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by
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Abstract

Language Maintenance and Language Shift among some recent immigrant groups are examined using data from the Public Use sample tapes of 1971, 1981 and 1991 Canadian censuses. Those whose home language is same as mother tongue is found to be related to age, age at immigration, education, labour force participation and occupation. Language maintenance also seems to be related to ethnic origins. Implications for assimilation and policy are also examined.

Language Maintenance among Selected Immigrant Groups in Canada 1971-1991

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Introduction

The ethnic and racial composition of immigrants to Canada has changed drastically in the last three decades. The removal of the discriminatory clauses in the immigration laws in the early 1960s, combined with the changing push factors in the sending countries mean that the place of origin of the immigrants are very different from what they were before. While Western Europeans origins predominated before 1960s, it was primarily Southern Europeans in the 1960s and 1970s and since then populations from the Third world who formed the majority. More than half of the immigrants in the 1980s were the so called "visible minorities" groups of Blacks, South Asians, Chinese and many Latin and Central Americans.

As the ethnic and racial diversity in the Canadian population changes there are concerns about the socio-economic integration of the minority groups. One aspect of assimilation into the Canadian society is language maintenance or language shift among the immigrant groups. Even though the Canadian policy of multiculturalism is intended to promote the retention¹ of ethnic identity including language, it is inevitable that with time the immigrant groups are likely to shift to English or French both in their home as well as in the workplace. Proficiency in the official languages increases the chances for social mobility but may decrease the probability of retaining one's mother tongue. Using 1991 Canadian census data it has been found that language shift is related to various factors such as visible minority status, gender, period of immigration and type of employment (Boyd 1996). That ethnicity is related to language maintenance

¹ In this paper "retention" and "maintenance" are used interchangeably.

has also been found in an earlier study of 1971 census data (de Vries 1977).

This study aims to look at language maintenance and language shift during the period 1971-1991 for selected ethnic groups, not only to examine trends but to look at more correlates, especially education and occupation, in addition to gender, period of immigration and age at immigration.

Theoretical Framework:

Among the immigrants two opposing forces operate in their language usage. The desire to maintain their cultural heritage and identity and to interact with others of the same background act as a positive force on language maintenance. On the other hand, to assimilate into the occupational structure and improve one's chances for social mobility in Canada would require increasing official language facility which would mean greater use of English or French and consequently a loss in one's mother tongue. Those with greater educational and other human resources are also those who can more easily increase their official language proficiency (Boyd 1996).

New immigrants especially from the third world are not only culturally more distant from the charter groups of British or French, but also have mother tongues very different from the European languages. They will therefore have a harder time learning English or French and, conversely, are likely to retain their languages for a longer time. We would therefore expect immigrant groups from Europe such as Italians, Germans, Scandinavians and Polish to shift their language faster than, say, the Chinese or South Asians.

Since much of language learning occurs in one's childhood years in school, one would expect that those who come to Canada at a young age are likely to learn the

official language faster than those who come in later years. Therefore age at immigration should be inversely related to language shift. We could also expect language shift to be a function of duration of stay in Canada. The longer the stay, the lower the own language maintenance.

It may also be hypothesized that those who are more educated are less likely to retain their native language if it is not English or French. There are a number of reasons why this may be the case. First, they are likely to have learned some English or French as part of their education. Second, the ability to learn a new language may be greater among those who have some education. Third, they are more likely to be in white collar occupations which may require greater proficiency in English or French compared to blue collar occupations.

Sources of Data:

The data used in this study were taken from the public use sample tapes of 1971, 1981, and 1991 Canadian censuses. The sample sizes were 1%, 2%, and 3% respectively. The selection and definition of ethnic groups is the most problematic issue for a study of this type. The categories are not uniform across censuses and reflects the selection of the groups used here. Moreover, the acceptance of multiple responses to ethnicity starting with the 1981 census, while making the data rich and more realistic, has made comparative analysis particularly difficult. Because of this, for the purposes of this study we limit ourselves to single responses only to the ethnic origin question.

