FISCAL TIME SERIES EXPLANATORY NOTE

1. Introduction

The purpose of this explanatory note is to set out the key features of the pre-1994 fiscal indicators and contrast them with the post-1994 series. The note draws on a range of sources including Budgets and Financial Statements. The commentary in the 1992 Financial Statements of the Government of New Zealand is especially useful in terms of historical accounting developments, interpretation of accrual fiscal information and the relationships between alternative reporting frameworks.

The 1994 Budget was the first published under New Zealand Generally Accepted Accounting Practice (GAAP). *Ex post* financial statements on a GAAP basis had been published since 1991. GAAP provides a reporting framework with an integrated and internally consistent set of financial statements (ie, financial performance, financial position and cash flows). The reporting framework is specified in the legislation underpinning fiscal policy, the Public Finance Act 1989. The 2007 Budget was prepared under a new set of accounting standards, New Zealand equivalents to International Financial Reporting Standards (NZ IFRS). These new standards are part of GAAP.

Other fiscal reporting frameworks are available, including the *System of National Accounts 1993* (SNA 1993) and *Government Finance Statistics 2001* (GFS 2001), both of which are also accruals based. These reporting frameworks are prevalent in macroeconomic forecasting and are used internationally, notably GFS in Australia and SNA by the OECD.[1]

Statistics New Zealand (SNZ) have recently published a set of General Government sector accounts (ie, for central and local government) on an SNA basis. Because these accounts cover a different entity to that of the Total Crown, and use a different accounting framework, they are not directly comparable to GAAP indicators. SNZ also supply GFS 2001 material to the IMF (eg, for the purposes of the GFS Yearbook).

It is important to stress that the switch from cash-based (so-called) “Table 2” to accrual-based GAAP created a fundamental break in the fiscal time series. There are fiscal time series preceding Table 2 and many of these are included in the Long-Term Data Series available on the SNZ website. However, as Table 2 was the system prior to GAAP there is good documentation on the transition and reconciliations are available. Although such reconciliations might exist or be feasible for earlier fiscal series, we have not investigated them here. Furthermore, we have focused on Table 2 series starting in 1971/72 because important information (in particular, “lending minus repayments”) is not readily available before this year.[2]

The note is organised in terms of chronological developments, starting in Section 2 with Table 2 then hybrids and alternative frameworks in Section 3. Section 4 covers reconciliations between Table 2 and GAAP. Section 5 concludes with some issues related to the interpretation of trends in Table 2 expenditure.

[1] The fiscal information for New Zealand published by the OECD in its *Economic Outlook* is for the SNA General Government sector.

[2] A ten-year (1962/63 to 1971/72) summary of Table 2 information is provided in the 1973 Budget (Tables 14 and 15).

2. Table 2

Table 2 reported cash flows.[3] The format and accounting policies used to produce Table 2 were unique to it, evolving over time and without corresponding to any independently recognised set of principles. The reporting entity for Table 2 differed from GAAP. The GAAP series consolidates the Reserve Bank of New Zealand, State-owned enterprises and Crown entities. The Table 2 series excludes these entities and was essentially a core Crown concept.

Table 2 reported the "deficit or surplus before borrowing". This was the amount the government needed to borrow to finance its activities for the year (or where it had a surplus, the amount available to pay off existing debt). The overall borrowing programme could be more or less than the Table 2 balance depending on such things as the need to roll-over debt or changes to the level of cash reserves.

Net expenditure in Table 2 comprised operating payments (net of revenue from sales or user charges) and net (of sales) purchases of physical assets. Cash flows relating to purchases of physical assets are not separately identifiable. Net expenditure was used to avoid double-counting that occurred whenever a department charged another for goods and services. Other issues associated with interpreting trends in Table 2 net expenditure are discussed in Section 5 below.

The Table 2 balance was useful for its intended purpose of accounting for the changes in public debt and public account investments.[4] However:

- It was not an appropriate measure of the macroeconomic implications of fiscal imbalances. For example, the monetary effects of an increase in public account lending to the Rural Bank were identical to those of increased Reserve Bank lending to the Meat Board. Yet the Table 2 balance was affected by the former and not the latter since the activities of the Reserve Bank were excluded.[5]

- It was not compiled in a manner that revealed the extent to which borrowing was financing current rather than capital spending.

- It did not reveal the extent to which some borrowing resulted from the government acting as a financial intermediary (ie, net lending), either borrowing to on-lend to entities or lending to government corporations.

