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"Social Capillarity" Revisited:

The Relationship between Social Mobility and Fertility

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# "Social Capillarity" Revisited: The Relationship between Social Mobility and Fertility\*

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Abstract: This study revives the debate over the influence of social mobility on fertility and addresses whether omitted conditioning factors to this relationship contributed to the unresolved state of the literature. We locate this study in Poland and Russia and compare relationships across the transition from communism and in different economic contexts. Theoretically, this study distinguishes between structural and individual determinants of mobility as well as status enhancement and relative economic status mechanisms. Applying event-history analysis techniques to longitudinal micro-data, we find strong evidence that fertility is related to mobility and that there are important conditioning factors; the mechanisms at work appear to be moderated by both the economic and institutional context. Status enhancement aims link mobility to fertility for women and both economic context and weak institutional support for working mothers moderate this relationship. In contrast, the relative economic status effect appears for men in a context of economic growth. The relationship between mobility and fertility is therefore comprised of structural and individual components.

\* This paper is also available in the Stockholm Research Reports in Demography series

## Introduction

This study raises a classic question from post-WWII sociology: Does social mobility affect fertility? Coining the term "social capillarity" (Bejin, 1989), Arsene Dumont explained declining fertility in France by the increased desire for upward mobility that became possible through the development of capitalism and democracy. This idea provoked a debate in the 1950s in which scholars developed a rich set of theories and mechanisms through which mobility experiences plausibly influenced how many children individuals chose to have. After approximately 30 years, research yielded surprisingly few consistent results and the topic subsequently receded from social stratification and demographic research.' The final contribution to the debate attributed "this topic's reputation as a quagmire of social research" (Kasarda and Billy 1985: 325) to theoretical ambiguity as well significant limitations in past methods and data. Past research was restricted to status comparisons at time points that were available in the data, which did not treat fertility as a process and rarely captured status at points in the life course that are theoretically important; the sequencing of mobility and fertility events was largely ignored, which prohibited clear identification of the direction of the relationship. We empirically test whether mobility affects fertility and implement dramatically improved data and methods, which allow us to overcome these challenges. In addition, by continually focusing on the occupational class of husbands and fathers, findings from past research may be less relevant now due to the tremendous social changes involving women's position in the labor market and how this affected childbearing. We address this shortcoming by studying both men's and women's mobility and develop the theoretical framing of how mobility may matter to fertility behavior according to gender-specific mechanisms. The final shortcoming in the previous debate according to Kasarda and Billy was that the specificity under which mobility influences fertility has not been explored; indeed, policy and welfare contexts, along with stratification systems, are likely to moderate mobility effects. We locate our exploration into the mobility and fertility relationship in a comparative setting, using multiple contexts over time and space to explicitly observe how the relationship may vary under certain conditions.

Poland and Russia are two contemporary societies that have recently developed marketoriented economies and democratic political structures. They shared a similar context before 1989 and 1991, respectively, when command economy practices provided relatively low incentives for upward mobility in regards to wages and there was less conflict between the demands of achieving upward mobility and childbearing. In contrast, the transitional periods were quite different in the two countries. Although both countries underwent a period of economic turmoil in the early 1990s, characterized by a rapid decline in GDP and a sudden increase in unemployment, this period was much shorter in Poland,

where the implemented reforms quickly led to economic stability. Along with these economic changes, both countries reduced institutional support for reconciling the conflict women face between the demands of work and childbearing, and Poland to a greater degree than Russia. Severe declines in fertility occurred simultaneously, with total fertility falling from population replacement levels in the late 1980s to lowest-low fertility (TFR of 1.3 or lower) in the 2000s.

This study follows the convention of studying both intergenerational and intragenerational mobility measured with occupational class. Two questions primarily guide this analysis: 1) Is there evidence that social mobility influences the decision to have a second child? 2) Does this influence appear to vary across different social and institutional settings? The timing of mobility experiences are also explored, particularly in relation to the first childbirth, to further assess the intersection of these career and childbearing processes. The next sections outline the theoretical perspectives and literature surrounding fertility, social status, and mobility in general. We then describe demographic and mobility developments in Russia and Poland. The data are then introduced and the operationalization of important indicators discussed. The final sections detail the models and results as well as discuss findings and propose interpretations.

## Social Status, Mobility and Fertility

The extent to which social status is a determinant of fertility behavior has dominated much of the fertility literature on wealthy countries, if we include all research on the links between fertility and income/wealth, education, or occupational/social class. In a summarizing study of empirical results that cover several centuries, world regions, and measures of status, Skirbekk (2008) finds a general shift over time from a positive relationship between status measures and fertility to a slightly negative relationship more recently. Analyzing completed fertility across Europe, Merz and Liefbroer (2010) found consistent evidence of a negative educational gradient, but no evidence of change in the relationship over time in formerly state socialist countries. Although this finding does not reflect fertility patterns of cohorts who began childbearing after the transition from communism began, it is partially corroborated in findings for Russia that only women with incomplete secondary education had higher fertility than women with other educational levels (Billingsley 2011)<sup>ii</sup>. Similar findings emerged for the influence of occupational class in which only men and women in the lowest occupational class exhibited higher fertility than the next highest class; moreover, fertility declined similarly among all educational and occupational groups during the economically turbulent 1990s.

In terms of mobility, we know that family size and social status are interdependently related (e.g., Zimmer and Fulton 1980) and expect immobile couples' fertility behavior to be related to that of their origin class, or of their parents. Berent (1952) argued that "class habits relating to family size seem to be...'inheritable'" and individuals "to some extent acquired the fertility habits of the class into which they have moved" (p. 248). Beyond these additive effects of origin and destination status, social mobility may have an effect as a "process" (e.g., Duncan 1966; Kasarda & Billy 1985). Dumont's original focus was on upward mobility and the relationship was expected to be inverse; Westoff et al. (1961: 237) further elaborated that "the socio-economic and psychological requirements for upward mobility are inconsistent with expenditures of time, energy and money for children".

A later hypothesis proposed the exact opposite relationship; the relative economic status mechanism predicts that a downward turn in economic status induces fertility avoidance and vice versa. This mechanism intersects with the vast literature on the Easterlin hypothesis (1976). Easterlin claimed that adverse circumstances of young workers reflected in lower earnings, unemployment, and lower upward occupational mobility led to a hesitation to marry and delayed and lower childbearing (1987: 4). We know from mobility research that individuals base their mobility aspirations on their parents' status and avoid occupying a status lower than their parents' (Boudon, 1974; Goldthorpe, 1996); Easterlin pointed out that mobility can be a widespread phenomenon with structural roots based on the demographic and economic context and can have demographic consequences. This mechanism is related to the direct economic effect (Becker 1960; Hotz et al. 1997), in which the cost of having a child may be perceived as irrelevant or too high based on current income. However, it is distinct in the sense that current resources are perceived in light of established consumption profiles that influence the perceived cost of a child.

Apart from the social capillarity and economic mechanisms, others arose that were related to the emotional reactions one may have to mobility. On the one hand, any form of mobility was argued in the literature to suppress fertility because it causes stress and disorientation; on the other hand, mobility was thought to lead to higher fertility by increasing the desire for more children as a way to compensate for the social isolation that accompanies being in a new class (Bean and Swicegood 1979; Stevens 1981; Kasarda and Billy 1985). As evident, these hypotheses lead to predictions in both directions for both upward and downward mobility and are difficult to verify.

The relationship between social mobility and fertility and the proposed mechanisms—i.e., the social capillarity, relative economic and emotional mechanisms, were widely tested and discussed in the empirical research over the next decades and led to inconsistent findings (e.g., Bresard 1950; Berent

1952; Tien 1961; Westoff et al. 1963; Blau and Duncan 1967; Hope 1971; Bean and Swicegood 1979; Zimmer 1981; Westoff 1981; Stevens 1981; Sobel 1985; Kasarda and Billy 1985). One of the last published papers introduced significant complexity into the theoretical discussion; Stevens (1981) proposed that the ambiguous results of previous research were also due to the fact that researchers had ignored two different types of mobility that could create opposite relationships and cancel out statistically significant findings. She argued that mobility can occur due to structural factors, including labor market conditions, and individual characteristics such as motivations and aspirations.

