Poverty Variations among the Elderly: The Roles of Income Security Policies and Family Co-Residence*

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RÉSUMÉ

Malgré un déclin rapide depuis les années 1970, la pauvreté parmi les immigrants âgées demeure toujours élevée. Utilisant le recensement canadien de la population en 2006, cet article décrit les différences des taux de pauvreté des vieillards immigrants comparé aux ceux nés au Canada. Les résultats de l'analyse logistique de régression suggèrent qu'une grande partie du haut taux de pauvreté parmi les immigrants âgés est dû au manque, ou à l'insuffisance, d'appui financier du gouvernement. Néanmoins, la pauvreté élevée parmi les immigrants âgés est atténuée par l'aide financière de leurs familles. Cet article conclut en mettant l'emphase sur le rôle que la famille peut jouer pour contrer la pauvreté qui fait face aux vieillards immigrants, et en évaluant deux mécanismes d'intervention du gouvernement qui pourraient améliorer le bien-être économique des immigrants âgés.

ABSTRACT

Despite a rapid overall decline in poverty among older people since the 1970s, poverty among elderly immigrants is persistently high in Canada. Using data from the 2006 Canadian Census of Population, this article presents results of a study on the poverty of elderly immigrants in comparison to the Canadian-born elderly population. Results from logistic regression analysis suggest that a large portion of the higher poverty rates among elderly immigrants can be explained by the lack or inadequacy of state income support. Nevertheless, the high poverty levels among elderly immigrants are mitigated by financial assistance from their kin. This article concludes by highlighting the role of family support as a coping strategy for escaping poverty and by assessing two mechanisms of state intervention that could improve the economic well-being of elderly immigrants.

* We thank three anonymous reviewers for their careful reviews of an earlier manuscript and for their many helpful comments. Earlier versions of this article were presented at the June 2008 annual meeting of the Canadian Sociological Association, Vancouver, British Columbia, and the December 2008 fourth Symposium of the Population, Work, and Family Research Collaboration (PWFC), Gatineau, Quebec. This research is funded by the Social Sciences and Humanities Research Council award of a Canada Research Chair in Immigration, Inequality, and Public Policy to Monica Boyd.

Manuscript received: / manuscrit reçu: 27/10/09 Manuscript accepted: / manuscrit accepté: 23/09/10

Mots clés: vieillissement, pauvreté, immigrants, politique publique, aide aux familles, soutien familial, ethnicit

Keywords: aging, poverty, immigrants, government policy, family support, ethnicity

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Introduction

The rapid decline in poverty among older people in Canada since the 1970s often is linked to the development of state social policies (Myles, 2000; Smeeding &

Sandström, 2005; Turcotte & Schellenberg, 2007). Yet poverty remains a critical social problem, especially among select subpopulations (Gazso, 2005; Veall, 2008). Elderly immigrants, particularly the recently

arrived, have been identified as one of the most vulnerable of these subgroups (Alternative Planning Group, 2009; Baker, Benjamin, & Fan, 2009). In 2006, about 30 per cent of immigrants aged 65 and older who were in Canada fewer than 20 years were living in households having incomes below Statistics Canada's Low Income Cut-off.¹ By contrast, the low-income rates of the overall elderly population in Canada on average dropped 20 percentage points from 1980 to 2003, becoming stable at around 15 per cent in the early 2000s (Turcotte & Schellenberg, 2007).

The different outcomes by nativity suggest that state social policies may unequally support older people, making immigrant seniors more vulnerable to social risks such as poverty. At the same time, responsibilities for the sustenance of the economic well-being of older people also are shared by the family (Jenson, 2004). This, too, has implications for elderly immigrants, particularly for recent arrivals who may have limited access to government income support systems. To these seniors, family assistance can play a significant role in alleviating poverty.

Although the roles of state social policies and family assistance are of long-standing interest in the study of elderly poverty, the joint impacts of the state and family on the poverty levels of elderly immigrants have received less attention. To remedy this research gap, we conducted a study of the poverty of elderly immigrants, focusing on the combined impacts of state support and family assistance.2 More specifically, we asked: to what extent does the poverty of elderly immigrants reflect state policies, and to what extent is this lack of state intervention ameliorated by family financial assistance? In answering this question, we posed three sub-questions. First, how does the poverty of elderly immigrants compare with that of the Canadian-born elders? Second, is the (expected) income disadvantage of immigrant elders relative to their Canadian-born counterparts explained by a lack of government support, and if so, to what extent? Third, to what extent is the poverty of elderly immigrants alleviated by financial help from their families? We used data from the 2006 Canadian Census of Population to address these questions.

In the analysis, we included gender and ethnicity of immigrant and Canadian-born elders to draw a nuanced picture of elderly poverty. It is widely known that older women are at higher risks of living in poverty than are their male counterparts, especially in later stages (e.g., age 75 and older) of their lives (Smeeding & Sandström, 2005). Their vulnerability to poverty is often attributed to their propensity to live alone. Our research considered whether this argument especially applies to elderly immigrant women who are known

to receive much family financial support by co-residing with their children.

This study also took into account the growing ethnic and racial diversity among older people (both Canadianborn and foreign-born). Such diversity reflects temporal changes in waves of immigration throughout the 20th and 21st century, first from European countries and then from other world regions. Such changes began in North America with legislative changes in the 1960s that removed national origins as the main criterion of admissibility, replacing it with the criteria of family reunification, humanitarian concerns, and economic contributions. By the start of the millennium, well over half of immigrants in Canada and in the United States were from countries and regions other than Europe, the latter including the United Kingdom and the Republic of Ireland. The ethno-racial composition of elderly immigrants also bears the imprint of such changes, both because immigrants arriving as adults "age in place" and because they immigrate in old age to rejoin family members (Boyd, 1991).

In addition to the impact of demographic changes in source countries, two additional rationales prompted our study of ethno-racial variations in the poverty of elderly immigrants. First, the tendency to receive family assistance varies among ethno-racial groups, reflecting cultural norms regarding elder care (Kaida, Moyser, & Park, 2009). Second, our study contributes to the ongoing discourse over the persistence of ethnic and racial stratification into old age. Historically, the two founding charter groups, the British and the French, dominated both politically and in terms of economic status, creating an ethnically stratified society. However, some researchers have now argued that the traditional hierarchy of ethnic differences has been replaced by race and color differences (Lian & Matthews, 1998). Whether race and color trump European origins among Canada's elderly population is an empirical question addressed in our research. We suspected that it might, if only because new immigrant groups increasingly are persons of color, and as recent arrivals, they are the most exposed to state regulations that prorate income assistance. Moreover, racial inequalities in the labor market (e.g., occupational segregation, pay gaps) may lead to racial income inequality in old age by reducing access to retirement incomes, including the Canada/Quebec Pension Plans and occupational pensions.

To this end, we compared the poverty levels of over 30 ethnic and racial-immigrant status groups, taking advantage of the detailed information on ethnic origins available in the 2006 Census data. Our study is an improvement on existing U.S. studies of ethno-racial variations in elderly poverty that tend to use more

aggregated ethno-racial categories, such as "Asians" and "Whites" (Elmelech & Lu, 2004; Rendall & Speare, 1995; Willson & Hardy, 2002).

State Support for Elders

In welfare states such as Canada, governments play key roles in income security for older people, particularly when they retire from the paid labor force (Lewin & Stier, 2003). Government social policies for the income security of older people typically are of three kinds: (a) universal pensions, (b) social insurance, and (c) social assistance (Smeeding & Sandström, 2005). For the most part, universal pensions are a "pay-as-you-go, flat-rate benefit" (Smeeding & Sandström, 2005), while social insurance is closely tied to the earnings histories of older individuals. Social assistance targets elders in the bottom rungs of income distributions through income supplements, usually provided by sub-national units of governments.

