of 37 plants); Frw 0.9bn for transmission towers and high voltage lines (as landslides took out foundations); and Frw 1.3bn for distribution networks (where poles collapsed and cables were cut due to landslides). As some small hydro plants will not be repaired or replaced (due to larger capacity plants coming on stream soon), the actual cost is expected to be lower than the full replacement cost, and REG has been able to absorb it to date.

Specific climate change risks

The specific climate change risks facing REG relate mainly to floods and landslides caused by increased precipitation, and to drought and longer dry seasons, both of which can be expected to become more severe under climate change.⁹ This means that hydropower generation, the increasingly dominant energy source in the country, is likely to be the most directly affected by climate change because it is sensitive to the amount, timing, and geographical pattern of precipitation and temperature.¹⁰

Specific climate change risks facing REG, therefore, include:

- In 2024, REG was strongly affected by strong winds that hit transmission lines. The infrastructure also suffered from landslides, lightning, and flooding
- Generation assets are being impaired via flooding, reduced streamflow, warmer water, and warmer air temperatures, which all reduce power supply in the system. In particular, hydro power is at risk from flooding (as witnessed in May 2023) and from prolonged dry seasons, while peat cannot be harvested during flood conditions, so it is also at risk from climate change.

⁹ For example, World Bank Climate Knowledge Portal figures show that the likelihood of what today would be a 1-in-25-year precipitation event rises by over 60 percent under the SSP3-7.0 'hot' climate scenario.

¹⁰ This section is partly drawn from REG's *SOEs – REG – Climate Change Risk Assessment Report*, submitted to MINECOFIN in February 2024.

- Structural damage to dams and hydro plants caused by excessive siltation of reservoirs.
- Loss of reservoir storage capacity due to changing rainfall patterns resulting in reduced power production forcing REG to run expensive fuel to generate electricity and/or to import power.
- Damage to physical hardware or operational conditions that exceed hardware tolerances, for example because higher temperatures can cause individual components to become inoperable due to protection devices that cut them off if the power flow is too high for the weather conditions.
- Severe flooding and/or landslides damaging REG's transmission and distribution assets, causing power outages and adversely affecting REG's balance sheet and operating costs (via repair costs and operating costs) and the Government's (via costs of diesel generators and REG subsidies).
- Higher temperatures can reduce the capacity for above-ground power lines to safely carry electricity.
- Severe river flooding is damaging IPP hydro power generators' assets and reducing output, reducing REG's payments to hydro power generators, but increasing payments for imported electricity by more.
- Although not climate-related, insufficient investment in maintenance would exacerbate these issues.

Fiscal Exposure

The key sources of climate change-related fiscal risks for REG relate to:

- REG's consolidated assets amounted to Frw 1,284 billion as of June 30, 2024. These include Frw 30 billion in generation assets, Frw 437 billion in transmission assets, and RWF 150 billion in distribution assets.¹¹ REG also had Frw 243 billion in assets under construction.
- REG's total borrowings amounted to Frw 254 billion as of June 30, 2024. Frw 162 billion of this was owed to development partners. MINECOFIN figures show EUCL to have Frw 14.3 billion of guaranteed debt outstanding and Frw 65.6 billion of non-guaranteed debt.

2. Public debt-related risks

This section analyses four major risks associated with Rwanda's public debt portfolio, along with the corresponding mitigating measures. The main risks include: (1) refinancing risk, (2) interest rate risk, (3) foreign currency risk, and (4) risks related to debt sustainability.

Sustainability Risk:

¹¹ It is worth noting that assets are recorded on REG's balance sheet at depreciated cost, so the replacement cost—the relevant metric for fiscal risk analysis—would be expected to be higher.

The spending for development agenda, mitigating the impact of COVID-19 and other global shocks (geopolitical tensions, highly volatile external environment, Marburg disease, etc) induced fiscal pressures that resulted to the increase in public debt from 73.5% as of end December, 2023 to 78.7% as of end December 2024 (equivalent to 58.5% in Present value terms which is below the threshold of 70%).

Despite the rise, our debt is kept at sustainable level with moderate risk of debt distress, with all sustainability indicators remaining well below their respective thresholds (limit) due to high share of concessional debt in our portfolio (87.7% of external debt by December, 2024). This demonstrates the cautious approach with regard to risk considerations whilst balancing on maintaining debt sustainability;

The vulnerability to Rwanda's debt sustainability remains the repayment of the Eurobond maturing in 2031 and risks associated with the global macroeconomic environment that could affect the country's debt sustainability like tightened global financial conditions which are pushing the cost of borrowing up, geopolitical tensions and global financing landscape characterized by the decline in grants and concessional funding. However, the outlook remains relatively positive.

Refinancing Risk:

The Refinancing risk has been mitigated prudently. The average time to maturity of the overall portfolio as of June 2025 is projected to expand from 13.6 years to 19 years, of which the external maturity profile is expected to increase significantly from 14.9 years to 19.9 years, mainly driven by both the contraction of higher concessional financing and repayment of expensive debt.

On the domestic debt front, the debt maturing in one year in percent of the total domestic debt portfolio has notably reduced from 30.2 percent of last year to 27.1 anticipated as of end June 2025. Thanks to the government's effort to replace short-term debt instruments with longer-dated ones. This not only mitigated refinancing risk but also contributed to the development of the domestic bond market by drawing a pool of external investors to long-term debt securities, thereby attracting capital and enhancing liquidity conditions in the capital market.

Interest Rate Risk:

Rwanda continues to face a notable increase in borrowing costs due to the global market environment, stemming from global inflation and capital reversals. As a result, the weighted average interest rates for both external and domestic debts have risen from 2 and 13.2 percent to 2.2 and 15.2 percent, respectively, as of the end of June 2025. However, the overall weighted average interest rate of the total debt portfolio has slightly declined to 4 percent, up from 4.2 percent. this decline is largely due to the significant proportion of concessional debts within the portfolio.

