

Catalogue no. 13-604-M — no. 069
ISSN: 1707-1739
ISBN: 978-1-100-18616-0

Research Paper

Income and Expenditure Accounts Technical Series Human Resource Module of the Tourism Satellite Account, 2010



Income and Expenditure Accounts Division
21st Floor, R.H. Coats Building, Ottawa, K1A 0T6



Statistics
Canada

Statistique
Canada

Canada

Human Resource Module of the Tourism Satellite Account, 2010

This paper reports on the Human Resource Module of the Tourism Satellite Account, 2010 developed by Statistics Canada. This study provides detailed information on employment related to tourism in Canada. Information on wages and salaries, number of jobs and hours worked by occupation are included. The data are also disaggregated by age, gender and immigration status. This study provides a resource for training and planning for tourism in Canada. This paper is based upon data published as of March 31, 2011.

This study was prepared by Diane Lake of the Research and Development Projects and Analysis Section, Income and Expenditure Accounts Division, Statistics Canada. The study was funded through a partnership agreement with the Canadian Tourism Human Resource Council.

**Ottawa
June 2011**

Catalogue no. 13-604-M no. 69
ISSN: 1707-1739
ISBN: 978-1-100-18616-0

Catalogue no. 13-604-MPB no. 69
ISSN: 1707-1720
ISBN: 978-1-100-53249-3

Published by authority of the Minister responsible for Statistics Canada

© Minister of Industry, 2011

La version française de cette publication est disponible (n° 13-604-M n° 69 au catalogue)

All rights reserved. The content of this electronic publication may be reproduced, in whole or in part, and by any means, without further permission from Statistics Canada, subject to the following conditions: that it be done solely for the purposes of private study, research, criticism, review or newspaper summary, and/or for non-commercial purposes; and that Statistics Canada be fully acknowledged as follows: Source (or "Adapted from", if appropriate): Statistics Canada, year of publication, name of product, catalogue number, volume and issue numbers, reference period and page(s). Otherwise, no part of this publication may be reproduced, stored in a retrieval system or transmitted in any form, by any means—electronic, mechanical or photocopy—or for any purposes without prior written permission of Licensing Services, Client Services Division, Statistics Canada, Ottawa, Ontario, Canada K1A 0T6.

Standards of service to the public

Statistics Canada is committed to serving its clients in a prompt, reliable and courteous manner. To this end, Statistics Canada has developed standards of service that its employees observe. To obtain a copy of these service standards, please contact Statistics Canada toll-free at 1-800-263-1136. The service standards are also published on www.statcan.gc.ca under "About us" > "The agency" > "Providing services to Canadians."

Table of contents

| | |
|---|----|
| Highlights | 5 |
| 1 Introduction | 6 |
| 2 Scope of study | 6 |
| 3 Changes to methodology | 7 |
| 4 Revisions | 7 |
| 5 Results | 7 |
| 5.1 Tourism sector | 8 |
| 5.2 Tourism industry profiles | 10 |
| 5.3 Occupations in tourism industries | 13 |
| 5.4 Profile of employees in tourism industries | 14 |
| Data tables | 17 |
| Table 1 Gross domestic product, tourism gross domestic product, tourism expenditures and jobs in tourism industries and total economy, Canada | 18 |
| Table 2 Annual compensation and hourly compensation in tourism industries and total economy, Canada | 19 |
| Table 3 Jobs in tourism industries and total economy, Canada | 20 |
| Table 4 Weekly hours worked in tourism industries and total economy, Canada | 21 |
| Table 5 Employee jobs, hours and wages by employee characteristics in tourism industries, Canada, 2010 | 22 |
| Appendix A Accounting framework | 23 |
| Appendix B Concepts and definitions | 24 |
| Appendix C Data sources | 26 |
| Appendix D Methodology | 29 |
| Appendix E Tourism industries in the Human Resource Module | 31 |
| Appendix F Tourism occupations in the Human Resource Module | 34 |
| Appendix G Table structure | 37 |
| Glossary of terms | 38 |
| References | 40 |
| Technical series | 43 |

Symbols

The following standard symbols are used in Statistics Canada publications:

- . not available for any reference period
- .. not available for a specific reference period
- ... not applicable
- 0** true zero or a value rounded to zero
- 0^s** value rounded to 0 (zero) where there is a meaningful distinction between true zero and the value that was rounded
- P** preliminary
- r** revised
- x** suppressed to meet the confidentiality requirements of the *Statistics Act*
- E** use with caution
- F** too unreliable to be published

Highlights

- Tourism industries in the Human Resource Module (HRM) include five industry groups which are defined as follows: transportation, accommodation, food and beverage services, recreation and entertainment and travel services. Generally speaking, an industry is considered a tourism industry if it would cease to exist, or continue to exist only at a significantly reduced level of activity, as a direct result of the absence of tourism.
- The HRM provides the following three main human resource statistics for the tourism sector as a whole and for each tourism industry group: jobs, hours and compensation. These statistics are available by gender, work status, by age group, by immigrant status and by occupation. This paper is based upon data published as of March 31, 2011.
- All statistics provided by the HRM are related to production in tourism industries. For example, statistics concerning jobs are about the number of jobs required to produce commodities in tourism industries whether the commodities are consumed by visitors or non-visitors, that is, local residents.
- In 2010, the tourism sector in Canada accounted for 1.6 million jobs, that is, 9.2% of all jobs in Canada. Jobs in tourism and in the total economy rebounded in 2010 by 1.0% and 1.8%, respectively, following declines in 2009.
- The food and beverage services industry group was the largest employer among tourism industries in 2010, with more than 50% of all tourism jobs (852,000 jobs). The second largest employer was recreation and entertainment with 267,000 jobs, followed by accommodation with 234,000 jobs. The transportation industry group was responsible for 211,000 jobs, while travel services provided 43,000 jobs.
- Working hours were shorter in tourism industries in Canada compared to jobs economy-wide. The shorter work week is explained by the higher proportion of part-time jobs in tourism.
- Since 1997, hourly compensation has been lower in the tourism sector than economy-wide. The gap has widened gradually from \$6.16 in 1997 to \$9.76 in 2010.
- Food-counter attendants and kitchen helpers and related occupations were the single largest occupation in the tourism sector with 251,000 jobs. Almost all of these jobs (235,000) were in the food and beverage services industry group. In the accommodation industry group, the most prevalent occupation was light duty cleaners with 44,000 jobs. Bus drivers and subway and other transit operators were the main occupation in other transportation industries, with 47,000 jobs, while program leaders and instructors in recreation, sport and fitness were the most common occupation in recreation and entertainment, with 32,000 jobs. Travel counsellors were the main occupation in travel services, but accounted for only 19,000 jobs.
- Two tourism industry groups in Canada had a notably older workforce: 63.3% of employees in other transportation and 45.0% of employees in air transportation were aged 45 years and over.
- On an hourly basis, immigrants were paid less than non-immigrants in the tourism sector, but on annual basis, immigrants earned more (\$29,708 for immigrants versus \$26,247 for non-immigrants) because they worked more hours.

1 Introduction

The aim of the Human Resource Module (HRM) is to provide timely and reliable statistics on the human resource dimension of tourism.

Both the Canadian Tourism Satellite Account (CTSA) and the National Tourism Indicators (NTI) already carry some information on the number of jobs generated by tourism at the national level.¹ The HRM complements and enhances the analytical capacity provided by the CTSA and the NTI, allowing for a broader insight into tourism's role in the economy by providing more detailed human resource information.

For example, human resource planning involves all persons working in tourism industries regardless of whether their job comes directly from serving a visitor or from serving a local resident. Consequently, the total number of jobs in tourism industries is a major focus of the HRM and is much broader than the CTSA and the NTI, which portray only the jobs directly attributable to visitor spending. In addition, some outputs of tourism industries are considered non-tourism commodities because tourism is not a significant source of their demand. Nevertheless, their production generates jobs in tourism industries, and these jobs are included in the overall human resource planning for tourism industries.

The HRM serves as a useful planning and forecasting tool for policy makers in the tourism, employment and training areas. Various tourism-affiliated agencies, academics, and decision-makers in tourism will also be able to use it for research and analysis, planning and development. An extension to the provincial level has also been started² to make the HRM more relevant to these audiences and for similar purposes.

Outlining the rest of the report, the scope of the study is described in the next section, followed by an explanation of revisions to the data. Selected results are then discussed to demonstrate analytical uses of the HRM, followed with a selection of relevant data tables.

Appendices A and B discuss the accounting frameworks behind the HRM, key tourism concepts and definitions from the CTSA, and various labour concepts and definitions from the Canadian System of National Accounts (CSNA). Appendix C summarizes the data sources and Appendix D outlines the general methodology used. Appendix E provides a list of North American Industrial Classification System (NAICS) industries included in the industry groups used by the HRM, while Appendix F lists the occupations used by the HRM from the National Occupational Classification for Statistics (NOC-S). A summary of the tables available upon request in the HRM is included in Appendix G. A glossary of terms and a list of references are also provided.

2 Scope of study

The HRM provides a snapshot of the tourism industries and occupations they comprise as well as insights into trends over time. Analyses can be made on the following key statistics: jobs, hours worked and employment earnings starting from 1997. Derived variables, such as number of full-time equivalents, average hourly earnings and average annual hours worked per job can also be examined.

These key statistics can be analyzed according to various characteristics of the jobs (employee or self-employed, full-time or part-time, occupation group) and the characteristics of the persons holding them (gender, age group, immigrant status). Information by occupation is also available. Comparisons can be made to the Canadian System of National Accounts (CSNA) employment estimates for the overall economy and for selected industries as well as the Canadian Tourism Satellite Account (CTSA) and National Tourism Indicators (NTI) aggregates.

1. Some provincial information on the number of jobs generated by tourism was provided in Barber-Dueck and Kotsovos 2003.
2. See Bisailon 2010a.

The scope of this study is similar to the previous national study³ with the addition of data for 2010. The information on the number of jobs, hours worked and employment earnings is presented for the same industry groups as before including for full-time and part-time jobs. The information is also available according to the same characteristics of employees (gender, age group and immigrant status) and similar occupations.

In particular, the HRM for Canada provides annual estimates for the years 1997 up to 2010. These estimates are based on national data from the Canadian Productivity Accounts (CPA), which is a key input to the HRM, as well as Labour Force Survey data (LFS). Census data for 2001 and 2006 are incorporated. The North American Industrial Classification System (NAICS) of 2002 and the National Occupational Classification for Statistics (NOC-S) of 2006 are used.

3 Changes to methodology

There have been no changes to the methodology of the HRM with this update.

4 Revisions

Estimates for the period 2004 to 2009 have been revised. These revisions bring the data into line with the Canadian Productivity Accounts (CPA) published in December 2010. The purpose of this section is to outline and explain the main revisions.

The estimated number of jobs in tourism industries was reduced for 2005 to 2009; by 19,000 jobs in 2009 and 16,600 jobs in 2008. These reductions represent only 1% of the tourism workforce for both years. The number of jobs was lowered mainly in the food and beverage services industries and to a lesser extent in the air transportation and travel services industries in 2009. The number of jobs in accommodation was revised up by 5,400 jobs in 2009, the only tourism industry with an upward revision.

Weekly hours per job, for tourism industries and the total economy, were unchanged from 2004 to 2009. Hourly compensation for the total economy was also unchanged over the same period. However, hourly compensation in tourism industries is between 7 to 25 cents lower for 2007 to 2009 compared to the last HRM. For example, hourly compensation for accommodation, food and beverage services, recreation and entertainment and travel services was revised upward in 2009 (from \$0.07 to \$0.89). On the other hand, downward revisions were observed in air transportation (-\$1.49) and other transportation (-\$0.42).

Negligible revisions were introduced in the employee profiles for tourism industries for the whole period. The Labour Force Survey is used to develop time series on jobs, hours worked and wages and salaries by occupation, age and gender for each industry group in the HRM. To reduce volatility in the occupational time series, we use a four-year moving average which creates very small changes to the data.

5 Results

The intent of this section is to highlight some of the findings and to illustrate some of the types of analyses the HRM can support. The analysis will focus on the year 2010 and on comparisons with preceding years. A brief description of the general economic conditions prevailing in Canada and in the tourism sector in 2010 is provided first. This description is used as background for the subsequent analyses in sections 5.1 to 5.4.

Real gross domestic product (GDP) advanced 3.3% in 2010 in Canada as the economy continued its upturn (see Table 1). Personal expenditure on consumer goods and services increased 3.4%, driven by spending on services. Final domestic demand⁴ rose by 4.4% compared to the previous year, while exports of goods and services climbed 6.4%, boosted by exports of goods (+7.3%).⁵

3. See Bisailon 2010b.

4. Final domestic demand consists of consumer spending, government expenditures and business investment.

5. Source: Statistics Canada, National Income and Expenditure Accounts: Data Table, catalogue no. 13-019-X.

Tourism spending in Canada in tourism industries increased 4.0% in real terms in 2010 (compared to a drop of 3.1% in 2009), as tourism spending by Canadians at home rose by 4.3% and spending by international visitors grew 2.9%.

5.1 Tourism sector

This section aims to compare key variables of the HRM: jobs, hours worked and compensation for the tourism sector in Canada with the overall economy in Canada over time.

Compensation for all jobs

Compensation⁶ reached \$48.8 billion in 2010 for tourism industries in Canada, up 4.6% from the previous year, outpacing the 3.9% growth of compensation for the total economy (see Table 2). This growth was mainly due to an increase in hourly compensation (+4.8%) and to a lesser extent to an increase in the number of jobs (+1.0%). The number of hours worked per week declined 1.1%.

For the past five years, compensation in tourism accounted for 5.6% of compensation for all jobs in Canada. The highest share was observed in 1999 when tourism accounted for 6.2% of the total.

Jobs

The number of jobs for the total economy grew at a faster pace when comparing to jobs in the tourism industries for the 2004 to 2010 period, except for 2009. On average, employment for the total economy outpaced that of tourism industries by approximately 0.9 percentage points per year (1.0% versus 0.1%). However, in 2009, the number of jobs in tourism industries fell by -0.8%, while jobs overall were down 1.7%.

