



Canadian Labour Market and Skills Researcher Network

Working Paper No. 7

**An Analysis of Unemployment Incidence and
Duration: Some New Evidence from Canada**

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January 2009

CLSRN is supported by Human Resources and Social Development Canada (HRSDC) and the Social Sciences and Humanities Research Council of Canada (SSHRC). All opinions are those of the authors and do not reflect the views of HRSDC or the SSHRC.

An Analysis of Unemployment Incidence and Duration: Some New Evidence from Canada

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January 2009

Abstract

This paper studies the incidence and duration of unemployment in Canada at an aggregate and a number of disaggregated levels with data from the Canadian Labour Force Survey covering 1976 to 2006. The principal empirical findings indicate that most of the changes in steady state unemployment rates during the study period can be attributed to changes in incidence rather than changes in expected duration.

JEL Classification: J64, J63, C41

Keywords: Education, Training, Youth, Labour Market Outcomes

* I gratefully acknowledge the financial support of the Canadian Labour Market and Skills Researcher Network (CLSRN) and helpful comments from Steve Jones and participants at the CLSRN Labour Market Adjustment Workshop. Please address correspondence to Michele Campolieti, Centre for Industrial Relations, University of Toronto, 121 St. George Street, Toronto, Ontario, M5S 2E8, Canada; email: campolie@chass.utoronto.ca.

Executive Summary

This paper examines the expected duration and incidence of unemployment spells using Canadian data from Statistics Canada's Labour Force Survey (LFS), covering the period between 1976 and 2006. These models are estimated at both the aggregate and disaggregated level (e.g., demographic groups, type of unemployment spell and province). In order to account for some changes in EI legislation and changes in the LFS that occurred in 1996, the models are also estimated for the 1976-1996 and 1997-2006 periods. The analysis produces a number of new findings about unemployment duration and incidence in Canada.

First, like previous U.S. estimates, unemployment duration is counter-cyclical in Canada during the study period, but this pattern is not as strong as that observed in the United States. Second, most of the steady state changes in unemployment rates cannot be attributed to changes in the expected duration of unemployment spells at the aggregate level. This finding is also observed when the data is disaggregated for a number of different demographic groups. Most of my estimates indicate that changes in expected duration account for about 30-40 percent of steady state increases in unemployment rates. This differs from most U.S. evidence that indicates changes in duration play a bigger role than incidence for steady state changes in unemployment rates. For example, U.S. estimates from comparable methodologies indicate about 60 percent of increases in unemployment rates can be attributed to changes in expected duration. Other more recent U.S. studies that use different methodologies also indicate that duration has a bigger effect on unemployment rates. Third, there are substantial differences in the cyclicity of unemployment duration when the data is disaggregated by province. In particular, duration plays a much larger role in the steady state increases in unemployment rates in Ontario and the Western provinces than in Quebec and the Atlantic provinces where changes in incidence are more important. Fourth, there is some cyclical variability in the incidence of unemployment for many demographic groups and types of unemployment spells. This is particularly true for young adults who are enrolled in school, who have unemployment spells that are counter-cyclical in nature. Fifth, there is a negative trend in the expected duration of unemployment in Canada between 1976 and 2006 at both the disaggregated and aggregated levels. Moreover, this trend becomes much stronger between 1997 and 2006. There is also some evidence of a negative trend in the incidence of unemployment in many of the subgroups that are examined, but this trend is not as strong as that observed in the duration regressions.

These findings provide some new insights into the characteristics and variability of unemployment in Canada. It is clear that these Canadian findings differ from many of the established results from U.S. data. One plausible explanation for these differences may lie in the regional differences in labour markets in Canada. My estimates indicate that there is a much larger role for incidence influencing changes in unemployment rates in the Quebec and the Atlantic provinces, while

duration is more important in Ontario and the Western provinces. While regional differences in labour markets in Canada are not surprising, the effect of these differences on aggregate unemployment dynamics has not been closely explored. This is an important question for future research to address.

From the perspective of policy makers, these regional differences mean that initiatives that may well suited for some regions in the Canada, may not be well suited for others. This raises the issue of what is the optimal strategy for the development of policy to deal with unemployment. In particular, should policy initiatives be more segmented and tailored to fit a particular province instead of treating all regions equally? This is also an important question for future research to address.