# **Employment of First Nations People**

# Saskatchewan Lags Behind

by

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### **Executive Summary**

First Nations employment in Saskatchewan is increasing, yet we continue to lag behind the other two Prairie Provinces. This report shows that if we were to employ First Nations people at the same rate as Alberta and Manitoba, we would increase provincial employment by 5.9 thousand employees in 2012, growing to 8.3 thousand by 2031. That is just by catching up with the average for the remainder of the Prairies.

Results would be better yet if we were to employ our First Nations population at the same rate as our total Provincial population. The result would be an increase in provincial employment by 17.9 thousand in 2012, growing to 25.1 thousand in 2031.

#### Section 1. The First Nations population of Saskatchewan

It is important to improve our rate of employing First Nations people due to Saskatchewan's demographic reality. Corrected for the undercounting in the Census, Statistics Canada estimates that First Nations people make up 11.5% of Saskatchewan's population in 2012 and will make up 15.7% by 2031.

#### Section 2. First Nations education levels are increasing, yet falling further behind

Improving Saskatchewan's rate of employing First Nations people requires education. This is the Information Age—people are employed and paid largely on the basis of what they know—so education is of paramount importance. Although the educational levels of First Nations people are increasing, they are falling further behind the total population.

The improvement in education levels of Saskatchewan's First Nations people has been remarkable. For example, in the ten years between the Censuses of 1996 and 2006, the percentage of Saskatchewan's First Nations people age 15 to 69 who do not have a high school diploma decreased from 65.7% to 55.8%. That decrease—achieved in only ten years—reflects well on the individual students who persevered to make education work for them; on the support provided by their families, communities, and First Nations; on the hard work of teachers and teacher's aids; and on the many educational programs which were created for and by First Nations people.

However, there is a major problem. During this ten year period, the education levels of the total population of Saskatchewan increased by an even greater percentage. During those ten years, the proportion of the total population of Saskatchewan age 15 to 69 who do not have a high school diploma decreased from 40.7% to 26.5%.

Thus, First Nations people fell further behind educationally. First Nations individuals were 25.0% more likely to not have a high school diploma compared to the total population in 1996. Despite educational improvements, First Nations individuals were 29.3% more likely to not have a high school diploma in 2006. So First Nations people fell further behind in terms of completing high school.

Similar observation can be made for those who complete technical school or university. For example, the proportion of First Nations people age 15 to 69 with a University degree increased by 0.8% over the same ten years. But the proportional increase for the total population was greater—3.0%.

Saskatchewan is moving in the right direction—increased educational levels for First Nations people—but we must move faster.

#### Section 3. First Nations employees span the entire provincial economy

First Nations employees span all the industries and all the occupations in the Saskatchewan economy, so all industries and occupations will benefit from increasing the employment of the First Nations population. Table 3 shows the Provincial distribution of First Nations employment by occupation compared to the aggregate distribution for the total population. The percentages are interesting. For example, although managers make up a smaller percentage of the First Nations population than the total population, the percentage difference is less than many would expect. Although it is evident from this table that many First Nations people are not integrated into the economy, it is also evident that many are.

Table 4 contains some very disturbing data. That table shows the Provincial distribution of First Nations employment by industry compared to the distribution for the total population. First consider non-renewable resource extraction. First Nations do not receive their proportional share of jobs in non-renewable resources: only 1.0% of the First Nations of labour force age work there, less than half the percentage—2.4%—of the total population of labour force age. Non-renewable resource extraction includes Cameco, which has a good record numerically for employing Aboriginal people. That implies that there are other firms in the industry with records which are dismal enough to offset Cameco's record. It seems that all of the major non-renewable resource firms in Saskatchewan have significant public relations efforts focused on lauding their own employment of First Nations people. It is obvious from Table 4, however, that there are cases where there is a large gap between public relations and reality.

Similar observations can be made of the utility industry. In Saskatchewan, this industry is dominated by provincial Crown Corporations. First Nations receive less than half their proportional share of jobs, 0.4% for First Nations employees as opposed to 0.8% for all employees. Many provincial crowns need to improve their hiring record for First Nations people, despite their public relations efforts which suggest otherwise.

It would be fascinating to know what has happened to First Nations employment in accommodation and food services since 2006. Table 4, compiled from the Census of 2006, shows that sector to be the fifth-

largest employer of First Nations people. Those jobs were critically important because many of them were entry-level positions. However, since then Saskatchewan's government extended the Immigrant Nominee Program—which had been designed to attract highly skilled and educated immigrants—to include unskilled jobs in the food and hospitality industries. This policy change reduced First Nations employment. Moreover, it reduced it in a particularly harmful fashion, due to the entry-level nature of many of the jobs.

#### Section 4. First Nations employment rates are declining off reserve

The previous paragraph makes it clear that it would be interesting to examine what has happened to First Nations employment since the Census of 2006. It is possible to use Statistics Canada's Labour Force Survey to examine employment rates of the off-reserve First Nations population. Figure 3 shows that, starting in January of 2009, there is a decreasing trend. That is particularly disturbing since First Nations off-reserve employment rates were trending upward prior to that time.

What was the cause of this decreasing trend in First Nation employment rates? Two of the causes were policy changes by the provincial government. One was the elimination of the Aboriginal Employee Development Program. Table 4 shows that Public Administration employs a larger fraction of First Nations people than any other sector in the provincial economy—making First Nations employment notably sensitive to changes in the government's employment policies. Table 4 also shows that Accommodation and Food Service is the fifth largest employing sector for First Nations people. Those jobs are particularly important since many are entry-level. As mentioned above, the government extended the Immigrant Nominee Program—which had been designed to bring highly skilled or educated immigrants to the province—to include unskilled jobs in the hospitality industry. That change caused a number of First Nations people to lose their jobs. However popular these actions were politically, they were remarkably short sighted because of their effect on First Nations employment. Although it is beyond the scope of the current analysis, it would be fascinating to study the declines in First Nations employment rates shown in Figure 3 and quantitatively determine how much was due to the government policies and how much to other factors.