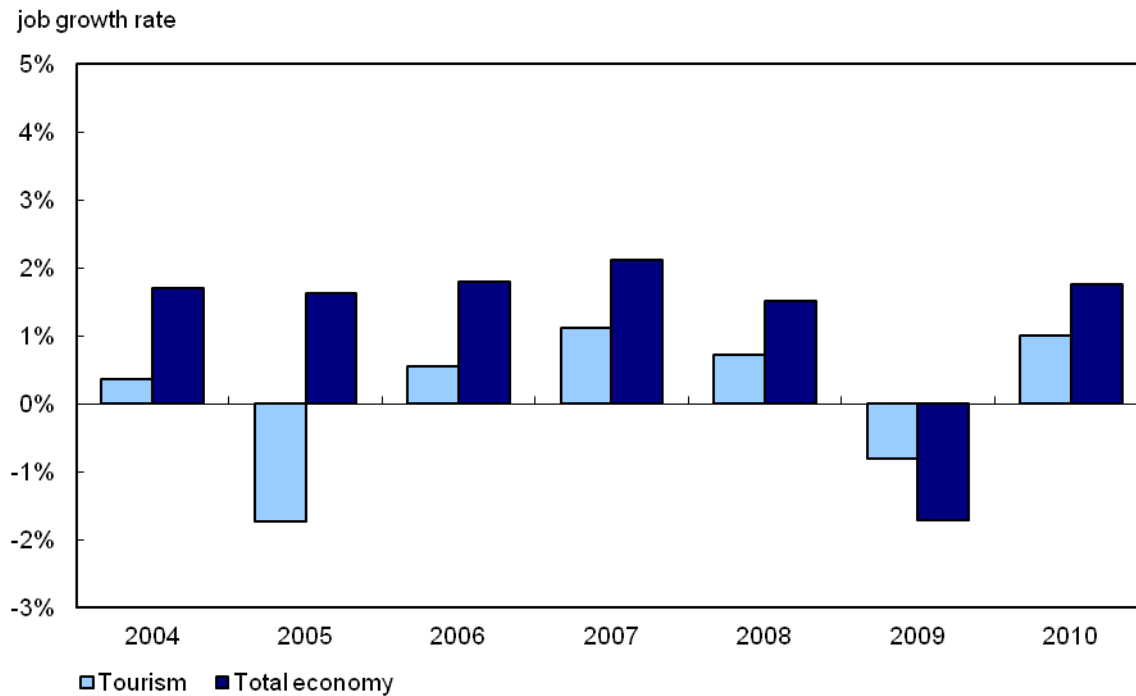
Tourism industries in Canada generated a total of 1.6 million jobs in 2010. Jobs include both full-time and part-time jobs, as well as employee jobs and jobs from self-employment. The tourism sector accounted for 9.2% of all jobs in Canada in 2010.

Tourism jobs grew 1.0% compared to the total economy (+1.8%) in 2010. These positive results followed a decline of 0.8% in the number of tourism jobs in 2009.

Out of the sixteen thousand jobs created in 2010, more part-time jobs (+15,000) were generated than full-time jobs (+1,000).

6. Compensation is defined as wages and salaries, supplementary labour income and the labour portion of income after expenses accruing to the self-employed.

Chart 1
Annual rate of job growth in tourism and the total economy, Canada, 2004 to 2010



It should be noted that the measure of jobs in the HRM includes all jobs in tourism industries. This exceeds the measure in the CTSA and the NTI of jobs attributed to visitor's consumption (spending or demand), because only a portion of the 1.6 million jobs can be attributed to visitors. Jobs generated by tourism spending in tourism industries totalled 497,000 in 2010.⁷

In 2010, jobs in tourism generated by visitor's consumption (tourism demand) declined slightly by 0.1%. However, jobs in tourism industries generated from both visitor and local resident's consumption were not affected as much (+1.0%) because of sustained local consumption.

The tourism industries provided 649,000 part-time jobs (40.4% of all jobs in the sector) in 2010. Part-time jobs made up 23.1% of all jobs in Canada. The share of part-time employment in the tourism sector and economy-wide has risen in the last three years.

Self-employment was less common in tourism, accounting for 7.1% of jobs in 2010, compared to 9.3% economy-wide. Nevertheless, the number of self-employed in tourism grew by 1.7% when compared to the previous year.

Hours worked per job

The average work week in the tourism sector is shorter than in the rest of the economy, about 10% shorter from 1997 to 2010. Jobs in tourism averaged 28.8 hours per week in 2010, down 1.1% from the previous year, compared to 32.7 hours for all jobs (see Table 4).

7. See Statistics Canada 2011b.

The shorter week in tourism reflects the higher proportion of part-time jobs found in tourism industries than economy-wide and the lower proportion of self-employed in tourism. Jobs from self-employment in tourism involved longer working hours (34.5 hours per week), compared to jobs from self-employment economy-wide (32.3 hours per week).

Compensation per job

Hourly compensation in tourism averaged \$20.26 per hour in 2010, up 4.8% from the previous year (see Table 2), but still much lower than the hourly compensation economy-wide of \$30.02.⁸ In 2010, hourly compensation for full-time workers was \$21.53, while part-time workers received \$15.73. However, for the past five years, hourly compensation for part-time workers increased at a faster pace than that of full-time workers.

5.2 Tourism industry profiles

The HRM contains aggregated data for five tourism industry groups: transportation (with details for air transportation and other transportation reported separately), accommodation, food and beverage services, recreation and entertainment and travel services. Appendix E lists the industries included in each industry group of the tourism sector. The following provides selected results intended to give an indication of the kinds of industry analyses possible with the HRM.

Food and beverage services

Among the tourism industry groups, the food and beverage services industry group was the largest employer in 2010. This industry group accounted for 53.1% of all jobs in tourism industries in Canada with 851,600 jobs (see Table 3). In 2010, the number of jobs increased 1.1% driven by an increase in the number of part-time jobs. Almost 19,000 part-time jobs were created, while more than 9,600 full-time jobs vanished.

Food and beverage services held the highest share of part-time jobs (49.4%) among tourism industries in Canada. Not surprisingly, the work week in this industry, at 26.7 hours, was the shortest among all tourism industries and was below the average work week of 32.7 hours economy-wide (see Table 4).

In 2010, the self-employed held 26,309 jobs in food and beverage services, accounting for 23.1% of all self-employed jobs in the tourism sector. They worked the longest hours, 41.9 hours per week, well above the self-employed average of 34.5 hours per week in the tourism sector.

Jobs in food and beverage services continued to pay the least of all tourism industries, with an average hourly compensation of \$15.89⁹ in 2010 (see Table 2). Even though this was up (+5.7%) from the previous year, it remained well below the average of \$20.26 for tourism industries in Canada.¹⁰

It should be noted that the average hourly wage for all employee jobs in food and beverage services was \$14.61 in 2010 (see Table 5). This is \$1.28 less than the average hourly compensation (\$15.89), which includes supplementary labour income (employer contributions on behalf of employees to employment insurance, private and public pension plans, worker's compensation, health and life insurance plans and retirement allowances).

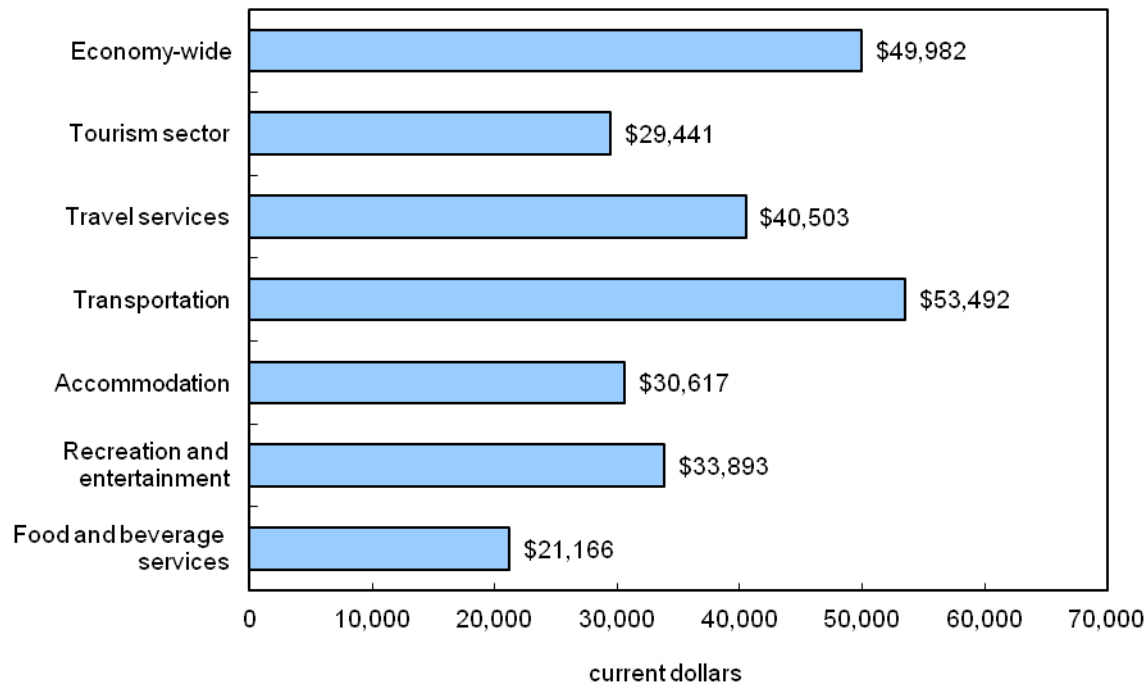
Annual compensation combines information about hourly compensation and hours worked. In food and beverage services industries, jobs paid \$21,166 on average in 2010 (see Chart 2). This was well below the tourism sector average of \$29,441. Jobs in food and beverage services involved the fewest working hours per week and were paid the least on an hourly basis in the tourism sector.

8. It should be noted that assumptions used to estimate labour compensation in tourism are not exactly the same as the ones used for the total economy, as explained in Appendix D.

9. This statistic is based on compensation in employee jobs and jobs from self-employment.

10. Gratuities are included in these figures. See Appendix C to understand how gratuities are calculated.

Chart 2
Annual compensation in tourism industries in Canada, 2010



Recreation and entertainment

The recreation and entertainment industry group was the second largest employer among the tourism industries, providing 267,000 jobs or 16.6% of employment in the sector. This industry group registered a very small decrease in jobs in 2010. However, the industry has gained in terms of its share of sector employment over the years. In 1997, it accounted for 15.5% of all jobs in the sector.

The large proportion (40.5%) of part-time jobs in recreation and entertainment contributed to a short work week. Moreover, jobs in this industry recorded the largest decline (-3.3%) in the work week when compared to the previous year. Averaging 28.3 hours, it was among the shortest in tourism industries.

Recreation and entertainment held the largest proportion (43.3%) of self-employed, with 49,400 jobs. However, they worked shorter hours (26.8 hours per week) than the self-employed in the tourism sector overall (34.5 hours per week).

Hourly compensation in this industry (\$24.22) was above the tourism sector average (\$20.26), but remained below hourly compensation economy-wide (\$30.02). Annual compensation reached \$33,893 in 2010, above the tourism sector average, even though the work week was among the shortest in the sector.

Accommodation

The accommodation industry generated 234,000 jobs in 2010, or 14.6% of jobs in the tourism sector, making it the third largest employer among tourism industries in Canada. The accommodation industry group registered its fourth consecutive annual increase in employment, in 2010.

All of the increase was in full-time positions, as the industry gained seven thousand full-time jobs, but lost about one thousand part-time jobs. Hours worked per week in accommodation fell to 31.1 hours in 2010, from 31.5 hours in 2009, but remained above the tourism sector average of 28.8 hours per week.

The proportion of part-time jobs (27.0%) in this industry group, while higher than economy-wide (23.1%), remained below the sector average of 40.4%. The proportion of self-employed (4.2%) was among the lowest in the tourism sector, with 9,900 self-employed in 2010.

Hourly compensation in accommodation, which includes gratuities, was up 5.3% in 2010 to reach \$19.55, but was still below the tourism sector average of \$20.26. Annual compensation in this industry group, at \$30,617, was higher than the sector average, mainly because of a longer work week (31.1 hours) compared to the sector (28.8 hours).

Transportation

The transportation industry group consists of air transportation and other transportation, including rail, water and bus transportation, as well as taxis and car rentals. This industry group generated 210,700 jobs, or 13.1% of all jobs in tourism in Canada. Jobs in transportation industries were up 0.6% in 2010. The gain was centered mainly in air transportation (+1,035 jobs) while other transportation saw its workforce reduced slightly. More part-time jobs were created than full-time jobs in 2010.

Jobs in transportation came with a long work week, on average 34.1 hours, five hours more than the average for tourism jobs in Canada. One reason for the longer hours is the higher proportion of full-time jobs (76.8%), particularly in other transportation industries. Another reason is the relatively high proportion (11.8%) of self-employed in transportation industries, who work longer hours (43.0 hours per week). For the tourism sector as a whole, the self-employed make up only 7.1% of jobs. Transportation supported 24,900 thousand jobs from self-employment, of which, almost all of them were in the other transportation industries.

In addition to the second longest work week, jobs in transportation were paid more than in other tourism industries, with an hourly compensation of \$30.06, \$9.80 per hour more than the average across all tourism jobs in Canada (\$20.26). Hourly compensation was particularly high in air transportation, at \$37.07 per hour.

Transportation is the only industry group in the tourism sector with an annual compensation (\$53,492) above the Canada-wide average of \$49,982. The long work week and the high hourly compensation in both air and other transportation contributed.

Travel services

The travel services industry group is the smallest among all tourism industries. Travel services generated 43,100 jobs in 2010, down 0.7% from the previous year. This industry group accounted for only 2.7% of all jobs in tourism in Canada.

Jobs in this industry group were mostly full-time (81.5%), the highest proportion among all tourism industries. Not surprisingly, this industry group had the longest work week, 35.0 hours. Three thousand five hundred workers were self-employed, 8.2% of all jobs in travel services, slightly above the 7.1% share of self-employed for the tourism sector overall.

Annual compensation was among the highest in the tourism sector, at \$40,503, owing to the high proportion of full-time jobs and above average hourly compensation.