Foreign Currency risk:

The majority of Rwanda's public debt is denominated in foreign currency, making it susceptible to external shocks, including the impact of higher exchange rate depreciation of local currency against major foreign currencies.

As of the end of June 2025, the share of foreign currency-denominated debt is expected to increase to 88.5 percent of the total debt, up from 79.3 percent as at the end of June 2024.

Despite the rise, the risk is minimized by the large share of concessional loans in the debt portfolio. In addition, these loans contribute to the accumulation of reserves that are used to cover external payments, including debt servicing.

Government guarantees on loans from public corporations

To help public corporations and selected joint ventures attract private investment in infrastructure and enable them to borrow at affordable interest rates, the government issues a guarantee. These guarantees commit the government to cover the debt obligations of borrowers in the event of loan default. Rwanda's total SoE debt stood at FRW 533.3 bn (2.8 % of GDP) at the end of 2024 against FRW 578.6 bn as at the end of 2023. This is both guaranteed and non-guaranteed SoEs. A call on guarantees would result in the commitment of fiscal resources by the Government.

Table 12: Government guarantees as of December 2024

STATE-OWNED ENTREPRISES EXTERNAL DEBT STOCK (USD million)		
<i>Entity</i>		<i>Amount at the end of December 2024</i>
RwandAir	Guaranteed	16.0
RwandAir	Non-Guaranteed	50.7
SUB-TOTAL		66.8
STATE-OWNED ENTREPRISES DOMESTIC DEBT STOCK (FRW billion)		
<i>Entity</i>		<i>Amount at the end of December 2024</i>
UCL	Guaranteed	124.1
ATL	Guaranteed	146.9
EUCL-Gishoma)	Guaranteed	14.4
EUCL	Non-Guaranteed	65.6
Horizon Group	Non-Guaranteed	13.6
WASAC	Non-Guaranteed	10.8
SONARWA	Guaranteed	1.1
RWANDAIR	Non-Guaranteed	24.7
PHL	Non-Guaranteed	25.1
AFRIPRECAST	Non-Guaranteed	14.6
SUB-TOTAL		440.9
TOTAL		533.3
Nominal GDP		18,785.5
EOP Exchange rate		1,383.0
SOEs Debt Stock % of GDP		2.8%

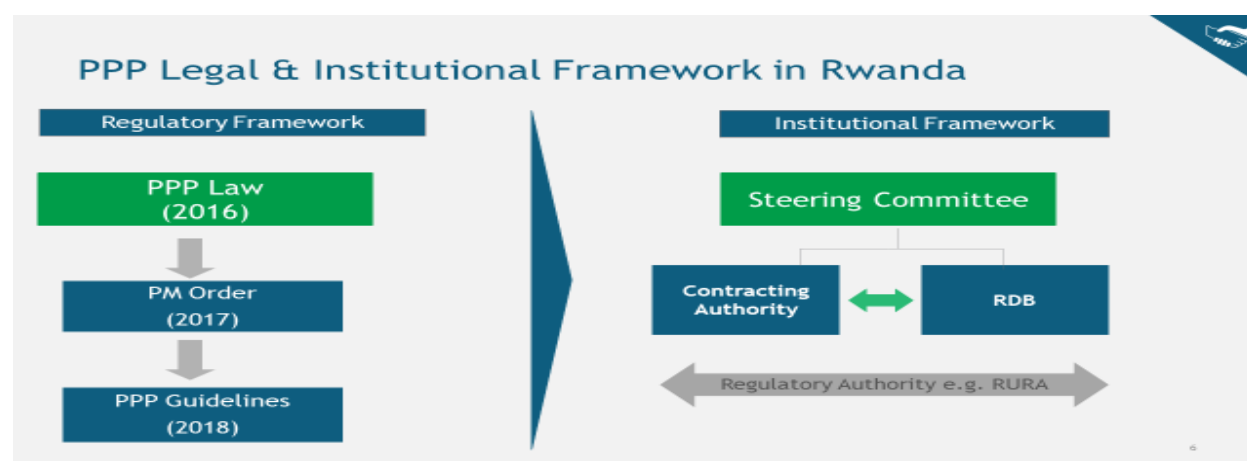
Source: MINECOFIN

3. Public Private Partnerships (PPPs)

Public-private partnerships (PPPs) are long-term contracts between a private partner and a government entity for providing a public asset or service, where the private partner bears significant risks and management responsibility and is remunerated based on the performance or use of the asset/service. In practice, PPPs comprise different types of contracts depending on the nature of the agreement. PPP models in Rwanda as per the legal framework include: **Build, Operate, and Transfer (BOT); Build, Operate Own (BOO), Management Contracts and Lease Operate Develop (LOD) contracts.** Power Purchase Agreements (PPAs) are the common form of PPPs in Rwanda and include design, build, finance, operate, and maintain a new power plant, with power supplied in bulk by the private partner (PPP company) to a government-owned transmission company.

PPPs in Rwanda are anchored in a strong regulatory & institutional framework to ensure efficient and transparent processes. The PPP Steering Committee that oversees the functioning of PPPs is chaired and co-chaired by the Minister of Finance & the CEO of the Rwanda Development Board, respectively.

Figure 10: PPP Legal and Institutional Framework in Rwanda



Source: RDB

To date, the Government has signed 59 PPP contracts with a total project value of approximately USD 2,173.0 billion. Around 90 percent by both number and project value are in the energy sector, with the rest spread across water and sanitation, culture, tourism, and logistics. Based on the total number of projects, 64.4 percent are operational (22 percent by project value), and the rest are at various stages of negotiation. Table 6 below provides further details on PPPs by sector and status.

PPP projects in the energy and water and sanitation sectors are purchase agreements, where the government-owned public corporations [Energy Utility Corporation Ltd - EUCL & Water and Sanitation Corporation - WASAC] signed contracts with private partners to design, build, finance, operate and maintain a new power plant, and supply water and power in bulk. The other PPPs are Management Contracts and Design-Build-Finance-Transfer (DBFT) in logistics.