#### Section 5. First Nations employment is increasing, yet Saskatchewan lags behind

Section 5 compares First Nations employment rates in Saskatchewan with that of the other two Prairie Provinces, using the Censuses of 1996 and 2006. In 1996, both of the other Prairie Provinces were doing better employing their First Nations population. In the ten year period from 1996 to 2006, Saskatchewan fell further behind Alberta and caught up slightly with Manitoba. However, it continued to lag behind both.

<sup>&</sup>lt;sup>1</sup> It would, of course, be informative if it were possible to use the Census of 2011. However, the Harper government's elimination of the long form in that census makes it impossible to do so.

#### Section 6. The benefit of closing the First Nations employment gap in Saskatchewan

What would be the effect on the Provincial economy of higher First Nations employment? The effect on employment itself is summarized at the beginning of this executive summary. The effect can also be stated in terms of earnings. If Saskatchewan employed First Nations people at the same rate as its total population, earnings would be higher by \$880 million in 2012, increasing to \$1,422 million in 2031. The stream of increased earnings has a discounted present value of \$16.9 billion 2010 dollars using a discount rate of 3%.

If Saskatchewan employed First Nations people at the same rate as the other two Prairie Provinces, earnings would be higher by \$290 million in 2012, increasing to \$468 million in 2031. The stream of increased earnings has a discounted present value of \$5.6 billion 2010 dollars.

The increase in earnings would have multiplier effects on the provincial economy due to the well-known circular flow of income. If Saskatchewan were to employ its First Nations people at the same rate as its total population it would add to provincial real Gross Domestic Product through 2031 an amount which has a discounted present value of \$20.5 billion. If Saskatchewan simply employed its First Nations residents at the same rate as the other two Prairie Provinces it would add \$6.7 billion.

There would be a myriad of benefits from employing more First Nations people beyond the effects on employment, earnings, and Gross Domestic Product. Quantifying these effects is beyond the scope of the present study, but they are fundamentally important. For example, increased earnings have been shown to improve health, increase longevity, and improve the quality of childcare. Increased earnings would also increase government revenue through taxes and also reduce government expenditure in a number of ways such as lowering rates of criminality and welfare dependency.

### 1. The First Nations population of Saskatchewan

There is some uncertainty about the size of the First Nations population of Saskatchewan. The uncertainty is growing due to the elimination of the long form for the Census of 2011: its elimination in 2011 means that we have to work from the Census of 2006.

The size of the First Nations population can be measured using several distinct approaches: identity, ancestry, being listed on the Indian Register compiled by Indian Affairs and Northern Development, or being on the membership role of a First Nation. The approach used in this study will be the self-declared identity of the individual.

According to the Census of 2006, First Nations people made up 9.6% of the population of Saskatchewan. As noted in the previous paragraph, this is based on self-declared identity of the individual. Provincially, it excludes a large number of Métis and a handful of Inuit. It also leaves out two small categories reported in the Census: "multiple Aboriginal Identity responses" which make up only 7 one-hundredths of one percent of the provincial population and "Aboriginal responses not included elsewhere" which make up 16 one-hundredths of one percent. The "multiple responses" category could conceptually be included, but no information is reported about the nature of the multiple identities. The "Aboriginal responses not included elsewhere" category consists of individuals who do not report an Aboriginal identity but have responses elsewhere on the long form which suggest one: consistent with the approach of this study, which uses self-declared identity, this latter category is excluded.

There is a consensus that the Census of Canada undercounts the First Nations population, as discussed for example in (Eric Guimond et al., 2003). There are two principal reasons for the undercounting. One is the existence of partially enumerated Reserves and the other is the difficulty of counting a population part of which is economically marginalized. Partial enumeration occurs when the Census is disrupted on a Reserve before it can be completed. That did not occur on any of the Reserves in Saskatchewan for the 2006 Census. The problem of counting an economically marginalized population is principally due to "churn" which refers to people moving frequently or not having a fixed address: it is difficult to count a moving population. Although partial enumeration did not affect the results of the 2006 Census for Saskatchewan, churn did.

Statistics Canada has estimated the effect of undercounting for the First Nations population of Saskatchewan for the Census of 2006 (Statistics Canada, 2011). For Saskatchewan, correcting for undercounting increases the 2006 First Nations population size in Saskatchewan from 9.6% of total to 10.2%. The Statistics Canada study also projects the size of the First Nations and non-First Nations population through 2031. The population projection is done in terms of four plausible scenarios

corresponding to different future values for fertility, migration, and ethnic migration.<sup>2</sup> Taking the average of the four projections, the First Nations population share will be 15.7% of total for Saskatchewan by 2031. Statistics Canada did not release the projections for the intervening years between 2006 and 2031. However, assuming that the growth in the percentage is approximately linear, First Nations make up 11.5% of the population of Saskatchewan in 2012.

<sup>&</sup>lt;sup>2</sup> Ethnic migration refers to people who change their ethnic identity either intragenerationally or intergenerationally. An example of intragenerational ethnic migration would be when a person who previously didn't identify themselves as First Nations begins to do so. An example of intergenerational ethnic migration would be when a person does not identify themselves as First Nations, even though both parents do. There are other examples of ethnic migration, which is quite common in Canada. Ethnic migration is also discussed in the article by Guimond, cited previously in this section.

# 2. First Nations education levels are increasing, yet falling further behind

This is the Information Age: people are employed and paid based largely on what they know. Consequently education is paramount. What is happening to levels of educational attainment in Saskatchewan? Consider the following table, compiled from the Census Public Use Microdata Files from the 1996 Census.<sup>3</sup>

Table 1 shows the educational attainment of the population age 15 to 69 for Saskatchewan, separately for the First Nations population and the total population and also separately for males and females. The table includes individuals who are at least 15—labour force age—because that is when Statistics Canada begins to track the labour market outcomes which will be central to this report. The table excludes individuals who are 70 and older, because by that age most have exited the labour market.

