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ABSTRACT

How Religion Mediates the Fertility Response to Maternity Benefits*

Do religious beliefs affect responses to fertility incentives? We examine a 1982 maternity benefits expansion in Estonia, Latvia and Lithuania in a difference-in-differences framework with similar East European countries as comparisons. To isolate the importance of religion, we compare women who did and did not grow up in religious households when religion was formally outlawed, resulting in similar adult characteristics among women in the Baltics by importance of religion. Maternity benefits increased fertility only among women who grew up in religious families, providing novel evidence that cultural norms transmitted through the family can amplify the effects of public policies.

JEL Classification: J13, J18, P20, Z10, Z12

Keywords: fertility, culture, family policies, parental leave, religion,

religiosity

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Amid growing concern about declining fertility rates, governments in many countries have implemented costly pronatalist policies to reverse the downward trend in birth rates (Sobotka et al. 2019). Economic incentives are at the forefront of the design of these policies: increased monetary rewards for births (birth bonuses and child allowances) and decreased opportunity costs of childbearing (parental leave) are intended to elicit responses that lead to increases in childbearing. However, growing causal evidence indicates that cultural beliefs and social norms also influence fertility (Beach and Hanlon 2023; Blanc 2022; Chabé-Ferret 2019, de la Croix and Perrin 2018; Fernández and Fogli 2009), suggesting that the effects of pronatalist policies on childbearing may also depend on culture.² While previous literature finds that pronatalist policies raise childbearing,³ it does not explore whether cultural beliefs influence the policy responses.⁴ This paper fills this gap in the literature by examining whether pronatalist preferences associated with religious beliefs undo, or amplify, the effects of fertility incentives on childbearing. As the social norms imposed by one's religion can have powerful effects on one's fertility choices (Munshi and Myaux 2006), we use the religiosity of the childhood home as our measure of cultural beliefs.

While recent economic literature emphasizes the complementarity of economic and cultural factors in determining fertility decisions (Spolaore and Wacziarg 2022), there is little empirical research on how they interact. The economic approach to fertility choices, pioneered by

¹ These policies amounted to 2.3% of GDP in OECD countries in 2019 (OECD Family Database 2023).

² Culture has been defined as "those customary beliefs and values that ethnic, religious, and social groups transmit fairly unchanged from generation to generation" (Guiso et al. 2006).

³ Parental leave expansions (Cygan-Rehm 2016; Girsberger et al. 2023; Golightly and Meyerhofer 2022; Lalive and Zweimüller 2009; Malkova 2018; Raute 2019; Tudor 2020) and increased benefit generosity (González 2013; González and Trommlerová 2023; Kim 2024; Laroque and Salanié 2014; Milligan 2005; Riphahn and Wiynck 2017; Slonimczyk and Yurko 2014; Sorvachev and Yakovlev 2020) led to increases in short-run fertility and in some cases completed fertility. Reduced benefit generosity led to a decline in fertility (Elmallakh 2023; Gershoni et al. 2023). Some policies did not affect fertility or changed the timing of births (Dahl et al. 2016; Lichtman-Sadot 2014).

⁴ Cohen, Dehejia and Romanov (2013) study responses to changing child subsidies in Israel by religious denomination, but do not have a measure of individual-level religious adherence.

Gary Becker, emphasizes the 'price' of children and the quality-quantity tradeoff as central factors in couples' fertility decisions (Becker 1960; Becker and Lewis 1973; Galor 2011).⁵ The price is primarily the opportunity cost of children, which is closely connected with the value of women's time, and the direct cost of children. The cultural view of fertility choice, developed in a large literature spanning demography and sociology, argues that fertility changes are due to the spread of new ideas and attitudes regarding childbearing across culturally related groups.⁶ Empirical work on understanding how culture affects the response to pronatalist policies is critical for their design and assessment (Bau and Fernández 2023). If cultural beliefs and social norms influence policy responses, then pronatalist policies that succeed in increasing childbearing in one setting may fail in a setting with different social norms regarding childbearing.

We examine a significant expansion of maternity benefits in the Baltic republics of Estonia, Latvia and Lithuania in 1982, when they were a part of the Soviet Union. Most women were eligible for these benefits that included: (1) a flat maternity leave benefit until the child turns one equaling 25% of the average female monthly wage, (2) job protection for up to 18 months after birth and (3) a cash payment at birth. We compare the changes in fertility in the Baltic republics (treatment) with those of five East European countries (comparison) with similar economic systems within a difference-in-differences framework. We provide evidence that our treatment and comparison groups had similar demographic and labor market characteristics. Several recent studies use a similar approach comparing Soviet republics and East European countries.⁷

We examine whether our estimated effects of maternity benefits on childbearing differ by

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⁵ Ebenstein, Hazan and Simhon (2016) find that an increase in the cost of children lowers fertility.

⁶ See, Bongaarts and Watkins 1996, Cleland and Wilson 1987, Coale and Watkins 1987, Lesthaeghe and Surkyn 1988, Herzer 2019, Newson et al. 2005, Newson and Richerson 2009, and Richerson and Boyd 2005.

⁷ See: Abramitzky and Sin 2014, Brainerd and Malkova 2023, Campa and Serafinelli 2019, and Gehring 2022. Other studies using a cross-country difference-in-differences strategy include Gary et al. 2022, Hjort and Poulsen 2019, Reinhold et al. 2013, and Wilson 2022.

the religious beliefs an individual was exposed to during childhood. We use retrospective data from the Survey of Health, Ageing and Retirement in Europe on the complete birth and employment histories of women, and their childhood circumstances such as the importance of religion while growing up (our measure of cultural beliefs), family size and structure, parental relationship quality and economic circumstances. Our comparison of treatment effects among women from different religious backgrounds is in the spirit of papers that isolate the role of culture in economic choices by comparing individuals of different cultural backgrounds within the same country.⁸ In the Baltics before the program, we find statistically insignificant differences among women who did and did not grow up in households where religion was important for many outcomes such as: probabilities of giving birth, being employed, married, and living in urban areas; years of education, number of children and age at first birth and marriage. As a result, our setting is advantageous because our measure of childhood religiosity is less likely to be conflated with economic choices as adults that are often correlated with religiosity in other contexts (Hungerman 2014). The null correlation between childhood (household) religiosity and many adult economic choices makes sense in the Baltics because of the intense efforts of the Soviet government to eradicate religion from society. It also underscores that this measure of religious beliefs is not self-selected, as it was imposed by the parents rather than chosen by the child.⁹

We find that maternity benefits increased the probability of having an additional child by 24.2 percent between 1983 and 1985 for women ages 18 to 33. We do not find evidence of increases in childbearing among ineligible women, which serves as a placebo test. Our estimates are similar in magnitude to Malkova (2018), the only other study that evaluated the effect of this program on

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⁸ See, Beach and Hanlon 2023; Eugster et al. 2011; Fernández and Fogli 2009; Fisman and Miguel 2007.

⁹ See Hungerman (2012) and Iyer (2016) for discussions of empirical approaches to the identification problem in economic models of religion.

fertility in Soviet Russia using state-level data.¹⁰ Our individual-level data allow us to contribute to the open question of how culture affects responsiveness to public policies by estimating the effects of maternity benefits after splitting the sample by the childhood importance of religion.

Strikingly, when we estimate effects of maternity benefits separately among women who did and did not grow up in a religious family, we find that the increase in childbearing is entirely due to women who grew up in religious families. Because we include controls for adult characteristics (e.g. education, age and marital status) and childhood circumstances that could independently affect one's fertility preferences in adulthood (e.g. the number of siblings, stability of the parental marriage and the likelihood of childhood abuse), our findings are due to the influence of religion itself rather than these factors. This result is consistent with predictions of the Bisin and Verdier (2000, 2001) economic model of intergenerational cultural transmission: if parents practicing a minority religion exert more effort to socialize their children to this religion, these children may be more likely to adopt the cultural norms of this religion.¹¹

What types of women growing up in religious households increased childbearing? Both first and higher parity births rose, reflecting both a shift in the timing of first births and an increase in completed childbearing. Births rose among all education groups and were mainly due to married women ages 18 to 27. We find similar increases in births by childhood circumstances: number of siblings, two-parent home, quality of relationship with the mom, family socioeconomic status, parental harm, and living with a grandparent. This provides evidence that the greater responsiveness among women who grew up in religious households is not due to other observed

¹⁰ Brainerd and Malkova (2023) find that this maternity benefit program extended maternity leave length and increased marital stability after birth but did not change post-birth employment in the Baltic republics.

¹¹ See Bisin, Carvalho and Verdier (2023) for an overview of the literature that studies the formation and diffusion of religious traits where one of the forces is parental socialization. Even though in our context none of the religions are in the minority, they are costly to transmit to children for parents because of government persecution of religious institutions and practices.

characteristics of the parental home that are correlated with religion (e.g. the number of siblings).

To conclude, we find that a maternity benefit program led to an increase in childbearing that was entirely due to women who grew up in religious households. This is a novel result in the literature evaluating the effects of pronatalist policies on fertility, as previous studies do not explore whether cultural norms affect the response to fertility incentives. More generally, we provide new evidence that the fertility response to pronatalist policies may vary due to differences in individuals' underlying preferences. Given the high cost of these policies, accounting for pronatalist religious norms that may amplify policy effectiveness may be an important consideration in policy design. The results also shed light on the causes of the long-run shift in preferences towards smaller families, which are not fully explained by the neoclassical model of fertility emphasizing prices and costs and may be related to broader social and cultural forces including declining religious adherence (Kearney and Levine 2025). With growing secularization in many countries, our results predict less responsiveness to pronatalist policies as the share of women exposed to pronatalist religious norms declines.

I. The Institutional and Demographic Setting

This section provides information on Estonia, Latvia and Lithuania and the East European controls (Bulgaria, Czech Republic, East Germany, Hungary and Slovenia) to demonstrate their similar political, institutional, economic and demographic characteristics. Politically, these countries were either incorporated into the USSR in 1940 or became satellite states of the USSR after World War II. The Baltic republics regained their independence with the disintegration of the Soviet Union in 1991; the East European countries were freed of Soviet influence in 1989-1990 with the fall of the Berlin Wall and subsequent collapse of socialist regimes. The Soviet regime imposed its socialist economic system of central planning, state ownership of enterprises and

centralized wage determination. Central planning resulted in similar labor market characteristics across countries, such as narrow wage differentials between occupations and relatively low levels and slow growth of wages.¹² Women could decide whether to work, their occupation and employer.

