

## FINANCIAL ANALYSIS

### A. Introduction

1. The fiscal position of the Government of Papua New Guinea (PNG) is examined to determine the financial sustainability of project investments in accordance with the Asian Development Bank (ADB) guidelines.<sup>1</sup> With PNG having adopted a free primary health care policy in 2014, the Health Services Sector Development Program (SDP) has no revenue-generating component and thus precludes evaluation of financial costs against any financial benefits.<sup>2</sup> As in many Pacific islands, as well as in other developing economies, detailed information on ideal levels of annual operation and maintenance (O&M) funding required to sustainably deliver a minimum standard of health care in PNG is currently unavailable. However, based on historical data and best available estimates, project investments under the SDP can be sustainable, provided that program-related system improvements that help build financial management capacity in the health sector are implemented, and policy actions across the associated subprograms are followed through to promote overall public spending efficiency.

### B. Government's Fiscal Position

2. The Government of PNG adopted an expansionary fiscal stance over 2011–2014, first to partly finance the construction of the liquefied natural gas (LNG) pipeline project, and then to stimulate growth in a stagnant non-mineral economy. Sharp rises in public expenditure pushed the fiscal position from near balance in 2011 to a deficit equivalent to almost 7% of gross domestic product (GDP) by 2013 (Table 1). The start of LNG exports in 2014 generated large increases in government revenues that covered a large part of the expenditure expansion. However, international fuel prices almost halved over 2015—coinciding with the first year of LNG exports—resulting in large shortfalls in expected revenue. With prices remaining soft, PNG has been forced into a period of fiscal adjustment to align public expenditure with a shrinking resource envelope.

**Table 1: Selected Macroeconomic Indicators (2011–2017)**

Indicator	2011	2012	2013	2014	2015	2016	2017e
GDP growth (%)	1.1	4.6	3.8	12.5	10.5	2.0	2.2
Inflation (%)	4.4	4.6	5.0	5.2	6.0	6.7	5.9
Revenues and grants (K billion)	9.3	9.6	9.9	11.9	10.9	10.5	10.5
Expenditure and net lending (K billion)	9.4	10.9	13.2	15.5	13.5	13.6	12.8
Fiscal balance (% of GDP)	(0.2)	(3.1)	(6.9)	(6.3)	(4.0)	(4.6)	(3.2)
Current account balance (% of GDP)	(16.7)	(36.1)	(30.7)	1.3	13.3	15.2	13.9
GDP (K billion)	42.6	44.4	47.7	56.6	63.6	67.3	70.2

( ) negative, e = estimate, GDP = gross domestic product, K = kina.

Source: Asian Development Bank estimates.

3. The government has managed to steadily bring down the fiscal deficit from the equivalent of 4.6% of GDP in 2016 to an estimated 3.2% in 2017. Following the July 2017 elections, the government introduced a supplementary budget in September, outlining measures to align the public expenditure profile with lower than projected revenue collections. The supplementary

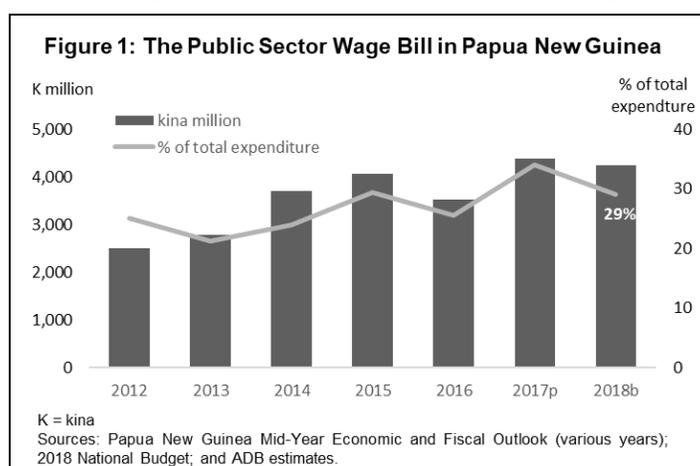
<sup>1</sup> ADB. 2005. *Financial Management and Analysis of Projects*. Manila; and ADB. 2009. *Financial Due Diligence: A Methodology Note*. Manila.