Table 1. Educational attainment in Saskatchewan, age 15-69, 1996

Educational attainment	Male	Female	Both
	First Nations		
No high school diploma	68.7%	63.1%	65.7%
High school diploma, terminal	12.5%	14.7%	13.7%
Technical school diploma, terminal	17.2%	17.5%	17.3%
Bachelor's degree or higher	1.6%	4.7%	3.3%
	<b>Total Population</b>		
No high school diploma	43.4%	38.0%	40.7%
High school diploma, terminal	19.9%	21.9%	20.9%
Technical school diploma, terminal	26.0%	29.3%	27.7%
Bachelor's degree or higher	10.7%	10.7%	10.7%

The four educational categories in Table 1 are for individuals who:

 drop out prior to obtaining a high school diploma (without subsequently obtaining high school equivalency);

<sup>&</sup>lt;sup>3</sup> The Public Use Microdata Files are among the extraordinarily useful outputs of the Censuses. They contain a sample of responses to the Census long form after any information is removed which would allow identification of an individual. The long form went to one in five Canadian residents and of those about one in seven of the responses are in the Public Use Microdata File. So the samples are notably large. As noted above, the elimination of the long form for the Census of 2011 means that the most recent Census we can use is 2006.

- obtain a high school diploma either from graduation or from high school equivalency with no further formal education;
- complete a program at a non-University post-secondary institution (e.g. a technical school) with no further formal education; or
- obtain a Bachelor's degree or higher.

Begin examining Table 1 by looking at the educational attainment of the total population of Saskatchewan. Most readers will be surprised that 40.7% of Saskatchewan people did not have a high school diploma in 1996. This was true because much of generation y was still in high school, but age 15 or higher, so are included in the table. Note that females tend to be better educated than males.

Now examine the educational attainment of the First Nations population. Again, females are better educated than males. Note that—on average—the First Nations population is poorly educated: they are half again more likely to not have a high school diploma, a third less likely to have completed technical school, and two-thirds less likely to have completed university.

So, what happened next? Table 2 shows the educational attainment for Saskatchewan ten years later, as compiled from the Public Use Microdata files from the 2006 Census.

Table 2. Educational attainment in Saskatchewan, age 15-69, 2006

Educational attainment	Male	Female	Both
	First Nations		
No high school diploma	58.6%	53.3%	55.8%
High school diploma, terminal	18.8%	20.6%	19.7%
Technical school diploma, terminal	20.1%	20.1%	20.1%
Bachelor's degree or higher	2.5%	6.0%	4.4%
	Total Population		
No high school diploma	29.2%	23.9%	26.5%
High school diploma, terminal	28.4%	27.9%	28.1%
Technical school diploma, terminal	29.9%	33.4%	31.7%
Bachelor's degree or higher	12.6%	14.8%	13.7%

Table 2 shows educational improvements for First Nations people which are large, especially given that it was only over a ten-year period. The percentage of First Nations individuals with no high school diploma decreased by a sixth of its previous value. The percentage with a high school diploma increased by over two fifths. The percentage with technical school increased by a fifth. The percentage with university increased by a third.

The First Nations improvements shown between Table 1 and Table 2 should be thought of in terms of the myriad in individual stories behind those numbers—the hard work of many individual students and the support provided by families and First Nations. They deserve our sincere admiration and our thanks.

The improvement shown between the two tables should also be thought of in terms of educational programs which were created or expanded during that decade, and the many devoted teachers and teacher's aides who helped people become educated. They, too, deserve our sincere admiration and our thanks.

There is, however, one major problem. During this ten year period, the education levels of the total population of Saskatchewan increased by even more. The increase partly resulted from the trend toward increasing educational levels over time. It also resulted from most of generation y finishing their secondary and postsecondary education. As a consequence, the improvement in the education levels of the total population of Saskatchewan increased by even more than that for First Nations.

In 1996, the additional likelihood of a First Nations individual not having a high school diploma equalled (65.7% - 40.7% =) 25.0%. So First Nations individuals were 25.0% more likely to not have a high school diploma compared to the total population. Ten years later, the additional likelihood was (55.8% - 26.5% =) 29.3%. So First Nations people had fallen somewhat further behind in terms of completing high school.

Reinforcing this, the proportion of First Nations people who had a terminal high school diploma had decreased when compared to the total population. Examine the percentages for those with terminal high school diplomas—people who get a high school diploma with no further formal education. In 1996, the likelihood of a First Nations individual having a terminal high school diploma was less by (20.8% - 13.7% =) 7.1%. In 2006, the difference was (28.1% - 19.7% =) 8.4%. Again, First Nations people had fallen further behind in completing high school.

What about technical school? The difference in 1996 was (27.7% - 17.3% =) 10.4%. The difference in 2006 was (31.7% - 20.1% =) 10.6%. So First Nations people had fallen further behind in completing technical school, though only slightly.

What about university? The difference in 1996 was (10.7% - 3.3% =) 7.4%. The difference in 2006 was (13.7% - 4.4% =) 9.3%.

So, despite the improvements, First Nations people had fallen further behind in terms of each of the four levels of educational attainment used in Tables 1 and 2.

This relative decrease in the educational attainment of First Nations people came in the Information Age when education is critical for success in the labour market. The following report will analyze the First Nations labour market provincially back to 1996. Based on the above educational figures, all that will be surprising is that the employment statistics were not even worse.

But first, we need to examine the provincial labour market to observe that First Nations employees are everywhere, so that all segments of the provincial economy are dependent on First Nations employees, and hence on improving the First Nations labour market.

We also want to note some sectors and occupations which employ notably many or notably few First Nations people.