Female labor force participation was strongly encouraged to facilitate rapid industrialization, and relatively low average wages also compelled women to work to supplement family income. As a result, female labor force participation rates reached around 80% by the 1980s (Brainerd 2000). An extensive system of subsidized nurseries supported women's full-time employment, with about half of young children enrolled in preschool in our countries in 1980 (CMEA 1986; Goskomstat 1987). Because women continued to do most of the housework and child-rearing, women bore a double burden of market and non-market work (Fong and Paul 1992).

Descriptions of economic conditions in the socialist countries portray the early to mid1980s as a period of stagnation with few economic reforms and slowing economic growth (BenNer and Montias 1991; Brada 1991). Across countries, female employment was nearly unchanged
and GDP per capita was flat or slowly rising, indicating that macroeconomic shocks did not
confound the effects of the maternity benefit program (Brainerd and Malkova 2023). The trends
in these indicators begin to diverge in the late 1980s, consistent with growing political and
economic instability, but is outside our period of analysis.

A. Fertility and Marriage

The region's fertility transition began in the early twentieth century, and fertility declines continued after WWII before stabilizing at a total fertility rate of 2.0-2.5 in the 1970s (Van Bavel

¹² Labor markets in socialist countries are described in Adam (1984), Kirsch (1972), Svejnar (1991) and Redor (1992). Relative to the market for other goods, the labor market was most similar to a capitalist economy (Atkinson and Micklewright 1992; Malkova 2020). Slovenia's market socialist economy was similar to that of Hungary and had narrow wage differentials and high rates of female labor force participation as in other East European countries (Estrin 1991; Orazem and Vodopivec 2000).

2010; Sobotka 2011). Marriage and first birth took place relatively early, with women marrying at age 21-22 and having their first birth at 22–23 in most countries. Any subsequent births were closely spaced, so that most women completed their childbearing at relatively young ages. Cohabitation rates were low, and births occurred predominantly within marriage. Marriage and childbearing were near-universal (Sobotka 2011). Abortion was a common method of birth control due to limited access to modern contraceptives (David 1999).

This pattern of fertility and family formation reflected the incentives created by the Soviet socialist system. The compressed wage differentials and relatively low rates of return to higher education gave women little economic incentive to delay marriage and childbearing to invest in education. Housing shortages in many countries added to the incentive to marry and have a child at a relatively young age, as married couples with children received priority in the allocation of apartments (Sobotka 2011). High female labor force participation rates and the unequal division of household labor also contributed to low fertility rates.

B. Religion

Prior to the Soviet annexation in 1940, individuals in the Baltic countries were free to worship as they wished regardless of their religious denomination. Religious affiliation varied widely in this period: Catholicism predominated in Lithuania, Estonia was mainly Lutheran (Protestant) while Latvia was split between Lutheranism, Catholicism and Orthodox Christianity (Plaat 2003; Katus et al. 2007; Streikus 2012). Religious adherence varied as well, where Catholicism had predominated in Lithuania for centuries and had a strong influence on the population and close links with national identity, while religious adherence was weaker in Latvia and particularly weak in Estonia (Anderson 1994; Plaat 2003).

The Soviets imposed the official USSR policy of atheism in the Baltics soon after their

annexation and implemented similar virulent anti-religious programs in each Baltic republic. These programs comprised the nationalization of all church property, the closing of thousands of churches, the persecution of clergy and religious individuals, the closure of all Catholic schools and lay organizations, the prohibition of all child and youth religious education and church attendance, and large-scale anti-religious propaganda campaigns (Mailleux 1971; Vardys 1971; Veinbergs 1971; Streikus 2012). Some accounts claim that the Catholic Church suffered the harshest policy but others argue that the policies targeted all religious denominations approximately equally (Fletcher 1981; Goeckel 2018). Nevertheless, the Catholic Church in Lithuania proved the most resilient to the Soviet anti-religious campaign. While religious adherence experienced declines in all Baltic countries in the Soviet period, the Catholic Church in Lithuania remained influential in society despite suffering the same persecutions as other religions, in part due to its association with the Lithuanian independence movement (Plaat 2003; Streikus 2012).

The Soviet Union imposed similar anti-religious campaigns in Eastern Europe with tactics comprising persecution of clergy, nationalization of church property, the closure of churches and the banning of religious instruction from schools (Zrinŝčak 2004; Müller and Neundorf 2012). The persecution of religion was most severe in the Soviet Union (Zrinŝčak 2004), but organized religion and religiosity nevertheless declined significantly throughout Eastern Europe in the postwar period (Müller and Neundorf 2012). While data on religious affiliation in the region are limited, sociological surveys showed significant increases in the share of the population who did not believe in God and large decreases in church attendance in the region from the mid-1940s to

¹³ The same anti-religious policies were implemented throughout the Soviet Union (Anderson 1994; Fletcher 1981).

¹⁴ While the Soviets banned all Catholic lay organizations and suppressed the internal religious life of the parishes, an underground Catholic press managed to survive the persecution and became an important method of communication (Streikus 2012).

the 1970s (Tomka 1991). As in the Baltic republics, religious adherence varied widely across the region, with Catholicism predominating in the Czech Republic, Hungary and Slovenia, Protestantism in East Germany and Orthodox Christianity in Bulgaria (Tomka 1991; Need and Evans 2003; Črnič et al. 2013; Stolz et al. 2020).

C. Reforms to Maternity Benefits

The structure of maternity benefits in the socialist countries reflected the attitudes towards female employment and the primary responsibility of women for household work. Only women were eligible for maternity leave or birth payments, and eligibility in most countries required one year of employment or full-time study prior to the birth. Maternity benefits were typically a flat payment independent of the mother's salary. Declining birth rates in the 1950s and 1960s prompted some East European countries to adopt or expand family policies, leading to longer benefit durations in most of our control countries by 1980 than in the Baltics. There were no significant changes to family policies in these countries in the years relevant to our analysis (David 1999; Brainerd and Malkova 2023; Heisig 2023).

Maternity benefits in the Soviet Union prior to the reform provided working women and full-time students one year of unpaid, job-protected maternity leave, and fully paid leave for 56 days before and 56 days after a birth. All women received small one-time cash payments upon the birth of the 4th and higher-parity children.

These limited benefits were substantially expanded under the new program. Intended to increase childbearing and to improve the work-life balance of mothers, the program was announced in a government decree and published in national newspapers on March 31, 1981. The decree described the program's benefits and eligibility requirements. The benefits were

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¹⁵ See Brunnbauer and Taylor 2004; David 1982, 1999; Debroy 1989; Mullerova 2017; and Oláh and Fratczak 2004.

implemented on November 1, 1982 in all the Baltic republics that we study in this paper and was not announced until September 1981.¹⁶

The program provided three new benefits. First, it provided job-protected paid leave of 35 rubles per month until the child's first birthday (about 25% of the average female monthly wage in the Baltics). Second, it provided a cash payment at birth of 50 rubles for the first birth and 100 rubles for the second or third births; the existing cash payments for the 4th and higher-order children were unchanged. Third, women could extend their job-protected leave until the child was 18 months old, but the additional 6 months of maternity leave were unpaid.

Eligibility for the program was conditioned on one year of employment or full-time study prior to the child's birth. In our Baltic sample, 89% of women were eligible for the program reflecting the high female employment rates. Women giving birth in the months prior to the start of the program received paid leave for the remaining months until the child's first birthday starting from November 1, 1982, as well as job-protected leave for the remaining months until the child turned 18 months. Only women with births after November 1982 received the one-time birth payment. Thus, women who gave birth after November 1, 1982, received the highest monetary benefits; Table C1 presents maternity benefits by month of birth. The program effectively ended in 1992 with the dissolution of the Soviet Union and the erosion of benefits due to hyperinflation.

II. Data and Descriptive Statistics

A. Data

We use the Survey of Health, Ageing and Retirement in Europe (SHARE), a household panel of individuals age 50 and older. SHARE is well-suited to this study because it administered

¹⁶ Malkova (2018) provides additional details. Although the program was implemented in stages across the Soviet Union, we do not exploit the staggered timing because the program began at the same time in the three Baltic republics and did not affect our East European control countries.

detailed retrospective life history questions in 2008-09 and 2017 (SHARELIFE), allowing us to construct complete birth, employment, education and country of residence histories for all women surveyed. Importantly, these data include women's family circumstances and living conditions during childhood.¹⁷ We use the employment and education history to create annual indicators for eligibility for maternity benefits for each woman.¹⁸ The retrospective mobility data allow us to match country-level indicators that vary by year to individuals in each year they lived in a particular country and to restrict our sample to women who lived in our treatment and control countries between 1979 and 1985. As most of our sample countries entered SHARE after 2008, we mainly use the 2017 SHARELIFE survey, but we use the 2008 SHARELIFE survey for the Czech Republic as it entered SHARE in 2007 and questions were not repeated in 2017 for individuals who participated in 2008.

The SHARELIFE retrospective data were collected using life history calendar methods that begin with questions about easily remembered events (birth dates of children, marriage history); these dates are used to aid in dating other events such as residential and employment history. While subject to recall error, the retrospective employment histories are highly consistent with linked administrative employment records for the same individuals (Bühler et al. 2002), and the life history data are reliable (Kesternich et al. 2014).

We form a panel with one observation per woman per year in the period we study. To include the maximum number of ages and minimize concerns with selective mortality, we restrict our analysis to women aged 18 to 33 in the period from 1979 to 1985. We choose age 18 because the youngest women in SHARE are age 50 in 2017 or age 18 in 1985. We choose age 33 to

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¹⁷ Appendix A describes the construction of these variables.

¹⁸ See Appendix B for the creation of the eligibility indicators.

¹⁹ For example, a woman who was 18 in 1985 would only be observed once (in 1985), while a woman who was 18 in 1979 would be observed for all 7 years of the panel (1979 to 1985).

minimize any effects from selective mortality: if a woman is age 33 in 1979, then she is age 71 in 2017 which is near the average female life expectancy in our countries in the study period.²⁰ We start the analysis in 1979 to minimize concerns due to selective mortality, because we do not want to have women older than the average life expectancy in our sample that is observed in 2017. Because we want to include the maximum number of ages, we end our analysis in 1985 with three years under the reform.²¹ As women had children at relatively young ages, restricting the sample to age 18-33 covers most births. In 1981, for example, 90% of births in the Baltics occur in women ages 18 to 33. Population mobility was tightly controlled in the Soviet Union in this period (Light 2012), so selective immigration into or out of the treatment and control countries is unlikely.