These three income maintenance policies are found in Canada's pension plans for seniors. First, universal pensions are available in the form of Old Age Security (OAS) – a non-contributory pension provided to any Canadian citizen or legal resident aged 65 and older who has lived in Canada for 10 years or more after age 18 (Dempsey, 2005; Service Canada, 2011). As a supplement of the OAS, the Guaranteed Income Supplement (GIS) may be provided to OAS recipients with limited or no other income. The second type of income maintenance policy is social insurance, which consists of two major pension sources: (a) the Canada/ Quebec Pension Plans (C/QPPs); and (b) occupational pensions and the Registered Retirement Savings Plans (RRSP). The C/QPPs are "supplied to past members of the labour force [who have] contributed to the plans alongside their employers" (Gazso, 2005). In order to qualify for the full C/QPP benefits, one must contribute for 40 years. Occupational pensions and RRSPs can be "sponsored by employers, labour unions, and professional organizations" by deferring wages to provide for the employees' retirement (Gazso, 2005). Although occupational pensions and RRSPs are in the private domain, the government's tacit involvement remains, given that contributions are deducted from taxable income. The third type of income maintenance policy is social assistance, for which economically constrained seniors can be eligible as part of supplementary income provided by provincial governments (Dempsey, 2005).

Canada's state support system for older people is considered successful in reducing elderly poverty (Turcotte & Schellenberg, 2007). In particular, the Canadian government's prioritization of universal pensions is credited with reducing elderly poverty and

with making the application for OAS/GIS simple and less stigmatized (Smeeding & Sandström, 2005). However, despite the overall success in reducing elderly poverty, research shows that disparities persist in the receipt of state support among seniors in Canada. Notably, immigrants, women, and ethnic minorities often are subject to institutional barriers which constrain their receipt of state support (Angel, 2003; Boyd, 1991). The following brief discussion shows how existing state support systems influence the receipt of support by immigrant elders (as well as elderly women and minority elders) in the three government strategies just described (public pensions, social insurance, and social assistance).

One way in which state support systems influence support is that the 10-year residency requirement for OAS may deter immigrant seniors from benefiting from Canada's universal pension plans; this requirement particularly affects recently arrived immigrant seniors who have not accumulated years of residence to be eligible for OAS (Boyd, 1991; Marier & Skinner, 2008). Second, Canada's social-insurance-premised programs, such as C/QPPs and occupational pensions, are problematic for elderly immigrants because of contribution requirements and disparities in availability for people in the labor force. With their relatively shorter period of participation in the Canadian labor market, elderly immigrants are less likely to receive C/QPPs because they are less likely to meet the pensions' long-term contribution requirement. In addition, as the literature on precarious employment suggests, immigrants are less likely to find jobs that are full time, permanent, in the public sector, and unionized; this implies that immigrants are less likely to receive social wages from employment, including private occupational pensions (Cranford & Vosko, 2006; Kalleberg, 2009). Moreover, inequalities faced by women and minorities throughout the life course make these vulnerable groups even more economically vulnerable in their old age (Angel, 2003; Cheal & Kampen, 1998; Gazso, 2005; Marier & Skinner, 2008; Rupp, Strand, & Davies, 2003; Wanner & McDonald, 1986). Women and minorities are more likely to encounter occupational segregation and pay gaps, and women are often burdened with unpaid work responsibilities at home, suggesting a weaker labor force attachment and less access to work-related pensions (e.g., the C/QPPs, occupational pensions) after labor force disengagement.

A third way in which state support systems influence support is that elderly immigrants, particularly recent arrivals, are affected by the government's regulations governing access to social assistance. As part of the "undertaking" contract with the federal department mandated to admit immigrants, Citizenship and Immigration Canada, sponsored immigrants, many of

whom are elderly, are not eligible for social assistance, including income security programs, for up to 10 years after arrival (Baker, Benjamin, & Fan, 2009; Boyd, 1991; Marier & Skinner, 2008). Their sponsoring families are obliged to provide financial support during this period. In addition, immigrant seniors tend to encounter difficulties in accessing government support – difficulties that may be related to their migration experience. Language barriers and lack of information are deemed major obstacles in accessing social support even when an elderly immigrant is eligible for the support (Dietz, 2001).

Family Support for Elders

As discussed previously, the state is often considered a key player in the overall reduction of elderly poverty in industrialized countries including Canada. Yet there is reason to suspect that the family is the primary institution in the private sphere serving the economic well-being of older people (Burr & Mutchler, 1999). Elderly immigrants, as well as other subgroups of elders, including women and ethnic minorities, remain vulnerable to poverty partly because of their limited access to state support. For these subgroups, family financial assistance can play a major role in alleviating poverty.

In fact, family financial support has significant implications on the economic well-being of elderly immigrants in Canada. As mentioned earlier, the Canadian government mandates families' financial support when they sponsor elderly relatives from abroad by prohibiting the receipt of government income assistance during elderly persons' first 10 years of residence in Canada. Thus, for elders who have recently immigrated to Canada through family reunification, children and other relatives (e.g., grandchildren, siblings) are the primary source of income, unless they have income from employment, and this is difficult for newcomers in the host country's labor market.

While family support is deemed crucial for the alleviation of elderly poverty in theory, empirically proving its impact is no easy task.³ Information on income received from an elderly person's family is not readily available in most survey data. Given such data limitations, researchers often use elderly individuals' living arrangements as a crude measure of the income received from kin (Rendall & Speare, 1995), even though this may lead to measurement errors (for details, see the Methods section). More specifically, for elderly persons, living with kin and forming a large household means the pooling of income as a household, and co-residence may be an effective means of escaping poverty by taking advantage of the economy of scale (Chesley & Poppie, 2009; Picot, Lu, & Hou, 2009). In

fact, Rendall and Speare (1995) found that co-residence with extended families reduced elderly poverty in the United States by as much as 42 per cent. There are no comparable studies in Canada. However, in their review of low-income trends among immigrant seniors, Picot et al. (2009) conjectured that the temporal declines over the past 25 years could partly reflect the observed temporal increases in the tendency of the foreign-born elderly to live in multigenerational households.

Our present study adopted Rendall and Speare's (1995) approach and used living arrangements as a measure of family support. We expected that poverty among immigrant elders was alleviated to some degree because of their patterns of living arrangements (i.e., higher propensities towards co-residence with kin), even though their actual poverty levels were high.

In this article, we also considered ethnic-racial and gender variations in the propensity towards co-residence with kin among the elderly. There is ample evidence in the literature on aging that co-residence with kin is prevalent among some ethno-racial groups in North America, including Hispanics, Blacks, Chinese, Greeks, Italians, Portuguese, and South Asians, particularly among women (See Angel & Tienda, 1982; Burr & Mutchler, 1993, 1999; Lee & Angel, 2002; Wilmoth, DeJong, & Himes, 1997, for U.S. cases; see Gerber, 1983; Kaida, Moyser, & Park, 2009; Ng, Northcott, & Abu-Laban, 2007; Thomas & Wister, 1984, for Canadian cases). In contrast, independent living (e.g., living only with spouse, living alone) is more prevalent among Northern Western European groups, including British, German, and Dutch origin groups.

Quantitative research in aging has sought to rigorously explain such ethno-racial variations in elderly living arrangements over the past two decades. Two streams of explanations dominate the literature. The first explanation is that the different patterns of living arrangements among elders reflect cultural preferences; elders from cultures that emphasize family-oriented values are more likely to live with their children or other relatives, whereas elders from cultures that emphasize an individual's privacy tend to live independently. The second explanation posits that co-residence with kin is a strategy to cope with economic constraints – a strategy that prevalently is adopted by older people who lack economic resources due to their disadvantageous standings in the society (e.g., ethno-racial minorities, women). A recent study by Kaida et al. (2009) has found that both cultural preferences and economic constraints influence variations in living arrangements among the elderly of the seven select ethnic groups in Canada (British, Dutch, Germans, Italians, Chinese, East Indians, and South Asians). However, the relative importance of these two explanatory factors varies by marital status. Cultural preferences explain variations in living arrangements among the elders from these seven ethnic groups to a greater extent for married elders, whereas economic constraints explain those variations among non-married elders.

