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# New Brunswick's Debt and Deficit

## A Historical Look

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## Executive Summary

This study provides an analysis of New Brunswick's fiscal condition, and reviews recent efforts to balance provincial finances. The data presented in this report indicate that persistent deficits and a large public debt remain serious problems for the province, and that there is a need for further fiscal consolidation measures.

The specific findings are as follows:

1) The provincial government currently faces declining revenues, which will continue in the long-term. This is the result of decreasing federal transfers as a share of provincial GDP, given that Ontario and Quebec now consume a larger share of equalization payments than before. In addition, federal conditional transfers–once a major component of federal transfers to the province–have been shrinking

2) Between 1981 and 2011, provincial expenditures fell as a share of nominal GDP. However, from 2011 to 2015, they grew as a share of GDP. The three areas accounting for the rise in government spending are central government (through top-up pension payments), education, and health

3) In recent years, New Brunswick's provincial government has attempted to fight the red ink by reforming government pensions, implementing wage freezes, and reducing size of the public service through attrition and retirement. These measures have helped address the issue, however, given the scale of New Brunswick's debt problem, continued spending restraint and additional fiscal consolidation measures will be necessary in the years ahead

# I: Introduction

It is an understatement to say that New Brunswick has a serious debt-and-deficit problem. According to the most recent provincial budget–for the 2014-15 fiscal year–provincial debt will reach $12.2 billion or 37.7 per cent of nominal GDP. This represents an increase of $2.1 billion from the $10.1 billion recorded in 2011-12, when provincial debt was 32.2 per cent of provincial GDP (Government of New Brunswick [2014a], p.29). For a small, low-income province with 750,000 inhabitants, New Brunswick's level of debt is significant.

For any economic actor–be it a household, small business, corporation, Crown Corporation, or government–a large debt burden is concerning. First, there is a potential that interest rates could increase, in which case the cost of servicing debt rises. Although interest rates are currently low, many observers predict they will rise in the future, which will result in burdensome debt-service payments. Second, highly indebted jurisdictions tend to suffer from slow economic growth compared to those with low debt.

This study finds that total government revenues have fallen steadily as a share of nominal GDP in the last four decades. The primary driver of this trend has been the persistent decline in equalization payments and federal conditional transfers. Furthermore, although provincial expenditures have fallen as a percentage of GDP over this same period, the decrease has not been sufficiently large to offset the reductions in revenue. The result has been growing deficits and debt. Consequently, the government must embark on a determined program to reduce spending if it wishes to repair its debt problem.

Section II of this paper reviews statements from government departments regarding New Brunswick's fiscal state as well as commentary given by various bond-rating agencies pertaining to the province's debt situation. Section III presents a historical overview of key fiscal indicators, and provincial revenue and expenditure components. Section IV briefly outlines key measures the government has undertaken to curb debt growth and discusses the need for further fiscal consolidation measures. Section V concludes the paper and Appendix I explains how the authors compiled the data used in this study.

# II: Public Statements about New Brunswick's Fiscal Situation

*Statements from the Government of New Brunswick*

New Brunswick's debt and deficit problem is now well known, but widespread acknowledgement of its seriousness is a relatively recent development. In his 2009 budget address, Former Finance Minister Victor Boudreau stated:

"… The government remains committed to the principles of balanced budget and reducing the net debt-to-GDP ratio, as set out in the *Fiscal Responsibility and Balanced Budget Act*. However, in the current global economic and financial climate, we will not meet the objectives of the Act for the current four-year period…The government will face significant deficits and increases in net debt as it confronts the challenges of one of the most significant global economic and financial crises in decades" (Government of New Brunswick [2009], p. 11).

Minister Boudreau's statement implies that New Brunswick's deficit was *cyclical* and suggests the government could balance future budgets without adjusting expenditures. With the passage of time, however, it has become evident that New Brunswick's government was entering into a *structural* deficit that would worsen the province's debt burden in the future.

Several government departments have monitored and reported on New Brunswick's deteriorating fiscal position in recent years. As part of its annual report, for instance, the Office of the Auditor General publishes a section entitled, "Comments on the Province's Financial Position." In its most recent report, the agency stated the "increase in net debt represents a very disturbing trend" (Government of New Brunswick [2013b], p. 11). There are several indicators in the report describing the province's debt and deficit problem, one of which compares New Brunswick's provincial debt to Nova Scotia, Manitoba, and Saskatchewan (i.e. provinces of equal size). In analyzing per-capita net debt, debt growth between 2009 and 2013, and net debt as a percentage of GDP, the agency concludes that New Brunswick's fiscal difficulties are roughly comparable to Nova Scotia's, but significantly worse than Manitoba and Saskatchewan (Government of New Brunswick [2013b], pp. 12-14).

