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Marrying out: Comparing the marital and social integration of Asians in the US and Canada ☆

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Abstract

The "new immigration", including substantial Asian immigration to North America, has revived questions about racial and ethnic minority group integration in predominantly European-origin societies. This study offers a new comparison of US and Canadian Asian integration using intermarriage as the indicator of integration. Results reveal more similarities than differences. Intermarriage variations by age, gender, education, immigrant generation, Asian ethnic group, and other sociodemographic characteristics are generally similar and consistent with previous research using US data. Multivariate results highlight similarities and the significance of immigrant generation, gender, and Asian ethnicity on Asian intermarriage in both countries. The main difference is lower overall Asian exogamy in Canada, reflecting country differences in the demographic history, composition, and distribution of the Asian populations. We conclude that exogamy is likely to continue to increase in both Canada and the US, and represents a key measure of the social integration of Asians in both countries.

Keywords: Intermarriage; Integration; Asians; Canada; United States

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1. Introduction

In recent years, North America's racial and ethnic landscape has been transformed by the "new immigrants" who began arriving from the 1960s onwards in response to major changes in immigration laws (Boyd and Vickers, 2000; Castles and Miller, 2003). In both Canada and the United States, Asian migration has been an important component of this diversification. Prior to the 1965 amendments, US immigration laws had severely limited immigration from Asia.[1] The 1965 amendments made family reunification the principal avenue for admission, opening the door to high levels of immigration from Asia (US Department of Homeland Security, 2006). Similar changes to Canada's immigration laws were implemented in the 1960s to remove discriminatory limitations on Asian immigration. However, unlike US immigration laws, Canada's immigration policies also employ a points-based system designed to match immigrant characteristics with labor market needs (Citizenship and Immigration Canada, see www.cic.gc.ca). While family reunification is an important feature of Canada's immigration laws, the points system has enabled many more immigrants from Asia to enter Canada as independent immigrants.[2]

As a consequence of the new immigration and differences in US and Canadian immigration laws, Asians have become the largest and fastest growing minority population in Canada, making up about 10% of Canada's population of 30 million in 2001 (Statistics Canada, 2003). Given the domination of immigration to the US by immigrants from Latin America, Asians are a smaller proportion of the US population, at about 4%, but are the second fastest growing minority behind Hispanics (US Census Bureau, 2001).

The growing presence of Asians in the US and Canada revives old questions about the integration of Asians (and by extension, other non-Europeans) into a social and cultural world dominated by European-origin people (Cornelius et al., 2002). Foremost among these questions is whether large numbers of racially and ethnically distinct new immigrants and their descendants can be successfully integrated into the host societies. Historically, North America did not welcome Asians. Both the US and Canada passed racist immigration laws in the 19th and early 20th centuries designed to exclude or severely limit Asians from North America. However, the cessation of explicit racist immigration laws and the growth of the Asian population in recent years suggest that this may no longer be the case.

[1] Immigration laws are notoriously complex, and often change in response to political pressures. A detailed history and discussion of each country's immigration laws is beyond the scope of this paper. See Smith and Edmonston (1998) for examples of some immigration issues in recent years in the US.

[2] In addition, unlike the US with its large undocumented migrant population, Canada has more effective control over the volume and origins of its immigrants through the points-based system, a system that facilitated the immigration of people from countries with relatively good educational institutions and English language backgrounds (such as India and the Philippines), and its national health care system (one cannot be enrolled in the health care system without legal status). Large numbers of immigrants from Hong Kong also started to arrive in the years leading up to the hand over of Hong Kong to China in 1999 (immigration of people from Hong Kong was facilitated by their status as British subjects and ties to the British Commonwealth). In recent years, China has become a major source of immigrants to Canada, with many Chinese arriving with high levels of education and skills that are given high priority or points.

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There are many ways to study the integration and experience of racial minorities.[3] In this paper, we compare the social integration of Asians in the US and Canada through exogamy or intermarriage. In most societies, marital norms and practices are strongly homogamous (Kalmijn, 1998). People typically marry within their social group or someone who is close to them in social status. In the case of racial or ethnic homogamy, or endogamy, homogamy maintains racial/ethnic group boundaries and separation. Racial/ethnic intermarriage, or exogamy, signals a reduction of what Bogardus (1959) termed "social distance" between racial and ethnic groups. In his classic treatise on inter-group relations, Gordon (1964) considered intermarriage to be the single best indicator of minority group assimilation. Intermarriage further blurs racial/ethnic boundaries and identity as new generations emerge that no longer mirror the racial/ethnic identities of previous generations, leading to the amalgamation or blending of various racial and ethnic groups (Lee and Edmonston, 2005; Waters, 2000).

With its focus on Asian endogamy and exogamy, this paper makes four important contributions to the study of Asian integration in North America. First, we provide the first comparative examination of US and Canadian Asian intermarriage. A comparative analysis of Asian intermarriage and integration can be highly instructive. By bringing out both similarities and differences between Asian exogamy in Canada and the US, and by explaining these similarities and differences, researchers can advance theorizing about the factors that facilitate or impede integration of new immigrant and racial/ethnic groups in different societies. Second, within this comparative context, recent patterns in intermarriage are examined, including those variations that previous research on Asian American intermarriage have identified, such as age, gender, and education differences in exogamy (Lee and Edmonston, 2005). Third, diversity within the Asian population is addressed and highlighted with an examination of Asian ethnic group-specific patterns of exogamy and endogamy. Fourth, we include and emphasize generational and gender differences in Asian exogamy, building on contemporary themes which note that integration occurs *across* generations of migrant origin groups (Portes, 1995; Rumbaut, 2004), and that demographic processes often *differ* for men and women (Boyd, 1999; Lee, 1996).

2. Asian intermarriage in Canada and the United States: Same or different?

The United States and Canada are both similar and different with respect to the social and demographic contexts within which Asian exogamy and endogamy occur. In the past, anti-miscegenation laws prohibiting marriage between Whites and non-Whites in both the US and Canada were applied to Asians. In the US, for example, it was not until 1967 that the US Supreme Court finally overturned remaining anti-miscegenation laws in 16 states (Sickels, 1972). Given this history, we expect Asian intermarriage to be relatively low in both countries, and that the effects of sociodemographic characteristics such as age and gender on intermarriage identified in previous research to be fairly similar.

While studies have showed Asian intermarriage rates to be higher than those of Whites or Blacks in the US, Asian intermarriage rates have declined slightly in recent years (Lee and Edmonston, 2005). Research on racial intermarriage in Canada is not as extensive

[3] Researchers have analyzed spatial assimilation of racial minorities using residential segregation/integration as the indicator of integration (Fong, 1996; Massey and Denton, 1993). The economic integration of racial minorities has been examined using employment, occupation, earnings, and poverty measures (Boyd, 1984, 1999; Lee, 1994, 1999).

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because of limited data (see section on Canadian data below), and we do not know whether Asians in Canada are more or less likely to intermarry than other Canadian minorities. However, a study using 1981 and 1991 public-use Canadian census data also reported a decline in Asian intermarriage between 1981 and 1991 (Tzeng, 2000).[4] The common trend of declining intermarriage is likely related to increased Asian immigration during this period to both the US and Canada, as foreign-born Asians are less likely to intermarry (Lee and Edmonston, 2005; Qian et al., 2001). In addition, a higher proportion of Asians in Canada are foreign-born and recent arrivals (Statistics Canada, 2003), factors that lead us to further expect Asian intermarriage to be lower in Canada.

Ethnic compositional differences in the Asian populations are expected to further contribute to lower exogamy among Asians in Canada as previous research have shown that some groups such as US Chinese and Asian Indians have lower intermarriage rates (Lee and Fernandez, 1998). Almost 80% of Canada's Asian population is of either Chinese (41%) or South Asian/Asian Indian (36%) origins (Statistics Canada, 2003). The Asian American population is more ethnically diverse, with 24% Chinese, 18% Asian Indian or Filipino, and over 10% Korean or Vietnamese (Barnes and Bennett, 2002).