We considered such known variations by splitting the elderly population (both immigrants and the Canadian-born) by ethno-racial origin. We expected that some groups (e.g., Italians, Portuguese, Greeks, Chinese, South Asians) known for their higher propensity towards co-residence with kin were perhaps protected from poverty to some degree. Put differently, if elders of these ethnic groups had the same distributional characteristics of living arrangements as the mainstream elderly population (Canadianborn of British descent), their chances of falling into poverty would be higher. We performed analysis separately by gender.

Methods

Data and Sample

To address our research questions, we analyzed data from the 2006 Census Public Use Micro-data File (PUMF) of individuals.⁴ In this database, a 2.7 per cent sample of the population was enumerated in the 2006 census of population with information on approximately 844,000 individual respondents of all ages. Unlike the U.S. census public use file, it was not amenable to the construction of a hierarchal file in which all members of a family unit could be identified. Although two separate family and household files also were produced by Statistics Canada for earlier censuses, the data on these files were highly aggregated, preventing their use in our study.

We restricted our sample to non-Aboriginal persons aged 70 and older, who were permanent residents of Canada, and who were members of private households. We selected persons aged 70 and older at the time of the census (May 2006) for two reasons. First, we needed to ensure that everyone in our sample had fully turned 65 and older by January 2005 and was eligible to receive the government retirement incomes (e.g., Old Age Security) throughout 2005 (total family income for 2005 was used by the census to determine low-income status). This requirement automatically restricted the age group to those aged 67 and older at the census date. Second, the 2006 Census PUMF coded age in five-year intervals. This practice meant that we could not select those aged 67 and older; instead, our analysis focused on those aged 70 and older.

Permanent residents included non-immigrants (Canadian citizens by birth) and immigrants (persons

granted the right to live in Canada permanently by immigration authorities). Excluded from the analyses were those who were not permanent residents of Canada (persons from another country admitted temporarily for purposes of employment, study, or who were seeking admission on humanitarian grounds as refugee claimants) and those who resided in collective dwellings. We also excluded those who resided in the Territories, and those who immigrated in 2005 or 2006. Residents of the Territories were excluded because of the non-existence of information on low-income status for these geographical areas in the Public Use Microdata File (Statistics Canada, no date). For the same reason, immigrants who arrived in 2005 and 2006 were omitted from our analysis.

In our multivariate analysis, we compared the poverty levels of elders, who were divided into a total of 31 groups by nativity, immigration history, and ethnicracial origins (for both women and men). To highlight the situations of immigrants versus those of the nativeborn population, we used responses to the census question on ethnic origins as our measure of diversity rather than birthplace; ethnic data were collected by the census for all respondents unlike birthplace data, which was available only for the foreign born. The Canadian census question probed ancestral origins; however, both historically (Ryder, 1955) and today, religious and racialized labels, such as Jewish, Chinese, Vietnamese, and Black, also were tabulated as valid responses. The comparison of these 31 ethno-racial groups allowed us to consider varied degrees of state support and family support which were perhaps associated with immigration experience and ethno-cultural heritage, as we discussed. Ethno-racial and nativity groups that had 65 (unweighted) observations or more for both women and men stood as separate groups, while groups not meeting this sample size requirement were aggregated as "others" (Table 1, columns 5–6).

For the foreign-born, after dividing them by ethnic origins, we categorized the ethnic origin groups into two broad groups based on the groups' migration histories at the time of the 2006 Census: "old" waves and "new" waves of immigration. We used the term wave to refer to a movement of people typically from a specific set of countries in a given period of time. In this article, the old wave refers to the groups that immigrated mostly before the 1970s - groups of immigrants from European countries. In contrast, the new wave referred to those groups immigrating in large scale since the 1970s, following the elimination of the restriction on immigration based on national origin in the late 1960s (Boyd, 1976; Green & Green, 1999; Marier & Skinner, 2008). The new waves had predominantly non-European origins, primarily from Asia, but they also included the Caribbean, the Middle East, and Africa. Unlike the

Table 1: Percentage and frequency distributions of ethnic-nativity groups, for ages 70 and older

Population Groups	Population Estim	nates	Weighted (%) ^a	Unweighted (N)		
	Women	Men	Women	Men	Women	Men	
	(1)	(2)	(3)	(4)	(5)	(6)	
			100	100			
Canadian-born	1,091,000	796,000	70.9	68.7	29,500	21,518	
Foreign-born "Old" Waves	236,000	199,000	15.3	1 <i>7</i> .1	6,383	5,369	
Foreign-born "New" Waves	93,000	72,000	6.0	6.2	2,513	1,953	
Foreign-born Others ^b	118,000	92,000	7.7	8.0	3,193	2,496	
Canadian-born			100	100			
British	203,000	166,000	13.2	14.3	5,478	4,479	
French	93,000	73,000	6.0	6.3	2,514	1,980	
Dutch	4,000	4,000	0.3	0.4	113	112	
German	38,000	30,000	2.5	2.6	1,024	810	
Norwegian	5,000	4,000	0.3	0.4	144	110	
Polish	11,000	7,000	0.7	0.6	286	182	
Ukrainian	31,000	23,000	2.0	2.0	850	612	
Italian	11,000	8,000	0.7	0.7	306	221	
Jewish	6,000	6,000	0.4	0.5	171	155	
Other single origins ^c	303,000	208,000	19.7	18.0	8,202	5,631	
Multiple origins	385,000	267,000	25.0	23.1	10,412	7,226	
Foreign-born "Old" Waves							
British	<i>77,</i> 000	52,000	5.0	4.5	2,090	1,401	
French	5,000	4,000	0.3	0.4	127	115	
Dutch	19,000	1 <i>7</i> ,000	1.2	1.5	516	455	
German	34,000	31,000	2.2	2.7	925	834	
Hungarian	6,000	6,000	0.4	0.6	163	1 <i>75</i>	
Polish	13,000	10,000	0.8	0.8	348	257	
Ukrainian	8,000	6,000	0.5	0.6	225	173	
Greek	8,000	9,000	0.5	0.7	219	230	
Italian	47,000	48,000	3.1	4.2	1,272	1,305	
Portuguese	12,000	11,000	0.8	0.9	335	286	
Jewish	6,000	5,000	0.4	0.4	163	138	
"New" Waves							
Jamaican	4,000	3,000	0.3	0.2	106	72	
Other Caribbean	5,000	3,000	0.3	0.2	140	75	
Other West Asian	5,000	5,000	0.3	0.4	143	128	
East Indian	20,000	18,000	1.3	1.6	537	489	
Other South Asian	4,000	4,000	0.3	0.3	11 <i>7</i>	106	
Chinese	47,000	36,000	3.1	3.1	1,271	979	
Filipino	7,000	4,000	0.5	0.3	199	104	
Other single origins	53,000	44,000	3.4	3.8	1,423	1,185	
Multiple origins	65,000	49,000	4.3	4.2	1,770	1,311	

^a Percentages may not add up to 100 due to rounding errors.

Source: Authors' calculation from the 2006 Census Public Use Microdata File (PUMF) of individuals

^b Includes Canadian, provincial, or regional origins; Latin, Central, and South American origins; other Western European origins; Swedish, Norwegian, Danish, Finnish, other Northern European origins; Russian, Romanian, other Eastern European origins; Spanish, other Southern European origins; African origins; Lebanese, other Arab origins; Korean, Vietnamese, other East and Southeast Asian origins; all other single-response origins; and multiple origins.

c Includes Canadian, provincial, or regional origins; Latin, Central, and South American origins; other Western European origins; Swedish, Danish, Finnish, other Northern European origins; Hungarian, Russian, Romanian, other Eastern European origins; Greek, Portuguese, Spanish, other Southern European origins; African origins; Lebanese, other Arab origins; Korean, Vietnamese, other East and Southeast Asian origins; and all other single-response origins.