Mobility research not involving fertility has long recognized structural and individual factors as two distinct sources of mobility (Sørensen 1975). Economic expansion or recession can influence mobility prospects through changes in the size of organizations as well as how opportunities are distributed (Rosenfeld 1992; Hachen 1988). The growing literature on how family policies influence women's capacity to combine career and motherhood (Kalwij 2010; Billingsley & Ferrarini 2011; Blanchet and Ekert-Jaffe 1994; Gauthier and Hatzius 1997; Ferrarini 2006, Rovny 2011) points to another structural source of mobility that potentially influences future childbearing decisions. The relationship between family policy and women's reconciliation of family and work was not considered in past mobility and fertility research because in the social context at the time this debate thrived, women had yet to become strong actors in the labor market and the need for reconciliation was not widespread.

In terms of individual factors, the social capillarity mechanism, also known as status enhancement, overlaps with a selection mechanism; individuals who are strongly career-oriented or strongly family-oriented focus their resources toward status enhancement to a greater or lesser degree, respectively, than those without strong orientations (Kasarda & Billy 1985): an individual with a strong career orientation directs resources accordingly at the expense of family expansion and an individual with a strong family orientation directs resources toward family building. Individual factors therefore most likely imply an inverse relationship between mobility and fertility.

The status enhancement mechanism assumes mobility experiences are voluntary. But this mechanism becomes more complex in light of structural mobility that is driven by either the economic context or family policy. Although status enhancement aims are individually-driven, the economic context moderates whether the strength of these aims is related to their success. In a climate of economic growth, plentiful job opportunities may reward an individual with weak status enhancement aims, whereas someone with much stronger status enhancement aims may have less success during economic recession. Likewise, experiencing downward mobility in a context of economic growth implies more selectivity than in a context of economic recession. In this way, the extent to which individuals are

selected into mobility may vary across economic contexts. Although Kasarda & Billy (1985) argue that the status enhancement mechanism predicts an inverse relationship with fertility when they are jointly decided, it predicts a symmetrical relationship with fertility when fertility behavior is a reaction to structural mobility (Stevens 1981; Bean and Swicegood 1979); individuals who were not originally focused on status enhancement may become status oriented if they do not voluntarily experience downward mobility and strive to re-achieve a previous status. The theoretical and empirical development regarding the role of family policy also alters how we conceive the status enhancement hypothesis: in a context of high institutional support to mothers with young children, the tension between resources needed for childrearing and resources needed for one's career is diminished, which lessens the extent to which individuals have to choose one over the other.

Table 1 summarizes the pathways that we argue link mobility and fertility. First, three sources of structural variation in mobility are listed and one individual source. The next column indicates the direction of mobility that could arise as a result of these causes. The third column indicates whether a positive or negative relationship is likely to exist between fertility and the specific direction and origin of mobility. The final column lists the mechanisms argued to underlie these specific relationships. While the pathways follow the above discussion, a clarifying point is that status enhancement can underlie both a positive and a negative relationship with downward mobility; the negative relationship may emerge as a reaction to involuntary downward mobility and the desire to re-achieve a higher status.

Cau	Causes of mobility		Fertility	Mechanism(s)
	Economic growth	+	+ -	Relative economic status Status enhancement*
Structural	Economic recession	-	+ -	Status enhancement * Relative economic , Status enhancement*
	Weak work/family reconciliation *	<u>د</u>	+ -	Status enhancement Relative economic, Status enhancement
Individual	Work/family orientation *	+	-	Status enhancement
		-	+	Status enhancement

Table1. Conceptual diagram of the relationship between downward mobility and fertility

Note: \* indicates the cause or mechanism is likely to be more relevant to women than men.

#### Mobility and Fertility in Poland and Russia

The transition from state-socialism in Poland and Russia offers a unique opportunity to observe the influence of mobility on fertility during a time period in which there were remarkable changes in mobility dynamics. Despite the egalitarian ideology underpinning the communist system, social origin did matter for the labour market and educational performance of individuals in both countries (Marshall, Sydorenko and Roberts 1995, Domański 2007, Mach 2004, Bafoil 2009): equal opportunities did not exist among the social classes and origin class influenced destination class, although slightly less so for women. Gerber and Hout (2004) demonstrated that the social stratification system in post-Soviet Russia became less fluid after the transition commenced. Russians experienced significantly more downward mobility after the transition began than in the Soviet era and less upward mobility (see also Sabirianova 2002) and the possibility to move out of one's class of birth lessened (Gerber and Hout 2004). Workers who experienced the most upward mobility under the Soviet regime were particularly likely to be displaced and experience downward intragenerational mobility, which tightened intergenerational mobility. For much of the 1990s, job destruction rates were much higher than job creation rates (Haltiwanger, Lehmann and Terrell 2003; Acquisti and Lehmann 2000) and Sabirianova (2002) showed that it was structural change in the economy, rather than voluntary choice, which accounted for much of the downward mobility flows. Job destruction occurred across the spectrum and the proportion of men and women in even the top two classes in the Gerber and Hout study declined by seven or eight percentage points. These findings describe a highly unusual and rapid shift in Russia's social stratification system as well as the pathways in and out of classes.

In Poland, the situation was less dramatic. In fact, the fluidity in the social stratification system has not changed among men and among women some increase was observed in the 1980s and the early 1990s (Mach 2004, Domański 2008a). Although downward mobility increased in absolute terms, this process started already in the 1980s and continued only in the early years of the economic transition (Mach 2004) after which it stabilised (Domański et al 2008). As in Russia, the increase in downward mobility was caused by massive job destruction and skill mismatch in the new jobs. Nevertheless, the acceleration of job destruction was accompanied by an increase in job creation, although often the new jobs required some adjustment from potential workers in terms of skill improvement and migration to large cities (World Bank 2001). It is worth noting that the increase in downward mobility of the 1980s and early 1990s was less pronounced for women. Furthermore, unlike men, women experienced an increase in upward mobility. This process started already during state socialism and continued in the early 1990s. It was largely driven by an inflow of women to the service sector, mainly into higher grade

administrative and professional sectors (Mach 2004). In general, however, the analyses by Domański et al. (2008) and Sawiński (2008) indicate that, unlike Russia, the inheritance effects in terms of occupational position and educational attainment have largely remained unchanged after 1989. What has changed were mainly the return rates from education and occupational position (Domański 2007, 2008b; Rutkowski 1996).

The simultaneous occurrence of shifting mobility flows and rapid changes in fertility trends make these two countries particularly intriguing settings for an analysis of the mobility/fertility relationship. The two-child family, which had been a well-established tradition, became characteristic of the past in both countries (Zakharov and Ivanova 1996, Kotowska et al. 2008). The total fertility rate (TFR) had hovered at two children per woman for two decades before market reforms began (See Figure 1); the slight increase during the 1980s in Russia has been argued to be largely due to pronatalist policies. Although there may have been a reaction to the end of these policies (Zakharov and Ivanova 1996), fertility continued to decline beyond the scope of this explanation (Philipov and Jasilioniene 2007). Consequently, the total fertility rates in both countries reached the lowest-low levels of below 1.3 in the early 2000s. In both countries the transition to the first child remains universal, although in Poland it is more postponed than in Russia, and the recorded decline in fertility is largely attributed to a decline in second and higher order birth rates (Philipov and Kohler 2001, Sobotka 2003, Frejka and Sardon 2007, Frejka 2008). For instance, Sobotka et al. (2005) estimated that around 50% of the decline in births from 1990 to 2002 in Poland was due to quantum effects. In Russia, 75% of men and women had a second child before the transition began, whereas around 50% continued to do so afterward (Billingsley 2011). Whether men and women progressed to having a second child, therefore, is the restricted focus in this study.