Furthermore, Canada's Asian population is a larger proportion of Canada's population, and larger groups tend to have lower exogamy rates (Besanceney, 1965). The Asian population in Canada is also more concentrated in a few areas such as the provinces of Ontario and British Columbia and a few large cities such as Toronto and Vancouver (Statistics Canada, 2003). Such concentration increases the Asian population in these locations and the pool of potential co-ethnic marital partners, thereby depressing intermarriage rates.

Thus, while similarities in historical treatments of Asians in the US and Canada lead us to expect fairly low Asian intermarriage rates in both countries, we expect Asian exogamy to be lower in Canada because of differences in relative size, immigration histories, ethnic composition, and geographical distribution between the Asian populations in the two countries.

3. Data and methods

We compare Asian endogamy and exogamy in the US and Canada through a cross-sectional study using data from the 2000 US and 2001 Canada censuses. Census data are the best and only source of data for a comparative study of intermarriage. The alternative of collecting primary data through random surveys of Asians in the two countries is not feasible, given the absence of sampling frames, expense, etc. In addition, since the Asian populations in Canada and the US are still small, in absolute as well as relative terms, only census data provide adequate numbers for reliable analysis. Census data also allow sub-group comparisons across Asian ethnic groups, such as Chinese, Vietnamese, Filipino, Japanese, etc., which is essential given the diversity of the Asian populations in both countries (Samuel, 1994; Xie and Goyette, 2004).

[4] Tzeng's (2000) study examined public-use sample microdata from the Canadian censuses. As noted in the section on Canadian data, Canadian census public use microdata files are not appropriate for studying intermarriage.

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We confine our analysis to persons who reported as single origin Asian to the US and Canadian census questions on race or visible minority. [5] The number of categories, definitions, and use of racial data differ in the US and Canada. We recoded the data as needed to produce as comparable categories as possible for the comparative analysis, but also note differences and how we adjusted the data, as described below.

3.1. US data

Data on Asians are based on the 2000 US census 5% public-use micro-sample (PUMS—US Census Bureau, 2004). The 5% PUMS is the most appropriate for studying intermarriage among Asian Americans because it is large enough to yield sufficient samples for subgroup analyses of the Asian American population. The question on marital status is asked only of persons aged 15 and older. A married couple file was constructed by extracting all couples where each partner reported themselves as married and to each other,[6] and where at least one partner was reported as single origin Asian. The file also includes married couples that were in subfamilies.[7] We retained all cases that met this criterion. The unweighted sample size was 118,664 couples. Applying appropriate weights produces estimates representative of the population.

3.2. Canadian data

The question on marital status is also asked only of persons aged 15 and older in the Canadian 2001 census. For the Canadian data, we included couples that are currently legally married and living together.[8]

[5] In accordance with Employment Equity legislation, the Canadian Census collects data on the racial composition of its population and allows the reporting of single and multiple races. The Canadian Census question refers to "visible minority" groups, which we use to approximate race (see Canadian 2001Census 2b Form, www.statcan.ca). The US Census collects data on race, and until the 2000 Census, did not permit the reporting of more than one race (see US 2000 Census Question 6, www.census.gov). Because the multiple origin population in both countries is highly heterogeneous, it is difficult to categorize multiple origins persons as endogamous or intermarried. Small samples also meant that findings for multiple origins persons would be highly unreliable, particularly in Canada. We therefore decided to confine our analysis to single origin Asians.

[6] Married couples were identified by responses to the question on marital status and relationship to the householder. The overwhelming majority of married couples in the US are legally married, but census data do not distinguish between legally married and common law married couples, so there is an unknown but probably very small number of common law married couples in the US data file. Data are generally poor on how many common law marriages there are in the US. We believe the number to be very small because only a few states recognize common law marriages (see www.unmarried.org/common.html).

[7] For the US data, we included subfamilies with a married couple in the data set. Although the proportion of married couples that are in subfamilies is not large (about 4% of all married couples in 2000 were in subfamilies), these couples are typically younger and are more likely to be foreign-born. Compared to married couples that are the main household family (or live in households with only one family), married couples in subfamilies are more likely to be intermarried. In 2000, for example, 7.2% of all married couples in a main family were intermarried; the comparable figure for married couples in a subfamily was 8.5%. Intermarried couples living in subfamilies comprise 4.8% of all intermarried families in 2000. Similar procedures were followed in the Canadian analysis. The census classification distinguishes between economic families, which may have more than one census family. The Canadian analysis presented in this paper relies on census families.

[8] We decided to limit the Canadian couple file to legally married couples to be consistent with the US couple file. Common law marriages are more frequent (about 14% of all couples are common law marriages) and have different legal meanings in Canada.

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The groups listed as visible minorities in Canada are not identical to those identified on the US census question on race, reflecting country differences in the collection of data as well as in the conceptualization and social significance of race or "color".[9] In the US census, the White population includes those identifying as Arabs or as West Asians as well as a large percentage of the "Hispanic" population who identify as White on the race question. In order to undertake comparative research, the Canadian data on visible minority were adjusted to approximate the US procedures and categories. Persons identifying themselves as Arab or West Asian were reassigned to the White Canadian population, as were Latin Americans.

Data requirements also necessitated the analysis of data on the census master database, housed at Statistics Canada. The public use micro data files from the 2001 Canadian census differ in content and format from those of the US 2000 PUMS. Instead of a large flat file that contains household, family and individual characteristics, three separate and non-compatible files exist at the individual, family and household level in Canada. In principle, the family file permits analyzing characteristics of couples. However, the absence of data on specific Asian groups in the family file, comparable to those found in the US PUMS, requires use of the master census database. This database contains responses to the detailed census questionnaire that was given to one in five households (that is, it is a 20% sample, which when weighted provides population estimates). The unweighted number of all couples in the Canadian data file is 1,130,600.

3.3. Defining exogamy/intermarriage

We defined the following marriage and couple types. Endogamous/inmarried Asian couples refer to couples where both partners report the same Asian ethnic background (for example, a Korean/Korean couple). Exogamous/intermarried Asian couples refer to couples where the two partners report either different races or Asian ethnic groups. Intermarried couples therefore include Asian/White couples (for example, a Japanese/White couple), Asian/Minority couples (for example, a Filipino/Black couple), and Asian interethnic couples (for example, a Chinese/Asian Indian couple).

We recognize that the three different types of exogamous couples may represent different forms of marital and social integration. Interracial couples such as Asian/White couples exemplify Gordon's (1964) notion of marital assimilation and amalgamation. From this perspective, the Asian partners in Asian/White marriages can be considered to be integrating into the majority or mainstream. Asian/Minority marriage implies blending with other minority racial groups, with significant differences in how the different couples are perceived and treated (Root, 2001). Some US researchers have used the concept of *segmented assimilation* in discussing the assimilation of an immigrant racial minority into the disadvantaged social world of native-born minorities, for example, when a Vietnamese woman marries an African American husband (Portes, 1995; Zhou, 1997). For such a couple, the Vietnamese partner is not assimilating into the mainstream but is likely to experience the additional racial prejudice, discrimination, and limited opportunities that have so long defined the experiences of Black and other racial minorities in the US.

[9] The question is used to define "visible minorities", or persons of color, in Canada (see note 5 above).

