# Gendered age differences in immigrant partnerships 

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## Introduction

Age differences between partners have important implications for gender relations, divorce, widowhood, and partner markets. ${ }^{1}$ Overall, age differences in unions have been remarkably stable across many developed countries, with men on average being two years older than their partners. ${ }^{2}$ However, with changing gender relations in many developed countries during the 20th century, average differences have decreased and more extreme age differences have become more common for marriages and childbearing unions. ${ }^{2-5}$ Despite these trends, there is little comprehensive evidence of variation in age differences within populations, in particular with respect to gender asymmetries. Moreover, there is an almost total absence of research on age differences in immigrant partnerships.

Theories of partner choice suggest that partners are determined by a mixture of preferences, norms and third party influences (for example from parents), alongside partner availability. ${ }^{6}$ Individuals who arrive from other countries may carry with them different norms and preferences about the ideal age difference between partners. The extent to which preferences are met, and norms are adhered to, will depend in part on the partner market in the new home country. Constraints come in the form of a skewed sex ratio, for example as a consequence of unequal male and female migration cohorts, and/or the extent to which men and women seek a partner from their own country of origin as opposed to an immigrant from a different origin, or a partner who is native born.

Gender is intrinsic to the age differences in partnerships, as, on one hand, a larger age difference between partners may be associated with less gender equality and more traditional family values, ${ }^{7}$ while on the other, a greater age difference might be associated with greater family stability and better prospects for integration. The connection between age differences and intermarriage may also vary by gender. In Sweden, immigrants and male descendants of migrants are more likely to marry a Swede than are female counterparts. ${ }^{8,9}$ If there is a stronger norm that female migrants should find a partner within their origin group, fewer potential male partners and may impact age differences at family formation.

Here we use Swedish register data to explore age differences at the time immigrants become parents for the first time. We compare men and women who were born in Iran, Iraq, Turkey, or the rest of the Middle East (mostly Lebanon), and who arrived in Sweden as children (under age 19). By focusing on migrants who arrive as children we are able to follow the entire time at risk of childbearing and limit bias due to origin country norms in adulthood. We run models separately for men and women, including sibling models in order to ascertain whether age differences vary by sex, cohort, and endogamy, even after accounting for factors, such as preferences and norms, that are shared at the family level. Specifically, our research questions are:

1. How do age differences between childhood migrants and their partners vary by gender?
2. What is the role of country of birth and endogamy in explaining gender variation?
3. Is there a reduction in age differences, and gender variation, for more recent cohorts?

## Data and method

We use register-based data that are collected and administered by Statistics Sweden. Our data cover birth cohorts from 1952 until 1994, and include a range of background variables for individuals, their parents, and their siblings. Our study population is immigrants who were born in Iran, Iraq, Turkey or the rest of the Middle East (comprising mostly Lebanese migrants), and who arrived aged under-19. In order to study age differences at first parenthood, we include all childless individuals migrating after 1961 but before 2012, who had a child in 1990 or after and who remained in Sweden for at least one year. Our analyses include heterosexual childbearing unions only, and we exclude anyone who does not have an identifiable partner (plus a very small number of cases who are missing country of birth or age at arrival, or have siblings with different countries of birth). This provides us with a sample of approximately 10,000 male and 11,000 female migrants (see table 1). Sibling models (using fixed-effects for same-sex siblings of the same mother) are used to control for factors that are shared among brothers and sisters at the family level, such as parental, residential, and genetic characteristics, as well as shared exposure to norms.