Table 13: Ongoing PPPs in Rwanda by sector and status

Ongoing PPPs	Number	Project Value (USD million)
Energy Sector	54	2,025.7
Operational	33	334.8
Other stages (including negotiations)	21	1,690.9
Other Sectors	5	147.3
Operational	5	147.3
Other stages (including negotiations)	0	0
Total	59	2,173.0
Operational	38	482.1
Other stages (including negotiations)	21	1,690.9

Source: RDB.

Notes: Project value is equal to the investment cost of the project, not the total value of the contract or the total public sector exposure.

Identification and analysis of the fiscal impact of PPPs

The fiscal impact of PPPs includes both “fiscal costs” and “fiscal risks” for the different government entities involved. In the case of Rwanda, where most of the projects are PPAs signed by public corporations that benefit from broad government support, the following fiscal costs and risks are identified;

Fiscal impact of PPPs and PPAs on the central government budget

In Rwanda, the central government (i.e., government budget) is not the main counterpart of the PPAs’ contracts, which are signed by public corporations. However, the central government supports these contracts in different ways, as summarized in **Table 7**.

Table 14: Fiscal impact of PPPs and PCs for the central government

Source of fiscal impact	Fiscal cost or risk	Magnitude of impact	Probability of occurrence
Explicit and implicit guarantees to public corporations.	Fiscal risk	Medium: payment guarantees are provided in case utility companies fail to fulfil their payment obligations	Medium: The financial position of WASAC and REG were both deemed high risk based on the most recent health check assessment.
Capital grants to public corporations to cover part of the payment to the private partner	Fiscal costs	Medium: This is an expense for the budget. This mechanism has been used only in the water and sanitation project	
Providing direct project guarantees	Fiscal risk		

Based on the above analysis, the central government incurs fiscal costs in the form of capital grants paid to the water utility company (WASAC) to cover for the capital cost of the PPA contract.

In addition, the main risk to the central government is the payment guarantee, given that the financial health of the water utility company (WASAC) and the umbrella energy company REG were at high risk based on the 2023 health check assessment.

Fiscal impact of PPPs and PPAs on public corporations

When public corporations sign PPAs, these contracts impact their financial performance (cash flows, as well as their net worth), and depending on the contract specificities, they are also exposed to various types of fiscal risks, given that:

- a) The water and power plants are strategic assets that have been commissioned by the public corporations (not developed by the private sector on their behalf);
- b) The legal ownership of the assets is expected to return to the public corporation at the end of the contract, and
- c) Public corporations bear a significant portion of the risks.

It is expected, according to international accounting standards, that these assets (water and power plants) would be recorded in the balance sheet of the public corporations (accrual accounting). Beyond how the assets are reflected in the public corporation's balance sheet, they will record the total payments to the private partner as a cash outflow (in cash accounting). At the same time, the public corporations will sell water and energy to the users and receive cash inflows, which will depend on the tariffs and the demand for services. If regulated tariffs are not adjusted to fully cover costs, the balance sheet of the public corporations will be negatively impacted. On the other hand, if demand for water or energy does not materialize as expected, it would also negatively impact the public corporations' balance sheet.

Table 15: Fiscal impact of PPPs and PPAs for public corporations

Sources of fiscal impact	Fiscal cost or risk	Magnitude of impact	Probability of occurrence
Nonfinancial assets and equal liabilities in the balance sheet on an accrual basis	Fiscal cost	Medium: Estimated by the construction value of the asset. Neutral in terms of net worth (asset=liability)	High: it is most likely that the asset should be regarded as a public asset (strategic asset)
Payments to the private partner (cash outflows)	Fiscal cost	Medium: Payments to the private partner are significant for the public corporation. Yet, they are linked to performance. If the private partner does not deliver, the public corporation's payments are reduced.	High: The public corporation has a firm commitment to pay

Sources of fiscal impact	Fiscal cost or risk	Magnitude of impact	Probability of occurrence
User charges for services (cash inflows)	Fiscal revenue	High: Public corporations sell water and energy to users at regulated tariffs. Tariffs are subsidized in the water sector, while in the energy sector, tariffs are expected to fully cover costs.	Medium: Some risks, regulated tariffs are not adjusted to fully cover costs. If they are set below cost recovery, public corporations' revenues will not materialize.
Insufficient demand- (demand is lower than water supply and/or energy generation)	Fiscal risk	Medium: Currently, demand is assumed to be equal to supply, both in the water and energy sectors. If demand does not materialize, the impact on public corporations' revenues could be significant.	Medium: Low probability in the water sector. But in the energy sector, there might be an excess supply once all power projects become operational [unless old plants are decommissioned gradually]
Operational risks. (Projects are delayed and/or services interrupted)	Fiscal risk	Medium: Delays and interruptions typically generate significant cost overruns that hurt public corporations, depending on the nature of the PPP contract	High: Currently, some energy projects provide less than expected energy to the grid due to various issues.
Foreign exchange rate risks (payments to private partner were negotiated in foreign currency)	Fiscal risk	High: devaluation of domestic currency would have a large impact on public corporations' balance sheets by increasing payments	High: Large nominal exchange rate fluctuations since project signing (e.g., some contracts are more than 5 years old)

Source: RDB

Notes: The above table summarizes risks based on a contract-by-contract assessment of the portfolio.

Estimation of fiscal impact for four selected projects

A detailed assessment of Rwanda's four largest PPAs and Water Purchase Agreement projects was conducted using a simplified version of the PPP Fiscal Risk Assessment Model (PFRAM). These projects have a total asset value of \$USD 621 million and account for approximately a third of the total PPP portfolio.¹²

Summary of the fiscal impact of the four largest projects

Fiscal impact is calculated both in gross and net terms. The assessment is based on project contract information, as well as feedback from public corporations.