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The third type of intermarriage, Asian inter-ethnic marriages, represents yet a different form of marital and social blending. For example, a Chinese/Japanese couple may not strike the casual observer as intermarried because of similar physical appearances between the two partners, but the two partners bring different cultures, languages, and Asian and North American histories to the marriage. Differences between Asian ethnic groups are more evident if the couple were Korean/Asian Indian or Filipino/Vietnamese. Some observers believe that Asian inter-ethnic marriage signifies Asian pan-ethnicity, as various Asian ethnic groups react to common racialized experiences in a White dominant society by creating new bonds of solidarity and common identity as Asians (Espiritu, 1992; Purkayastha, 2005). For example, Shinagawa and Pang (1996) highlight the role of pan-Asian ethnicity in Asian inter-ethnic intermarriage, and discuss the potential cultural significance and implications of such marriages for relations across Asian groups, pan-Asian American identity, and organization. Others have cautioned that the idea of pan-Asian ethnicity as a form of reactive ethnicity is "thin" with only minor relevance for daily life (Kibria, 2002, p. 199). Kibria (2002) believes that sufficient differences between various Asian ethnic groups lead most Asian groups to prefer to identify with specific ethnicities rather than an overarching pan-Asian ethnicity. In addition, Asian inter-ethnic marriages are diverse in form and implication, and it is unclear, given the state of current research, that different Asian inter-ethnic marriages (for example, Chinese/Japanese, Korean/Filipino, Asian Indian/Vietnamese, etc.) can all be explained by a perspective that assumes a common racialized experience in North America leading to reactive ethnicity and pan-Asian consciousness and identity.

While we agree that different exogamous couples represent and imply different forms of marital and social integration, our perspective is that *all* forms of exogamy represent the crossing of racial and ethnic boundaries that are counter to traditional endogamy. In this sense, each is a significant indicator of marital blending and integration into a new and evolving multiracial and multiethnic North America.

3.3.1. Variables

In our analysis we examine, and control for, the relationship between marriage type and the following sociodemographic characteristics.

3.3.1.1. Place of residence (region in the US and province in Canada). Researchers often include a measure of place of residence to capture the effects of group size and concentration, availability or non-availability of co-ethnic partners, racial/ethnic diversity, contextual norms on race/ethnic relations, etc. We recognize that US regions and Canadian provinces are crude measures of the effects of place of residence on exogamy. In a comparative study, we face additional constraints in obtaining comparable indicators of place of residence that are at smaller geographical areas (for example, what would be the Canadian equivalent of PUMAs in the US Census?). However, the Asian population is highly concentrated in urban/suburban areas in particular regions/provinces in both countries. In the US, almost half of Asians live in the West, and most reside in large metropolitan areas, for example, New York in the Northeast, San Francisco and Honolulu in the West, Chicago in the Midwest, and Houston and Dallas in the South (Barnes and Bennett, 2002). In Canada, the Asian population is even more concentrated (Statistics Canada, see www40.statcan.ca/101/cst01/demo52a.htm). About 80% live in either Ontario (52%) or British Columbia (28%), and most are concentrated in the greater Toronto metropolitan area in Ontario

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(44%) or the greater Vancouver area in British Columbia (25%). In this comparative study of Asians, region and province are therefore better proxies of place effects than usual.

3.3.1.2. Age. Previous research on Asian intermarriage in the US found that intermarriage is more likely among younger Asian Americans (Lee and Edmonston, 2005). The role of younger age on intermarriage is likely related to changes in laws, social attitudes, and norms on intermarriage. Surveys also show that racial attitudes have changed most in recent years and younger people are less prejudiced (Krysan, 2005). Younger people, on average, also have higher educational attainment and studies have showed that education is positively related to intermarriage, as described below.

3.3.1.3. Education. A generally positive relationship exists between education and intermarriage (Lee and Edmonston, 2005; Qian et al., 2001). More educated people are less likely to be prejudiced and may have greater opportunities to meet potential spouses from different racial and ethnic backgrounds. However, the relationship is not always monotonic (Lee and Edmonston, 2005). At the highest levels of educational attainment, exogamy may be slightly lower as a result of increased opportunities to meet other Asians while in college and increased pan-Asian ethnic consciousness and identity through involvement with pan-Asian organizations in college (Espiritu, 1992; Purkayastha, 2005; Shinagawa and Pang, 1996).

3.3.1.4. Income. The positive relationship between education and income suggests that high income couples will be more likely to be exogamous than low income couples (Lee and Edmonston, 2005). In this study, we use mean family income to assess income differences in exogamy.

3.3.1.5. Gender. Previous research on Asian American intermarriage has found that women are more likely to intermarry (Lee and Edmonston, 2005). Gender differences in interracial marriage patterns may reflect the combined effects of largely male armies and histories of contact between North Americans and Asians, such as the large primarily male US military presence in Japan after World War II, Korea after the Korean War, and US military bases in the Philippines (Jacobson and Heaton, 2003). Some observers have pointed to the role of popular North American/Western culture in their portrayals of Asian women as feminine and exotic, traits that may enhance their attractiveness as partners for non-Asian men (Mullings, 1994). The same popular culture may also have reduced Asian men's attractiveness as mates, given negative stereotypes of Asian men and their general absence in popular culture and the mass media (Espiritu, 1996).

3.3.1.6. Asian ethnicity. Intermarriage rates vary across Asian ethnic groups (Lee and Fernandez, 1998), reflecting differences in demographic histories (for example, some Asian ethnic groups such as the Japanese have longer histories in the US and Canada, and most are native-born); contexts of immigration (for example, in both countries, the Vietnamese populations are relatively recent arrivals following the end of the Vietnam War and are refugees-turned-immigrants unlike other Asian ethnic groups who arrived as voluntary immigrants); and other characteristics, including socioeconomic status and geographical distribution (Xie and Goyette, 2004). In addition, some Asian ethnic groups, for example, Asian Indians, may have stronger preferences for endogamy because of cultural traditions such as caste endogamy and arranged marriage (Khandelwal, 2002).

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3.3.1.7. Immigrant generation. Finally, whether Asians are born in North America or abroad strongly affects their likelihood of intermarriage.[10] Previous research on Asian Americans found higher intermarriage rates among US-born Asian Americans (Lee and Edmonston, 2005; Qian et al., 2001). Foreign-born Asians may have arrived as adults and may be already married, almost always to someone of similar racial/ethnic background (Hwang and Saenz, 1990). Foreign-born Asians may also be more closely tied to their native cultures that may include norms against exogamy. Previous research on foreign-born populations suggests that it is important to consider age at arrival in studying immigrants and integration. If immigrants arrive as very young children, their experiences in the host society may be closer to that of the native-born than immigrants who arrived as adults (Danico, 2004; Rumbaut, 2004). We therefore separate foreign-born Asians into the 1.0 generation (those who arrived aged 13 and older) and 1.5 generation (those who arrived between 0 and 12 years of age). Some researchers have suggested finer distinctions among the foreign-born (for example, defining a 1.75 generation for immigrants who arrived between age 0 and 6, etc.—see Rumbaut, 2004) but small sample sizes (particularly with the Canadian data) precluded this. We expect Asians born in North America (the second and higher generations)[11] and the 1.5 generation to be more open to interracial relationships, including intermarriage.

3.3.2. Methods

In addition to presenting descriptive findings on the above covariates of exogamy and endogamy, we also undertake a multivariate analysis consisting of two parts. First, we estimate a logistic regression model of intermarriage, coded as a binary dependent variable, using country similar independent individual and other characteristics. Second, in order to compare intermarriage differences between various Asian ethnic groups in the US and Canada, we calculate probabilities for intermarriage for Asian ethnic groups by gender and immigrant generation based on the logits produced from the logistic regression. We decided against estimating multinomial logistic regression models using three categories of exogamy (Asian/White, Asian/Minority, and Asian inter-ethnic) for two reasons: the overwhelming majority of exogamous couples in both the US and Canada is Asian/White and very small numbers exist for the other categories, especially for the Canadian data, as described below.

