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Original Article

Parental Socio-Economic Status and First Union Formation: Can European Variation Be Explained by the Second Demographic Transition Theory?

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Abstract

Previous research has demonstrated that parental socio-economic status (SES) is an important determinant of the timing of entry into a first co-residential union. Whilst the majority of existing studies found that young adults from high-SES families delay their first union compared with those from lower-SES backgrounds, all these studies were conducted within a single country. This study examines the link between parental SES and the timing and type of first union for 25 European countries participating in the European Social Survey Round 3 (2006/2007). Results from two-step meta-analytical models indicate that in almost all countries young adults from advantaged backgrounds delay their entry into a first union. This delaying effect of parental SES is stronger if young adults marry directly than if they enter their first union via unmarried cohabitation. The impact of parental SES is only partly mediated by an individual's own education. The strength of the link between parental SES and union formation varies between countries: the delaying impact of parental SES is weakest in those Northern and Western European countries that are most advanced in the Second Demographic Transition. However, after controlling for individual education, the cross-national variation in the link between parental SES and union formation disappears.

Introduction

Parental socio-economic status (SES) has consistently been found to be an important determinant of the timing of entry into a first co-residential union (either unmarried cohabitation or marriage). Most studies have found that young adults from low-SES families enter their first co-residential union earlier than those from a high-SES background (e.g. Axinn and Thornton, 1992; South, 2001; Wiik, 2009). People who enter a union at an early age face potential negative consequences for their subsequent life course, such as a higher risk of dissolving the union (Berrington and Diamond, 1999). It is important to examine how socio-economic origin influences the timing of first union.

Most studies on the link between parental SES and first-union timing have examined this within a single

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country, but arguments derived from Second Demographic Transition (SDT) theory suggest that the strength of this link could vary across countries. SDT theory posits that demographic changes result from shifts in value orientations in Western countries, from solidarity and conformity to autonomy, self-reliance, and individual freedom (Lesthaeghe and van de Kaa, 1986; Sobotka, 2008; Lesthaeghe, 2010). Due to this process of individualization, socializing institutions, such as the church and family, have lost some of their functions. If this is the case, it can be expected that the influence of parental status on the demographic behaviour of their children is weaker in societies that are more advanced in the SDT (Sobotka, 2008). No cross-country studies have yet examined the link between parental SES and first-union timing. Therefore, the key contribution of this study is to examine *to what extent the effect of parental SES on the timing of first co-residential union varies across European countries and how this cross-national variation can be explained*. We analyse data on 25 European countries from Round 3 of the European Social Survey (ESS) (ESS, 2006). This study improves our understanding of cross-national variation by examining the role of three country-level SDT indicators that might moderate the strength of the link between parental SES and union formation: age norms of leaving the parental home, prevalence of cohabitation, and religiosity.

Most studies on the link between parental SES and union formation analysed the timing of entry into a first marriage (e.g. Michael and Tuma, 1985; Blossfeld and Huinink, 1991; Axinn and Thornton, 1992), while more recent studies considered both first marriage and first cohabitation (Hoem and Kostova, 2008; Wiik, 2009; Cavanagh, 2011). In many countries that are advanced in the SDT, cohabitation has replaced marriage as the dominant manner of entering a union, which makes it important to analyse both union types (Kiernan, 2001). Moreover, it is possible that parental SES has a different impact on these two union types. Because cohabitation is often a more informal living arrangement with lower costs of entering and exiting than marriage, parents may be less inclined to influence the timing of entry into cohabitation than into marriage (Wiik, 2009). If so, one could expect a stronger effect of parental SES on entry into a first co-residential union if this union is a marriage than if it is a cohabitation. Thus, we also examine how parental status is related to entry into cohabitation versus marriage as first union, and how this relationship varies across countries.

Moreover, in understanding the link between parental SES and first-union timing, it is also important to know the extent to which this link is mediated by young adults' own educational attainment and enrolment. Higher-SES parents tend to invest more in their children's educational career than lower-SES parents, and extended education is known to delay entry into a union (Blossfeld and Huinink, 1991; Liefbroer and Corijn, 1999).

Theoretical Background

Link between Parental Status and Union Formation

Several explanations have been proposed for why high parental SES delays the timing of first union. The most prominent explanation focuses on the role of parents in the process of educational attainment. Higher-SES parents are likely to have higher educational aspirations for their children than lower-SES parents and to emphasize more strongly the importance of the completion of education in order to avoid downward social mobility (Goldthorpe, 1996). As a result of their parents' aspirations, children from advantaged backgrounds are often socialized and motivated to invest more in their educational career than children from disadvantaged backgrounds, which often means discouraging romantic unions at young ages (Axinn and Thornton, 1992; South, 2001; Sassler, Addo, and Hartmann, 2010). Moreover, being enrolled as a student delays the timing of first union (Blossfeld and Huinink, 1991; Wiik, 2009).

However, multiple studies have found that an effect of parental status remains after controlling for an individual's own education (Sweeney, 2002; Hoem and Kostova, 2008; Cavanagh, 2011). Thus, in addition to individual education, other explanations have been suggested. According to socialization theory, children's preferences are influenced by those of their parents. Since the choice of a partner is one of the most serious decisions young adults face, parents may wish to have a say in this process. Higher-SES parents expect their children to experience entry into a union and entry into a marriage at a later age than lower-SES parents (Keijer, Nagel, and Liefbroer, 2016), and may try to persuade their children to avoid early union formation because this can have long-lasting consequences for their further life course (Axinn and Thornton, 1992; Wiik, 2009; Sassler et al., 2010). Moreover, young adults from advantaged backgrounds may have higher standards regarding their future partner than those from disadvantaged backgrounds because they wish to retain the SES of their family (Oppenheimer, 1988; Wiik, 2009). If young adults enter a union before the completion of their education and the start of their career, they will

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choose a partner without knowing his or her socio-economic prospects, and therefore, they may be advised to wait for a potentially better match (Oppenheimer, 1988; Wiik, 2009). Finally, young adults who grow up in well-off families may develop higher consumption aspirations, and may wish to form a new household as wealthy as their household of origin. These high aspirations could cause them to delay union formation (e.g. Easterlin, 1980; Blossfeld and Huinink, 1991; Coppola, 2004) until their standard of living conforms to these aspirations. Thus overall we expect *that young adults from advantaged backgrounds enter their first union later than those from less advantaged backgrounds (H1)*. We will test this for the total and net effect of parental SES (controlled for an individual's own education).