United States, Canada has not had a long and sustained history of migration from Mexico or from other Central and South American countries; consequently, the small, current Hispanic populations were collapsed into other single origins or multiple origin groups. Those foreign-born single origin ethno-racial groups (both new and old waves) that had fewer than 65 cases for both women and men were collapsed into "the other single origin group." The foreign-born with multiple ethnic origins (e.g., Canadian, British, French, and provincial origins only) were also collapsed into the "multiple origin groups."

Dependent Variable

The focal dependent variable was the respondent's low-income status. This variable measures the economic well-being of the household in which the individual resided.⁶ The variable was coded as 1 if the total income (before tax) of a respondent's economic family (or income of a person not in an economic family) in 2005 was below the low-income cut-off point, and otherwise coded as 0 (reference group).

Statistics Canada determines the low-income cut-offs (LICOs) using family size and the size of area of residence. Family size can range from one to seven or more members. The size of area of residence is categorized into five groups: (a) rural (farm and non-farm); (b) small urban regions; (c) a population of 30,000 to 99,999; (d) a population of 100,000 to 499,999; and (e) a population of 500,000 or more. The combination of these two factors produces 35 possible income cut-offs. If the total income of an economic family (or a person not in an economic family) is below the LICO that applies to the family, all family members are considered below the LICO.

Conceptually, LICOs are constructed according to the proportion of annual family income spent on food, shelter, and clothing. An income threshold is set at 20 percentage points higher than the proportion of the income spent on essentials by the average family. Currently, LICOs are based on the 1992 Family Expenditures Survey, which showed that the average family spent 43 per cent of its after-tax income on the aforementioned daily necessities. Therefore, if a family spends more than 63 per cent (43% + 20%) of its after-tax income on food, shelter, and clothing, all family members are considered to be in "straitened circumstances" (Statistics Canada, 2004). Statistics Canada has cautioned that LICOs are not "a de facto definition of poverty", although researchers often use LICOs in their discussions of poverty in Canada (Statistics Canada, 2004).

Independent Variables

As we have indicated, our study compared the impacts of state and family support for the variations in poverty levels among the elderly. Given the information available in the census PUMF, we used four sources of retirement incomes as proxies of state support. The four sources were (a) OAS/GIS; C/QPPs; (b) other government sources (including all transfer payments; for details refer to Statistics Canada, 2004: 161); (c) retirement pension plans and superannuation, and (d) annuities. We expected that a lack of income from OAS/GIS, C/QPPs, or retirement pensions increased the chance of living in low-income households. By contrast, other government sources of income, such as social assistance payments, were offered on the basis of financial need, and the absence of income from other government sources thus implied economic advantage.

As mentioned earlier, family support was represented by a respondent's living arrangements, on the assumption that elders living with kin received income support from their co-residing family members, whereas elders not living with kin presumably had no such support. Admittedly, the use of living arrangements as a measure of family support was a risk for making errors in our measurements, since elderly persons perhaps received financial support from their kin, even if they were not in the same household. However, given the absence of information on kin-based income assistance in the census, we argued that living arrangements were the best available measure of family support from census data. We constructed the living arrangement variable from household type, census family type, and marital status variables in the census data. This produced seven mutually exclusive categories: (a) living in a family of a married or common-law couple without children (the reference group); (b) living in a family of a married or common-law couple with children; (c) lone-parent family; (d) multiple-family household; (e) living in a non-family household with relatives; (f) living in a non-family household with non-relatives only; and (g) living in a non-family household alone.

Control Variables

Our multivariate analyses controlled for distributional differences among groups in age, language use, highest level of education, city of residence, and year last worked. For the elderly population, advancing age could have increased the propensity for low incomes because of dwindling or non-existent retirement funds and/or pensions (Dodge, 1995). Language also was expected to influence elder poverty because of its impact on past labor market experiences. (The ability to use one or both of Canada's charter languages, English and French, is a form of human capital, enlarging employment opportunities and reducing the likelihood of low income later in life.) We constructed a language use variable from three 2006 Census PUMF

variables: (a) the knowledge of official language(s); (b) language spoken most often at home; and (c) language spoken regularly at home. The language use variable consisted of four levels: Level 1 (highest) – knew official language(s), spoke English and/or French most often and regularly at home; Level 2 – knew official language(s), spoke English and/or French most often and spoke other languages regularly at home; Level 3 – knew official language(s), spoke other languages most often, and spoke English and/or French regularly at home; and Level 4 (lowest) – knew official language(s) and spoke other languages most often and regularly at home, or knew neither official language.

Following past studies of elderly poverty, we also controlled for education (Lewin & Stier, 2003; Rupp et al., 2003). It was expected that a lower level of education would result in limited opportunities in one's life course, which could lead to higher levels of poverty in old age. The impact of local labor markets was captured by city of residence. (Large cities, represented in our study by census metropolitan areas (CMAs), have more extensive knowledge-based economies than smaller towns, and could have offered better employment opportunities to their residents.) Finally, the "year last worked" variable captured the effects of the incidence of unemployment or being out of the labor force.

Analytical Technique

Given that the dependent variable was dichotomous (the total income of an economic family or income of a person not in an economic family being below LICOs versus above LICOs), we employed binary logistic regression to estimate models. We performed logistic regression analyses using a weighting variable that was included on the PUMF to provide population estimates. However, we adjusted this weight by dividing it by a number that represented the unweighted number of cases in the PUMF for the elderly population of interest; this procedure produced normalized weights with a mean of 1. Using normalized weights provided statistical estimates that were representative of the Canadian population of interest but where significance levels were those that would be expected on the basis of the sample size. This avoided overestimating levels of significance for estimates produced in the multivariate analysis. The analyses and the adjustment of the weight variable were conducted separately by gender. Women were more likely to be poor than men, and U.S. research found gender poverty gaps among particular ethnic groups to be related to ethnically based disadvantages faced by females (Elmelech & Lu, 2004).

Results

A First Look

Our study focused on a sample of respondents aged 70 years and older. The majority of seniors in our sample were born in Canada, with the Canadian-born of British origins comprising more than 10 per cent of the sample (Table 1, columns 3 and 4). Within the foreign-born, some ethnic minority groups (Germans, Italians, and Chinese) comparatively had large representations, yet none exceeded 10 per cent of the total sample.

Moreover, we found sizeable distributional differences in select characteristics of the Canadian-born, the "old", and the new waves of immigrants (Table 2, columns 1 to 6). Overall, elders from the new waves of immigration were more likely to lack OAS/GIS, C/QPPs, and retirement pensions than the Canadian-born and the foreign-born from old waves of immigration. In fact, immigrant seniors from old waves showed patterns of the receipt of state support similar to those of Canadian-born seniors.

Such differences between old and new waves of the foreign-born elderly might have reflected differences in their length of residency in Canada. On the one hand, the majority of old-wave seniors had a long period of residence in Canada (e.g., more than 40 years) in comparison to new-wave seniors, who were more likely to have arrived in recent years. The old-wave elders were more likely to have accumulated years of residency and labor market experience in Canada and, hence, were more likely to be eligible for retirement pensions. On the other hand, new-wave elders were more likely to have a shorter period of residence in Canada, and their limited host country labor market experience might have led to a lower probability of receiving retirement incomes.

Gender differences in select characteristics also existed among the elderly population of interest. Overall, elderly women were less likely than men to live only with their spouses, or to receive C/QPPs or retirement pensions (Table 2, columns 1, 3, and 5). In addition, these characteristics varied by immigrant status; more recent arrivals were less likely to receive OAS/GIS, C/QPPs, or retirement pensions, and to live independently (columns 5 and 6).