## 3. First Nations employees span the entire provincial economy

First Nations employees span the entire provincial economy, both in terms of their occupations as well as the sector in which they work.

Table 3 shows employment by occupation in Saskatchewan, compiled from the Public Use Microdata Files for the 2006 Census.

Table 3. Employment in Saskatchewan by Occupation

	Employment	Distribution	Employme	ent Rates
	First Nations All		First Nations	Total
	Employees	Employees	Population	Population
Managers	6.2%	7.8%	3.0%	5.7%
Professionals	9.4%	13.1%	4.5%	9.6%
Semi-professionals and technicians	10.3%	7.1%	4.9%	5.2%
Supervisors	2.5%	10.3%	1.2%	7.5%
Administrative and senior clerical	3.6%	4.7%	1.7%	3.5%
personnel				
Skilled sales and service personnel	3.4%	3.7%	1.6%	2.7%
Skilled crafts and trades workers	9.3%	8.7%	4.4%	6.4%
Clerical personnel	8.4%	8.9%	4.0%	6.5%
Intermediate sales and service	12.7%	11.7%	6.0%	8.6%
personnel	12.770	11.770	0.070	0.070
Semi-skilled manual workers	8.8%	10.2%	4.2%	7.5%
Other sales and service personnel	16.8%	10.0%	8.0%	7.4%
Other manual workers	8.7%	3.8%	4.1%	2.8%

The two employment distribution columns show the distribution of employed people by occupation for the First Nations employees and for, the total of all employees in the province. For example, the first entries of those columns show that 6.2% of employed First Nations people were managers, whereas the percentage for the entire province was 7.8%.

The two employment rate columns show similar information, but relative to the size of the population of labour force age. For example, the first entries show that 3.0% of the First Nations population of

labour force age are managers, whereas 5.7% of the total population of labour force age are managers.

The employment distribution columns are about employees—6.2% of First Nations employees are managers, as noted above. The employment rates columns are about populations—3.0% of the First Nation population of labour force age are managers, as noted above.

For the purposes of this paper, the point of Table 3 is that First Nations employees are distributed across all occupations in the province.

Before going on, however, it is interesting to examine Table 3 further. Begin by comparing the entries in the first two data columns. That is, compare the distribution of First Nations employees to the distribution of all employees across occupations. The lower level of First Nations educational attainment is clear from the entries in Table 3. For example, First Nations employees are less likely to be professionals—with their higher educational requirements—and more likely to be semi-professionals and technicians; whereas the reverse is true of the total of all employees. First Nations employees are more likely to be other manual workers than is true of the total of all employees. First Nations employees are less likely to be semi-skilled manual workers than is true of the total of all employees.

Despite the lower level of educational attainment for the First Nations population, nonetheless almost ten percent of First Nations employees are professionals. Although this is lower than the total for all employees—13.1%—it is still a higher percentage than some would expect. The writer speculates that the higher percentage is due to several targeted educational programs at the Universities of Saskatchewan and Regina—such as the Indian Teacher Education Program and the Native Law Centre.

Next, examine the columns of Table 3 containing the employment rates. A First Nations person of labour force age is most likely to be employed in other sales and service and least likely to be a supervisor. For the total of all employees, on the other hand, an individual is most likely to be a professional and least likely to be skilled sales and service personnel.

There are only two occupations which have higher employment rates for First Nations people compared to the total population: other sales and service personnel and other manual workers. So a First Nations person of labour force age is more likely to be in one of these two occupations than a person from the total population. The greatest difference the opposite direction is for supervisors.

Table 4 gives similar data, but broken out by industry instead of occupation. For example, the first row applies to renewable resource industries: Agriculture, forestry, fishing, and hunting. The entries show that this industry employs: 3.4% of all employed First Nations people; 11.6% of all employed people in Saskatchewan; 1.6% of all First Nations people of labour force age; and 8.5% of the total of all people of labour force age.

Table 4. Employment in Saskatchewan by Industry

	Employment	Distribution	Employment Rates		
	First Nations	All	First Nations	Total	
	Employees	Employees	Population	Population	
Agriculture, forestry, fishing and hunting	3.4%	11.6%	1.6%	8.5%	
Mining and oil and gas extraction	2.0%	3.2%	1.0%	2.4%	
Utilities	0.4%	0.8%	0.2%	0.6%	
Construction	10.4%	6.1%	5.0%	4.5%	
Manufacturing	5.0%	6.0%	2.4%	4.4%	
Wholesale trade	1.7%	3.6%	0.8%	2.7%	
Retail trade	7.9%	11.1%	3.8%	8.2%	
Transportation and warehousing	2.8%	4.3%	1.3%	3.2%	
Information and cultural industries	0.5%	2.2%	0.2%	1.6%	
Finance and insurance	1.1%	3.8%	0.5%	2.8%	
Real estate and rental and leasing	0.9%	1.1%	0.4%	0.8%	
Professional, scientific and technical services	1.0%	3.6%	0.5%	2.6%	
Management of companies and enterprises	0.1%	0.1%	0.1%	0.1%	
Administrative and support, waste management and remediation services	4.2%	2.8%	2.0%	2.1%	
Educational services	9.8%	7.4%	4.7%	5.5%	
Health care and social assistance	14.7%	11.4%	7.1%	8.4%	
Arts, entertainment and recreation	4.8%	2.0%	2.3%	1.5%	
Accommodation and food services	9.1%	7.0%	4.4%	5.1%	
Other services (except public administration)	3.4%	5.1%	1.6%	3.7%	
Public administration	16.6%	6.9%	8.0%	5.0%	

For the purposes of this paper, the point of Table 4 is that First Nations employees are distributed across all industries in the province.

Before going on, however, Table 4 should be examined further. Many will be surprised at the entries for renewable resources: agriculture, forestry, fishing, and hunting. First Nations people are less dependent on renewable resources for employment than is the total for the province. So a lower proportion of First Nations employees work in renewable resources, and a dramatically lower proportion of the First Nations population of labour force age work there.