Figure 1. Total fertility rates in Poland and Russia



Source: Human Fertility Database for Russia and Polish Central Statistical Office for Poland

## **Comparative Analyses: Expectations**

Our study is designed to make use of multiple comparisons: socialist and post-socialist, Poland and Russia, men and women, pre and post-parenthood. While this adds to the complexity of the analysis, these layers of comparison tell us much about how, when and for whom mobility influences fertility. First, we expect that the influence of mobility will be greater in post-socialist Poland and Russia compared to the previous socialist context because the meaning of class membership should be stronger in free market societies than the egalitarian societies of state socialism. At least in terms of the financial rewards associated with occupational classes, this is evident; Sabirianova (2002) documented reduced wage growth associated with downward mobility in Russia. In both countries, wage dispersion was low before the transition (Blanchard 1997; Barr 2001; Atkinson & Mickelwright 1992; Rutkowski 1996) and the delineation between classes grew as economic restructuring brought an immediate increase in wage dispersion in both Russia (Brainerd 1998; Lukyanova 2006) and Poland (Domański 2007, Heyns 2005). The restructuring and privatization of firms entailed a dramatic increase in unemployment and job mismatch, but occupational classes still followed an expected income gradient (Brainerd 1998; Rutkowski 1996, Lukyanova 2006). The first hypothesis follows.

**H1:** All mobility and fertility relationships should be stronger in the post-socialist time period than before.

Second, we expect some effects to be stronger in Poland and Russia based on differences in their overall economic contexts. We do not expect to find differences in how mobility and fertility are related in Russia and Poland before their transitions from communism. But after economic transformation began, Poland and Russia diverged significantly in terms of economic performance. Figure 2 shows cumulative economic growth since 1992 in both countries, which succinctly describes the dramatic difference in the economic performance of Poland and Russia while they were transitioning from socialism. As evident, the period of economic turmoil was much shorter in Poland; by 1996, GDP per capita had already exceeded the level in 1989. In contrast, Russia returned to positive economic growth in 1997 and entered another economic crisis the following year, reaching the 1989 level only in 2003. Building on the theoretical discussion earlier in this paper, in particular how economic context can alter the distribution of opportunities, the context of continued economic growth in Poland implies that upward mobility became possible for people with varying strengths of orientation toward status enhancement. In contrast, upward mobility that occurred in Russia, where the economy receded more and had less growth later, implies greater effort toward status enhancement. Therefore, the status enhancement mechanism should be more operational for upwardly mobile women in post-socialist Russia than Poland. Likewise, downwardly mobile women in Poland are more likely to select themselves into these jobs than in Russia because of greater economic growth. According to status enhancement mechanisms:

**H2:** If driven by the status enhancement mechanism, a negative fertility effect of upward mobility should be stronger in Russia than Poland.

**H3:** If driven by the status enhancement mechanism, a positive fertility effect of downward mobility should be stronger in Poland than Russia.

Figure 2. Economic divergence in Poland and Russia.



Source: OECD

In contrast, if mobility is linked to fertility behavior through the relative economic status mechanism, we would expect the reverse relationships between mobility and fertility. Economic recession can be a structural cause of downward mobility and economic growth can be a structural cause of upward mobility and we would therefore expect that mobility and fertility are positively related. However, in the case of a negative fertility effect of downward mobility due to structural causes, we cannot rule out the possibility that having another child is avoided in order to re-achieve a previous status.

**H4:** If driven by the relative economic status mechanism, a positive fertility effect of upward mobility should be stronger in Poland than Russia.

**H5:** If driven by the relative economic status mechanism, a negative fertility effect of downward mobility should be stronger in Russia than Poland.

Third, while all possible mechanisms are applicable to women, men are unlikely to experience difficulties reconciling work and family demands in Russia or Poland, where home and childrearing duties remained firmly the domain of women (Pascall and Manning 2000). Men's career and family orientations are therefore less likely to be inimical. According to this gender difference, we would expect to see that men respond to mobility through the relative economic status mechanism and women

respond through the status enhancement mechanism. If similarly inverse fertility effects of mobility emerge for both men and women, it is unlikely that status enhancement plays a strong role and we must look beyond status enhancement and the relative economic status mechanisms for an explanation, at least for men.

**H6:** Men's mobility and fertility relationship should be positive: upward mobility should have a positive association with fertility, whereas downward mobility should have a negative association with fertility.

**H7:** Women's mobility and fertility relationship should be inverse: upward mobility should have a negative association with fertility, whereas downward mobility should have a positive association with fertility.

The fourth set of comparisons involves the timing of mobility experiences. Mobility experiences that occur after entering parenthood, particularly for women, may indicate the degree to which families are able to overcome the conflict between the demands of work and family. This is another reason the effects of mobility should be stronger in the post-socialist context, since reconciliation policies have weakened in the last decades (Sinyavskaya forthcoming, Szelewa and Polakowski 2008). Family policies that support mother's labor force participation are key to the status enhancement mechanism. Whereas it is intuitive that women who are strongly oriented toward a career or having children will choose one over the other, strong institutional support for women enjoying both of these things renders this tradeoff less necessary. Hakim (2000) has argued that the vast majority of women are "adaptive" and have no strong preference for one over the other, which implies that making both possible should meet the needs of the majority of women.

Despite better economic opportunities in Poland, employment rates in the two countries reflect a different situation for women that may be related to state support for working mothers as well as the stronger attachment of Poles to religion and family values. Figure 3 shows that employment rates were better in general in Russia than Poland, but particularly for women; the share of Russian women employed varied between 7 and 12 percentage points higher than the share of Polish women employed. This striking difference may indeed be related to family policies. In both contexts, jobs are secure while women take fully paid maternity and partially paid/unpaid parental leaves. In post-socialist Poland, universal benefits for mothers and families became means-tested and over time the benefit levels diminished and eligibility requirements tightened. Access to public childcare also lessened—76% decline in places within crèches and a 25% decline in places within kindergartens—and became more expensive

for parents (Balcerzak-Paradowska et al. 2003: 204-205). In Russia, the affordability of childcare declined as well as the availability. But in contrast to Poland, enrolment rates declined only from 70% in 1989 to 45% in 1998 (Sinyavskaya forthcoming). Having fewer options for child care implies that Polish mothers are less likely to be able to return to work as quickly as Russian mothers.

While many women may be well aware of the difficulties navigating childrearing and careers before giving birth, a learning experience occurs during the actual childrearing process and women experience first-hand the tension of competing demands. This learning experience (Brewster & Rindfuss 2000; Neyer et al. 2011) may explain why fertility transitions at higher parities are more sensitive to the effect of family policies that support both fathers and mothers as earners and carers (Billingsley & Ferrarini 2011). For this reason, women may opt for downward mobility if they want to have more children and have already experienced the difficulty of maintaining their work and childrearing. Likewise, the relative economic effect may be stronger if downward mobility is experienced after the first child is born because of the additional costs of having a child. When downward mobility may not be voluntary, as would be the case if family and work demands could not be reconciled, we cannot rule out the possibility that fertility is suppressed in order to re-achieve the previous status.

**H8:** A positive or negative fertility effect of downward mobility should be stronger if mobility occurs after the first child is born than before.

**H9:** A positive or negative fertility effect of downward mobility occurring after the first child should be stronger in Poland than Russia.



Figure 3. Employment rate differences in Poland and Russia, for men and women

Source: data until 1992 come from Population censuses - Laborsta Database; data after 1992 come from Labour Force Surveys - OECD Employment Database

## **Data and Methods**

We use multiple data sources for this analysis that come from the Generations and Gender Program. This project was designed as "a system of national and contextual databases, which aims at improving the knowledge base for policy-making in UNECE countries" (UNECE 2006). For Russia, the data sources include the Russian Generations and Gender Survey (RGGS) and the Employment and Education Survey (EES)<sup>III</sup>. The 2004 RGGS is the first survey wave of a nationally representative sample of the 18-79 year-old resident population and provides us with information on partner and fertility histories as well as family of origin. In 2005, the EES was given to an 18-55 year old sub-sample of 2460 men and 3995 women who had participated in the RGGS and covers all employment and educational activity over the life of the respondent, starting from January of the year he or she turned 17. The sample on which this study is based consists of those who participated in both the RGGS and the EES. The GGS response rate was particularly low in the urban areas of St. Petersburg and Moscow (around 15%), but was 57% in all other areas and the response rate for the EES was 86% (Independent Institute for Social Policy 2005).