We classify women by importance of religion growing up using a retrospective question asking: "How important was religion in your home when you were growing up?". We classify those who responded with: (1) "very important" and "somewhat important" as women for whom religion was important while growing up, and (2) "not very important" and "not at all important" as those for whom religion was not important while growing up.²² Information on religious denomination, religiosity or religious affiliation of women at the time of the survey is unavailable, as is information on their spouse's religiosity while growing up.²³ For our purposes, having information on the importance of religion while growing up is beneficial because it allows us to estimate differences in responses to maternity benefits that are due to differences in the individuals'

²⁰ In 1985, life expectancy was 69.4 years in Estonia, 69.3 in Latvia, 70.5 in Lithuania, 71.2 in Bulgaria, 72.4 in East Germany, 69 in Hungary, 71 in the Czech Republic, and 71.4 in Slovenia (CMEA 1987; World Bank Development Indicators).

²¹ If we extended our analysis to 1986, we would have to restrict our sample to ages 19 to 33.

²² Given limited religious diversity in the USSR and Eastern Europe, most people probably had a common notion of what it means for religion to have been important in the home (e.g. frequent talk about religious topics, going to church frequently, praying at home, reading or referencing scripture in the home), as more diverse religious groups may define religious participation differently. This shared understanding of religiosity lends more credibility to our indicator.

²³ The survey year is either 2008 or 2017. Thus, we do not observe spouses who have passed away or who obtained a divorce.

religious upbringing.²⁴ Moreover, following the cultural transmission literature (Bisin, Carvalho and Verdier 2023) a respondent's current values should be positively correlated with the values of their parents because those values are directly a function of their parents' values. Thus, the religious environment of the individuals' upbringing is a predictor of the current values and norms.

B. Comparison of Women in the Baltics and Eastern Europe and by Childhood Religion

Next, we test whether women in the Baltics relative to East European countries were different. Because of similar institutional backgrounds, we expect women to be quite similar, particularly in their adult economic characteristics, and that any differences are small in magnitude. We do expect a difference in the importance of religion in the childhood home, because government efforts to eradicate religion were strongest in the Soviet republics.

Importantly, women in the Baltic republics and East European countries do not need to be the same, in their characteristics, for us to recover the causal effect of maternity benefits. In a difference in differences framework, we only need the probability of having a child (our dependent variable) in the Baltic republics to trend parallel to East European countries, in the absence of treatment.

Women were similar in the Baltics and Eastern Europe, consistent with our accounts of similarities in demographics and labor markets. Table 1 presents the characteristics of women in our sample before maternity benefits started.²⁵ Across treatment and comparison countries we find high full-time employment rates, similar probabilities of giving birth and number of children. In terms of the statistically significant differences, women in the Baltics attain one more year of

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²⁴ However, our measure of importance of religion while growing up is noisy and a proxy for actual parental religious upbringing because it is retrospective.

²⁵ Table C2 presents characteristics of women in Baltic and East European countries for women for whom religion was important while growing up. These characteristics are similar as for the whole sample in Table 1.

education and get married one year later.²⁶ However, neither of these differences are large in magnitude. Conditions in the childhood home differ somewhat between the treatment and control countries, but the differences are small. East European women report a better relationship with their mother and a higher likelihood of their father living at home, but also experienced more harm from their parents. The only difference with a substantial magnitude is the share of women growing up in a religious household: it is 31 percent in the Baltics and 51 percent in Eastern Europe. This is consistent with the stronger persecution of religion by the Soviet government in the Soviet republics.

In the Baltics, Table 2 shows no statistically significant differences in all adult characteristics (the probability of giving birth, being employed, being married, years of education, urban residence, age at first birth and marriage, and marriage duration) by childhood importance of religion. This is different from many other contexts with stark differences between women by religiosity of their childhood home (Hungerman 2014). The Soviet government's suppression of religion undoubtedly played a role in this striking similarity. However, women did differ along their childhood circumstances by the childhood importance of religion, which is consistent with potential correlations of religious importance with other childhood circumstances. In the Baltics, women growing up in religious households had more siblings, and had a higher likelihood of living with both parents, having a good relationship with their mom and growing up in a poor family. To isolate the importance of religion while growing up from other childhood characteristics, we control for them in all regressions, and perform heterogeneity analyses by these characteristics in the sample of women who grew up in households where religion was important.

Unlike in the Baltic republics, women in Eastern Europe who did and did not grow up in

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²⁶ Tables C3 and C4 present characteristics for each Baltic and East European republic, respectively, where the adult characteristics across countries are remarkably similar.

religious households were not similar along all adult characteristics. While they were similar in their probabilities of giving birth, number of children, probability of employment, being married, age at first birth and at first marriage, women growing up in religious households in Eastern Europe had about one less year of education and were less likely to live in urban areas.

Importantly, while we want women who grew up in religious households to be as similar as possible to those who did not in the Baltic republics, women could differ along these lines in East European countries. This is because we only use women in East European countries as controls, and in a difference in differences setting, we only need similar pre-trends in the probability of childbearing (the dependent variable) in the Baltic and East European countries among women growing up in households where religion is important.

III. Methods: Difference in Differences

We compare childbearing in the Baltics (treatment; Estonia, Latvia, and Lithuania) to East European countries (comparison; Bulgaria, Czech Republic, East Germany, Hungary and Slovenia) before and after the maternity benefit program, in the following generalized difference-in-differences framework,

 $HK_{i,c,y} = \alpha + \delta_y + \gamma_c \gamma_u \eta_k + \sum_{t=80}^{85} \pi_t S_c * 1(y=t) + X_{i,c,y} + Z_{i,c,y} + E_{c,y} + \epsilon_{i,c,y}$ (1) where $HK_{i,c,y}$ equals 1 if woman i, living in country c in year y, had a child in year y, δ_y are year fixed effects, γ_c are country fixed effects, γ_u are urbanicity fixed effects, η_k are number of previous children²⁷ fixed effects, $\gamma_c \gamma_u \eta_k$ are interactions of country, urbanicity and previous number of children fixed effects, S_c equals 1 for a Baltic republic, and 0 for an East European country, $S_{i,c,y}$ are individual controls such as birth year, marital status (1 if married, 0 if unmarried), and years of

Number of previous children may change across time (y), as women have more children. It excludes births in year y: if a woman has a first (second) birth in year y then number of previous children equals to 0 (1) in year y.

education²⁸ fixed effects, and dummies for the number of children ages 0 to 5, 6 to 12, and 13 to 17 in year y controlling for the age composition of children, $Z_{i,c,y}$ are individual controls for childhood circumstances (see Appendix A) such as dummies for the number of siblings, any parent absent, co-residence with grandparents, importance of religion, an understanding mother, a good relationship with the mother, family SES fixed effects and any harm by a parent, $E_{c,y}$ are annual country-level controls²⁹ such as real GDP per capita in 2023 \in , production of electro energy (milliards kilowatt-hours) and number of doctors per 10,000 people, which control for coincidental economic shocks that could affect fertility rates.

We use 1979 as the reference year in our analysis in equation (1). The coefficients π_{83} to π_{85} capture the effect of the program in the years 1983 to 1985, when all children born in those years were eligible for the full benefits. Specifically, π_{83} measures the difference in the probability of giving birth in 1983 between women in the Soviet and East European countries relative to this same difference in 1979. The coefficients π_{80} to π_{82} test whether fertility rates were on parallel trends before implementation and when fertility responded to the program.

When do we expect fertility to change in response to the program? Women found out the exact timing of benefits in September 1981, where to receive full benefits, they needed to have a child after November 1982. It is ambiguous how fertility would respond in 1982. On one hand, fertility could rise in 1982, as even women giving birth before November 1982 could receive partial benefits. However, given the lack of modern contraceptives in the Soviet Union, it was difficult for women to precisely control their fertility; even with modern contraceptives it may take

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²⁸ Years of education represent completed years by 2017, and do not change across time (y).

²⁹ These covariates are from the World Inequality Database and Soviet and CMEA statistical yearbooks (Goskomstat SSSR, 1979-1987; CMEA, 1979-1986).

three to six months for a couple to conceive when actively trying (González 2013). ³⁰ On the other hand, women could delay giving birth until November 1982 with the goal of receiving full benefits. While there could be a small fertility response in 1982, we expect the largest fertility response in 1983, because of eligibility for full benefits and time to conceive in response to the announcement.

IV. Results: Effects on Childbearing

Figure 1 displays coefficients that represent the covariate-adjusted differences in the probability of having a child between women in the Baltics and East European countries compared to the difference in 1979 using equation (1).³¹ The figure traces out pre-trends and the dynamic effects of the program on childbearing. In all analyses, we follow the recommendations of Abadie et al. (2023) to cluster at the variation of treatment level resulting in 48 clusters at the country of residence by urban status and by number of previous children level.³²

Figure 1 displays no difference in trends in the probability of having a child in the Baltic and East European countries before maternity benefits. The point estimates for years 1980 to 1982 are individually indistinguishable from zero and follow a flat trend.³³ These results confirm institutional and descriptive evidence that East European countries are good controls for the Baltic republics. Moreover, the figure provides evidence that the program led to a rise in births starting from 1983.

We summarize our results from equation (1) in a difference in differences specification where years 1979 to 1982 represent the omitted reference time period, while we interact the

³⁰ Abortion was legal until the 12th week of pregnancy. Pregnant women, at the time of the announcement, may decide against abortion, which may result in increased fertility as early as April 1982. However, the financial incentives to do this are limited, because women don't get full benefits unless their birth is after November 1982.

³¹ Table C5 displays the coefficients from Figure 1.

³² Treatment varies by parity of birth because benefits differed by parity. Treatment varies by urban/rural status, because benefits were flat amounts, while wages were higher in urban areas resulting in a lower replacement rate.

³³ Because 1979 is the reference year, that coefficient is zero by construction.

dummy for years 1983 to 1985 with a dummy for a Baltic republic. Consequently, in Table 3 the 'after program' coefficient represents the difference in the probability of having a child between the Baltics and East European countries from 1983 to 1985 relative to the same difference from 1979 to 1982. Column 1 includes country and year fixed effects, representing treatment effects unadjusted for covariates; column 2 adds individual-level co-variates such as birth year, marital status, and years of education fixed effects; column 3 adds dummies for the number of children ages 0 to 5, 6 to 12, and 13 to 17; column 4 adds individual-level childhood circumstances such as number of siblings, whether had a parent absent, whether lived with a grandparent, the importance of religion, the SES and type of relationship with parents; column 5 adds annual, country-level covariates and is our baseline specification from equation (1). The similarity of coefficients across columns 1 to 5 show that results are robust to gradually adding controls.

Maternity benefits led to an increase in childbearing among women in the Baltics. The probability of having a child among all women ages 18 to 33 rose by 2.9 percentage points (Table 3, panel A, column 5), representing a 24.2 percent increase over a pre-treatment mean of 12. This increase is entirely due to an increase among eligible women, which we can see in Figure 1 (panel B) and Table 3 (panel 2). The coefficients for ineligible women are noisy, due to the smaller sample size (most women are eligible for benefits due to the high employment rate of women) but show no evidence of an increase in childbearing. The coefficient in Table 3 (panel C, column 5) for ineligible women is negative and statistically insignificant. These results are robust to omitting one comparison country at a time (Table C6) and consistent with the similarity of characteristics of our comparison countries in Table C4.