New Brunswick's net debt was $14,623 per-capita in 2012-13. In comparison, it was higher in Nova Scotia at $14,708 and lower in both Manitoba and Saskatchewan at $12,544 and $4,741. Between 2009 and 2013, New Brunswick's net debt increased by 45 per cent, equal to Nova Scotia, whereas Manitoba's net debt grew by 39 per cent and Saskatchewan's by 13 per cent. Finally, debt-to-GDP in New Brunswick reached nearly 34 per cent in fiscal year 2012-13, slightly lower than that of Nova Scotia at 36.7 per cent, but significantly higher than Manitoba and Saskatchewan at 26.8 and 6.6 per cent.

*Statements from various bond-rating agencies*

According to Moody's Investor Services, Standard & Poor's, and the Dominion Bond Rating Service (DBRS), New Brunswick's economic outlook is stable and long-term provincial debt received ratings of Aa2, A+, and A (high) (Government of New Brunswick [2014c]). Nevertheless, New Brunswick's debt rating places it amongst the lowest provinces in Canada and the trend is negative.

In August 2009, during the last recession, Moody's downgraded New Brunswick's debt rating from Aa1 to Aa2, citing concerns about the province's budgetary obligations in that year, which would result in increased debt over the medium-term. The decision to downgrade the province's debt rating came with a stark warning for the government: "[New Brunswick's] long-term financial capacity to service its debt is conditioned by an economic base that underperformances the national average on a number of growth, income, and wealth metrics" (Moody's Investor Services [2009a]).

New Brunswick suffered a significant loss in October 2010, when Standard & Poor's reviewed the province's fiscal outlook and downgraded it from "stable" to "negative," which made it the sole province with a negative outlook at that time (CBC [2010]). The rating agency alluded to concerns about provincial budget forecasts, arguing the provincial debt burden would likely exceed projections in the budget for fiscal year 2011-12. Despite the downgrade, Standard & Poor’s affirmed New Brunswick’s credit rating of AA- (Standard and Poor’s [2011]). In June 2012, however, Standard & Poor’s reviewed this assessment and downgraded the province’s rating to A+, although it revised the province’s outlook to “stable” (Standard and Poor’s [2012]). The downgrade reflected their opinion that provincial tax-supported debt would peak at 155 per cent of operating revenues by 2014–roughly 40 per cent of GDP.

Between 2007 and 2014, the DBRS gave New Brunswick’s debt an A (high) rating and affirmed the province’s stable outlook. In April 2014, however, it issued a press release outlining worries about the debt trajectory in New Brunswick’s 2014-15 budget and indicated how “continued sluggish economic growth for an extended period of time, or weakening fiscal resolve, could push credit metrics to levels no longer consistent with current rating” (Dominion Bond Rating Service [2014]). Furthermore, the agency indicated that “additional fiscal slippage,” which would increase the debt-to-GDP ratio to upwards of 45 per cent, could result in DBRS revising the province’s fiscal outlook and downgrading its debt rating.

Most recently, Moody’s announced that New Brunswick’s fiscal performance was improving and the government would likely balance the provincial budget by fiscal year 2017-18. Importantly, however, Moody’s cautioned the province’s capacity to balance its budget is contingent on “continued expenditure restraint” (Moody’s Investor Services [2014]).

## III: Fiscal Indicators, Revenue, and Expenditure Data

As stated, the Department of Finance and Office of the Auditor General in New Brunswick provide data describing the province’s debt and deficit situation. Both agencies list departmental inefficiencies and suggest measures to cost-saving. This section looks at several fiscal indicators, and components of revenues and expenditures, on a decade-by-decade basis from 1981 onward to illustrate the trend in government fiscal policy.

Governments usually run deficits during recessions because of declining revenues. To remove the effects of the business cycle, the data reported in this study is in ten-year intervals: fiscal year 1981-82 to 1990-91 (1981-1991), 1991-1992 to 2000-2001 (1991-01), 2001-11, and 2011-12 to 2014-15. (Data for 2013-14 and 2014-15 is from the province’s Department of Finance estimates and forecasts).