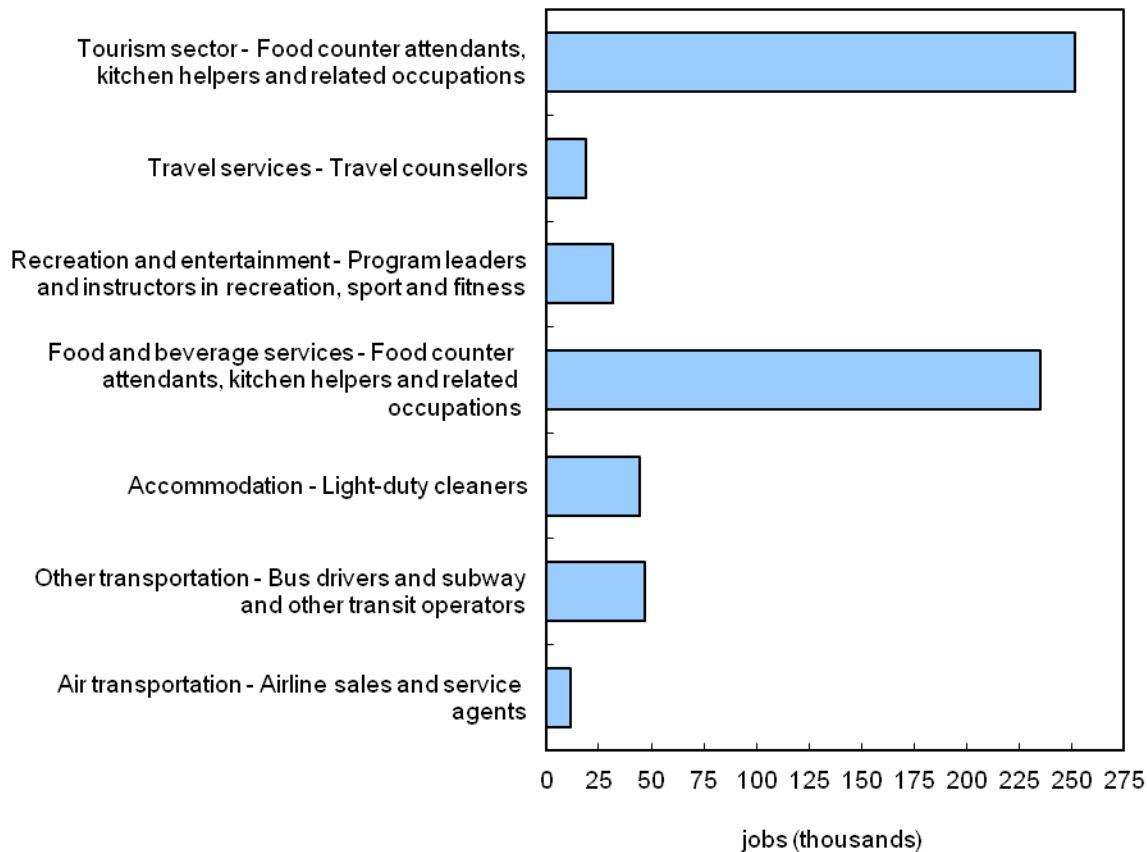
5.3 Occupations in tourism industries

Five occupation groups dominated the food and beverage services industry in terms of employee jobs: food-counter attendants, kitchen helpers and related occupations with 235,000 jobs; food and beverage servers with 174,000 jobs; cooks with 126,000 jobs; restaurant and food service managers with 71,000 jobs; and cashiers with 53,000 jobs. Furthermore, these were the top five occupations in the tourism sector.

The most prevalent occupation in the accommodation industries group was light duty cleaner, with 44,000 employee jobs (see Chart 3). Bus drivers and subway and other transit operators was the main occupation group in other transportation industries, with 47,000 jobs, while program leaders and instructors in recreation, sport and fitness were the most common occupation in recreation and entertainment, with 32,000 jobs. Travel counsellors accounted for only 19,000 jobs, but represented the primary occupation in travel services (see Chart 3). The main occupation in air transportation was airline sales and service agents.

When comparing wages for the same jobs, bus drivers and subway and other transit operators (\$23.72), airline sales and service agents (\$22.80), program leaders and instructors in recreation, sport and fitness (\$18.91), earned more than the tourism sector average of \$18.31. On the other hand, travel counsellors (\$18.23), light duty cleaners (\$14.21) and food counter attendants, kitchen helpers and related occupations (\$12.62) earned less than the tourism sector average.

Chart 3
Main occupation in each tourism industry group in Canada, 2010



5.4 Profile of employees in tourism industries

The HRM provides details concerning three characteristics of employees: gender, age group, and immigrant status. The following highlights some of the HRM results according to these demographics (see Table 5).

Gender

Women working in the tourism sector accounted for 55.2% of employee jobs in 2010. This share has declined slightly since 2006.

Women held 823 thousand employee jobs in the tourism sector in 2010, 154 thousand more than men. A higher proportion of women working in tourism industries were less than 25 years of age (41.2%) compared to men (35.4%).

Women were under-represented in only one industry group, transportation. Only 30.1% of the employee jobs in this industry were held by women. On the other hand, women held the majority of jobs in travel services (75.0%).

In all tourism industries, women had shorter work weeks than their male counterparts. This was especially the case for air transportation (27.3 hours per week for women compared to 36.2 hours for men) and other transportation industries. Women (45.6%) were also more likely than men (34.7%) to work in part-time jobs.

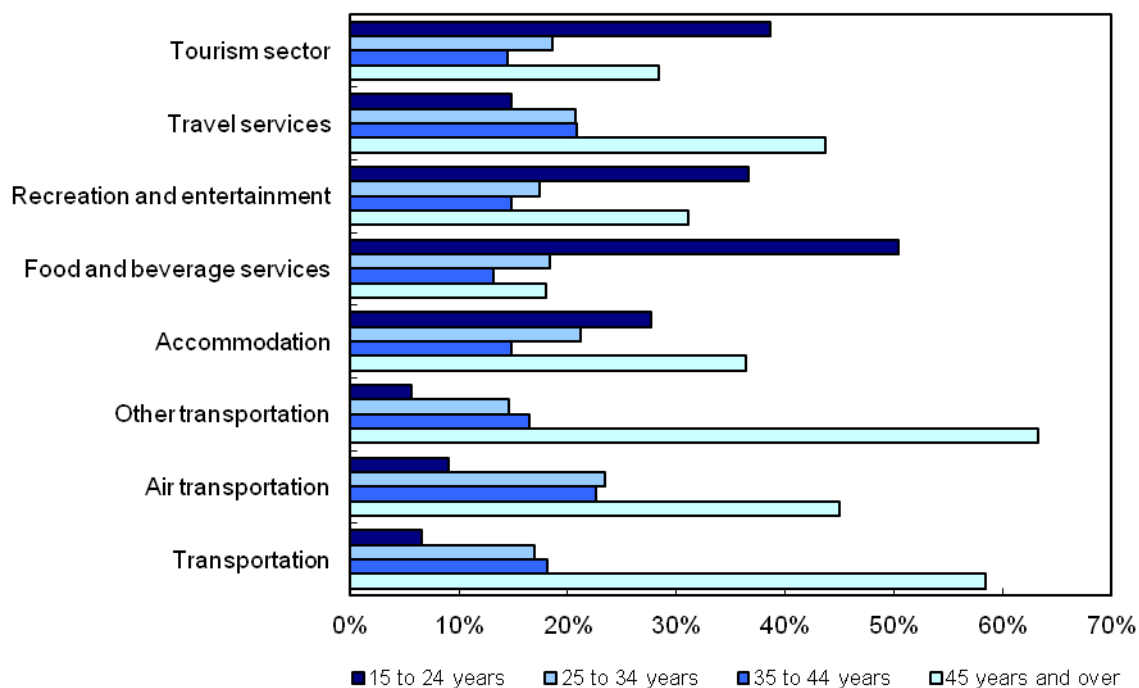
Women working in tourism industries in Canada earned on average \$4.62 less than men (\$16.03 per hour versus \$20.65). There was a noteworthy variation in women's wages, with jobs in air transportation paying the most, \$26.39, and jobs in food and beverage services paying the least (\$13.76). Even though women in air transportation jobs were well paid, they were still paid \$7.45 less than men on average.

The majority of women employed in the tourism sector worked in food and beverage services industries (60.3%), where wages paid to women were the lowest, \$13.76 per hour, and the number of hours worked were the lowest, 24.4 hours per week. Only 49.2% of men employed in the sector were in this industry.

The most common occupation for women was food and counter attendants and kitchen helpers and related occupations, while the most common for men was bus drivers and subway and other transit operators, where hourly wages were higher and hours worked per week longer.

In 2010, women earned an annual salary of \$21,619 in the tourism sector compared to \$33,628 for men.

Chart 4
Job share by age group in tourism industries in Canada, 2010



Youth and older workers

Youth aged 15 to 24 years were a major source of labour for the tourism industries in Canada in 2010. They held 576,000 employee jobs, accounting for four out of ten employee jobs in tourism. Three out of four young workers were employed in the food and beverage services industries. The most common occupation among youth was food counter attendants, kitchen helpers and related occupations.

Older workers, aged 45 years or older, were also an important source of labour for tourism, holding 424,000 employee jobs (28.4%). In 2010, older workers were employed more evenly across all tourism industries compared to young adults. Two tourism industry groups employed a notably older workforce: older workers accounted for 63.3% of all employees in other transportation industries and 45.0% of all employees in air transportation (see Chart 4).

Almost seven out of ten young workers were working in part-time jobs in tourism compared to about one out of four older workers. The vast majority of young adults that worked part-time were employed in the food and beverage services industry. Young adults worked fewer hours per week (17.2 hours) compared to older workers (35.4 hours). This was especially the case in the recreation and entertainment industries (15.0 hours for young adults versus 34.7 hours for older workers). According to the Labour Force Survey, in 2010 about 90% of young workers gave attending school as main reason to be working part-time.

Wages of young workers were also considerably lower. The hourly wage among workers in tourism industries aged 15-24 was \$12.25 in 2010, almost half that of employees aged 45 and over (\$22.40). The wage differential between young and old workers was the most pronounced in the air transportation industry group, \$15.89 versus \$38.35, respectively.

Immigrants

Immigrants are an important source of labour for the tourism sector in Canada. In 2010, immigrants held 339 thousand jobs, accounting for 22.7% of employee jobs in tourism. Almost 59.0% of all immigrants employed in the sector worked in the food and beverage services industry compared to 54.2% of non-immigrants. On the other hand, only 8.8% of all immigrants employed in the sector worked in recreation and entertainment compared to 16.3% of non-immigrants. The concentrations were similar between immigrants and non-immigrants in other tourism industry groups.

Immigrants in tourism industries were older than other tourism workers. About four out of ten immigrants were 45 years or older, while one out of four non-immigrants was an older worker.

Compared to non-immigrants (56.6%), immigrants (68.4%) were more likely to work full-time. In 2010, immigrants worked longer hours than their non-immigrant counterparts, 33.0 hours per week versus 27.0 hours.

Among the main occupations across all tourism industries, immigrants made up 35.9% of light duty cleaners, 33.4% of airline sales and service agents, 32.7% of travel counsellors, 23.4% of food counter attendants and kitchen helpers, 21.3% of bus drivers and subway and other transit operators and, 9.9% of program leaders and instructors in recreation, sport and fitness.

Immigrants earned lower wages per hour (\$17.34 per hour) than non-immigrants (\$18.67 per hour). In transportation industries, wages were notably lower (\$23.43 for immigrants versus \$29.34 for non-immigrants). However, when looking at the annual salary, immigrants were paid more in all tourism industries (with the exception of transportation and travel services) with an average salary of \$29,708 versus \$26,247 for non-immigrants. Even though immigrants earned lower wages per hour on average, they compensated by working longer hours.

Data tables

Table 1 Gross domestic product, tourism gross domestic product, tourism expenditures and jobs in tourism industries and total economy, Canada

| | 2004 | 2005 | 2006 | 2007 | 2008 | 2009 | 2010 |
|--|-----------|-----------|-----------|-----------|-----------|-----------|-----------|
| Total economy¹ | | | | | | | |
| Gross domestic product at basic prices (millions of 2002 \$) | 1,124,999 | 1,158,680 | 1,191,403 | 1,218,979 | 1,226,809 | 1,194,541 | 1,233,611 |
| percent change | 3.1 | 3.0 | 2.8 | 2.3 | 0.6 | -2.6 | 3.3 |
| Jobs (thousands) | 16,189 | 16,454 | 16,750 | 17,105 | 17,365 | 17,068 | 17,369 |
| percent change | 1.7 | 1.6 | 1.8 | 2.1 | 1.5 | -1.7 | 1.8 |
| Tourism supply² | | | | | | | |
| Supply of tourism commodities (millions of 2002 \$) ³ | 91,419 | 93,546 | 95,448 | 97,848 | 99,542 | 97,094 | 99,483 |
| percent change | 4.4 | 2.3 | 2.0 | 2.5 | 1.7 | -2.5 | 2.5 |
| Jobs in tourism industries (thousands) | 1,593 | 1,565 | 1,574 | 1,591 | 1,603 | 1,590 | 1,606 |
| percent change | 0.4 | -1.7 | 0.6 | 1.1 | 0.7 | -0.8 | 1.0 |
| Tourism demand⁴ | | | | | | | |
| Tourism gross domestic product at basic prices (millions of 2002 \$) | 17,791 | 18,280 | 18,724 | 19,201 | 19,439 | 18,812 | 19,678 |
| percent change | 4.5 | 2.7 | 2.4 | 2.5 | 1.2 | -3.2 | 4.6 |
| Tourism demand (millions of 2002 \$) | 41,383 | 43,033 | 44,511 | 46,099 | 46,945 | 45,497 | 47,323 |
| percent change | 5.2 | 4.0 | 3.4 | 3.6 | 1.8 | -3.1 | 4.0 |
| Tourism domestic demand (millions of 2002 \$) | 28,227 | 30,587 | 32,560 | 34,335 | 35,752 | 35,662 | 37,199 |
| percent change | 3.2 | 8.4 | 6.5 | 5.5 | 4.1 | -0.3 | 4.3 |
| Tourism demand by non-residents (exports) (millions of 2002 \$) | 13,156 | 12,446 | 11,951 | 11,764 | 11,193 | 9,835 | 10,124 |
| percent change | 9.6 | -5.4 | -4.0 | -1.6 | -4.9 | -12.1 | 2.9 |
| Jobs generated by tourism demand (thousands) | 490 | 486 | 488 | 492 | 499 | 498 | 497 |
| percent change | 1.5 | -0.9 | 0.5 | 0.9 | 1.3 | -0.3 | -0.1 |