How do our estimated effects on fertility in the Baltics compare to those in previous studies? Our estimate of a 24.2 percent increase in fertility among all women ages 18 to 33 is in

line with the 15 percent increase estimated in Malkova (2018) due to the same program among women ages 15 to 44 in the Russian republic. Our estimates are larger because we focus on ages when women are most likely to give birth. Thus, as in Malkova (2018), our elasticity of fertility rates with respect to a change in cost of a child is in the range of short-run effects in other countries.³⁴

V. Importance of Religion in the Childhood Home

We examine whether growing up in a religious household affects an individual's responsiveness to maternity benefits. The theoretical predictions are ambiguous. On one hand, the religiosity of the childhood home might have no influence on responsiveness to the policy if the Soviet government succeeded in eradicating religious beliefs and norms. On the other hand, the eradication effort could have the opposite effect and increase the responsiveness of individuals exposed as children to a pronatalist religion that favors traditional home environments with large families. There could be two potential mechanisms for this effect. First, the intergenerational transmission of religion model (Bisin and Verdier 2000, 2001) predicts that religious parents will choose to exert more effort to transmit their religious beliefs to their children in a secular society in which religion is outlawed, as this results in the survival of religious beliefs in this society. Second and more indirectly, in the club theory of religion (Iannaccone 1992) high costs of religious participation imposed by the religious group screen out less committed participants and leave only the most committed members in the religious group. Our context is different because the costs are imposed externally -- by the Soviet government -- rather than by the religious organization itself, but the result is similar in that only the most devout will practice religion under the Soviets and

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³⁴ See calculations in Malkova (2018) for: Lalive and Zweimüller (2009), Cohen et al. (2013), González (2013), and Milligan (2005). This result is also consistent with empirical evidence showing that the causal effect of income on fertility is positive (Black et al. 2013, Brehm and Brehm 2022, Lindo 2010, Dettling and Kearney 2014, Kearney and Wilson 2018 and Lovenheim and Mumford 2013).

these devout individuals will thus be more likely to transmit their religious norms and values to their children.³⁵ In this case, children exposed in this environment might respond strongly given the pronatalist religious views of the parental home.

Strikingly, the increase in childbearing after maternity benefits is entirely due to women who grew up in religious households. Figure 2 (panel A) shows a marked increase in fertility, starting from 1983, among women eligible for maternity benefits who grew up in religious households.³⁶ However, panel B shows no change in fertility among women who did not grow up in religious households. Reassuringly, the pre-trends are flat where coefficients from 1980 to 1982 are close to zero and are not statistically significant. Table 4 (panel A, column 2) shows that among women who grew up in religious households, fertility goes up by a statistically significant 5.7 percentage points representing a 46.3 percent increase. While the magnitude of this effect is substantial, it is in line with the overall increase in fertility rates among our sample of women ages 18 to 33 in Table 3 (panel A), which was similar in magnitude to those in previous empirical studies. If the increase in fertility rates is entirely due to those who grew up in a religious household, and 31 percent of women in the Baltic republics who are ages 18 to 33 grew up in religious families, then the effect among those that did grow up in religious families must be substantial mechanically. In contrast, the coefficient for the non-religious is virtually zero and is insignificant (panel A, column 1). Finally, we reject the equality of coefficients among those who did (panel A, column 2) and did not grow up in a household where religion was important (panel

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³⁵ See Iannaccone (1998) and Iyer (2016) for reviews of the club theory of religion. Berman (2000) demonstrates that subsidies can lead to large increases in fertility in a context where following a religion requires participating in demanding religious practices, such as abstaining from alcohol consumption. Chen and Hungerman (2014) provide an overview of articles on economics, religion and culture. Moreover, several papers highlight the importance of religion in explaining variation in fertility rates across groups (Becker and Cinnirella 2020; Becker, Rubin and Woessmann 2024).

³⁶ Table C7 presents coefficients from Figure 2.

A, column 1). This result is robust to omitting one comparison country at a time (Table C8).

The differing responses of the religious and non-religious to the policy may be surprising given their similar fertility rates prior to the program, but framing fertility decisions as a trade-off between an economic cost-benefit analysis and the influence of cultural norms can explain this behavior (Chabét-Ferret 2019). Prior to the reform, low fertility is economically optimal in this setting due to the high cost of childbearing entailing high female employment and traditional gender norms that resulted in women shouldering most of the childcare and household labor.³⁷ The high cost of deviating from this optimum results in similar fertility across religious and nonreligious groups, despite the high-fertility norm transmitted to the religious group by their parents. This high-fertility norm may result from religious norms favoring larger families, the proscription on abortions (Hungerman 2014) common to the Baltic religions, or a lower career cost of children if gender norms are more traditional among the religious. With a policy change that reduces the economic cost of childbearing, the utility gain from following the pronatalist norm may now outweigh the cost of deviating from the economic optimum for the religious group. In other words, a policy that reduces financial constraints may allow for increased cultural adherence, resulting in greater responsiveness to the policy by the group whose cultural norms favor larger families. This result is arguably unique to settings in which economic constraints lead to similar fertility outcomes across groups with heterogeneous fertility preferences. In settings with lower opportunity costs of childbearing, the religious may be more likely to adhere to their pronatalist cultural norm because they are less constrained. This would result in higher fertility rates among the religious relative to the non-religious prior to the policy and limited fertility responses among the religious to a policy incentivizing larger families, because they are closer to their desired

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³⁷ See Brainerd and Malkova 2023 for further details and evidence.

fertility.

How do we interpret the greater responsiveness of women who grew up in a religious childhood home? We demonstrate that this is unlikely to be due to omitted variables that are correlated with religiosity and fertility decisions. First, Table 2 showed that women in the Baltic republics who grew up in religious households did not differ in observable adult characteristics from those who did not. This means that differences in responsiveness are unlikely to be due to fundamental differences such as employment or marriage patterns.³⁸ Second, our regressions control for individual characteristics such as child parity, education, marital status, age, urbanicity, number of own siblings, parental relationships, and childhood socioeconomic circumstances. Thus, if there are factors that we conflate with religion, they must be different from these controls. One such possible factor is conservative values: perhaps women brought up in a religious home have more conservative values, and it is these conservative values rather than religious doctrine that is influencing their fertility choices (Connor 2021). However, in section VII we demonstrate similar increases in childbearing among women growing up in religious households in the Baltics by the number of siblings. If a larger family size is indicative of conservative values, then the similarity of responses by the previous number of siblings helps us rule out conservative values as the mechanism behind our findings. In sum, the results suggest that the likely mechanism for the greater responsiveness of women brought up in a religious household to the policy is the cultural norm favoring greater fertility transmitted through their childhood exposure to religion.

To further investigate the role of religion in the responsiveness of women from a religious childhood home, we examine whether the response varied across each Baltic republic. Table C3

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³⁸ For this argument to hold, women could be different by childhood religion in East European countries, as long as the probabilities of having a child in the Baltic and East European countries (among women who grew up in a religious household) were on parallel trends prior to maternity benefits, as demonstrated in Figure 2.

shows remarkable similarity in adult characteristics of women in Estonia, Latvia and Lithuania, which is consistent with the Soviet central planning system. However, cultural norms differed due to variation in religious denominations and adherence that existed long before the Soviet Union annexed the three countries. Consistently, the largest difference (in Table C3) stems from the importance of religion when growing up: 16 percent in Estonia, 33 percent in Latvia and 64 percent in Lithuania. These shares are remarkably consistent with the share of the population belonging to a religious denomination in these countries in 1990 (using the European Values Survey): 12.8 percent in Estonia, 36.5 percent in Latvia and 63.3 percent in Lithuania. The similarity of these two measures bolsters the credibility of the metric we use in SHARE and also suggests the persistence of importance of religion into adulthood. Moreover, the differential abortion rates in these countries – where all major religious denominations in the Baltics banned abortions – are consistent with the above religiosity statistics, where Lithuania had the lowest abortion rate.³⁹

While childbearing among women growing up in religious households increased in every Baltic country, the strongest evidence for differential responses by childhood importance of religion is for Lithuania. Table 4 shows that among women growing up in religious households, childbearing went up ty 4.9 percentage points in Estonia (panel B, column 4), by 7.6 percentage points in Latvia (panel C, column 2) and by 6.4 percentage points in Lithuania (panel D, column 4), while coefficients among those who did not grow up in religious households are small and not statistically significantly different from zero. However, the coefficients for those who did and did not grow up in a religious household in Estonia and Latvia are not statistically different from each other. On the other hand, in Lithuania, these coefficients are statistically different. This could be due to power issues, as more women grew up in religious households in Lithuania, but could also

³⁹ The number of abortions per 100 live births was 159.9 in Estonia, 141.5 in Latvia and 87.3 in Lithuania (Demoscope Weekly 2023).

be suggestive of the importance of Catholicism, which was the dominant denomination in Lithuania.

VI. Heterogeneous Responses among Women Growing up in Religious Households

Next, we examine whether certain types of women who grew up in religious households were more responsive to maternity benefits.

A. Adult Characteristics

Maternity benefits led women who grew up in religious households to be more likely to have first or second children. Table 5 (Panel A) shows statistically significant increases in the probability of first births, while the age of first birth declined by 1 year (Table C9, column 1). This suggests that mothers shifted the timing of first births, which they would have otherwise had, to earlier ages, as childlessness was low in the Baltics. The program also led to a rise in second parity births (Table 5, panel B) (significant at the 10 percent level), but no change in third and higher parity births (Table 5, panel C). The rise in second parity births provides suggestive evidence of a rise in completed childbearing, meaning women had children they would not have otherwise had, as the age at these births did not drop (Table C9, column 2).

Fertility rose only among married women in marriages that lasted 6 years or less, while the strongest evidence of the rise is among women ages 18 to 27. The lack of a statistically significant rise in childbearing among single women is consistent with the infrequency of single motherhood in our countries in the 1980s (less than 6 percent of births were nonmarital). The rise in childbearing among women ages 18 to 22 is consistent with the rise in first births at younger ages, while the rise in childbearing among women ages 23 to 27 is consistent with a rise in second births. Fertility increased among all education groups, and in both urban and rural areas. While increases in childbearing are statistically significant only among women with a secondary (5-percent level)

and higher-education (10-percent level), the coefficient is positive and similar in magnitude among those with less than a secondary education.⁴⁰

B. Characteristics of the Childhood Home

We compare childbearing responses among women who grew up in religious households, based on their childhood circumstances. This analysis is novel because previous work did not have data on childhood economic circumstances of adult women. While Table 2 documented some differences in childhood circumstances by childhood importance of religion in the Baltics, our empirical analysis demonstrates similar effects by all childhood circumstances. This suggests that the differences by childhood importance of religion we observe are not due to other childhood circumstances that could be correlated with religion.