The next row—non-renewable resource extraction—is extremely disturbing. First Nations do not receive their proportional share of jobs in non-renewable resources: only 1.0% of the First Nations of labour force age work there, less than half the percentage—2.4%—of the total population of labour force age. Only 2.0% of First Nations employees work there, as opposed to 3.2% of all employees. Non-renewable resource extraction includes Cameco, which has a good record numerically for employing Aboriginal people (E. Howe, 2009). That implies that there are other firms in the industry with records which are bad enough to offset Cameco's record. It is safe to suppose that all of the major non-renewable resource firms in Saskatchewan have significant public relations efforts focused on lauding their own employment of First Nations people. It is obvious from Table 4, however, that there can be a large gap between public relations and reality.

Another surprise may be contained in the third row, utilities. In Saskatchewan, this industry is dominated by provincial Crown Corporations. Note that First Nations employees receive less than half their proportional share of jobs, 0.4% for First Nations employees as opposed to 0.8% for all employees. First Nations of labour force age receive only a third of their proportional share, 0.2% as opposed to 0.6%.

It would be fascinating to know what has happened to First Nations employment in accommodation and food services since 2006. Table 4, compiled from the Census of 2006, shows that sector to be the fifth-largest employer of First Nations people. Those jobs were critically important because many of them were entry-level positions. However, since then Saskatchewan's government extended the Immigrant Nominee Program—which had been designed to attract highly skilled and educated immigrants—to include unskilled jobs in the food and hospitality industries. With no desire to be xenophobic and no intention of criticizing any immigrants personally, <sup>4</sup> this policy change reduced First Nations employment. It reduced it in a particularly harmful fashion, due to the entry-level nature of many of the jobs. It would be interesting to calculate the amount of the decrease in First Nations employment which was caused by this policy change.

First Nations employment is more concentrated than total. The top four employing industries<sup>5</sup> employ over half—51.5%—of First Nations employees. On the other hand, the top four employing industries for the total population<sup>6</sup> employ 41.5% of all employees.

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<sup>&</sup>lt;sup>4</sup> The writer is an immigrant himself having become a permanent resident of Canada in 1979 and a citizen in 1992.

<sup>&</sup>lt;sup>5</sup> Public administration; health care and social assistance; construction; and education services.

<sup>&</sup>lt;sup>6</sup> Agriculture, forestry, fishing and hunting; health care and social assistance; retail trade; and educational services.

### 4. First Nations employment rates are declining off reserve

Starting in June of 2004, Statistics Canada began to gather data on First Nations employment in Saskatchewan as part of its monthly Labour Force Survey. That wide-ranging survey determines a number statistics—such as aggregate unemployment rates—which are carefully examined by analysts and prominently reported in the media. Statistics Canada doesn't publish the First Nations data, but it is available on request.<sup>7</sup>

This section will focus on employment rates. Despite the media's attention to unemployment rates, economists focus more on employment rates when analyzing populations like First Nations with high levels of unemployment. The reason has to do with a downward bias to the unemployment rate called the discouraged worker phenomenon. The discouraged worker phenomenon refers to the situation in which an unemployed person becomes discouraged and stops actively looking for work. When he/she no longer actively looks for work, he/she is not counted as unemployed, so the measured unemployment rate falls. There is no similar bias to the employment rate. More on the discouraged worker phenomenon can be found in any intermediate macroeconomic theory textbook.

Four caveats should be made about the First Nations data from the Labour Force Survey.

- The Labour Force Survey does not extend onto reserves, so the First Nations data are limited to the off-reserve population.
- The First Nations data are reported as three-month moving averages so the values reported for each month are the averages for it and the previous two months.
- The First Nations data are not available by sector.
- The Labour Force Survey is limited to people age fifteen and older.

Consider the four caveats starting with the off-reserve limitation. A First Nations person living off reserve but working on reserve would be covered. But the reverse, living on reserve but working off would not be. However, this report will go with the usual approach of labelling this series "off-reserve employment," but the more accurate label would be "employment of the off-reserve population." Thus those employed in Saskatchewan's several non-residential urban reserves would be included in the Labour Force Survey unless they commute to work from a residential reserve.

The off-reserve limitation does not apply to the census data which will be used elsewhere in this report because censuses extend onto reserves. But employment data from the census are only available every five years, and not in 2011 due to the elimination of the long form of the census in that year as discussed above.

<sup>&</sup>lt;sup>7</sup> The First Nations data are also made available on the website of the Saskatchewan Bureau of Statistics, See www.stats.gov.sk.ca/lfs

The First Nations employment data from the Labour Force Survey—including only those off reserve—can be compared to the results of the Census—including both on and off reserve. The long form of the Census of 2006 collected employment data for the Census week—one week in May of that year—which can be compared to the results of the Labour Force Survey for the month of May, 2006. The comparison shows that at that time almost half the First Nations population of labour force age lived off reserve, 27.4 thousand out of 57.7 thousand or 47.5%. However, due to high unemployment rates on reserve, the majority of First Nations employment was off reserve, 12.8 thousand out of 21.1 thousand, or 60.7%. So, the Labour Force Survey, with its limitation to off-reserve employment, includes the majority of First Nations employees.

The second caveat refers to the data being reported as three-month moving averages, which is done because of Statistics Canada's concerns about small sample sizes. Because of the averaging, the First Nations data must be compared to three-month moving averages of total employment.

The labour-market survey data on First Nations employment is not reported in sectorial detail due to concerns about small sample sizes. This was addressed analytically in Section 3 of this report by using Census data.

The exclusion of people younger than fifteen results from fifteen being "labour force age," the age at which Statistics Canada begins to track labour market outcomes. People younger than fifteen are excluded from the Labour Force Survey.

