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GUYANA

JOINT WORLD BANK-IMF DEBT SUSTAINABILITY ANALYSIS

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Prepared by the staff of the International Development Association (IDA) and the International Monetary Fund (IMF).

GUYANA: JOINT BANK-FUND DEBT SUSTAINABILITY ANALYSIS	
Risk of external debt distress	Moderate[1]
Overall risk of debt distress	Moderate
Granularity in the risk rating	Substantial space to absorb shock
Application of judgment	No

The risk of external and overall debt distress for Guyana remains moderate (as in the previous DSA of July 2019). There are significant favorable upside risks to the outlook for debt dynamics in the medium- to long-term given the latest projections of high oil prices and continuing discoveries of new oil fields, which will help Guyana build up significant external buffers against adverse shocks. All external debt indicators remain below the relevant indicative vulnerability thresholds under the baseline scenario, which incorporates the long-term effects of oil production.

Stress tests illustrate the susceptibility of Guyana's external public debt to shocks, and in particular to an export shock and to a combined shock scenario featuring simultaneous shocks to real GDP growth, primary balance, exports, other flows (current transfers and FDI), and nominal exchange rate depreciation, which could cause significant breaches in the external debt thresholds. Guyana has substantial space to absorb shocks, reflecting the current low level of external debt.

[1] Guyana uses the LIC-DSF due to its IDA status, despite its graduation from the PRGT in 2020. The debt-carrying capacity is classified as "weak" due to the value of the Composite Indicator (CI), (down from "medium" in the last DSA, due mostly to a sharp increase in oil-related imports).

PUBLIC SECTOR COVERAGE

1. The coverage of public sector debt used in this report is central government debt and central government-guaranteed debt. In May 2018 the central government guaranteed a five-year syndicated loan amounting to G$16.5 billion (2.1 percent of GDP) raised by the National Industrial and Commercial Investments Limited (NICIL) [2] for the purpose of restructuring state-owned Guyana Sugar Corporation (GuySuCo). The loan, which is also secured by NICIL's assets, carries an interest rate of 4.75 percent. The government had undertaken the restructuring of GuySuCo following continued losses which resulted in heavy subsidies amounting to 1−2 percent of GDP per year during 2015−20. Proceeds from the privatization of GuySuCo's estates will be used to repay this loan. In December 2020 a decision was made to classify all outstanding liabilities from this loan as central government domestic debt since the government had been obliged to meet debt service obligations under this bond during the year. Central government debt also included borrowing from the Central Bank of Guyana (BOG) during 2015-2020, amounting to G$163.3 billion (14.3 percent of GDP) as of end-2020.[3] However, in June 2021 the government securitized the inherited overdraft at the BOG using variable-rate debentures, with tenors ranging from 1 to 20 years, totaling G$200 billion (approximately US$960 million). In addition, state-owned enterprises' (SOEs) debts are included in central government debt as these entities are not allowed to borrow directly. The central government borrows and on-lends to the SOEs. The central government does not issue explicit or implicit guarantees on sub-nationals and local governments' debts, which are not included in the DSA. External debt is defined based on residency basis.

2. The Government of Guyana has been working closely with the World bank on issues related to debt transparency and management in the context of Sustainable Development Finance Policy (SDFP). This included increasing the periodicity and coverage of debt statistics and strengthening the policy framework for debt management.

Text Table 1. Guyana: Coverage of Public Sector Debt

	Subsectors of the public sector	Check box
1	Central government	X
2	State and local government	
3	Other elements in the general government	
4	o/w: Social security fund	X
5	o/w: Extra budgetary funds (EBFs)	
6	Guarantees (to other entities in the public and private sector, including to SOEs)	X
7	Central bank (borrowed on behalf of the government)	
8	Non-guaranteed SOE debt	X

[2] NICIL was incorporated as a Private Limited Company under the Companies Act of 1991 and is 100 percent owned by the Government of Guyana.

[3] The central bank does not borrow externally on behalf of the central government.

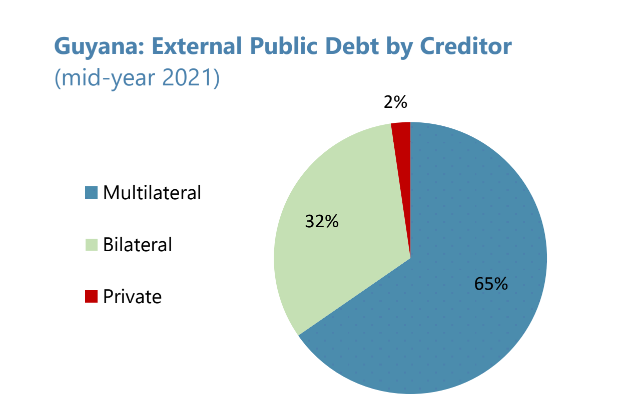
BACKGROUND

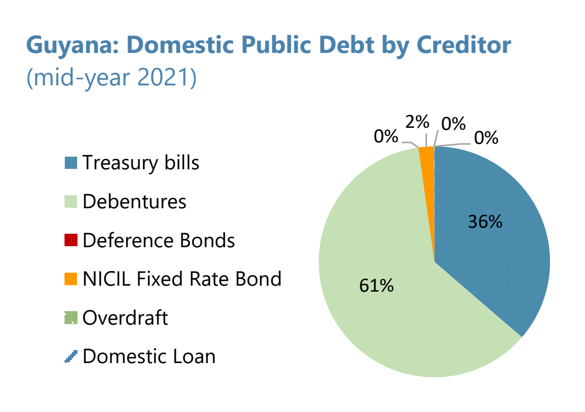
3. The Guyanese economy was negatively impacted by the pandemic and the 2021 floods but has recovered well, supported by the oil boom, while medium-term prospects are more favorable than ever before. Non-oil economic growth recovered in 2021 but was dampened by the floods in the summer, which affected the agricultural sector and economic activity in the hinterland. Inflation increased in 2021 owing to higher food and fuel prices as well as to supply-side disruptions and have more recently been exacerbated by the war in Ukraine. Oil production is expected to increase significantly with the coming on stream of two large oilfields in the Stabroek Block during 2022-26. Guyana's commercially recoverable petroleum reserves is estimated to be well over 11 billion barrels, the third largest in Latin America and Caribbean, and one of the highest levels of oil reserves per capita in the world. This could help Guyana build up substantial fiscal and external buffers to absorb shocks while addressing infrastructure gaps and human development needs. However, increased dependence on oil revenues will expose the economy to volatility in global oil prices. A slowing global economy and the repercussions from the war in Ukraine could also adversely affect non-oil exports. On the other hand, higher global oil prices and additional gas and oil discoveries could significantly improve Guyana's long-term economic prospects.

4. Total gross public debt has declined significantly over the past decade, driven by repayments, and prudent debt management. Guyana's total public-sector debt declined to 42.9 percent of GDP in 2021 (including central government guarantee on NICIL's G$16.5 billion syndicated loan) from 57.7 percent of GDP in 2011.[4] Rice exports to Venezuela helped Guyana repay part of its debt owed to that country under the PetroCaribe agreement (which was suspended since 2015 following the revival of a border dispute) and there has been no further borrowing from Venezuela since then. In addition, the Guyanese authorities have been prudent in accumulating new public debt and the oil production since 2020 has helped to reduce the ratio by significantly increasing nominal GDP, the denominator.

5. External debt accounts for over 40 percent of total public sector debt, mostly to multilateral institutions. Multilateral creditors accounted for over 65 percent of total external debt in 2021. The IDB is the largest multilateral creditor, accounting for 46.1 percent of total external debt at end-2021. China's state-owned Export-Import Bank is the largest bilateral creditor, comprising 17.3 percent of total external debt at end-2021. Eurobond holders are the only private (commercial) creditors. Domestic debt comprises mainly Treasury bills (T-bills) and borrowing from the central bank, which is now securitized (see below).

[4] Debt relief under the Heavily Indebted Poor Country (HIPC) Initiative and Multilateral Debt Relief Initiative (MDRI) was granted by all multilateral creditors, Paris Club bilateral creditors, and five non-Paris Club creditors (China, India, Venezuela, Bulgaria, and Cuba). Debt owed to Brazil and North Korea was paid off without relief. The IMF, World Bank (IDA), and Inter-American Development Bank (IDB) provided debt relief amounting to US$640 million in 2006–07, along with Paris Club bilateral creditors and some non-Paris Club creditors within the 2004 Paris Club agreement.





6. **The authorities remain committed to ensuring fiscal prudence and contracting external loans on highly concessional terms.** In particular, the government has been prudent in ensuring that its fiscal integrity would not be compromised by contracting large debt and has been relying on concessional financing from Multilateral Development Banks, consistent with Staff recommendations.