A key childhood characteristic of interest is the mother's number of siblings, which has ambiguous effects on the fertility response to benefits. On one hand, exposure to more siblings may make women more predisposed to having another child (Beaujouan and Solaz 2019; Fernández and Fogli 2006). On the other hand, if the time parents spend socializing each child falls with additional children, this may reduce the strength of religious socialization (Dohmen et al. 2012) and lead to smaller effects of maternity benefits on fertility among women who grew up in large religious families. We find that maternity benefits led to similar increases in childbearing among women who grew up in families of different sizes, suggesting that the number of siblings does not influence childbearing responses to maternity benefits. Table 6 (panel A) shows statistically significant increases in childbearing of similar magnitudes among women with fewer than 2 and at least 2 siblings. Consistent with the lack of heterogeneity by family size, we do not

⁴⁰ Education groups are: less than high school (incomplete secondary, primary, and less than primary), secondary (general secondary, specialized secondary and incomplete higher), and higher (college completion and above).

However, Yang and Spencer (2022) show that the number of brothers of the husband has a negative effect on fertility in China.

find differences by living with a grandparent while growing up (panel F). The similar responses by number of siblings and living with a grandparent bolster our argument that differences in responsiveness by religious upbringing are due to the influence of religion growing up and not due to other family circumstances that are correlated with religious adherence, such as family size.

Moreover, Table 6 shows that the presence of a father at home (panel B), the relationship with the mother (panel C) or whether your parents harmed you (panel E) does not influence responses to maternity benefits among women where religion was important while growing up. The largest differences in magnitudes are by family socioeconomic status, where those coming from families with an average socioeconomic status experience the largest increase that is statistically significant. While the coefficients for women growing up in poor or well-off families are positive, they are half the magnitude of those growing up in an average socioeconomic status family and are not statistically significant.

VII. Conclusion

This paper focuses on the interaction of economic and religious influences to evaluate the effect of maternity benefits on childbearing. Our context is beneficial for isolating the role of childhood exposure to religion because Baltic women with and without a religious upbringing were similar along many observables in adulthood due to the Soviet government's efforts to eradicate religion. We find that maternity benefits only increased childbearing among women who grew up in religious families. The larger response among women from religious families is not due to differences in their adult characteristics or due to childhood circumstances such as the number of siblings. We interpret the greater responsiveness of these women as reflecting the pronatalist religious norms transmitted from their parents in the childhood home.

While our context is unique given the Soviet system and the repression of religion in the Soviet Union, the qualitative spirit of our results may be relevant today to countries with similar characteristics, such as low fertility rates, high female labor force participation and subsidized, widely available childcare. They are also relevant for contexts where different groups have low fertility rates due to economic incentives, but because they differ in pronatalist norms, they may respond differentially to financial incentives. As countries around the world design policies with financial incentives to raise fertility, it is important to realize that even if countries have similar pre-policy birth rates and demographic characteristics, individuals may respond differently to the same financial incentives in the presence of a difference in culture. In other words, while the magnitudes of our effects should be interpreted in the context of the Soviet system, the spirit of the results that religion can be a significant mediating factor to pronatalist policies likely generalizes. Moreover, the results support the hypothesis that the secular decline in religion is a contributing factor to the shift in fertility preferences away from large families and the low levels of childbearing in many countries (Kearney and Levine 2025).

Our paper makes several contributions. First, we are the first to show that cultural factors, such as the importance of religion in the childhood home, matter for determining childbearing responses to pronatalist policies. An influential literature has demonstrated that cultural beliefs affect economic outcomes such as fertility levels and female labor force participation (Fernández and Fogli 2006, 2009) and a newly emerging literature shows that public policies can affect cultural norms (Fontenay and González 2024), but there is little evidence on whether culture affects the response to pronatalist policies (Blau and Fernández 2023; Dahl and Loken 2024).

Second, our paper also contributes to the literature on the intergenerational transmission of cultural beliefs and traits. This literature provides evidence that cultural attitudes and beliefs – such

as trust, risk preferences and gender norms – are transmitted from parents to children through socialization (Dohmen et al. 2012; Dhar et al. 2019). In our context, the intense efforts of the Soviet Union to eradicate religion means that exposure to religiosity as a child was unlikely to come from churches, peers, schools, neighborhoods, the media or any influence other than the family, allowing us to specifically test the role of the family in transmitting cultural beliefs (Bau and Fernández 2023; Nunn 2010).⁴² We also demonstrate the persistence of culture, in the form of a religious upbringing, despite extensive state efforts to eradicate this culture. This fits into the strand of empirical literature showing that the intergenerational transmission of beliefs can create outcomes that persist over time, even when the environment that gave rise to these beliefs has changed (Ashraf and Galor 2013; Bau and Fernández 2023; Bredtmann, Höckel and Otten 2020; Nunn 2010; Voigtländer and Voth 2012).

Our study demonstrates that a policy that reduces the opportunity cost of childbearing may elicit a greater fertility response if social or religious norms dictate that more fertility is desirable. It is important for policy design to understand if the approach emphasizing the opportunity cost of time or the approach emphasizing culture and norms in determining fertility choices matters most. If fertility is a question of culture and norms in addition to economic incentives, then policies based on economic incentives alone may have minimal effects.

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⁴² Other literature has studied the spread of fertility norms through peers (Ciliberto et al. 2016), the media (La Ferrara et al. 2012), linguistic and cultural ties (Beach and Hanlon 2023, Rossi and Xiao 2024, Spolaore and Wacziarg 2022), religious groups (Munshi and Myaux 2006) and religious leaders (Bassi and Rasul 2017; Farina and Pathania 2020).

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Table 1. Comparison of Women in the Baltic and East European Countries

	1979 to 1981		t-test of di	fference
	Baltic	East European	Baltic-East European	<i>p</i> value
A. All women ages 18 to 33				
Characteristics of the woman				
Gave birth	0.12	0.11	0.00853	0.654
Employed	0.85	0.86	-0.0118	0.720
Years of education	12.6	11.6	0.919	0.00807
Married	0.65	0.78	-0.129	0.217
Living in urban areas	0.72	0.61	0.110	0.475
Age at first birth	23.6	22.5	1.056	0.136
Number of children	1.0	1.3	-0.255	0.440
Age at first marriage	22.8	21.5	1.257	0.0273
Marriage duration (if married)	6.3	7.5	-1.203	0.139
Characteristics of the family where grew i	ıp			
Number of siblings	1.6	1.8	-0.204	0.130
Dad at home	0.85	0.92	-0.0693	1.66e-05
Relationship with mom (good or				
excellent)	0.60	0.71	-0.110	3.99e-06
Grew up in a poor family	0.24	0.25	-0.0150	0.535
Parents harmed (sometimes or often)	0.17	0.25	-0.0868	0.00945
Religion is important when growing up	0.31	0.51	-0.198	0.00832
# of observations	7350	10155	17505	

Notes: We present descriptive statistics in our sample separately for the Baltic republics (Estonia, Latvia and Lithuania) and East European countries (Bulgaria, the Czech Republic, Hungary, Slovenia and East Germany) before the maternity benefit program (from 1979 to 1981). The maternity benefit program was only implemented in the Baltic republics. The sample includes all women who were ages 18 to 33. 'Number of kids' measures the number of children a woman has inclusive of any births in the year of observation. Standard errors are clustered at the country by urbanicity by previous number of children level. Country stands for country of residence in the year when the dependent and independent variables are measured. Source: SHARE. *p < .10; **p < .05; ***p < .01

Table 2. Comparison of Women by Importance of Religion While Growing Up

	(1)	(2)	(3)	(4)
	1979 t		t-test of differen	
	Religion is	important		
	when gro	owing up	Difference	
	No	Yes	(2)-(1)	<i>p</i> value
A. All women ages 18 to 33 in the Baltics				
Characteristics of the woman				
Gave birth	0.12	0.12	0.00653	0.411
Employed	0.85	0.86	0.0148	0.634
Years of education	12.6	12.3	-0.322	0.133
Married	0.64	0.67	0.0277	0.738
Living in urban areas	0.72	0.72	-0.00528	0.959
Age at first birth	23.5	23.7	0.255	0.641
Number of children	1.0	1.0	-0.0305	0.903
Age at first marriage	22.7	22.8	0.0857	0.835
Marriage duration (if married)	6.3	6.2	-0.115	0.852
Characteristics of the family where grew up				
Number of siblings	1.4	2.1	0.629	7.03e-0
Dad at home	0.84	0.88	0.0361	0.0709
Relationship with mom (good or excellent)	0.58	0.66	0.0846	9.07e-0
Grew up in a poor family	0.22	0.28	0.0563	0.0792
Parents harmed (sometimes or often)	0.16	0.17	0.0107	0.411
# of observations	5037	2257	7294	
B. All women ages 18 to 33 in Eastern Europe				
Characteristics of the woman				
Gave birth	0.11	0.11	0.00346	0.797
Employed	0.87	0.86	-0.0104	0.566
Years of education	12.11	11.12	-0.992	6.35e-0
Married	0.77	0.78	0.0106	0.796
Living in urban areas	0.74	0.49	-0.249	0.00039
Age at first birth	22.64	22.37	-0.268	0.423
Number of children	1.26	1.33	0.0699	0.660
Age at first marriage	21.58	21.41	-0.170	0.522
Marriage duration (if married)	7.29	7.64	0.354	0.450
Characteristics of the family where grew up				
Number of siblings	1.57	2.06	0.494	7.83e-0
Dad at home	0.92	0.92	0.00419	0.556
Relationship with mom (good or excellent)	0.69	0.74	0.0524	0.00204
Grew up in a poor family	0.22	0.28	0.0566	0.0100
Parents harmed (sometimes or often)	0.28	0.22	-0.0608	0.0156

of observations 4969 5126 10095

Notes: We present descriptive statistics separately for women for whom religion was important while growing up and for those for whom it was in the period before the maternity benefit program (from 1979 to 1981). The sample consists of women who were ages 18 to 33 and report their importance of religion while growing up. 'Number of kids' measures the number of children a woman has inclusive of any births in the year of observation. We construct the measure of importance of religion while growing up by the respondent's retrospective answer to the question: "How important was religion in your home when you were growing up?" The 'Yes' columns are for those who answered 'very important' or 'somewhat important' and the 'No' columns are for those who answered 'not very important' and 'not important'. Standard errors are clustered at the country by urbanicity by previous number of children level. Country stands for country of residence in the year when the characteristics in the table are measured. Source: SHARE. *p < .05; ***p < .05; ****p < .01