The first wave of the Polish Generations and Gender Survey (PGGS) was conducted at the turn of 2010 and 2011 on a representative sample of 18-79 year old women and men with a response rate 55%. The PGSS questionnaire largely corresponds to the RGGS, but additionally covers full employment

histories of the respondents since the age of 15. It thus creates good opportunities for a comparison with the Russian datasets. Its drawback is only that it does not allow distinguishing the unemployed respondents from the inactive. Another limitation of working with the Polish and Russian datasets described above is that they provide retrospective histories of the respondents, but not of the partners. We therefore perform analyses of the effects of social mobility on second birth rates for men and women separately, but are not able to account for the intervening effects of social mobility of the partner. In sum, our analytical sample for Poland consists of 3582 men and 5544 women born in years 1955-1993 and 1625 men and 3199 women in Russia, with the oldest individuals born in 1950.

## **Operationalizing Mobility**

We use nominal occupational class categories to measure social mobility instead of alternative class specifications such as prestige measures (e.g., Treiman, 1977) or socioeconomic indexes (Ganzeboom, De Graaf, & Treiman, 1992). More specifically, we use the European Socioeconomic Classification (ESeC), which closely follows the Erikson-Goldthorpe-Portocarero (EGP) Schema. This decision has two motivations. First, the applicability of occupational class categories for the Russian and Polish contexts has been already demonstrated in past research (Marshall et al. 1995; Gerber and Hout 2004; Mach 2004). Second, the conceptual basis of ESeC relies on employment relations, level of autonomy at work and the skill level (Harrison and Rose 2006). We find this approach more suitable for comparing fertility effects of social mobility in socialist and post-socialist periods than prestige scores or socioeconomic indexes as the economic and political transformation in the two countries led to massive changes in the return rates from education and the prestige attached to certain professions; in contrast, changes in the level of autonomy or skills required for performing a job are less likely to have occurred.

Our mobility measures are constructed on the basis of the occupational information contained in the GGS which complies with International Standard Classification of Occupations and can be transferred into the ESeC schema using Harrison and Rose's User Guide (2006). We collapsed the ESeC five-class categorization to four classes in order to have sufficient numbers of people in all classes and opted against collapsing it further into their three-class schema in order to preserve more detail. Starting with the five classes outlined in the User Guide, we eliminated class 3 by merging the small employers and self-employed that are not in the agricultural sector with the intermediate and lower supervisory occupations and the self-employed occupations in agriculture with the routine and lower technical occupations. Farmers are a controversial group due to their inconsistent ranking across prestige and SEI scales. Our decision to locate farmers in the lowest class reflects the fact that in

countries ranging from less to more developed, farmers are known to be immobile but likely to move into the lowest manual class if they do experience mobility (Ganzeboom et al. 1992). In Poland, this is evident in Domański's (2007) findings that although farmers may have relatively high prestige scores, the socio-economic position of self-employed farmers in terms of their skills and income is as low as unskilled manual workers. Placing farmers in the lowest class therefore ensures we do not generate additional downward mobility due to increased urbanization and the development of non-agricultural sectors.

In contrast to the GGS data, the occupational data in EES does not come in the form of ISCO codes; therefore, Russian respondents were coded according to the same principles of skill level and autonomy. The description of the EES occupational information can be found in the Appendix A, along with our four-class schema. The left column displays how the original nine ESeC categories are distributed among our four classes built on GGS information, which are used for the Polish respondents and their parents as well as Russian respondents' parents. The right column displays how the four classes were constructed on the basis of the EES information for the Russian respondents.

Using this schema we construct a series of social mobility measures that allow us to reveal the effects of upward and downward, intergenerational and intragenerational mobility on second births. Men and women are at risk of being mobile only when they are in paid employment. This means that when respondents are unemployed, not participating in the labor force or taking parental leave they are not considered downwardly mobile or upwardly mobile. The current labor force status is also referred to as the destination status. As soon as respondents begin their first job, they are potentially inter or intragenerationally mobile. In the case of intergenerational mobility, current class location is measured against the highest class of either parent when the respondent was 15. Respondents were upwardly mobile if they took a job in a higher class than their parents' or downwardly mobile if it was lower. The origin status for intergenerational mobility is parents' class and this remains constant over time.

Constructing intragenerational mobility requires information that changes over time. Respondents are not considered mobile when they begin their first job unless there is a dramatic mismatch between their educational level and class of the first job. To err on the side of caution, we considered over-educated individuals<sup>iv</sup> to be downwardly mobile when they have a university education and have taken a job in one of the lowest two classes or individuals who complete secondary education, with or without vocational training, and take a job in the lowest class. After mobility is assessed for the first job, educational level no longer factors into construction of the mobility measure and all remaining mobility is calculated on the basis of job to job moves. The origin status for intragenerational mobility is

always the last job in which an individual worked, even if the last spell was spent in non-employment. If an individual has not worked yet, the origin status reflects this by being categorized as "other".

We investigate the influence of social mobility on second birth rates by looking at current mobility effects and the effects of ever having experienced mobility. In the former case we capture all mobility spells that occur between the first birth and the second conception. In the latter, we additionally account for mobility experience before first birth. Since the timing of mobility may matter for the transition to second birth we additionally account for whether the first experience of mobility took place before or after first birth.

## Method

Individuals are observed from the moment they have a first child and are censored eight months before their second birth or the interview, to account for a gestation period and accurately link conditions to the time at knowledge of conception. For modeling the effects of social mobility on second birth rates a piecewise constant event history model is estimated. The effects of mobility are computed net of a set of time-constant and time-varying observed characteristics. Among the time-constant characteristics we include age at first birth, a dummy for whether the respondent has siblings (which aims to account for a predisposition toward family size) and urban/rural place of birth (which is widely known to influence fertility behavior across many contexts). Additionally, for Russia we control for whether the respondent was surveyed in St. Petersburg and Moscow to account for unusually low response rates recorded in these two cities (approx. 15%). The following time-varying covariates change in monthly increments: respondents' partnership status, time since the first birth, and respondents' educational status and level. Respondents with a low education level did not complete secondary school, even if they attended a vocational or "factory and work" college. Those who did complete secondary education are included in the middle level category, as well as respondents who completed a vocational or technical college after completing secondary education. The high educational level includes those respondents who completed university education at the undergraduate or postgraduate level. Following the rich methodological debate on isolating a mobility effect (Hope 1971; Kasarda & Billy 1985; Sobel 1981; Hendrickx et al. 1993), we also control for the origin and destination statuses in the model. Finally, mobility measures are interacted with a dummy variable that indicates whether the spell occurs before or after the political and economic regime changes which allows us to investigate differences in fertility effects of social mobility in the socialist and post-socialist periods.

## Results

## *Experience of mobility – a descriptive analysis*

In the first step, we performed a descriptive analysis of the experience of downward and upward mobility in order to get some insight into the mobility patterns of our samples. To this end, we computed rates of the first experience of upward/ downward intergenerational and intragenerational mobility before and after first birth, using standard event-history techniques. This approach allowed us to take into account not only the occurrence of mobility but also differences between individuals in the time elapsed since they became exposed to mobility. Individuals who experienced mobility already before the first birth were not taken into account in the computation of mobility rates after the first birth. Our findings are presented in Figures 4-5 for Poland and 6-7 for Russia.

Our Figures point out several important trends. When we look only at mobility levels we can see that individuals were experiencing mobility already during state socialism and that mobility rates at that time were sometimes even higher than during the market economy. Second, mobility rates in Russia seem to be higher than in Poland. Finally, individuals were usually more likely to experience upward mobility when compared to the social status of their parents, but downward mobility was more common from an intragenerational perspective.