1. Source: Statistics Canada, CANSIM, Tables 379-0027 and 383-0009.

2. Includes supply to local residents. Excludes tourism commodities produced in non-tourism industries.

3. Excludes non-tourism commodities produced in tourism industries.

4. Excludes demand by local residents. Excludes non-tourism industries.

Table 2 Annual compensation and hourly compensation in tourism industries and total economy, Canada

| | 2004 | 2005 | 2006 | 2007 | 2008 | 2009 | 2010 | percent change 2009 to 2010 |
|--|-----------------------------|---------|---------|---------|---------|---------|---------|--------------------------------|
| | millions of current dollars | | | | | | | % |
| Annual compensation in Canada for all jobs | | | | | | | | |
| Total tourism industries | 39,858 | 39,905 | 42,484 | 44,843 | 46,915 | 46,609 | 48,776 | ... |
| percent change | 4.2 | 0.1 | 6.5 | 5.6 | 4.6 | -0.7 | 4.6 | 4.6 |
| Total economy ¹ | 687,584 | 726,346 | 774,925 | 818,415 | 852,358 | 853,093 | 886,640 | ... |
| percent change | 5.7 | 5.6 | 6.7 | 5.6 | 4.1 | 0.1 | 3.9 | 3.9 |
| Ratio tourism sector to total economy | 0.058 | 0.055 | 0.055 | 0.055 | 0.055 | 0.056 | 0.056 | ... |
| | current dollars | | | | | | | % |
| Hourly compensation in Canada per job^{2,3} | | | | | | | | |
| Transportation | 27.82 | 28.14 | 28.57 | 29.32 | 29.45 | 30.26 | 30.06 | -0.7 |
| Air transportation | 31.84 | 32.75 | 33.81 | 35.44 | 37.09 | 39.82 | 37.07 | -6.9 |
| Other transportation | 26.12 | 26.68 | 26.98 | 27.55 | 27.44 | 27.61 | 28.01 | 1.5 |
| Accommodation | 14.56 | 15.30 | 17.32 | 18.09 | 18.41 | 18.58 | 19.55 | 5.3 |
| Food and beverage services | 11.45 | 12.19 | 12.52 | 13.27 | 14.21 | 15.04 | 15.89 | 5.7 |
| Recreation and entertainment | 18.35 | 19.26 | 20.73 | 21.22 | 22.18 | 21.96 | 24.22 | 10.3 |
| Travel services | 19.64 | 20.37 | 21.30 | 22.42 | 23.66 | 22.58 | 23.04 | 2.1 |
| Employee | 15.89 | 16.57 | 17.43 | 18.24 | 19.03 | 19.59 | 20.49 | 4.6 |
| of which: wages | 14.05 | 14.69 | 15.45 | 16.28 | 16.98 | 17.53 | 18.31 | 4.5 |
| Self-employed ³ | 15.00 | 14.72 | 15.84 | 16.57 | 16.90 | 16.68 | 17.75 | 6.4 |
| Ratio self-employed to employee | 0.943 | 0.888 | 0.909 | 0.908 | 0.888 | 0.852 | 0.866 | ... |
| Full-time | 16.98 | 17.67 | 18.43 | 19.19 | 20.09 | 20.45 | 21.53 | 5.3 |
| Part-time | 11.29 | 11.73 | 13.02 | 13.88 | 14.17 | 15.22 | 15.73 | 3.4 |
| Ratio part-time to full-time | 0.665 | 0.664 | 0.706 | 0.723 | 0.706 | 0.744 | 0.731 | ... |
| Total tourism industries ^{2,3} | 15.81 | 16.41 | 17.30 | 18.09 | 18.84 | 19.34 | 20.26 | ... |
| percent change | 2.9 | 3.8 | 5.4 | 4.6 | 4.2 | 2.6 | 4.8 | 4.8 |
| Total economy ¹ | 24.24 | 25.39 | 26.62 | 27.57 | 28.42 | 29.43 | 30.02 | ... |
| percent change | 2.9 | 4.8 | 4.8 | 3.6 | 3.1 | 3.5 | 2.0 | 2.0 |
| Ratio tourism sector to total economy | 0.652 | 0.646 | 0.650 | 0.656 | 0.663 | 0.657 | 0.675 | ... |
| Employee | 25.69 | 26.90 | 28.19 | 29.25 | 30.08 | 31.21 | 31.75 | 1.7 |
| of which: wages | 22.38 | 23.44 | 24.49 | 25.61 | 26.38 | 27.35 | 27.82 | 1.7 |
| Self-employed | 10.87 | 11.33 | 11.51 | 11.77 | 12.17 | 12.39 | 12.87 | 3.9 |
| Ratio self-employed to employee | 0.423 | 0.421 | 0.408 | 0.402 | 0.405 | 0.397 | 0.405 | ... |
| Full-time | 25.12 | 26.34 | 27.61 | 28.56 | 29.47 | 30.55 | 31.12 | 1.9 |
| Part-time | 16.78 | 17.44 | 18.17 | 19.10 | 19.55 | 20.40 | 21.12 | 3.5 |
| Ratio part-time to full-time | 0.668 | 0.662 | 0.658 | 0.669 | 0.663 | 0.668 | 0.679 | ... |

1. Source: CANSIM: Table 383-0009.

2. Hourly compensation includes wages and salaries, supplementary labour income and the labour portion of mixed income after expenses accruing to the self-employed.

3. Excludes supplementary labour income from the labour portion of mixed income for the self-employed.

Table 3 Jobs in tourism industries and total economy, Canada

| | 2004 | 2005 | 2006 | 2007 | 2008 | 2009 | 2010 | percent change 2009 to 2010 |
|--------------------------------------|-------------------|--------|--------|--------|--------|--------|--------|--------------------------------|
| | thousands of jobs | | | | | | | % |
| Number of jobs in Canada | | | | | | | | |
| Transportation | 197 | 191 | 203 | 214 | 214 | 209 | 211 | 0.6 |
| Air transportation | 59 | 47 | 49 | 50 | 49 | 48 | 50 | 2.7 |
| Other transportation | 138 | 144 | 154 | 164 | 165 | 161 | 161 | -0.1 |
| Accommodation | 226 | 225 | 221 | 225 | 228 | 228 | 234 | 2.6 |
| Food and beverage services | 834 | 832 | 838 | 833 | 848 | 842 | 852 | 1.1 |
| Recreation and entertainment | 292 | 272 | 268 | 275 | 269 | 267 | 267 | 0.0 |
| Travel services | 44 | 44 | 44 | 45 | 45 | 43 | 43 | -0.7 |
| Employee | 1,478 | 1,457 | 1,467 | 1,476 | 1,487 | 1,478 | 1,492 | 0.9 |
| Self-employed | 115 | 108 | 107 | 115 | 116 | 112 | 114 | 1.7 |
| Ratio self-employed to total tourism | 0.072 | 0.069 | 0.068 | 0.072 | 0.072 | 0.071 | 0.071 | ... |
| Full-time | 980 | 952 | 960 | 977 | 970 | 956 | 957 | 0.1 |
| Part-time | 613 | 613 | 614 | 614 | 633 | 634 | 649 | 2.3 |
| Ratio part-time to total tourism | 0.385 | 0.392 | 0.390 | 0.386 | 0.395 | 0.399 | 0.404 | ... |
| Total tourism industries | 1,593 | 1,565 | 1,574 | 1,591 | 1,603 | 1,590 | 1,606 | 1.0 |
| percent change | 0.4 | -1.7 | 0.6 | 1.1 | 0.7 | -0.8 | 1.0 | ... |
| Total economy ¹ | 16,189 | 16,454 | 16,750 | 17,105 | 17,365 | 17,068 | 17,369 | 1.8 |
| percent change | 1.7 | 1.6 | 1.8 | 2.1 | 1.5 | -1.7 | 1.8 | ... |
| Ratio tourism to total economy | 0.098 | 0.095 | 0.094 | 0.093 | 0.092 | 0.093 | 0.092 | ... |
| Employee | 14,665 | 14,900 | 15,206 | 15,497 | 15,775 | 15,455 | 15,753 | 1.9 |
| Self-employed | 1,524 | 1,555 | 1,544 | 1,607 | 1,591 | 1,613 | 1,616 | 0.2 |
| Ratio self-employed to total economy | 0.094 | 0.094 | 0.092 | 0.094 | 0.092 | 0.094 | 0.093 | ... |
| Full-time | 12,616 | 12,821 | 13,119 | 13,388 | 13,547 | 13,188 | 13,358 | 1.3 |
| Part-time | 3,573 | 3,634 | 3,631 | 3,717 | 3,819 | 3,880 | 4,011 | 3.4 |
| Ratio part-time to total economy | 0.221 | 0.221 | 0.217 | 0.217 | 0.220 | 0.227 | 0.231 | ... |

1. Source: CANSIM: Table 383-0009.

Table 4 Weekly hours worked in tourism industries and total economy, Canada

| | 2004 | 2005 | 2006 | 2007 | 2008 | 2009 | 2010 | percent change 2009 to 2010 |
|--|-------|-------|-------|-------|-------|-------|-------|--------------------------------|
| | hours | | | | | | | % |
| Weekly hours worked in Canada per job | | | | | | | | |
| Transportation | 35.6 | 34.5 | 34.8 | 33.8 | 34.9 | 34.0 | 34.1 | 0.4 |
| Air transportation | 35.2 | 33.3 | 33.3 | 32.2 | 31.7 | 32.0 | 32.8 | 2.5 |
| Other transportation | 35.8 | 34.9 | 35.3 | 34.3 | 35.9 | 34.6 | 34.6 | -0.1 |
| Accommodation | 33.8 | 33.5 | 32.5 | 32.9 | 32.6 | 31.5 | 31.1 | -1.4 |
| Food and beverage services | 28.2 | 27.8 | 28.2 | 28.2 | 27.8 | 27.0 | 26.7 | -0.9 |
| Recreation and entertainment | 29.9 | 29.3 | 29.3 | 29.3 | 29.4 | 29.3 | 28.3 | -3.3 |
| Travel services | 35.1 | 34.4 | 34.7 | 34.2 | 33.2 | 34.5 | 35.0 | 1.4 |
| Employee | 29.9 | 29.4 | 29.5 | 29.5 | 29.3 | 28.7 | 28.4 | -1.0 |
| Self-employed | 37.9 | 36.3 | 36.8 | 36.4 | 36.6 | 35.4 | 34.5 | -2.5 |
| Ratio self-employed to employee | 1.270 | 1.234 | 1.245 | 1.236 | 1.248 | 1.235 | 1.217 | |
| Full-time | 39.3 | 38.7 | 38.9 | 38.7 | 39.0 | 38.2 | 37.8 | -1.0 |
| Part-time | 16.2 | 16.2 | 16.1 | 16.0 | 15.9 | 15.5 | 15.6 | 0.5 |
| Ratio part-time to full-time | 0.411 | 0.418 | 0.415 | 0.413 | 0.408 | 0.407 | 0.413 | |
| Total tourism industries | 30.4 | 29.9 | 30.0 | 30.0 | 29.9 | 29.1 | 28.8 | -1.1 |
| percent change | 0.9 | -1.8 | 0.5 | -0.2 | -0.3 | -2.4 | -1.1 | |
| Total economy ¹ | 33.7 | 33.4 | 33.4 | 33.4 | 33.2 | 32.7 | 32.7 | 0.1 |
| percent change | 1.1 | -0.8 | 0.0 | -0.1 | -0.5 | -1.6 | 0.1 | |
| Ratio tourism to total economy | 0.903 | 0.894 | 0.898 | 0.898 | 0.899 | 0.892 | 0.881 | |
| Employee | 33.5 | 33.4 | 33.4 | 33.3 | 33.2 | 32.7 | 32.7 | 0.3 |
| Self-employed | 35.2 | 34.1 | 34.1 | 34.1 | 33.5 | 32.8 | 32.3 | -1.3 |
| Ratio self-employed to employee | 1.050 | 1.023 | 1.023 | 1.024 | 1.011 | 1.003 | 0.987 | |
| Full-time | 38.7 | 38.3 | 38.2 | 38.2 | 38.1 | 37.6 | 37.8 | 0.5 |
| Part-time | 16.2 | 16.1 | 16.1 | 16.0 | 16.0 | 15.9 | 15.7 | -0.9 |
| Ratio part-time to full-time | 0.419 | 0.421 | 0.422 | 0.420 | 0.420 | 0.422 | 0.415 | |

1. Source: CANSIM: Table 383-0009.

Table 5 Employee jobs, hours and wages by employee characteristics in tourism industries, Canada, 2010