7. **The government is planning to diversify the economy and support long-term growth by investing in infrastructure and education.** In response to the pandemic in 2020, the authorities reallocated expenditures towards cash grants and transfers to households and 'shovel ready' public investment projects, primarily focused on improving road networks and providing affordable housing. The 2022 budget includes a substantial increase in public investment, and the government is planning to maintain this effort over the medium term to address bottlenecks to growth, focusing on transport infrastructure and education (including greater access to education in the hinterland by building new schools). Public capital spending is projected to increase from 9.5 percent of non-oil GDP in 2021 to 12.1 percent in 2022 and to 12.5 percent of non-oil GDP over the medium-term. Additional support for long-term growth is expected to come from further progress on strengthening the governance framework, as it ensures a good use of public funds. Several pillars of the anticorruption framework have been recently strengthened, including the Integrity and Public Procurement Commissions (IC and PPC) and the National Procurement and Tender Administration Board (NPTAB). Audit reports of public expenditures, including for COVID, are published, and their recommendations are followed up on. On oil revenue transparency Guyana published its second EITI Report, covering fiscal year 2018 in April 2021 and is currently going through the validation process under the EITI Standard started in October 2021. Furthermore, the authorities are committed to follow up adequately on all EITI recommendations.

MACROECONOMIC ASSUMPTIONS

8. The assumptions in the baseline scenario are consistent with the macroeconomic framework presented in the Staff report. The baseline scenario incorporates the macroeconomic effects of oil through fiscal revenues from 2022 onwards and value added to domestic economic activities through employment and capital flows.[5] The scenario also includes the authorities' commitment to set in the medium-term annual budgets within a fiscal framework that constrains the annual non-oil overall fiscal deficit (after grants) to not exceed the expected transfer from the NRF. The discount rate used to calculate the net present value of external debt is 5 percent, consistent with the 2018 guidance note on Bank-Fund debt sustainability framework for low- income countries. The baseline projections are subject to significant risks, both upside and downside, relating to the future path of both oil prices and production, and to the government's fiscal policy stance. On the one hand, if the global economic recovery turns out to be more protracted, and/or the global shift towards greater reliance on non-fossil fuels turns out to be more pronounced than currently anticipated, this will put further downward pressure on oil prices. On the upside further oil discoveries and production, if managed effectively, would have positive effects on GDP growth and on the fiscal and external accounts. It is also important here to note that future economic volatility could be very different from past volatility, given the much stronger reliance on oil production and exports reflected in the projections.

9. The main assumptions are:

- **Real GDP growth is projected at 16.8 percent on average during 2022-2032, with considerable volatility reflecting projected movements in oil production.** Real GDP growth rose sharply in 2020 as Liza-1 oil field began operations. After declining somewhat in 2021, growth of oil production and real GDP are projected to spike sharply again in 2022 as Liza-2 started operating early in the year, followed by the Payara oil field at the end of 2023 and the Yellowtail oil field in 2025 (all included in the macroframework and the DSA). The 2020 growth outturn was lower than had been projected in the 2019 DSA, owing mostly to the impact of the COVID 19 pandemic and the economic effects of the political impasse. The projections also take into account 2022 measures to mitigate the impact of rising commodity prices on households, and an increase in capital spending to address social development and infrastructure needs, supported by oil revenues. In addition, growth projections of the domestic non-oil sectors, benefitting from the increases in public capital investment, are also included.

Text Table 2. Guyana Baseline Macroeconomic Assumptions
(Period averages)

	2019 DSA (2021-31)	2022 DSA (2022-32)
Real GDP growth	10.4	16.8
Real Non-oil GDP growth	4.3	5.4
Consumer prices (eop) 1/	2.8	4.3
Central Government overall bal. (pct of GDP 2/	1.3	-0.1
External current account balance (pct of GDP)	0.1	26.5

Sources: Guyanese authorities; and IMF staff calculations and projections.
1/ Measured as percent (y/y) change.
2/ After grants.

- **Inflation (measured by CPI) is projected to average 4.3 percent during 2022-2032.** This is higher than the previous forecast of 2.8 percent in the 2019 DSA, reflecting in part higher projected global food and commodity prices and the impact of higher fiscal spending on domestic demand.

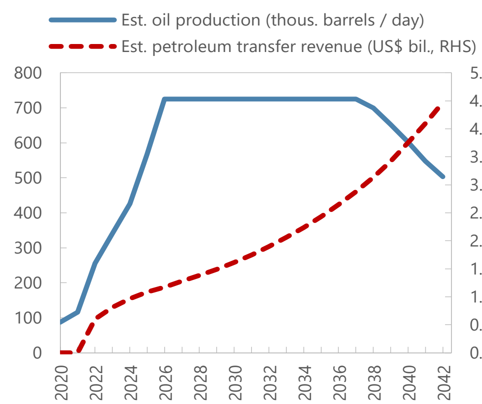
[5] Based on staff projections from the Fiscal Analysis of Resource Industries (FARI) Model with inputs from the authorities, taking into consideration oil royalty and production profit-sharing with ExxonMobil.

- **Central government overall balance is expected to average close to zero percent of GDP during 2022-2032.** Following the significant fiscal impulse in 2021, reflecting the government's fiscal response to the COVID-19 pandemic, there is projected to be a moderate pace of fiscal consolidation from this year onwards, consistent with the authorities' commitment reflected in the baseline scenario, as well as higher oil revenues. More specifically, there is projected to be a significantly smaller and shrinking overall fiscal deficit (less than 1 percent of GDP) over 2022-2024. Thereafter, the government is projected to maintain a zero overall budget balance over the long-run, in line with staff's recommendations, to which the authorities agreed. This fiscal framework helps minimize the negative macroeconomic effects of large capital spending, including the crowding out effects on private investment and consumption, while ensuring long-term fiscal sustainability. The accumulation of assets in the Natural Resources Fund serves as a buffer against shocks and for future generations. This fiscal path is somewhat different from what was projected at the time of the 2019 Article IV, given the fiscal policy developments. Government spending rose to address COVID related health expenditures and to mitigate the impact on the economy of COVID in 2020-21. Inflation projections are higher in 2022 and in the medium-term, and there is higher public spending projected to address social development needs and infrastructure gaps, given the much higher than expected oil revenues.

- **The projections take into account the recently revised rules for withdrawing funds from the Natural Resource Fund.** The Natural Resource Fund (NRF) Bill, signed into law by President Irfaan Ali on December 30, 2021, allows the government to extract the entire amount deposited in the NRF, over US$600 million, in the first year of operation of the Fund (2022) and use it for budgetary spending. Thereafter, after the first withdrawal, the proposed legislation sets out a ceiling on withdrawals, with a progressively smaller proportion of the balance in the NRF being allowed to be transferred to the budget for public spending, and the remainder of the petroleum revenues is accumulated as savings in the NRF. More specifically, in any given year, US$500 million can be withdrawn and then a reducing percentage of what remains, starting with 75% from the second five hundred million; 50% from the third five hundred million; 25% from the fourth five hundred million; 5% from the fifth five hundred million, and then 3% from any amounts in excess of US$2.5 billion.

- **Starting from 2022, oil revenues coming into the budget will have a significant positive impact on budget financing and debt dynamics.**[6] Oil production is expected to increase by 2025 by more than 300,000 barrels per day (to 720,000), compared

Guyana: Oil Production and Government Oil Revenue[1]



Sources: Authories data and IMF staff calculations.
[1] Projections on Liza Phase I and II only.

[6] Under the 2016 Production Sharing Agreement, up to 75% of each's year's oil revenues can be assigned to production costs while the remainder comprises profit oil to be split evenly between Guyana on one hand and ExxonMobil, Hess and CNOOC on the other. In addition, the contracts include a 2% royalty on gross earnings, leaving the government to receive 14.5% of initial oil revenues. The government will begin to receive higher revenues after the oil companies recuperate initial costs.

to the 2019 DSA. Over the medium-term estimated oil revenues[7] will more than cover the cost of additional spending planned by the new government on priority social sectors–health and education–and on infrastructure, and also the cost of gradually paying off the government's overdraft with the central bank. With real growth projections averaging close to 17 percent a year over 2022-2032 (reflecting both the direct and indirect effects of rapid growth of the oil sector) and substantially exceeding the real interest rate paid by the government on its debt, the public debt to GDP ratio is projected to fall from 22.8 percent in 2022 to 12.7 percent in 2032.

- **The current account balance is projected to improve significantly to a surplus of 26.5 percent of GDP on average during the forecast period.** The current account deficit widened significantly in 2021, mostly reflecting a significant increase in capital goods imports as the government ramped up public investment and oil companies continued to invest to expand new production capacity. However, as oil production from Liza II came into full swing in April 2022, followed by Payara and Yellowtail during the next three years, and as oil companies tamper down new investments, the current account is projected to shift to a significant surplus from 2022 onwards, also reflecting upward revisions of oil price projections This also takes into account the positive spillovers from the oil sector through investments in the non-oil economy.

- **Financing of the overall fiscal deficit will shift toward medium-term domestic sources.** The authorities are working on a step-by-step approach in deepening the interbank, domestic debt, and FX markets to strengthen the monetary policy framework and the transmission mechanism. In line with the government's plans to develop and deepen the domestic financial market, the share of short-term T-bills in domestic financing of the government's fiscal deficit is projected to fall steadily from 85% in 2022-27 to 65% in 2028-32, 45% in 2033-37, and to 40% in 2038-42. Correspondingly, the share of short-term bonds (1-3 years) increases over this period from 10% to 30%, and the share of medium-term bonds (4-7 years) increases from 5% to 30%. Given the projected large increases in oil revenue receipts, it is assumed that the government will not need to borrow externally after 2027. Medium-term external financing of the government's fiscal deficit is thus projected to decline steadily from 2023 to 2027.