What can be said about the variations in the select characteristics in poverty rates, defined as the percentages living in households where total annual incomes were below the Statistics Canada LICOs? Table 2 shows these percentages for the Canadian-born and old and new waves of immigrants separately for women and men (columns 7 to 12). In general, the poverty rates of elderly women were substantially higher than those of their male counterparts across all three immigrant status

Table 2: Select descriptive statistics and mean % poverty, the Canadian-born and the foreign-born, aged 70 and older by immigrant status and sex

	Percentage Distribution						Mean % Poverty					
	Canadian-born Group		Foreign-born "Old" Group		Foreign-born "New" Group		Canadian-born Group		Foreign-born "Old" Group		Foreign-born. "New" Group	
	Women (1)	Men (2)	Women	Men (4)	Women (5)	Men (6)	Women (7)	Men (8)	Women (9)	Men (10)	Women (11)	Men (12)
			(3)									
Receipt of OAS/GIS	100	100	100	100	100	100						
Yes	99	96	98	96	88	86	3	3	1 <i>7</i>	4	25	26
No	2	4	2	4	13	14	19	7	19	8	27	22
Receipt of C/QPPs	100	100	100	100	100	100						
Yes	87	96	87	95	48	60	1 <i>7</i>	6	17	7	24	18
No	13	4	14	5	52	40	31	33	30	32	29	31
Receipt of Other Income from other Govt. Sources (including transfer payments)	100	100	100	100	100	100						
Yes	56	55	57	61	80	78	32	13	31	13	31	29
No	44	45	43	39	21	22	2	0	3	0	12	4
Receipt of Retirement Pension or Others	100	100	100	100	100	100						
Yes	61	75	63	78	23	35	9	2	9	3	13	9
No	39	25	38	22	77	65	35	22	34	26	31	31
Living Arrangement	100	100	100	100	100	100						
Married, no children	35	65	38	65	15	35	2	2	5	5	34	34
Married, living with children	3	7	5	11	7	19	2	3	2	4	15	15
Lone parent family	8	2	8	2	11	2	11	8	13	8	25	13
Multiple-family household	1	1	2	3	18	27	3	1	5	5	7	9
Living with relatives ^a	6	2	7	3	32	10	3	4	4	3	9	10
Living with non-relatives only ^a	2	2	1	1	1	1	36	22	39	23	77	59
Living alone ^a	46	20	39	15	1 <i>7</i>	7	43	36	37	36	79	74

^a Non-family households

C/QPP = Canada or Quebec Pension Plan; OAS/GIS = Old Age Security/Guaranteed Income Supplements Source: Authors' calculation from the 2006 Census PUMF of individuals

groups (columns 7, 9, and 11 versus columns 8, 10, and 12). The lack of C/QPPs and retirement pensions was associated with the high incidence of poverty (approximately 30%), while association between the receipt of the OAS/GIS and poverty levels was less clear, particularly for women. Moreover, a high concentration of low income was observed among the elderly living alone. In particular, the percentage of unattached elderly women (living alone or with non-relatives) living in low-income households was exceptionally higher than that of the elderly women who had other living arrangements.

Multivariate Analyses

We used logistic regression analysis to examine immigrant and ethnic variations in poverty levels of the elderly after statistically adjusting for group differences in demographic and socioeconomic characteristics. For the convenience of interpretation of results, we converted logits into odds ratios and report odds ratios

only. The odds ratios greater than one indicate a higher probability of poverty than the reference group, whereas the odds lower than one means a lower probability of poverty. For reasons of parsimony, the analytical results are presented only for the immigrant-ethnic groups; the full regressions, including logits for the control variables, are available upon request.

In this analysis, we compared immigrant-ethno-racial origin groups with their Canadian-born counterparts of British origin (English, Irish, Scottish, and other British origins). From the mid-1600s on, the British and French were the two major European settler groups in Canada, with the British consolidating economic and cultural control after the defeat of the French in Quebec City during the Seven Years War (1759). Because of its historical and contemporary dominance as a privileged population, we used the British origin group as the reference group in the logistic regression analysis (Nakhaie, 2006; Porter, 1965).

Table 3: Odds ratios of being in low income, for women and men, age 70 and older by ethnic-immigrant groups

	Women				Men				
	Model 1 Baseline (1)		Model 2	Model 2		Model 1		Model 2	
			Full Model ^a		Baseline		Full Model ^a		
Population Groups			(2)		(3)		(4)		
Canadian-born									
British	rg		rg		rg		rg		
French	1.78	***	1.58	***	1.67	***	1.03	ns	
Dutch	0.77	ns	0.78	ns	1.30	ns	1.55	ns	
German	1.31	ns	1.07	ns	1.01	ns	0.90	ns	
Norwegian	1.02	ns	0.96	ns	1.15	ns	1.16	ns	
Polish	1.49	**	0.99	ns	1.29	ns	0.85	ns	
Ukrainian	1.64	***	1.26	ns	1.43	*	1.00	ns	
Italian	1.61	***	1.27	ns	1.42	ns	1.05	ns	
Jewish	1.02	ns	0.88	ns	1.41	ns	1.03	ns	
Other single origins	1.87	***	1.38	***	1.68	***	1.14	ns	
Multiple origins	1.19	***	1.12	ns	1.03	ns	0.94	ns	
Foreign-born							• • • • • • • • • • • • • • • • • • • •		
"Old" Waves									
British	1.06	ns	1.08	ns	1.07	ns	1.15	ns	
French	1.94	**	1.58	ns	2.32	**	1.01	ns	
Dutch	0.79	ns	0.63	*	0.77	ns	0.63	ns	
German	1.19	ns	1.18	ns	0.76	ns	0.73	ns	
Hungarian	1.34		0.69		1.80	*	0.84		
Polish	2.15	ns ***	1.09	ns	1.90	**		ns	
	2.13	***	1.28	ns	1.73	*	1.25 1.20	ns	
Ukrainian		***		ns ***		***		ns	
Greek	2.51	***	2.09		4.11	**	1.27	ns	
Italian	1.50	**	1.06	ns *	1.40	***	0.76	ns	
Portuguese	1.52	***	1.54		2.04	***	1.19	ns	
Jewish	3.20	^ ^	1.53	ns	4.49	* * *	1.82	ns	
"New" Waves	0.00	***	0.05	*	4.70	***	0.00	*	
Jamaican	2.38		2.05	* ***	4.78		2.23	*	
Other Caribbean	3.11	***	2.37		4.61	***	1.89	ns	
Other West Asian	3.76	***	1.71	*	7.97	***	2.26	**	
East Indian	1.49	***	1.63	**	3.54	***	2.53	***	
Other South Asian	1.72	*	1.31	ns	4.69	***	2.16	*	
Chinese	2.48	***	1.57	***	5.83	***	1.68	**	
Filipino	1.20	ns	0.80	ns	2.88	***	1.37	ns	
Other single origins	2.12	***	1.40	**	3.07	***	1.59	**	
Multiple origins	1.47	***	1.43	***	1.54	***	1.20	ns	
–2 Log likelihood	40629.9		23249.2		1.54 17518.1		100071.4	115	
-2 Log likelinood df	30		23249.2 55		30		55		
aı	30		55		30		55		

^a Controlled for: age, education, language proficiency, place of residence, year last worked, retirement incomes, and living arrangements

Source: Statistics Canada, 2006 Census PUMF of individuals

Most immigrant groups as well as the Canadian-born of non-British origins have significantly higher probabilities of living in low-income households than do the Canadian-born of British origins. This is apparent from the odds ratios that are greater than one in Model 1 in Table 3 (column 1 for women and column 3 for men).