| | Total | Gender | | Age group | | | | Immigrant status | |
|------------------------------------|--------|--------|--------|-----------|----------|----------|-------------|------------------|---------------|
| | | Female | Male | 15 to 24 | 25 to 34 | 35 to 44 | 45 and over | Immigrant | Non-immigrant |
| thousands | | | | | | | | | |
| Number of employee jobs | | | | | | | | | |
| Transportation | 186 | 56 | 130 | 12 | 31 | 34 | 109 | 43 | 143 |
| Air transportation | 49 | 19 | 30 | 4 | 12 | 11 | 22 | 12 | 37 |
| Other transportation | 137 | 36 | 101 | 8 | 20 | 23 | 86 | 31 | 106 |
| Accommodation | 224 | 134 | 90 | 62 | 47 | 33 | 81 | 54 | 170 |
| Food and beverage services | 825 | 496 | 329 | 416 | 152 | 108 | 149 | 200 | 625 |
| Recreation and entertainment | 218 | 107 | 110 | 80 | 38 | 32 | 68 | 30 | 188 |
| Travel services | 40 | 30 | 9 | 6 | 8 | 8 | 17 | 12 | 28 |
| Full-time | 885 | 448 | 437 | 175 | 211 | 175 | 323 | 232 | 653 |
| Part-time | 607 | 375 | 232 | 400 | 66 | 40 | 100 | 107 | 500 |
| Total tourism industries | 1,492 | 823 | 669 | 576 | 277 | 216 | 424 | 339 | 1,153 |
| hours | | | | | | | | | |
| Weekly hours worked per job | | | | | | | | | |
| Transportation | 33.0 | 27.5 | 35.2 | 23.8 | 31.3 | 35.9 | 33.4 | 33.4 | 32.7 |
| Air transportation | 32.7 | 27.3 | 36.2 | 25.5 | 30.9 | 36.3 | 33.2 | 30.3 | 33.5 |
| Other transportation | 33.1 | 27.5 | 34.9 | 22.9 | 31.5 | 35.7 | 33.5 | 34.6 | 32.5 |
| Accommodation | 31.2 | 29.2 | 34.1 | 18.0 | 34.3 | 39.1 | 36.1 | 37.2 | 29.3 |
| Food and beverage services | 26.3 | 24.4 | 29.1 | 17.3 | 33.5 | 36.3 | 36.7 | 31.7 | 24.5 |
| Recreation and entertainment | 28.6 | 26.4 | 30.8 | 15.0 | 36.2 | 40.6 | 34.7 | 31.4 | 28.2 |
| Travel services | 34.4 | 34.1 | 35.4 | 21.2 | 36.4 | 37.7 | 36.3 | 37.0 | 33.3 |
| Full-time | 37.2 | 34.7 | 39.8 | 25.6 | 38.1 | 41.4 | 40.7 | 40.5 | 36.0 |
| Part-time | 15.5 | 15.7 | 15.3 | 13.6 | 20.4 | 19.9 | 18.4 | 16.5 | 15.3 |
| Total tourism industries | 28.4 | 26.0 | 31.3 | 17.2 | 33.9 | 37.4 | 35.4 | 33.0 | 27.0 |
| current dollars | | | | | | | | | |
| Hourly wages per job | | | | | | | | | |
| Transportation | 27.89 | 24.36 | 29.14 | 16.99 | 23.47 | 26.92 | 30.37 | 23.43 | 29.34 |
| Air transportation | 31.37 | 26.39 | 33.84 | 15.89 | 22.47 | 30.87 | 38.35 | 27.71 | 32.47 |
| Other transportation | 26.66 | 23.27 | 27.70 | 17.70 | 24.03 | 24.93 | 28.35 | 21.96 | 28.21 |
| Accommodation | 17.71 | 15.86 | 20.07 | 12.51 | 16.30 | 18.54 | 20.08 | 20.45 | 16.60 |
| Food and beverage services | 14.61 | 13.76 | 15.67 | 11.75 | 15.11 | 16.07 | 16.85 | 14.25 | 14.76 |
| Recreation and entertainment | 21.74 | 19.98 | 23.20 | 13.73 | 20.68 | 23.71 | 25.32 | 20.90 | 21.89 |
| Travel services | 21.64 | 20.14 | 26.30 | 13.61 | 18.27 | 22.15 | 24.57 | 20.10 | 22.35 |
| Full-time | 19.51 | 16.89 | 21.87 | 12.99 | 17.48 | 19.84 | 22.81 | 17.64 | 20.27 |
| Part-time | 14.12 | 13.77 | 14.70 | 11.64 | 14.90 | 17.09 | 19.55 | 15.72 | 13.75 |
| Total tourism industries | 18.31 | 16.03 | 20.65 | 12.25 | 17.11 | 19.57 | 22.40 | 17.34 | 18.67 |
| current dollars | | | | | | | | | |
| Annual wages per job | | | | | | | | | |
| Transportation | 47,803 | 34,784 | 53,319 | 21,049 | 38,168 | 50,287 | 52,773 | 40,695 | 49,927 |
| Air transportation | 53,303 | 37,510 | 63,668 | 21,049 | 36,130 | 58,332 | 66,158 | 43,666 | 56,480 |
| Other transportation | 45,824 | 33,311 | 50,267 | 21,049 | 39,345 | 46,320 | 49,352 | 39,527 | 47,635 |
| Accommodation | 28,701 | 24,106 | 35,570 | 11,711 | 29,034 | 37,655 | 37,752 | 39,532 | 25,262 |
| Food and beverage services | 19,947 | 17,455 | 23,707 | 10,563 | 26,358 | 30,323 | 32,105 | 23,505 | 18,809 |
| Recreation and entertainment | 32,349 | 27,446 | 37,124 | 10,685 | 38,979 | 50,079 | 45,696 | 34,125 | 32,064 |
| Travel services | 38,679 | 35,657 | 48,432 | 15,004 | 34,629 | 43,415 | 46,364 | 38,627 | 38,701 |
| Full-time | 37,770 | 30,432 | 45,269 | 17,275 | 34,609 | 42,705 | 48,228 | 37,131 | 37,973 |
| Part-time | 11,396 | 11,209 | 11,714 | 8,206 | 15,780 | 17,708 | 18,738 | 13,528 | 10,949 |
| Total tourism industries | 27,035 | 21,678 | 33,628 | 10,969 | 30,132 | 38,017 | 41,243 | 29,708 | 26,247 |

Appendix A Accounting framework

The Human Resource Module (HRM) is based on and rooted in the accounting framework of the Canadian Tourism Satellite Account (CTSA), which follows the international guidelines in Recommended Methodological Framework: Tourism Satellite Account 2008 (TSA: RMF).¹¹ In turn, the TSA: RMF is based on the accounting framework and principles of the internationally recognized System of National Accounts 2008 (SNA).¹²

Because the HRM uses the same framework, concepts and denitions as the CTSA, results from both can be readily compared. By extension, the HRM results can be compared to those of the Canadian System of National Accounts (CSNA), in particular, to the number of jobs, hours worked and labour income in other industries in the economy. This enhances the analytical capacity of the HRM.¹³

-
11. Commission of the European Communities, Organisation for Economic Co-operation and Development, World Tourism Organization, United Nations Statistics Division, 2008.
 12. Commission of the European Communities, International Monetary Fund, Organisation for Economic Co-operation and Development, United Nations, World Bank, 2008.
 13. Some conceptual differences exist between the Canadian TSA and the international guidelines in the TSA-RMF. See Katharine Kemp and Shaila Nijhowne, 2004.

Appendix B Concepts and definitions

The Human Resource Module (HRM) carries information on the number of employee and self-employment jobs, full-time equivalent employment, total number of hours worked and labour income, gross wages and salaries and supplementary labour income. Some of these basic concepts and definitions are described next. They are discussed from a total industry perspective first, that is to say, regardless of the source of demand, tourism or non-tourism.

In the HRM, total employment in an industry is the number of all employee and self-employment jobs in that industry. It should be noted that a job that exists for only part of the year (e.g., 4 months) counts as only a fraction of a job (1/3 of a job) for the year. It should also be noted that a part-time job at 10 hours a week counts as much as a full-time job at 50 hours a week; each is one job. For this reason, jobs are not a good measure of labour inputs to production.

A better measure is full-time equivalent employment in which part-time jobs are converted to full-time jobs on the basis of hours worked. For example, two part-time jobs of twenty hours per week would be equivalent to one full-time job at forty hours per week. Total hours worked is an even better measure of aggregate volume of labour inputs to production, and the one used in the Canadian System National Accounts (CSNA) to calculate labour productivity. The concept here is that of actual hours worked, not usual hours, and of hours worked, not hours paid (see Appendix C.1).

The value of labour inputs to production in an industry is measured by the labour income and a labour component of mixed income for all jobs in that industry. Labour income consists of gross (i.e., before tax) wages and salaries, including tips,¹⁴ commissions, bonuses, as well as supplementary labour income which covers mandatory and non-mandatory employer contributions to pension plans and social insurance and health plans.¹⁵ Mixed income is the income after expenses of unincorporated business accruing to the self-employed.¹⁶

Work is currently underway to develop estimates on the number of jobs that can be directly attributed to, or generated by, tourism demand. These estimates will provide the link between the HRM and the Canadian Tourism Satellite Account (CTSA) and National Tourism Indicators (NTI). Tourism employment in an industry (concept used in the CTSA and NTI) is the number of jobs generated by, or attributable to, visitor spending on the goods and/or services produced by that industry. The difference between tourism employment and total employment (concept used in the HRM) is the number of jobs attributable to non-tourism (i.e., not directly attributable to tourism demand).

As an example, if the full-service restaurants industry has a total of 100,000 jobs, only the share that is directly associated with tourism (say 25%, or 25,000 jobs) represents the tourism employment in this industry. Similarly, only 25% of the full-time equivalent employment, total hours worked and labour income is attributed to tourism. Derived variables, such as annual average hours worked and annual average wage and salary per tourism job, as well as the average hourly earnings per hour worked per tourism job are assumed to be the same for all jobs in an industry.

At the core of the CTSA and the NTI is the definition of tourism. Tourism is defined according to international standards as: “the activities of persons travelling to and staying in places outside their usual environment for not more than one consecutive year for leisure, business and other purposes not related to the exercise of an activity remunerated from within the place visited”. Persons who engage in tourism, so-defined, are called visitors. Visitors consist of tourists (those who visit and stay outside their usual environment for at least one night) and same-day visitors.

14. The imputation of unreported tips in the CSNA is described in Appendix C, C.1.

15. Includes Medicare, dental plans, short-term and long-term disability plans, life insurance, etc.

16. Mixed income is found in the CTSA. For the HRM, an imputation is made for the labour component of mixed income. See step 1 in Appendix D.

The definition of tourism is quite broad in that both personal and business travels are included. The international standard does not precisely spell out the notion of usual environment, thereby allowing a country to apply its own specifications. For operational purposes, Canada has defined the concept of usual environment as the area less than 80 kilometres one-way from home.¹⁷ On the other hand, crossing an international boundary is considered tourism regardless of the distance travelled. It should be noted that not all travel is tourism. In particular, the definition rules out several types of travel, including commuting to and from work or school, travel by armed forces and diplomats, as well as migration.

Tourism demand is the spending by Canadian and non-resident visitors on domestically produced commodities. This spending has a direct impact on a wide range of industries, some more so than others. This leads to a definition of a tourism industry as one that would cease to exist without tourism, or would continue to exist only at a significantly reduced level of activity. By this definition, travel services is a tourism industry, while retail trade, which derives some of its business from visitors, is not. A tourism commodity is a good or service for which a significant part of its total demand comes from visitors. Air passenger transportation is a tourism commodity, while groceries, although occasionally bought by visitors, is not, because most groceries are bought by local residents.

Gross domestic product (GDP) can be defined as the unduplicated value of production of goods and services within the geographic boundaries of a country or region (e.g., province, territory).¹⁸ Tourism GDP is the GDP that can be attributed to the production of goods and services consumed directly by visitors.¹⁹ In the CTSA, tourism GDP is calculated as the sum of the labour income, mixed income (net income of unincorporated business) and other operating surplus (corporate profit and depreciation) that can be directly attributed to visitor spending.²⁰

Several socio-demographic variables are available in the HRM. One of these, immigrant status, is defined as follows: an immigrant is a permanent resident who is not a Canadian citizen at birth or is a person who holds a study or work permit or who is a refugee claimant or is a family member living with a refugee claimant. A non-immigrant is a person who is a Canadian citizen at birth.

-
17. The operational definition of tourism has been revised with the new, redesigned Travel Survey of Residents of Canada. Tourism will now include all overnight "out of town" trips and same-day trips exceeding forty kilometres one way from home. In addition to the usual exclusions, routine trips, such as for grocery shopping, will be excluded even if "out of town" or over forty kilometres.
 18. Unduplicated means that values are not double counted. If, for example, the value of fuel used by aircraft is counted along with airfares (which already include the costs of fuel inputs) the value of the fuel would be counted twice. Instead, only the value added (the difference between revenues from sales of goods and services produced and the cost of intermediate inputs of goods and services) at each stage of production is counted in GDP. It should be noted that GDP in the CSNA and CTSA is measured at basic prices. This means essentially that valuation is at the prices received by sellers, and does not include taxes on the sale of goods and services.
 19. The qualifier "directly" is important. To continue the example from above, "directly" means that only the GDP generated in the production of passenger air transportation (which visitors consume in their travels) can be counted in tourism GDP, not any of the GDP or value added generated in the production of goods and services that are inputs to air transport (like the fuel which airlines use). It is in this sense that tourism GDP is directly attributable to visitor spending. There is, of course, GDP generated in the upstream production chain that can be attributed to tourism, but only indirectly. Estimates of indirect effects of tourism can be obtained from economic impact models.
 20. In the CTSA, GDP is calculated using the sum of incomes generated by production approach, one of the three approaches to measuring GDP. The other two approaches are based on summing (1) the final expenditures on goods and services produced, and (2) the value added generated in the production of goods and services.

Appendix C Data sources

There are four main sources of data underlying the Human Resource Module (HRM). They are the Canadian Productivity Accounts (CPA) data in the Canadian System of National Accounts (CSNA), the Census, the Labour Force Survey (LFS), and the Survey of Employment Payroll and Hours (SEPH). These are described below along with their main uses.

C.1 Canadian System of National Accounts

The CPA database in the CSNA provides the tourism industry group totals for employee jobs and hours worked, labour income, wages and salaries and supplementary labour income, for both full-time and part-time jobs. Comparable data are also available for self-employment jobs, but the income variable is the net income of unincorporated businesses. These totals are for all jobs, including those attributable to both tourism and non-tourism demand. The data are classified on a North American Industry Classification System (NAICS) basis by province.

The CPA data for jobs are based, in turn, on the LFS estimates for the number of persons employed. This is adjusted to jobs by adding the second jobs of multiple-job holders.²¹ Additions are made for employment not covered by the LFS (e.g., regular military, employed persons in the territories or living on Indian reserves, and civil servants working in Canadian embassies abroad) to reflect the total economy. Last, deductions are made to exclude those absent from work without pay during the reference week.²² SEPH is primarily used to develop the industry allocation of the adjusted LFS benchmarks, although industry surveys and administrative sources (for example T4 slips)²³ are also used for selected industries.

The hours worked data include the following:

- hours actually worked during normal periods of work
- time worked in addition to hours worked during normal periods of work, and generally paid at higher rates than the normal rate (overtime)
- time spent at the place of work on work such as the preparation of the workplace, repairs and maintenance, preparation and cleaning of tools, and the preparation of receipts, time sheets and reports
- time spent at the place of work waiting or standing-by for such reasons as lack of supply of work, breakdown of machinery, or accidents, or time spent at the place of work during which no work is done but for which payment is made under a guaranteed employment contract
- time corresponding to short periods of rest at the workplace, including tea and coffee breaks.

They exclude:

- hours paid for but not actually worked, such as paid annual leave, paid public holidays, paid sick leave
- meal breaks
- time spent on travel to and from home and work.

The hours worked data are adjusted to correct for reference week effects in order to estimate annual hours worked.

21. Industry of second job is determined based on patterns observed for multiple job holders in the Survey of Labour Income Dynamics.

22. For more details on the current CSNA methodology see Maynard 2005.

23. Forms used by the Canada Revenue Agency for the employer to report the summary of remuneration paid to all employees who received salary, wages, tips or gratuities, bonuses, vacation pay, employment commissions and other remuneration.

In the CSNA, industry totals for wages and salaries come from a detailed reconciliation of wages and salaries from survey data and T4 administrative data. Estimates for components of supplementary labour income come in part from the T4 system (e.g., employer contributions to Employment Insurance (EI) and Quebec and Canada Pension Plans (Q/CPP)), administrative data on registered pension plans and from Workers Compensation Boards, as well as other survey sources (for contributions like life, accident and health insurance).