Figure 4. Men's and women's rates of the first experience of upward/downward intergenerational mobility in Poland before and after first birth











Figure 7. Men's and women's rates of the first experience of upward/downward intragenerational mobility in Russia before and after first birth



Turning attention to the dynamics of mobility, the picture becomes much more complicated. First, we observe that the experience of intergenerational downward mobility generally became more common after the onset of the economic transformation, contrary to intragenerational downward mobility whose incidence slightly declined. The exceptions are only women in Russia for whom we observe no significant change in the experience of downward intergenerational mobility and fathers of one child in Russia who after 1989 started to be more exposed to the risk of downward intragenerational mobility than before 1989. Second, as regards the change in the exposure to upward mobility we observe clear differences by gender. Namely, after the onset of economic transformation men in the two countries became more exposed to intergenerational and intragenerational upward mobility, while the chances of women to move upward declined. The only exceptions are Polish women for whom we observe a slight increase in upward intragenerational mobility.

## Effects of intergenerational mobility on second birth risks

The results of the full models are reported in Appendixes B and C. We start the description of our findings from the effects of intergenerational mobility on second birth risks. The first finding, summarizing all results in Tables 2-4, is that there are no significant effects of intergenerational mobility on second birth risks among men. Neither downward nor upward mobility affects men's transitions to a second child. On the contrary, intergenerational mobility among women affects their second birth rates. In general, the experience of downward mobility increases women's second birth risks, while the experience of upward mobility leads to their decline.

Nevertheless, the effects of intergenerational mobility on women's second birth risks are not universal and depend on the country, the timing of the mobility as well as the measure we use. Most of all, intergenerational mobility seems to be far more important for second birth risks in Russia than in Poland. More specifically, in Poland we record a positive effect of downward mobility only for the pretransition period and only if it was experienced before the first birth (Table 3 and 4). In Russia, by contrast, we observe some negative effects of upward mobility in both the socialist (Table 2 and 3) and post-socialist period (Table 4) as well as a positive effect of downward mobility in the post-socialist period (Table 2). If we look more deeply at the timing of the experience of mobility among Russian women with respect to the birth of the first child during the post-socialist period we find that upward mobility tends to suppress childbearing if it occurred before the first birth and downward mobility facilitates transition to second birth if it occurred after entering motherhood. It appears then that Russian women who are successful in their occupational careers early on and do not experience a downward move after first birth are more likely to postpone or even forego a second birth, while women who are not as successful at achieving upward mobility and who additionally experience downward mobility after the entry to motherhood are more likely to further expand their family size.

Finally, the effects of intergenerational mobility between the two calendar periods are similar, however none of the relative risks related to mobility in the pre-transition time period are strongly statistically significant. As was already mentioned, hardly any effects of intergenerational mobility were

found for Poland in any period considered. In Russia, by contrast, the effects of intergenerational mobility on second birth risks were substantial among women.

Table 2. Selected results from a hazard model of second birth rates for men and women in Poland and Russia, interaction effects of period and current intergenerational social mobility

Trans	Transition to a second birth: Period interaction with current intergenerational mobility								
		Poland		Russia					
	Men	Women	Men	Women					
Period 1:									
not currently mobile	1	1	1	1					
downwardly mobile	0.98	1.04	1.05	0.98					
upwardly mobile	0.88	0.98	1.11	0.84 *					
Period 2:									
not currently mobile	1	1	1	1					
downwardly mobile	0.99	1.06	0.97	1.35 **					
upwardly mobile	0.84	0.97	0.84	0.87					
# of subjects	3582	5544	1625	3199					
Log Likelihood	-5121.44	-7982.33	-1800.67	-3522.33					
Prob > chi2	0.0000	0.0000	0.0000	0.0000					

Note: model controls for surveyed in Stpet. or Moscow, age, missing categories, siblings, urban/rural, union status, educational level, labor force status, and parents' occupational status. Statistical significance: \* <10%, \*\* <5%, \*\*\* <1%

# Table 3. Selected results from a hazard model of second birth rates for men and women in Poland andRussia, interaction effects of period and ever experienced intergenerational social mobility

	Transition to		i ellea interas		periorities a miler g		, since		
	Men      Women        upward      downward      upward      downward      upward        od 1:      er mobile      1      1      1      1        bile      0,94      0,95      0,93      1,16 *        od 2:      er mobile      1      1      1      1        bile      0,89      1,02      0,95      1,08        subjects      3582      3582      5544      5544        Likelihood      -5121,92      -5122,6      -7981,63      -7981,1      -180        o > chi2      0,0000      0,0000      0,0000      0,0000      0,0000      0,0000		Rus	sia		_			
		Men	W	/omen	M	en	Wo	omen	
	upward	downward	upward	downward	upward	downward	upward	downward	_
Period 1:									
never mobile	1	1	1	1	1	1	1	1	
mobile	0,94	0,95	0,93	1,16 *	0,95	0,95	0,88 *	0,95	
Period 2:									
never mobile	1	1	1	1	1	1	1	1	
mobile	0,89	1,02	0,95	1,08	0,87	0,90	0,80 **	1,04	
# of subjects	3582	3582	5544	5544	1625	1625	3199	3199	
Log Likelihood	-5121,92	-5122,6	-7981,63	-7981,1	-1801,43	-1801,71	-3524,71	-3527,37	
Prob > chi2	0,0000	0,0000	0,0000	0,0000	0,0000	0,0000	0,0000	0,0000	

Transition to a second birth: Period interaction with ever experienced intergenerational mobility

Note: model controls for surveyed in Stpet. or Moscow, age, missing categories, siblings, urban/rural, union status, educational level, labor force status, and parents' occupational status. Statistical significance: \* <10%, \*\* <5%, \*\*\* <1%

# Table 4. Selected results from a hazard model of second birth rates for men and women in Poland and Russia, interaction effects of period, ever experienced intergenerational social mobility and its timing around first birth

		Р	oland			Russia				
	Men		Women		Me	Men		omen		
	upward	downward	upward	downward	upward	downward	upward	downward		
Period 1:										
never mobile	1	1	1	1	1	1	1	1		
mobile before 1st birth	0,92	0,97	0,94	1,17 *	0,97	0,91	0,88	0,95		
mobile after 1st birth	1,11	0,67	0,83	0,99	0,90	1,23	0,89	0,87		
Period 2:										
never mobile	1	1	1	1	1	1	1	1		
mobile before 1st birth	0,87	1,01	0,93	1,09	0,88	0,88	0,79 **	0,95		
mobile after 1st birth	0,99	1,15	1,03	1,03	0,83	0,71	0,79	1,45 **		
# of subjects	3582	3582	5544	5544	1625	1625	3199	3199		
Log Likelihood	-5121,22	-5121,84	-7980,51	-7980,89	-1801,33	-1801,1	-3524,59	-3524,25		
Prob > chi2	0,0000	0,0000	0,0000	0,0000	0,0000	0,0000	0,0000	0,0000		

Transition to a second birth: Period interaction with timing of ever experienced intergenerational mobility

Note: model controls for surveyed in Stpet. or Moscow, age, missing categories, siblings, urban/rural, union status, educational level, labor force status, and parents' occupational status. Statistical significance: \* <10%, \*\* <5%, \*\*\* <1%

The effects of intragenerational mobility on second birth risks are presented in Tables 5-7. As in the case of intergenerational mobility, we find scarcely any intragenerational mobility effects on second birth risks among men. The only significant result is a positive effect of upward mobility on second birth risks among Polish men if this mobility was experienced after first birth and in the post-1989 period (Table 7).

The effects of intragenerational mobility on second birth risks are more substantial among women. Nevertheless, there emerges an interesting difference between the two countries. While the experience of intergenerational mobility seems to be more important for women's second birth risks in Russia than in Poland, intragenerational mobility seems to affect second birth rates in Poland more substantially than in Russia. More specifically, for Russia we find only one significant effect of intragenerational mobility: Russian women who experienced upward mobility before first birth in the post-socialist period are less likely to conceive a second child (Table 7). No other significant intragenerational mobility effects were found for Russian women. In Poland, by contrast, we observe a clearly positive impact of downward mobility on second birth risks. This effect is particularly pronounced in post-1989 period and it operates irrespectively of the mobility measure used as well as the timing of the mobility in relation to the first birth (Tables 5-7). This implies that the Polish women who experienced a downward move in their occupational careers, either before or after they became first-time mothers, are more likely to conceive a second child than women who were more successful in the

labor market. Some positive downward mobility effects are also present in the pre-transition period in Poland, but they are weaker and refer only to the situation if the mobility occurred before the first birth (Table 7). All in all, our findings suggest that the experience of intragenerational downward mobility was particularly crucial for fertility behavior of Polish women, and particularly after 1989.