Indices of Language Maintenance:

The two language variables used are "mother tongue" and "home language". Mother tongue refers to the language a person first learned in his/her childhood and

which he/she still understands.

Home language refers to the language presently being used most frequently by the person in his or her home.

Following de Vries (1977), we use the following symbols.

EG: All members of an ethnic group

CB: Born in Canada

FB: Born outside of Canada

MT_A: mother tongue English or French

MT_C: corresponding mother tongue (for CB)

MT_F: corresponding mother tongue (for FB)

HL_A: home language English or French

HL : corresponding home language

de Vries illustrates two models using this categories for the construction of indices. These are shown in Figure 1.

The various indices constructed using de Vries' notations are presented in Table 2 along with the base numbers used to calculate them (Table 1). The indices are:

I_t = index of total language maintenance (HL/EG)

I_1 = index of "current" language maintenance (HL/MT)

I_3 = index of "earlier" language maintenance among the Canadian born members of the ethnic group (MT-FB/CB or MT_C/CB)

I_4 = index of the degree of "Canadian-born-ness" (CB/EG)

I_2^1 = index of mother tongue maintenance in an ethnic group (MT/EG)

Total Language Maintenance:

Only three groups, Italian, German and Polish could be followed in all three censuses. During 1971-91 there was very little German immigration to Canada. Italian immigration also slowed a great deal compared to pre 1971 period. In comparison, Polish immigration increased substantially. The impact of these trends on language retention are clear in Table 1. Total language maintenance decreased among the Italians. I_t declined from .585 in 1971 to .489 in 1981 and .388 in 1991. In other words in 1991 only 38.8 percent of the Italians spoke Italian most frequently at home. It is clear that many second generation Italians have shifted to English or French as home language. In the case of Germans, since German migration started before the turn of the century, foreign born Germans form less than a fourth of the German ethnic origin group. German migration in recent decades has also been small. Therefore it is not surprising that the proportion of Germans who speak German at home is very low, about 10 percent in 1991, decreasing from 14.8 percent in 1971. The Polish group is an interesting case. Poles in Canada come from two distinct migration streams, an earlier stream in late 19th century and early 20th century and a very recent stream in the period 1981-91 after the unsettling political events in Eastern Europe. The indices reveal these immigration trends. In 1971, the index of language maintenance among the Polish was only .209. In other words most of the Poles have shifted to one of the official languages as their home language. However in 1991, the index of language maintenance It has increased to .368. We can also notice that the proportion of Canadian born among Poles has decreased from 57.7% in 1971 to 44.6 % in 1991.

For the other groups data are available for only one or two census years. People of Dutch and Scandinavian origins came to Canada early and therefore have very low language retention rates. Index for total language maintenance for the Dutch in 1971 was only .094 and it further decreased to .063 in 1981. For the Scandinavians the index was an incredibly low .026 in 1971. Very few scandinavians were speaking

their language at home. Ukrainians, who are also by and large early settlers in the West, have low index of language maintenance of .254 in 1971 and .176 in 1981. That language maintenance decreases with time in the absence of substantial migration is apparent in the case of postwar immigrants as well, such as the Portuguese. The index for the Portuguese decreased from .689 in 1981 to .595 in 1991.

The largest immigrant group in the 1981-91 period were the Chinese. Their index increased from .625 in 1981 to .695 in 1991. Canadian born Chinese in 1991 were only 17.4 percent of all Chinese. It is not surprising therefore that most of them still speak Chinese language at home.

Current Language Maintenance:

The index I_1 measures the extent of current language maintenance, namely the proportion of persons whose home language is same as their mother tongue. It is hypothesized that a person's cultural background may have a direct influence on the desire to retain one's mother tongue as their home language as well. Strong religious and cultural cohesion, extended familial relationships etc improve the probability that one's mother tongue will be used as home language as well. We see that I_1 varies considerably among the ethnic groups studied here. In 1971, only 10 percent of the Scandinavians were using their mother tongue as home language. It was low among the Dutch at 21.1 percent and 34.4 percent among the Germans. On the other hand, among the Ukrainians, who have been in Canada for a long time, the percent using their mother tongue as home language as well, was much higher at 46.5 percent. Among Italians who were more recent immigrants, this proportion was 76.8 percent in 1971. However by 1991, only 52.5 percent of those whose mother tongue was Italian still used it as their home language. For the Chinese the figure was 80.5 percent in 1991. Southern and Eastern European groups such as the Portuguese and Polish also show somewhat higher current language maintenance, the percentage using mother tongue

as home language in 1991 being 67.4 and 57.2 respectively.