It should be noted that adjustments for unreported tips are made to the benchmarks for several industries:

- Performing arts and spectator sports and related industries (NAICS 711)
- Amusement, gambling and recreation industries (NAICS 713)
- Accommodation services (NAICS 721)
- Food services and drinking places (NAICS 722).

The adjustments for tips are made on the basis of industry sales of alcoholic beverages, full service restaurant meals (no tips are assumed on fast food), and accommodation. There are additional, smaller imputations for the tips in personal care services (barbershops and beauty salons, etc.) and railway transportation (for luggage porters) industries.

It should be noted that the average hourly earnings are calculated in the HRM as wages and salaries divided by total hours worked. Because tips and pay for absences (sick leave, vacations, etc.) are included in wages and salaries, the hourly earnings include an implicit premium on top of the straight wage for both.

C.2 Census of Population

The Census of Population provides comprehensive data on the demographic, social and economic characteristics of Canadians. Detailed information was collected from one in every five households for census reference years 2000 and 2005. Given its large sample size, the Census serves as the most reliable source of information on occupational distributions. As such, data from the 2001 and 2006 Census are used primarily to distribute the CSNA totals for employee jobs, hours worked and wages and salaries across occupations by gender and age group, and between immigrants and non-immigrants.

The data used in these calculations are based on occupational distributions for persons who had employment income in the census reference years (in this case, 2000 and 2005). The self-employed are excluded in the calculations.

The samples are broken down into part-and full-time categories according to whether the weeks worked in the reference year were primarily full-time (30 or more hours per week) or part-time (less than 30 hours per week). Also, industry group and occupation relate to the main job held during the reference week (defined as the job at which the most hours were worked) or, if unemployed, to the main job held since the start of the reference year (defined as the one in which the most weeks were worked).

Tabulations for this study use the National Occupational Classification for Statistics (NOC-S) 2006 and NAICS 2002 for the 2006 Census and NOC-S 2001 and NAICS 1997 for the 2001 Census. Differences between classification systems do not affect tourism industries and occupations.

C.3 Labour Force Survey

The Labour Force Survey (LFS) is conducted monthly and includes approximately 53,400 households, which translates roughly to a sample size of 100,000 people over the age of fifteen. The LFS collects basic labour force activity information including industry and occupation of employment for the survey reference week (normally the week including the 15th of the month), both for employees and the self-employed. It does not cover the territories, military personnel or civil servants stationed abroad, or persons residing on Indian reserves. Industry data are based on NAICS 2002, while occupation data use NOC-S 2001 for the entire period from 1997 to 2010.

The LFS is used here to develop the time series on jobs, hours worked and wages and salaries by occupation, age and gender for each industry group in the HRM. As mentioned previously, the LFS is used in the CSNA to establish overall number of jobs totals.

C.4 Survey of Employment, Payrolls and Hours

The Survey of Employment, Payrolls and Hours (SEPH) is conducted monthly. It collects the number of employee jobs and payroll data from a sample of establishments in Canada.

In this survey, establishments are coded by industry through the Business Register, thereby providing a reliable source of timely information on the industry distribution of employee jobs and payrolls. The administrative data are supplemented by the monthly Business Payroll Survey of 11,000 businesses. This survey collects data on employment, earnings and paid or usual hours, according to whether workers are paid by the hour, salaried or remunerated some other way.

SEPH data on a NAICS basis are available back to 1991. Data on the number of jobs, hours paid and earnings are used here to break down the CPA estimates so that they correspond to the definition of tourism industries used in the Canadian Tourism Satellite Account (CTSA). As mentioned earlier, SEPH is also used extensively in the CSNA to determine the industry distributions of employee jobs.

Appendix D Methodology

The basic methodology consists of six steps:

- 1) taking totals from the Canadian System of National Accounts (CSNA) for jobs, hours worked, and wages and salaries
- 2) disaggregating these totals, using data from the CSNA for full-time and part-time jobs
- 3) distributing the CSNA totals for 2000 and 2005 across occupations, gender and age groups, and immigrant status based on census data
- 4) building time series from these benchmarks based on movements in corresponding series from the Labour Force Survey (LFS)
- 5) smoothing the time series for LFS occupations, while keeping the overall industry group totals
- 6) making limited, final adjustments to data values.

The following describes the methodology and implicit assumptions in more detail.

Step 1: Benchmark totals

The industry group totals for jobs, hours worked, labour income and wages and salaries, including the details by class of worker (employee or self-employed), by full- and part-time status, are from the Canadian Productivity Accounts (CPA) database.

These data do not exactly meet requirements, however, and a number of adjustments are needed. In particular:

1. The labour component of mixed income from self-employment is imputed by multiplying the hours worked in self-employment by the average hourly wage per employee job. This method assumes that the self-employed and paid employees earn the same on average.²⁴ However, the imputation is imposed at the lowest level of the CPA database, resulting in differences in earnings between self-employed and paid employees in tourism industry aggregates.
2. The CPA jobs data follow the CSNA version of North American Industry Classification System (NAICS), which is simply a special aggregation that defines the working level (W level) industries of the Input-Output Tables. At this level, detail is available only for two parts of accommodation services, traveller accommodation (NAICS 7211) and RV parks, recreational campgrounds and rooming and boarding houses (NAICS 7212 + NAICS 7213 = 721A at the W level). An adjustment is required to remove rooming and boarding houses. This is done using details from Survey of Employment Payroll and Hours (SEPH) on the industry's share of overall jobs, hours and earnings. These shares are used to adjust both employee and self-employment jobs. The same method is used to remove the non-tourism sub-industries of rail transportation (NAICS 4821), automotive equipment rental and leasing (NAICS 5321), food services and drinking places (NAICS 7220), performing arts, spectators and related industries (NAICS 7110) and amusement and recreation industries (NAICS 7131+ NAICS7132 + NAICS 7139 = 713A at the W level).

Step 2: Distribution of CSNA data by full- and part-time status

Data from the CPA database in the CSNA are used to split jobs, hours worked and income by full-time and part-time status.

24. In past updates this imputation included supplementary labour income (SLI). However, self-employed do not contribute to the majority of plans/programs included in SLI. Since 2009, SLI is excluded from labour income for self-employed.

Step 3: Distribution of industry totals by occupation

Information on the occupational distribution of jobs comes from the Census. Step 3 involves using this source to distribute the CSNA totals by occupation, gender, age group and immigrant status.

This step relates only to employee jobs, as occupational details are not developed for the self-employed. The Census of Population is used to distribute the industry group totals established in the second step for the years 2000 and 2005 (i.e., the reference years for the 2001 and 2006 Censuses).

To develop occupational distributors for the industry group totals, special census tabulations are prepared, identifying persons in the tourism industries who had employment income in the reference year and were not self-employed. The selected persons are grouped according to their industry and whether they worked mainly full-or part-time during the reference year. For each of these groups the distribution of the (weighted) sample by occupation is determined, as well as the distribution of total hours worked and wage and salary income.

The occupational distributor for hours worked is based on the distribution of total hours (jobs multiplied by average hours worked) across occupations within each industry group.

The occupational distributor for wages and salaries is based on the distribution of total wages and salaries (jobs multiplied by hours worked multiplied by hourly earnings) across occupations in each industry group.

Step 4: Building the occupational time series

Step 4 entails using the corresponding LFS annual average series by occupation, age group and gender to build a time series. Information on immigrant status while available from the LFS was not considered robust enough at the detailed level, and therefore the percentage distribution from the census reference years (2000 and 2005) is used. To take into account the change in the immigrant ratio between the two censuses, a linear interpolation is used. The LFS data are adjusted to the census levels to maintain growth rates between the census years.

Step 5: Smoothing the LFS data

Step 5 entails smoothing (using a four-year moving average) to reduce volatility in the occupational time series found in the LFS. It is implemented in a way that preserves the overall industry group totals (from the CSNA) and the occupational distributions (from the 2001 and 2006 Census).

A simple moving average is applied to the indicators (discussed in Step 3) used to build the time series on jobs, hours worked and wages and salaries, full-and part-time, by occupation and for each industry. A four-year moving average was judged to provide the best results overall in terms of reasonableness and consistency, reduced volatility, and minimizing the need for manual adjustments.

Step 6: Other adjustments

The last step in developing the total industry estimates involves adjustments when the smoothed series appear out of line or generate erratic movements in the implied average annual hours or average hourly earnings. More specifically, adjustments are made if hourly earnings are more than four times higher than the corresponding occupation average or less than half of the Ontario minimum wage or if hours reported are more than 70 hours a week.²⁵ Results indicate that the smoothing and adjustments have little effect on the general pattern of the occupational distributions.

25. For details on Ontario minimum wage and standard hours for hours of work, see *Ontario Employment Standards Act, 2000* and regulations 285/01.

Appendix E Tourism industries in the Human Resource Module

This study uses the North American Industry Classification System (NAICS) 2002 to define the tourism-related industries. Briefly, NAICS is a comprehensive industry classification system encompassing all economic activities. It is designed for the compilation of production statistics and, therefore, for the classification of data relating to establishments (and locations). The criteria used to group establishments into industries in NAICS are similarity of input structures, labour skills or production processes used.

In order to maintain the reliability of the data, several tourism industries have been grouped together. Thus the tourism industry groups of the Human Resource Module (HRM) include:

- Transportation
 - Air transportation
 - All other transportation (includes rail, water, bus, taxi and vehicle rental)
- Accommodation
- Food and beverage services
- Recreation and entertainment
- Travel services.

Following is a detailed list of all tourism industries, including their NAICS codes.

Detailed list of tourism industries by North American Industry Classification System (NAICS) 2002

Transportation

Air transportation

- 4811 Scheduled air transport
- 4812 Non-scheduled air transport

All other transportation industries

- 4821 Rail transportation
of which:
 - Tourism sub-industries**
 - 482114 Passenger rail transportation
 - Non-tourism sub-industries**
 - 482112 Short-haul freight rail transportation
 - 482113 Mainline freight rail transportation
- 4831 Deep sea, coastal and great lakes water transportation
- 4832 Inland water transportation
- 4851 Urban transit systems
- 4852 Interurban and rural bus transportation
- 4853 Taxi and limousine service
- 4854 School and employee bus transportation
- 4855 Charter bus industry
- 4859 Other transit and ground passenger transportation
- 4871 Scenic and sightseeing transportation, land
- 4872 Scenic and sightseeing transportation, water
- 4879 Scenic and sightseeing transportation, other
- 5A0510¹ Automotive equipment rental and leasing
of which:
 - Tourism sub-industries**
 - 532111 Passenger car rental
 - 532120 Truck, utility trailer and RV (recreational vehicle) rental and leasing
 - Non-tourism sub-industries**
 - 532112 Passenger car leasing

Accommodation

- 7211 Traveller accommodation
- 721A¹ RV (recreational vehicle) parks and recreational camps
of which:
 - Tourism sub-industries**
 - 721211 RV (recreational vehicle) parks and campgrounds
 - 721212 Hunting and fishing camps
 - 721213 Recreational (except hunting and fishing) and vacation camps
 - Non-tourism sub-industries**
 - 721310 Rooming and boarding houses

Food and beverage services

| | |
|-------|--|
| 7220 | Food services and drinking places of which: |
| | Tourism sub-industries |
| 72211 | Full-service restaurants |
| 72221 | Limited-service eating places |
| 72241 | Drinking places (alcoholic beverages) |
| | Non-tourism sub-industries |
| 72231 | Food service contractors |
| 72232 | Caterers |
| 72233 | Mobile food services |

Recreation and entertainment

| | |
|-------------------|--|
| 51213 | Motion picture and video exhibition |
| 7110 | Performing arts, spectator sports and related industries of which: |
| | Tourism sub-industries |
| 7111 | Performing arts companies |
| 7112 | Spectator sports |
| 7115 | Independent artists, writers and performers |
| | Non-tourism sub-industries |
| 7113 | Promoters (presenters) of performing arts, sports and similar events |
| 7114 | Agents and managers for artists, athletes, entertainers and other public figures |
| 7121 | Heritage institutions |
| 713A ¹ | Amusement and recreation industries |
| 7131 | Amusement parks and arcades |
| 7132 | Gambling industries |
| 7139 | Other amusement and recreation industries of which: |
| | Tourism sub-industries |
| 71391 | Golf courses and country clubs |
| 71392 | Skiing facilities |
| 71393 | Marinas |
| 71395 | Bowling centres |
| 71399 | All other amusement and recreation industries |
| | Non-tourism sub-industries |
| 71394 | Fitness and recreational sports centres |

Travel services

| | |
|------|---|
| 5615 | Travel arrangement and reservation services |
|------|---|

1. Special aggregation of NAICS industries in CSNA.

Appendix F Tourism occupations in the Human Resource Module

This study uses the National Occupational Classification for Statistics (NOC-S) definitions of occupations. An occupation is defined in this classification as a collection of jobs, sufficiently similar in work performed to be grouped under a common title for classification purposes.

The selection of occupations is based on an examination of the occupational data for the 2001 Census for persons in the experienced labour force whose main job was in one of the tourism industry groups. Occupations with an estimated 5,000 employed persons or more were selected for this study. Occupations were added if in the 2006 Census they obtained more than 5,000 employed persons. Occupations were removed if in the 2006 Census they obtained fewer than 2,500 employed persons. These occupations were not common enough to support time series based on smaller samples from the Labour Force Survey (LFS). Between 2,500 and 5,000 employed persons some occupations were removed.

A detailed listing of occupations along with their NOC-S codes follows.