RISK RATING AND VULNERABILITIES

10. Guyana's economic outlook is subject to downside and upside risks. On the downside, increased dependence over time on oil revenue could expose the economy to oil price volatility. In addition, excessively rapid increases in government spending from oil revenues could subject Guyana to the "natural resource curse," with significant inflationary pressures, eroding competitiveness from real exchange rate appreciation, and governance concerns. New waves of the COVID-19 virus associated with new variants, and delays in vaccinations, may make the impact of the pandemic more severe and long-lasting than currently expected. Prolonged disruption of international commodity markets and heightened oil price volatility, aggravated by the repercussions from the Russian invasion of Ukraine, also represent (both downside and upside) risks to the outlook. On the upside, further oil discoveries, some already announced

[7] By end-2027 more than US$21 billion are expected to be accumulated in the NRF, from US$607 million at end-2021.

in April 2022, and increases in production could significantly improve Guyana's economic prospects over the long-term. In particular, the oilfield discoveries announced by Exxon in April 2022 are not incorporated into projections. As in the past, they will be incorporated only when the production agreements with the government are concluded, and investment plans by Exxon management approved. Oil prices, which are currently taken from the latest WEO forecast, may be higher than under current projections if sanctions on Russia intensify.

11. The realism tools support the reasonableness of our projections, in line with historical and peer experiences, and taking into account the continuing structural changes taking place in Guyana's economy.

- **Forecast errors** (Figure 3): Forecast errors of past external debt projections (measured as the difference between actual and anticipated contributions on debt ratios) are at a relatively low level. The forecasts of both public and external debt to GDP ratios have been slightly higher relative to their actual outturns, largely owing to stronger real GDP growth than had been forecast and, in the case of external debt, to stronger-than-anticipated FDI flows. Relatively large residuals for external debt forecasts for the next five years are due for the most part to the DSA external debt dynamics assuming financing of the current account balance by both the private and public sectors, while in the case of Guyana data for private sector external debt is missing.

- **Realism of fiscal adjustment** (Figure 4): The three-year adjustment in the primary balance of 6.7 percentage point of GDP over the period 2021-2024 is large but consistent with our recommendation to use some of the accumulated oil revenues to finance expenditures only after improving the management and governance framework of oil revenue in 2022. The large projected primary surpluses over the next three years are mostly resulting from oil revenues flowing into the budget from 2022 onwards, and a commitment to a balanced budget by not increasing expenditures, especially capital spending beyond those revenues. Fiscal adjustment measures are not assumed. On a similar vein projected growth over the medium term is significantly higher than implied by the application of standard fiscal multipliers, mainly reflecting the major structural changes to the economy with the coming into production of new oil fields. These structural changes to the economy are also distorting the relationship between investment (private and public) rates and real GDP growth.

COUNTRY CLASSIFICATION AND SCENARIO STRESS TESTS

12. Guyana is assessed having a "weak" debt carrying capacity, given the large oil-related imports. Based on the April 2022 WEO and the 2020 CPIA, the country's composite indicator (CI) score is 2.66, falling just below the range of 2.69–3.05 for "medium" rated countries. Guyana's debt carrying capacity has fallen from a clear "medium" in the 2019 DSA, mainly due to lower import coverage of FX reserves, as oil-related imports have been revised upwards. It is important to note here that staff expects import coverage of FX reserves to improve significantly over the medium-term, and the authorities are also building up substantial external buffers in the Natural Resource Fund (NRF) which should help to mitigate negative shocks. Moreover, the DSA calculations do not take into account the structural changes the economy is going through and ignores expected reserve accumulation in the NRF, and hence may underestimate the true debt absorption capacity of the Guyanese economy.[8]

Text Table 3. Guyana: Debt Carrying Capacity Under the Composite Indicator Index

Components	Coefficients (A)	10-year average values (B)	CI Score components (A*B) = (C)	Contribution of components
CPIA	0.39	3.27	1.26	47%
Real growth rate (in percent)	2.72	8.52	0.23	9%
Import coverage of reserves (in percent)	4.05	20.29	0.82	31%
Import coverage of reserves^2 (in percent)	-3.99	4.12	-0.16	-6%
Remittances (in percent)	2.02	5.01	0.10	4%
World economic growth (in percent)	13.52	3.05	0.41	15%
CI Score			2.66	100%
CI rating			Weak	

Text Table 4. Guyana: Composite Indicator Index Thresholds

EXTERNAL debt burden thresholds	Weak	Medium	Strong
PV of debt in % of			
Exports	140	180	240
GDP	30	40	55
Debt service in % of			
Exports	10	15	21
Revenue	14	18	23

Text Table 5. Guyana: Debt Carrying Capacity and Thresholds

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Country	Guyana
Country Code	**336**

Debt Carrying Capacity	**Weak**

Final	Classification based on current vintage	Classification based on the previous vintage	Classification based on the two previous vintage
Weak	Weak 2.66	Weak 2.68	Medium 2.79

[8] The relevant indicative thresholds for public and publicly guaranteed (PPG) for external debt in this category are: 30 percent for the PV of debt-to-GDP ratio,140 percent for the PV of debt-to-exports ratio, 10 percent for the debt service to-exports ratio, and 14 percent for the debt service-to-revenue ratio. The benchmark of the PV of total public debt for "weak" debt carrying capacity is 35 percent.

13. The stress test for a combined contingent liability shock does not adjust the default setting for public–private partnership (PPP) debt. The authorities indicated no PPP debt outstanding as of end-2021 and any financing requirements by developmental agencies are met directly through central government borrowing. The World Bank Investments in IDA Countries Report also shows no outstanding PPI investments and projects in Guyana for 2013–21. Government liabilities included under the contingent liability shock include SOE debt and debt of financial institutions implicitly or explicitly guaranteed by the government.

Text Table 6. Guyana: Variables Used in Stress Test

1	The country's coverage of public debt	The central government plus social security, government-guaranteed debt, non-guaranteed SOE debt		
		Default	Used for the analysis	Reasons for deviations from the default settings
2	Other elements of the general government not captured in 1.	0 percent of GDP	0	
3	SoE's debt (guaranteed and not guaranteed by the government) 1/	2 percent of GDP	2	
4	PPP	35 percent of PPP stock	0.00	The authorities and IDA confirmed that PPP stock is zero
5	Financial market (the default value of 5 percent of GDP is the minimum value)	5 percent of GDP	5	
	Total (2+3+4+5) (in percent of GDP)		7.0	

1/ The default shock of 2% of GDP will be triggered for countries whose government-guaranteed debt is not fully captured under the country's public debt definition (1.). If it is already included in the government debt (1.) and risks associated with SoE's debt not guaranteed by the government is assessed to be negligible, a country team may reduce this to 0%.

DEBT SUSTAINABILITY ANALYSIS

EXTERNAL PPG DEBT

14. Under the baseline scenario, all external PPG debt indicators remain below the policy relevant benchmarks for the next ten years (Figure 1). The PV of external PPG debt is expected to decline gradually from 6.5 percent of GDP in 2022 to 3.4 percent in 2032 as existing debt is being amortized and the need to incur additional new external debt is significantly reduced with the incoming oil revenues to the central government budget starting from this year. This is largely consistent with the 2019 DSA results, although the base debt ratios for 2021 are significantly higher than had been projected in 2019. This mostly reflected the impact of the COVID 19 pandemic on the fiscal accounts, through (i) urgent need for pandemic related public spending, (ii) revenue losses brought about by the economic contraction, and (iii) tax policy measures introduced by the government to support households and businesses.

15. The standardized stress tests show that the debt trajectory deteriorates very early on with a combined shock, with the breach of the benchmark for the PV of external PPG debt-to-GDP ratio starting in 2024 (Table 3, Figure 1). The combined shock includes temporary shocks to real GDP growth, primary balance, exports, other flows (including current transfers and FDI), and nominal exchange rate depreciation.[9] Under these shocks—a very extreme scenario—the PV of debt-to-GDP ratio could increase to 49 percent in the first year after the shocks before declining steadily to 35 percent by 2030 and to 31 percent by 2032. A shock to exports also leads to relatively small breaches of the PV of debt-to-GDP benchmark over 2024-30. The debt service to revenue indicator benchmark is also breached under both the combined and export shocks for the years 2030-32. However, it is important to note that shocks under

[9] Section VI of the 2018 Guidance Note provides further details.

the stress tests could be overestimated because these shocks are based on historical macroeconomic paths that include structural changes caused by oil production.[10]

16. Largely consistent with the 2019 DSA, the results suggest that the risk of external debt distress remains moderate in the baseline scenario, with all solvency and liquidity indicators remaining below their relevant benchmarks. It could be argued that the breaches of the benchmarks under the shock scenarios are caused by shock assumptions which, under current and anticipated developments in Guyana, may be less relevant and likely. Moreover, consistent with the recently amended formula for transfer of oil revenues to the budget, the Natural Resource Fund is expected to accumulate substantial savings over the medium term, amounting to almost 216 percent of non-oil GDP by 2027.