Cohabitation versus Marriage

Unmarried cohabitation is increasingly replacing marriage as most popular first union type throughout Europe, although its prevalence varies across countries (Kiernan, 2001). This popularity complicates the analysis of the link between parental SES and union formation because cohabitation can serve both as an alternative to marriage, and as a temporary phase before marriage (Hiekel, Liefbroer, and Poortman, 2014). Previous research has shown differences between marital and cohabiting unions with regard to relationship quality, commitment, well-being, and union stability (e.g. Berrington and Diamond, 1999; Liefbroer and Corijn, 1999; Hansen, Moum and Shapiro, 2007; Soons and Kalmijn, 2009). Therefore, it seems important to distinguish between marriage and cohabitation as alternative pathways into a first union.

Parental SES may be differently related to these two union types. Given that marriage is less easily reversible than cohabitation, parents have a higher stake in the timing of their offspring's marriage than in the timing of their cohabitation (Wiik, 2009). This may be particularly true if they perceive cohabitation to be temporary. Additionally, SDT theory maintains that the rise of cohabitation is a result of cultural trends towards self-fulfilment, individualization, and the rejection of tradition (Lesthaeghe, 2010), which could mean that cohabiters are less influenced by parental status than those marrying directly (Wiik, 2009). Moreover, cohabiters are more likely to be attracted to an alternative partner because they are generally less committed to their relationship than married people, and the costs of exiting are often lower than those of exiting marriage (Hansen et al., 2007). Thus although young adults from advantaged backgrounds may have higher aspirations with regard to their future partner, resulting in delayed entry into a union as argued above (Oppenheimer, 1988), they may be more inclined to postpone first marriage than cohabitation (Wiik, 2009). Given the high costs of marriage, parental financial support may also be more important when making the decision to marry than to cohabit. Based on these arguments, we expect *that the association between parental status and the timing of first union is stronger for direct marriage than unmarried cohabitation (H2)*.

Cross-National Variation Explained by SDT

Most studies have examined the impact of parental status on first-union timing within a single country, such as the United States (e.g. Michael and Tuma, 1985; South, 2001; Cavanagh, 2011), Germany (Blossfeld and Huinink, 1991), Norway (Wiik, 2009), Sweden (Bernhardt and Hoem, 1985), France (Winkler-Dworak and Toulemon, 2007), Bulgaria (Hoem and Kostova, 2008), and the Netherlands (Mooyaart and Liefbroer, 2016).[1] Only Mulder, Clark, and Wagner (2006) compared multiple countries: the United States, the Netherlands, and West Germany. They found that the father's education and income mattered less in the Netherlands and West Germany than in the United States.

SDT theory offers an explanation for cross-national variation in the effect of parental SES on union timing. According to SDT theory, there is a relationship between two societal trends: changes in attitudes and changes in demographic behaviour. Major demographic trends across Europe (e.g. decline in marriage rate, growth of cohabitation, and postponement of union formation) are the result of changes in values and attitudes (Lesthaeghe and van de Kaa, 1986; Lesthaeghe, 2010; Lappegård, Klüsener, and Vignoli, 2014). Important socializing institutions, such as the church and family, have lost much of their grip on members (Sobotka, 2008; Lesthaeghe, 2010). Processes of individualization and secularization mean that individuals have more freedom of choice and attach greater importance to self-fulfilment and autonomy (Lesthaeghe, 2010). Due to this focus on autonomy, young adults may have become less responsive to their parents' preferences and less dependent on their parents' resources. It can therefore be expected that the impact of parental status on their offspring's demographic behaviour is weaker in more secularized and individualized societies.

Because of differences in the onset and speed of diffusion of these demographic and value-related changes (Sobotka, 2008; Lappegård et al., 2014), countries vary

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in the extent to which SDT-related values and behaviours have been adopted at a given point in time. Earlier research suggests that Northern European countries are the most advanced countries in terms of SDT (e.g. high cohabitation and divorce rates and high level of individualistic values), followed by Western, Central and Eastern, and Southern Europe (Sobotka, 2008; Lesthaeghe, 2010). Inglehart (2006) confirms this pattern with regard to the level of individualization across countries. Therefore, we expect *a weaker link between parental SES and timing of union formation in countries where the SDT is more advanced (H3).*

Data and Method

Data

We use data from Round 3 of the ESS, conducted in 2006/2007 (ESS, 2006). Round 3 is the only round in which respondents are specifically asked about the timing of their first union. The ESS aims to be representative of residential populations aged more than or equal to 15 years, regardless of nationality, legal status, or citizenship. In total, 25 countries participated in Round 3 (initial $N = 47{,}099$). Our analytical sample consists of 20,495 men and 24,652 women. Of the respondents, 4 per cent were dropped due to missing values of one or more variables.

Dependent Variable

Respondents were asked 'Have you ever lived with a spouse or partner for three months or more?' and if so 'In what year did you first live with a spouse or partner for three months or more?' Based on this information, age of entry into a first co-residential union (either marriage or cohabitation) in years was calculated. Discrete-time event-history analysis was used to estimate the rate of entry into a first union, after the data had been transformed into a person-period file (Allison, 1984), with separate records for each year that respondents were at risk since age 15. We restrict our analysis to ages 15 to 35[2] because entry into a first union after age 35 is rare (Billari and Liefbroer, 2010). Respondents who did not enter their first union before age 35 or had not done so at the time of the interview were right-censored, either at age 35 or at the time of interview, depending on which occurred first. Overall, 20.1 per cent of the sample (23.7 per cent of men and 17.1 per cent of women) had not (yet) entered their first union at age 35 or at the time of the interview. The analytical data set consists of 211,307 person-year observations for women and 211,769 person-year observations for men.

