Recent trends in cohort fertility of migrant women in the Netherlands
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Introduction
There are three important reasons to study fertility behaviour of migrant women. Firstly, it is relevant to know how and to what extent migration affects the life course, among which the transition to parenthood, of those who migrated to the Netherlands as well as their descendents. Secondly, the fertility behaviour of migrant women is often seen as an indicator to measure the extent to which migrants are integrated into their new countries. The more fertility rates of migrant women converge to those of native women, the more integrated the migrants in question are supposed to be. Thirdly, it is important to investigate the fertility behaviour of migrant women in order to to be able to project the future size of the second generation.

Various studies have shown that women with a non-western background are gradually having fewer children (De Jong, 2003; Statistics Netherlands, 2010). Their fertility levels are converging to those of native Dutch women. The degree of convergence not only depends on the country of origin of the women, but also, and to a much larger extent, on place of birth. With respect to fertility, second generation women are much closer to native women than to their mothers (Garssen and Nicolaas, 2008). Because of the fast increase in the size of the second generation and the consequent change in composition of the group of non-western migrants, monitoring the developments in fertility of this group is of particular importance for the reasons mentioned above. Does the decline in fertility also hold for recent birth cohorts? What trends can be seen in the fertility behaviour of the growing second generation? For the second generation reliable data on level of education are available, allowing a further analysis of the relation between education and fertility for this specific subpopulation. For the total Dutch population, a strong negative relationship between level of education and women's fertility has already been demonstrated (Wobma and Van Huis, 2008).

In fertility studies period fertility rates are commonly used. On the basis of fertility data for one or more years, rates such as the average number of children for a fictive cohort of women are calculated. However, if there is much difference in the timing of childbirth, cohort fertility rates are better suited to gain insight in the time trends of cumulative fertility. Our analyses are therefore based on cohort fertility data, focussing on Turkish, Moroccan, Surinamese and Antillean women. These are the four largest groups of non-western migrants in the Netherlands. Together they account for almost two thirds of the two million non-western migrants in the Netherlands. We distinguish migrants of first generation, who were born abroad, and of the second generation, born in the Netherlands.

Data and method
Data from the municipal population register (GBA) is used to calculate cohort fertility rates. This register provides a wide range of data for each person living in the Netherlands on 1 January of a given year, such as date of birth, date of arrival in the Netherlands, country of birth, country of birth of the parents and date of birth of children. The cohort fertility of women currently living in the Netherlands is calculated by dividing the number of children born to these women by the total number of women in a particular cohort. In this study, the fertility rates of women are based on data for 1 January 2011, and data are used on more than 4.5 million Dutch women born between 1945 and 1984. The cohorts are divided into five-year groups, in which the number of women varies from 500 thousand to 650 thousand.

First results
Developments in the number of first and second generation women
Over the past 15 years the number of Turkish, Moroccan, Surinamese and Antillean women aged 15-49 years has grown, while the number of native women in this fertile age range has diminished (Table 1). The size of second generation has grown particularly fast. In a few years, second generation migrants will outnumber first generation migrants.

Table 1. Number of women aged 15-49 years, by country of origin and generation, 1 January

	Total		First generation		Second generation	
	1996	2011	1996	2011	1996	2011
Native Dutch	3332410	2896409				
Turkey	72545	115821	61890	68120	10655	47701
Morocco	54605	97214	47835	57563	6770	39651
Suriname	88612	104636	73191	57425	15421	47211
Netherlands Antilles	26327	41554	20995	26849	5332	14705

Childlessness
Childlessness has become more common over time: 13 percent of native women born between 1945 and 1949 had no children, against 19 percent for the last cohort (1965-1969) with a more or less completed fertility history.
Turkish and Moroccan women remain childless less often than native women. Only 5 percent of Turkish women and 9 percent of Moroccan women born between 1965 and 1969 are without children. The shares of childlesness for Surinamese and Antillean women of this birth cohort are similar to that of native woman. For all migrant women the shares of childlessness have risen over time, except for Antillean women. Antillean women born between 1945 and 1954 show a very high share of childlessness. For generations born between 1955 and 1964 the share of childlessness has decreased to 15 percent.

