# **Appendix C: Revenue and expense assumptions** and sensitivity analysis

The 2023–24 Queensland Budget, similar to all other jurisdictions, is based in part on assumptions made about parameters, both internal and external to Queensland, which can impact directly on economic and fiscal forecasts. The sensitivity of revenue and expense forecasts to movements in underlying assumptions is particularly relevant given the uncertainty in global and national economic conditions in the context of recent global and domestic developments that have impacted key revenues.

The forward estimates in the 2023–24 Queensland Budget are framed on a no-policy-change basis. That is, the expenditure and revenue policies in place at the time of the budget (including those announced in the budget) are applied consistently throughout the forward estimates period.

Table C.1 shows the main components of taxation and royalty revenue, and the forecast revenues for each component across the forward estimates.

	2021–22 Actual \$ million	2022–23 Est. Act. \$ million	2023–24 Budget \$ million	2024–25 Projection \$ million	2025–26 Projection \$ million	2026–27 Projection \$ million
Payroll tax and mental health levy	5,001	5,874	6,524	6,913	7,315	7,738
Transfer duty	6,336	5,209	5,385	5,607	5,877	6,166
Other duties	1,963	2,213	2,255	2,350	2,450	2,554
Gambling taxes and levies	1,645	1,927	2,015	2,096	2,182	2,271
Land tax	1,633	1,777	2,031	2,280	2,416	2,471
Motor vehicle registration	2,103	2,186	2,301	2,398	2,499	2,589
Other taxes	1,330	1,378	1,426	1,481	1,546	1,597
Total tax revenue	20,011	20,563	21,938	23,125	24,285	25,387
Royalties						
Coal	7,243	15,296	5,345	4,024	4,224	4,400
Petroleum <sup>2</sup>	1,184	2,332	1,275	1,222	1,143	1,039
Other royalties <sup>3</sup>	490	477	503	483	460	440
Total royalties	8,917	18,105	7,123	5,730	5,827	5,878
Land rents	171	183	195	200	204	209
Total royalties and land rents	9,088	18,288	7,318	5,929	6,032	6,087

#### Table C.19 Taxation and royalty revenue<sup>1</sup>

Numbers may not add due to rounding. 1.

2. Includes liquefied natural gas (LNG).

Includes base and precious metal and other mineral royalties. 3

The remainder of this chapter outlines the key assumptions, estimates and risks associated with key revenue and expenditure forecasts.

# Taxation revenue assumptions and revenue risks

The rate of growth in tax revenues is dependent on a range of factors linked to the rate of growth in economic activity in the state. Some taxes are closely related to activity in specific sectors of the economy, whilst others are broadly related to the general rate of economic growth, employment, inflation or wages.

Therefore, any change in the level of economic activity compared with that reflected in the economic forecasts outlined in this paper, would impact a broad range of taxation receipts.

# Wages and employment growth - payroll tax collections

Wages and employment growth have a direct impact on payroll tax collections. In 2023–24, wages in Queensland are forecast to increase by 4 per cent, while employment is forecast to rise 1 per cent in 2023–24.

The composition of the payroll tax base is also important as businesses in sectors such as tourism, retail and hospitality are often outside the tax base because they are below a threshold.

A one percentage point variation in either Queensland wages growth or employment would change total payroll tax collections by approximately \$65 million in 2023–24.

# Transfer duty estimates

Transfer duty collections in 2023–24 are expected to grow modestly by 3.4 per cent compared with 2022–23 as housing market activity begins to stabilise. However, in the context of recent and future increases in interest rates, there are uncertainties as to the size and timing of impacts on housing markets.

After declining in 2022–23, house prices are expected to return to modest growth across 2023–24 and 2024–25, and transaction volumes are also expected to return to be more in line with pre-2020–21 levels. The combination of these factors, along with ongoing recovery in the non-residential sector, is supporting an expected average annual growth of 4.6 per cent in transfer duty over the 3 years ending 2026–27.

A one percentage point variation in either the average value of property transactions or the volume of transactions would change transfer duty collections by approximately \$54 million in 2023–24.

# Royalty assumptions and revenue risks

Table C.2 provides the key assumptions adopted for the 2023–24 Queensland Budget in relation to coal and petroleum royalties, which represent the bulk of Queensland's royalty revenue.