To assess which type of union respondents had entered, we identified whether their first union was cohabitation or marriage. If the year of the first co-residential union was the same as the year of the first marriage, respondents were classified as having married directly, and if the year of the first co-residential union was earlier than the year of the first marriage, or if respondents did not marry, they were classified as having cohabited. Because we only have annual information, the percentage of people who married directly is slightly overestimated because people may have first cohabited and then married later in the same year.

Independent Variables

To measure *parental SES*, four indicators of the educational and occupational levels of parents were combined. Detailed country-specific information was available in the ESS on the highest level of educational attainment for both parents. This information was converted into the International Standard Level of Education (ISLED), a recently developed comparative measure of educational level (Schröder and Ganzeboom, 2014). Its advantage over the International Standard Classification of Education (ISCED) is that the ISLED is more fine-grained, is sensitive to differences in educational systems between countries, and allows for continuous scaling. Likewise, father's and mother's occupation when the respondent was 14 years old are measured in the International Standard Classification of Occupation (ISCO-88), and converted into the International Socio-Economic Index of occupational status (ISEI) (Ganzeboom and Treiman, 1996). A principal component analysis indicated that the four indicators of educational and occupational status of the parents can be summarized into a single index with high reliability (Cronbach's $\alpha = 0.85$ for all countries pooled). The index was constructed after standardizing and averaging the four indicators. An average score was calculated jointly for both parents because we are interested in the overall effect of parents' SES rather than to what extent fathers or mothers are more influential. This parental SES index was again standardized to a Z-metric (mean = 0, SD = 1) within countries, so that the effects of this variable in all countries refer to a unit SD.

Detailed country-specific information on the *highest level of education completed* was also available for respondents and converted into ISLED. We constructed a time-varying variable for respondents' level of education based on the number of years of schooling respondents

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could have completed (either full-time or part-time and including compulsory years of schooling) at a given age. From age 15 onwards, the ISLED score of respondents increased linearly with age until reaching its maximum value at the age at which respondents completed their highest educational level. This time-varying measure of education was also expressed in a Z-standardized metric within countries.

To examine how being in education affects first-union timing, a time-varying binary variable *educational enrolment* was constructed, indicating whether respondents were enrolled in the educational system (1) or not (0) at a given age. This variable was also based on the numbers of years of schooling respondents had completed.

The time-varying variable *age* was constructed as the number of years since age 15. The *birth year* of respondents was used to construct a continuous variable (ranging between 1905 and 1992). Descriptive information on all independent variables can be found in Table 1.

Country-Level Indicators

We used three country-level indicators to measure the relative position of European countries in SDT development. All indicators were aggregated from ESS Round 3 data. The first indicator is an attitudinal one and uses information on the age-norm of leaving the parental home to reflect attitudes within a country regarding how independent young adults are from their parents. Respondents were asked 'After what age are people generally too old to still be living with their parents?'; we used the percentage of people in a country who said that the age deadline for leaving the parental home should be equal to or greater than 30 years[3] (Aassve, Arpino, and Billari, 2013) as an indicator of how independent young adults are in a given country. Another SDT indicator focuses on the rise of cohabitation, thus reflecting a behavioural rather than an attitudinal dimension. For each country we calculated the percentage of respondents who cohabited as their first union. The higher this percentage, the more individualized the population in a country were expected to be. The third country-level indicator focuses on the process of secularization using the question 'How religious are you on a scale from 0 (not at all religious) to 10 (very religious)?'. We calculated the overall mean for each country. Means of all three SDT indicators are listed in Table 1.[4]

Analytical Strategy

Discrete-time logistic regression models were estimated for each country separately to obtain the country-specific estimate and standard error (SE) of the total and net effect of parental SES on the timing of young adults' first co-residential union. Multinomial logistic regressions were used to obtain country-specific estimates and SEs of the competing-risk effects of parental status on cohabitation or marriage as first union. In all these models, we included age and birth year as controls. For age the quadratic and cubic terms, and for birth year, the quadratic term were also included to account for well-known non-linearities in the relationship between age, birth year, and entry into first union. Next, respondents' educational level and enrolment were included in the models of first union and in the competing-risk models of cohabitation and marriage, to assess the extent to which the impact of parental SES was mediated by respondents' education. All these models were separately estimated for men and women, given that women generally enter their first union at an earlier age than men (Coppola, 2004; Uecker and Stokes, 2008).[5]

A two-step meta-analytic approach suggested by Bryan and Jenkins (2016) was used to analyse (i) whether there exists a link between parental SES and the timing of first union, (ii) whether there is cross-national variation in the link between parental SES and first-union timing, and (iii) whether this variation can be explained by our country-level indicators. We used this approach rather than a multilevel analysis because of the small number of countries ($N < 30$). The SE of country-level effects is underestimated if the number of countries is small, resulting in too many incorrect rejections of a true null hypothesis (Bryan and Jenkins, 2016). The two-step approach offers a more conservative test of our hypotheses.

In the first step, a meta-analysis is performed, in which all country-specific estimates and SEs of the logistic models are included, to test whether there is a link between parental SES and union formation and whether these effects of parental SES vary across countries. The meta-analysis provides a measure for between-country heterogeneity (I^2), which is the percentage of observed total variation across countries that is due to real heterogeneity rather than chance, lying between 0 and 100 per cent. I^2 is calculated as 100 per cent $*(Q-df)/Q$, where Q is Cochran's heterogeneity statistic and df is the degrees of freedom (Harris *et al.*, 2008). If I^2 is above 50 per cent, substantial heterogeneity across countries exists (Higgins *et al.*, 2003). Meta-analyses are performed for the effect of parental SES on the timing of first union, and for cohabitation and marriage separately. Both the total and net effect of parental status (controlling for respondents' education) are examined. To present the country-level effects, we grouped

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Table 1. Descriptive statistics for the dependent and main independent variables at the individual and country level