Correlates of Language Maintenance:

It has been noted above that many factors many influence whether one's mother tongue continues to be the home language as well. Using the 1991 census sample we examine this in some detail using logistic regression techniques. Language retention was coded as a dummy variable depending on whether the mother tongue is same as the home language or not. The independent variables were:

Age: as coded in single years

Sex: male or female

Education: Below university

Some university or graduate
post graduate

Age at immigration: IMCHILD (immigrated to Canada at age 14
younger)

IMYOUNG (immigrated at ages 15-24)

IMMIDDLE(immigrated at ages 25-34)

IMOLD (immigrated at ages 35+)

Canadian Born

Labour Force

Participation: LABNOW (presently working)

LABPREV(worked before but not now)

Never worked

Full time/Part

time work : HOURFULL (Full time)

HOURPART (Part time)

No work at present

Occupation: OCCUP I (Occupational skill level I)

OCCUP II (Occupational skill level II)

OCCUP III (Occupational skill level III)

OCCUP IV (Occupational skill level IV)

The information on work and occupation are based on the reference week just before the census enumeration. Occupational skill levels are those given in Statistics Canada Occupational Classification codes. Skill levels increase from sales and service to managerial and professional as one goes from level I to IV.

Table 3 presents the results of regression for all persons over the age of 15 for selected ethnic groups. Not only the regression coefficients but the odds ratios (exponential of the regression coefficients) are shown in the table. The negative coefficients indicate lower language maintenance compared to the reference group and positive values higher language retention. Though there are differences among the ethnic groups the general hypotheses hold true in all of them. Sex differences in language retention are not significant for all the ethnic groups except for Italians. Compared to women, men are less likely to retain their mother tongue as home language. The odds ratios show that they are about 21 % less likely to speak Italian most frequently at home compared to women when other factors are controlled.

As hypothesized, the higher the education level the less likely that one will retain his/her mother tongue, this being evident in all the ethnic groups. Those who had some university education are only about half as likely to retain their language compared to those who had no university level education.

Perhaps the most important factor in language retention is whether one is Canadian born or, if foreign born, the age at which they migrated to Canada. As one would expect among all the ethnic groups Canadian born are less likely to retain their native tongue as home language. Among the foreign born, age at immigration is

strongly correlated with language retention. Those who migrated at later ages, especially after age 25 are most likely to continue to speak their mother tongue at home. In comparison, those who migrated as children, at ages less than 14 are much less likely to retain their language. Much of their schooling have taken place in Canada and therefore they are much more likely to speak English or French at home compared to those who migrated after their education has been completed.

Those who are working or previously worked are less likely to retain their language compared to those who have never worked by a factor of almost half. Of course, causation here is difficult to establish. Those with lower official language proficiency are less likely to be in the labour force. Conversely, those who are in the labour force have to use English or French more often and hence are more likely to use it at home as well. By the same token one would expect those who work full time less likely to retain the language compared to those who work only part time. Differences by full time/part time is however found to be rather small. It is whether working at all, that seems to be the crucial factor.

To study the effect of occupation on language maintenance the regressions were redone limiting to those who were working at the time of the Census. These are presented in Table 4. Across all ethnic groups, we find that the higher the occupational skill level the lower the language retention. Using Occupational skill level I (lowest) as the reference group, it can be seen that those in occupational skill level IV are about 60 percent less likely to retain their native language as home language. Those in lower occupations such as in service and manual labour may not have the need to use the official languages as much as say those in managerial occupations or in the professions. Ethnic concentrations in occupations are also in the lower skilled occupations such as in manual labour or service where one can converse with co-workers in their native tongue which may promote language retention.