17. With the current low level of external debt, Guyana's has substantial space to absorb shocks. Figure 5 shows that all debt burden indicators in the baseline scenario are well below their respective benchmarks from the Moderate Risk tool and show that Guyana has substantial space to absorb shocks. Only shocks in the upper quartile of the observed distribution of shocks would downgrade the country to high risk of debt distress.

PUBLIC SECTOR DEBT

18. Under the baseline scenario, the PV of public debt-to-GDP ratio does not breach the 35 percent benchmark (Table 2). The PV of debt-to-GDP ratio is expected to decline gradually from 19.2 percent in 2022 to 10.6 percent in 2032. The existing debt is being largely amortized and the need to incur large additional new external debt is significantly reduced with increasing oil revenues from 2022 onwards. The assumed adoption of a full fiscal responsibility framework that targets an overall balanced budget of zero, as agreed by the authorities, contributes to a further decline of the public-debt-to-GDP ratio.

19. The standardized stress tests show again that shocks to real GDP and to commodity prices are the ones leading to the highest PV of the debt-to-GDP ratio (Table 4, Figure 2). Under the real GDP growth shock, the debt ratio could reach close to 165 percent of GDP by 2032. In addition, a commodity price shock could result in a breach of the vulnerability threshold in 2024, pushing the PV of public debt-to-GDP to 42 percent that year and rising to 160 percent by 2032. The vulnerability to the latter shock highlights the importance of structural reforms to diversify the domestic economy to ensure broad-based growth and reduce reliance on the oil sector, thereby making the economy less exposed to oil price shocks. The susceptibility to these shocks also underscores the importance of adopting a fiscal responsibility framework to safeguard long-term debt sustainability.

CONCLUSION

20. The debt sustainability analysis under the LIC DSF framework suggests that Guyana's risk of external and overall debt distress remains moderate. While the country's debt dynamics improve considerably under the baseline, it remains vulnerable under the standardized stress tests. In the baseline scenario, debt indicators remain well below their respective benchmarks over the projection period. The

[10] The standardized shocks reflect the past structural shift (high real GDP growth in 2020 and 2021).

PV of external debt-to-GDP ratio is projected to decline to around 3.4 percent over the coming decade as the need for external borrowing is eliminated by the accumulation of external assets. At the same time stress tests indicate that Guyana's external public debt ratio is vulnerable to shocks, and in particular an extreme shock scenario that combines simultaneous shocks to real GDP growth, primary balance, exports, other flows (current transfers and FDI), and nominal exchange rate depreciation. Nevertheless, Guyana still has substantial space to absorb shocks, reflecting the current low level of external debt, as confirmed by the results from the Moderate Risk tool (Figure 5). Moreover, the Natural Resource Fund is expected to accumulate substantial savings over the medium term, amounting to almost 216 percent of non-oil GDP in 2027.

AUTHORITIES' VIEWS

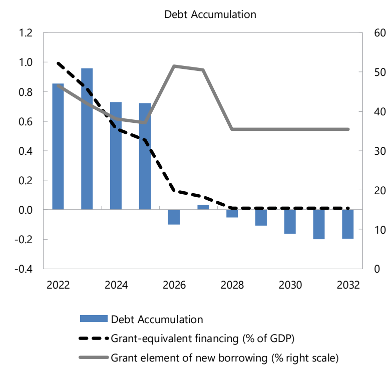
21. The authorities broadly agreed with the analysis and conclusions of the DSA, emphasizing the major structural changes taking place in the Guyanese economy and the significant savings accumulated and projected to accumulate in the Natural Resource Fund, which are not counted in gross official FX reserves, but represent considerable buffers.[11]

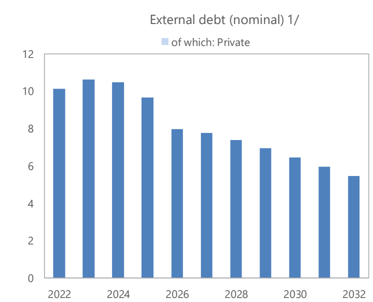
[11] Only the transfers from the NRF to the budget are included into reserves.

Table 1. Guyana: External Debt Sustainability Framework, Baseline Scenario, 2019–2042
(In percent of GDP, unless otherwise indicated)

	Actual			Projections								Average 8/	
	2019	2020	2021	2022	2023	2024	2025	2026	2027	2032	2042	Historical	Projections
External debt (nominal) 1/	**24.9**	**23.8**	**17.8**	**10.1**	**10.6**	**10.5**	**9.7**	**8.0**	**7.8**	**5.5**	**2.0**	**26.3**	**8.1**
of which: public and publicly guaranteed (PPG)	**24.9**	**23.8**	**17.8**	**10.1**	**10.6**	**10.5**	**9.7**	**8.0**	**7.8**	**5.5**	**2.0**	**26.3**	**8.1**
Change in external debt	-2.5	-1.1	-6.0	-7.7	0.5	-0.1	-0.8	-1.7	-0.2	-0.5	-0.2		
Identified net debt-creating flows	**-6.1**	**-8.2**	**-10.2**	**-10.9**	**-9.0**	**-12.0**	**-22.4**	**-26.9**	**-26.2**	**-21.0**	**-3.3**	**-2.8**	**-20.3**
Non-interest current account deficit	**52.8**	**16.0**	**25.2**	**-44.0**	**-31.0**	**-28.8**	**-17.6**	**-26.4**	**-26.8**	**-21.3**	**-3.2**	**15.1**	**-26.6**
Deficit in balance of goods and services	64.7	26.5	33.8	-46.4	-33.9	-51.4	-47.2	-64.1	-67.2	-56.1	-18.8	**25.8**	**-55.8**
Exports	34.6	51.0	60.1	80.4	80.9	80.3	80.9	85.1	84.9	75.6	41.5		
Imports	99.3	77.6	93.9	34.1	46.9	29.0	33.6	21.0	17.7	19.5	22.8		
Net current transfers (negative = inflow)	-12.3	-12.1	-13.3	-4.9	-4.4	-4.0	-3.3	-2.7	-2.7	-2.3	-0.8	**-10.9**	**-3.1**
of which: official	-1.0	-0.6	-0.3	-0.3	-0.3	-0.2	-0.2	-0.2	-0.2	-0.2	-0.1		
Other current account flows (negative = net inflow)	0.4	1.5	4.7	7.3	7.4	26.5	32.9	40.4	43.1	37.2	16.4	**0.2**	**32.3**
Net FDI (negative = inflow)	**-57.3**	**-23.2**	**-28.8**	**38.3**	**24.1**	**18.7**	**-2.5**	**1.4**	**0.8**	**0.5**	**0.0**	**-16.2**	**7.6**
Endogenous debt dynamics 2/	**-1.6**	**-0.9**	**-6.6**	**-5.2**	**-2.1**	**-1.8**	**-2.3**	**-1.9**	**-0.2**	**-0.2**	**-0.1**		
Contribution from nominal interest rate	0.5	0.4	0.3	0.2	0.2	0.2	0.2	0.2	0.1	0.1	0.0		
Contribution from real GDP growth	-1.4	-10.2	-4.0	-5.4	-2.3	-2.0	-2.5	-2.0	-0.3	-0.3	-0.1		
Contribution from price and exchange rate changes	-0.7	8.9	-2.9	...	...	...	...	...	...	...	...		
Residual 3/	**3.6**	**7.1**	**4.2**	**3.2**	**9.5**	**11.8**	**21.6**	**25.2**	**26.0**	**20.5**	**3.1**	**1.0**	**19.2**
of which: exceptional financing	-1.9	-0.3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0		
Sustainability indicators													
PV of PPG external debt-to-GDP ratio	**...**	**...**	**11.6**	**6.5**	**6.6**	**6.5**	**6.0**	**4.9**	**4.8**	**3.4**	**1.2**		
PV of PPG external debt-to-exports ratio	**...**	**...**	**19.4**	**8.1**	**8.1**	**8.1**	**7.4**	**5.7**	**5.6**	**4.5**	**2.8**		
PPG debt service-to-exports ratio	**4.4**	**2.7**	**1.8**	**0.8**	**0.7**	**0.7**	**0.6**	**0.5**	**0.3**	**0.5**	**0.3**		
PPG debt service-to-revenue ratio	**6.8**	**7.0**	**6.5**	**4.4**	**4.0**	**3.8**	**3.6**	**3.9**	**2.4**	**2.5**	**0.5**		
Gross external financing need (Billion of U.S. dollars)	-0.2	-0.3	-0.2	-0.8	-1.1	-1.8	-4.5	-6.8	-7.3	-6.7	-1.6		
Key macroeconomic assumptions													
Real GDP growth (in percent)	5.4	43.5	23.8	57.8	25.2	21.2	28.2	25.5	3.3	5.1	5.1	**9.6**	**16.8**
GDP deflator in US dollar terms (change in percent)	2.6	-26.3	14.0	21.9	-9.6	-6.7	-5.9	-3.7	-0.7	-1.5	0.4	**0.5**	**-1.1**
Effective interest rate (percent) 4/	1.8	1.8	1.9	2.0	1.9	1.9	2.1	2.2	1.3	1.2	1.1	**1.6**	**1.6**
Growth of exports of G&S (US dollar terms, in percent)	16.8	55.8	66.2	157.2	13.9	12.3	21.5	27.2	2.3	0.8	-4.1	**15.2**	**21.6**
Growth of imports of G&S (US dollar terms, in percent)	49.5	-17.4	70.8	-30.3	56.0	-30.2	40.2	-24.4	-13.9	5.6	7.0	**16.3**	**2.1**
Grant element of new public sector borrowing (in percent)	...	...	...	46.5	41.9	38.1	37.2	51.4	50.5	35.5	0.0	**...**	**40.3**
Government revenues (excluding grants, in percent of GDP)	22.3	20.0	16.6	14.0	14.4	14.3	12.9	11.6	12.1	15.6	23.3	**18.7**	**13.6**
Aid flows (in Billion of US dollars) 5/	0.1	0.1	0.2	0.2	0.2	0.2	0.2	0.1	0.0	0.0	0.0		
Grant-equivalent financing (in percent of GDP) 6/	...	...	...	1.0	0.8	0.6	0.5	0.1	0.1	0.0	0.0	**...**	**0.3**
Grant-equivalent financing (in percent of external financing) 6/	...	...	...	56.6	41.9	38.1	37.2	51.4	50.5	35.5	...	**...**	**41.2**
Nominal GDP (Billion of US dollars)	5	5	8	15	17	19	23	28	28	33	52		
Nominal dollar GDP growth	8.1	5.8	41.1	92.3	13.2	13.1	20.7	20.8	2.6	3.5	5.5	**9.4**	**16.2**
Memorandum items:													
PV of external debt 7/	...	...	11.6	6.5	6.6	6.5	6.0	4.9	4.8	3.4	1.2		
In percent of exports	...	...	19.4	8.1	8.1	8.1	7.4	5.7	5.6	4.5	2.8		
Total external debt service-to-exports ratio	4.4	2.7	1.8	0.8	0.7	0.7	0.6	0.5	0.3	0.5	0.3		
PV of PPG external debt (in Billion of US dollars)			0.9	1.0	1.1	1.2	1.4	1.3	1.4	1.1	0.6		
(PVt-PVt-1)/GDPt-1 (in percent)				0.9	1.0	0.7	0.7	-0.1	0.0	-0.2	-0.1		
Non-interest current account deficit that stabilizes debt ratio	55.3	17.0	31.2	-36.3	-31.4	-28.7	-16.8	-24.7	-26.6	-20.8	-2.9		