<sup>2</sup> In some cases, fees are charged when health facilities experience shortages of medicines or other input factors. Timely and full release of health function grants—and improved capacity to manage and audit these, as well as improvements to the availability of medical supplies, to be supported under the SDP—will help reduce risks from unofficial charging for services that intermittently occur in facilities that do not receive mandated funding.

budget cut capital expenditures by 32%, mostly by de-funding provincial and district service improvement programs (PSIP and DSIP, respectively) by about K900 million.<sup>3</sup> Funding was only maintained for ongoing PSIP and DSIP projects with relatively high disbursement rates and cofinancing from development partners. The supplementary budget also shifted funding away from new capital projects toward O&M of existing assets. Of the K1.3 billion total reduction in capital expenditures, K774 million was effectively reallocated to fund additional spending needs, most notably the wage bill, debt servicing, and the purchase of pharmaceutical drugs.

4. Sustained follow-through on reforms included in the new government's 25 Point 100 Day Economic Stimulus Plan (100-Day Plan)—in the areas of revenue generation and fiscal discipline—is needed to support a further narrowing of the fiscal deficit.<sup>4</sup> Tax compliance is reinforced through (i) revenue taskforces charged with collecting outstanding company income taxes and customs fees, among others; and (ii) compulsory registration of taxpayer identification numbers with links to investment permits and companies' access to bank accounts. The plan also seeks to start simplifying and modernizing PNG's tax system to boost the business environment and raise revenues over the longer term. These, together with other reforms from the government's collaboration with the International Monetary Fund and the World Bank on revenue mobilization are seen to support gradual improvements in PNG's ratio of revenues to GDP.

5. On the expenditure side, payroll management to tame a bloated public sector wage bill remains the chief priority (Figure 1). The 100-Day Plan pushes for a physical audit of the payroll—beginning with the education sector, which accounts for about a third of the government wage bill—along with the compulsory national identification registration of all public servants to plug leakages. Further, the Organization Staffing and Personnel Emoluments Audit Committee is tasked to identify government agencies and functions that can effectively be merged to reduce inefficiencies. A hiring freeze also remains in place, and payments to all public employees are being migrated to a centralized government payroll system to strengthen control and oversight.



6. The 2018 Budget targets maintaining the fiscal deficit at the equivalent of 2.5% of GDP. A planned gradual reduction of the deficit to the equivalent of 1.2% of GDP by 2022 is underpinned by expectations of a steady decline in the ratio of public expenditures to GDP. This, in turn, is

<sup>3</sup> Concerns about the efficiency and sustainability of DSIP- and PSIP-funded capital outlays persist, which makes these cuts an appropriate response in the current situation. Strengthened project financial management and oversight is supported under the SDP to increase the impact of DSIP and PSIP on the health sector once full funding resumes.

<sup>4</sup> The plan outlines reform priorities to be initiated within the new government's first 100 days in power, with some specific activities scheduled and sequenced to be completed over the course of the current term.

centered on a renewed focus on reducing the associated operating costs of running the public service. Initial projections show a planned nominal reduction in the public wage bill of about 3%, bringing its share in total expenditures back to 29%, comparable to where it was in 2015. Stronger performance management measures, however, are also needed to complement payroll-cleansing efforts to promote effective and efficient delivery of basic government services, particularly in education and health.

### C. Health Sector Budget

7. The health sector is one of PNG's priority sectors (along with education, infrastructure, and law and order) for stimulating development. Health sector funding largely flows through the Department of Health (DOH), Hospital Management Services, and the various provincial health authorities (PHAs). The introduction of free primary health care in 2014, backed by booming LNG revenues, saw health spending rise by 53%, but the onset of fiscal difficulties resulted in a 38% cut the following year (Table 2). Funding for the health sector has stabilized at just over K1 billion per annum through 2015–2016, still below pre-LNG boom levels. However, priority recurrent expenditure items—including O&M costs—have been protected from budget cuts that have otherwise compressed spending for new capital projects. In 2016, recurrent spending in the health sector rebounded to K990 million, which is 17% higher than the 4-year average over 2012–2015. The 2018 budget allocates about K1 billion to recurrent spending in health, which includes a budget increase for the purchase of vital medicines.