	Median age first union for women	Median age first union for men	Average parental ISLED (0–100)	Average parental ISEI (16–90)	Average ISLED respondent (0–100)	Proportion of adults who approve of leaving home >30 years	Proportion of adults who cohabit as first union	Average level of religiosity (0–10)
North								
Denmark	21.3	23.7	46.27	39.32	56.89	0.27	0.66	4.29
Finland	21.9	23.8	35.09	36.96	51.63	0.47	0.55	5.30
Norway	22.1	23.8	48.50	41.43	56.19	0.42	0.58	3.81
Sweden	21.7	23.8	38.29	40.09	51.74	0.45	0.72	3.55
West								
Austria	22.1	24.0	33.75	41.49	51.69	0.73	0.55	5.10
Belgium	22.4	24.2	39.87	42.27	50.34	0.67	0.31	4.92
France	21.7	24.3	35.24	39.82	50.24	0.53	0.50	3.70
Germany	22.3	24.6	43.43	39.17	52.54	0.55	0.46	3.86
Ireland	25.0	27.5	34.27	37.47	55.45	0.75	0.33	5.41
The Netherlands	22.8	25.2	36.18	41.80	53.85	0.56	0.44	4.89
Switzerland	23.2	25.3	44.18	41.80	46.38	0.53	0.50	5.50
The United Kingdom	22.3	24.3	42.20	41.64	54.56	0.68	0.38	4.08
East								
Bulgaria	20.7	23.8	39.06	34.04	45.15	0.82	0.14	4.31
Estonia	22.3	23.6	43.95	38.03	50.21	0.69	0.34	3.58
Hungary	20.9	24.1	35.28	34.07	46.79	0.84	0.21	4.41
Latvia	22.3	23.4	48.43	39.48	47.13	0.82	0.36	3.80
Poland	22.2	25.1	33.46	33.19	47.50	0.75	0.14	6.48
Romania	21.2	24.3	30.29	33.01	44.00	0.84	0.13	6.79
Russia	21.8	23.3	45.07	40.50	49.57	0.49	0.16	4.20
Slovakia	21.7	24.4	45.21	36.96	49.59	0.82	0.16	5.90
Slovenia	22.6	25.3	34.34	37.99	47.52	0.80	0.34	4.69
Ukraine	21.2	23.4	41.40	35.92	47.07	0.50	0.14	5.30
South								
Cyprus	22.2	24.8	29.20	33.46	46.32	0.87	0.26	7.02
Portugal	22.5	24.8	12.71	29.55	23.85	0.88	0.12	5.79
Spain	24.7	26.8	26.43	35.12	43.56	0.79	0.22	4.58

the 25 countries geographically into Northern, Western, Southern, and Central and Eastern Europe.

Secondly, if significant heterogeneity between countries was observed, a meta-regression was performed in which these country-specific effects of parental SES are regressed on the country-level indicators (Harbord and Higgins, 2008). All models were fitted in STATA 14, using the `metan` command for meta-analyses and the `metareg` command for meta-regressions. The sample size is the number of countries. Countries with more respondents have more influence on the relationship because countries are inversely weighted to the precision of their effect estimate as indicated by their SE.

Results

Descriptive Results

Table 1 shows the median age of entering a first union for each country, separately for men and women. Large differences are observed. For example, the median age of entering a first union is 25.0 years for women in Ireland, while it is 20.7 years for women in Bulgaria. This difference in median age of more than 4 years is also observed for men; the highest median age is again for Ireland (27.5 years), while the median age for men in Russia is 23.3 years. Unsurprisingly, women enter their first union approximately 2 years earlier than men in most countries.

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Table 1 also shows large differences between countries with regard to parental SES indicators. Mean educational and occupational levels of parents are lowest in Portugal, and highest in Denmark and Norway. In all countries the average educational level of parents is lower than respondents' educational level.

Finally, Table 1 shows differences between countries with regard to the country-level SDT indicators. Around 80 per cent of respondents in Southern and some Eastern European countries believe that people are not too old to continue to live with their parents when they are more than or equal to 30 years old, but the equivalent figure is less than 50 per cent in Northern Europe. Moreover, the percentage of people cohabiting as their first union is over 50 per cent in most Northern and Western European countries, while in Southern and Eastern Europe the figure is much lower. The average level of religiosity varies similarly between countries, from 3.58 for Sweden to 7.02 for Cyprus, on a scale from 0 to 10. The three SDT indicators are correlated between 0.44 and 0.69 at the country level.

Total Effect of Parental SES

First Union

Figure 1A and B show the results of a meta-analysis in which for each country the total effect of parental SES on the timing of first union is shown for women and men. The dotted line represents the overall effect of parental SES on first-union timing for all European countries. Figure 1A shows an overall negative effect of parental SES on the timing of first union for women ($b = -0.171$, $P < 0.01$). Thus, the higher the SES of parents, the later women enter their first co-residential union. Figure 1A shows that for women a delaying effect of parental SES is observed in all countries, but substantial between-country heterogeneity is also found ($I^2 = 62.8$ per cent, $P < 0.01$). Multiple countries clearly deviate from the overall mean. Moreover, we see a certain order with regard to the regions in the effect of parental SES, with the weakest effect of parental SES for Northern European countries, followed by Western, Southern, and Eastern European countries.

Figure 1B shows that the results for men are somewhat different. Men also experience an overall negative effect of parental SES on the timing of first union ($b = -0.055$, $P < 0.01$), but for about half of the countries the effect of parental SES on first-union timing is insignificant, and for Poland the effect is even positive, which implies that the higher parental SES, the earlier men enter their first union. However, we see the same pattern among European regions as for women, and the between-country heterogeneity is even higher for men than for women ($I^2 = 70.0$ per cent, $P < 0.01$).