Conclusion:

This study confirms some of the earlier research on language maintenance that substantial differences are to be found among ethnic groups (de Vries 1977; Harrison and Lachepelle 1996). European groups such as the Dutch, Germans and Scandinavians are quick to lose their mother tongue or in other words to shift to English or French (de Vries and Vallee 1980; Kralt and Pendakur 1991). Part of the reason maybe is that there is a great deal of exogamy in these groups and subsequent generations shift their language spoken at home (Harrison and Lachepelle 1996). We speculate that language maintenance among the more recent immigrants from the third world may be higher because of greater cultural differences and less exogamy compared to the older European groups. It should be especially relevant to see whether language retention is likely to be greater among the "visible minorities".

Greater residential segregation and concentration in ethnic labour markets may also increase language retention among such groups as the Chinese, South Asians and some Central American groups. Group size and institutional completeness may increase language maintenance. For example, in a city such as Toronto, where there are large concentrations of Chinese, East Indians and other minority groups to enable the viability of specialized institutions and ethnic businesses, one may suspect that language retention will be higher compared to places where there are very few members of an ethnic group. To the extent that recent third world immigrants go to the three largest metropolitan areas, their language retention rates are likely to be higher than the earlier European groups who were more widely distributed in Canada.

It is clear that higher socio-economic status is inversely related to language maintenance. If immigration to Canada is selective of better educated and occupationally skilled persons, language retention is likely to be lower among them. Social mobility should also have the effect of decreasing language retention.

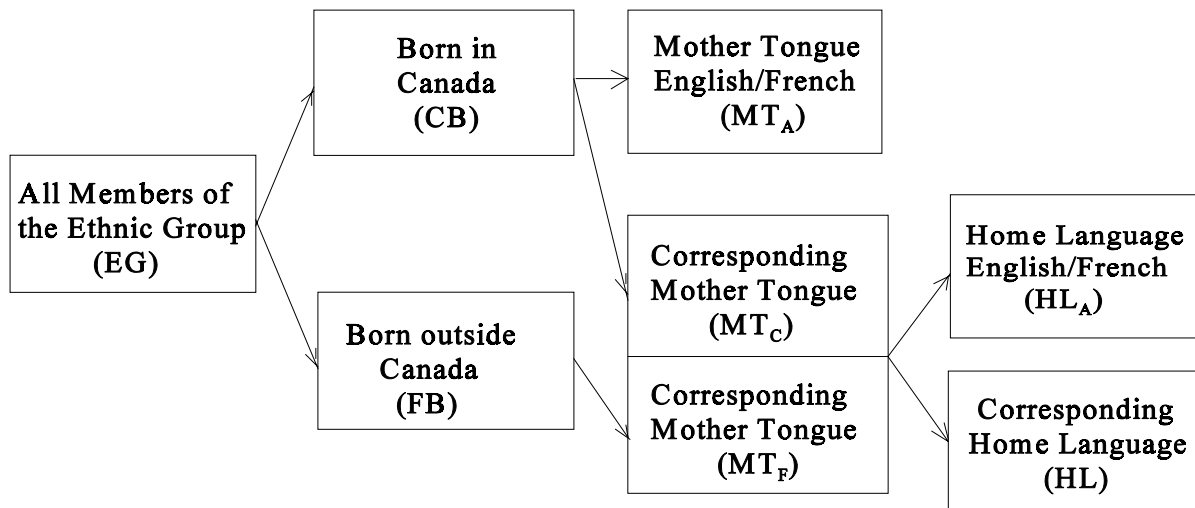
Finally, one of the objectives of Canada's Multicultural Policy is to "preserve and enhance the use of languages other than English and French, while strengthening the status and use of the official languages of Canada". A problem may arise if language retention is negatively correlated with official language proficiency. There is ample evidence that lack of official language proficiency is detrimental to many immigrant groups in achieving economic integration into the Canadian society. The lower income and occupational status of recent immigrants is often attributed to their lower language skills (Boyd 1996). Whether one can hope for a high own language retention and a high official language proficiency at the same time is open to question.