Definition of external/domestic debt	**Residency-based**
Is there a material difference between the two criteria?	**No**





Sources: Country authorities; and staff estimates and projections.

1/ Includes both public and private sector external debt.

2/ Derived as [r - g - ρ(1+g) + Ɛα (1+r)]/(1+g+ρ+gρ) times previous period debt ratio, with r = nominal interest rate; g = real GDP growth rate, ρ = growth rate of GDP deflator in U.S. dollar terms, Ɛ=nominal appreciation of the local currency, and α= share of local currency-denominated external debt in total external debt.

3/ Includes exceptional financing (i.e., changes in arrears and debt relief); changes in gross foreign assets; and valuation adjustments. For projections also includes contribution from price and exchange rate changes.

4/ Current-year interest payments divided by previous period debt stock.

5/ Defined as grants, concessional loans, and debt relief.

6/ Grant-equivalent financing includes grants provided directly to the government and through new borrowing (difference between the face value and the PV of new debt).

7/ Assumes that PV of private sector debt is equivalent to its face value.

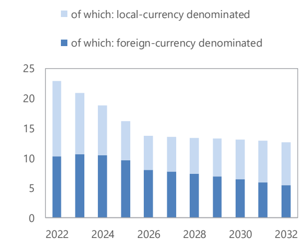
8/ Historical averages are generally derived over the past 10 years, subject to data availability, whereas projections averages are over the first year of projection and the next 10 years.

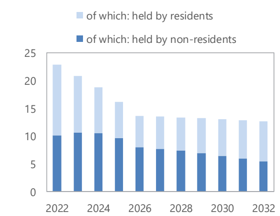
Table 2. Guyana: Public Sector Debt Sustainability Framework, Baseline Scenario, 2019–2042
(In percent of GDP, unless otherwise indicated)

	Actual			Projections								Average 6/	
	2019	2020	2021	2022	2023	2024	2025	2026	2027	2032	2042	Historical	Projections
Public sector debt 1/	**43.6**	**51.1**	**42.9**	**22.8**	**20.9**	**18.8**	**16.2**	**13.7**	**13.5**	**12.7**	**10.2**	**45.2**	**15.6**
of which: external debt	**24.9**	**23.8**	**17.8**	**10.1**	**10.6**	**10.5**	**9.7**	**8.0**	**7.8**	**5.5**	**2.0**	**26.3**	**8.1**
			25.1	12.7	10.2	8.3	6.5	5.7	5.8				
Change in public sector debt	-3.5	7.5	-8.2	-20.1	-2.0	-2.1	-2.6	-2.5	-0.1	-0.2	-0.3		
Identified debt-creating flows	**-1.1**	**5.4**	**-7.7**	**-18.3**	**-3.2**	**-2.9**	**-3.8**	**-3.1**	**-0.4**	**-0.5**	**-0.3**	**-0.2**	**-3.1**
Primary deficit	**2.0**	**7.2**	**6.7**	**0.4**	**0.2**	**0.0**	**-0.2**	**-0.2**	**-0.1**	**-0.1**	**0.0**	**3.1**	**0.0**
Revenue and grants	23.4	20.6	16.9	14.3	14.4	14.3	12.9	11.6	12.1	15.6	23.3	**19.6**	**13.7**
of which: grants	1.1	0.7	0.3	0.3	0.0	0.0	0.0	0.0	0.0	0.0	0.0		
Primary (noninterest) expenditure	25.4	27.9	23.6	14.7	14.6	14.2	12.7	11.4	12.0	15.5	23.3	**22.7**	**13.6**
Automatic debt dynamics	**-3.1**	**-1.8**	**-14.3**	**-18.7**	**-3.4**	**-2.9**	**-3.6**	**-3.0**	**-0.3**	**-0.4**	**-0.3**		
Contribution from interest rate/growth differential	-2.8	-8.4	-12.7	-18.7	-3.4	-2.9	-3.6	-3.0	-0.3	-0.4	-0.3		
of which: contribution from average real interest rate	-0.4	4.8	-2.9	-3.0	1.2	0.8	0.5	0.3	0.1	0.2	0.2		
of which: contribution from real GDP growth	-2.4	-13.2	-9.8	-15.7	-4.6	-3.7	-4.1	-3.3	-0.4	-0.6	-0.5		
Contribution from real exchange rate depreciation	-0.3	6.5	-1.6	...	...	...	...	...	...	...	...		
Other identified debt-creating flows	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**
Privatization receipts (negative)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0		
Recognition of contingent liabilities (e.g., bank recapitalization)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0		
Debt relief (HIPC and other)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0		
Other debt creating or reducing flow (please specify)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0		
Residual	**-2.3**	**2.1**	**-0.5**	**-1.7**	**1.2**	**0.9**	**1.2**	**0.6**	**0.3**	**0.3**	**0.1**	**-1.3**	**0.4**
Sustainability indicators													
PV of public debt-to-GDP ratio 2/	**...**	**...**	**36.7**	**19.2**	**16.8**	**14.8**	**12.5**	**10.6**	**10.5**	**10.6**	**9.4**		
PV of public debt-to-revenue and grants ratio	**...**	**...**	**216.8**	**134.1**	**117.0**	**103.7**	**96.5**	**91.1**	**86.8**	**68.2**	**40.4**		
Debt service-to-revenue and grants ratio 3/	**64.0**	**68.2**	**129.3**	**39.1**	**33.9**	**21.8**	**13.8**	**9.9**	**10.2**	**14.9**	**12.0**		
Gross financing need 4/	17.0	21.3	28.5	6.0	5.1	3.1	1.6	1.0	1.1	2.2	2.7		
Key macroeconomic and fiscal assumptions													
Real GDP growth (in percent)	5.4	43.5	23.8	57.8	25.2	21.2	28.2	25.5	3.3	5.1	5.1	**9.6**	**16.8**
Average nominal interest rate on external debt (in percent)	1.8	1.8	1.9	2.0	1.9	1.9	2.1	2.2	1.3	1.2	1.1	**1.6**	**1.6**
Average real interest rate on domestic debt (in percent)	-2.4	36.3	-11.2	-17.1	12.4	9.2	8.5	6.0	2.9	4.2	2.8	**1.7**	**3.8**
Real exchange rate depreciation (in percent, + indicates depreciation)	-1.1	37.3	-8.7	...	...	...	...	...	...	...	...	**2.7**	**...**
Inflation rate (GDP deflator, in percent)	3.0	-26.3	14.0	21.9	-9.6	-6.7	-5.9	-3.7	-0.7	-1.5	0.4	**0.8**	**-1.1**
Growth of real primary spending (deflated by GDP deflator, in percent)	8.1	57.4	4.8	-1.7	24.2	18.2	15.0	12.4	9.0	10.3	8.7	**11.3**	**11.6**
Primary deficit that stabilizes the debt-to-GDP ratio 5/	5.5	-0.3	14.8	20.4	2.2	2.0	2.4	2.3	0.0	0.1	0.2	**6.7**	**2.7**
PV of contingent liabilities (not included in public sector debt)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0		

Definition of external/domestic debt	**Residency-based**
Is there a material difference between the two criteria?	**No**

Public sector debt 1/





Sources: Country authorities; and staff estimates and projections.