Our next step was to analyse whether this cross-national variation can be explained by the country-level SDT-indicators. To do this, meta-regression was applied, and the results for two of the SDT indicators are graphically represented in Figure 2A and B for women (a table with all the regression results for men and women can be found in the Supplementary Appendix). Figure 2A indicates that the higher the percentage of people who cohabit as their first union in a country, the smaller the effect of parental SES on first-union timing for women ($b = 0.178$, $P = 0.018$[6]). If we remove two influential cases with regard to cohabitation rates from the analysis (Denmark and Sweden), the association becomes even stronger ($b = 0.279$, $P = 0.003$). The effect of another SDT indicator (age-norm of leaving home) is also in the expected direction, but is only marginally significant (see Figure 2B, $b = -0.150$, $P = 0.054$). However, if we exclude Denmark as an influential case from the analysis, the association between the age-norm of leaving home and the impact of parental SES becomes significant ($b = -0.198$, $P = 0.031$), so the higher the age-norm in a country, the stronger the impact of parental SES for women. In contrast, the third SDT indicator, the level of religiosity, does not explain the cross-national variation in the total effect of parental SES on first-union timing.

Cohabitation versus Marriage as First Union

Figure 3A and B show the results of the meta-analyses for the two union types. To save space, we present only the results for women (results for men are presented in Supplementary Figures SA1A and B); although the effects are smaller for men, the patterns are the same as for women. Figure 3A and B show that women from advantaged backgrounds delay both cohabitation and marriage compared with women from disadvantaged backgrounds (overall mean for cohabitation $b = -0.069$, $P < 0.01$, and for marriage $b = -0.232$, $P < 0.01$). However, an additional test, in which cohabitation as first union is the reference category, shows that the delaying effect of parental SES is significantly stronger on marriage than on cohabitation ($P < 0.01$). When looking at country-specific effects, Figure 3A on cohabitation shows that the cross-national variation is rather small, but significant for women ($I^2 = 44.3$ per cent, $P = 0.01$), with only Sweden and Bulgaria clearly deviating from the mean. Still, the largest effects of parental SES on cohabitation are found in Northern and Eastern European countries. Figure 3B on marriage as first-union type shows stronger cross-national variation

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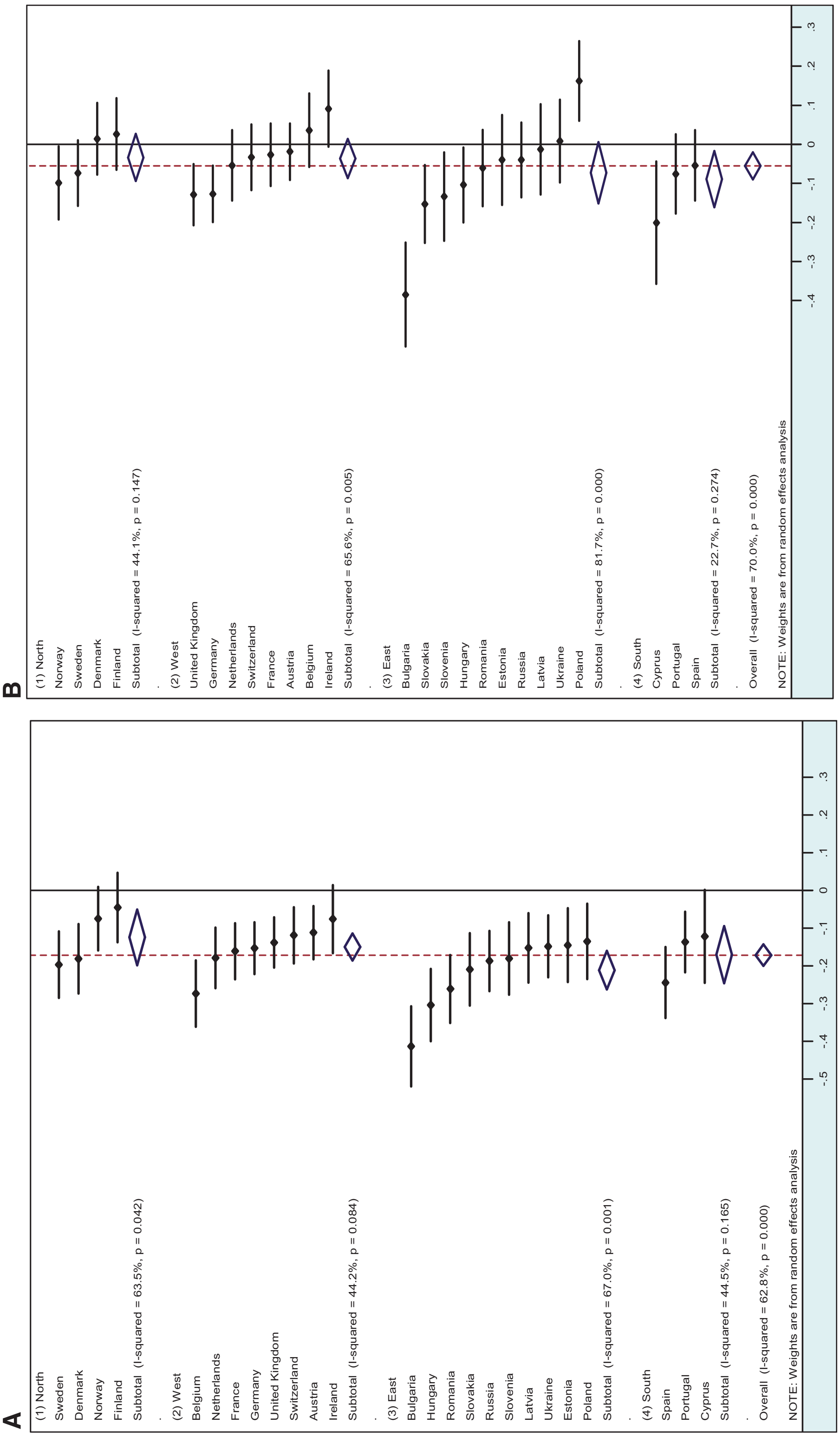

Figure 1. (**A**) Total effect of parental SES on the timing of first union for WOMEN in 25 European countries. Meta-analysis of estimates from discrete-time logistic models. (**B**) Total effect of parental SES on the timing of first union for MEN in 25 European countries. Meta-analysis of estimates from discrete-time logistic models