Total gross exposure represents total payments to the private partner over the whole contract period. In practice, the payments to the private partner are made by the public corporations or the central government if public corporations were to default on their payments (explicit guarantees).

Although the funding of these projects is determined by the contract agreement and the tariff structure. The government can absorb part of the funding burden by supporting

¹² With assistance from the IMF, a simplified version of the PPP Fiscal Risk Assessment Model (PFRAM) was developed to help the government in analysing and assessing the potential fiscal costs and risks arising from PPP projects.

either the public corporation (i.e., grants)/or the users (i.e., tariff subsidies). The public corporations can also partially fund the project with their working capital (i.e., use of cash, new loan). And, ultimately, the users can finance part or the full project by buying the services sold by the public corporations at the market tariffs (i.e., water, electricity).

Total net exposure is calculated as total payments to the private partner (i.e., gross exposure) minus expected revenues of public corporations from selling services to users at market prices. Expected revenues are estimated assuming that all the water and energy generated by the 4 projects is demanded by the users, and that tariff are adjusted over time.

Baseline fiscal costs are calculated as the value of the firm commitment made by the central government to support public corporations to fund part of the project costs. This support will materialize as a central government expense (i.e., capital grant) that will be included in the government budget.

The estimation of total gross and net exposure, as well as baseline fiscal costs for the above 4 projects, is presented in Table 9 below. Total gross exposure is estimated at USD 4.0 billion (19.3 percent of GDP) covering the whole contract period.¹³ The funding composition over the PPA period comprises 4 percent of the costs, on average, borne by the GoR, 4 percent by the public corporations, and 92 percent borne by user tariffs. In turn, given that the estimations of public corporations' revenues are based on demand and tariff projections, total net exposure is negative, meaning that public corporations would have an overall positive effect due to these contracts, estimated at USD 1.2 billion (4.7 percent of GDP). Finally, the baseline fiscal cost for the central government is estimated at 1.0 percent of GDP.

Table 16: Risk identification and analysis of the four main projects

Estimations	USD		FRW		% GDP	
	Total	NPV	Total	NPV	Total	NPV
Total gross exposure	4,021	1,793	7,404,240	2,899,362	19.3	9.7
Funding structure	4,021	1,793	7,404,240	2,899,362	19.3	9.7
Government payments	146	75	208,132	94,312	1.0	0.6
Public corporation payments	153	73	230,868	98,795	0.9	0.5
User tariffs	3,721	1,644	6,965,240	2,795,255	17.4	8.6
Total net exposure	-1,200	-505	- 2,058,277	-799,076	-4.7	-2.2
Baseline fiscal cost	146	75	208,132	94,312	1.0	0.6

Source: RDB

Notes: Net present value is discounted at 5 percent.

¹³ PPA contracts assessed cover the period 2011 to 2044.

Summary of detailed risk assessment of projects

The table below outlines the main sources of risk identified, their size, and the probability of occurrence

Table 17: Risk identification and analysis of the four main projects

Sources of fiscal impact	Fiscal cost or risk	Magnitude	Probability of occurrence
Water Project			
Insufficient demand	Fiscal risk	Medium: If demand does not materialize, the impact on WASAC's financial health would be significant, given that the project represents a significant portion of WASAC's revenues	Low: Heavy demand in Kigali and population growth and This is the only water project in the City of Kigali
Default risk	Fiscal risk	Medium: Total payments for the whole contract period are estimated at 1.2 percent of GDP	Medium: On loan repayments due from 2025 and existing revenue streams are insufficient to cover current or future repayments without reform.
Forex risk	Fiscal risk	Medium: A depreciation would increase WASAC payments	Medium: The project was signed in 2015, and the exchange rate has depreciated since then
Demand risk	Fiscal risk	Medium: When all projects are completed, there could be an excess supply	Medium: New investments will add two-thirds to energy capacity
Default risk	Fiscal risk	Medium: The financial health of REG is at high risk	Medium
Forex risk (Tariffs are set in USD and payments are done in FRW at the prevailing exchange rate set by the Central Bank)	Fiscal risk	Medium: Two energy projects are currently in operation	Medium: Continued depreciation of FRW is likely

Source: RDB

4. Pension-related risks

Table 18: Pension contribution compared to Benefits

Pension contributions compared to benefits (Frw Mln)									
	2016	2017	2018	2019	2020	2021	2022	2023	2024
Contributions	74,695	74,897	83,344	94,371	102,178	106,821	125,758	153,240	183,938
Benefits paid	15,992	18,155	21,537	27,594	30,468	35,248	41,292	45,854	51,641
Incremental contribution compared to benefits payout (growth rates)									
	2016	2017	2018	2019	2020	2021	2022	2023	2024
Contributions	22.20%	0.30%	11.30%	13.20%	8.30%	4.54%	17.73%	21.85%	20.03%
Benefits paid	5.90%	13.50%	18.60%	28.10%	10.40%	15.69%	17.15%	11.05%	12.62%

Source: RSSB

It is noticeable that the payout of benefits is increasing more than that of contributions. This implies that the pension liability is also increasing.

5. Local Government

Local Government plays a significant role in providing essential social and economic services, and the Government considers local financial management capacity when assessing fiscal risk.

In the most recent fiscal years, financial management and reporting capacity at the district level has significantly improved and continues to improve. From the second Quarter of 2024/2025 almost all local Government entities have enrolled on Government's integrated financial management and information system (IFMIS) and Schools Data Management System (SDMS), this represents coverage of 27 districts plus the City of Kigali, 416 district sectors, 48 district hospitals, 512 health centers. with over 4,939 schools using SDMS as a school's specialized component that is fully integrated with IFMIS for payment of the Capitation grant and School feeding.