Table 3. Effect of Maternity Benefits on Childbearing

			v	8		
	(1)	(2)	(3)	(4)	(5)	
			1. All			
After program	0.0276	0.0243	0.0249	0.0253	0.0290	
	[0.00861]***	[0.00905]***	[0.00902]***	[0.00904]***	[0.00793]***	
# Observations	37,894	37,894	37,894	37,894	37,894	
# Women	7104	7104	7104	7104	7104	
Dep var mean	0.120	0.120	0.120	0.120	0.120	
			2. Eligible			
After program	0.0303	0.0275	0.0281	0.0284	0.0333	
	[0.00896]***	[0.00932]***	[0.00929]***	[0.00929]***	[0.00846]***	
# Observations	34,805	34,805	34,805	34,805	34,805	
# Women	6817	6817	6817	6817	6817	
Dep var mean	0.119	0.119	0.119	0.119	0.119	
			3. Not Eligible			
After program	-0.00492	-0.0123	-0.0110	-0.0152	-0.0473	
	[0.0235]	[0.0210]	[0.0205]	[0.0208]	[0.0319]	
# Observations	3,005	3,004	3,004	3,004	3,004	
# Women	1081	1081	1081	1081	1081	
Dep var mean	0.129	0.129	0.129	0.129	0.129	
# Observations # Women	[0.0235] 3,005 1081	[0.0210] 3,004 1081	[0.0205] 3,004 1081	[0.0208] 3,004 1081	[0.0319] 3,004 1081	

Notes: These difference in differences coefficients summarize results from equation (1), where we interact the 'after program' dummy with a Baltic republic dummy, instead of interacting each year dummy with a Baltic republic dummy. 'After program' is a dummy for years 1983 to 1985. The dependent variable equals to one if a woman gave birth in the year of observation and equals zero otherwise. Panel A includes all women ages 18 to 33 from years 1979 to 1985 in our sample of Baltic and East European countries; panel B restricts the sample in panel A to eligible women, panel C restricts the sample in panel A to ineligible women. Column 1 includes country and year fixed effects; column 2 adds country by previous number of kids by urban fixed effects, marital status, birth year, and years of education fixed effects; column 3 adds dummies for the number of children ages 0 to 5, 6 to 12, and 13 to 17; column 4 adds childhood family circumstances such as the number of siblings fixed effects, whether had a parent absent, whether lived with a grandparent, the importance of religion while growing up, family SES fixed effects, whether the relationship with the mother was good, and whether harmed by any parent; column 5 adds annual countrylevel real GDP per capita in 2023€, production of electro energy (milliards kilowatt-hours), and the number of doctors per 10,000 people. 'Dep var mean' is the mean dependent variable in the Baltic republics from 1979 to 1981. Standard errors are clustered at the country by urban by previous number of children level. Country stands for country of residence in the year when the dependent and independent variables are measured. Sources: SHARE, World Inequality Database, Goskomstat SSSR and CMEA. *p < .10; **p < .05; ****p* < .01

Table 4. Heterogeneous Effects of Maternity Benefits on Childbearing: by Importance of Religion Growing Up

	Kengion Growing Op					
	(1)	(2)	(3)	(4)		
	A. All	countries	В. Е	Estonia		
	_	Religion is Important when Growing up No Yes		is Important rowing up Yes		
After program	0.00623	0.0574	0.0119	0.0490		
	[0.0119]	[0.0125]***	[0.0170]	[0.0237]**		
pval of Yes-No		0120		.257		
# Observations	21880	15758	18044	12044		
# Women	4104	2954	3365	2257		
Dep var mean	0.118	0.124	0.120	0.141		
	C. I	Latvia	D. Lithuania			
	_	Religion is Important when Growing up No Yes		is Important rowing up Yes		
After program	0.0230	0.0757	-0.00493	0.0637		
	[0.0189]	[0.0318]**	[0.0145]	[0.0140]***		
pval of Yes-No	0.	0.154		00817		
# Observations	12914	11746	12174	13362		
# Women	2428	2200	2277	2504		
Dep var mean	0.105	0.114	0.126	0.119		

Notes: These difference in differences coefficients summarize results from equation (1), where we interact the 'after program' dummy (years 1983 to 1985) with a Baltic republic dummy. We do this separately for women by importance of religion in their childhood home, which came from the survey question: "How important was religion in your home when you were growing up?" The 'Yes' columns are for those who answered 'very important' or 'somewhat important' and the 'No' columns are for those who answered 'not very important' and 'not important'. The dependent variable equals one if a woman gave birth in the observation year and equals zero otherwise. The sample consists of all women ages 18 to 33 in the period from 1979 to 1985. The estimates are for our baseline specification from equation (1) and presented as model (5) in table 3. Panel A includes our sample of Baltic and East European countries, panel B restricts the sample of Baltic countries to Estonia, panel C restricts the sample of Baltic countries to Latvia and panel D restricts the sample of Baltic countries to Lithuania. 'Dep var mean' is the mean dependent variable in the Baltic republics from 1979 to 1981. Standard errors are clustered at the country by urbanicity by previous number of children level. Country stands for country of residence in the year when the dependent and independent variables are measured. Sources: SHARE, World Inequality Database, Goskomstat SSSR and CMEA. *p < .10; **p < .05; ***p < .01

Table 5. Effects of Maternity Benefits on Childbearing for Women Who Grew Up in Household where Religion Was Important: by Adult Characteristics

110us	Household where Kengion was important; by Adult Characteristics							
	(1)	(2)	(3)	(4)	(5)	(6)		
	A. Parity of ch	nild		B. Completed	Education			
				<				
-	First	Second	Third +	Secondary	Secondary	Higher		
After program	0.0921	0.0449	0.00986	0.0550	0.0501	0.0771		
	[0.0165]***	[0.0255]*	[0.0121]	[0.0404]	[0.0172]***	[0.0423]*		
# Observations	5,037	4,441	5,340	3,332	8,208	2,125		
# Women	1276	1422	1458	631	1552	396		
Dep var mean	0.135	0.146	0.0825	0.163	0.122	0.110		
	C. Marital Sta	itus		D. Age				
	Unmarried	Married	_	18-22	23-27	28-33		
After program	0.0212	0.0683		0.0708	0.0532	0.0365		
	[0.0139]	[0.0184]***		[0.0301]**	[0.0200]**	[0.0256]		
# Observations	3,764	11,993		3,154	5,302	7,301		
# Women	1039	2523		1006	1624	2080		
Dep var mean	0.0307	0.170		0.111	0.173	0.0889		
	E. Marriage a	luration (if mar	ried)	F. Urbanicity	,			
	≤6 years	>6 years	_	Rural	Urban	_,		
After program	0.115	0.0271		0.0572	0.0577			
	[0.0281]***	[0.0194]		[0.0206]**	[0.0157]***			
# Observations	5,143	6,850		6,956	8,802			
# Women	1489	1838		1377	1760			
Dep var mean	0.242	0.0824		0.170	0.106	_		

Notes: These difference in differences coefficients summarize results from equation (1), where we interact the 'after program' dummy (years 1983 to 1985) with a Baltic republic dummy. The dependent variable equals one if a woman gave birth in the observation year and equals zero otherwise. The sample consists of all women ages 18 to 33 (in the period from 1979 to 1985) who grew up in households where religion was important in our sample of Baltic and East European countries. The estimates are for our baseline specification from equation (1) and presented as model (5) in table 3. Panel A presents results separately by the previous number of children at the time of observation; panel B by completed education at the time of the SHARE survey, panel C by marital status, panel D by age groups, panel E by marriage duration for the sample of married women, and panel F by urbanicity of the residence. 'Dep var mean' is the mean dependent variable in the Baltic republics from 1979 to 1981. Standard errors are clustered at the country by urbanicity by previous number of children level. Country stands for country of residence in the year when the dependent and independent variables are measured. Sources: SHARE, World Inequality Database, Goskomstat SSSR and CMEA. *p < .10; **p < .05; ***p < .05

Table 6. Effects of Maternity Benefits on Childbearing for Women Who Grew Up in Households where Religion was Important: by Childhood Circumstances

	(1)	(2)	(3)	(4)	(5)	(6)	
	A. Number of siblings		B. Dao	B. Dad at home		C. Relationship with mom very good or excellent	
	<2	≥2	No	Yes	No	Yes	
After program	0.0590	0.0524	0.0597	0.0594	0.0687	0.0539	
	[0.0178]***	[0.0206]**	[0.0441]	[0.0127]***	[0.0194]***	[0.0163]***	
# Observations	7,121	7,918	1,416	14,334	4,484	11,157	
# Women	1318	1508	264	2689	851	2084	
Dep var mean	0.125	0.129	0.140	0.122	0.126	0.122	

D. Family Socio Economic Status

E. Parents harmed sometimes or often

	Poor	Average	Welloff	No	Yes
After program	0.0305	0.0700	0.0319	0.0590	0.0708
	[0.0273]	[0.0187]***	[0.0470]	[0.0113]***	[0.0394]*
# Observations	3,877	9,423	1,342	12,485	3,176
# Women	762	1751	241	2344	593
Dep var mean	0.107	0.133	0.138	0.121	0.132

F. Grandparent Present

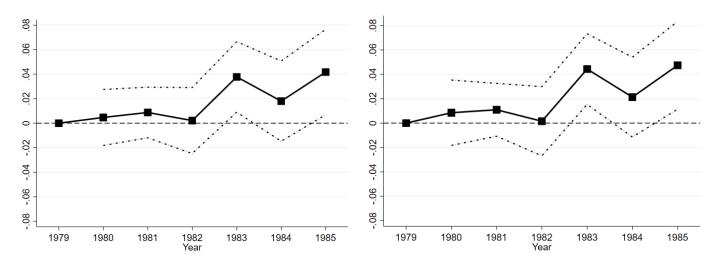
	No	Yes		
After program	0.0534	0.0671		
	[0.0163]***	[0.0320]**		
# Observations	12,254	3,497		
# Women	2289	664		
Dep var mean	0.123	0.129		