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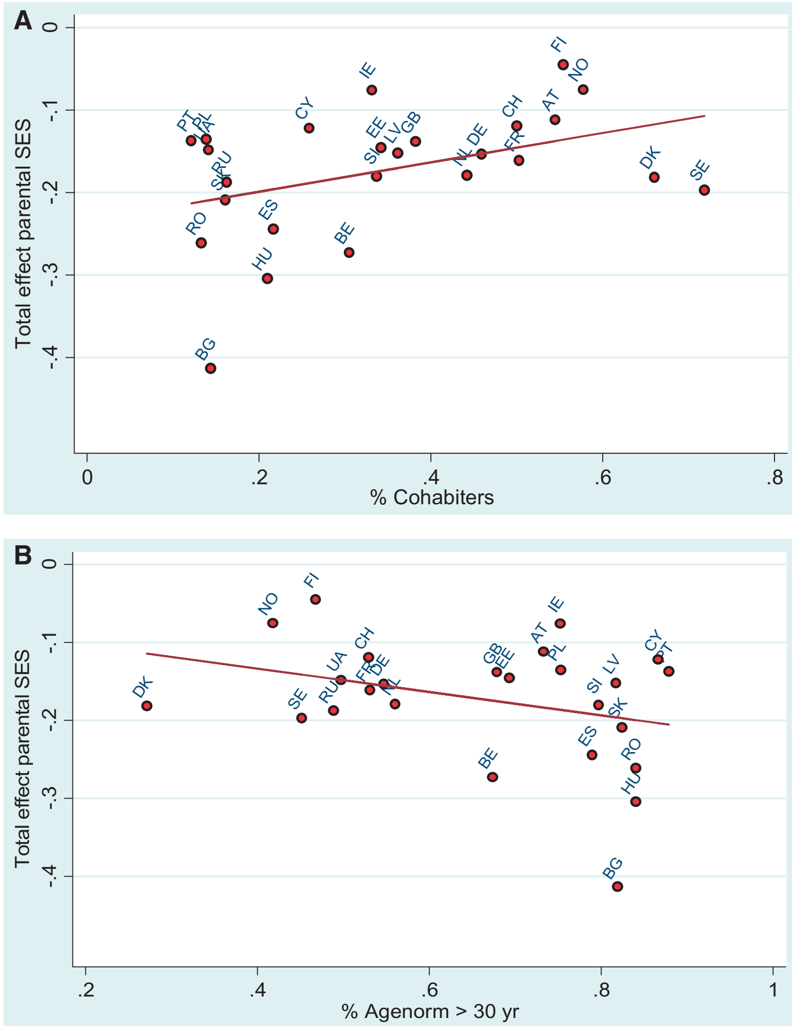

Figure 2. (**A**) Association between the total effect of parental SES on the timing of first union for women and the percentage of men and women in a country who cohabit as their first union (based on results presented in Supplementary Table SA2). (**B**) Association between the total effect of parental SES on the timing of first union for women and the percentage of people in a country saying that it is acceptable to continue to live in the parental home at age 30 or older (based on results presented in Supplementary Table SA2)

($I^2 = 68.6$ per cent, $P < 0.01$), with the weakest effect of parental SES found in Northern Europe and the largest in Western and Eastern Europe.

In the next step, we examined whether this cross-national variation can be explained by the three country-level SDT-indicators, but the results indicate that none of the meta-regression coefficients were significant either for men or for women (see Supplementary Table SA2).

Net Effect of Parental SES after Including Educational Attainment

An important mediator in the link between parental SES and the timing of first union is an individual's own education. Figure 4 shows that for women, a negative net effect of parental SES remains after controlling for an individual's own education ($b = -0.071$, $P < 0.01$). Thus, for women, only part of the effect of parental SES on first-union timing is mediated by respondents' educational level and enrolment. Figure 4 also shows that for women, between-country heterogeneity in the net effect of parental SES on the timing of first union almost disappears after controlling for individuals' own education and enrolment ($I^2 = 12.4$ per cent, ns). Including individuals' own education as a mediator in the model explains the cross-national variation in the link between parental SES and first-union timing.

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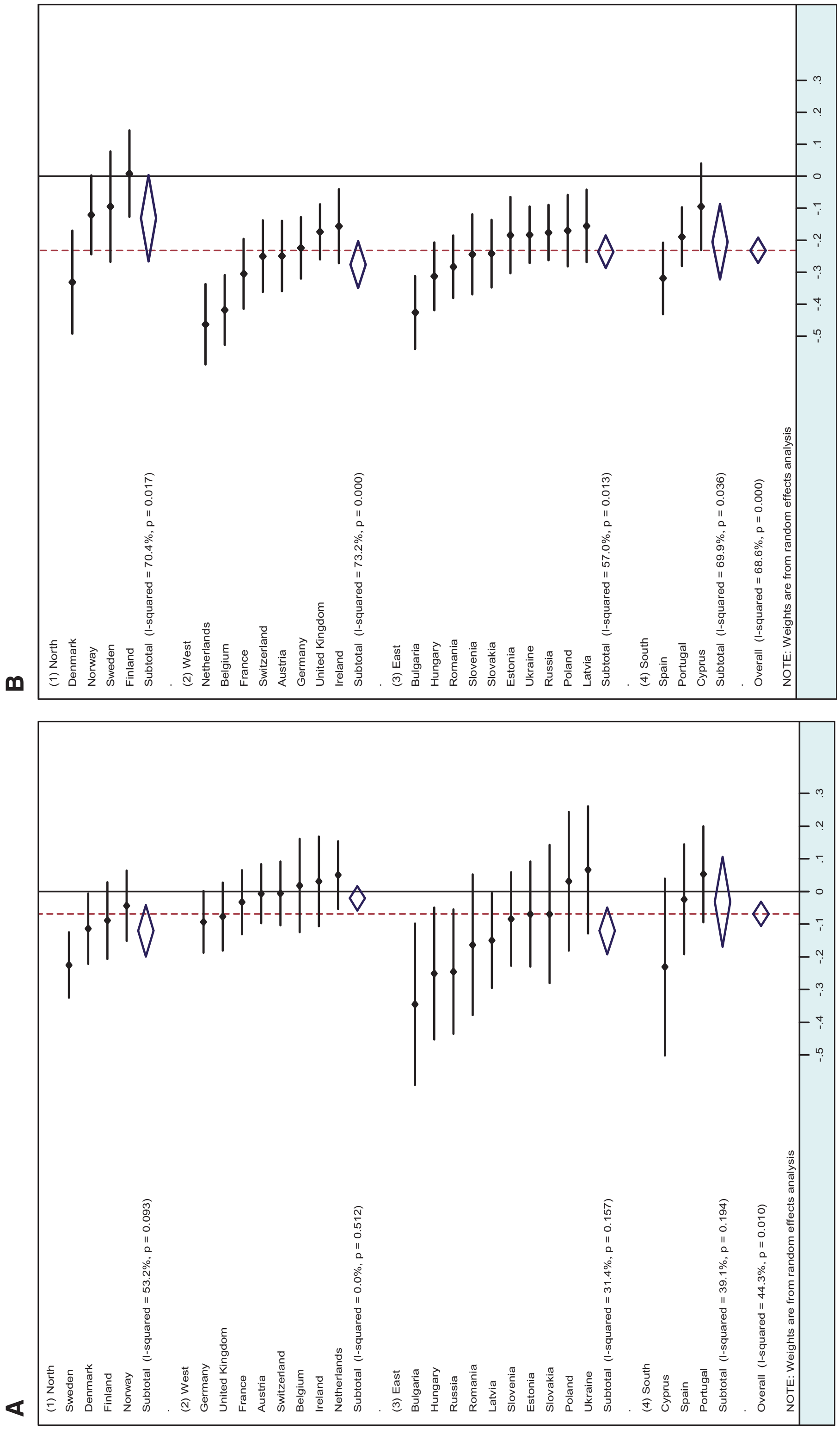