This section will begin with comparisons of twelve-month periods. That way, we do not have to deal with seasonality. Seasonal variation in employment in Saskatchewan is large, and the pattern and magnitude of variation is different for First Nations as opposed to the total population.<sup>8</sup>

The most recent first twelve months of data extend from August 2011 through July 2012. That will be compared to the first year for which these months of data are available: August 2004 through July 2005. The results are shown in Table 5.

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<sup>&</sup>lt;sup>8</sup> The pattern of seasonal variation is similar but the magnitude of the variation is different. First Nations employment tends to be highest in August and lowest in April. Somewhat similarly, total employment tends to be highest in July and lowest in March. But the magnitude of seasonal variation in First Nations employment is 8.8% over the year (going from 5.6% above average at its highest to 3.3% below at its lowest). Seasonal variation of total employment is smaller, 3.8% (going from 2.0% above to 1.8% below over the year).

Table 5. Off-reserve population and employment

	August, 2004 - July, 2005	August, 2011 – July, 2012
	First Nations	
Population 15 and over, thousands	26.3	30.8
Employment, thousands	10.9	15.2
Employment Rate, percentage	41.4%	49.4%
	Total Population	1
Population 15 and over, thousands	750.3	804.9
Employment, thousands	484.7	529.1
Employment Rate, percentage	64.6%	65.7%

From Table 5, note that First Nations people made up (26.3/750.3 =) 3.5% of the off-reserve population age 15 and over in the earlier period, but make up (30.8/804.9 =) 3.8% in the latter. First Nations people have a share of the jobs which is lower than their population percentage: (10.9/484.7 =) 2.2% of employees in the earlier period and (15.2/529.1 =) 2.9% in the latter. However, also note that the provincial labour market is more dependent on First Nations employees than the above percentages suggest: of the increase in employment between the periods, (529.1 - 484.7 =) 44.4 thousand, First Nations account for (15.2 - 10.9 =) 4.3 thousand of the increase. So First Nations started with only 2.2% of the jobs, but provided 9.7% of the increase in employment between these periods.

Although the annual data shown in Table 5 show some improvement in the First Nations labour market in Saskatchewan, they might seem to suggest a sluggish, but gradually improving trend. That is not the case. The First Nations labour market has followed a dynamic path which varies from optimistic highs to pessimistic lows. Figure 1 shows employment rates for First Nations and for the Total population, beginning with June of 2004, at the start of the data.

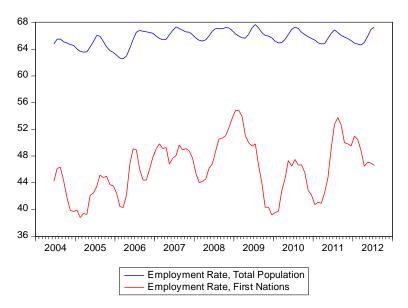


Figure 1. Employment rates in Saskatchewan, June 2004 through present

Begin by examining the employment rate of the total population. It varies from a little more than two-thirds to somewhat less, following seasonal variation. So, for the total population, about two out of every three adults are employed. Employment rates are fundamental variables which, like that shown for the total population, usually only vary gradually over time. Not First Nations. The gradual improvement shown in Table 5 is seen to be the result of a dynamic process which shows significant gain followed by significant loss.

First examine the period through the end of 2008, shown below in Figure 2. Here we observe variation around an improving trend. And the trend is improving. First Nations employment rates in 2004 are dramatically below that for the total population: as low as 38.8% in February of 2005 compared to 63.7% for the total population. By December of 2008, the employment rate for First Nations is 53.6% though that for the total population is also higher, at 66.8%. Thus, almost half the difference in employment rates was eliminated in only four years.

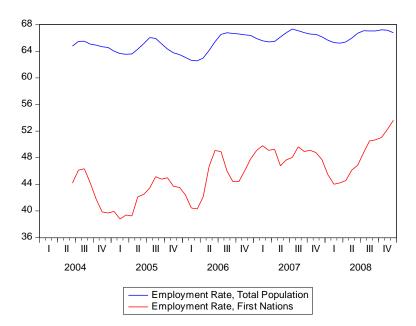


Figure 2. Employment rates in Saskatchewan, June 2004 through December 2008

Then we arrive at the period since, which is shown in Figure 3.

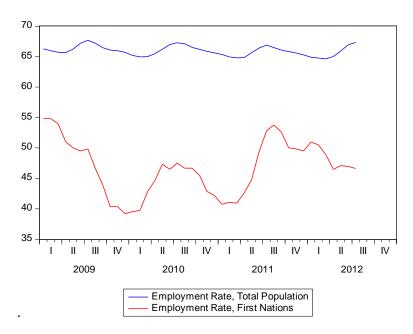


Figure 3. Employment rates in Saskatchewan, January 2009 through present

The year 2009 was a disaster for First Nations employment in Saskatchewan. In January of 2009, First Nations employment in Saskatchewan was 15.9 thousand. A year later, in January of 2010, it was 11.7 thousand, for a decrease of over a quarter. By December of 2009, the employment rate for First Nations had declined to 39.2%, almost equal its lowest value.<sup>9</sup>

Following the catastrophic decline of 2009, there was some recovery in the first half of 2010, followed by decline extending into the start of 2011. Then more recovery for six months. Since then there has been gradual, steady decline. Then four months of increases, followed by a decreasing trend for the past year.

The most recent employment rate for First Nations is for July, 2012. The employment rate has decreased to the lowest July value it has been since 2005, seven years before.