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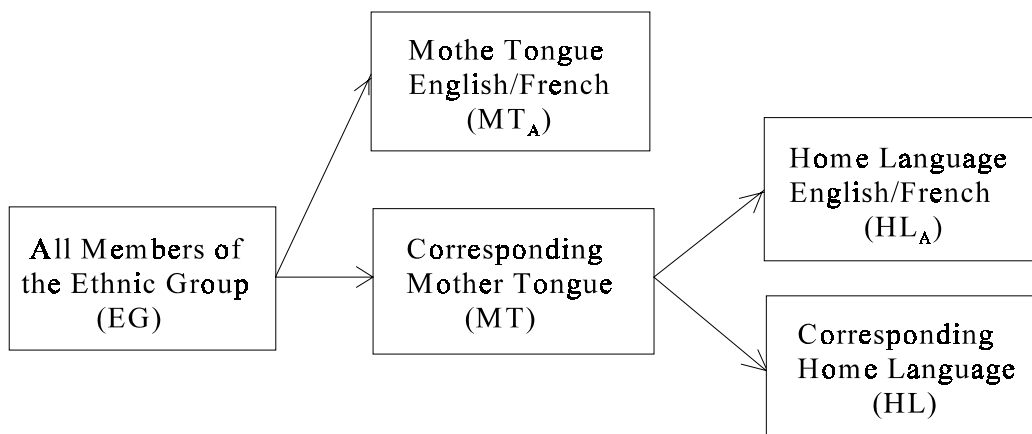
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Figure 1. Decomposition of Language Maintenance Indices

Model I



Model II



Source: DeVries, John. 1977. "Some New Indices of Language Maintenance and Language Shift". In: Paul Lamy. ed. *Language Maintenance and Language Shift: New Dimensions in the Use of Census Language Data*.

Table 1. Basic Numbers for Calculation of Language Maintenance Indices,
Selected Ethnic Groups, Canada, 1971-1991

Ethnic Groups	EG	CB	FB	MT _A	MT _C	MT _F	HL _A	HL	MT _A (II)*	MT (II)*
1971										
Italian	4,885	1,273	3,612	908	356	3,364	861	2,857	1,118	3,720
German	9,388	6,287	3,101	4,766	1,482	2,558	2,629	1,389	5,253	4,040
Polish	2,383	1,375	1,008	919	321	749	540	498	1,079	1,070
Ukrainian	4,465	3,433	1,032	1,665	1,717	863	1,438	1,133	1,772	2,580
Netherlands	2,793	1,372	1,421	1,097	126	1,119	970	263	1,346	1,245
Scandinavian	2,711	1,959	752	1,726	209	500	629	71	1,956	709
1981										
Italian	11,885	4,141	7,744	2,560	1,572	7,224	2,972	5,811	3,018	8,796
German	19,062	13,724	5,338	10,626	3,084	4,560	5,547	2,081	11,301	7,644
Chinese	4,345	591	3,754	298	289	3,192	732	2,716	750	3,481
Polish	4,553	2,643	1,910	1,873	570	1,553	1,152	943	2,074	2,123
Portuguese	2,619	184	2,435	91	93	2,241	525	1,804	270	2,334
Greek	2,216	460	1,756	223	219	1,617	488	1,332	321	1,836
Ukrainian	9,016	7,534	1,482	3,916	3,577	1,344	3,322	1,585	3,989	4,921
Dutch	6,680	3,734	2,946	3,151	271	2,504	2,341	420	3,514	2,775
1991										
Italian	19,468	8,837	10,631	4,370	4,446	9,923	6,797	7,546	4,968	14,369
German	24,250	17,430	6,820	13,134	4,237	5,799	7,599	2,417	13,932	10,036
Chinese	13,633	2,376	11,257	689	1,634	10,144	2,215	9,476	1,349	11,778
Polish	6,932	3,093	3,839	1,977	1,001	3,462	1,863	2,552	2,235	4,463
Portuguese	5,778	1,059	4,719	335	721	4,375	1,651	3,436	641	5,096
Spanish	1,863	362	1,501	114	243	1,380	425	1,191	204	1,623

Sources: Individual Files, Public Use Sample Tapes of 1971, 1981, and 1991 Censuses of Canada

* Numbers used in Model II only.