Figure 3. (**A**) Total effect of parental SES on the timing of COHABITATION as first union for women in 25 European countries. Meta-analysis of estimates from discrete-time logistic models. (**B**) Total effect of parental SES on the timing of MARRIAGE as first union for women in 25 European countries. Meta-analysis of estimates from discrete-time logistic models

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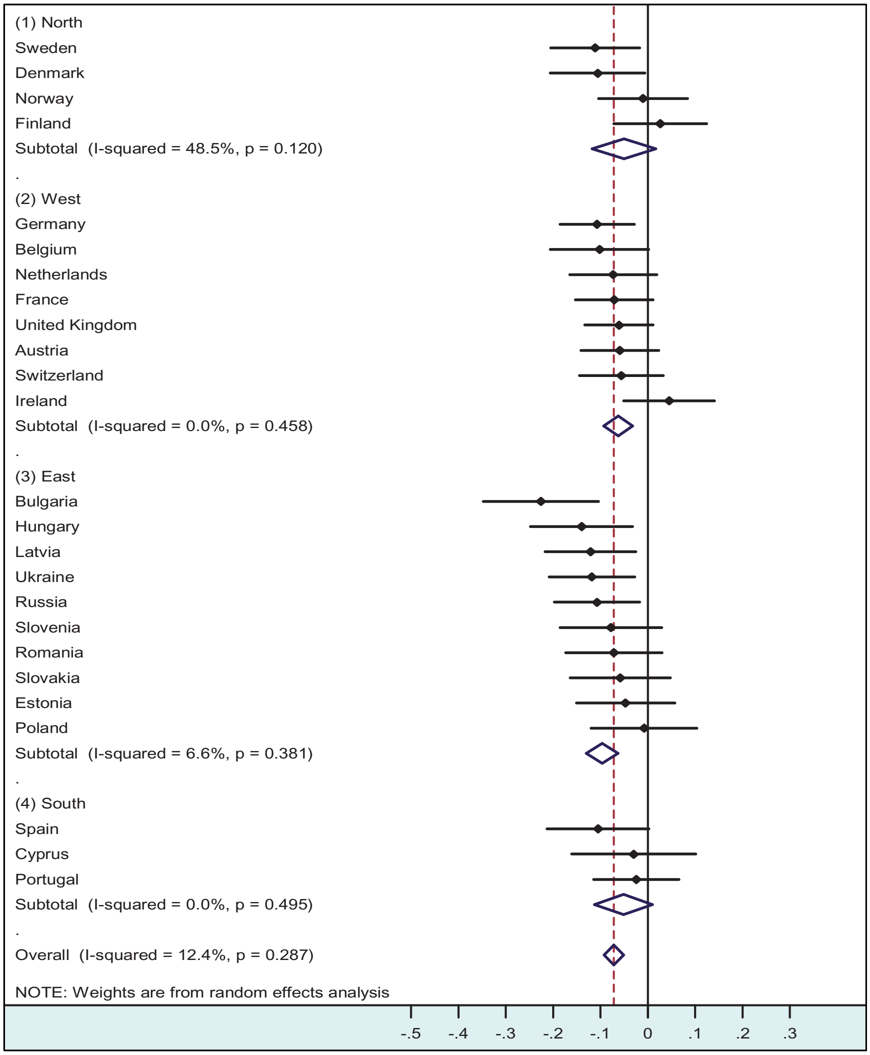

Figure 4. NET effect of parental SES on the timing of first union for women in 25 European countries. Meta-analysis of estimates from discrete-time logistic models

The meta-analyses for the two union types separately show that a net effect of parental SES remains only for women who marry directly; in general, women from high-status families who marry directly delay their union compared with those from lower-status families ($b = -0.109$, $P < 0.01$, Supplementary Figure SA2B). Both models also show that controlling for respondents' education strongly reduces the between-country heterogeneity in the impact of parental SES (see Supplementary Figure A2A and B).

In contrast to women, for men the effect of parental SES becomes insignificant after controlling for the individual's own education (Supplementary Figure SA3A). Moreover, after including individual's own education, the between-country heterogeneity reduces for first union overall, as well as for cohabitation and marriage separately (see Supplementary Figure SA3A–C). While the between-country heterogeneity in the net effect of parental SES is still above 50 per cent for men for first union and cohabitation as first union (see Supplementary Figure SA3A and B), the results of the meta-regressions show that this cross-national variation in the net effect of parental SES cannot be explained by the SDT indicators (see Supplementary Table SA2).