In that regard, there has also been development and completion of the Project Management Grant and Public Debt Modules, which are currently being used smoothly by relevant stakeholders. Further development of relevant modules is underway to further improve PFM. In addition to that, hands-on training and support in terms of PFM are being provided through the Local Government PFM Capacity Building Project.

The table below shows a trend of local Government budget with the central Government contribution settling at a stable state of 86% in FY 2020/21 and FY 2021/22, with a sharp increase to 90% in 2022/23 and 2023/24, respectively. Subsequently dropping slightly to 89% in FY 2024/25 due to a recognizable increase in the projection of Own-revenue generation with the implementation of the new law determining the source of revenue and property of decentralized entities. The introduction of Computer Assisted Mass Appraisal (CAMA) is also expected to further increase own-source revenue

generation, thereby reducing high dependency on central government transfers to finance local government's pressing needs.

Table 19: Trend of local Government budget composition¹⁴

Designation	2020/21	2021/22	2022/23	2023/24	2024/25
District Own revenues (Taxes & Fees)	87	88.5	90	90.4	98.5
Transfers from CG	546	559.5	774	861	838.6
Total District Budget	633	648	864	951.4	937.1
% Of Own revenues to the LG Budget	14	14	10	10	11
% of CG Transfers to the Budget	86	86	90	90	89

Source: MINECOFIN

6. Analysis of the Financial Sector Performance

The financial sector maintains sufficient capitalization and liquidity. As of December 2024, the banking sector's aggregate Tier 1 and total CAR stood at 19.2 percent and 20.5 percent, respectively, exceeding the prescribed minimum prudential requirements. Additionally, all banks maintain capital buffers that exceed the minimum requirements. In terms of the capitalization of the microfinance sector, the aggregate CAR of MFIs was 32.3 percent, surpassing the 15 percent minimum regulatory requirement. All categories of MFIs sustain adequate capital buffers. In the insurance sector, solvency remains intact. As of December 2024, private insurers' solvency ratio was 214 percent, down from 296 percent in December 2023, well above the minimum requirement of 100 percent. The noted decline was due to an increase in reserves for additional business underwritten.

The Liquidity Coverage Ratio (LCR) and the Net Stable Funding Ratio (NSFR), which are key liquidity indicators for banks, stood at 333.8 percent and 148.4 percent, respectively, surpassing the minimum requirement of 100 percent. Similarly, the industrywide liquidity ratio of MFIs was at 84.7 percent, exceeding the minimum prudential requirement of 30 percent. Additionally, all categories of MFIs maintain liquidity buffers above the regulatory requirement. In the insurance sector, as of December 2024, the liquidity ratio stood at 108 percent, surpassing the 100 percent prudential requirement, lower than 114 percent in December 2023. The strong liquidity position is explained by quality investments and enhanced underwriting capacity.

Assets quality of banks slightly deteriorated but remains healthy during the year to end December 2024. Non-performing loans decreased by FRW 33 billion to FRW 176 billion in December 2024, down from FRW 209 billion in December 2023. Consequently, the NPL ratio decreased to 3.1 percent in December 2024 from 4.1 percent in December 2023. This improvement was a result of the increase in the loan portfolio, recoveries, and the write-offs of overdue loans. Across sectors, loan quality remains healthy, with a limited level of impairment, due to economic prospects and vigorous credit administration

¹⁴ From FY 2019/20, external grants have been merged with Transfers from Central Government.

In the MFI sector, credit defaults remained at moderate levels during the review period. As of the end of December 2024, the stock of NPLs in microfinances amounted to FRW 21.2 billion, up from FRW 18.7 billion in December 2023. Consequently, the NPLs ratio decreased to 3.5 percent as of the end of December 2024, compared to 4.3 percent in December 2023. This improvement is explained by intensive recoveries due to more visibility in loans after automation of U-SACCOs, improved credit risk management supported partly by the usage of Credit Reference Bureau (CRB), and increased lending.

Table 20: Financial Soundness Indicators (Banking Sector) - In Percentage

Indicators	Dec-20	Dec-21	Dec-22	Dec-23	Dec-24
Total CAR (min 15 %)	21.5	21.5	21.7	21.5	20.5
Core Capital Tier 1 (min 12.5%)	20.3	20.6	20.9	20.3	19.2
NPLs Ratio	4.5	4.6	3.1	4.1	3.1
Provisions / NPLs	106.3	119.8	141.9	99.1	102.6
LCR (min 100%)	254.7	268.9	215.9	234.0	333.8
NSFR (min 100%)	161.4	147.1	136.8	114.6	148.4
FX Exposure/Core Capital (± 20%)	-4.4	-3.7	-0.6	1.0	2.5

Source: NBR

Table 21: Financial Soundness Indicators (Microfinance Sector) - In Percentage

Indicators	Dec-20	Dec-21	Dec-22	Dec-23	Dec-24
CAR (min 15 %)	36	36	34.5	33.8	32.3
Liquidity ratio (min 30%)	101	112	91	86	84.7
NPL Ratio (below 5%)	6.7	4.8	3.5	4.3	3.5
Net profit (FRW Billion)	10.3	18.1	23.0	25.3	38.7
ROA (%)	3.0	4.4	4.6	4.1	5.5
ROE (%)	8.2	12.4	13.3	12.2	15.5

Source: NBR

Table 22: Financial Soundness Indicators (Insurance Sector) - In Percentage

Description (Ratios%)	Public Insurers		Private Insurers		Insurance sector	
	Dec-23	Dec-24	Dec-23	Dec-24	Dec-23	Dec-24
Solvency margin (Min. 100%)	2284	2339	296	213	1422	1391
Claims ratio (max.60%)	59	59	58	57	58	58
Expenses ratio (max. 30%)	15	19	39	38	26	29

Combined ratio (max.90%)	73	78	97	95	85	87
ROE (Min.16%)	14	14	19	20	15	15
ROA (Min.4%)	13.7	14	7	10	11	12
Current Ratio (min. 120%)	2057	1367	97	100	229	217
Liquidity ratio (min. 100%)	3530	2423	114	108	340	321

Source: NBR

Despite ongoing geopolitical conflicts in regions like the Middle East and Ukraine, disruptions in the Red Sea affecting global supply chains, climate-related risks, and pressures on the exchange rate, the financial system has demonstrated resilience against these challenges. Looking ahead, in the medium term, the financial sector is expected to maintain its soundness and stability, supported by adequate capital and liquidity buffers. These buffers indicate the sector's ability to withstand various shocks. This resilience is bolstered by ample reserves of capital and liquidity, strengthened risk management practices, and favourable economic performance despite declining inflationary pressures.