Notes: These difference in differences coefficients summarize results from equation (1), where we interact the 'after program' dummy (years 1983 to 1985) with a Baltic republic dummy. The dependent variable equals one if a woman gave birth in the observation year and equals zero otherwise. The sample consists of all women ages 18 to 33 (in the period from 1979 to 1985) who grew up in households where religion was important in our sample of Baltic and East European countries. The estimates are from our baseline specification in equation (1) and presented as model (5) in table 3. Panel A presents results separately by the number of siblings the woman had, panel B by whether grew up with a father present, panel C by whether had a good relationship with the mom, panel D by whether grew up in a poor family, panel E by whether were harmed by parents and panel F by whether lived with a grandparent while growing up. 'Dep var mean' is the mean dependent variable in the Baltic republics from 1979 to 1981. Standard errors are clustered at the country by urbanicity by previous number of children level. Country stands for country of residence in the year when the dependent and independent variables are measured. Sources: SHARE, World Inequality Database, Goskomstat SSSR and CMEA. p < .10; **p < .05; ***p < .05;

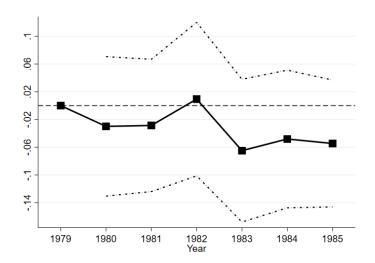
Figure 1. Effect of Maternity Benefits on Childbearing

A. All women aged 18 to 33

B. Eligible women aged 18 to 33



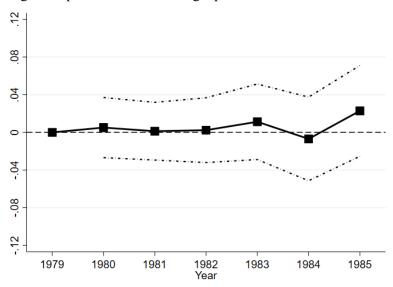
C. Ineligible women aged 18 to 33



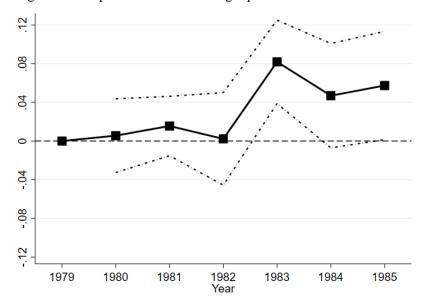
Notes: We present estimates of π from equation (1), where we interact a dummy for each year with a Baltic republic dummy. We present the difference in the probability of having a child among women living in the Baltic republics relative to in East European countries in each year relative to the difference in 1979. The estimates are from our baseline specification in equation (1) and presented as model (5) in table 3. The dependent variable equals one if a woman gave birth in the observation year (on the x-axis) and equals zero otherwise. The sample includes women in Baltic and East European countries. Panel A includes all women aged 18 to 33 (in the year of observation), panel B includes women eligible for maternity benefits aged 18 to 33. Standard errors are clustered at the country by urbanicity by previous number of children level. Country stands for country of residence in the year when the dependent and independent variables are measured. Dashed lines construct 95-percent, point-wise confidence intervals. Sources: SHARE, World Inequality Database, Goskomstat SSSR and CMEA.

Figure 2. Effect of Maternity Benefits on Childbearing: by Importance of Religion

A. Religion Important while Growing Up



B. Religion Not Important while Growing Up



Notes: We present estimates of θ from equation (1) where the dependent variable is whether had a child in the year of observation. Our sample includes all women age 18 to 33 in the year of observation (the year on the x-axis). The dependent variable equals one if a woman gave birth in the observation year (on the x-axis) and equals zero otherwise. Panel A includes the sample of women growing up in households where religion was important, while panel B includes women growing up in households where religion was not important. The estimates are from our baseline specification in equation (1) and presented as model (5) in table 3. Standard errors are clustered at the country by urbanicity by previous number of children level. Country stands for country of residence in the year when the dependent and independent variables are measured. Dashed lines construct 95-percent, point-wise confidence intervals. Sources: SHARE, World Inequality Database, Goskomstat SSSR and CMEA.

APPENDIX A

Creation of Childhood Circumstances Variables in SHARE

1. Household composition at age 10

Number of siblings: Estimated from [(number of people living in household at age 10)

– (number of parents home at age 10 - (1 if one or more)

grandparents lived at home at age 10) – (1 if other relatives or non-relatives lived at home at age 10) – 1 (for the respondent)] if the respondent answered "yes" to whether sibling(s) lived at home at

age 10, = 0 otherwise

Dad at home: Whether biological father, adoptive father or stepfather lived in

household at age 10

Parent absent: One or both parents (biological, adoptive and stepparents) not

living in the household at age 10

Grandparent at home: One or more grandparents lived in the household at age 10

2. Family relationships

Relationship with mother: Relationship with mother (up to age 17) rated as very good or

excellent

Parent(s) harmed: Mother and/or father sometimes or often pushed you, dragged you,

threw things at you or beat you (up to age 17)

3. Family socioeconomic status in childhood

Coded from the following question in SHARELIFE: Now think about your family when you were growing up, from birth to age 16. Would you say your family during that time was pretty well off financially, about average, or poor?

- 1. Pretty well off financially
- 2. About average
- 3. Poor
- 4. It varied (SPONTANEOUS ONLY)
- 5. Did not live with family (SPONTANEOUS ONLY)

Grew up in a poor family: Family was poor (up to age 17) (=1 if response =3, = 0 otherwise)

4. Religion in the childhood home

Coded from the following question in SHARELIFE: *How important was religion in your home when you were growing up?*

- 1. Very important
- 2. Somewhat important
- 3. Not very important
- 4. Not at all important

Religion: Religion at home was very important or somewhat important when growing up (= 1 if above response = 1 or 2; = 0 otherwise)

APPENDIX B

Eligibility for Maternity Benefits Creation in SHARE

We create annual indicators for maternity benefits eligibility using our data. Eligibility is defined each year, based on working history and current schooling status, and may vary across years for the same individual. The variables we use to create eligibility indicators include: working status, whether in education, and whether had a child.

We list an individual as eligible for maternity benefits in the year of observation if:

- 1. Worked last year and worked this year if did not have a child this year.
- 2. Worked last year, but did not work this year if had a child this year.
- 3. Did not work this year, but had a child last year and was eligible last year.
- 4. Enrolled in any schooling this year.

We list an individual as ineligible for maternity benefits in the year of observation if:

- 1. Did not work last year, as long as did not have a child last year and was not eligible last year.
- 2. Did not work this year and did not have a child this year, so long as did not have a child last year and was not eligible last year.

APPENDIX C Figures and Tables

Table C1. Maternity Benefits by Month

(1)	(2)	(3) Cash	(4)	(5)	(6)
Year of Birth	Month of Birth	Payments at Birth (rubles)	Additional Paid Leave (rubles)	Months of Additional Paid Leave	Months of Additional Unpaid Leave
≤1980	All	0	0	0	0
1981	Apr	0	0	0	0
1981	May	0	0	0	0
1981	Jun	0	0	0	1
1981	Jul	0	0	0	2
1981	Aug	0	0	0	3
1981	Sep	0	0	0	4
1981	Oct	0	0	0	5
1981	Nov	0	0	0	6
1981	Dec	0	35	1	6
1982	Jan	0	70	2	6
1982	Feb	0	105	3	6
1982	Mar	0	140	4	6
1982	Apr	0	175	5	6
1982	May	0	210	6	6
1982	Jun	0	245	7	6
1982	Jul	0	280	8	6
1982	Aug	0	315	9	6
1982	Sep	0	350	10	6
1982	Oct	0	350	10	6
1982	Nov	В	350	10	6
1982	Dec	В	350	10	6
≥1983	all	В	350	10	6

Notes: This table presents additional benefits from the maternity benefits program by year of birth (column 1) and month of birth (column 2). The variables include: additional cash payments at birth in rubles (column 3), additional paid leave in rubles (column 4), additional months of paid leave (column 5), and additional months of job-protected unpaid leave (column 6). B equals to 50 rubles for first births and 100 rubles for second and third births.

Table C2. Women in Baltic and East European Countries: Religion Important while Growing up

	197	79 to 1981	t-test of di	fference
	Baltic	East European	Baltic-East European	p value
A. All women ages 18 to 33				
Characteristics of the woman				
Gave birth	0.12	0.11	0.0107	0.573
Employed	0.86	0.86	0.00451	0.886
Years of education	12.3	11.1	1.202	0.000191
Married	0.67	0.78	-0.116	0.271
Living in urban areas	0.72	0.49	0.229	0.152
Age at first birth	23.7	22.4	1.370	0.0657
Number of children	1.0	1.3	-0.312	0.345
Age at first marriage	22.8	21.4	1.415	0.0199
Marriage duration (if married)	6.2	7.6	-1.458	0.0830
Characteristics of the family where grew	ир			
Number of siblings	2.1	2.1	-0.00551	0.969
Dad at home	0.88	0.92	-0.0463	0.0269
Relationship with mom (good or				
excellent)	0.66	0.74	-0.0765	0.00580
Grew up in a poor family	0.28	0.28	-0.00282	0.924
Parents harmed (sometimes or often)	0.17	0.22	-0.0495	0.117
# of observations	2257	5126	7383	

Notes: We present descriptive statistics in our sample separately for the Baltic republics (Estonia, Latvia and Lithuania) and East European countries (Bulgaria, the Czech Republic, Hungary, Slovenia and East Germany) before the maternity benefit program (from 1979 to 1981). The maternity benefit program was only implemented in the Baltic republics. The sample includes women who grew up in households where religion was important and were ages 18 to 33. 'Number of kids' measures the number of children a woman has inclusive of any births in the year of observation. Standard errors are clustered at the country by urbanicity by previous number of children level. Country stands for country of residence in the year when the dependent and independent variables are measured. Source: SHARE. *p < .10; ***p < .05; ****p < .01

Table C3. Characteristics of Women across the Baltic Republics

	(1)	(2)	(3)
		1979 to 1981	
	Estonia	Latvia	Lithuania
A. All women ages 18 to 33			
Characteristics of the woman			
Gave birth	0.12	0.11	0.12
Employed	0.85	0.86	0.83
Years of education	12.7	12.3	12.4
Married	0.66	0.65	0.64
Living in urban areas	0.71	0.71	0.76
Age at first birth	23.4	23.9	23.7
Number of kids	1.1	0.93	0.94
Age at first marriage	22.9	22.6	22.6
Marriage duration (if married)	6.4	6.3	6.0
Characteristics of the family where grew up			
Number of siblings	1.5	1.5	2.1
Dad at home	0.82	0.9	0.9
Relationship with mom (good or			
excellent)	0.59	0.6	0.6
Grew up in a poor family	0.24	0.21	0.25
Parents harmed (sometimes or often)	0.17	0.08	0.22
Religion is important when growing up	0.16	0.33	0.64
# of observations	4087	1478	1785

Notes: We present descriptive statistics in our sample separately for Estonia, Latvia and Lithuania before the maternity benefit program (from 1979 to 1981). The sample includes all women who were ages 18 to 33. Source: SHARE.