Table 5. Selected results from a hazard model of second birth rates for men and women in Poland and Russia, interaction effects of period and current intragenerational social mobility

		Poland		Pussia		
		Folaliu		Russia		
	Men	Women	Men	Women		
Period 1:						
not currently mobile	1	1	1	1		
downwardly mobile	0.99	0.97	1.03	0.98		
upwardly mobile	1.14	0.96	1.06	1.04		
Period 2:						
not currently mobile	1	1	1	1		
downwardly mobile	0.99	1.29 ***	1.25	0.91		
upwardly mobile	1.17	0.90	0.91	0.95		
# of subjects	3582	5544	1625	3199		
Log Likelihood	-5125.09	-7976.3	-1799.54	-3523.18		
Prob > chi2	0.0000	0.0000	0.0000	0.0000		

Transition to a second birth: Period interaction with current intragenerational mobility

Note: model controls for surveyed in Stpet. or Moscow, age, missing categories, siblings, urban/rural, union status, educational level, current occupational status, and origin occupational status. Statistical significance: \* <10%, \*\* <5%, \*\*\* <1%

Table 6. Selected results from a hazard model of second birth rates for men and women in Poland and Russia, interaction effects of period and ever experienced intragenerational social mobility

	Transition to	a second birth:	Period Interac	ction with ever expe	erienced intrag	enerational mo	Dility		
		P	oland			Rus	sia		_
		Men	W	/omen	М	en	v	Vomen	
	upward	downward	upward	downward	upward	downward	upward	downward	
Period 1:									
never mobile	1	1	1	1	1	1	1	1	
mobile	0,98	1,09	0,96	1,10	1,11	0,85	0,97	0,99	
Period 2:									
never mobile	1	1	1	1	1	1	1	1	
mobile	1,08	1,08	0,96	1,19 ***	0,88	0,90	0,89	1,03	
# of subjects	3582	3582	5544	5544	1625	1625	3199	3199	
Log Likelihood	-5127,06	-5126,38	-7981,25	-7979,48	-1799,35	-1801,1	-3520,68	-3521,73	
Prob > chi2	0,0000	0,0000	0,0000	0,0000	0,0000	0,0000	0,0000	0,0000	

Transition to a second hirth: Period interaction with ever experienced intragenerational mobilit

Note: model controls for surveyed in Stpet. or Moscow, age, missing categories, siblings, urban/rural, union status, educational level, current occupational status, and origin occupational status. Statistical significance: \* <10%, \*\* <5%, \*\*\* <1%

Table 7. Selected results from a hazard model of second birth rates for men and women in Poland and Russia, interaction effects of period, ever experienced intergenerational social mobility and its timing around first birth

Tran	sition to a seco	ond birth: Peri	od interaction	with timing of ever	experienced in	ntragenerationa	al mobility	
		P	oland			Rus	sia	
	N	1en	W	Women		en	Women	
	upward	downward	upward	downward	upward	downward	upward	downward
Period 1:								
never mobile	1	1	1	1	1	1	1	1
mobile before 1st birth	0,94	1,11	1,00	1,13 *	1,10	0,84	0,98	1,00
mobile after 1st birth	1,19	0,87	0,90	0,90	1,13	0,96	0,98	0,95
Period 2:								
never mobile	1	1	1	1	1	1	1	1
mobile before 1st birth	0,97	1,08	0,91	1,18 ***	0,89	0,89	0,77 *	0,99
mobile after 1st birth	1,42 **	1,08	1,03	1,23 **	0,86	0,85	1,02	1,11
# of subjects	3582	3582	5544	5544	1625	1625	3199	3199
Log Likelihood	-5123,69	-5125,00	-7980,72	-7977,99	-1799,33	-1800,85	-3519,43	-3521,26
Prob > chi2	0,0000	0,0000	0,0000	0,0000	0,0000	0,0000	0,0000	0,0000

Note: model controls for surveyed in Stpet. or Moscow, age, missing categories, siblings, urban/rural, union status, educational level, current occupational status, and origin occupational status. Statistical significance: \* <10%, \*\* <5%, \*\*\* <1%

Finally, the empirical findings on the effects of social mobility on second birth risks were subjected to multiple sensitivity analyses. First, we verified whether the effects of mobility on fertility might be affected by the fact that we considered school graduates to be downwardly mobile if they took a job for which they were over-educated. While accounting for over-education led to an increase in the number of downward mobility events, we found no changes in the overall effects in Russia when not including over-education in the operationalization of downward mobility and in Poland the positive effect of downward mobility diminished only for women who experienced it for the first time before becoming parents in the post-socialist period. This finding led us to the conclusion that being over-educated does matter for fertility decisions. Second, the measures of having ever experienced mobility are based on first mobility experiences, which could obscure important mobility events if they occurred again after the first birth. Therefore, we also estimated the effect of ever having experienced mobility only after entering parenthood and our results remained virtually unchanged. Third, because farmers have a higher socioeconomic status in Russia than in Poland and, therefore, locating them in the lowest class may bias the class schema, we merged farmers into the class containing other self-employed workers and no differences in the overall findings for Russia appeared.

## Discussion

When Arsene Dumont coined the term social capillarity to explain why families were having fewer children, it was 19<sup>th</sup> century France; in this social context, the choice was not whether to have a second child, but rather whether to have a third or fourth. Because it was mainly men at this time who bestowed social status on the family through their social inheritance or occupations, women were mainly relegated to a support role in the private sphere. Despite the very different contexts in which this study was located, and in general the remarkable changes in family size and women's role in the public sphere, the social capillarity hypothesis appears to have relevance. However, the relationship between social mobility and fertility is complex and many nuances appear that relate mobility and fertility beyond a straightforward social capillarity, or status enhancement, effect.

Besides bringing women into the theoretical framework and empirical analysis as important social actors in mobility and fertility dynamics, we also oriented this study to a main criticism in the literature: the lack of research on conditioning factors to the mobility/fertility relationship contributed to indefinite conclusions (Kasarda and Billy 1985). Although we took an exploratory approach in this initial study on contemporary fertility effects of mobility, we complicated the analysis by adding multiple comparative layers to better isolate structural and individual-level mechanisms at work. The socialist and post-socialist contexts of Russia and Poland offered the possibility to observe effects not only when class location was either less or more important, but also in poor/prospering economies and contexts with stronger and weaker institutional support for dual-earner families, respectively. Gendered effects, along with differential mobility timing effects, brought further insight into when and for whom the relationship between mobility and fertility appears driven by relative economic status or status enhancement mechanisms.

While we considered research on mobility dynamics in Poland and Russia and what these studies tell us about overall changes in mobility rates and gender differences, the mobility rates we estimate are not directly comparable because they represent young adults' career dynamics instead of the entire working age population. Our findings indicate that social inheritance appears to be stronger in Poland than Russia at this stage in the life course and women in both contexts have the best opportunities for intergenerational upward mobility. Remarkably, the overall distribution of intergenerational mobility opportunities across men and women has not altered in the new market economies, although there have been changes in absolute rates. If we look at intragenerational mobility and consider these rates to be indicative of the labor market environment when respondents were first establishing their careers, Russians experienced more difficulty entering at a level commensurate with

their education or maintaining job progressions at a similar level. Likewise, Russians were much more upwardly mobile than Poles; these findings indicate greater "job churning" in the Russian labor market than the Polish. Looking only at mobility rates for new parents, these overall differences persist; Russian fathers and mothers still have about double the upward mobility rates of Polish fathers and mothers. Interestingly, this large difference disappears when we look at downward mobility rates after women and men become parents; men and women in Poland and Russia experience similar rates of downward mobility at that time. This may be some evidence that although the Russian labor market may be more volatile than the Polish, difficulties combining family and work in Poland make these new parents equally as vulnerable to downward mobility.