Table 1: Sibling sample by country of birth

| Male |  |  |
| :--- | :---: | ---: |
| Country of birth | Frequency <br> (n) | $\%$ of <br> total |
| Middle East | 2937 | 29 |
| Iran | 1637 | 16 |
| Iraq | 2059 | 21 |
| Turkey | 3341 | 33 |
|  | Total | $\mathbf{9 9 7 4}$ |


| Female |  |  |
| :--- | :---: | :---: |
| Country of birth | Frequency <br> $(\mathrm{n})$ | $\%$ of <br> total |
| Middle East | 3650 | 32 |
| Iran | 1679 | 15 |
| Iraq | 3024 | 26 |
| Turkey | 3110 | 27 |
|  | Total | $\mathbf{1 1 4 6 3}$ |

## Preliminary results

Table 2 shows the median age differences between parents at first parenthood by the country of birth of both partners. We can compare these with the overall median age difference in Sweden, which is 2 years. ${ }^{2}$ Figure 1 displays box plots of the same age differences as Table 2, and together they reveal that both the average and the dispersion of age differences vary by country of birth and partner's country of birth. They also show very large divergence between male and female immigrants. There are smaller age differences for Iranian and Iraqi men who partner with Swedish-born women than there are for Iranian and Iraqi women who partner with Swedishborn men. But among those who partner with an individual from the same country of birth, or with an immigrant from another country, women from Iran have larger age differences than men, and women from Iraq much larger age differences. There is much less distinction between the age difference of men and women from Turkey, and the same is true for the rest of the Middle East.

Table 2: Median age difference by country of birth and partner's country of birth

|  | Middle East |  | Iran |  | Iraq |  | Turkey |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Partner's origin | Male | Female | Male | Female | Male | Female | Male | Female |
| Same country of birth | 5 | 5 | 3 | 4 | 2 | 6 | 2 | 2 |
| Other non-Swedish | 3 | 4 | 2 | 3 | 2 | 5 | 4 | 4 |
| Swedish-born | 2 | 2 | 1 | 2 | 1 | 2 | 3 | 2 |

Figure 1: Age difference at parenthood, by sex, country of birth and endogamy.


Figure 1 key: Histograms of age difference (in years, on x-axis) between parents at first parenthood, by COB (country of birth), sex and endogamy (partner has same country of birth, is another immigrant or is Swedish-born).

Table 3: Regression models for age differences at first parenthood.

|  | Male |  | Female |  |
| :--- | :--- | :--- | :--- | :--- |
|  | Without sibling <br> fixed effects | With sibling <br> fixed effects | Without sibling <br> fixed effects | With sibling <br> fixed effects |
| COB | 1 |  |  |  |
| Middle East | $-1.43^{* * *}$ | (omitted) <br> (omitted) <br> (omitted) | 1 | $-1.01^{* * *}$ |

[^0]Table 3 shows regression models of age differences between parents for men and women with and without sibling fixed effects. There are conditional differences by COB (country of birth), and partnering with a Swedish-born individual remains significantly associated with smaller age differences even after controlling for family background. Smaller age differences among child migrants who partner with natives may be determined by higher social status. Previous research has shown that intermarriage to a native is positively associated with integration outcomes, earnings and employment in Sweden. ${ }^{10}$ Figure 2 shows the results of sibling models with an interaction between birth cohort and COB. For more recent cohorts, age differences for men with a Swedish-born partner are diverging from those with a partner from the same COB. The magnitude of the effect is large, more than a years' age difference between two brothers born after 1979. For women, the magnitude of effects is also large, but the pattern is different, suggesting that partnership markets may be changing over time in a different way for men and women.

Figure 2: Predicted age differences from a sibling model interacting birth cohort and country of birth


## Conclusion and next steps

Our results show that there is considerable variation by gender in the age differences between childhood immigrants and their partners when they first become parents. These results also point towards the importance of examining birth order, cohort and gender simultaneously when studying age differences. In the full paper, we will examine reasons for migration, distinguish between Swedish-born partners according to their parental country of birth, and include analysis of the link between immigrant age differences and the age differences of their parents. This new analysis will help to determine the role of norms in the countries of origin.

## References

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[^0]:    Note: Model controls for birth cohort, arrival cohort, birth order and sibling fixed effects. COB- country of birth. Statistical significance ${ }^{*} \mathrm{p}<0.05, * * \mathrm{p}<0.01, * * * \mathrm{p}<0.001$. Models exclude those with no siblings.