1/ Coverage of debt: The central government plus social security, government-guaranteed debt, non-guaranteed SOE debt . Definition of external debt is Residency-based.

2/ The underlying PV of external debt-to-GDP ratio under the public DSA differs from the external DSA with the size of differences depending on exchange rates projections.

3/ Debt service is defined as the sum of interest and amortization of medium and long-term, and short-term debt.

4/ Gross financing need is defined as the primary deficit plus debt service plus the stock of short-term debt at the end of the last period and other debt creating/reducing flows.

5/ Defined as a primary deficit minus a change in the public debt-to-GDP ratio ((-): a primary surplus), which would stabilizes the debt ratio only in the year in question.

6/ Historical averages are generally derived over the past 10 years, subject to data availability, whereas projections averages are over the first year of projection and the next 10 years.

Table 3. Guyana: Sensitivity Analysis for Key Indicators of Public and Publicly Guaranteed External Debt, 2022–2032
(In percent)

	Projections 1/										
	2022	**2023**	**2024**	**2025**	**2026**	**2027**	**2028**	**2029**	**2030**	**2031**	**2032**
PV of debt-to GDP ratio											
Baseline	6	7	6	6	5	5	5	4	4	4	3
A. Alternative Scenarios											
A1. Key variables at their historical averages in 2022-2032 2/	6	10	16	27	**40**	**53**	**65**	**75**	**83**	**91**	**96**
B. Bound Tests											
B1. Real GDP growth	6	11	16	15	12	12	11	11	10	9	8
B2. Primary balance	6	7	8	8	7	7	7	7	7	7	7
B3. Exports	6	20	**44**	**39**	**33**	**33**	**33**	**33**	**31**	30	28
B4. Other flows 3/	6	19	30	26	22	22	22	22	21	20	19
B5. Depreciation	6	9	15	13	11	11	11	11	10	9	9
B6. Combination of B1-B5	6	19	**49**	**43**	**37**	**37**	**37**	**36**	**35**	**33**	**31**
C. Tailored Tests											
C1. Combined contingent liabilities	6	7	8	7	6	6	6	6	6	6	6
C2. Natural disaster	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.
C3. Commodity price	6	16	22	20	17	17	17	17	17	16	16
C4. Market Financing	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.
Threshold	30	30	30	30	30	30	30	30	30	30	30
PV of debt-to-exports ratio											
Baseline	8	8	8	7	6	6	6	5	5	5	5
A. Alternative Scenarios											
A1. Key variables at their historical averages in 2022-2032 2/	8	13	20	33	47	62	78	92	105	117	127
B. Bound Tests											
B1. Real GDP growth	8	8	8	7	6	6	6	5	5	5	5
B2. Primary balance	8	9	10	10	8	9	9	9	9	9	9
B3. Exports	8	30	83	72	58	59	61	61	60	58	57
B4. Other flows 3/	8	23	37	32	26	26	27	27	26	25	25
B5. Depreciation	8	8	14	13	10	10	10	10	10	9	9
B6. Combination of B1-B5	8	17	30	34	27	28	28	28	28	27	26
C. Tailored Tests											
C1. Combined contingent liabilities	8	9	10	9	7	8	8	8	8	8	8
C2. Natural disaster	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.
C3. Commodity price	8	24	33	28	22	21	22	22	22	22	21
C4. Market Financing	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.
Threshold	140	140	140	140	140	140	140	140	140	140	140
Debt service-to-exports ratio											
Baseline	1	1	1	1	1	0	0	0	0	1	1
A. Alternative Scenarios											
A1. Key variables at their historical averages in 2022-2032 2/	1	1	1	1	1	1	2	2	3	4	4
B. Bound Tests											
B1. Real GDP growth	1	1	1	1	1	0	0	0	0	1	1
B2. Primary balance	1	1	1	1	1	0	0	1	1	1	1
B3. Exports	1	1	2	2	2	2	2	3	5	5	5
B4. Other flows 3/	1	1	1	1	1	1	1	1	2	2	2
B5. Depreciation	1	1	1	1	1	0	0	1	1	1	1
B6. Combination of B1-B5	1	1	1	1	1	1	1	1	2	2	2
C. Tailored Tests											
C1. Combined contingent liabilities	1	1	1	1	1	0	0	0	1	1	1
C2. Natural disaster	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.
C3. Commodity price	1	1	1	1	1	1	1	1	2	2	2
C4. Market Financing	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.
Threshold	10	10	10	10	10	10	10	10	10	10	10
Debt service-to-revenue ratio											
Baseline	4	4	4	4	4	2	2	3	3	3	2
A. Alternative Scenarios											
A1. Key variables at their historical averages in 2022-2032 2/	4	4	5	6	9	9	11	13	**16**	**19**	**22**
B. Bound Tests											
B1. Real GDP growth	4	6	9	9	9	6	6	6	7	7	6
B2. Primary balance	4	4	4	4	4	3	3	3	4	4	4
B3. Exports	4	4	7	10	10	8	8	11	**18**	**17**	**15**
B4. Other flows 3/	4	4	6	7	7	6	5	9	12	11	10
B5. Depreciation	4	5	5	6	6	4	4	4	6	6	5
B6. Combination of B1-B5	4	6	10	13	13	10	10	13	**20**	**19**	**17**
C. Tailored Tests											
C1. Combined contingent liabilities	4	4	4	4	4	3	3	3	3	3	3
C2. Natural disaster	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.
C3. Commodity price	4	5	7	9	8	6	5	7	9	9	8
C4. Market Financing	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.
Threshold	14	14	14	14	14	14	14	14	14	14	14

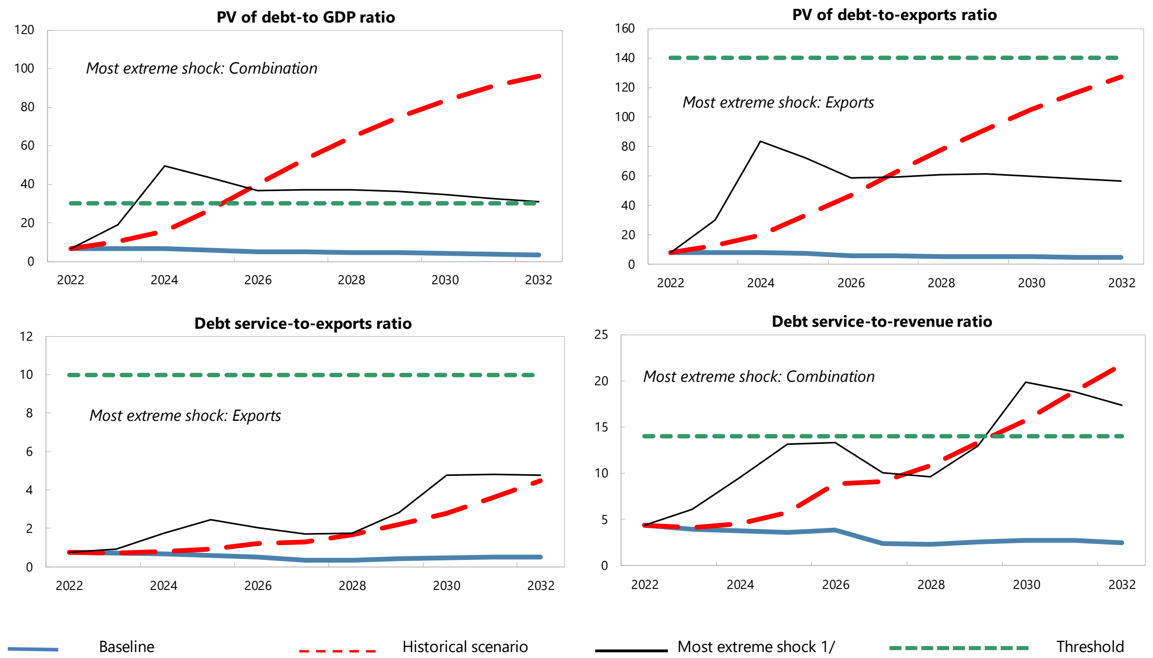
Sources: Country authorities; and staff estimates and projections.
1/ A bold value indicates a breach of the threshold.
2/ Variables include real GDP growth, GDP deflator (in U.S. dollar terms), non-interest current account in percent of GDP, and non-debt creating flows.
3/ Includes official and private transfers and FDI.