Conclusion and Discussion

In this study we examined the impact of parental SES on the timing of first co-residential unions across Europe.

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Previous country-specific studies have found a link between parental SES and the timing of union formation, but very little is known about cross-national variation with regard to this link, and the causes of any variation that exists. We applied meta-analysis and meta-regression techniques to ESS data to test three hypotheses related to these issues.

Our first hypothesis was that—across Europe—women and men from higher-SES families postpone entry into a first union compared with those from lower-status families. Our analysis confirms this hypothesis. For both women and men, higher parental SES is linked to a later entry into a first union. However, results also show that substantial between-country heterogeneity exists in the total impact of parental SES on first-union formation.

A crucial mediator in the link between parental status and first-union timing is an individual's own education, and this study finds support for the importance of this factor. However, even after controlling for respondents' educational level and enrolment, the analysis still showed a significant, though somewhat smaller, delaying effect of parental SES for women. Interestingly, the net effect of parental SES was homogeneous, implying that this effect is more or less equally strong across the 25 European countries. Potential mechanisms for explaining this net effect are differences between children from higher and lower-SES backgrounds in their partner preferences (Oppenheimer, 1988), or in their family formation attitudes (Wiik, 2009). However, using these data we were not able to test these mechanisms, and these therefore constitute an important area of enquiry for future research. For men, no significant net effect of parental SES was found. An explanation for this gender difference could be that women are more family-oriented than men and therefore more susceptible to family influences (Wiik, 2009).

The second hypothesis of this study was that the impact of parental SES on the timing of a first union is stronger for marriage than for cohabitation. Results confirm that young adults from high-status families mainly delay marriage and that they delay cohabitation to a much lesser extent. This is in line with the idea that marriage is a stronger commitment than cohabitation, implying that parents wish to be more involved in the decision-process with regard to getting married. Between-country heterogeneity in the impact of parental SES is lower for cohabitation than for marriage. Moreover, the delaying effects of parental SES on cohabitation disappear after controlling for individual education, whereas these effects on marriage are somewhat weaker, but remain significant.

Since we observed cross-national variation in the link between parental SES and union formation, we tested our third hypothesis that the strength of the link between parental status and first-union timing is weaker in countries where the SDT is more advanced. Because we only found evidence of between-country heterogeneity in the total effect of parental SES, we restricted our test of this hypothesis to these total effects. We used three country-level SDT indicators and found support for two of them. Both our behavioural and our attitudinal SDT indicators showed the same expected relationship: the higher the percentage of people in a country who cohabit as their first union (behavioural indicator) and the weaker the age-norm of leaving home (attitudinal indicator), the weaker the total impact of parental SES on the timing of first union for women. Thus we conclude that in countries that are more advanced in the SDT, parental SES is less strongly linked to the union formation behaviour of young adults, which supports SDT theory (Sobotka, 2008; Lesthaeghe, 2010). The level of religiosity as SDT-indicator did not explain any cross-national variation in the link between parental SES and union formation. One reason for this could be that it is not the level of religiosity of a country that matters, but whether or not institutional religion is still influential in defining its social norms and values (Dobbelaere, 1995).

Key findings from this study are that cultural differences across countries explain the cross-national variation in the link between parental SES and union formation. Moreover, most of the delaying effect of parental SES is related to the postponement of first union via marriage. The timing of entry into cohabitation seems much less socially stratified. In addition, this study shows that parental SES influences the timing of union formation even after controlling for the intergenerational transmission of educational attainment. Unfortunately, other possible mediators, such as individuals' first employment or parental divorce, were not available in the data, but for future comparative research, it would be interesting to analyse these mediators given that previous studies have shown their importance (South, 2001; Wiik, 2009).

An individual's own education is not only an important mediator in the link between parental SES and first-union timing but country differences in the strength of parents' influence on their offspring's union timing decisions effectively disappear once we control for this mediator. SDT theory already suggests that demographic changes are driven not only by cultural (values) but also by structural factors (such as the rise of higher education) (Lappegård et al., 2014). In parallel to the attitudinal and behavioural changes that constitute the SDT, there has been a mass

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expansion of education worldwide, so it might be expected that the level of educational expansion is related to the SDT development of a given country. More specifically, Lesthaeghe (2010) highlighted change in the educational composition of western populations as a major contributor to the SDT process, but to date this has not been analysed.

In this study we applied a comparative perspective by linking the average effect of parental SES to the average effect of various country-level indicators for several birth cohorts. However, in addition to this cross-national dimension, there could also be a temporal dimension in the effect of parental SES. We tried to include the temporal dimension in this study, but unfortunately this was not possible because there are no contextual variables over time for all 25 countries. Moreover, we analysed whether the impact of parental SES on union formation changed over time, and found that this was not the case. Although the impact of parental status was not found to show much variation within countries across historical time, an important next step would still be to examine how the link between parental SES and union formation varies across both space and time. A major impediment for such an approach is that retrospective information on cultural country-level indicators would be needed, but obtaining such time-varying macro-level information will be difficult.

Supplementary Data

Supplementary data are available at *ESR* online.

Notes

1 See Supplementary Table SA1 for a detailed overview of the design and results of these studies.

2 We also checked whether censoring at 45 years changed the results, but they remained almost identical (see Supplementary Appendix).

3 A cut-off point is used because this variable also had an answer category 'never too old' which was an often-used answer category in some countries. The cut-off point is 30 years because this was the median age.

4 As a robustness check, we analysed the association between the two SDT indexes of Sobotka (2008) and the effect of parental SES on first-union timing for women. The results of these indexes are in line with the results of our country-level indicators (see Supplementary Appendix).

5 No weights are used in this study. Analyses with weights show the same results (see Supplementary Appendix).

6 *P*-values of all meta-regression coefficients are one-tailed.

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