4. Descriptive results

4.1. Overall rates

The majority of Asian couples are endogamous—about 80% of US Asian couples (Table 1, second row) and 92% of Canadian Asian couples (Table 2, second row). As expected, exogamy is higher in the US where about 20% of Asian couples are exogamous

[10] We recognize that cross-nativity intermarriage can overlap with the relationship between immigrant generation and racial/ethnic intermarriage in the integration of immigrants (see Qian and Lichter, 2001) but this study's focus is on the latter process.

[11] Although the 2001 Canadian Census included a question on parents' place of birth, which allows separating the Canadian-born into second and third-plus generations, US Census data do not allow breaking down the native born population into specific generations, such as the second, third, etc., generations. To maintain comparability, the native-born are not further categorized by generation.

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Table 1
Asian couple types by selected characteristics, US, 2000

	Total	Endogamous couples[a]	Intermarried couples		
			Inter-ethnic couples[b]	Asian/white couples[c]	Asian/minority couples[d]
All couples, number	4,401,507	3,543,460	155,698	557,558	144,791
All couples, percent	100.0	80.5	3.5	12.7	3.3
All husbands, percent	100.0	86.7	3.8	7.0	2.5
All wives, percent	100.0	75.1	3.3	17.6	4.0
Region of residence, percent					
Northeast	100.0	78.8	1.9	15.4	3.9
Midwest	100.0	68.0	2.0	26.0	4.0
South	100.0	63.8	2.2	27.9	6.0
West	100.0	68.3	4.1	20.9	6.6
Age groups, percent					
Husbands					
15–29	100.0	77.6	4.8	13.0	4.5
30–39	100.0	84.7	4.3	8.3	2.7
40–49	100.0	86.7	4.0	6.9	2.4
50 & Over	100.0	89.8	3.1	5.0	2.0
Wives					
15–29	100.0	74.9	3.6	16.1	5.4
30–39	100.0	73.0	3.7	19.0	4.3
40–49	100.0	74.2	3.5	18.3	4.1
50 & Over	100.0	78.4	2.6	16.0	3.0
Education, percent					
Husbands					
Less than HS	100.0	92.8	2.7	2.0	2.5
High school graduate	100.0	87.4	3.5	5.5	3.6
Some college[e]	100.0	81.6	4.7	9.9	3.8
Bachelor's Degree	100.0	85.7	4.7	7.6	1.9
Post-Bachelor's	100.0	87.4	3.2	8.1	1.3
Wives					
Less than HS	100.0	83.1	2.4	11.2	3.3
High school graduate	100.0	72.2	2.8	19.6	5.4
Some college	100.0	68.0	3.9	22.5	5.6
Bachelor's degree	100.0	75.7	3.9	17.2	3.1
Post-Bachelor's	100.0	77.1	3.1	17.3	2.5
Mean family income (US$)	83,385	81,283	91,311	91,858	72,226
Immigrant generation, percent					
Husbands					
US-Born (2.0+Generation)[f]	100.0	56.9	11.2	24.4	7.5
Foreign born	100.0	90.9	2.3	4.6	1.8
1.5 Generation[g]	100.0	65.6	6.9	22.0	5.4
1.0 Generation[h]	100.0	92.4	2.5	3.6	1.6
Wives					
US-born (2.0+ Generation)[f]	100.0	47.7	8.2	34.9	9.2
Foreign born	100.0	78.7	2.7	15.3	3.3

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Table 1 (*continued*)

	Total	Endogamous couples[a]	Intermarried couples		
			Inter-ethnic couples[b]	Asian/white couples[c]	Asian/minority couples[d]
1.5 Generation[g]	100.0	55.2	5.7	32.3	6.8
1.0 Generation[h]	100.0	80.3	2.4	14.2	3.1

[a] Both partners report the same Asian ethnic background, for example, Korean/Korean couples.
[b] Both partners are Asian, but of different Asian ethnic background, for example, Chinese/Japanese couples.
[c] One partner is Asian, the other is White.
[d] One partner is Asian, the other is a minority race, for example, Filipino/Black couples.
[e] Includes all post-high school (secondary) education training such as community college as well as some college.
[f] US Census data cannot distinguish between the second (2.0) generation (children of immigrants) and other native-born generations (third and higher).
[g] Foreign-born who arrived as very young children aged 0 to 12.
[h] Foreign-born who arrived at age 13 and older.

compared with 8% in Canada. In both countries, intermarried Asians are most likely to be married to Whites: 65% of Asian exogamous couples in the US are Asian/White, compared with about 17% that are either Asian inter-ethnic or Asian/Minority (Table 1, second row). Almost three-fourths of exogamous couples in Canada are Asian/White, with about 17% Asian inter-ethnic and 10% Asian/Minority (Table 2, second row). And in both countries, Asian wives are more likely to be intermarried (Tables 1 and 2, third and fourth rows).

4.2. Place of residence

In the US, we find that intermarriage is highest in the South, intermediate in the Midwest and West, and lowest in the Northeast (Table 1). In Canada, intermarriage is highest among Asians in the Atlantic Provinces and territories, where almost 30% of Asian couples are intermarried (Table 2).[12] The three most populous provinces, Ontario, Quebec, and British Columbia, have the lowest exogamy rates (about 10% or lower) followed by the Prairie Provinces at 11%. The role of relative Asian population size and concentration appears more evident in Asian exogamy in Canada than in the US.

4.3. Age

Results confirm previous research findings on age and intermarriage: exogamy is higher among younger couples. In the US, age differences in exogamy are larger among Asian husbands (Table 1). The difference in exogamy rate between the youngest and oldest husbands is 12 percentage points compared with just 3 percentage points for wives. Age differences in exogamy are much smaller in Canada but generally follow a similar pattern (Table 2).

4.4. Education

Consistent with previous research, intermarriage tends to increase with education but the increase is not linear. Compared to Asians with less than high school education, the

[12] The territories were combined with the Atlantic Provinces as the small population in the former means that trends could not be displayed specifically for the territories.

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Table 2
Asian couple types by selected characteristics, Canada, 2001

	Total	Endogamous couples[a]	Intermarried couples		
			Inter-ethnic couples[b]	Asian/white couples[c]	Asian/minority couples[d]
All couples, number	1,130,600	1,036,800	15,800	68,400	9600
All couples, percent	100.0	91.7	1.4	6.1	0.8
All husbands, percent	100.0	93.5	1.4	4.3	0.7
All wives, percent	100.0	89.9	1.4	7.7	1.0
Province of residence, percent					
Atlantic province and territories	100.0	72.3	2.0	24.5	1.2
Quebec	100.0	90.9	1.3	7.2	0.7
Ontario	100.0	92.8	1.3	5.0	1.0
Prairie provinces	100.0	88.6	1.6	8.8	1.0
British Columbia	100.0	91.6	1.5	6.3	0.6
Age groups, percent					
Husbands					
15–29	100.0	90.8	2.3	5.6	1.3
30–39	100.0	91.8	2.0	5.4	0.8
40–49	100.0	93.8	1.5	4.1	0.7
50 And over	100.0	94.8	0.9	3.7	0.6
Wives					
15–29	100.0	89.4	1.7	7.5	1.4
30–39	100.0	86.9	1.8	10.2	1.2
40–49	100.0	89.9	1.2	7.8	1.0
50 And over	100.0	93.1	1.0	5.3	0.7
Education, percent					
Husbands					
Less than HS	100.0	97.2	1.0	1.4	0.5
High school graduate	100.0	95.3	1.1	2.8	0.8
Some college[e]	100.0	91.5	1.9	5.6	0.9
Bachelor's degree	100.0	91.7	1.6	6.0	0.7
Post-bachelor's	100.0	92.5	1.2	5.7	0.6
Wives					
Less than HS	100.0	96.3	0.9	2.2	0.6
High school graduate	100.0	93.2	0.9	5.0	0.9
Some college	100.0	85.8	1.8	11.1	1.3
Bachelor's degree	100.0	85.2	1.8	11.8	1.2
Post-bachelor's	100.0	87.8	1.1	10.3	0.7
Mean family income (Canadian$)	61,592	59,424	76,004	89,663	71,821
Immigrant generation, percent					
Husbands					
Canada-born (2.0+ Generation)[f]	100.0	58.8	4.9	34.0	2.2
Foreign born	100.0	95.1	1.3	3.0	0.6
1.5 Generation[g]	100.0	75.6	4.7	17.9	1.7
1.0 Generation[h]	100.0	95.9	1.1	2.4	0.6
Wives					
Canada-born (2.0+Generation)[f]	100.0	55.5	2.8	39.5	2.2
Foreign born	100.0	91.5	1.3	6.3	0.9