Figure 1. Childlessness of women by cohort and country of origin, 1 January 2011
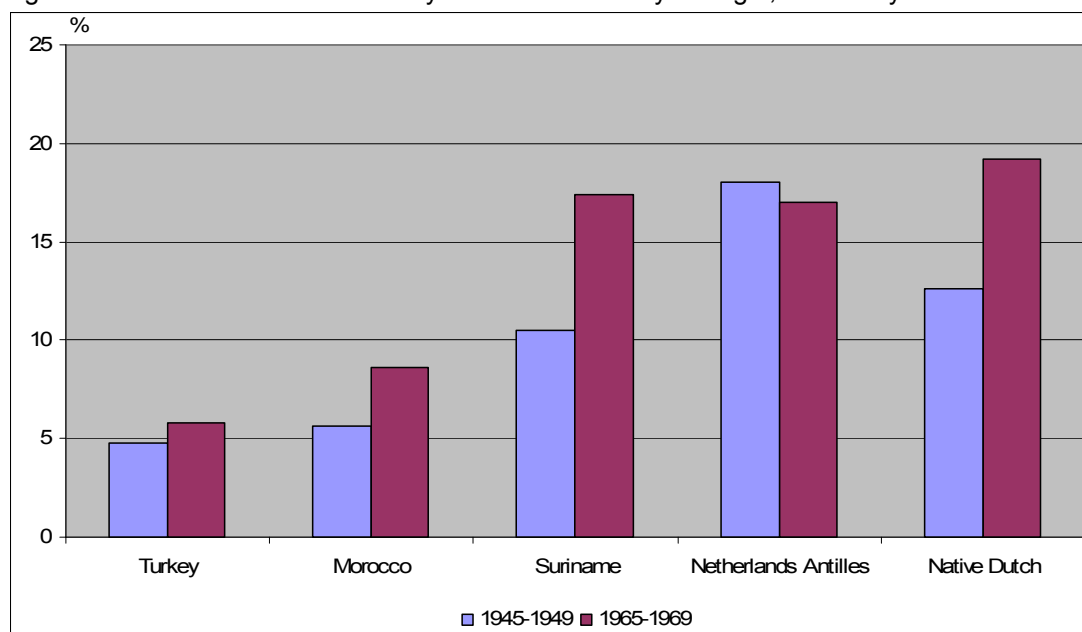
The second generation of the younger birth cohorts is sufficiently large to calculate reliable figures on childlessness for both generations. Table 2 shows that the level of childlessness for the second generation is about the same or higher than that for native women, except for

Turkish women. In all migrant groups childlessness is more common in the second generation than in the first generation. The women of the youngest birth cohorts have not yet reached the end of their fertile life spans, which is likely to reduce the differences between the first and the second generation in the years to come. A possible explanation of the differences between the generations is the timing of the first birth.

Table 2. Childlessness of women by cohort and country of origin, first and second generation, 1 January 2011

| | Turkey | | Morocco | | Suriname | | Netherlands Antilles | | Native Dutch |
	1	2	1	2	1	2	1	2	
1970-1974	7	17	10	21	20	27	18	29	22
1975-1979	12	24	16	33	29	37	28	42	34
1980-1984	26	45	30	53	50	56	45	64	65

Mean age at first birth
The mean age at which women become mothers for the first time has increased over the years. Native women born between 1945 and 1949 had their first child at 24.7 years on average, while women of the cohort 1965-1969 were 28.9 years old on average. Turkish, Moroccan, Surinamese and Antillean women are in general much younger than native women at the birth of their first child. A postponement of motherhood is observed for Moroccan, Surinamese and Turkish women, but less so than among native women. The mean age at first birth of Antillean women is rather stable over the cohorts.