Table C4. Characteristics of Women across East European Countries

	(1)	(2)	(3)	(4)	(5)
	1979 to 1981				
	Czech Rep.	East Germany	Hungary	Slovenia	Bulgaria
A. All women ages 18 to 33					
Characteristics of the woman					
Gave birth	0.12	0.13	0.10	0.12	0.09
Employed	0.88	0.92	0.90	0.84	0.82
Years of education	12.3	12.8	10.8	11.4	11.2
Married	0.79	0.79	0.84	0.73	0.79
Living in urban areas	0.72	0.61	0.62	0.48	0.67
Age at first birth	22.6	21.8	22.6	22.6	22.2
Number of kids	1.4	1.3	1.3	1.2	1.2
Age at first marriage	21.4	21.3	21.0	22.2	20.9
Marriage duration (if married)	7.5	7.4	7.9	7.0	7.9
Characteristics of the family where grew up)				
Number of siblings	1.8	1.9	1.7	2.1	1.5
Dad at home	0.92	0.88	0.93	0.90	0.96
Relationship with mom (good or					
excellent)	0.69	0.63	0.75	0.64	0.86
Grew up in a poor family	0.21	0.18	0.28	0.26	0.29
Parents harmed (sometimes or often)	0.41	0.22	0.10	0.26	0.10
Religion is important when growing up	0.32	0.37	0.63	0.63	0.52
# of observations	3090	355	1596	3397	1717

Notes: We present descriptive statistics in our sample separately for the Czech republic, East Germany, Hungary, Slovenia and Bulgaria before the maternity benefit program (from 1979 to 1981). The sample includes all women who were ages 18 to 33. Source: SHARE.

Table C5. Effect of Maternity Benefits on Childbearing

		· ·	
	(1)	(2)	(3)
	All	Eligible	Ineligible
1980*Soviet	0.00467	0.00851	-0.0300
	[0.0114]	[0.0133]	[0.0500]
1981*Soviet	0.00874	0.0109	-0.0286
	[0.0103]	[0.0108]	[0.0474]
1982*Soviet	0.00213	0.00152	0.00939
	[0.0134]	[0.0141]	[0.0550]
1983*Soviet	0.0378	0.0443	-0.0650
	[0.0143]**	[0.0144]***	[0.0511]
1984*Soviet	0.0180	0.0213	-0.0481
	[0.0163]	[0.0163]	[0.0493]
1985*Soviet	0.0417	0.0474	-0.0546
	[0.0173]**	[0.0179]**	[0.0454]
# Observations	37,638	34,604	2,950
# People	7058	6780	1069
Dep var mean	0.120	0.119	0.128

Notes: These are coefficients from Figure 1 in the paper and correspond to equation (1). Column (1) includes all women ages 18 to 33 from years 1979 to 1985 in our sample of Baltic and East European countries; column (2) restricts the sample in column (1) to eligible women, column (3) restricts the sample in column (1) to ineligible women. We present the difference in the probability of having a child among women (ages 18 to 33) living in the Baltic republics relative to in East European countries in each year relative to the difference in 1979. The dependent variable equals to one if a woman gave birth in the year of observation and equals zero otherwise. The estimates are from our baseline specification in equation (1) and presented as model (5) in table 3, which include the following covariates: year fixed effects, country by previous number of kids by urban fixed effects, marital status, birth year, and years of education fixed effects, dummies for the number of children ages 0 to 5, 6 to 12, and 13 to 17, number of siblings fixed effects, whether had a parent absent, whether lived with a grandparent, the importance of religion while growing up, childhood SES fixed effects, whether the relationship with the mother was good, and whether harmed by any parent; annual country-level real GDP per capita in 2023€11 US\$, production of electro energy (milliards kilowatt-hours), and the number of children level. Sources: SHARE, World Inequality Database, Goskomstat SSSR and CMEA.

Table C6. Robustness of Effect of Maternity Benefits on Fertility: Omit One Comparison Country at a Time

	(1)	(2)	(3)	(4)	(5)
	No Bulgaria	No Chech Rep.	No E. Germany	No Hungary	No Slovenia
			1. All		
After program	0.0302	0.0328	0.0278	0.0299	0.0242
	[0.00837]***	[0.0124]**	[0.00796]***	[0.00820]***	[0.00823]***
# Observations	34,027	31,674	36,985	34,668	30,660
# Women	6361	6361	6361	6361	6361
Dep var mean	0.120	0.120	0.120	0.120	0.120
			2. Eligible		
After program	0.0346	0.0371	0.0326	0.0342	0.0277
	[0.00890]***	[0.0129]***	[0.00860]***	[0.00872]***	[0.00894]***
# Observations	31,489	29,064	34,010	31,861	28,329
# Women	6122	5668	6626	6263	5622
Dep var mean	0.119	0.119	0.119	0.119	0.119
			3. Not Eligible		
After program	-0.0572	-0.0532	-0.0436	-0.0451	-0.0485
	[0.0337]*	[0.0574]	[0.0317]	[0.0324]	[0.0350]
# Observations	2,453	2,525	2,975	2,722	2,246
# Women	896	904	1066	996	840
Dep var mean	0.129	0.129	0.129	0.129	0.129

Notes: The estimates are from our baseline specification in equation (1) and presented as model (5) in table 3, which include the following covariates: year fixed effects, country by previous number of kids by urban fixed effects, marital status, birth year, and years of education fixed effects, dummies for the number of children ages 0 to 5, 6 to 12, and 13 to 17, number of siblings fixed effects, whether had a parent absent, whether lived with a grandparent, the importance of religion while growing up, childhood SES fixed effects, whether the relationship with the mother was good, and whether harmed by any parent; annual country-level real GDP per capita in 2023€11 US\$, production of electro energy (milliards kilowatt-hours), and the number of doctors per 10,000 people. Standard errors are clustered at the country by urbanicity by previous number of children level. Panel 1 includes all women ages 18 to 33 from years 1979 to 1985 in our sample of Baltic and East European countries; panel 2 restricts the sample in panel 1 to eligible women, panel 3 restricts the sample in panel 1 to ineligible women. Each column represents a regression without one comparison country.

Table C7. Effect of Maternity Benefits on Childbearing: by Childhood Importance of Religion

	(1)	(2)	
	Religion Was Important when		
	Grov	ving up	
	No	Yes	
1980*Soviet	0.00509	0.00555	
	[0.0159]	[0.0189]	
1981*Soviet	0.00124	0.0155	
	[0.0152]	[0.0153]	
1982*Soviet	0.00233	0.00222	
	[0.0171]	[0.0238]	
1983*Soviet	0.0113	0.0819	
	[0.0199]	[0.0214]***	
1984*Soviet	-0.00696	0.0469	
	[0.0221]	[0.0268]*	
1985*Soviet	0.0228	0.0574	
	[0.0240]	[0.0278]**	
# Observations	21,880	15,758	
# People	4104	2954	
Dep var mean	0.118	0.124	

Notes: These are coefficient estimates to equation (1) on two separate samples: women who grew up in families where religion was important and women who did not. Estimates correspond to figure 2. Column 1 restricts the sample to women who grew up in households where religion was not important, and column 2 restricts the sample to women who grew up in households where religion was not important. The sample consists of all women ages 18 to 33 in the period from 1979 to 1985. We present the difference in the probability of having a child among all women (ages 18 to 33) living in the Baltic republics relative to in East European countries in each year relative to the difference in 1979. The dependent variable equals to one if a woman gave birth in the year of observation and equals zero otherwise. The estimates are from our baseline specification in equation (1) and presented as model (5) in table 3. Standard errors are clustered at the country by urbanicity by previous number of children level. Sources: SHARE, World Inequality Database, Goskomstat SSSR and CMEA.

Table C8. Robustness of Effect of Maternity Benefits by Importance of Religion: Omit One Comparison Country at a Time

	\	Comparison Co	on Country at a Time			
	(1)	(2)	(3)	(4)		
	A. No Bulgaria		B. No Czech Rep.			
	_	when Growing up when		on is Important a Growing up Yes		
After program	0.00699	0.0603	0.0209	0.0486		
	[0.0122]	[0.0133]***	[0.0195]	[0.0163]***		
pval of Yes-No	0.0)123	0.	298		
# Observations	19976	13800	17592	13845		
# Women	3745	2571	3302	2582		
Dep var mean	0.118	0.124	0.118	0.124		
	C. No East Germany		D. No Hungary			
	Religion is Important when Growing up No Yes		Religion is Important when Growing up No Yes			
After program	0.00566	0.0569	0.00687	0.0592		
1 8	[0.0118]	[0.0127]***	[0.0122]	[0.0128]***		
pval of Yes-No		0.0136		0.0124		
# Observations	21282	15449	20663	13800		
# Women	3968	2883	3893	2592		
Dep var mean	0.118	0.124	0.118	0.124		
	E. No	Slovenia				
	_	Religion is Important when Growing up No Yes				
After program	-0.00191	0.0580				

 when Growing up No Yes

 No Yes
 No Yes

 -0.00191 0.0580 [0.0117] [0.0138]***

 pval of Yes-No 0.00617

 # Observations # Women 3633 2140

Dep var mean

0.118

Notes: These are coefficient estimates to equation (1) on two separate samples: women who grew up in families where religion was important and women who did not. The sample consists of all women ages 18 to 33 in the period from 1979 to 1985. The dependent variable equals to one if a woman gave birth in the year of observation and equals zero otherwise. The estimates are from our baseline specification in equation (1) and presented as model (5) in table 3. Standard errors are clustered at the country by urbanicity by previous number of children level. Each column represents a regression without one comparison country.

0.124

Table C9. Effect of Maternity Benefits on Age at Birth for Women who Grew Up in Families where Religion Was Important: by Parity of Child

			•	•
	(1)	(2)	(3)	
	Birth Order			
DV: age at birth	First	Second	Third	
After program	-1.196	0.160	-0.538	
	[0.693]	[0.540]	[1.052]	
# Observations	761	771	216	
Dep var mean	23.34	26.39	28.95	

Notes: These difference in differences coefficients summarize results from equation (1), but the dependent variable is age at birth and the sample consists of women ages 18 to 33 who have given birth between the years of 1979 to 1985 and grew up in families where religion was important. The estimates are from our baseline specification in equation (1) and presented as model (5) in table 3. Standard errors are clustered at the country by urbanicity by previous number of children level. Dashed lines construct 95-percent, pointwise confidence intervals. Sources: SHARE, World Inequality Database, Goskomstat SSSR and CMEA. *p < .10; **p < .05; ***p < .05