What was the cause of this decreasing trend in First Nation employment rates? Two of the causes were policy changes by the provincial government. One was the elimination of the Aboriginal Employee Development Program. Table 4 showed that Public Administration employs a larger fraction of First Nations people than any other sector in the provincial economy—making First Nations employment notably sensitive to changes in the government's employment policies. Table 4 also showed that Accommodation and Food Services is the fifth largest employing sector for First Nations people. As discussed in Section 3, those jobs are particularly important since many are entry-level. The government extended the Immigrant Nominee Program—which had been designed to bring highly skilled or educated immigrants to the province—to include unskilled jobs in the hospitality industry. That change caused a number of First Nations people to lose their jobs in this industry. However popular these actions were politically, they were remarkably short sighted because their effect on First Nations employment. Further study would be interesting. It would be interesting to study the declines in First Nations employment rates shown in Figure 3 and quantitatively assign them to their causes.

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<sup>&</sup>lt;sup>9</sup> One can only speculate what would have happened if something similar had happened to the total population—a reprise of the Regina riot perhaps.

<sup>&</sup>lt;sup>10</sup> Another cause was that Saskatchewan's Minister of Advanced Education took a major national First Nations institution—First Nations University of Canada—and beat it to its knees. Those actions had the effect of hardening public attitudes toward First Nations people and institutions. Some might argue that the Minister's actions were necessary given some difficulties at First Nations University. However, over a decade before, Pat Atkinson—then Minister of Education—effectively stick-handled similar difficulties at the Gabriel Dumont Institute without the theatrics and headlines.

### 5. First Nations employment is increasing, yet Saskatchewan lags behind

Table 6 shows employment statistics for Saskatchewan, compiled from the Public Use Microdata files of the Censuses of 1996 and 2006.

Table 6. Employment statistics for Saskatchewan, 1996 and 2006

		1996			2006	
	Male	Female	Total	Male	Female	Total
	First Nat	ions - Sask	atchewan			
Population 15 and over, thousands	18.3	21.3	39.5	27.4	30.2	57.7
Employment, thousands	6.4	5.8	12.1	10.4	10.8	21.1
Employment Rate, percentage	34.9%	27.1%	30.7%	37.7%	35.6%	36.6%
	Total Po	pulation - S	Saskatche	wan		
Population 15 and over, thousands	363.3	381.2	744.5	373.1	394.6	767.7
Employment, thousands	250.8	212.3	463.1	258.5	235.9	494.4
Employment Rate, percentage	69.0%	55.7%	62.2%	69.3%	59.8%	64.4%

Note: Entries do not necessarily sum to totals due to rounding.

Table 6 reports the population age 15 years and older, aggregate employment, and the resulting employment rate. The statistics are reported separately for First Nations and for the Total population, and separately for males and females.

As discussed above, the First Nations labour market in Saskatchewan improved over the period 1996 to 2006. Although the employment rate for First Nations was less than half that for the total provincial population in 1996, it had closed about a fifth of the difference by 2006. Saskatchewan's current resource boom had begun by 2006, so employment was up from 463.1 thousand to 494.4 thousand, for an increase of 6.8%. First Nations employment, on the other hand, increased from 12.1 thousand to 21.1 thousand, an increase of 74.4%.

Expressed differently, in 1996 only (12.1/463.1 =) 2.6% of the provincial employees were First Nations, whereas the First Nations share of the population age 15 and over was twice as great, 5.3%. In the next ten years, provincial employment increased by (494.4 - 463.1 =) 31.3 thousand, and First Nations people got (21.1 - 12.1 =) 9.0 thousand of those jobs, hence providing 42.9% of the increase. By 2006, the

percentage of First Nation employees has increased to (21.1/494.4 =) 4.3%, though in the meantime the population share had risen to (57.7/767.7=) 7.5%.

In part, this resulted from Saskatchewan's ongoing resource boom, which has caused an excess demand for employees—more jobs than people. First Nations people included many who were unemployed, so it contributed disproportionately much to providing the additional employees that the provincial economy needed.

With an excess demand for employees, one of the constraints on economic growth in Saskatchewan is the lack of workers. During the ten years from 1996 to 2006, the excess demand was somewhat reduced and the economy of Saskatchewan benefited from more First Nations employees due to a combination of public policies, firm recruitment, increasing education levels, and individual motivation. It was, however, an <u>imperfect storm</u>. Why imperfect? The other two Prairie Provinces, Manitoba and Alberta, both did a better job so they benefited more. Saskatchewan trailed behind.

Table 7 shows corresponding employment statistics from Alberta and Table 8 for Manitoba.

Table 7. Employment statistics for Alberta, 1996 and 2006

		1996			2006	
	Male	Female	Total	Male	Female	Total
	First Nat	ions - Albe	erta			
Population 15 and over, thousands	19.1	22.2	41.3	30.4	33.8	64.2
Employment, thousands	9.1	8.7	17.9	17.5	15.8	33.4
Employment Rate, percentage	47.7%	39.4%	43.3%	57.7%	46.9%	52.0%
	Total Pop	oulation -	Alberta			
Population 15 and over, thousands	1,013.0	1,034.5	2,047.4	1,307.1	1,314.9	2,621.9
Employment, thousands	742.6	630.3	1,372.9	1,008.0	851.7	1,859.7
Employment Rate, percentage	73.3%	60.9%	67.1%	77.1%	64.8%	70.9%

Note: Entries do not necessarily sum to totals due to rounding.

Table 8. Employment statistics for Manitoba, 1996 and 2006

		1996			2006	
	Male	Female	Total	Male	Female	Total
	First Nat	ions - Man	itoba			
Population 15 and over, thousands	24.5	25.8	50.4	30.0	34.0	64.1
Employment, thousands	8.9	8.0	16.9	12.1	13.1	25.3
Employment Rate, percentage	36.4%	30.9%	33.6%	40.4%	38.6%	39.4%
	Total Po	pulation - I	Manitoba			
Population 15 and over, thousands	415.5	440.1	855.5	441.7	466.0	907.7
Employment, thousands	278.8	242.1	520.9	303.9	270.7	574.6
Employment Rate, percentage	67.1%	55.0%	60.9%	68.8%	58.1%	63.3%

Note: Entries do not necessarily sum to totals due to rounding.