7. Natural disasters

Rwanda is highly dependent on its diverse ecosystems to sustain its population and support economic development. The country is prone to a variety of natural and man-made disasters, mainly storms, landslides, and floods, and 55 percent of the total land area is at risk of soil erosion. These disasters cause physical, socio-economic, and environmental damages and losses. The major disasters that cause huge impacts in Rwanda include mainly hydro-meteorological disasters. However, Rwanda is also prone to hazards, exposure, and vulnerability to volcanic eruptions and seismic activities.

On average, five Districts per year face serious natural disasters, but in 2016 and 2018, the spread and severity of floods and landslides rose well above average, with over 2 million people affected, and negative consequences for agriculture, trade, and industry.

Disasters invariably require significant emergency management and longer-term responses.

By disrupting normal business activities, they can also reduce revenue collection. Tourism is the country's largest source of foreign exchange, and disasters pose particular risks to wildlife tourism.

The number of events classified as natural disasters has increased in recent years, resulting in significant casualties and damage. In 2022, 205 people lost their lives, followed by 243 in 2023 and 191 in 2024. The number of injured individuals also rose, with 401 cases in 2022, 406 in 2023, and 448 in 2024.

These disasters caused extensive damage, affecting 4,156 structures in 2022, 7,454 in 2023, and 2,005 in 2024. Additionally, agricultural losses were substantial, with 1,917.74 hectares of crops damaged in 2022, 2,176.32 hectares in 2023, and 1,355.3 hectares in 2024.

In response, the government has significantly increased its disaster management efforts, with the budget rising from FRW 21.4 billion in the fiscal year 2016/17 to FRW 63.5 billion in 2022/23.

Table 23: Natural disasters in 2024,2023, and 2022

DISASTER TYPE	2024 DISASTER EFFECTS				2023 DISASTER EFFECTS				2022 DISASTER EFFECTS			
	Deaths	Injured	Houses Damaged	Damages In Crops Ha.	Deaths	Injured	Houses Damaged	Damages In Crops Ha.	Deaths	Injured	Houses Damaged	Damages In Crops Ha.
EARTHQUAKE	0.0	0.0	0.0	0.0	0.0	3.0	45.0	0.0	0.0	0.0	0.0	0.0
FIRE	14.0	84.0	208.0	0.0	12.0	15.0	228.0	23.3	1.0	10.0	251.0	101.3
FLOODS	12.0	1.0	26.0	147.9	74.0	72.0	2388.0	351.5	33.0	1.0	93.0	445.1
HAILSTORM	0.0	0.0	0.0	923.9	0.0	0.0	274.0	187.2	0.0	0.0	264.0	652.4
HEAVY RAIN	3.0	18.0	139.0	156.5	3.0	13.0	319.0	300.9	12.0	76.0	1572.0	565.0
HOUSE COLLAPSE	17.0	46.0	283.0	0.0	16.0	74.0	27.0	0.0	5.0	12.0	21.0	0.0
LANDSLIDES	14.0	6.0	95.0	47.6	87.0	47.0	2359.0	788.7	24.0	9.0	140.0	10.4
LIGHTNING	81.0	216.0	17.0	0.0	43.0	153.0	10.0	0.0	57.0	219.0	12.0	0.0
MINE DISASTER	49.0	47.0	0.0	0.0	6.0	3.0	2.0	0.0	71.0	46.0	0.0	0.0
WINDSTORM	1.0	30.0	1237.0	47.2	2.0	26.0	1802.0	269.9	2.0	28.0	1803.0	140.6
WILDFIRE	0.0	0.0	0.0	32.3	0.0	0.0	0.0	254.8	0.0	0.0	0.0	3.0
Total	191	448	2005	1355.3	243	406	7454	2176.3178	205	401	4156	1917.7425

Source: Ministry in charge of Emergency Management (MINEMA)

Table 24: Budget for Disaster Management Activities¹⁵

Billion Frw (Revised Budget)	2019/20	2020/21	2021/22	2022/23	2023/24	2024/25
Budget for Disaster Management Activities	156.1	179.2	313.7	207.7	221	187.7

Source: MINECOFIN

V. MITIGATION MEASURES

1. Mitigation measures in case of Macroeconomic shocks

The global economic outlook remains uncertain as the global economy continues to face several challenges. The global environment was hostile to growth as the economy was still facing uncertainties from geopolitical tensions, trade fragmentation, as well as climate related shocks.

The outlook is subject to risks discussed, but also to the effect of continuous, existing & new government efforts¹⁶ put in to maintain economic stability and respond to

¹⁵ Data include all disaster-related interventions ranging from emergency relief, prevention, preparedness, and reconstruction, plus early warning interventions.

Also, emergency relief, prevention, and preparedness include health disaster interventions that were not previously included, and this explains why the figures are higher compared to those previously reported.

¹⁶ Some of those efforts are related to public finance management in terms of continuous implementation of the budget rationalization strategy which will affect mostly recurrent spending in the medium term targeted to preserve the fiscal deficit path necessary to bring the debt level to 65 percent of GDP by 2030.

economic shocks and positive prospects of the developments in the external and domestic economic environment. Some of those prospects include a budget rationalization strategy with climate tagging¹⁷ element which also considers response to shocks as a priority for short and long horizons.