Statistics Canada began reporting provincial GDP statistics with 1981 as the benchmark year, which informed the decision to use 1981 as the benchmark year in this study. There are three tables of data discussed below: 1) Various fiscal indicators; 2) Components of ordinary revenue; and 3) Components of ordinary expenditures.

*Aggregate Fiscal Indicators as a Percentage of Nominal GDP*

Table 1 reports fiscal indicators as a percentage of New Brunswick’s GDP. The remaining four indicators, with the exception of the “ordinary deficit” line, show “totals” for all accounts: ordinary, capital, special purpose, and special operating accounts. (Note, until the late 1990s, New Brunswick had two accounts: ordinary and capital.)

| Table 1: Selected Fiscal Indicators as a Percentage of Nominal GDP, by Decade | | | | |
|---|---|---|---|---|
| | **1981-91** | **1991-01** | **2001-11** | **2011-15** |
| **Total Revenue** | 27.6 | 25.9 | 25.1 | 24.8 |
| **Total Spending** | 29.6 | 27 | 25.3 | 26 |
| **Change in Debt** | N/A | 0.9 | 1.1 | 2 |
| **Ordinary Deficit** | 0.6 | -0.5 | 0.2 | 1.1 |
| **Total Debt** | 36.1 | 35.6 | 28.9 | 35.5 |
| Note: Data are in percent form as a percentage of nominal (current dollar) GDP<br>*Source: New Brunswick Public Accounts; NB Main Estimates and Budget; Statistics Canada* | | | | |

The bottom line in Table 1 reveals the evolution of New Brunswick’s total debt-to-GDP ratio. This ratio declined from the 1980s onwards and the province made significant progress between 2000 and 2006. In the years immediately before and during the 2008 economic recession, deficit spending began trending upwards, and in subsequent years, persistent deficits remained, which drove the total debt-to-GDP ratio up to 35.5 per cent in the 2011-15 period. The 2014-15 budget forecasts the provincial debt-to-GDP ratio to be 37.7 per cent, which is much higher than in the 1980s (Government of New Brunswick [2014a], p. 29).

Table 1 also shows that the ordinary account deficit, i.e. the deficit covering the normal day-to-day spending of the government’s line departments, grew as a percentage of GDP from 1990 onwards. Moreover, the provincial debt-to-GDP ratio, which includes ordinary deficit, but also capital and other accounts, grew steadily during the same period. In particular, the ordinary account deficit-to-GDP ratio was 1.1 per cent of total GDP, a significantly higher rate than that of previous decades.

The top line in Table 1 shows that total revenue declined steadily as a share of nominal GDP in recent decades, from 27.6 per cent during the 1980s to 24.6 per cent between 2011 and 2015. Yet, while the share of total spending to nominal GDP fell from 29.6 per cent in the 1980s to 25.3 per cent in the 2000s, it increased to 26 per cent during the current 2011-15 period. Furthermore, although the total revenue- and total spending-to-GDP ratios were roughly equal during the 2000s, at 25.1 and 25.3 per cent, the gap grew to 1.3 per cent between 2011 and 2015. In other words, the total revenue ratio fell, whereas the total expenditure ratio grew.

Trends in revenue and expenditures dictate the rise in deficits and debt. It is, therefore, necessary to examine the primary components of revenue and expenditures in turn to explain why provincial debt has risen.

*Components of Ordinary Account Revenue as a Percentage of Nominal GDP*

Table 2 illustrates changes in several ordinary revenue components as a share of nominal GDP. Note there are two parts to provincial revenues: 1) Own-source revenues, i.e. provincial income taxes, sales taxes, and user fees; and 2) Total federal transfers, i.e. equalization payments, block-grant unconditional transfers, and conditional transfers.