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Table 2 (*continued*)

	Total	Endogamous couples[a]	Intermarried couples		
			Inter-ethnic couples[b]	Asian/white couples[c]	Asian/minority couples[d]
1.5 Generation[g]	100.0	70.9	3.3	24.1	1.7
1.0 Generation[h]	100.0	92.5	1.2	5.4	0.9

[a] Both partners report the same Asian ethnic background, for example, Korean/Korean couples.
[b] Both partners are Asian, but of different Asian ethnic background, for example, Chinese/Japanese couples.
[c] One partner is Asian, the other is White.
[d] One partner is Asian, the other is a minority race, for example, Filipino/Black couples.
[e] Includes all post-high school (secondary) education training such as community college as well as some college.
[f] The 2001 Canada Census includes a question on birthplace of parents, so one can distinguish the 2.0 generation (Canada-born children of immigrants) and other native-born generations. However, we do not do this to maintain comparability with US Census data.
[g] Foreign-born who arrived as very young children aged 0 to 12.
[h] Foreign-born who arrived at age 13 and older.

percentage intermarried is higher among high school graduates and those with some college education, but the percentage intermarried in the US declines among college graduates and those with post-Bachelor's degree education (Table 1). The non-linear relationship between education and intermarriage is also observed among Asian Canadians but the reversal is not as large (Table 2). Educational differences in exogamy are similar for husbands and wives in both countries.

4.5. Income

Income differences generally follow educational patterns in Asian exogamy and also provide some support for the segmented assimilation perspective (US only). In the US, Asian inter-ethnic and Asian/White couples have higher mean family incomes than endogamous Asian couples, while Asian/Minority couples have the lowest mean family income. In Canada, endogamous Asian couples have the lowest mean family income whereas Asian/White couples have the highest average family income. These differences are related to foreign birth, as the vast majority of endogamous Asian couples in Canada are foreign-born (see below). Unlike endogamous Asian American couples, endogamous Asian couples in Canada have lower mean family incomes than Asian/Minority couples.

4.6. Immigrant generation

Intermarriage by immigrant generations reveals (i) large differences between native- and foreign-born Asians; (ii) linear increases in intermarriage from the 1.0 generation to the 2.0 and higher generations; and (iii) higher intermarriage rates among wives regardless of immigrant generation. Over 40% of US-born Asian husbands and more than half of US-born Asian wives are intermarried compared with 10% of foreign-born husbands and 20% of foreign-born wives (Table 1). A similar difference is found in Canada where 41% of Canadian-born Asian husbands and 44% of Canadian-born Asian wives are intermarried compared with 5–8% of foreign-born Asian husbands and wives, respectively (Table 2).

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Among the foreign-born, 1.5 generation Asians are between three to four times more likely to be intermarried than the 1.0 generation. For example, 34% of 1.5 generation US Asian husbands are intermarried compared with just 8% of 1.0 generation US Asian husbands (Table 1). Comparable figures for Canadian Asian husbands are 25% and 4%, respectively (Table 2).

Fifty-two percent of US-born Asian wives are intermarried compared with 43% of husbands (comparable figures for the Canadian-born are 44% and 41%, respectively); 45% of 1.5 generation Asian American wives are intermarried versus 34% of 1.5 generation husbands (comparable figures for Canadian 1.5 generation wives and husbands are 30% and 25%, respectively); and 20% of 1.0 generation Asian wives compared with 8% of 1.0 generation husbands in the US are intermarried. The gender gap among 1.0 generation Asians in Canada is not as large—7% versus 4%. Country differences in past and present overseas military bases may be a reason for the larger gender gap in the United States. Both historically and today, the US has a greater number of military bases and personnel overseas than does Canada.

Given the complex relationships uncovered between immigrant generation and gender on intermarriage, we further examine these factors for specific Asian ethnic groups.

4.7. Specific Asian ethnic groups: Immigrant generation and gender comparisons

Table 3 compares intermarriage rates by immigrant generation for specific Asian ethnic groups, for husbands and wives, for the US and Canada. For some groups in Canada, the numbers are too small to permit confidence in, and release of, the findings, as noted in Table 3.

There are five main findings. First, intermarriage rates vary by Asian ethnic group. Comparing all husbands and wives (Table 3, column 1), Japanese in North America are most likely to be intermarried—41% of Japanese Americans and almost 50% of Japanese Canadians. Filipinos and Koreans in the US also have fairly high intermarriage rates (29% and 20%, respectively). In Canada, over 16% of Filipinos are intermarried. In both countries, Asian Indians/South Asians have the lowest intermarriage rate in (9% in the US and 5% in Canada).

Second, the role of immigrant generation described earlier is observed for all Asian ethnic groups with the exception of Japanese in the US (Table 3, columns 2–5). For all Asian ethnic groups, intermarriage is highest for the US/Canadian-born, followed by the 1.5 generation, and lowest for the 1.0 generation. However, among Japanese in the US, foreign-born Japanese's intermarriage rates exceed the US-born Japanese rate, regardless of whether the foreign-born Japanese are 1.5 or 1.0 generation.

Third, the higher intermarriage rate of Asian wives described earlier also characterizes all Asian ethnic groups except Asian Indians/South Asians (Table 3, columns 6 and 11). For this ethnic group, husbands are more likely to intermarry.

Fourth, when we examine intermarriage rates by gender, immigrant generation, and Asian ethnic group, we find that in most cases, intermarriage rates increase with generational status (Table 3, columns 7–10 and 12–15). The exceptions are foreign-born Japanese wives in the US who intermarry at a higher rate than US-born Japanese wives and 1.5 generation Japanese husbands. Foreign-born Japanese wives in Canada intermarry at roughly equal rates as Canadian-born Japanese wives, and over half of

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Canadian-born Japanese husbands are intermarried compared with just 22% of foreign-born Japanese husbands.

Fifth, among Asians born in North America, more wives are intermarried for all Asian ethnic groups except among Asian Indians/South Asians (Table 3, columns 7 and 12). US-born Asian Indian husbands and wives are equally likely to be intermarried but Canadian-born South Asian husbands are more likely to be intermarried than Canadian-born South Asian wives.

The findings shown in Table 3 highlight the importance and complexities of the role of immigrant generation, gender, and Asian ethnic group on Asian intermarriage in North America. Some general patterns are similar, for example, higher intermarriage among Japanese and Filipinos, women, the native born, and 1.5 generation Asians, and lowest intermarriage rate among Asian Indians/South Asians. Differences between the 1.0 and 1.5 generations reflect the importance of exposure to US or Canadian society at younger ages with increased contact with potential partners of different racial/ethnic backgrounds. Asian ethnic group differences reflect sociodemographic characteristics specific to each Asian ethnic group. For example, the Japanese have a longer history of family immigration and settlement in North America while other Asian groups such as Koreans and Asian Indians/South Asians are relatively recent arrivals. In Canada, immigrants, particularly recent arrivals, dominate the Chinese and South Asian communities.