The Budget for FY 2025/26 indicates continued normalization of fiscal policies for recovery from previous compound shocks, including Marburg virus disease, as well as reconstruction efforts following Floods in May 2023. This envelope also factors in concerned shocks in terms of social protection interventions¹⁸ and prioritization of key subsidies or interventions to the Socio-Economic Recovery Plan that have shown good results in building resilience to shocks and enabling quick recovery.

The additional solutions range from tax measures (raising revenues over the medium term by broadening the tax base, streamlining expenditures, and enhancing compliance, enforcement, and tax collection efficiency), fiscal consolidation & structural fiscal reforms (continuous prudent debt management strategy that prioritizes concessional resources, including climate change related financing to support Rwanda's adaptation and mitigation efforts) and exchange rates reforms (a flexible exchange rate and more proactive liquidity management to support our monetary policy framework and maintain external buffers).

Regarding response to weather shocks (i.e., floods, landslides, and erosions), Rwanda has been putting efforts into investing in and operationalizing planned land management and conservation interventions, which would offer meaningful benefits for inclusive and climate-resilient growth. Regarding response to external shocks in terms of external commodity prices channeled to domestic inflation pressures, the GoR stands ready to use monetary policy instruments and complementary measures (i.e., fiscal response) to address inflation and exchange rate pressures.

2. Mitigation/Adaptation measures for climate change fiscal risks

Overarching approach

Rwanda remains steadfastly committed to the Paris Agreement and has dedicated the resources required to achieve substantial emissions reductions. To support this, the government has committed to mitigation measures (Table 1). To reduce vulnerability to the impacts of climate change, several adaptation measures are also being implemented (**Table 2**).

¹⁷ Climate budget tagging is the process of identifying, measuring, and monitoring climate-relevant spending across government and can help to highlight the importance of climate concerns in resource allocation and execution.

¹⁸ The social resilience is based on improved the design and delivery of our social safety nets, improving the access and quality of health and education among vulnerable groups, and promoting economic diversification

Table 25: Adaptation and Mitigation measures for climate change fiscal risks

Mitigation Measures	• Increased use of renewables • Climate compatible mining • Improved livestock husbandry • Energy efficiency in agro-processing • Off-grid and rooftop solar electrification • Soil and water conservation • Promotion of electric vehicles and public transport infrastructure • Promotion of on-farm biogas for energy
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Figure 10-12: Mitigation measures under Rwanda's NDCs (RoR, 2020b).

Adaptation Measures	• Integrated Water Resources planning and management • Diversity in local and export agricultural markets • Sustainable forestry, agroforestry & biomass energy • Institutional capacity development • Vector-based disease prevention • Climate sensitive integrated land use planning and spatial planning • Disaster preparedness and emergency response • Climate data and projections for EWS
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Figure 10-13: Adaptation measures under Rwanda's NDCs (RoR, 2020b)

Source: Adaptation and Mitigation measures under Rwanda's NDCs

Specific fiscal risks

In terms of the specific fiscal risks identified in this section, the government is committed to improving the climate resilience of transport infrastructure and the assets of REG and WASAC to reduce the risks to lives, the economy, and the public finances from events like the May 2023 floods. For example:

- **Roads and bridges** damaged by last year's floods have so far been repaired on a rapid but temporary basis. Permanent improvements will follow, with road design and land-use in adjacent areas upgraded to reduce the risk that heavy rainfall results in costly landslides.
- **Energy infrastructure** is being upgraded to ensure that dams are robust to more severe flooding, and used to manage the consequences of heavy rainfall as well as generating electricity. The transmission and distribution infrastructure is also being upgraded to be resilient to landslides, while land use in adjacent areas is being improved via collaborative efforts across government to reduce soil erosion and the risk of landslides during periods of heavy rainfall.
- **Water infrastructure** will benefit from WASAC creating a new Research and Development Department to address climate change issues, informing a forthcoming climate resilience and action plan. Climate resilience is being mainstreamed in all projects, for example, through new dams to increase resilience to both drought and to mitigate the effects of flooding.

3. Mitigation/Adaptation measures for SOEs' fiscal risks

Climate Change Mitigation Measures

The Government has initiated a pilot project designed to increase the resilience of Rwanda's energy sector. By bringing together several affected Ministries and SOEs, this project is pursuing solutions that benefit different services and infrastructures, including REGs. For example, steps are being taken to reduce soil erosion from hillsides that increase siltation and vulnerability to landslides. REG is also considering the value of new dams for managing floods as well as generating power.

REG is supporting private investment in new hydro plants in Rusumo Falls (26MW), Rusizi III (48.3MW), and Nyabarongo II (43.5MW) through PPPs. These three plants alone will roughly double existing hydro generation capacity, raising the share of renewables generation and reducing the average unit cost across all generation capacity, both due to hydro's relatively low cost and these projects' scale.

The Government's rapid damage and needs assessment after the May 2023 floods identified the following steps to improve the resilience of energy infrastructure to climate change:

- Distribution network design should be reviewed to make it more resilient to natural hazards such as floods and other disasters.
- The rehabilitation and reconstruction of small and micro-hydropower plants need to ensure climate and disaster-resilient designs and reconstruction. (REG has used the experience with the vulnerability of retaining walls at Nyabarongo I to ensure the design for Nyabarongo II is more climate resilient.)
- Conducting an extensive assessment of power sector infrastructure vulnerability to natural disasters and preparedness measures.
- Producing an updated risk register.
- Capacity building on risk assessment and management.