Our logistic regression analysis confirms that such poverty gaps are explained largely by demographic and socioeconomic differences between the Canadian-born British origin group and other ethnic-immigrant groups. Comparisons of unadjusted (columns 1 and 3) and adjusted (columns 2 and 4) models in Table 3 show that

^{*}p < .05; **p < .01; ***p < .001

df = degree of freedom

ns = not significant at p = .05 level; significance levels are based on logits

rg = reference group

once distributional differences in demographic and socioeconomic characteristics (including retirement incomes and living arrangements) are taken into account, the (logged) likelihood of experiencing low income relative to the Canadian-born of British origins declines; in many instances, the differences are not statistically significant.

Nonetheless, two patterns remain after taking group compositional differences into account. First, diminished immigrant-ethnic variation in poverty is more pronounced among Canadian-born and immigrant (from old waves) men than their female counterparts. For men, poverty gaps of all Canadian-born groups and old waves of immigrant groups in comparison to the reference group become non-significant when their socio-economic and demographic characteristics are considered. This implies that higher poverty rates for men in these groups reflect their observed compositional differences more than is the case for women. A second pattern of note is that, for both women and men, elders of new waves of immigration maintain significantly higher propensities to live in low-income households even after controlling for demographic and socioeconomic characteristics. In particular, Jamaican, other West Asian, and East Indian immigrant groups have significantly high poverty levels.

Although Table 3 suggests group-specific demographic and socioeconomic characteristics are factors in explaining immigrant-ethno-racial variation in elder poverty, these analytical results do not demonstrate how state support and family support affect the varied poverty levels among the 31 ethnic-immigrant groups of interest. To clarify the impacts of state support and family support separately, we calculated probabilities of being in poverty using two scenarios. First, we obtained probabilities of poverty for the ethnic-immigrant groups of interest assuming that they had the same state support (i.e., a higher propensity to receive OAS/ GIS, C/QPPs, retirement pensions or others, and lower propensity to receive income from other government sources) as the Canadian-born of British origins. For other demographic and socioeconomic characteristics including living arrangements, we used proportional distributions specific to each ethnic-immigrant group. In our second scenario, we computed hypothetical probabilities of living in low-income households, assuming that each group of interest had the same living arrangement characteristics as the Canadian-born of British origins – a tendency towards independent living suggested a lesser degree of financial support from kin. As in the first hypothetical scenario, we used group-specific proportional distributions of other demographic and socioeconomic characteristics (including retirement incomes).

As the percentages in column 2 in Table 4 and 5 suggest, the poverty levels of most groups of the elderly would be lower if they received the same retirement incomes as the Canadian-born of British origins.⁸ In particular, the poverty levels of new immigrant groups, many of whom have racialized ethnic origins, would be much lower both in absolute and relative terms. Overall, the poverty levels of elderly men of new waves of immigration are lower than those of their female counterparts, but they too face sizeable inequalities in the receipt of retirement incomes.

The spike in poverty rates among elderly immigrants from new waves is striking: poverty levels would increase by 70 to 430 per cent (in percentage change) if new-wave immigrants had the same living arrangements distribution as the Canadian-born of British origins (i.e., a higher propensity towards independent living; see Tables 4 and 5, column 6). The findings suggest that these elderly immigrant groups are protected from poverty because of their living arrangements which include a higher propensity to live with kin. In particular, because of their living arrangements, women of these groups are far less likely to be living in households that are below the LICOs; without these living arrangements, the incidence of poverty would increase by 70 to 430 per cent (in percentage change) for these women (Table 4, column 6). It is also of note that immigrants of Portuguese, Italian, and Greek origins (some of the old-wave groups known for their tendencies to form extended families) would be less well off if they had the same living arrangement characteristics as the Canadian-born British.

Since both state support and family support demonstrably influence the poverty levels of elderly immigrants, we asked which factor had the greater influence on the ethnic-immigrant variations in poverty levels. The proportional reductions in the -2 log likelihood from the baseline model (Table 3) to sequential models (in which either retirement incomes or living arrangements are added to the baseline model) suggest that state support and family support equally influence ethnic-immigrant variations in poverty for women, whereas family support has lesser impact than state support on the poverty levels of men.9 The relatively large effect of family support on women reinforces the argument that the poverty of elderly women can be explained by variations in living arrangements which, in turn, reflect differences in economic welfare between elderly women living independently (e.g., living alone) and those living with kin (e.g., living with children).

Conclusion

In this article, we have examined the impacts of state support and family assistance on the poverty levels of

Table 4: Percent reduction^a in the poverty gap between the Canadian-born British and other ethnic-immigrant groups, for women, age 70 and older*

	Using Distribution of Own Group	Substituting for CB British Distribution (pensions only)	Predicted % Change	Predicted % Point Change	Substituting for CB British Distribution (living arrangement only)	Predicted % Change	Predicted % Point Change	
Population Groups	(1)	(2)	(3)	(4)	(5)	(6)	(7)	
Canadian-born								
British	3.3	rg			rg			
French	7.8	6.3	-19.9	-1.6	7.8	0.0	0.0	
Dutch	2.5	2.4	-4.2	-0.1	2.4	-4.9	-0.1	
German	4.3	3.7	-13.9	-0.6	3.9	-9.1	-0.4	
Norwegian	2.8	2.7	-3.9	-0.1	2.7	-2.1	-0.1	
Polish	5.5	4.4	-19. <i>7</i>	-1.1	4.9	-10.4	-0.6	
Ukrainian	6.4	5.3	-17.3	-1.1	5.6	-12.1	-0.8	
Italian	6.9	6.4	-8.2	-0.6	7.7	10.6	0.7	
Jewish	3.4	6.2	79.0	2.7	2.9	-14.6	-0.5	
Other single origins		5.8	-31.5	-2.7	7.8	-7.9	-0.7	
Multiple origins	4.1	4.1	-0.2	0.0	3.7	-9.8	-0.4	
Foreign-born			0.2	0.0	0.7	7.0	0.4	
"Old" Waves								
British	3.6	4.4	22.9	0.8	3.5	-3.9	-0.1	
French	8.9	8.8	-1.1	-0.1	8.3	-7.0	-0.6	
Dutch	1.9	2.1	7.4	0.1	2.2	15.3	0.3	
German	4.3	4.8	11.4	0.5	4.5	3.6	0.3	
Hungarian	5.3	4.6	-11.4 -11.9	-0.6	4.5	-14.0	-0.7	
Polish	11.4	6.3	45.0	-5.1	11.6	1.4	0.2	
Ukrainian	15.9	8.0	-49.6	-3.1 -7.9	14.7	-7.5	-1.2	
		8. <i>7</i>		-7.9 -8.1			—	
Greek	16.8		-48.3		32.0	89.9	15.1	
Italian	7.8	5.7	-26.6	-2.1	12.5	59.9	4.7	
Portuguese	8.3	4.1	-50.5	-4.2	23.4	182.0	15.1	
Jewish	18.6	12.2	-34.3	-6.4	16.9	-9.2	-1.7	
"New" Waves	1.4.7	5.0	40.5	0.0	01.0	110.7	1 / /	
Jamaican	14.6	5.3	-63.5	-9.3	31.2	113.7	16.6	
Other Caribbean	24.9	7.1	-71.7	-17.9	50.1	101.2	25.2	
Other West Asian	28.8	7.2	-74.9	-21.5	49.8	73.2	21.1	
East Indian	10.3	1.9	-81.4	-8.4	46.2	347.6	35.9	
Other South Asian	13.2	1.6	-87.6	-11.6	53.5	304.1	40.3	
Chinese	18.6	3.4	-81.8	-15.2	51.4	176.5	32.8	
Filipino	6.4	0.8	-86.9	-5.6	33.9	428.0	27.5	
Other single origins	: 11.9	5.7	-52.3	-6.2	17.8	50.3	6.0	
Multiple origins	6.3	5.1	-19. <i>7</i>	-1.2	7.8	23.9	1.5	