Table 3
Percent intermarried[a] by Asian ethnicity, nativity, and gender, US, 2000, and Canada, 2001

	All husbands and wives					Husbands					Wives				
	Total	NB[b]	FB[c]	1.5G[d]	1.0G[e]	Total	NB	FB	1.5G	1.0G	Total	NB	FB	1.5G	1.0G
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)
United States															
Japanese	41.3	39.0	44.2	67.5	42.3	30.6	35.8	20.7	65.5	15.8	49.2	42.3	55.6	69.1	54.7
Chinese	13.6	47.5	9.8	32.9	8.3	10.3	42.3	6.6	28.5	5.3	16.8	52.5	12.8	36.4	11.2
Filipino	28.5	63.4	24.4	51.2	21.9	16.7	58.2	11.3	42.0	8.3	37.4	68.0	34.1	58.5	31.9
Korean	20.3	62.1	18.9	48.3	16.2	6.8	52.6	5.1	32.4	2.8	30.5	69.4	29.1	59.2	26.3
Asian Indian	9.2	40.7	8.3	27.3	7.4	10.3	40.6	9.5	27.2	8.9	8.0	40.8	7.0	27.5	5.9
Vietnamese, SE, other Asians	17.9	66.2	15.8	34.9	13.9	13.7	62.8	11.7	31.7	10.1	21.8	68.8	19.5	37.0	17.4
Canada															
Japanese	48.8	52.8	43.8	[f]	42.8	41.9	51.7	22.4	[f]	20.2	54.4	53.9	54.8	[f]	54.3
Chinese	6.4	43.5	4.6	25.5	3.8	5.4	39.4	3.8	23.5	3.0	7.4	47.2	5.4	27.4	4.5
Filipino	16.3	50.2	15.8	49.2	14.4	5.7	41.5	5.2	39.7	3.9	24.8	55.8	24.2	56.5	22.9
Korean	7.6	71.0	6.6	43.1	5.1	4.1	[f]	3.1	32.2	2.0	81.2	[f]	9.8	53.2	8.1
Asian Indian	5.1	23.3	4.7	20.0	3.8	5.8	24.8	5.4	20.3	4.6	4.4	22.0	3.9	19.6	3.0
South East Asians	11.4	[f]	11.3	32.5	10.1	8.5	[f]	8.4	28.0	7.5	32.6	[f]	14.1	35.4	12.6

[a] Intermarried includes all intermarried couple types listed in Tables 1 and 2.

[b] Native-born (that is, US-born for Asians in the US and Canada-born for Asians in Canada). This group is also referred to as the 2.0 and/or higher generation.

[c] Foreign-born (that is, not born in the US for Asians in the US, and not born in Canada, for Asians in Canada). Includes 1.5 and 1.0 generations.

[d] 1.5 Generation (as defined in Tables 1 and 2).

[e] 1.0 Generation (as defined in Tables 1 and 2).

[f] Not reported; Canadian Census master file counts for the cell are less than 100.

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5. Multivariate results

In order to control for the impact of group differences in socio-demographic characteristics, we estimate a logistic regression model of intermarriage to further examine and compare intermarriage among Asian ethnic groups. Independent variables in the model include a combined gender/generation variable,[13] age, geography, education, and family income.

In the logistic regression model, deviation coding is used in which logits and derived odds ratios for categories of specific independent variable are presented as deviations from the overall unweighted mean of that variable. Not only does this method of calculating logits provide information about the relationship between all categories of an independent variable and the dependent variable, but it also readily converts results to those found using the indicator method where a specific category for a given independent variable is selected as a reference category. This conversion is accomplished by subtracting the logit of the reference category from all logits associated with a categorical independent variable. Probabilities are obtained by adding the constant to the logit for each category of a specific independent variable, producing "x" and employing the formula $\{\exp(x)/1+(\exp(x)\}$. When multiplied by 100, these probabilities indicate the hypothetical chances of intermarriage for each category of an independent variable, adjusting for the influences of other independent variables in the logistic regression model. We also calculate the combined probabilities of intermarriage for men and women of different generation groups in order to highlight the progressively higher rates of intermarriage for those who are raised or born in the US or Canada.

Although we present logits, odds ratios and probabilities for our independent variables of age, region/province of residence, education and family income in Table 4, the results generally mirror the patterns observed in the descriptive results. We therefore focus on variations by Asian ethnicity and gender/nativity, net of these other independent variables.

In the US, Japanese and Filipinos are most likely to intermarry (with odds ratios showing that they are 70% more likely to intermarry), followed by Koreans (17% more likely to intermarry—Table 4, column 3). Chinese and Asian Indians are less likely to intermarry (Table 4, column 3). As a group, Vietnamese, Southeast, and other Asians are also less likely to intermarry but their lower odds are not statistically significant. Japanese in Canada are strikingly more likely to intermarry compared to other Asian ethnic groups: Japanese Canadians are over three times more likely to intermarry (Table 4, column 4). Filipinos and Southeast Asians in Canada are also more likely to intermarry while Chinese, Koreans, and South Asians are less likely.

Expected chances of intermarriage (Table 4, columns 5 and 6) provide another way of comparing ethnic group effects on intermarriage. Japanese in Canada have the highest chance of intermarriage (54, or a probability of over 0.5) followed by Japanese and Filipinos in the US (42), Filipinos in Canada (36), Koreans in the US (33) and Southeast Asians in Canada (32). In both countries, Asian Indians/South Asians are least likely to inter-

[13] We did not create detailed gender/immigrant generation categories by specific Asian ethnic group, for example, Japanese female 1.5 generation, Japanese male 1.5 generation, Korean female 1.5 generation, Korean male 1.5 generation, etc. Instead, we incorporate a main effects model using specific Asian groups and a gender-immigrant generation variable to handle the problems of small Ns that arise in Canada when specific Asian ethnic groups are further categorized by gender and generation.

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Table 4
Logits, odds ratios and chances out of 100 for intermarriage, United States and Canada, 2000 and 2001

	Logits		Odds ratios[a]		Expected chances[b]	
	United States	Canada	United States	Canada	United States	Canada
	(1)	(2)	(3)	(4)	(5)	(6)
Asian group						
Japanese	0.534***	1.138***	1.70	3.12	42	54
Chinese	−0.375***	−0.633***	0.69	0.53	22	17
Filipino	0.534***	0.402***	1.71	1.50	42	36
Korean	0.156***	−0.300***	1.17	0.74	33	22
Asian Indian	−0.803***	−0.834***	0.45	0.43	16	14
Vietnamese, SE and Other Asians[c]	−0.045 (ns)	0.226***	0.96	1.25	29	32
Gender and nativity						
US/Canadian born male	0.502***	0.717***	1.65	2.05	41	43
Foreign born male, 1.5 Generation	0.100 (ns)	0.269***	1.11	1.31	32	33
Foreign born male, 1.0 Generation	−1.519***	−1.489***	0.22	0.23	8	8
US/Canadian born female	0.840***	0.928***	2.32	2.53	49	49
Foreign born female, 1.5 Generation	0.565***	0.450***	1.76	1.57	43	37
Foreign born female, 1.0 Generation	−0.488***	−0.875***	0.61	0.42	21	13
Age						
Below 30	0.053 (ns)	0.028 (ns)	1.05	1.03	31	28
30–39	0.130***	0.198***	1.14	1.22	32	31
40–49	0.100***	0.021 (ns)	1.10	1.02	32	28
50 and older	−0.282***	−0.247***	0.75	0.78	24	23
Region/Province						
USA: Northeast	−0.239***		0.79		25	
USA: Midwest	0.134***		1.14		32	
USA: South	0.348***		1.42		37	
USA: West	−0.242***		0.78		25	
Can: Atlantic provinces and territories		1.067***		2.91		52
Can: Quebec		−0.083**		0.92		26
Can: Ontario		−0.459***		0.63		19
Can: Prairie provinces		−0.145***		0.87		24
Can: British Columbia		−0.379***		0.68		20
Education						
Less than HS	−0.181***	−0.598***	0.83	0.55	26	17
HS Graduate	0.043 (ns)	−0.208***	1.04	0.81	31	23
Some College	0.163***	0.276***	1.18	1.32	33	33
Bachelor's Degree	−0.114***	0.211***	0.89	1.23	27	32
Post-Bachelor's	0.089**	0.319***	1.09	1.38	32	34
Family income						
Less than 15k	−0.441***	−0.533***	0.64	0.59	21	18
15k to 29999	−0.154***	−0.338***	0.86	0.71	27	21
30k to 44999	0.072*	−0.191***	1.07	0.83	31	24
45k to 59999	0.149***	−0.012 (ns)	1.16	0.99	33	27
60k to 74999	0.151***	0.193***	1.16	1.21	33	31
75k to 99999	0.113***	0.337***	1.12	1.40	32	34

(*continued on next page*)

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Table 4 (*continued*)

	Logits		Odds ratios[a]		Expected chances[b]	
	United States	Canada	United States	Canada	United States	Canada
	(1)	(2)	(3)	(4)	(5)	(6)
100k and over	0.110***	0.544***	1.12	1.72	32	39
Constant	−0.865***	−0.985***				

(ns) Not significant at $p = 0.05$ level.