**Table 2: Health Sector Expenditure, 2012–2016**  
(K million)

Item	2012	2013	2014	2015	2016
Government of Papua New Guinea	770.8	944.7	1,484.0	835.8	1,064.3
<i>Recurrent expenses</i>	662.6	815.7	1,180.4	720.9	989.7
<i>Capital outlays</i>	108.2	129.0	303.6	114.9	74.6
External financing	83.9	162.5	212.2	222.7	0.0
<b>Total health sector expenditure</b>	<b>854.7</b>	<b>1,107.2</b>	<b>1,696.2</b>	<b>1,058.6</b>	<b>1,064.3</b>
<i>% of total public spending</i>	8.7	8.2	12.4	7.2	10.0

Sources: Fiscal Year Budget Adjusted Audited Reports for Health Sector (various years) and Asian Development Bank estimates.

8. Financing for frontline health in PNG is fragmented, with some funds going directly to PHAs, hospitals, or church-run providers, and some via provincial administrations. Other funding streams are subject to provincial or district negotiations over provincial internal revenue and PSIP and DSIP funds. Provincial internal revenue is expected to be the primary source of operational funding for rural health services, with the health function grant (an intergovernmental transfer from the national government to the provincial governments) designed to only assist in filling the operational funding gap for provinces that do not otherwise have enough internal revenue to meet the operational costs of rural health services. Including support from the SDP, larger shares of health spending are expected to flow through PHAs—seven newly funded ones came into being in 2017–2018—with a corresponding decline in allocations to DOH and hospital management services, which will gradually reduce the described fragmentation in fund flows.

### D. Financial Sustainability of the Proposed Project

9. The project investment under the SDP is estimated to cost \$104.5 million, comprising \$95.0 million in ADB loan financing and \$9.5 million in government counterpart funds. Project funds are expected to augment total health sector resources by about 5.1% over the SDP's implementation period of 2018–2025.

10. Investment costs for two district hospitals and six health centers are estimated at \$63.5 million. Normative estimates of annual operational funding requirements for health facilities in PNG are not currently available, but proper costing of health service delivery has been identified as a government priority. The SDP will support this costing exercise through consultants in coordination with ongoing efforts by the World Bank and the Government of Australia. A recently completed countrywide health facility survey estimates the average annual costs of running public health centers and district hospitals (service levels 3–4) at about K3.2 million (\$1 million).<sup>5</sup> However, comparable church-run health facilities (levels 3–4) are operating at lower annual costs of about K2.3 million (\$0.7 million), while at the same time providing services to populations in more remote areas.<sup>6</sup> This indicates some room for reducing annual O&M costs if spending inefficiencies are adequately addressed.

11. For the purposes of this analysis, recurrent O&M costs are estimated at \$1 million for each district hospital and \$750,000 for each health center.<sup>7</sup> In total, additional O&M costs for the eight new health facilities are estimated at K19.1 million per annum, or a 1.8% increase on the current health budget from 2021 (Table 3). Amid ongoing fiscal difficulties, potentially substantial risks could arise to the sustainability of O&M funding for the project's health facility investments.

12. The SDP is putting in place various measures to mitigate risks to sustainable O&M funding. The highest-impact measure is the prioritization of rehabilitating and upgrading existing health facilities rather than establishing additional facilities not yet included in the government's facility network. This means that such facilities already receive allocations for human resources, medical supplies, and other operational funding, even if the facilities' poor state limits service access and only allows low-quality service provision. Additional O&M funding in those cases will only be necessary where the facility level will be increased, e.g., a health center is upgraded to a district hospital. Provincial master planning will be undertaken to determine the most efficient distribution and levels of facilities, and the facilities eligible for upgrades or rehabilitation.

13. This can result in significant savings in annual O&M requirements. To illustrate, suppose the project identifies: (i) 2 existing health centers that should be upgraded to district hospitals; (ii) 3 aid posts for upgrading to health centers; and (iii) 3 rundown health centers for rehabilitation. Additional O&M costs under this scenario will amount to only K6.4 million, or about one-third of requirements in the all-new-facilities case (Table 3).<sup>8</sup> Any alternative scenario that combines construction of new facilities with some facility upgrades will result in additional O&M requirements that fall between the two estimates above. In this way, additional O&M requirements in the all-new-facilities case can be considered as the upper-limit estimate. Any additional O&M needs will be agreed with the province to be financed from internal revenue, which is reflected as one of the key criteria in selecting project investments.