^a Calculation based on the logits in Model 2, Table 3 (column 2)

immigrant and Canadian-born elders, paying close attention to gender and ethno-racial variations. Results of our logistic regression analyses of the 2006 Census PUMF show that poverty levels among elderly immigrants – particularly those from new waves of immigration—are, on average, higher than those of the mainstream

Canadian-born of British descent. This finding is partly explained by the reduced sources of retirement incomes other than OAS/GIS. Our results also demonstrate that the new waves of immigrants with racial labels are protected from poverty to a substantial degree because of their living arrangements (i.e., propensity towards

^{(3) = [(2) - (1)]/(1) * 100; (4) = (2) - (1)}

^{(6) = [(5) - (1)]/(1) * 100; (7) = (5) - (1)}

CB = Canadian-born

rg = reference group

^{*} Readers may not obtain the same percentage changes shown in columns 3 and 6 if they attempt calculation using the figures in columns 1, 2, and 5 and formulae provided earlier. This is purely due to rounding. For details, please refer to Note 8. Source: Statistics Canada, 2006 Census PUMF of Individuals

Table 5: Percent reduction^a in the poverty gap between the Canadian-born British and other ethnic-immigrant groups, for men, age 70 and older*

	Using Distribution of Own Group	Substituting for CB British Distribution (pensions only)		Predicted % Point Change	Substituting for CB British distribution (living arrangement only)	Predicted % Change	Predicted % Point Change	
Population Groups	pulation Groups (1)		(3)	(4)	(5)	(6)	(7)	
Canadian-born								
British	0.7	rg			rg			
French	1.2	0.9	-22.9	-0.3	1.1	-6.8	-0.1	
Dutch	0.9	0.8	-13.7	-0.1	1.0	11.9	0.1	
German	0.7	0.5	-25.5	-0.2	0.7	4.8	0.0	
Norwegian	0.8	0.6	-24.4	-0.2	0.8	8.2	0.1	
Polish	0.9	0.7	-15.4	-0.1	0.8	-7.8	-0.1	
Ukrainian	1.1	0.8	-33.7	-0.4	1.0	-9.8	-0.1	
Italian	1.1	1.1	4.0	0.0	1.2	11.3	0.1	
Jewish	0.8	1.4	64.0	0.5	1.0	13.9	0.1	
Other sing`le origins	1.4	0.8	-40.0	-0.5	1.4	3.2	0.0	
Multiple origins	0.6	0.6	4.9	0.0	0.6	4.3	0.0	
Foreign-born	0.0	0.0		0.0	0.0		0.0	
"Old" Waves								
British	0.7	1.0	38.4	0.3	0.7	5.0	0.0	
French	1.7	1.4	-16.7	-0.3	1.7	-0.4	0.0	
Dutch	0.6	0.4	-26.0	-0.1	0.6	13.0	0.1	
German	0.6	0.6	4.7	0.0	0.6	7.4	0.0	
Hungarian	1.7	1.0	-37.7	-0.6	1.7	2.8	0.0	
Polish	1.9	1.3	-37.7 -32.7	-0.6 -0.6	2.2	12.4	0.0	
Ukrainian	1.9	1.1	-32.7 -41.6	-0.8 -0.8	2.3	21.9	0.4	
Greek	7.1	1.7	-76.4	-5.4	13.6	90.2	6.4	
Italian	1.9	1.0	-70.4 -47.5	-0.9	2.9	53.7	1.0	
	2.9	1.1	-47.3 -61.4	-0.9 -1.8	5.8	104.3	3.0	
Portuguese Jewish	4.5	2.9	-36.9	-1.0 -1.7	5.2	15.6	0.7	
"New" Waves	4.5	2.9	-30.9	-1.7	3.2	13.0	0.7	
Jamaican	5.7	2.3	-59.2	-3.4	9.3	62.0	3.5	
				-3.4 -3.2				
Other Caribbean	6.0	2.8	-53.9		9.0	50.0	3.0	
Other West Asian	17.7	2.3	-87.0 0.4.7	-15.4	33.3	87.6	15.5	
East Indian	6.3	1.0	-84.7	-5.3	25.6	307.7	19.3	
Other South Asian	10.3	0.8	-92.1	-9.5	38.2	270.0	27.9	
Chinese	12.4	1.3	-89.6	-11.1	30.8	148.3	18.4	
Filipino	4.5	0.5	-88.6	-4.0	19.8	336.2	15.3	
Other single origins	3.8	1.6	-58. <i>7</i>	-2.2	5.4	41.2	1.6	
Multiple origins	1.0	1.0	-4.0	0.0	1.3	24.0	0.3	

^a Calculation based on the logits in Model 2, Table 3 (column 4).

This is purely due to rounding. For details, please refer to Note 8.

Source: Statistics Canada, 2006 Census PUMF of Individuals

co-residence with kin) even though their poverty levels are high relative to Canadian-born seniors of British origins. In particular, elderly women of Filipino, East Indian, and other South Asian origins benefit from co-residence with kin. Furthermore, we find that while state and

family support equally influence the poverty of elderly men, family support explains a greater proportion of the variation in the poverty of elderly women.

This study makes two contributions to the literature on aging and the literature on immigrant economic

^{(3) = [(2) - (1)]/(1) * 100; (4) = (2) - (1)}

^{(6) = [(5) - (1)]/(1) * 100; (7) = (5) - (1)}

CB = Canadian-born

rg = reference group

^{*} Readers may not obtain the same percentage changes shown in columns 3 and 6 if they attempt calculation using the figures in columns 1, 2, and 5 and formulae provided.

incorporation. First, it extends the literature on aging by considering simultaneously the impacts of state and family support on the economic well-being of the elderly. Although the economic impact of either state support or family support among recent immigrants has been examined in previous research (Gazso, 2005; Lewin & Stier, 2003; Rendall & Speare, 1995), these supports are seldom considered together in multivariate analyses of the economic well-being of older people. By contrast, our study has considered the impact of both, calculating the hypothetical percentages of poverty among the immigrant and non-immigrant elderly of various ethnic origins and using the distributions of living arrangements and retirement income for Canadian-born seniors of British origins as the reference group. A second contribution is that our research adds to the literature on immigrant economic incorporation by providing further evidence of challenges faced by new waves of immigrants with racialized ethnic origins. Our results illuminate substantially high levels of poverty among immigrant elders belonging to this group, set within the context of an overall decline in elder poverty in Canada over the past several decades.

Although our study improves upon the literature in these regards, limitations and unanswered questions remain. Accordingly, our analysis likely underestimates the effect of state support on the poverty of the elderly in Canada as a result of our analytical strategy. Our analysis considered disparities in the access to retirement income sources by nativity and ethno-racial origins, yet we did not consider disparities in the amount of C/QPP and private pensions linked to the disparities in employment earnings while the elderly under analysis were in the labor force. Given the known inequalities in the labor market by race, ethnicity, and nativity, we may likely observe internal differences in the amount of C/QPP and private pensions among those elders receiving these retirement income sources. This may further explain the gaps in poverty levels between the Canadian-born British group and others especially the new-wave immigrant groups, who are more likely to have a shorter period of residence in Canada and to belong to ethno-racial minorities.

Moreover, although our analysis shows that co-residence with kin has a positive impact on the poverty alleviation of the elderly, drawbacks to co-residence with kin also need to be acknowledged. As suggested in previous studies, living with adult children and/or other relatives may have a negative impact on the mental health of the elderly (McLaren, 2006; Wilmoth & Chen, 2003). For instance, seniors living with kin may develop a feeling of isolation if they spend substantial amounts of time on household work (e.g., caring for grandchildren) and consequently have little social interaction outside of home. In particular, elderly women

may be at a greater risk of experiencing such isolation, considering gender inequalities in families in which women are – more often than men – deemed as the primary caregivers at home. Moreover, elderly immigrants may face additional drawbacks to co-residence with kin due to conflicts with their family members that can arise from intergenerational differences in the integration into the host society. For elderly immigrants, widening gaps in cultural identities and proficiency in the host country language from their co-residing kin in younger age may isolate them psychologically, and thus negatively affect their mental health.