Figure 2. Mean age of women at first birth by cohort and country of origin, 1 January 2011
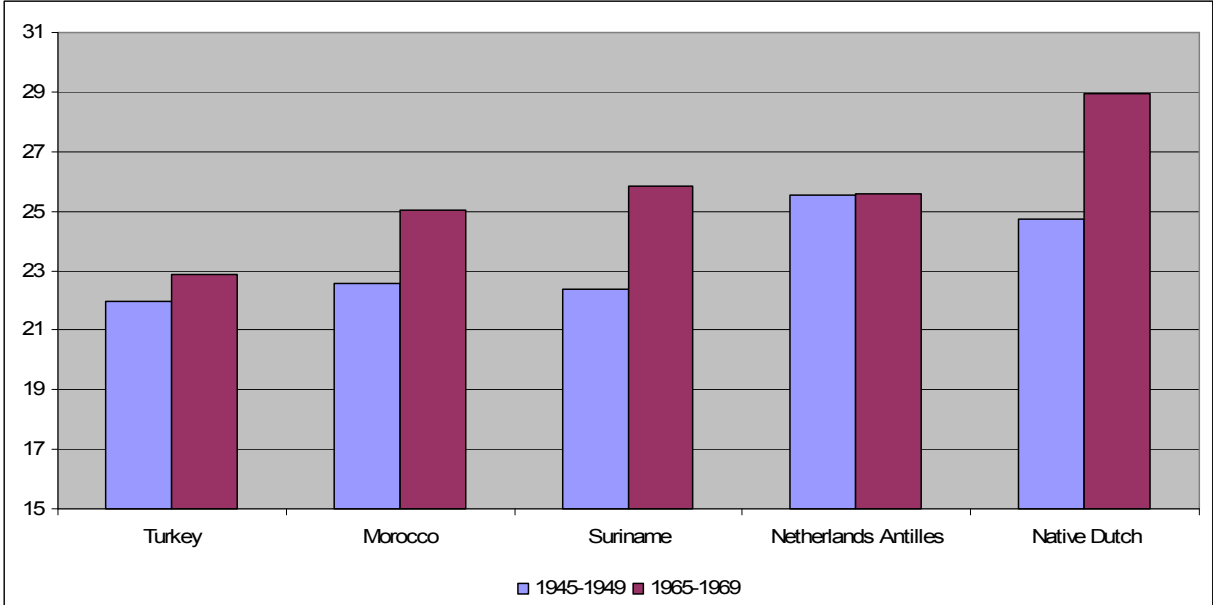
Number of children
The average number of children per woman has decreased over time. This holds for both native and migrant women, with the exception of Antillean women. The two oldest cohort of Antillean women show a deviant pattern, with relatively high childlessness and a relatively low average number of children. The decrease in the number of children in the other groups is partly explained by an increase in childlessness. Among Turkish and Moroccan women, however, only a small increase in the share of childlessness is recorded over the cohorts, against a sharp drop in the average number of children per woman (figure 2).

Figure 3. Average number of children per mother by cohort and country of origin, 1 January 2011
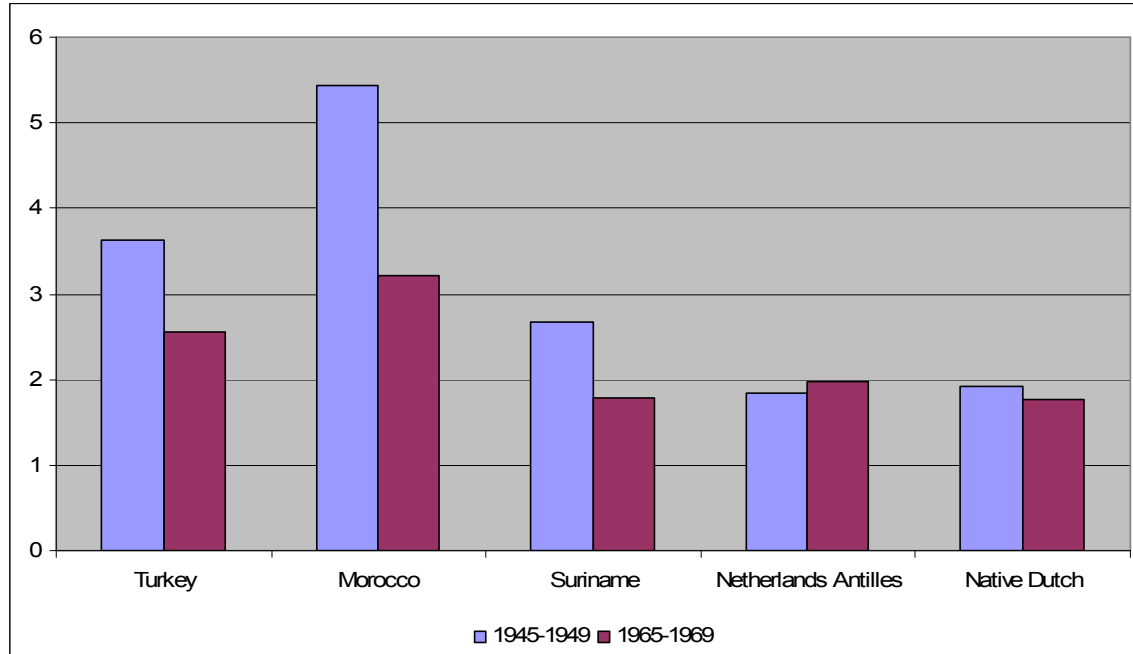
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