To compare the performance of Saskatchewan with that of the other Prairie Provinces, examine the employment rates. Beginning with 1996, both of the other Prairie Provinces were doing a better job at utilizing their First Nations population. Whereas the employment rate in Saskatchewan was 30.7%, the rates for Alberta and Manitoba were higher, 43.3% and 33.6%. Ten years later, in 2006, Saskatchewan's First Nations employment rate increased to 36.6%, but Alberta's and Manitoba's had increased also, to 52.0% and 39.4%, respectively. In 1996, Saskatchewan's First Nations employment rate trailed Alberta's by 43.3% - 30.7% = 12.6%. In 2006, the difference had grown to (52.0% - 36.6% =) 15.4%. In 1996, Saskatchewan's First Nations employment rates trailed Manitoba's by (33.6% - 30.7% =) 2.9%. In 2006, the difference was (39.4% - 36.6% =) 2.8%, barely different. Saskatchewan's First Nations employment rate continued to trail both that of Alberta and Manitoba. It fell further behind Alberta, though it caught up slightly relative to Manitoba.

# 6. The benefit of closing the First Nations employment gap in Saskatchewan

One of the consequences of Saskatchewan's resource boom is that there is an excess demand for employees. Moreover, with the ongoing retirement of the members of the baby-boom generation, the excess demand for employees is likely to continue for the foreseeable future. One way to reduce that excess demand would be to employ more First Nations people. How much difference would that make to provincial employment, earnings, and Gross Domestic Product?

Obviously, if Saskatchewan employed First Nations people at the same rate as its total population, it would have more employees. Table 6 shows that for 2006 Saskatchewan employed just over a third of its First Nations people of labour force age: 21.1 thousand of 57.7 thousand. On the other hand, Saskatchewan employed just under two-thirds of its total population of labour force age: 494.4 out of 767.7. If it had employed its First Nations population at the same rate as its total population, it would have had another 16.1 thousand employees in 2006.

If Saskatchewan caught up with the other Prairie Provinces in terms of their First Nations employment, it would have more employees. Tables 7 and 8 show that for 2006 Manitoba and Alberta had a combined 128.3 thousand First Nations people of labour force age and employed 58.7 thousand of them. If Saskatchewan employed its First Nations population at this same rate, it would have had another 5.3 thousand employees in 2006.

Moreover, the number of First Nations people is growing over time. Section 1 utilized a study forecasting the population of First Nations people in Saskatchewan through 2031 (Statistics Canada, 2011). Just as in Section 1, we will use the average of the four projections presented in that study. If Saskatchewan employed First Nations people at that same rate as its total population, it would have another 17.9 thousand employees in 2012, growing to 25.1 thousand by 2031. If Saskatchewan caught up with the other Prairie Provinces, it would have another 5.9 thousand employees in 2012, growing to 8.3 thousand by 2031.

How significant would these additional employees be to the provincial economy? How much difference would that make to provincial earnings? The provincial income and product accounts—the ones which include the computation of Gross Domestic Product—include a measurement of wages, salaries, and supplementary labour income, a component of personal income. (Supplementary labour income consists mostly of benefits such as extended health care programs and employer contributions to private pension plans.) The statistic is computed on a Gross Provincial Product accounting basis, so it is done for persons who are residents of the province. The most recent year for which the accounts are available is 2010, when the amount was \$25,389 million. According to the labour force survey, Saskatchewan's employment in 2010 was 524.3 thousand. Thus the average annual rate of pay in

Saskatchewan was \$48,424.57 per employee in 2010. The average rate of pay in Saskatchewan is increasing over time. Thus far in the 21<sup>st</sup> Century, in real terms (so removing the effect of inflation), it has been increasing by 2.7% per year. Even in the slower-growing 1990's—before the resource boom—it increased by 0.9% per year. The real wage per employee was extrapolated into the future using a lower growth rate of 0.75% per year.

Using that growth rate, the average wage rate in 2012 is \$49,153.66 and will grow to \$56,651.57 by 2031, both in 2010 dollars.

If Saskatchewan employed First Nations people at the same rate as its total population, earnings would be higher by \$880 million in 2012, increasing to \$1,422 million in 2031. The stream of increased earnings has a discounted present value of \$16.9 billion 2010 dollars using a discount rate of 3%.

If Saskatchewan employed First Nations people at the same rate as the other two Prairie Provinces, earnings would be higher by \$290 million in 2012, increasing to \$468 in 2031. The stream of increased earnings has a discounted present value of \$5.6 billion 2010 dollars.

The increase in earnings would have multiplier effects on the provincial economy due to the well-known circular flow of income. Multipliers for Saskatchewan are available in (Eric Howe, 2011), which includes the long-run effect of increased earnings on Gross Domestic Product in Saskatchewan. It shows that for every dollar increase in earnings, real Gross Domestic Product (measured in 2002 dollars), increases by \$1.18. Thus If Saskatchewan were to employ its First Nations people at the same rate as its total population it would add to provincial real Gross Domestic Product through 2031 an amount which has a discounted present value of \$20.5 billion. If Saskatchewan just employed its First Nations residents at the same rate as the other two Prairie Provinces it would add \$6.7 billion.

There would be a myriad of benefits from employing more First Nations people beyond the effect on employment, earnings, and Gross Domestic Product. Quantifying these effects is beyond the scope of the present study, but they are fundamentally important. For example, increased earnings have been shown to improve health, increase longevity, and improve the quality of childcare. Increased earnings would also increase government revenue through taxes and reduce government expenditure in a number of ways such as lowering rates of criminality and welfare dependency.

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<sup>&</sup>lt;sup>11</sup> For that study, earnings were measured in 2011 dollars. Real Gross Domestic Product is currently measured in 2002 dollars. So the above numbers have to be adjusted for the inflation between 2010 and 2011, increasing them by 2.7%.

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