---

[3] Useful references are Annex 3 in the 1986 Budget (Part I: Speech and Annex), Annex 1 in the 1987 Budget (Part I: Speech and Annex), and Annex 1 in the 1988 Budget (Part II: Annex and Tables).

[4] See 1984 Post Election Briefing, Chapter 7 "Macroeconomic effects of fiscal policy" (pp.173-193).

[5] Two studies that examined alternative fiscal indicators and their impact on the economy include: Buckle R. A and S. L Snively (1979) "The budget impact on aggregate demand and money supply" New Zealand Institute of Economic Research, Discussion Paper No.24; Dean, R. S and R. G Smith (1980) "The stabilisation role of fiscal policy" New Zealand Planning Council, Planning Paper No.5.

As defined by the IMF, "net lending" (or "lending minus repayments") comprises transactions in financial assets:[6]

- Government lending for public policy purposes (less repayments).
- Government acquisitions of equity capital for public policy purposes (less sales of such equities).

A distinction was also made between Table 2(I) and Table 2(II), where the latter included expenditure on major projects and producer board financing. Hybrid fiscal balances discussed in Section 3 were derived from the Table 2(I) measure. Table 2 was last published by the Treasury in the 1994 Financial Statements (the 1993/94 actual).

3. Hybrid Table 2 fiscal indicators and other reporting frameworks

In the late 1980s the concept of the Financial Balance (FB) was introduced. In order to focus on the change in net liabilities, flows that did not change net liabilities such as loan advances and equity injections were removed.

The FB was the difference between receipts and expenditure (current plus capital expenditure), but excluding net lending transactions. It measured the extent to which current plus recurring capital expenditure exceeded current revenue and thus measured the need to raise finance by raising net liabilities and/or selling assets. The FB approximated SNA net saving on the assumption that capital formation matched capital consumption.

The FB derived from Table 2 (and published in Table 2A) was introduced in the 1989 Budget (with actual reported figures starting in 1988).[7] The net lending series in Table 2A was also published Government Finance Statistics (GFS) summary tables. Negative net lending indicates that loan repayments and assets sales are greater than new loans issued and acquisitions of equity. Over the 1970s and most of the 1980s, net lending was positive (ie, the government was issuing loans and acquiring equity). As a result, the FB deficit was lower than the Table 2 deficit. In the late 1980s net lending became negative as a result of asset sales and the FB deficit was larger than the Table 2 deficit, where the latter was occasionally in surplus. However, because the net lending series is only available from 1971/72, measures of the financial balance are available only from this year on.

The cash based GFS system was introduced in the 1984 Budget and was described as a more comprehensive framework than Table 2.[8] GFS separated expenditure on current items from capital expenditures and showed whether these were financed from current revenue, borrowing or asset sales. As noted in the 1992 Financial Statements of the Government (Annex C), although the cash based GFS system recorded current and capital flows it did not report depreciation. The GFS system was developed by the IMF to provide an internationally comparable set of fiscal statistics. The tables

[6] "Net lending" (or "lending minus repayments") used in this context describes the net acquisition of financial assets for policy purposes and should not be confused with net lending in GFSM 2001 (or SNA) where the term refers to saving less investment.

[7] As discussed in Section 1, the Table 2 balance used in Table 2A to derive the financial balance excluded expenditure on major projects and producer boards.

[8] See Budget 1984 (Part II: Tables).

published in the 1984 Budget commenced in the March 1982 year and the last published actual was for 1991/92.

Net lending is recorded as expenditure in Table 2. The GFS tables included net lending and allocated this across GFS expenditure classifications such as: General public services; Health; Housing and community amenities; Economic services. Budgets of the late 1980s indicated how net lending was allocated across the Table 2 functional expenditure classifications. For example:

- Net lending to SOEs was included as expenditure in "Miscellaneous investment transactions".

- Net lending to other organisations was included as expenditure in "Development of industry", "Miscellaneous investment transactions" and "Miscellaneous financing transactions".

- Net acquisition of equity in government businesses was included as expenditure in "Miscellaneous investment transactions".

However, budgets in the early 1990s only reported the form of net lending (ie, loan advances; loan repayments; net acquisitions of equity; other) and not the allocation. When analysing total net expenditure from Table 2 it is best to use financial net expenditure (I) as it excludes net lending transactions (ie, it is on a financial balance basis). However, without the detailed allocation of net lending across Table 2 functional classifications, the sum of the classifications will not equal financial net expenditure.