	2021–22 Actual	2022–23 Est. Act.	2023–24 Budget	2024–25 Projection	2025–26 Projection	2026–27 Projection		
Tonnages - crown export <sup>2</sup> coal (Mt)	185	188	199	219	230	238		
Exchange rate US\$ per A\$ <sup>3</sup>	0.72	0.68	0.73	0.75	0.75	0.75		
Year average coal prices (US\$ per tonne) <sup>4,5</sup>								
Hard coking	392	281	185	175	175	175		
PCI/Semi-soft	310	265	158	149	149	149		
Thermal	244	310	153	120	120	120		
Year average oil pric	e							
Brent (US\$ per barrel) <sup>6</sup>	77	102	81	79	76	75		

# Table C.20 Coal royalty assumptions<sup>1</sup>

Notes:

1. Numbers in this table may be affected by rounding.

Excludes coal produced for domestic consumption and where royalties are not paid to the government (private royalties). The 2023–24 estimated domestic coal volume is approximately 25.5 Mt and private coal is 4.1 Mt.
Estimated vear-average.

 Estimated year-average spot prices for highest quality coking and thermal coal. Lower quality coal can be sold below this price, with indicative average prices for 2023–24 as follows: hard coking US\$170/t and thermal US\$122/t.

5. In previous budget papers, year-average contract price assumptions were published. However, spot prices are now considered to better reflect expected price movements in the dynamic global coal market. As such, spot prices are outlined in this Budget and will be presented in future budget papers.

Published Brent oil prices are lagged by 4 months to better align with royalty revenue.

#### Exchange rate and commodity prices and volumes

Estimates of mining royalties are sensitive to movements in the A\$-US\$ exchange rate and commodity prices and volumes.

Since mid-2021, there has been an unprecedented surge in coal prices. While prices have since moderated from these exceptionally high levels, they remain elevated compared to historical levels.

The recent strength in prices is primarily driven by a range of short-term supply side factors and disruptions. As such, prices are expected to return to more sustainable levels across the forward estimates. However, the timing and extent of the decline remains uncertain.

Coal royalties are based on progressive rates with higher royalty rates applying to higher coal prices. This means coal royalty estimates are even more sensitive to price movements at times when prices are very high, therefore providing increased returns to Queenslanders from royalties on this valuable and limited resource during times when coal producers are also benefitting from the high prices in terms of increased revenues and profits.

Contracts for the supply of commodities are generally written in US dollars. Accordingly, a change in the exchange rate impacts on the Australian dollar price of commodities and, therefore, expected royalty collections.

#### Potential impact on coal royalty revenue<sup>1</sup>

For each one cent movement in the A\$-US\$ exchange rate in 2023–24, the impact on royalty revenue would be approximately \$136 million.

A one per cent variation in export coking and thermal coal volumes would lead to a change in royalty revenue of approximately \$47 million. A one million tonne variation would lead to a change in royalty revenue of approximately \$24 million.

A one per cent variation in the average price of export coal would lead to a change in royalty revenue of approximately \$98 million.

# Parameters influencing Australian Government GST payments to Queensland

The 2023–24 Queensland Budget incorporates estimates of GST revenue grants to Queensland based on 2023–24 Federal Budget estimates of national GST collections and Queensland Treasury assumptions of Queensland's share. The estimates of collections are primarily determined by the value of national consumption subject to GST.

Since the Australian Government payments are based on the amount actually collected, it is the Queensland Budget that bears the risks of fluctuations in GST collections. As with all other tax estimates, there is a risk of lower collections than estimated if national economic growth and consumption are weaker than expected.

Due to the complexities associated with the GST base, the information provided in the Federal Budget papers is insufficient to prepare indicative estimates of the sensitivity of GST forecasts to key variables.

# Sensitivity of expenditure estimates and expenditure risks

#### Public sector wage costs

Salaries and wages form a large proportion of General Government Sector operating expenses. Increases in salaries and wages are negotiated through enterprise bargaining agreements.

The 2023–24 Budget and forward estimates reflect growth in full-time equivalent and wage increases consistent with existing agreements, the government's wages policy, and an allowance for future bargaining agreements. A one percentage point increase in wage rates above expectation would increase employee expenses by around \$322 million per annum.

<sup>&</sup>lt;sup>1</sup> Sensitivities represent the estimated change to royalty revenue accruing over the 2023–24 return period.

### Interest rates

The General Government Sector has a total debt servicing cost forecast at \$1.974 billion in 2023–24. The current average duration of General Government Sector borrowing with the Queensland Treasury Corporation (QTC) is 6 years.

The majority of General Government Sector debt is held under fixed interest rates and, therefore, the impact of interest rate variations on debt servicing costs in 2023–24 would be relatively modest, with the impact occurring progressively across the forward estimates.

#### Actuarial estimates of superannuation and long service leave

Liabilities for superannuation and long service leave are estimated by the State Actuary with reference to, among other things, assumed rates of investment returns, salary growth, inflation and the discount rate. These liabilities are therefore subject to changes in these parameters. Similarly, the long service leave liabilities are subject to the risk that the actual rates of employee retention will vary from those assumed in the liability calculation.