**Table 2: Selected Revenue Components as a Percentage of Nominal GDP, by Decade**

| | **1981-91** | **1991-01** | **2001-11** | **2011-15** |
|---|---|---|---|---|
| **Own-source Revenue** | 15.2 | 14.4 | 14.1 | 14.4 |
| *Equalization Transfers* | 6.3 | 5.6 | 5.5 | 5.1 |
| *Block-grant Transfers** | 2.4 | 2 | 2.6 | 2.9 |
| *Other Federal Transfers*** | 2.1 | 1.6 | 1 | 0.7 |
| **Total Federal Transfers** | 10.9 | 9.6 | 9.1 | 8.7 |

Note: Data are in percent form as a percentage of nominal (current dollar) GDP
*Canada Social Transfer, plus Canada Health Transfer; before 1992, *Established Program Financing*
**Mostly conditional federal transfers
*Source: New Brunswick Public Accounts; NB Main Estimates and Budget; Statistics Canada*

Own-source revenues declined as a share of nominal GDP from 15 per cent in the 1980s to roughly 14 per cent in the 2000s, which is primarily the result of transitioning from the old provincial sales tax (PST) to the new Harmonized Sales Tax (HST). To compensate for the "cost" of this transition, the federal government allocated special transitional transfer payments to the province (see Balgreave [2005]; Murrell and Yu [2000]). Between 2011 and 2015, however, own-source revenue as a share of GDP grew, mostly due to increases in tobacco and alcohol taxes, in addition to provincial personal income tax rates (Government of New Brunswick [2013b], pp. 16-17). This limits any further tax increases, as discussed below.

The middle-four lines in Table 2 show the evolution in federal government transfers to the provinces as a share of GDP, which steadily declined from nearly 11 per cent in the 1980s to only 8.7 per cent between 2011 and 2015. This trend is the result of decreasing equalization payments and conditional federal transfers.

Equalization payments fell from 6.3 per cent in the 1980s to roughly 5 per cent in the current 2011-15 period. This is not the result of some key federal policy change, but simply due to declining economic performance in Ontario and Quebec, which means they currently garner a greater share of total equalization payments. Ontario never received equalization payments before 2009-10, but will receive nearly $2 billion in fiscal year 2014-15 and Quebec's share will rise to $9.3 billion in fiscal year 2014-15–almost double the 2005-06 amount (Government of Canada, Department of Finance [2014]).

Conditional transfers were also an important component of total federal assistance to New Brunswick, particularly when such transfers were essential to the Economic and Regional Development Agreements (ERDAs) between Ottawa and the provinces (Savoie [1985], pp. 90-116). Today, the size of total conditional transfers allocated to New Brunswick is quite small. Federal block-transfers to the province, i.e. healthcare funding and post-secondary grants, have increased as a share of GDP in recent decades. These transfers, referred to as Established Program Financing, totalled 2.4 per cent of GDP in the 1980s. In the 1990s, then federal Finance Minister Paul Martin cut back on block-funding as part of a campaign to reduce the federal deficit. However, by 1999, federal health and social transfers began increasing. As well, federal-provincial agreements signed thereafter have increased block-funding transfers. This is particularly the case for the Canada Health Transfer and related components.

Considering all three major components of federal transfers together, it is evident that despite increases in the Canada Health Transfer, relative decreases in the equalization payments-to-GDP ratio and the "other federal transfers" ratio as a share of GDP mean that total federal transfers to New Brunswick have fallen. In his newly released book, Richard Saillant–Director General of the Canadian Institute for Research on Public Policy and Public Administration, and the former Vice-President of the Université de Moncton–identifies this trend. In addition, a reviewer of Saillant's book observes that:

"Between the 2009-10 and 2014-15 fiscal years, total transfers to New Brunswick increased by only 5 per cent while rising by 34 per cent in Ontario, 20 per cent in Saskatchewan, and 66 per cent in Alberta" (Campbell [2014], p. B1).

It is unlikely, given the above discussion, that New Brunswick will be able to raise additional tax revenue via provincial sources without the risk of compromising economic growth and the province's tax competitiveness. The government raised taxes in its 2013-14 budget, generating an additional $200 million in revenue, and further increases could reduce the province's capacity to attract new residents and businesses. Moreover, federal transfers as a percentage of GDP are declining and there is little indication this trend will reverse in the near future. As a result, New Brunswick faces a challenging revenue situation and the government must solve its fiscal problem by addressing expenditures.

*Components of Ordinary Account Expenditures as a Percentage of Nominal GDP*

Table 3 below lists provincial-government ordinary expenditures as a percentage of nominal GDP. If one compares the pattern to ordinary spending-to-GDP over time, in contrast to total spending-to-GDP in Table 1, one notices that the pattern is identical: the ordinary spending-to-GDP ratio declined steadily from the 1980s to the 2000s, but then increased during the 2011-15 period. This uptick explains much of New Brunswick's debt and deficit difficulties, whereas the ordinary revenue ratio fell in the 2011-15 period compared to the preceding period, while the ordinary spending ratio grew.