Detailed list of tourism occupations by National Occupational Classification for Statistics (NOC-S) 2006

Occupations listed by tourism industry groups

NOC-S 2006

Accommodation

| | |
|--|------|
| Accommodation service managers | A222 |
| Program leaders and instructors in recreation, sport and fitness | F154 |
| Chefs | G411 |
| Cooks | G412 |
| Bartenders | G512 |
| Food and beverage servers | G513 |
| Hotel front desk clerks | G715 |
| Light duty cleaners | G931 |
| Janitors, caretakers and building superintendents | G933 |
| Food counter attendants, kitchen helpers and related occupations | G961 |
| All other accommodation occupations | |

Transportation

Air transportation

| | |
|---|------|
| Air pilots, flight engineers and flying instructors | C171 |
| Pursers and flight attendants | G712 |
| Airline sales and service agents | G713 |
| Aircraft mechanics and aircraft inspectors | H415 |
| Air transport ramp attendants | H737 |

All other transportation

| | |
|--|------|
| Transportation managers | A373 |
| Retail salespersons and sales clerks | G211 |
| Automotive service technicians, truck and bus mechanics and mechanical repairers | H421 |
| Bus drivers and subway operators and other transit operators | H712 |
| Taxi and limousine drivers and chauffeurs | H713 |
| Railway and yard locomotives engineers | H721 |
| Railway conductors and brakemen/women | H722 |
| All other air transportation and other transportation occupations | |

Food and beverage services

| | |
|--|------|
| Restaurant and food service managers | A221 |
| Food service supervisors | G012 |
| Cashiers | G311 |
| Chefs | G411 |
| Cooks | G412 |
| Maitres d'hôtel and hosts/hostesses | G511 |
| Bartenders | G512 |
| Food and beverage servers | G513 |
| Bakers | G942 |
| Food counter attendants, kitchen helpers and related occupations | G961 |
| Delivery and courier service drivers | H714 |
| All other food and beverage services occupations | |

Occupations listed by tourism industry groupsNOC-S 2006**Recreation and entertainment**

| | |
|--|------|
| Recreation, sports and fitness program and service directors | A343 |
| Technical occupations related to museums and art galleries | F112 |
| Program leaders and instructors in recreation, sport and fitness | F154 |
| Retail salespersons and sales clerks | G211 |
| Cashiers | G311 |
| Security guards and related occupations | G631 |
| Casino occupations | G723 |
| Operators and attendants in amusement, recreation and sport | G731 |
| Janitors, caretakers and building superintendents | G933 |
| Food counter attendants, kitchen helpers and related occupations | G961 |
| Landscaping and grounds maintenance labourers | I212 |
| All other recreation and entertainment occupations | |

Travel services

| | |
|---------------------------------------|------|
| Retail trade managers | A211 |
| Travel counsellors | G711 |
| All other travel services occupations | |

Appendix G Table structure

The structure of the Human Resource Module (HRM) tables is detailed below.

Tables are available for each of the five tourism industry groups (see Appendix C) included in the HRM, as well as a total for all industries. Details are also available on the air transportation and all other transportation sub-industries of the transportation industry group.

Total employment, hours worked and wages and salaries are available for each industry group. Derived variables including average annual hours worked, average annual wage and salary and average hourly wages are also included.

These variables are split into the following categories:

- a. Full-time female
- b. Part-time female
- c. Full-time male
- d. Part-time male
- e. Total male
- f. Total female
- g. Total part-time
- h. Total full-time
- i. Total

Each of the above categories is split into occupational details (see Appendix F).

The categories “e” to “h” are further split into immigrants and non-immigrants, while the category “i” is further divided up into four age categories: 15 to 24, 25 to 34, 35 to 44, 45 and over.

It might be noted that for publication purposes, cells of the HRM tables are suppressed whenever the estimated number of jobs is less than twenty. Below this threshold, the data are considered confidential.

Tables on annual employment in tourism industries are now available upon request. Tables on the annual employment directly attributable to tourism (i.e., tourism employment) and quarterly data are a work-in-progress.

Glossary of terms

Basic prices: A basic price valuation including the costs of production factors (labour and capital) and indirect taxes and subsidies on production factors. It represents essentially the prices received by the sellers, and does not include taxes on the sales of goods and services.

Employee jobs: All jobs in which the person employed draws compensation for services rendered and for whom the employer must complete a Revenue Canada T4 form. Jobs in which workers are paid by tips or commissions are included. Self-employed proprietors of unincorporated enterprises and unpaid family workers are not included.

Full-time job: One in which a person usually works 30 hours or more per week.

Full-time equivalent employment: Is the number of full-time equivalent jobs.

Full-time equivalent (FTE) jobs: Is defined as total hours worked divided by average annual hours worked in full-time jobs. This can also be described as full-time-equivalent work-years. It is a less precise alternative to expressing labour input in terms of total hours worked.

Gross domestic product (GDP): The total unduplicated value of the goods and services produced in the economic territory of a country or region during a given period. GDP can be measured three ways: as total incomes earned in current production (income approach), as total final sales of current production (expenditure approach), or as total net values added in current production (value added approach). It can be valued either at basic prices or at market prices.

Hours worked: Actual hours worked during normal periods of work, including overtime but excluding paid leave (e.g., holidays, sick leave).

Immigrant: In this study, an immigrant is defined as a person who is a landed immigrant (or has been and has become a Canadian citizen) or a non-permanent resident. A landed immigrant is a permanent resident who is not a Canadian citizen at birth. A non-permanent resident is a person who holds a study or work permit or who is a refugee claimant or is a family member living with this refugee claimant.

Industry: An industry is a group of establishments engaged in the same or a similar kind of economic activity.

Job: A job is defined as an explicit or implicit contract between a person and an institutional unit to perform work in return for compensation for a defined period or until further notice. The institutional unit may be the proprietor of an unincorporated enterprise; in this case the person is described as being self-employed and earns a mixed income. The number of jobs exceeds the number of persons employed by the number of second, third, etc. jobs.

Jobs generated by tourism: Jobs that can be directly attributed to tourism demand.

Labour force: The civilian non-institutional population 15 years of age and over who are either employed or unemployed.

Labour income: Total earnings of employees, consisting of wages and salaries as well as supplementary labour income (such as employer's contributions to pension funds, employee welfare funds, the Employment Insurance Fund and Worker's Compensation Funds).

Main job: The job at which the most hours are worked.

Market prices: A valuation expressed in terms of the prices actually paid by the purchaser, that is, after all applicable taxes (including taxes on the sale of goods and services) and subsidies.

Mixed income: Mixed income is a balancing item in the industry accounts of the Input-Output accounts, representing the return to both self-employed labour and capital of the unincorporated business. Mixed income consists of earnings of proprietors of unincorporated businesses (sole proprietorships and partnerships) such as retailers and consultants, earnings of independent professional practitioners such as lawyers and dentists, net (after expenses) rental income of owners of real property and the accrued net farm income of farm operators.

Multiple-job holder: A person who is employed in more than one job during the reference period.

Non-immigrant: In this study, a non-immigrant is a person who is a Canadian citizen at birth.

Occupation: A collection of jobs, sufficiently similar in work performed (tasks, duties and responsibilities) to be grouped under a common title for classification purposes.

Part-time job: One in which a person usually works less than 30 hours per week.

Satellite account: An accounting system that follows the basic principles of the System of National Economic Accounts but also expands the analytical capacity for selected areas of economic or social concern, without overburdening or disrupting the central system. Satellite accounts are linked with the central framework of the national accounts and through them to the main body of integrated economic statistics.

Self-employment jobs: Includes working-owners of unincorporated enterprises, and members of their households who work without a wage or salary (i.e., unpaid family workers).

Supplementary labour income: Expenditures by employers on their labour account which are regarded as compensation of employees. It includes contributions to employment insurance, private and public pension plans, worker's compensation, health and life insurance plans, and retirement allowances.

System of National Economic Accounts (SNEA): The System of National Economic Accounts (SNEA) consists of a coherent, consistent and integrated set of macroeconomic accounts, balance sheets and tables based on a set of internationally agreed concepts, definitions, classifications and accounting rules. In its broad outline, the Canadian System of National Economic Accounts (CSNEA) bears a close relationship to the international standard as described in the United Nations publication: System of National Accounts 1993.

Total hours worked: The aggregate number of hours actually worked during the year in employee and self-employment jobs.

Tourism: The definition of tourism adapted from the World Tourism Organization and the United Nations Statistical Commission is: "the activities of persons travelling to and staying in places outside their usual environment for not more than one consecutive year for leisure, business and other purposes."

Tourism commodity: Tourism commodity is one for which a significant part of its total demand in Canada comes from visitors.

Tourism demand: The spending of Canadian and non-resident visitors on domestically produced commodities. It is the sum of tourism domestic demand and tourism exports.

Tourism employment: The number of jobs in tourism and non-tourism industries that can be directly attributed to tourism demand. Someone who works 10 hours a week counts for as much, by this measure, as someone who works 50 hours a week. This is also called "employment generated by tourism".

Tourism industry: An industry which as a direct result of the absence of tourism would cease or continue to exist only at significantly reduced levels of activity. Some industries may be affected by the absence of tourism but not directly, for example the absence of tourism would greatly affect the air transportation industry and thus indirectly the catering industry.

Tourism Satellite Account: Tourism Satellite Account is an accounting framework, based on the System of National Economic Accounts that serves to define tourism and is used to compile and integrate statistics on tourism, to measure its importance to the economy, and to facilitate its comparison with other industries within the economy.

Visitors: Visitors are persons who undertake tourism as defined above. They are referred to as either tourists (those who stay overnight or longer in the place visited), or same-day visitors. In Canada, "tourist" is used to denote all visitors, whether they are same-day or overnight visitors.

Wages and salaries: Consists of monetary compensation and payments-in-kind (e.g., board and lodging), to wage earners and salaried persons employed in private, public and non-profit institutions in Canada including domestic servants and baby-sitters. Other forms of compensation included are commissions, bonuses, tips, directors' fees, taxable allowances, and the values of stock options of corporations. Bonuses, commissions and retroactive wages are recorded in the period paid rather than earned. Wages and salaries are recorded on a gross basis, before deductions for taxes, employees' contributions to employment insurance, and private and public pension plans.

References

- Akyeampong, Ernest. 1999. "Saving for retirement: RRSPs and RPPs." *Perspectives on Labour and Income*. Vol.11, no. 2. Statistics Canada, catalogue no. 75-001-XIE. p. 21-27.
<http://www.statcan.gc.ca/studies-etudes/75-001/archive/e-pdf/4602-eng.pdf> (accessed April 18, 2011).
- Akyeampong, Ernest and Deborah Sussman. 2003. "Health-related insurance for the self-employed." *Perspectives on Labour and Income*. Vol.4, no.5. Statistics Canada, catalogue no. 75-001-XIE. p. 13-18.
<http://www.statcan.gc.ca/pub/75-001-x/75-001-x2003105-eng.pdf> (accessed April 18, 2011).
- Barber-Dueck, Conrad and Demi Kotsovos. 2003. *The Provincial and Territorial Satellite Accounts for Canada, 1998*. Statistics Canada, catalogue no.13-604-MIE. Ottawa, Ontario. 80 p. Income and Expenditure Accounts Technical Series, no. 40.
<http://www.statcan.gc.ca/pub/13-604-m/13-604-m2003040-eng.pdf> (accessed April 18, 2011).
- Bisaillon, Monique. 2010a. *Human Resource Module of the Tourism Satellite Account: A Pilot Study for Ontario*. Statistics Canada, catalogue no. 13-604-MIE. Ottawa, 42 p. Income and Expenditure Accounts Technical Series, no. 65.
<http://www.statcan.gc.ca/pub/13-604-m/13-604-m2010065-eng.pdf> (accessed April 18, 2011).
- . 2010b. *Human Resource Module of the Tourism Satellite Account, 2009*. Income and Expenditure Accounts Technical Series, Catalogue no. 13-604 no. 66, Statistics Canada, Ottawa, May 2010.
<http://www.statcan.gc.ca/pub/13-604-m/13-604-m2010066-eng.pdf> (accessed April 18, 2011).
- Bisaillon, Monique and Charles Morissette. 2009. *Human Resource Module of the Tourism Satellite Account, 2007*. Statistics Canada, catalogue no. 13-604-MIE. Ottawa, Ontario. 36 p. Income and Expenditure Accounts Technical Series, no. 61.
<http://www.statcan.gc.ca/pub/13-604-m/13-604-m2009061-eng.pdf> (accessed April 18, 2011).
- Cañada, Agustín, J. Prado and R. Roig. 2004. "The measurement of employment in tourism – Spain." Presented at joint *Organisation for Economic Co-operation and Development and Austrian Ministry of Economics and Labour seminar on Tourism, Economics and Labour*. Vienna, December 14.
- Canadian Tourism Human Resource Council. 2008a. "The future of Canada's tourism sector: long on prospects – short on people." Prepared by The Canadian Tourism Research Institute, The Conference Board of Canada and The Bristol Group. Ottawa, Ontario. 38p.
http://cthrc.ca/~media/Files/CTHRC/Home/research_publications/labour_market_information/sd-supplydemand-report-en.ashx (accessed April 18, 2011).
- . 2008b. "In short supply: tourism – more jobs than workers." Prepared by the Conference Board of Canada, Ottawa, Ontario.
- . 2009. "The future of Canada's tourism sector: labour shortages to re-emerge as economy recovers." Prepared by the Conference Board of Canada, Ottawa, Ontario.
- Commission of the European Communities, International Monetary Fund, Organisation for Economic Co-operation and Development, United Nations and World Bank. 2008. *System of National Accounts 2008*. Brussels, Luxembourg, New York, Paris, Washington.
- Commission of the European Communities, Organisation for Economic Co-operation and Development, World Tourism Organization and United Nations Statistics Division. 2008. *Tourism Satellite Account: Recommended Methodological Framework 2008*. Luxembourg, Madrid, New York, Paris.