[a] Results deviate from the unweighted mean of that variable.

[b] Expected chances out of 100. If the figures are divided by 100, they become probabilities, varying between 0 and 1.

[c] Only South East Asian for Canadian results.

* $p < 0.05$.

** $p < 0.01$.

*** $p < 0.001$.

marry, with expected chances of 16 and 14 in the US and Canada, respectively. The Chinese are also less likely to intermarry with probabilities of about 0.2 in both countries.

Effects of the combined gender/generation variable confirm descriptive findings and provide additional insights on the combined effects of gender and generation status. North American-born Asian females are most likely to intermarry with expected chances of exogamy at almost 50 or one-in-two (Table 4, columns 5 and 6). Canadian-born males (43), 1.5 generation US females (43), and US-born males (41) have very similar expected chances of exogamy, followed by slightly lower expected chances of exogamy among 1.5 generation Canadian females at 37 (Table 4, columns 5 and 6).

While the 1.0 generation in both countries have lower chances of exogamy, 1.0 generation females have higher chances of exogamy compared with 1.0 generation males in both countries, further underlining the importance of gender differences in Asian exogamy. In addition, while 1.0 generation males in both countries have similarly low chances of intermarriage (8), US 1.0 generation females are more likely to intermarry than 1.0 generation Canadian females (21 versus 13). Results underline the strong effects of Asian ethnic group, gender, and immigrant generation on Asian intermarriage. We further evaluate the effects of gender and immigration generation for specific Asian ethnic groups, focusing on US/Canada comparisons between Asian ethnic groups (see Table 5).

US-born Chinese and Korean men's probabilities of intermarriage exceed their Canadian-born counterparts while Canadian-born Japanese and Southeast Asian men's probabilities of intermarriage exceed their US-born counterparts. Probabilities of intermarriage for US or Canadian-born Filipino and Asian Indian/South Asian men are similar (Table 5, column 1).

Foreign-born 1.5 generation Asian men's probability of intermarriage are higher in Canada among Japanese and Southeast Asians but lower for 1.5 generation Chinese, Filipinos, and Koreans, compared with similar groups in the US. 1.5 generation Asian Indians in the US and South Asians in Canada have the lowest probability of intermarriage at around 0.17 (Table 5, column 2). Similar results characterize the 1.0 generation Asian men in both the US and Canada, except the probabilities for the 1.0 generation men are all lower (Table 5, column 3).

The effects of immigrant generation on various Asian ethnic women's probabilities of exogamy parallel those observed for Asian men. The chances of intermarriage increase

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Table 5
Expected chances out of 100[a] of Intermarriage for Asian groups by sex and nativity status, United States and Canada, 2000 and 2001

	Men			Women		
	NB	FB, 1.5 Gen.	FB,1.0 Gen.	NB	FB, 1.5 Gen.	FB,1.0 Gen.
	(1)	(2)	(3)	(4)	(5)	(6)
United States						
Japanese	54	44	14	62	56	31
Chinese	32	24	6	40	34	15
Filipino	54	44	14	62	56	31
Korean	45	35	10	53	46	23
Asian Indian	24	17	4	30	25	10
Vietnamese, SE and Other Asians	40	31	8	48	41	20
Canada						
Japanese	70	60	21	75	65	33
Chinese	29	21	4	33	24	8
Filipino	53	42	11	59	47	19
Korean	36	27	6	41	30	10
Asian Indian	25	18	4	29	20	6
South East Asian	49	38	10	54	42	16

Source: Table 4.

[a] If figures are divided by 100, the figures become probabilities. Calculations assume unweighted mean values for age, education, region and family income.

from the 1.0 to 1.5 to 2 and higher generations for all Asian women, regardless of ethnicity. Asian American women of most ethnic backgrounds, regardless of generation, are more likely to intermarry than their Canadian sisters, except for Japanese women in Canada (columns 4 through 6, Table 5). Finally, Asian women, regardless of ethnicity and generation, are more likely to intermarry than their male counterparts. For example, the probabilities of intermarriage for US and Canadian-born Korean women are 0.53 and 0.41 respectively, compared with 0.45 and 0.36 for Korean men. Similar gender gaps prevail among the 1.5 and 1.0 generations in both the US and Canada.

These comparisons lead to four main conclusions: (i) Immigrant generation is a key factor in intermarriage for Asian men and women in the US and Canada, with the probability of intermarriage increasing markedly from the 1.0 generation to 1.5 generation and native-born generation. (ii) Second, regardless of gender and generation, Asians in the US are generally more likely to intermarry than Asians in Canada, except for Japanese Canadians. Southeast Asians in Canada also have higher probabilities of intermarriage than Vietnamese/Southeast Asian and Other Asians in the US, but these two groups are not directly comparable. (iii) Gender differences are large and consistent: in both countries, Asian women, regardless of ethnicity and generation, are more likely to intermarry than Asian men. (iv) Finally, Asian Indian/South Asian men and women in both the US and Canada, regardless of generation, are the least likely of all Asian ethnic groups to intermarry.

6. Discussion and conclusion

The new immigration beginning in the late 1960s produced dramatic growth of the Asian population in both the US and Canada, reviving questions about the integration of

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this growing racial minority. The history of Asians in North America is quite similar, characterized by ambivalence from the dominant White societies of the US and Canada. Asians were occasionally praised for their work ethic but more often faced prejudice and discrimination and were considered unassimilable. More recently, Asians were often labeled "model minorities", a double-edged epithet that has been roundly criticized by many Asian American scholars (Chan, 1991; Espiritu, 1996; Min, 2006).

This comparative study of Asian intermarriage reveals more similarities than differences in Asian endogamy and exogamy in the US and Canada. The findings on several correlates of Asian intermarriage are generally similar in both countries and consistent with previous research based on US data. For example, Asian women in both the US and Canada intermarry at higher levels than Asian men. Younger and higher-educated Asians are more likely to intermarry, although the effect of education is not linear. Exogamy is lower where there are large Asian populations, such as the provinces of Ontario and British Columbia in Canada. In each country, we found substantial and similar differences in exogamy rates across different Asian ethnic groups, for example, the Japanese are most likely to intermarry while Asian Indians/South Asians are least likely to intermarry.

The main difference in this comparative study is the lower Asian exogamy rate in Canada, where less than 10% of Asian couples are exogamous compared with 20% in the US This difference reflects the effects of population size, concentration, composition, immigration history, and other factors. As previously noted, the Asian population in Canada is a larger proportion of Canada's population, is more concentrated geographically, and is dominated by two ethnic groups (Chinese and Asian Indians) that have lower exogamy rates than other Asian ethnic groups. Canada's Asian population also contains a higher proportion that is foreign born.