In 1991, the Table 2A financial balance was further refined and the Adjusted Financial Balance (AFB) was introduced. The AFB adjusts the financial balance for non-forecast and abnormal items, including extraordinary receipts (eg, proceeds from the sale of Crown forestry assets) and currency realignment (see Section 4 below for detail). As noted in the 1992 Financial Statements of the Government (Annex C), the adjustments made to yield the AFB were made to preserve the measure's usefulness as am indicator of trends in net worth brought about by the Crown's operations (pg.102).

4. Reconciliations between Table 2 and GAAP fiscal indicators

The FB and AFB derived from Table 2 were the main fiscal indicators under cash accounting. The Table 2 and GAAP series are constructed on a significantly different basis and are not directly comparable. Annex 1 summarises the major differences.

Drawing on the 1992 Financial Statements of the Government (Annex C), the more detailed differences between Table 2 and the GAAP operating and cash flow statements are as follows:

- In Table 2, receipts from sales of services and goods are netted off against corresponding expenditure items, whereas in the operating statement, revenue is reported gross and the expenditure is recorded separately.

- The full cash impact of the purchase and sale of physical assets is included in Table 2 at the time of the transaction, whereas the operating statement records depreciation.

- The operating statement includes foreign-exchange losses and gains on debt and financial assets, and on foreign-exchange transactions. Table 2 includes such gains on financial assets, and foreign-exchange transactions, but not such losses on debt.

- Premiums and discounts on debt instruments are amortised in the operating statement, but in Table 2 are accounted for in full when the cash transaction occurs.

- Material transactions between sub-entities of the reporting entity are eliminated in the operating statement. No such eliminations are made in Table 2.

- Cash flows from operations include tax and other operating receipts, and current transactions reported in net departmental expenditure in Table 2. Capital transactions are classified as either investing or financing activities in the cash flow statement.

- Cash flows from investing activities include physical asset purchases, investments and advances. In Table 2 these were reported mostly in miscellaneous investment and financing categories.

- Cash flows from financing activities include transactions associated with raising and repaying debt. Table 2 shows a measure of the deficit before borrowing, with the financing detailed in Budget Table 5.

Financial Statements in the early 1990s included reconciliation tables between Table 2 and GAAP fiscal balances. Table 1 below summarises the key reconciliations across three overlapping years. Note that the GAAP operating balance in this table has been superseded by the new IFRS measures.

There have been attempts to generate a consistent fiscal balance measure across the Table 2 and GAAP periods. For example, as indicated in Table 1, removing (net of sale) purchases of physical assets from the AFB creates a fiscal balance closer to net cash flows operations. This approach was followed by Buckle, Kim and Tam (2001) who used a Gross Fixed Capital Formation (GFCF) series from the GFS tables to proxy purchases of physical assets.[9] As a result, they derived a backdated series for net cash flows from operations from 1971/72. However, for two overlap years (1991/92 and 1992/93) the GFCF series from GFS differs significantly from the net purchase of physical assets reported in Table 1. These differences, together with other potential adjustments, suggest that the backdated net cash flow series may not be particularly robust.

[9] Buckle, R.A., Kim, K. and J. Tam (2001), "A structural VAR approach to estimating an appropriate *ex ante* budget balance target", New Zealand Treasury Working paper 01/11.

Table 1 – Reconciliation between Table 2 and GAAP fiscal balances

	June years ($million)	1991/1992	1992/1993	1993/94
	Table 2 balance	**(1234)**	**(7)**	**739**
+	Net lending	(305)	(1782)	(315)
=	**Financial balance**	**(1539)**	**(1789)**	**424**
–	Forestry sale proceeds	365		
–	Currency realignment	624	34	(368)
=	**Adjusted financial balance**	**(2528)**	**(1823)**	**792**
+	Net purchase of fixed assets	63	287	685
+	Capital investments in Crown Entities			35
+	Forestry sale proceeds	365		
+	CRI sale proceeds		174	
+	Cash flows from operations of RBNZ & Housing agency		144	(225)
+	Other operating items		17	(28)
+	Realised gains from exchange-rate changes	79		
=	**Net cash flows from operations**	**(2021)**	**(1201)**	**1259**
+	Non-cash items	(3172)	(287)	(149)
+	Movements in working capital	119	344	(504)
+	Other	(75)	325	149
=	**Operating balance**	**(5149)**	**(819)**	**755**

Sources: 1991/92 is from the 1992 Financial Statements (B1, pages 26, 28, 29, 64 and 65). 1992/93 is from the 1993 Financial Statements (B1, pages 28, 30, 31, 65, 92 and 93). 1993/94 is from the 1994 Financial Statements (B1, pages 12, 14, 15, 88 and 91).