**Table 3: Selected Expenditure Components as a Percentage of Nominal GDP, by Decade**

| | 1981-91 | 1991-01 | 2001-11 | 2011-15 |
|---|---|---|---|---|
| **Central Government*** | 1.2 | 1.1 | 2.1 | 2.5 |
| **Education** | 5.9 | 5.2 | 4.8 | 5.2 |
| **Social Development** | 2.2 | 2.3 | 3.3 | 3.3 |
| **Health** | 7.4 | 7.5 | 7.5 | 8.1 |
| **Debt Servicing** | 3.4 | 3.5 | 2.4 | 2.1 |
| **Other N.E.S. Spending** | 6.6 | 4.5 | 3.4 | 3 |
| **Total Ordinary Spending** | 26.7 | 24 | 23.4 | 24.3 |

Note: Data are in percent form as a percentage of nominal (current dollar) GDP
*Includes spending by the Premier's Office and General Government
**Includes K-G12 education, grants to universities, and community colleges
*Source: New Brunswick Public Accounts; NB Main Estimates and Budget; Statistics Canada*

Table 3 isolates those spending areas that account for the rise in the spending ratio, which the following section briefly discusses.

Central government spending as a share of nominal GDP held steady during the 1980s and 1990s at, or slightly above, 1.1 per cent. In the 2000s, however, this share nearly doubled to 2.1 per cent, and in the post-2011 period, it increased to 2.5 per cent. As previously discussed, pension top-ups within the General Government department explain most of the increase. Considering the fiscal pressure that public pension obligations place on the province, the government's plan to reduce pension spending through the shared-risk plan is a sensible and necessary cost-saving measure.

Education spending (K-G12 and post-secondary) as a share of nominal GDP declined steadily from the 5.9 per cent in the 1980s, 5.2 per cent in the 1990s, and 4.8 per cent in the 2000s, which reflects the shrinking percentage of young people in New Brunswick. However, it increased to 5.2 per cent between 2011 and 2015. The introduction of early childhood education in the province partially explains this increase. The number of students enrolled in the K-G12 education system is declining due to demographic trends, suggesting that further reducing public spending on education may be a promising source of savings in future years.

Health spending as a share of nominal GDP was steady from the 1980s to the 2000s at around 7.5 per cent, despite an ageing population that should ostensibly push upward the per-capita cost of delivering healthcare services. Between 2011 and 2015, however, health expenditures as a share of GDP were above 8 per cent. Health expenditures have been increasing in all provinces, but spending restraint, or cost-saving measures, in this area will be essential for New Brunswick to achieve fiscal balance in the years ahead.

Public pensions, education, and health are responsible for the majority of overall government spending increases as a share of GDP, as shown in Table 3. These areas, taken together, saw their spending as a share GDP rise by 1.4 percentage points from the previous decade to the current four-year period. In contrast, total ordinary spending as a share of GDP rose by 0.9 percentage points. Much of New Brunswick's structural deficit, therefore, is the result of higher expenditures in these areas.

## IV: Recent Fiscal Consolidation Measures and the Outlook for the Future

Recent budgets in New Brunswick acknowledge the seriousness of the province's fiscal situation in a frank manner. Based on economic and demographic projections, however, in addition to the findings of this study, the provincial government must continue its pursuit of fiscal consolidation. Recent measures include the following:

Wage Restraints

In its first budget, the current government announced it would sustain a wage freeze that began in 2009. In fact, it extended the wage freeze to all line departments (Government of New Brunswick [2011], p. 13)

Public Service Cuts

In its second budget, the current government laid out a plan to reduce the government's public service. The finance minister announced that it would achieve these cuts through attrition, saving nearly $86 million by 2014-15 (Government of New Brunswick [2012], p. 16). In the most recent budget, Finance Minister Blaine Higgs stated that, in total, the government shed nearly 2,000 positions during its current mandate (Government of New Brunswick [2014a], p. 11).

Pension Reform

In 2013, the government announced plans to reform the provincial government's pension system from a defined-benefit model to a shared-risk model (Government of New Brunswick [2014], pp. 11-12). The aim is to ensure the provincial government is not responsible for unfunded liabilities in the future (Government of New Brunswick [2013], pp. 11-12).