While the US and Canadian Asian exogamy rates are not high compared with intermarriage rates among smaller US minority populations such as Hawaiians and Native Americans, they are higher than that of Black Americans, the largest racial minority in the US and similar to the Hispanic intermarriage rate (Lee and Edmonston, 2005). Given current limited research on racial intermarriage in Canada (Milan and Hamm, 2004; Tzeng, 2000), we do not know if the Asian exogamy rate in Canada is particularly low or not. The lower exogamy rate among Asians in Canada suggests that the social integration of Asians in Canada lags behind that of Asians in the US, a difference related to the factors described above. However, given the generally similar relationships between several covariates of intermarriage in Canada and the US, and the extraordinarily high exogamy rate among Japanese Canadians, the Asian ethnic group with the longest history in Canada, we believe that as the Canadian Asian population matures demographically, intermarriage will increase.

The overwhelming majority of intermarried Asians in both the US and Canada are married to Whites, lending support to conventional assimilationist theory (Alba and Nee, 2003; Gordon, 1964). However, additional paths of marital blending include Asian inter-ethnic and Asian/Minority marriages, suggesting that exogamy as a process and indicator of social integration is more complex and nuanced. At first glance, there appears to be some support for the pan-Asian ethnicity perspective. Except for Canadian-born Asian women, the proportion of Asian intermarriages that were Asian inter-ethnic was highest among the native-born in both countries, and the native-born are presumed to be most likely to participate in pan-Asian processes. In addition, Asian inter-ethnic marriage

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increased from the 1.0 through 1.5 and 2.0+ generations among Asian Americans (but not among Asian Canadians).

However, the findings do not show a consistent preference for Asian inter-ethnic exogamy over other forms of exogamy. Asian/White exogamy is the dominant form in both countries, and in the US, the proportion of Asian inter-ethnic marriages was about the same as that of Asian/Minority marriages (about 17–18%). In Canada, there are more Asian inter-ethnic marriages than Asian/Minority exogamy (17% versus 10%—see further discussion below). Exogamy of *all* forms (Asian/White, Asian inter-ethnic, and Asian/Minority) increased with distance from the immigrant generation in both the US and Canada. Indeed, native-born Asians in both the US and Canada participate in the greatest marital blending and integration of all types. There is therefore no strong or consistent evidence in support of the pan-Asian ethnicity thesis, at least as indicated by results from this comparative study. However, as the Asian population in both countries continues to mature demographically and larger proportions share a common experience as racial minorities (assuming no changes in current racial norms), new evidence of pan-Asian ethnicity may yet emerge. Future research on *specific* forms of Asian inter-ethnic exogamy will also help advance theoretical thinking about the role of intermarriage in the development of pan-Asian ethnicity. For example, are particular Asian ethnic groups such as Chinese and Koreans more likely to intermarry with one another, and if so, what are the cultural implications and significance for pan-Asian ethnicity? Conversely, if some Asian ethnic groups, for example, Asian Indians, are less likely to participate in Asian inter-ethnic marriage, does this imply different racialization experiences and affinity with a pan-Asian ethnic community?

Asian/Minority intermarriages are more common in the US than Canada, a difference that is likely related to the long and fairly extensive history of US military presence in various Asian countries noted earlier. Census data analyzed in this paper cannot provide conclusive evidence that these marriages represent segmented marital assimilation. Further research is clearly needed to examine this form of Asian exogamy and its implications for Asians' social integration in both countries.

Among the key findings of this paper are the effects of immigrant generation on intermarriage. For some US and Canadian-born Asian groups such as Japanese, Filipinos and Koreans, intermarriage is almost as, if not more, common than endogamy. New findings on differential intermarriage rates between the foreign-born 1.5 and 1.0 generations highlight the importance of socialization and exposure to US or Canadian society at a young age in the social integration of immigrants. For example, even among groups with relatively low intermarriage rates such as the Chinese in Canada, about 25% or more of 1.5 generation Chinese men and women were intermarried compared with just 3–5% among 1.0 generation Chinese men and women. The results underline the need by researchers to decompose the foreign-born by age at arrival when studying the social integration of immigrants.

Ethnic group differences in intermarriage were also substantial. Intermarriage is more common among Japanese, Filipinos, and Koreans compared to other Asian ethnic groups. Different histories of immigration and settlement may partly explain the differentials. While the Chinese were the first Asian group to immigrate to North America in large numbers beginning in the mid-19th century to work in the gold mines and later railways, most were men who intended to be temporary migrants. The Chinese Exclusion Act passed in 1882 in the US and the Act to Restrict and Regulate Chinese Immigration passed in 1885

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in Canada led to steady declines in the North American Chinese populations until after World War II.

In contrast, the Japanese who started arriving in North America after the Chinese, were able to establish families in North America through traditions such as "picture brides" despite immigration restrictions beginning in the early 20th century. This meant that there were larger numbers of US and Canadian-born Japanese, an important generational difference that has contributed to higher intermarriage among the Japanese. One clear legacy of the differential histories of Chinese and Japanese immigration and settlement is the high intermarriage rate among Japanese Canadians compared with the relatively low intermarriage rates of Chinese in Canada. Most Chinese in Canada consists of immigrants who immigrated to Canada as part of the new immigration. For example, our analysis of 2001 Canadian census data shows that over half of Chinese immigrants arrived in Canada after 1990. In addition to generational differences, the Japanese populations in both the US and Canada are a smaller proportion of the Asian populations; Japanese Canadians are just 3% of Canada's Asian population and Japanese Americans are less than 10% of the Asian American population. Smaller minority groups often have higher intermarriage rates because of well-known group size effects on exogamy.

Filipinos also have a fairly long history in North America and have closer language and cultural ties to North American culture (English language and Catholic religion), which partly explain Filipinos' higher intermarriage rates. However, Koreans are relatively new arrivals in both the US and Canada, and Asian Indians/South Asians come from English-speaking backgrounds, yet Koreans are more likely to intermarry than Asian Indians/South Asians. We note that 1.5 generation Koreans may also include Korean children adopted by American parents as infants, and this group would have different socialization experiences from Korean children who immigrated with their Korean parents. Different data, including qualitative research on cultural preferences in terms of mate selection and gender roles, may also help in further understanding ethnic group intermarriage differences.

The large and stable gender gap in intermarriage between Asian women and men, regardless of ethnicity and generation, is another key finding. Previous research on Asian American intermarriage has reported this gender difference but this study shows that the gender difference is not limited to the US. The posting of military personnel (mainly male) in Asian countries is an important factor for why foreign-born Asian women are more likely to be exogamous. However, the gender differential cuts across all generations. Popular cultural stereotypes of Asian women and men may be a factor but studies using census data cannot assess the effects of cultural factors in Asian intermarriage. Research that can evaluate the effects of subjective factors in marital partner choice, the role of popular culture in shaping notions of femininity and masculinity and relative attractiveness of men and women from different ethnic groups, and gender roles in initiating relationships is needed to complement census-based research.

Comparative analyses involving two different populations in societies that while similar in many ways are also distinct pose unique challenges, including data comparability and the need to be sensitive to sociocultural and historical differences in understanding and interpreting findings. In spite of the challenges of such comparative research, this study has produced new findings on Asian intermarriage that contributes to the literature on the social integration of Asians in a changing North America. Our findings suggest that exogamy of various forms is a well-established marital pattern among many Asian Americans

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and Japanese Canadians, and will become increasingly common among other Asian groups in the US and Canada. Given the significance of intermarriage as a key indicator of social integration as people cross racial and ethnic boundaries to form marriages and new families, the findings reported here imply that future racial and ethnic trends in North America will include growing numbers and proportions of intermarried Asians and their descendants. These new "Asian" Americans and "Asian" Canadians will have increasingly diverse origins that will hold intriguing implications for how Americans and Canadians will see and understand race and ethnicity, as well as the social integration of racial and ethnic minorities.

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