We have not attempted to reconcile and backdate the fiscal balances and their components across the Table 2 and GAAP periods. Instead we present the "headline" indicators while noting the significant differences between them.

5. Interpreting trends in Table 2 net expenditure

As noted in Section 3 above, the sum of the individual functional classification expenditure areas in the Table 2 period does not equal total net financial expenditure (the preferred aggregate spending series over this period. This is because total net financial expenditure adjusts for net lending transactions which cannot be easily allocated across functional areas of spending.

The 1988 and 1989 Budgets consider in some detail the factors relevant to the interpretation of net expenditure trends.[10] These factors include:

1. **Major project and producer board debt**. The decision to assume responsibility for this in the 1986 Budget added to net expenditure (see Section 2 above). Because the expenditure incurred through this commitment was one-off (notwithstanding debt servicing implications) it is generally excluded so as to provide a clearer indication of underlying trends. (Details are in Annex 2 of the 1986 Budget and the notes to Table 2).

2. **Asset sales and net lending**. As discussed in Sections 2 and 3 above (see Annex 2 in the 1988 Budget for details).

3. **Tax policy changes**. Two examples are cited in the Budget documents. The introduction of taxation of benefits in the late 1980s saw benefit payments grossed up so that net benefits were unchanged but recorded net expenditure increased. The introduction of GST had the effect of increasing net expenditure as the Government faced GST payment on purchases of goods and services.

4. **Employer superannuation subsidy**. The introduction of an employer superannuation subsidy paid by departments from 1987/88 caused a jump in recorded net expenditure of $176m in 1987/88 and $301m in 1988/89. (This was a notional charge and was offset by a recoded receipt).

5. **SOEs and reorganisation of the public sector.** The establishment of SOEs removed a number of trading entities from the Public Account while existing or new departments assumed responsibility of residual non-commercial activities. These are difficult to isolate, but tables indicate deductions of about $500m in the mid- to late-1980s.

[10] See Annex 2 in the 1987 Budget (Part I: Speech and Annex) and in the 1988 Budget (Part II: Annex and Tables).

Annex 1: Major differences between the GAAP and Table 2 series

GAAP series

The GAAP series is prepared on an accruals basis and include a Forecast Operating Statement, Forecast Statement of Financial Position (balance sheet) and Forecast Statement of Cash Flows. Supplementary statements and Notes to the Forecast Financial Statements provide additional information.

The GAAP series is not directly comparable with the Table 2 series:

- The majority of the GAAP series is prepared on an accruals basis whereas the Table 2 series is cash-based. This means that the GAAP series includes expenses for which there is no cash flow in the period, for example depreciation and unrealised gains or losses.

- The reporting entities are different. The GAAP series consolidates the Reserve Bank of New Zealand and equity accounts the Crown's interest in State-owned enterprises and Crown entities. The Table 2 series excludes these entities.

- The revenue and expense classifications used in the GAAP series are different from those used in the Table 2 series.

- The GAAP series generally reports items on a gross basis whereas the Table 2 series nets some receipts against expenditure. For example, user charges and revenue from goods and services are reported as a separate line item in the GAAP series but netted off financial net expenditure in the Table 2 series.

Table 2 series

Historically the Table 2 series, which reports cash flows through the Crown's bank account, has been used to assess the Crown's financial performance. The primary indicator of the Government's fiscal position from this series is the financial balance which is reported in Table 2A.

The financial balance is the net difference of two large cash flows: tax and non-tax revenue; and financial net expenditure, which includes operating payments (net of revenue from sales or user charges) and purchases (minus sales) of physical assets.

The adjusted financial balance is used to provide a more informative comparison between forecasts and actual results. By removing items not included in the forecasts (mainly exchange-rate gains on foreign reserves) or extraordinary receipts, it provides a consistent basis to compare forecast with results.

Financial asset (equity or loan) transactions are excluded from the financial balance. These balance sheet flows are reported separately as "lending minus repayments" transactions. Although they do not affect the financial deficit, lending minus repayment transactions need to be financed. Consequently they are added to the financial balance to get the "deficit before borrowing", commonly known as the "Table 2 balance" because it is the balance reported at the bottom of Table 2.

Source: Budget Economic and Fiscal Outlook, 1994, page 75.