- Hoekstra, Rutger. 2004. "Labour in the Dutch TSA." Presented at joint *Organisation for Economic Co-operation and Development and Austrian Ministry of Economics and Labour seminar on Tourism, Economics and Labour*. Vienna. December 14.
- Jackson, Chris. 2007. Human Resource Module of the Tourism Satellite Account, Update to 2005. Statistics Canada, catalogue no. 13-604-MIE. Ottawa, Ontario. 28 p. Income and Expenditure Accounts Technical Series, no. 55.
<http://www.statcan.gc.ca/pub/13-604-m/13-604-m2007055-eng.pdf> (accessed April 18, 2011).
- Kemp, Katharine and Shaila Nijhowne. 2004. "Study of the Canadian Tourism Satellite Account: Comparison of the TSA-RMF and CTSA." Report prepared for the *Canadian Tourism Commission for the meetings of the Macroeconomics and Statistics Sub-Committee of the World Tourism Organization*. Madrid. March 8-9.
<http://dsp-psd.pwgsc.gc.ca/Collection/C86-191-2004E.pdf> (accessed April 18, 2011).
- Kotsovos, Demi. 2007. *Canadian Tourism Satellite Account Handbook*. Statistics Canada, catalogue no.13-604-MIE. Ottawa, Ontario. 86 p. Income and Expenditure Accounts Technical Series, no. 52.
<http://www.statcan.gc.ca/pub/13-604-m/13-604-m2007052-eng.pdf> (accessed April 18, 2011).
- . 2009. *Canadian Tourism Satellite Account, 2004*. Statistics Canada, catalogue no. 13-604-MIE. Ottawa, Ontario. 34 p. Income and Expenditure Accounts Technical Series, no. 63.
<http://www.statcan.gc.ca/pub/13-604-m/13-604-m2009063-eng.pdf> (accessed April 19, 2011).
- Laimer, Peter and Petra Öhlböck. 2004. "A TSA-Employment Module for Austria." Presented at joint *Organisation for Economic Co-operation and Development and Austrian Ministry of Economics and Labour seminar on Tourism, Economics and Labour*. Vienna, December 14.
- Marshall, Katherine. 2000. "Part-time by choice." *Perspectives on Labour and Income*. Vol. 1, no. 2. Statistics Canada, catalogue no. 75-001-XIE. p. 20-27.
<http://www.statcan.gc.ca/studies-etudes/75-001/archive/e-pdf/5608-eng.pdf> (accessed April 19, 2011).
- Maynard, Jean-Pierre. 2005. *Annual measure of the volume of work consistent with the SNA: The Canadian Experience*. Statistics Canada, catalogue no.11F0026MIE. Ottawa, Ontario. 30 p. Economic Analysis Methodology Paper Series: National Accounts, no. 5.
<http://www.statcan.gc.ca/bsolc/olc-cel/olc-cel?catno=11F0026MIE2005005&lang=eng> (accessed April 27, 2010).
- Mohan, M., G. Gislason, and B. McGowan. 1998. "Tourism-related employment: 1998 update." Prepared for the Canadian Tourism Human Resource Council.
- Morissette, Charles and Berouk Terefe. 2008. *Human Resource Module of the Tourism Satellite Account, Update to 2006*. Statistics Canada, catalogue no. 13-604-MIE. Ottawa, Ontario. 28 p. Income and Expenditure Accounts Technical Series, no. 59.
<http://www.statcan.gc.ca/pub/13-604-m/13-604-m2008059-eng.pdf> (accessed April 18, 2011).
- Ontario Ministry of Tourism. 2009. "Discovering Ontario – A report on the future of tourism." Prepared by the Ontario Tourism Competitive Study. Toronto.
- Organisation for Economic Co-operation and Economic Development. 2000. "Measuring the Role of Tourism in OECD Economies, the OECD Manual on Tourism Satellite Accounts and Employment." Paris.

- Statistics Canada. 1976. Labour Force Information. Statistics Canada, catalogue no. 71-001-XIE. Ottawa, Ontario.
<http://www.statcan.gc.ca/bsolc/olc-cel/olc-cel?catno=71-001-XIE&lang=eng> (accessed April 18, 2011). Monthly.
- . 1995-. Canadian Civil Aviation. Statistics Canada, catalogue no. 51-206-XIB, Ottawa, Ontario.
<http://www.statcan.gc.ca/bsolc/olc-cel/olc-cel?catno=51-206-X&lang=eng> (accessed April 18, 2011). Annual.
- . 1996-. *National Tourism Indicators*. Statistics Canada, catalogue no. 13-009-XIE, Ottawa, Ontario.
<http://www.statcan.gc.ca/bsolc/olc-cel/olc-cel?catno=13-009-XIE&lang=eng> (accessed April 18, 2011). Quarterly.
- . 2008. *Guide to the Income and Expenditure Accounts*. Statistics Canada, catalogue no. 13-017-XIE. Ottawa, Ontario. 297 p.
<http://www.statcan.gc.ca/pub/13-017-x/13-017-x2008001-eng.pdf> (accessed April 18, 2011)
- . 2009. "Labour statistics consistent with the System of National Accounts. 2004 to 2009 (revised)" *The Daily*. December 11. Statistics Canada, catalogue no. 11-001-XIE. p. 8.
<http://www.statcan.gc.ca/daily-quotidien/091211/dq091211f-eng.htm> (accessed April 19, 2011).
- . 2011a. "GDP by income and by expenditure." *Canadian Economic Accounts Quarterly Review*. Vol.9 no.4. Fourth quarter 2010. Statistics Canada, catalogue no. 13-010-XIE.
<http://www.statcan.gc.ca/pub/13-010-x/13-010-x2010004-eng.htm> (accessed April 19, 2011).
- . 2011b. *National Tourism Indicators, Quarterly Estimates*. Fourth quarter 2010. Statistics Canada, catalogue no. 13-009-XIE, Ottawa, 46 p.
<http://www.statcan.gc.ca/pub/13-009-x/13-009-x2010004-eng.pdf> (accessed April 18, 2011)
- Wright, Jennifer. 2007. "Total Tourism Sector Employment in Canada: 2006 Update." Canadian Tourism Human Resource Council, Ottawa, Ontario.

Technical series

The Income and Expenditure Accounts Division Technical Series (13-604) provide background information as well as in depth analysis on data reported in any of the following accounts: Income and Expenditure Accounts, Provincial Economic Accounts, Financial Flow Accounts, National Balance Sheet Accounts, Labour Income and the National Tourism Indicators. A list of the papers currently available is presented below. These papers are available on our website at www.statcan.gc.ca, by contacting us at (613) 951-3810, by email to iead-info-dcrd@statcan.gc.ca or by writing to Client Services, IEAD, Statistics Canada, 21st floor R.H. Coats Building, 100 Tunney's Pasture Driveway, Ottawa, Ontario, K1A 0T6.

1. "Laspeyres, Paasche and Chain Price Indexes in the Income and Expenditure Accounts", reprinted from *National Income and Expenditure Accounts*, fourth quarter 1988.
2. "Technical Paper on the Treatment of Grain Production in the Quarterly Income and Expenditure Accounts", reprinted from *National Income and Expenditure Accounts*, first quarter 1989.
3. "Data Revisions for the Period 1985-1988 in the National Income and Expenditure Accounts", reprinted from *National Income and Expenditure Accounts*, first quarter 1989.
4. "Incorporation in the Income and Expenditure Accounts of a Breakdown of Investment in Machinery and Equipment", reprinted from *National Income and Expenditure Accounts*, third quarter 1989.
5. "New Provincial Estimates of Final Domestic Demand at Constant Prices", reprinted from *National Income and Expenditure Accounts*, fourth quarter 1989.
6. "Real Gross Domestic Product: Sensitivity to the Choice of Base Year", reprinted from *Canadian Economic Observer*, May 1990
7. "Data Revisions for the Period 1986 1989 in the National Income and Expenditure Accounts", reprinted from *National Income and Expenditure Accounts*, first quarter 1990.
8. "Volume Indexes in the Income and Expenditure Accounts", reprinted from *National Income and Expenditure Accounts*, first quarter 1990.
9. "A New Indicator of Trends in Wage Inflation", reprinted from *Canadian Economic Observer*, September 1989.
10. "Recent Trends in Wages", reprinted from *Perspectives on Labour and Income*, winter 1990.
11. "The Canadian System of National Accounts Vis-à-Vis the U.N. System of National Accounts", reprinted from *National Income and Expenditure Accounts*, third quarter 1990.
12. "The Allocation of Indirect Taxes and Subsidies to Components of Final Expenditure", reprinted from *National Income and Expenditure Accounts*, third quarter 1990.
13. "The Treatment of the GST in the Income and Expenditure Accounts", reprinted from *National Income and Expenditure Accounts*, first quarter 1991.
14. "The Introduction of Chain Volume Indexes in the Income and Expenditure Accounts", reprinted from *National Income and Expenditure Accounts*, first quarter 1991.
15. "Data Revisions for the Period 1987-1990 in the National Income and Expenditure Accounts", reprinted from *National Income and Expenditure Accounts*, second quarter 1991.
16. "Volume Estimates of International Trade in Business Services", reprinted from *National Income and Expenditure Accounts*, third quarter 1991.
17. "The Challenge of Measurement in the National Accounts", reprinted from *National Income and Expenditure Accounts*, fourth quarter 1991.

18. "A Study of the Flow of Consumption Services from the Stock of Consumer Goods", reprinted from *National Income and Expenditure Accounts*, fourth quarter 1991.
19. "The Value of Household Work in Canada, 1986", reprinted from *National Income and Expenditure Accounts*, first quarter 1992.
20. "Data Revisions for the Period 1988-1991 in the National Income and Expenditure Accounts", reprinted from *National Income and Expenditure Accounts*, Annual Estimates, 1980-1991.
21. "Cross-border Shopping - Trends and Measurement Issues", reprinted from *National Income and Expenditure Accounts*, third quarter 1992.
22. "Reading Government Statistics: A User's Guide", reprinted from *Policy Options*, Vol. 14, No. 3, April 1993.
23. "The Timeliness of Quarterly Income and Expenditure Accounts: An International Comparison", reprinted from *National Income and Expenditure Accounts*, first quarter 1993.
24. "National Income and Expenditure Accounts: Revised Estimates for the period from 1989 to 1992", reprinted from *National Income and Expenditure Accounts*, Annual Estimates, 1981-1992.
25. "International Price and Quantity Comparisons: Purchasing Power Parities and Real Expenditures, Canada and the United States", reprinted from *National Income and Expenditure Accounts*, Annual Estimates, 1981-1992.
26. "The Distribution of GDP at Factor Cost by Sector", reprinted from *National income and Expenditure Accounts*, third quarter 1993.
27. "The Value of Household Work in Canada, 1992", reprinted from *National Income and Expenditure Accounts*, fourth quarter 1993.
28. "Assessing the Size of the Underground Economy: The Statistics Canada Perspective", reprinted from *Canadian Economic Observer*, May 1994.
29. "National Income and Expenditure Accounts: Revised Estimates for the period from 1990 to 1993", reprinted from *National Income and Expenditure Accounts*, first quarter 1994.
30. "The Canadian National Accounts Environmental Component: A Status Report", reprinted from *National Income and Expenditure Accounts*, Annual Estimates, 1982-1993.
31. "The Tourism Satellite Account", reprinted from *National income and Expenditure Accounts*, second quarter 1994.
32. "The 1993 International System of National Accounts: Its implementation in Canada", reprinted from *National Income and Expenditure Accounts*, third quarter 1994.
33. "The 1995 Revision of the National Economic and Financial Accounts", reprinted from *National Economic and Financial Accounts*, first quarter 1995.
34. "A Primer on Financial Derivatives", reprinted from *National Economic and Financial Accounts*, first quarter 1995.
35. "The Effect of Rebased on GDP", reprinted from *National Economic and Financial Accounts*, second quarter 1996.
36. "Purchasing Power Parities and Real Expenditures, United States and Canada - An Update to 1998", reprinted from *National Income and Expenditure Accounts*, third quarter 1999.
37. "Capitalization of Software in the National Accounts", *Income and Expenditure Accounts Technical Series*, February 2002.
38. "The Provincial and Territorial Tourism Satellite Accounts for Canada, 1996", *Income and Expenditure Accounts Technical Series*, April 2002.
39. "Purchasing Power Parities and Real Expenditures, United States and Canada", reprinted from *Income and Expenditure Accounts*, first quarter 2002.

40. "The Provincial and Territorial Tourism Satellite Accounts for Canada, 1998", *Income and Expenditure Accounts Technical Series*, June 2003.
41. "Government revenue attributable to tourism, 1998", *Income and Expenditure Accounts Technical Series*, September 2003.
42. "Chain Fisher Index Volume Methodology", *Income and Expenditure Accounts Technical Series*, November 2003.
43. "Trends in provincial and territorial economic statistics: 1981-2002", *Income and Expenditure Accounts Technical Series*, November 2003.
44. "The 1997-2003 Revisions of the National Tourism Indicators", *Income and Expenditure Accounts Technical Series*, October 2004.
45. "A study of data revisions to the National Tourism Indicators", *Income and Expenditure Accounts Technical Series*, October 2004.
46. "Provincial and Territorial Economic Accounts", *Income and Expenditure Accounts Technical Series*, November 2004.
47. "Revisions to the Canadian National Tourism Indicators", *Income and Expenditure Accounts Technical Series*, January 2005.
48. "Canadian Tourism Satellite Accounts, 2000", *Income and Expenditure Accounts Technical Series*, October 2005.
49. "Trends in Saving and Net Lending in the National Accounts", reprinted from *National Income and Expenditure Accounts*, third quarter 2005.
50. "Recent Trends in Corporate Finance: Some Evidence from the Canadian System of National Accounts", reprinted from *National Income and Expenditure Accounts*, fourth quarter 2005.
51. "Human Resource Module of the Tourism Satellite Account, 1997-2002", *Income and Expenditure Accounts Technical Series*, March 2006.
52. "Canadian Tourism Satellite Account Handbook", *Income and Expenditure Accounts Technical Series*, December 2007.
53. "Purchasing Power Parities and Real Expenditures, United States and Canada, 1992-2005", *Income and Expenditure Accounts Technical Series*, February 2007.
54. "Recent Trends in Output and Employment", *Income and Expenditure Accounts Technical Series*, February 2007.
55. "Human Resource Module of the Tourism Satellite Account, Update to 2005", *Income and Expenditure Accounts Technical Series*, March 2007.
56. "The Canadian Research and Development Satellite Account, 1997 to 2004", *Income and Expenditure Accounts Technical Series*, May 2008.
57. "Government Revenue Attributable to Tourism, 2000 to 2006", *Income and Expenditure Accounts Technical Series*, September 2007.
58. "Canadian Tourism Satellite Account, 2002", *Income and Expenditure Accounts Technical Series*, October 2007.
59. "Human Resource Module of the Tourism Satellite Account, Update to 2006", *Income and Expenditure Accounts Technical Series*, April 2008.
60. "Government Revenue Attributable to Tourism, 2007", *Income and Expenditure Accounts Technical Series*, November 2008.
61. "Human Resource Module of the Tourism Satellite Account, 2007", *Income and Expenditure Accounts Technical Series*, May 2009.

62. "Real Import and Export Adjustments to Account for Exchange Fluctuations", *Income and Expenditure Accounts Technical Series*, November 2009.
63. "Canadian Tourism Satellite Account, 2004", *Income and Expenditure Accounts Technical Series*, December 2009.
64. "Purchasing Power Parities, United States and Canada, 2002 to 2008", *Income and Expenditure Accounts Technical Series*, February 2010.
65. "Human Resource Module of the Tourism Satellite Account: A pilot project for Ontario", *Income and Expenditure Accounts Technical Series*, March 2010.
66. "Human Resource Module of the Tourism Satellite Account, 2009", *Income and Expenditure Accounts Technical Series*, May 2010.
67. "Government Revenue Attributable to Tourism, 2009", *Income and Expenditure Accounts Technical Series*, November 2010.
68. "Revisions and the Income and Expenditure Accounts", *Income and Expenditure Accounts Technical Series*, March 2011.
69. "Human Resource Module of the Satellite Account, 2010", *Income and Expenditure Accounts Technical Series*, June 2011.