---

<sup>5</sup> Government of Australia and World Bank. 2017. *Service Delivery by Health Facilities in Papua New Guinea*. May (unpublished).

<sup>6</sup> Church-run health facilities essentially operate as government contractors that deliver services in areas where the public sector generally is unable to effectively reach.

<sup>7</sup> These estimates are also informed by the recent experience of the project management unit of the ongoing Rural Primary Health Services Delivery Project in upgrading over 30 community health posts across PNG.

<sup>8</sup> This assumes that a one-level upgrade in health facilities incurs additional O&M costs of about \$250,000, which is consistent with estimated requirements of \$1 million for district hospitals (level 4 facility) and \$750,000 for health centers (level 3). It then follows that annual O&M requirements are \$500,000 for community health posts (level 2) and \$250,000 for aid posts (level 1).

**Table 3: Health Budget Projections, with Project**  
(K million)

Item	2018	2019	2020	2021	2022	2023	2024	2025
Total health expenditure	1,491.1	1,012.1	1,080.5	1,080.1	1,134.1	1,190.8	1,250.4	1,312.9
Project investment	33.6	50.4	67.2	67.2	67.2	50.4	...	...
<b>Additional recurrent costs</b>								
<b>A. New health facilities</b>	...	...	...	19.1	20.0	21.0	22.1	23.2
% of health budget	...	...	...	1.8	1.8	1.8	1.8	1.8
<b>B. Facility upgrades/rehab</b>	...	...	...	6.4	6.8	7.1	7.4	7.8
% of health budget	...	...	...	0.6	0.6	0.6%	0.6	0.6
Increase in fiscal space (from efficiency gains)	...	...	...	...	...	6.7	13.3	20.0

... = not applicable, rehab = rehabilitation.

Source: Asian Development Bank estimates.

14. In parallel, the project will support DOH, in close collaboration with Australia and the World Bank, in estimating operational funding requirements for the various health facility levels. The information will be used to support ring-fencing of adequate funding in the national budget, to complement provincial internal revenue. This links to the Medium Term Fiscal Strategy support through the SDP policy matrix and ongoing ADB technical assistance with the Department of Treasury, reflecting government commitment to ring-fencing resources for the health sector and improving long-term sustainability of funding.

15. Further sustainability measures include: (i) low-maintenance facility designs, e.g., by minimizing utility costs such as electricity; (ii) expanded coverage of the electronic national health information system, which provides accurate service delivery reports and has the potential to track spending needs against actual expenditures to identify specific gaps to be filled to safeguard health services delivery; (iii) maintenance budgeting and asset management integrated in the PHA manual and suite of capacity development programs; (iv) awareness raising on the need to develop a maintenance culture across the broader public sector; and, importantly, (v) reform area 2.2 in the policy matrix ensures that funding for health facility maintenance becomes a priority within the national and PHA monitoring regimes.

16. Spending-efficiency gains arising from a combination of regulatory framework and system improvements as well as capacity development interventions supported by the SDP will help generate additional fiscal space that can be channeled toward increased O&M funding. The increased fiscal space can be expected to exceed inflation-adjusted annual O&M costs in the upper-limit estimate (all new health facilities) by 2026 (or 2024 for the scenario with facility upgrades and rehabilitation), if all complementary policy reforms and other project-related interventions in building financial management capacity are successfully implemented.<sup>9</sup>

17. The preceding financial analysis demonstrates the government's commitment to funding future maintenance needs of upgraded health facilities. To support this commitment, the government is working with development partners to free-up substantial resources that can be channeled toward more productive O&M spending, while also building the capacity of provincial governments to maintain health facilities, including project outputs. Further, institutional and governance reforms will also be accelerated through policy reforms, and project training will clarify mandates and accountabilities, determine O&M funding levels required, and build capacity in asset management.

<sup>9</sup> Consistent with the economic analysis of the SDP, efficiency gains are conservatively assumed to build up to 0.25% of total government expenditure 5 years after project completion: Economic Analysis (accessible from the list of linked documents in Appendix 2 of the main text of the report and recommendation of the President).