Table 2. Indices of Language Maintenance for Population
15 Years of Age and Over, Selected Ethnic Groups,
Canada, 1971-1991

Ethnic Groups	I_t	I_1	I_3	I_4	I_2^1
1971					
Italian	0.585	0.768	0.280	0.261	0.762
German	0.148	0.344	0.236	0.670	0.430
Polish	0.209	0.465	0.233	0.577	0.449
Ukrainian	0.254	0.439	0.500	0.769	0.578
Netherlands	0.094	0.211	0.092	0.491	0.446
Scandinavian	0.026	0.100	0.107	0.723	0.262
1981					
Italian	0.489	0.661	0.380	0.348	0.740
German	0.109	0.272	0.225	0.720	0.401
Chinese	0.625	0.780	0.489	0.136	0.801
Polish	0.207	0.444	0.216	0.580	0.466
Portuguese	0.689	0.773	0.505	0.070	0.891
Greek	0.601	0.725	0.476	0.208	0.829
Ukrainian	0.176	0.322	0.475	0.836	0.546
Dutch	0.063	0.151	0.073	0.559	0.415
1991					
Italian	0.388	0.525	0.503	0.454	0.738
German	0.100	0.241	0.243	0.719	0.414
Chinese	0.695	0.805	0.688	0.174	0.864
Polish	0.368	0.572	0.324	0.446	0.644
Portuguese	0.595	0.674	0.681	0.183	0.882
Spanish	0.639	0.734	0.671	0.194	0.871

Sources: Individual Files, Public Use Sample Tapes of 1971, 1981, and
1991 Censuses of Canada.

Table 3. Logistic Regression for Language Maintenance by Ethnicity, Canada, 1991
(Persons 15 Years of Age and Over)

Ethnic Groups	Chinese	German	Italian	Polish	Portuguese	Spanish
Sample Size	13,633	23,351	19,468	6,932	5,778	1,863
<u>B Values</u>						
AGEP	-.008***	-.012***	-.012***	-.047***	-.017***	-.037***
MALE	.099*	.079	-.230***	-.118!	-.103	-.135
SOMEUNIV	-.551***	-.861***	-.602***	-.277*	-.970***	-.395*
POSTGRAD	-.575***	-.831***	-1.758***	-.020	-1.151!	-.853*
IMCHILD	.532***	.741***	.600***	1.297***	.524***	-.415*
IMYOUNG	1.748***	1.706***	2.383***	3.203***	1.847***	.604***
IMMIDDL	2.047***	2.430***	3.240***	4.163***	2.745***	1.150***
IMOLD	2.720***	3.326***	3.974***	5.131***	3.245***	1.899***
LABNOW	-.749***	-1.144***	-.479***	-.659***	-.773***	-.362
LABPREV	-.516***	-.841***	-.470***	-.516**	-.582***	-.377!
HOURLFULL	-.263***	.025	-.392***	-.491***	-.149	-.366*
HOURLPART	-.263**	.165	-.268***	-.363*	.209!	-.363!
Constant	.704***	-1.434***	-.367***	.055	.444*	2.063***
<u>Exp(B) Values</u>						
AGEP	.992	.988	.988	.955	.983	.964
MALE	1.104	1.082	.794	.888	.902	.874
SOMEUNIV	.576	.423	.548	.758	.379	.674
POSTGRAD	.563	.436	.172	.980	.316	.426
IMCHILD	1.702	2.099	1.822	3.660	1.688	.660
IMYOUNG	5.741	5.508	10.840	24.604	6.340	1.830
IMMIDDL	7.748	11.361	25.520	64.229	15.566	3.157
IMOLD	15.174	27.823	53.188	169.193	25.664	6.678
LABNOW	.473	.319	.619	.518	.462	.697
LABPREV	.597	.431	.625	.597	.559	.686
HOURLFULL	.769	1.025	.676	.612	.861	.694
HOURLPART	.769	1.179	.765	.696	1.233	.696
Constant						

Source: Individual Files of 1991 Census of Canada Public Use Sample Tapes.