Table 4. Guyana: Sensitivity Analysis for Key Indicators of Public Debt, 2022–2032 1/

	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032
					PV of Debt-to-GDP Ratio						
Baseline	19	17	15	12	11	11	11	11	11	11	11
A. Alternative Scenarios											
A1. Key variables at their historical averages in 2022-2032 2/	19	19	19	20	20	21	22	22	23	23	24
B. Bound Tests											
B1. Real GDP growth	19	**35**	**65**	**70**	**73**	**88**	**103**	**117**	**133**	**148**	**165**
B2. Primary balance	19	22	24	19	16	16	16	16	16	16	16
B3. Exports	19	29	**47**	**40**	34	35	**35**	35	34	33	32
B4. Other flows 3/	19	29	**38**	33	28	28	28	28	27	27	26
B5. Depreciation	19	17	14	11	9	8	7	7	6	6	5
B6. Combination of B1-B5	19	23	24	22	22	25	28	31	33	**36**	**38**
C. Tailored Tests											
C1. Combined contingent liabilities	19	23	20	17	14	14	14	14	14	14	14
C2. Natural disaster	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.
C3. Commodity price	19	25	**42**	**56**	**65**	**82**	**98**	**113**	**128**	**143**	**160**
C4. Market Financing	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.
TOTAL public debt benchmark	35	35	35	35	35	35	35	35	35	35	35
					PV of Debt-to-Revenue Ratio						
Baseline	134	117	104	96	91	87	83	79	75	72	68
A. Alternative Scenarios											
A1. Key variables at their historical averages in 2022-2032 2/	134	132	134	153	176	173	169	165	161	157	152
B. Bound Tests											
B1. Real GDP growth	134	247	458	544	631	721	802	872	938	999	1,057
B2. Primary balance	134	150	165	150	139	132	125	118	111	105	100
B3. Exports	134	200	328	310	296	285	274	259	240	221	204
B4. Other flows 3/	134	201	267	251	240	231	222	209	194	180	166
B5. Depreciation	134	116	97	84	74	66	58	51	44	37	31
B6. Combination of B1-B5	134	163	172	169	189	206	219	228	235	240	243
C. Tailored Tests											
C1. Combined contingent liabilities	134	162	141	129	120	114	108	103	97	93	88
C2. Natural disaster	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.
C3. Commodity price	134	231	398	609	736	796	828	838	904	966	1,024
C4. Market Financing	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.
					Debt Service-to-Revenue Ratio						
Baseline	39	34	22	14	10	10	11	12	13	14	15
A. Alternative Scenarios											
A1. Key variables at their historical averages in 2022-2032 2/	39	35	23	16	13	13	13	14	15	16	16
B. Bound Tests											
B1. Real GDP growth	39	55	110	167	224	287	336	373	406	434	458
B2. Primary balance	39	34	43	54	42	37	32	29	28	27	26
B3. Exports	39	34	24	19	15	15	15	19	26	26	26
B4. Other flows 3/	39	34	24	18	13	13	14	18	22	23	23
B5. Depreciation	39	32	21	14	10	10	10	11	12	12	12
B6. Combination of B1-B5	39	39	30	19	37	59	75	90	102	113	121
C. Tailored Tests											
C1. Combined contingent liabilities	39	34	51	37	28	25	23	22	21	21	21
C2. Natural disaster	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.
C3. Commodity price	39	46	32	114	237	317	357	372	403	429	452
C4. Market Financing	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.	n.a.

Sources: Country authorities; and staff estimates and projections.
1/ A bold value indicates a breach of the benchmark.
2/ Variables include real GDP growth, GDP deflator and primary deficit in percent of GDP.
3/ Includes official and private transfers and FDI.

Figure 1. Guyana: Indicators of Public and Publicly Guaranteed External Debt under Alternatives Scenarios, 2022–2032



Customization of Default Settings		
	Size	Interactions
Tailored Stress		
Combined CL	No	
Natural disaster	n.a.	n.a.
Commodity price 2/	No	No
Market financing	n.a.	n.a.

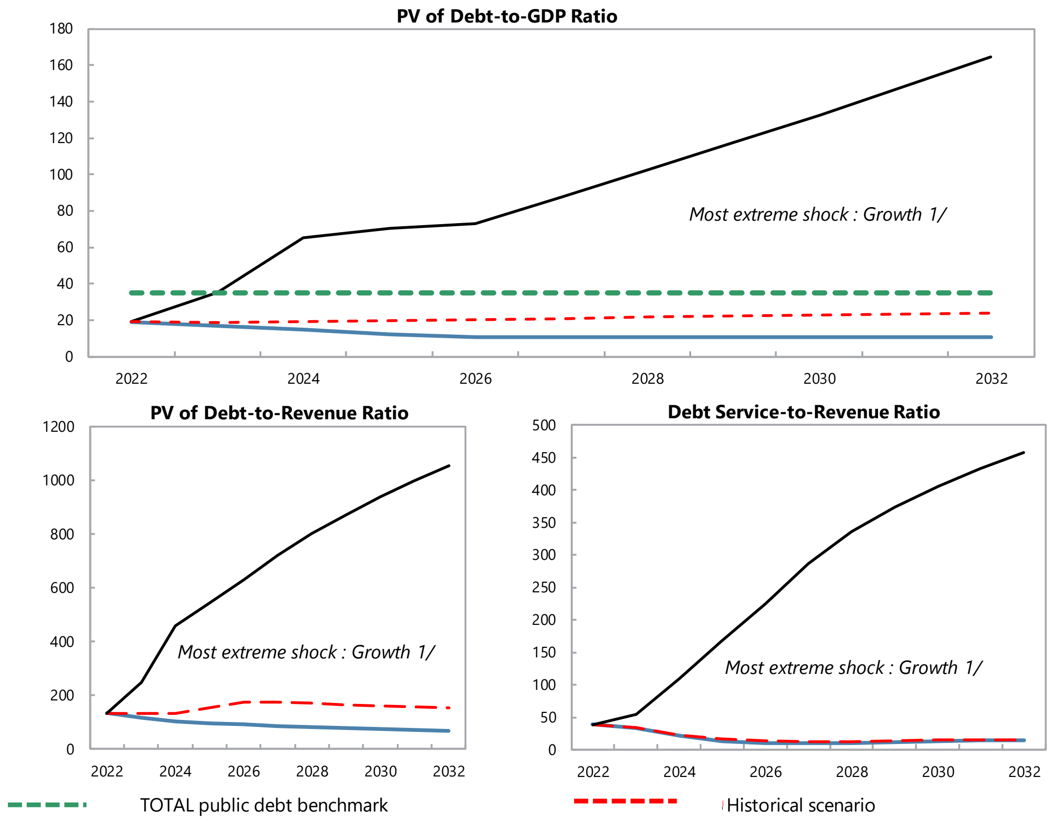
Note: "Yes" indicates any change to the size or interactions of the default settings for the stress tests. "n.a." indicates that the stress test does not apply.

Borrowing assumptions on additional financing needs resulting from the stress tests*		
	Default	User defined
Shares of marginal debt		
External PPG MLT debt	100%	
Terms of marginal debt		
Avg. nominal interest rate on new borrowing in USD	1.5%	1.5%
USD Discount rate	5.0%	5.0%
Avg. maturity (incl. grace period)	30	30
Avg. grace period	5	5

* Note: All the additional financing needs generated by the shocks under the stress tests are assumed to be covered by PPG external MLT debt in the external DSA. Default terms of marginal debt are based on baseline 10-year projections.

Sources: Country authorities; and staff estimates and projections.
1/ The most extreme stress test is the test that yields the highest ratio in or before 2032. The stress test with a one-off breach is also presented (if any), while the one-off breach is deemed away for mechanical signals. When a stress test with a one-off breach happens to be the most exterme shock even after disregarding the one-off breach, only that stress test (with a one-off breach) would be presented.
2/ The magnitude of shocks used for the commodity price shock stress test are based on the commodity prices outlook prepared by the IMF research department.

Figure 2. Guyana Indicators of Public Debt Under Alternative Scenarios, 2022–2032



Borrowing assumptions on additional financing needs resulting from the stress tests*	Default	User defined
Shares of marginal debt		
External PPG medium and long-term	19%	19%
Domestic medium and long-term	11%	11%
Domestic short-term	70%	70%
Terms of marginal debt		
External MLT debt		
Avg. nominal interest rate on new borrowing in USD	1.5%	1.5%
Avg. maturity (incl. grace period)	30	30
Avg. grace period	5	5
Domestic MLT debt		
Avg. real interest rate on new borrowing	8.6%	8.6%
Avg. maturity (incl. grace period)	2	2
Avg. grace period	1	1
Domestic short-term debt		
Avg. real interest rate	3.2%	3.2%

* Note: The public DSA allows for domestic financing to cover the additional financing needs generated by the shocks under the stress tests in the public DSA. Default terms of marginal debt are based on baseline 10-year projections.