To conclude, our results, especially the illumination of high poverty levels among minority seniors from new waves of immigration, have implications for public policy and policy debate on the economic well-being of immigrant seniors. One policy action that could improve the economic well-being of immigrant seniors is the implementation of international agreements on retirement incomes. In Canada, the International Social Security Agreement (ISSA) is particularly relevant to the issue of poverty among elderly immigrants. This agreement stipulates that immigrants may use pensions from their countries of origin and may use periods of residency there to qualify sooner for Canadian old age security. The ISSA ameliorates the poverty of recently arrived immigrant seniors who do not meet minimum qualifying requirements for Canadian retirement incomes such as OAS or C/QPP (Elgersma, 2007). However, not all recent immigrants benefit. To date, the Canadian agreement includes only 50 countries, largely European (e.g., Germany, Italy, Portugal), a concentration that reflects trends in immigration when the ISSAs evolved, namely the late 1970s and 1980s when Europe still dominated Canada's immigrant source region. Seniors of the new waves of immigration (largely from Asia and the Middle East) are less likely to benefit unless agreements with the newer sending countries are struck. In addition, these newwave origin countries have less-developed welfare states in general. Therefore, these countries currently may not have developed income programs for the elderly comparable to Canada's retirement income systems for reaching the ISSAs in the near future (Durst, 2005).

A second Canadian policy initiative relevant to the poverty of seniors in new waves of immigration would be to amend the Old Age Security Act. ¹⁰ This was attempted recently but without success. Bill 362: An Act to amend the Old Age Security Act – a private member's bill proposed by Colleen Beaumier (Liberal MP, Brampton West) – was tabled in October 2006. It proposed to reduce the residency requirement for OAS from 10 years to 3 years. Although this bill was supported by some ethnic and racial minority communities because of its potential to improve the economic

well-being of their elderly populations, critics argued that current residency requirements do not violate rights or constitute discrimination, citing the Charter of Rights to back up their arguments (African Canadian Social Development Council, 2010; Chinese Canadian National Council Toronto Chapter, 2006; Elgersma, 2007).

Bill 362 was also opposed by the Conservative members of the Standing Committee on Human Resources, Social Development and the Status of Persons with Disabilities in May 2008. As of May 16, 2008, it was awaiting the third reading required under Canada's parliamentary system to receive Royal Assent and become legislation (Parliament of Canada, no date) although some thought it not likely to proceed to a vote at Third Reading because it was a private member's bill (Beaumier, 2008). On September 7, 2008, Prime Minister Harper received permission from the Governor General to dissolve Parliament and hold a general election on October 14, 2008, with the result that all pending bills were terminated. Beaumier did not run in that election, and proposals to reduce the OAS residency requirements have not been re-introduced since then. To date, fiscal policy initiatives targeted at the newest waves of elderly immigrants appear to be at a standstill, thus perpetuating the importance of family living arrangements in providing financial safety nets for these and other elderly immigrants.

Notes

- 1 This percentage is based on the authors' calculation using data from the 2006 Census Public Use Microdata File (PUMF).
- 2 Conceptually, poverty refers not only to deprivation in income but also to wealth and material deprivations (Heisz & Langevin, 2009). This article uses the term poverty in a narrow sense, as a synonym for low income only.
- 3 While the present study focused on financial support as family support for seniors, other types of family support also constitute important aspects of family care for the elderly, including meal preparation, cleaning, transportation, and medical care (Cranswick & Dosman, 2008). Two most notable sources of data containing such various types of family support are data from the General Social Survey Cycles 16 (Aging and Social Support) and Cycles 22 (Family, Social Support and Retirement), which were conducted in 2002 and 2007 respectively.
- 4 Other existing data may be suited for studying the impact of family support on elderly poverty in Canada, given that living arrangement is the sole indicator of family financial support available in the 2006 Census PUMF. As mentioned in Note 3, data from the General Social Survey Cycles 16 and 22 contain rich information on family support provided to seniors. However, the sample sizes and age distributions of these data make it extremely difficult to study the poverty of immigrant elders by gender. Both GSS Cycle 16 and Cycle 22 target age 45 and older and have

- samples of approximately 25,000 or fewer respondents. By the time the sample is selected for age 70 and older and divided by nativity, gender, and origin group for the analysis, some categories may be noticeably small for obtaining reliable estimates. In addition, neither of the data contain information on respondents' ethnic origin (although the information on the country of birth is available).
- 5 A collective dwelling refers to "a dwelling of a commercial, institutional or communal nature" (Statistics Canada, 2010, p. 163). It includes hotels, motels, nursing homes, hospitals, and jails.
- 6 Statistics Canada's family universe indicates that persons in economic families and persons not in economic families constitute persons in private *households* (Statistics Canada, 2010, p. 123). Therefore, we use the term *household* to describe low-income incidence of the elderly even though the definition of LICOs does not include this term.
- 7 We have tested for multicollinearity between the covariates using condition indices. Our test suggests there is no serious problem with multicollinearity (test results are available upon request).
- Readers may not obtain the same predicted percentage changes shown in columns 3 and 6 in Tables 4 and 5 if they attempt to calculate by themselves using figures in columns 1, 2, and 5 and formulae shown in the tables. This is purely due to rounding. We obtained the predicted percentage changes in columns 3 and 6 using the unrounded numbers in columns 1, 2, and 5, whereas readers may obtain different percentage changes using the numbers in columns 1, 2, and 5, which are rounded to one decimal place. One of the most striking differences between our calculation and the readers' calculation would be observed in the Dutch immigrant group. The numbers 6.5 and 6.7 for this group (columns 1 and 2, Table 4) that we used in our calculation were 6.5476 ... and 6.6556 ... respectively. The percentage change from 6.5 to 6.7 would be 3.1 per cent using the formula shown in Table 4, whereas the percentage change from 6.5476 ... to 6.6556 ... is 1.6 per cent, which appears in the table. Such a difference is especially notable if a number in column 1 (predicted poverty levels, using the group's own distribution) is small in value. Since this number is used as the denominator in calculating a percentage change, even a slight change in its value will lead to a larger difference in percentage change if a (slightly) different value of the denominator is used as a result of rounding.
- 9 The –2 log likelihood for the baseline model is 40629.9 for women and 17518.1 for men, as shown in Table 3 (columns 1 and 3 respectively). When either retirement incomes variables or living arrangements variables are added to the baseline model in addition to the control variables, the –2 log likelihoods are reduced to 29365.0 (for the model where retirement incomes and controls are added) and 30079.4 (for the model where living arrangements and controls are added) for women. For men, –2 log likelihoods for the equivalent models are 12596.8 and 13965.1 respectively. Thus, the proportional reductions in the –2 log likelihoods from the baseline model to the subsequent models are –0.277 (= (29365.0 40629.9)/40629.9) for the model in which retirement incomes and controls are added, and –0.260 (= (30079.4 40629.9)/40629.9) for the

- model in which living arrangements and controls are added for women. For men, the equivalent proportional reductions are -0.281 and -0.203. These results suggest that for women and men, holding retirement incomes constant improves the fit of the model estimate to a greater degree than holding living arrangements constant.
- 10 Our study shows that approximately 85 per cent of the elderly immigrants from the new wave receive OAS/GIS (Table 2, columns 5 and 6). Such a high rate of reception may not provide a convincing rationale for shortening the current residency requirement. However, it is possible that this high reception rate reflects the fact that some of the recipients of OAS/GIS among the new-wave immigrants are receiving GIS as a result of their severe states of low income even though they have not yet met the 10-year residency requirement. Although the 2006 census PUMF does not allow testing this possibility due to data limitations, shortening the residency requirement will undoubtedly reduce barriers to benefit from OAS as well as GIS to improve the economic well-being of elderly immigrants.

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