Notes: 1. Levels of Significance:

- ! 0.10;
- * 0.05;
- ** 0.01;
- *** 0.001.

2. Reference Groups:

- 1) Members of the ethnic group whose highest level of education was below university education are kept as the reference group for variables Someuniv, and Postgrad;
- 2) Members of the ethnic group who were born in Canada are retained as the reference group for variables Imchild, Imyoung, Immiddl, and Imold;
- 3) Members of the ethnic group who had never participated in the labour force are kept as the reference group for variables Labnow, and Labprev;
- 4) Members of the ethnic group who worked zero hours in the reference week are retained as the reference group for variables Hourfull, and Hourpart.

Table 4. Logistic Regression for Language Maintenance by Ethnicity, Canada, 1991
(Persons 15 Years of Age and Over in Labour Force)

Ethnic Groups	Chinese	German	Italian	Polish	Portuguese	Spanish
Sample Size	9,829	17,047	14,143	4,662	4,426	1,320
B Values						
AGEP	-.011***	-.016***	-.010***	-.058***	-.024***	-.036***
MALE	.193***	.173**	-.181***	-.049	-.103	-.030
SOMEUNIV	-.530***	-.749***	-.365***	-.111	-.668***	-.343!
POSTGRAD	-.353**	-.342	-1.172***	.146	-.648	-.346
IMCHILD	.608***	.825***	.551***	1.509***	.615***	-.256
IMYOUNG	1.879***	1.797***	2.242***	3.497***	1.982***	.738***
IMMIDDL	2.239***	2.449***	2.929***	4.554***	2.972***	1.193***
IMOLD	2.862***	3.279***	3.116***	5.738***	3.233***	2.088***
OCCUPIV	-.474***	-.672***	-.859***	-.946***	-1.150***	-.602**
OCCUPIII	-.252**	-.133	-.497***	-.567***	-.584***	-.382*
OCCUPII	-.142!	.319*	-.268***	-.340*	-.583***	-.257
HOURLFULL	-.286***	-.023	-.263***	-.333**	-.078	-.191
HOURLPART	-.332***	.054	-.261***	-.258!	.108	-.209
Constant	.167	-2.427***	-.623***	-.222	.209	1.622***
Exp(B) Values						
AGEP	.990	.984	.990	.944	.977	.965
MALE	1.213	1.189	.835	.952	.902	.970
SOMEUNIV	.589	.473	.695	.895	.513	.710
POSTGRAD	.703	.710	.310	1.157	.523	.708
IMCHILD	1.838	2.283	1.736	4.522	1.850	.774
IMYOUNG	6.545	6.030	9.415	33.000	7.258	2.091
IMMIDDL	9.386	11.582	18.708	94.999	19.531	3.297
IMOLD	17.494	26.544	22.565	310.450	25.362	8.071
OCCUPIV	.623	.511	.423	.388	.317	.548
OCCUPIII	.777	.875	.608	.567	.558	.682
OCCUPII	.868	1.376	.765	.712	.558	.773
HOURLFULL	.751	.978	.769	.717	.925	.827
HOURLPART	.718	1.056	.770	.773	1.113	.811
Constant						

Source: Individual Files of 1991 Census of Canada Public Use Sample Tapes.

Notes: 1. Levels of Significance:

- ! 0.10;
- * 0.05;
- ** 0.01;
- *** 0.001.

2. Reference Groups:

- 1) Members of the ethnic group whose highest level of education was below university education are kept as the reference group for variables Someuniv, and Postgrad;
- 2) Members of the ethnic group who were born in Canada are retained as the reference group for variables Imchild, Imyoung, Immiddl, and Imold;
- 3) Members of the ethnic group whose occupation required Level I skill are kept as the reference group for variables OccupIV, OccupIII, and OccupII;
- 4) Members of the ethnic group who worked zero hours in the reference week are retained as the reference group for variables Hourfull, and Hourpart.