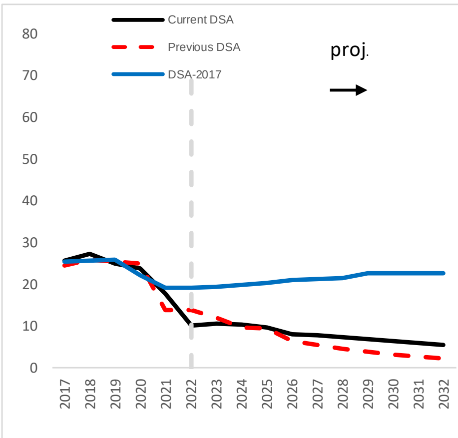
Sources: Country authorities; and staff estimates and projections.

1/ The most extreme stress test is the test that yields the highest ratio in or before 2032. The stress test with a one-off breach is also presented (if any), while the one-off breach is deemed away for mechanical signals. When a stress test with a one-off breach happens to be the most exterme shock even after disregarding the one-off breach, only that stress test (with a one-off breach) would be presented.

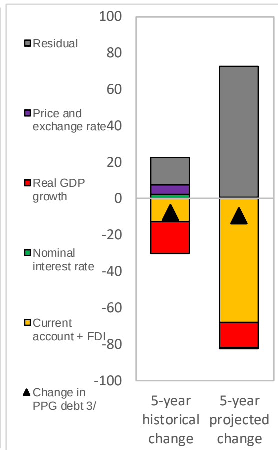
Figure 3. Guyana: Drivers of Debt Dynamics – Baseline Scenario

External debt

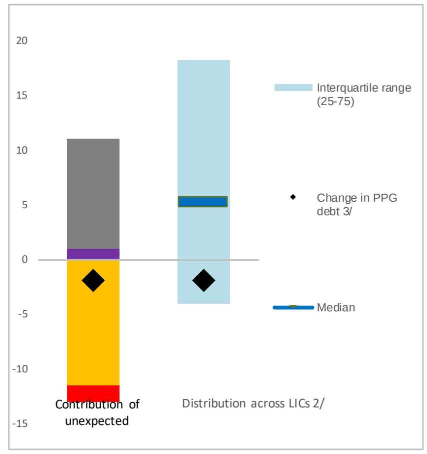
Gross Nominal PPG External Debt
(in percent of GDP; DSA vintages)



Debt-creating flows
(percent of GDP)

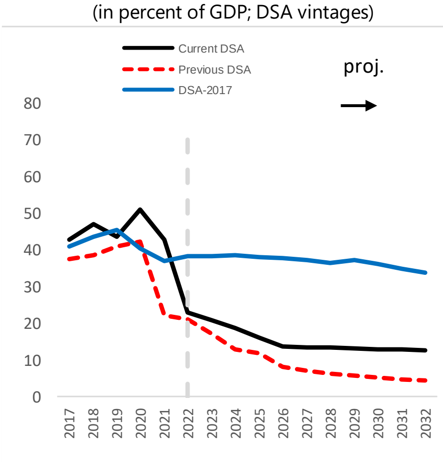


Unexpected Changes in Debt 1/
(past 5 years, percent of GDP)

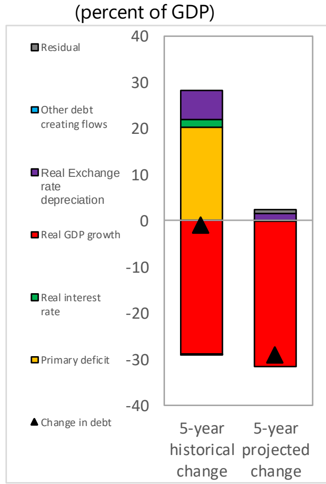


Public debt

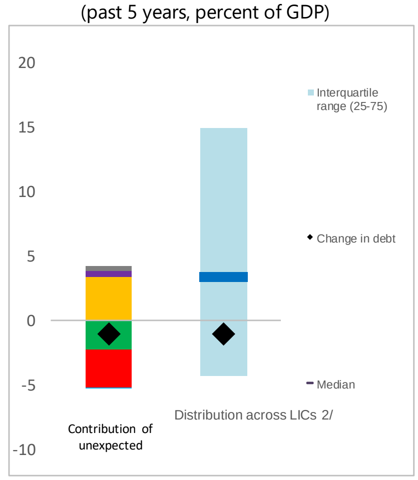
Gross Nominal Public Debt
(in percent of GDP; DSA vintages)



Debt-creating flows
(percent of GDP)



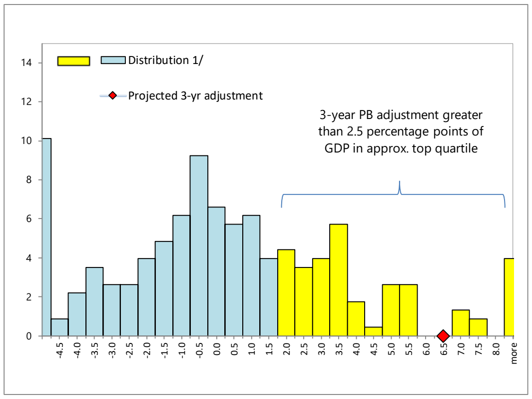
Unexpected Changes in Debt 1/
(past 5 years, percent of GDP)



1/ Difference between anticipated and actual contributions on debt ratios.
2/ Distribution across LICs for which LIC DSAs were produced.
3/ Given the relatively low private external debt for average low-income countries, a ppt change in PPG external debt should be largely explained by the drivers of the external debt dynamics equation.

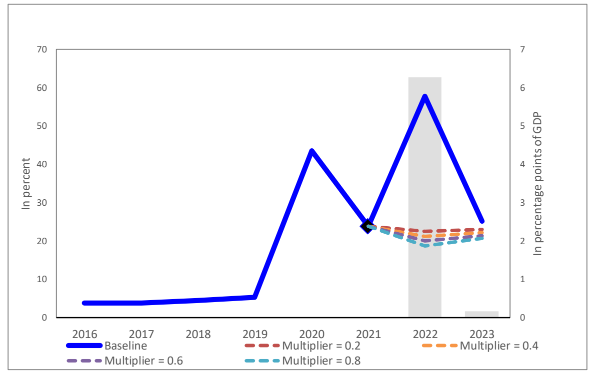
Figure 4. Guyana: Realism Tools

3-Year Adjustment in Primary Balance
(Percentage points of GDP)



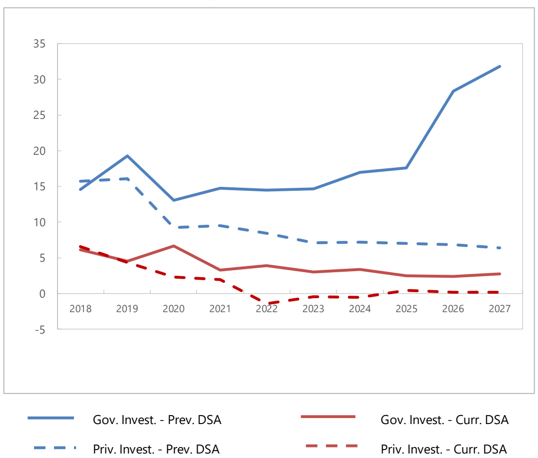
1/ Data cover Fund-supported programs for LICs (excluding emergency financing) approved since 1990. The size of 3-year adjustment from program inception is found on the horizontal axis; the percent of sample is found on the vertical axis.

Fiscal Adjustment and Possible Growth Paths 1/



1/ Bars refer to annual projected fiscal adjustment (right-hand side scale) and lines show possible real GDP growth paths under different fiscal multipliers (left-hand side scale).

Public and Private Investment Rates
(percent of GDP)



Contribution to Real GDP growth
(percent, 5-year average)

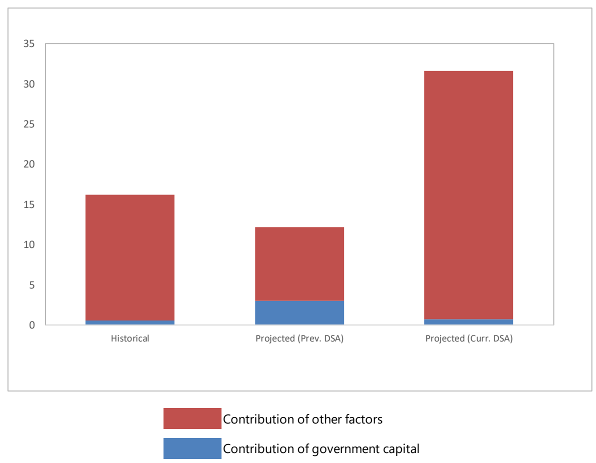


Figure 5. Guyana: Qualification of the Moderate Category, 2022–2032 1/

Sources: Country authorities; and staff estimates and projections.
1/ For the PV debt/GDP and PV debt/exports thresholds, x is 20 percent and y is 40 percent. For debt service/Exports and debt service/revenue thresholds, x is 12 percent and y is 35 percent.