Based on theoretical considerations, we formulated specific hypotheses about how mobility should influence fertility given certain factors. While the results were previously described in terms of the general direction of associations even when confidence levels were lower than 95%, we draw conclusions only from those that were statistically significant. Although we did not have different expectations for inter and intragenerational mobility, it is interesting to note that the influence of mobility on fertility solely takes place through intergenerational movements in Russia and intragenerational movements in Poland. We believe this difference is related partly to what we see in the prevalence of these types of mobility in the two contexts. It is very likely that intragenerational mobility is less meaningful in Russia because of the greater volatility in the labor market at young ages. When the occurrence is rarer, as in the case of Poland, it would likely be perceived as more significant and would also require more significant causes. On the other hand, intergenerational mobility might be a socially meaningful event in Russia because it represents threshold effects. For example, one can be downwardly mobile, but if the status is not lower than one's parents' it may be inconsequential. Whereas this argument should also extend to the case of Poland, it does not. We can only speculate on this interesting variation between the two contexts; in the case of Poland, it may be that there is a stronger intergenerational transmission of a wider range of values and norms. For example, in a context of higher religiosity, stronger traditional values from the parental home may remain salient even with upward mobility.

We expected mobility to be much more relevant to fertility decisions in the free market economy than in state socialism (H1). This hypothesis proved mostly accurate, as no strongly statistically significant relationships between mobility and fertility appeared in the period of state socialism. The fact that statistically significant relationships emerged in the time period when fewer individuals were observed, i.e. after the onset of the economic transition, is convincing evidence that the significance of

mobility has increased in the new economies. However, we cannot ignore the possibility that our measure of mobility may be less robust in the state socialist era, despite being based on characteristics such as skill level and autonomy, which are unlikely to dramatically change.

Another simple dichotomy that we proposed is that the status enhancement mechanism, in which mobility and fertility are jointly determined, should be relevant to women (H7) and not to men (H6). This reflects the understanding in the literature on employment and fertility that the choice between motherhood and having a career arises solely for the main caregiver. Unequivocally, this gendered effect appears in our findings: mobility and fertility have an inverse relation only for women. In contrast, we proposed that the relative economic status effect would be particularly relevant to men. We found only partial evidence of this relationship in Poland: when men experienced upward mobility within their own careers they were then more likely to proceed to a second child. In general, men's social mobility appears to have little effect on their fertility.

We related the economic context to the two proposed mechanisms in the following ways: the resources required for status enhancement should be greater during economic recession than economic growth, requiring that resources are consolidated for this effort and children are foregone or postponed (H2 and H3). This is exactly what we see when upward mobility is related fertility: women who are upwardly mobile in the turbulent and difficult market economy of Russia had a significantly reduced second birth rate, whereas this relationship did not appear for women in the better economic environment of Poland. Conversely, downward mobility in a context of economic growth implies that this experience may particularly have occurred for individuals not interested in career advancement; Polish women who were downwardly mobile within their career had a significantly increased second birth rate. We therefore find evidence of conditioning factors: the status enhancement mechanism is moderated by the economic context and the relationship between mobility and fertility is comprised of structural and individual components.

The economic context was also argued to influence how the relative economic status mechanism worked (H4 and H5). When mobility is more structurally determined than individually determined, this relationship should be particularly salient according to the respective directions of economic development; upward mobility during economic growth will be positively related to fertility because status enhancement is less operative and because it likely brings greater rewards. We only see evidence of the relative economic status effect once and, indeed, it appears for Polish men who experienced mobility and childbearing in a period of almost constant economic growth. However, we did not find evidence of the same conditioning factors to this mechanism for downward mobility.

Finally, we proposed that the timing of mobility experiences may also tell us about the nature of mobility and whether weak institutional support for working mothers may be a structural cause (H8 and H9). Women who plan on having a second child may reduce their status enhancement desires when they experience firsthand the difficulties in combining care and work. The results do indicate that the positive effect of downward mobility is consistently stronger when it occurs after the first child has already been born. When this shift occurs relative to women's own previous jobs, it influences fertility only in Poland where reconciliation support, particularly in terms of available and affordable childcare, is weaker. However, it also appears in Russia, when downward mobility is relative to parents' occupational status. As reconciliation support diminished in this time period in both contexts, finding similar results is perhaps not surprising.

We also acknowledge two serious methodological limitations that should be addressed in future research. Because joint decision-making is at the heart of the social capillarity hypothesis, methodological advancements in simultaneous modeling of two jointly determined events should be applied to this branch of mobility studies. Besides testing the status enhancement mechanism more rigorously, applying these methods will also reveal whether a unique effect of mobility is revealed when the selectivity component is removed. Finally, a major limitation of the data sources used in this paper is that we do not have information on the partners' mobility dynamics. Women's social mobility is measured independently from men's and while it is worth knowing that their own occupational trajectories are influential, we might expect that their partners' are also influential.

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# Appendix A. Data sources and information used to construct four-level occupational class schema

	Categories used to construct occupational class      GGS    EES      Polish respondents and their parents    Russian respondents      Parents of the Russian respondents    1      1    Lower technical occupations; Routine occupations; Self- employed occupations in agriculture    1    Unqualified worker; Qualified worker; Agricultural employee; Farmer      2    Lower services, sales and clerical occupations    2    Employee who performs relatively simple tasks (salesperson, typist, clerk, security guard, etc.)      3    Intermediate occupations; Small employer and self-employed    3    Highly qualified worker; Team-leader; Foreman; Employee who performs more complex tasks implying some autonomy						
G ( P c P a	GS lish respondents and their parents irents of the Russian respondents	E E Ru	<b>S</b> Issian respondents				
1	Lower technical occupations; Routine occupations; Self- employed occupations in agriculture	1	Unqualified worker; Qualified worker; Agricultural employee; Farmer				
2	Lower services, sales and clerical occupations	2	Employee who performs relatively simple tasks (salesperson, typist, clerk, security guard, etc.)				
3	Intermediate occupations; Lower supervisory and lower technician occupations; Small employer and self-employed occupations, excluding agriculture	3	Highly qualified worker; Team-leader; Foreman; Employee who performs more complex tasks implying some autonomy (bookkeeper, draftsperson-designer, employee of the personnel department, nurse with basic medical education, librarian, etc.); Self-employed in an industry, trade, service sphere, with or without employees				
4	Large employers, higher grade professional, administrative and managerial occupations; Lower grade professional, administrative and managerial occupations and higher grade technician and supervisory occupations	4	Leader with a significant managerial authority with the right to make important decisions (director of an enterprise, organization, executive director, CEOs, etc.); Employee who performs autonomously an important task or has a few subordinates (researcher/scholar, head of department, teacher, doctor, etc.); Self-employed lawyer, doctor, notary, who has a private practice with or without employees				

# Appendix B. Hazard model of second birth rates for men and women in Poland and Russia, effects of

## current intergenerational social mobility

Transition to a	second hirth	Current i	intergenerational	mobility
manaluon to a		Current	mergenerationa	mobility