These measures are commendable; however, given the size of New Brunswick's fiscal problem, it is not clear that these actions will be sufficient to stabilize provincial finances. Current projections suggest the province will return to surplus in fiscal year 2017-18, and various credit rating agencies support this assessment. The province remains vulnerable to economic shocks, sudden increases in spending, rising interest rates, all of which could delay the government's return to balance or worsen the provincial debt burden. Given these realities, the government should expand efforts to consolidate provincial finances by identifying and implementing additional cost-saving measures.

New Brunswick recently raised tax rates and further increases in personal and corporate income taxes would risk damaging the economy and undermining the province's competitiveness. Moreover, the government is unlikely to find a source of saving in the province's capital account, which allocates funds for repair and replace projects, of which there are few currently underway. It must, therefore, reduce ordinary expenditures and continue its program of fiscal consolidation.

The objective of this paper is to document the current state of New Brunswick's financial situation, and it is beyond its scope to provide a detailed analysis of where the government can reduce spending or implement cost-saving measures. However, the analysis in Section III shows that high levels of spending in the following three areas largely drive current deficits: central government, education and health. These areas are the primary drivers of deficit spending and rising provincial debt, and the government should examine ways in which it can reduce wasteful spending, which will help stabilize the province's fiscal situation.

In the case of health spending, New Brunswick could look toward Saskatchewan's efforts to reduce costs when it faced severe fiscal pressure resulting from an economic recession in the mid-1990s. Being a rural province with a dispersed population, Saskatchewan's problems were similar to those New Brunswick faces today. To reduce costs, the provincial government there undertook a substantial rationalization effort of its hospital system, closing a number of rural hospitals without undue hardship. New Brunswick's government should consider whether similar actions would succeed in the province.

The provincial government could also implement cost-saving measures in its education system by consolidating nearby schools that are below capacity, and reducing bureaucracy in the system, to help reduce per-pupil costs. In its first budget, the current government noted that 321 schools in the province are at less than 60 per cent capacity due to declining enrolment (Government of New Brunswick [2012], p. 17). These numbers suggest closing underutilized schools and merging them with nearby institutions is a promising strategy to help bring down per-pupil costs that have increased steadily in recent years. Furthermore, paring down post-secondary spending by eliminating overlap and removing unneeded programs would have a significant impact (Massy, W. [2013]).

Finally, the provincial government funds a large number of line departments, boards, and special operating agencies that contribute to rising expenditures. Indeed, the government has taken small steps to reduce the size of government, such as shutting down the *Advisory Council on the Status of Women*. Further action in this area, perhaps by conducting cost-benefit analyses to identify how the government can reduce spending, would be beneficial.

## V: Summary and Conclusions

New Brunswick’s government faces problems with respect to the provincial deficit and debt. As described in this paper, due to a declining share of equalization payments and federal conditional transfers, revenue is declining as a share of GDP. Nevertheless, expenditures have remained constant and the result has been soaring deficits and debt. Further analysis is required to determine how the provincial government can reduce spending.

The current administration has taken concrete steps to reduce expenditures in recent years, however, given the scale of New Brunswick’s financial dilemma, additional action is necessary. New Brunswick continues to face serious fiscal problems and frugal public management is required to bring expenditures closer into line with revenue, and restore sustainability to provincial finances.

# VI: Appendix, Sources of the Data Presented in Tables

The following is a discussion regarding the compilation of data found in each table.

*A: Table 1, Selected Fiscal Indicators, as a Percentage of Nominal GDP, by Decade*

The total revenue and total spending data include ordinary, capital, special purpose, and special operating agency accounts. Total figures for the fiscal years 2013-14 and 2014-15 come the Department of Finance's Main Estimates from the last budget (Government of New Brunswick [2014b]). The data from 2003-04 to 2012-13 come from the last published Public Accounts in 2013 (Government of New Brunswick [2013c], p. 4). For data before 2004, one has to go back to earlier Public Accounts publications, where one collects data from the earliest data point from each Public Accounts issue. We do this for the data going back to fiscal year 1992-93. However, there is a revision in the data for 1991 to 1992, for total revenues only. The reason for the break is that, before 1992-93, one has to add up, for revenues and expenditures, ordinary plus capital plus special purpose accounts to arrive at a total revenue and total expenditure figure. Therefore, an "adjustment factor" links the hand-gathered total revenue data, originating from the years 1981-82 and on to the years 1991-92 to the following years. (Fiscal year 1991-92 is the year from which the adjustment factor is set.) Total net debt data comes for 2013-14 and 2014-15 comes from the 2014 Budget Speech (Government of New Brunswick [2014a], p. 29). Earlier data points come from various issues of the Public Accounts, going backwards through earlier issues. There is a revision in the data, analogous to the one discussed above, found in fiscal year 1991-92. Consequently, an adjustment factor of 1.6279 is used to multiply the data obtained from fiscal years 1981-82 to 1991-92.