Fiscal Risk Mitigation Measures

- **PPAs** are designed so that REG only pays for power that is produced, which limits direct exposure (in some countries, payments are made regardless of actual generation levels). Greater financial risks stem from older PPA contracts that include indexation clauses and are denominated in US\$, which means that the 40 percent depreciation of the Frw from around 900 per dollar in early 2020 to Frw 1,275 today has raised the unit cost of electricity for REG during a period when user tariffs have remained constant.
- REG is still responsible for **delivering sufficient power** in the case of hydro outages, which may require additional costs through thermal and imported power. To the extent that this can be met via imported power along the new interconnectors throughout the region, the financial risk to REG is limited (as

unit costs of imports do not greatly exceed unit costs of domestic hydro). But if domestic thermal capacity has to be used to meet demand, the adverse impact on REG's finances can be material. The large increases in domestic and regionally shared hydro capacity in the coming years reduce this risk.

4. Management of public debt-related risks

It is important for Rwanda to continue to implement sound fiscal policies and actively monitor its debt levels in order to maintain its debt sustainability over the long term.

To keep a moderate risk of debt distress, the overall debt strategy will focus on;

- i. maximizing concessional funding opportunities to minimize debt servicing pressures;
- ii. Prioritize fixed instruments to avoid the effect of volatile market interest rates;
- iii. develop the domestic market to reduce dependence on foreign currency debt while reducing refinancing risks with the issuance of long-term securities;
- iv. Proactively taking liability management operations whenever possible to avoid refinancing risks;
- v. boosting our exports to build buffers for debt sustainability;
- vi. and finally recalibrating the fiscal consolidation path with strengthening of domestic revenue mobilization, spending rationalization, and mitigation measures for fiscal risks arising from State Owned Enterprises, Power Purchase Agreements, etc.

5. Mitigation Measures of PPP Risks

Table 26: Mitigation measures of PPP risks

Description of risk	Mitigation measure
Demand risk: that the increase in supply will not be met by commensurate demand	▪ Increase demand for energy-intensive industries. The government is currently focusing its investment attraction policy on large manufacturing industries to increase the demand for energy consumption ▪ The government is exploring options to export energy to the DRC and other neighbouring countries
Financing risk: repayment risks from the public corporations to private providers	▪ Ensure prudent corporate and governance structures for public corporations ▪ Reduce losses through targeted interventions, e.g., operational losses in WASAC ▪ The government is in the process of exploring ways to refinance some of the big energy projects to reduce the fiscal costs to the public corporations and future pass-through costs to consumers, which will in turn boost the demand ▪ Have mechanisms in our PPAs to ensure that cost overruns due to changes in price do not affect the contract performance ▪ Compensation of Force Majeure (FM) is handled through extension of time delays, and in case of prolonged FM, the contract is handled through the termination process

Forex risk: increased repayments for energy and water produced, resulting from exchange rate volatility	▪ Through the National Export Strategy, the government's major objective is to increase exports, which will reduce the trade deficit and ultimately reduce local currency devaluation. ▪ Maintain a prudent monetary policy and consider setting up contingency reserve funds for forex risks arising from PPP projects.
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6. Management of pension liabilities

The Rwanda Social Security Board (RSSB) is aware of the emerging pension liabilities and will continue to monitor the trends in contributions and benefits paid. Accordingly, the RSSB will be prepared to address any liabilities that may arise in due time.

7. Management of Local Government Risks

The government will continue strengthening PFM management systems, support local Government through capacity-building initiatives, provide hands-on support in terms of PFM Procedures, and target to reduce dependency on central government transfers by further increasing own source revenue generation with the introduction of Computer Assisted Mass Appraisal (CAMA) and implementation of Audit generals Audit recommendations.

8. NBR mitigation measures for the financial sector

The National Bank of Rwanda (NBR) is committed to upholding the stability and resilience of the financial sector, especially amidst different challenges and emerging risks. To address evolving threats such as climate-related and cybersecurity risks, the NBR has implemented proactive measures aimed at aligning the regulatory framework with international standards. These ongoing initiatives demonstrate the NBR's dedication to maintaining a stable, resilient, and inclusive financial sector. Through regular oversight activities, the NBR seeks to enhance the sector's ability to withstand shocks and maintain stability amid uncertainty.

9. Mitigation measures for natural disasters

Natural disasters continue to be a significant source of fiscal risk, posing challenges to economic stability, infrastructure resilience, and social well-being. In response, the Government is developing a comprehensive disaster risk financing strategy aimed at mitigating these risks and ensuring a swift recovery. This strategy will include the formulation of recovery needs estimates that address four key sectors: agriculture, housing, infrastructure, and the environment.

Building on lessons learned over the past several years, the Government has transitioned from a reactive to a proactive approach to disaster risk management.

Key measures undertaken include:

1. **Strengthening Institutional and Legal Frameworks** – The Government has enhanced policies, laws, and regulatory mechanisms to improve disaster preparedness, response, and recovery. A well-defined coordination framework has been established to ensure timely and effective interventions.
2. **Risk-Informed Infrastructure Development** – Investments in resilient infrastructure, such as flood-resistant housing, reinforced roads, and early warning systems, are being prioritized to reduce vulnerability to future disasters.

3. **Agricultural Risk Mitigation** – To safeguard food security and livelihoods, climate-smart agriculture practices, drought-resistant crop varieties, and agricultural insurance schemes are being promoted.
4. **Environmental Protection and Restoration** – Measures such as afforestation, wetland restoration, and sustainable land management practices are being implemented to reduce environmental degradation and minimize disaster-related risks.
5. **Financial Risk Transfer Mechanisms** – The Government is exploring insurance-based solutions, contingency funds, and sovereign risk pools to enhance financial resilience and ensure adequate resources for post-disaster.

VI. CONCLUSION

Rwanda's 6th Fiscal Risk Statement (FRS) identifies various fiscal risks, particularly in light of ongoing geopolitical tensions and inflation pressures, which are showing signs of easing. ***The Government has assessed the overall fiscal risk as manageable*** and has put in place mitigation measures to reduce potential negative impacts.

The Government is monitoring the current risks above mentioned. However, due to uncertainties, which are mostly external and beyond control, risks remain on the economy. ***The Government will continue to implement adequate economic policies to ensure Macroeconomic stability.***

End.