	Poland				Russia			
	Me	n	Wom	en	Mer	า	Wom	en
	relative	standard	relative	standard	relative	standard	relative	standard
	risk	errors	risk	errors	risk	errors	risk	errors
Time since first birth								
0-1 year	1		1		1		1	
1-2 years	1,10	0,07	1,11 **	0,05	6,65 ***	1,44	4,88 ***	0,62
2-3 years	1,03	0,07	1,07	0,06	7,92 ***	1,71	6,09 ***	0,80
3-4 years	1,07	0,08	0,95	0,06	8,87 ***	1,93	6,71 ***	0,92
4-5 years	0,98	0,08	1,00	0,06	8,29 ***	1,37	7,65 ***	1,06
5-10 years	0,56 ***	0,04	0,56 ***	0,03	6,52 ***	1,37	6,14 ***	0,80
10+ years	0,09 ***	0,01	0,08 ***	0,01	1,7 **	0,41	2,49 ***	0,37
Age at first birth								
17-20	1		1		1		1	
21-24	0,92	0,07	0,85 ***	0,03	0,98	0,14	0,90 *	0,05
25-29	0,77 ***	0,06	0,62 ***	0,03	0,95	0,14	0,93	0,07
30+	0,56 ***	0,05	0,35 ***	0,03	0,94	0,16	0,49 ***	0,06
St. Petersburg or Moscow survey					0,92	0,16	0,79 **	0,09
Union status: married/cohabiting	2,70 ***	0,41	2,62 ***	0,23	2,36 ***	0,35	3,35 ***	0,28
Has siblings	1,23 **	0,11	1,29 ***	0,10	1,31 ***	0,13	1,27 ***	0,10
Born in an urban place	0,79 ***	0,04	0,82 ***	0,03	0,73 ***	0,05	0,71 **	0,11
Education status/level								
in education	0,78 ***	0,07	0,76 ***	0	2,11 **	0,72	0,49 ***	0,12
low	1,10	0,08	1,18 ***	0,06	1,20 **	0,10	1,18 **	0,08
middle	1		1		1		1	
high	1,17 *	0,09	1,02	0,06	1,08	0,11	1,02	0,08
Labor force status (destination)								
inactive/unemployed	0,76 **	0,10	1,10	0,09	2,09	2,15	0,63	0,20
SeC1: manual worker	0,99	0,11	1,20 **	0,10	1,79	1,87	0,60	0,19
SeC2: low-mid grade employee	1		1		1		1	
SeC3: intermediate employee/manager	0,99	0,12	0,99	0,08	1,83	1,89	0,67	0,21
SeC4: professional/salariat	0,96	0,10	1,13 *	0,08	2,35	2,43	0,68	0,22
Intergenerational social mobility								
not currently mobile	1		1		1		1	
downwardly mobile	0,99	0,10	1,05	0,08	1,01	0,14	1,10	0,10
upwardly mobile	0,85	0,09	0,98	0,08	0,98	0,14	0,85 *	0,08
Parents' occupational class (origin)								
SeC1: manual worker	1		1		1		1	
SeC2: low-mid grade employee	0,84 *	0,09	0,95	0,06	1,14	0,14	0,98	0,08
SeC3: intermediate employee/manager	0,86	0,10	0,85 **	0,06	1,06	0,17	0,96	0,10
SeC4: professional/salariat	0,82 *	0,10	0,91	0,06	0,78	0,13	0,81 **	0,08
Period: Soviet or socialist era					1		1	
Poland (1990+) and Russia (1991+)	0,70 ***	0,03	0,71 ***	0,03	0,59 ***	0,04	0,44 ***	0,02
# of subjects	3582		5544		1625		3199	
# of failures	2434		3886		906		1825	
time at risk	271226		421811		158390		304405	
Log Likelihood	-5121,5		-7982,35		-1801,89		-3525,36	
Prob > chi2	0,0000		0,0000		0,0000		0,0000	

Note: Statistical significance: \* <10%, \*\* <5%, \*\*\* <1%

# Appendix C. Hazard model of second birth rates for men and women in Poland and Russia, effects of

## current intragenerational social mobility

T	ransition to a s	econd birt	h: Current int	rageneration	al mobility			
		Pol	and		Russia			
	Me	n 	Wom	en .	Mei	n 	Wom	en
	relative	standard	relative	standard	relative	standard	relative	standard
Time since first birth	TISK	errors	TISK	errors	LISK	errors	TISK	errors
	1		1		1		1	
	1 10	0.07	⊥ 1 11 **	0.05	L C CO ***	1 45	۲ *** دە <i>۱</i>	0.61
1-2 years	1,10	0,07	1,11	0,05	0,09	1,45	4,00	0,01
2-5 years	1,05	0,07	1,07	0,00	0,05 ***	1,74	0,00	0,79
3-4 years	1,07	0,08	0,95	0,06	9,05	1,97		0,91
4-5 years	0,98	0,08	0,99	0,06	8,51	1,90	7,02	1,00
5-10 years	0,56 ***	0,04	0,56 ***	0,03	6,70 ****	1,41	6,16 ***	0,80
10+ years	0,09 ***	0,01	0,08 ***	0,01	1,76 **	0,42	2,52 ***	0,38
Age at first birth								
17-20	1		1		1		1	
21-24	0,93	0,07	0,84 ***	0,03	0,99	0,14	0,92	0,05
25-29	0,77 ***	0,06	0,61 ***	0,03	0,96	0,14	0,96	0,07
30+	0,57 ***	0,06	0,35 ***	0,03	0,97	0,17	0,51 ***	0,07
St. Petersburg or Moscow survey					0,88	0,16	0,79 **	0,09
Union status: married/cohabiting	2,68 ***	0,40	2,62 ***	0,23	2,40 ***	0,35	3,34 ***	0,28
Has siblings	1,25 **	0,11	1,31 ***	0,10	1,31 ***	0,13	1,27 ***	0,10
Born in an urban place	0,77 ***	0,04	0,81 ***	0,03	0,70 ***	0,05	0,78 ***	0,04
Education status/level								
in education	0,76 ***	0,07	0,77 ***	0,04	2,05 **	0,70	0,48 ***	0,12
low	1,11	0,10	1,21 ***	0,06	1,29 ***	0,11	1,17 **	0,07
middle	1		1		1		1	
high	1,17 **	0,09	1,03	0,06	1,04	0,11	1,02	0,08
Labor force status (destination)								
inactive/unemployed	0,91	0,11	1,10	0,07	0,75	0,20	1,59 ***	0,14
SeC1: manual worker	1,18	0,12	1,13	0,09	1,09	0,23	1,13	0,11
SeC2: low-mid grade employee	1		1		1		1	
SeC3: intermediate employee/manager	0,98	0,12	1,04	0,09	1,02	0,20	1,07	0,10
SeC4: professional/salariat	0.93	0.09	1.21 **	0.11	1.31	0.28	1.01	0.12
Intragenerational social mobility					,	,	,	
not currently mobile	1		1		1		1	
downwardly mobile	0.99	0.08	1.13	0.09	1.14	0.16	0.96	0.10
upwardly mobile	1.16	0.12	0.92	0.09	0.98	0.15	1.01	0.10
Origin status	_,	-,	-,	-,	-,	-,	_,	-,
SeC1: manual worker	1		1		1		1	
SeC2: low-mid grade employee	0.90	0.11	0.90 *	0.05	0.67 *	0.15	0.91	0.07
SeC3: intermediate employee/manager	1 10	0.17	0.84 **	0.06	0.99	0.14	0.91	0.09
SeC4: professional/salariat	0.95	0.14	0.80 ***	0.06	0,69	0.16	0.99	0.13
other	1 017	0.08	0.86 ***	0.04	1 17	0 14	1 12	0.11
Period: Soviet or socialist era	1,017	0,00	0,00	0,04	1	0,17	1,13	0,11
Poland (1990+) and Russia (1991+)	0,69 ***	0,03	0,71 ***	0,03	0,58 ***	0,04	0,43 ***	0,02
# of subjects	3582		5544		1625		3199	
# of failures	2434		3886		906		1825	
time at risk	271226		421811		158390		304405	
Log Likelihood	-5125.12		-7979.0		-1801.17		-3522.33	
Prob > chi2	0,0000		0,0000		0,0000		0,0000	

Note: Statistical significance: \* <10%, \*\* <5%, \*\*\* <1%

<sup>ii</sup> However, much earlier studies found mixed evidence: Berent (1970) found indications of a generally negative relationship across various Eastern European and USSR countries, whereas Berliner (1983) found a positive relationship between education and the fertility of women living in urban areas of the USSR.

<sup>iii</sup> The "Education and Employment Survey for Russia" was conducted by the Max Planck Institute for Demographic Research (Rostock), the Independent Institute of Social Policy (Moscow), and the Demoscope Independent Research Center (Moscow). Information about the data source can be found in Bühler et al. (2007).

<sup>iv</sup> General guidelines for determining over-education were taken from Elias and Birch (1994), Ortiz (2007), and Solga and Konietzka (1999).

<sup>&</sup>lt;sup>i</sup> Studies on whether fertility influences the social mobility of one's children (Van Bavel 2006; Dalla Zuanna 2007; Johansson 1987; Dribe et al. 2012) or whether fertility affects social mobility (e.g., Aisenbrey, Evertsson and Grunow 2009) remain current research interests.