It is too difficult to reconcile "total deficit" data from the early years to that of recent years. As is discussed in this paper, the "total deficit" is the sum of deficits in the ordinary, capital, special purpose, and special operating agency accounts. However, in the 1980s the New Brunswick government did not publish total deficit data i.e. adding up the ordinary and capital accounts together. In our paper, we do not report "total deficit" data at all. We "first difference" the net debt data to arrive at a "change in net debt" data series. We do report the "ordinary account" deficit data, since this series considers 2014-15 back through time. We calculate this as ordinary spending minus ordinary revenues.

Current dollar GDP data comes from Statistics Canada's Provincial Economic Accounts, the income-based side, Table 384-0034. Nominal GDP is GDP at market prices. For the 2013-14 year, we used the percentage-change projects as reported in the provincial government's 2014 economic outlook (Government of New Brunswick [2014d], p. 10).

To obtain the decade percentages, we summed the various fiscal flows and nominal GDP, and then averaged them. Then, for each component, we calculated the percentage.

*B: Table 2, Selected Revenue Components as a Percentage of Nominal GDP*

The procedure to calculate ordinary revenue percentages, as a percentage of nominal GDP, is analogous to the procedure above for Table 1 data. First, the various revenue statistics, for 2013-

14 and 2014-15, were taken from the *Main Estimates: 2014-15* document (Government of New Brunswick [2014b]. Data for 2012-13 and prior years come from Public Accounts. It is too difficult, if not impossible, to separate out "health" from "social" transfers given changes in the program over the years. Therefore, we constructed an aggregate Canada Health and Social Transfer data series. Before 1996-97, Canada operated the Established Program Financing transfer system, and this data comprises of fiscal year 1981-82. Equalization transfer data is available as a continuous series, from 1981-82 to 2014-15. As well, "total federal transfers" is available as one continuous series over this period. From that data, one can calculate an "other federal transfers" series by subtracting "equalization payments" and "the Canada Health and Social Transfer/Established Program Financing" data from "total federal transfers." Finally, total ordinary revenue is available as one continuous series from fiscal years 1981-82 to 2014-15.

The method for calculating the percentage share data in Table 2 is analogous to the procedure used in calculating Table 1.

*C: Table 3, Selected Expenditure Components as a Percentage of Nominal GDP*

Ordinary expenditure data is available by function in Public Accounts, and we use this data in our study. We report the three social services areas–education, social development, and health–separately. For fiscal years 2013-14 and 2014-15, we must total various departments to adhere to the definitions in Public Accounts. Central government consists of several miscellaneous sub-departments (including General Government). We add ordinary expenditures by General Government, plus the Legislative Assembly plus Executive Council, and project the 2013-14 central government spending for the following two years, on a percentage growth basis. For education, we add up "Education and Early Childhood Development" and "Post-Secondary Training and Labour." For health, we add up "Department of Health" and "Health and Inclusive Communities." Debt service spending is separate. We then gather data for prior years from the Public Accounts. There are two breaks in the data, from which we must devise adjustment factors. First, we redefined "central government spending" in fiscal year 2008-09 using an adjustment factor if 0.8587 to multiply the data for fiscal years 1981-82 and 2007-08. Second, the government redefined education spending in 1994-95, so we use a small adjustment factor of 0.9554 to multiply the data from 1981-82 and on to 1993-94. "Total ordinary expenditures" exists as a continuous series from 1981-82 on to fiscal year 2014-15. Finally, we calculated "other spending n.e.s." by subtracting all of the separately named components from "total ordinary expenditures."

The method for calculating the percentage share data in Table 3 is analogous to the procedure used in calculating Table 1 and Table 2.

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