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To cite this article: Mirkka Danielsbacka , Antti O. Tanskanen & Francesco C. Billari (2020): Meeting online and family-related outcomes: evidence from three German cohorts, Journal of Family Studies, DOI: [10.1080/13229400.2020.1835694](https://doi.org/10.1080/13229400.2020.1835694)

To link to this article: <https://doi.org/10.1080/13229400.2020.1835694>



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Published online: 27 Oct 2020.



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Meeting online and family-related outcomes: evidence from three German cohorts

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ABSTRACT

In recent years, the Internet has become an increasingly important venue for meeting partners. While meeting online may have a range of effects on family-related outcomes, studies on the link between meeting online and family-related outcomes are scarce. Using eight follow-up waves of the German Family Panel (Pairfam), with observations from 8177 persons from three birth cohorts between 2009 and 2016, this study investigates whether meeting online is associated with relationship satisfaction, intention to separate, separation, moving in together, intentions to have a child, and entry into parenthood. More specifically, a series of between-person regressions are used to compare those who met their partners offline and those who met their partners online. Results show that meeting online is associated with likelihood to separate and intentions to have a child in the youngest birth cohort, and transition to parenthood in the oldest birth cohort. These findings are discussed with the concepts of selectivity and intentionality in searching for and meeting partners online.

ARTICLE HISTORY

Received 28 October 2019
Accepted 4 October 2020

KEYWORDS

Digitalization; family-related outcomes; Germany; Internet; meeting online

Introduction

As the rise of the Internet has increasingly displaced traditional meeting venues for partners, such as school or the workplace, it may also transform the partnership market and change partnership formation and dissolution (Bellou, 2015; DiMaggio et al., 2001; Rosenfeld, 2017; Rosenfeld & Thomas, 2012). Using data from a 2010 representative survey on the United States, Rosenfeld and Thomas (2012) estimated that more than 20% of heterosexual individuals met their partners online, making the Internet the second most popular venue for meeting a partner (the most popular was meeting through friends). Cacioppo et al. (2013) estimated that more than one-third of marriages in the United States between 2005 and 2012 had had their roots in the Internet. Numbers are less striking in Germany, where approximately 10% of younger adults had met their partners online in 2015–2016 (Danielsbacka et al., 2019).

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In the present study we examine whether meeting a partner online is associated with various family related outcomes, such as relationship satisfaction, intention to separate, actual separation, moving in together, intention to have a child, and entry into parenthood among three German cohorts. We contribute to the online partnering literature first by considering a wider range of family outcomes than in previous studies, and second by analyzing data from Germany, i.e. providing results that are complementary to the literature, which tends to be focused on the United States (with the significant exceptions of Danielsbacka et al., 2019; Potarca, 2017).

Previous studies have implicated that as the diffusion of the Internet decreases the cost of searching for a partner, it may accelerate the transition to marriage (Bellou, 2015). Those who are looking for a potential partner through the Internet might be more ready to start a family than those who meet their partner offline. Thus, meeting online may be associated with a more intentional partner search than meeting offline, meaning that individuals who are ready to start a family may choose the Internet as a site to search for a long-term partner (Rosenfeld, 2017). In line with this idea of ‘intentionality,’ Rosenfeld (2017) has shown that those who meet their partners online, especially those who meet via online dating sites, tend to have a faster transition to marriage compared to those who meet their partners offline. In addition, it has been found that broadband Internet access, in general, is positively related to fertility among highly educated women aged 25 and above (Billari et al., 2017), indicating that partner searches via the Internet could be more common among those who already have intentions to have a child.

People can meet online through a wide range of different platforms, such as chats or discussion forums, social network sites (e.g. Facebook) and increasingly via online dating platforms (Nam, 2017). Meeting through dating sites that try to match couples with similar attitudes and life goals might lead to more stable unions due to the algorithms of online dating platforms (Finkel et al., 2012; Hitsch et al., 2010; Schwartz, 2013). Because similarity in life goals, values, and personality tend to be associated with relationship satisfaction and stability (Becker, 2013), couples who met online (via dating sites) may therefore experience lower union dissolution rates with respect to those who met offline, and similarly, relationship satisfaction may be higher for couples who met online (Cacioppo et al., 2013; but see Paul, 2014). By contrast, one could foresee that the availability of a wide market for marriage and marriage-like relationships via dating sites could potentially postpone partnership formation – the consumer idea of ‘choice overload’ applied to marriage implies later and lower-quality relationships (Yang & Chiou, 2010). The two effects might also balance out. For instance, Rosenfeld and Thomas (2012) found no difference in relationship quality between those who met online and offline.

Characteristics of individuals who look for partners online might also play an important role in family-related effects of meeting online. Previous studies have shown that some groups are more likely than others to use social networking and online dating sites (e.g. Blackhart et al., 2014; Hall et al., 2010; Nam, 2017; Sautter et al., 2010) and consequently meet a future spouse online (e.g. Cacioppo et al., 2013; Danielsbacka et al., 2019; Rosenfeld & Thomas, 2012). For instance, selectivity may appear in the way that searching a partner online may help individuals for whom finding a partner was more challenging in the pre-Internet world (Rosenfeld & Thomas, 2012).

Selectivity may also concern the personal characteristics of individuals who use online versus offline venues to find a partner (on similar selectivity issues see also: Perelli-Harris & Styruc, 2018). Regarding personality and dispositional factors, the literature has shown that it is typically more extroverted people and those who are more open to experiences that are more likely to look for a partner online (Correa et al., 2010; Ross et al., 2009; Zywicka & Danowski, 2008), although opposite results (Orr et al., 2009) and null results (Blackhart et al., 2014) have been also detected concerning the association between personality traits and looking for a partner online. However, one must bear in mind that searching for a partner via the Internet may not necessarily lead to relationship formation. Thus, those who search for partners via the Internet may be of a different group than those who actually end up in long-term relationships with partners they met online. In line with this assumption, a German study found that less extrovert personalities were associated with an increased likelihood to meet partners online (Danielsbacka et al., 2019). In addition, the German study found that older age and higher number of previous partners were associated with increased likelihood to meet a partner online.

In addition, people who use online venues to look for a partner may form a heterogeneous sample according to their goals for their partner search (Menkin et al., 2015). Individuals who are looking for a short-term partner and individuals who are looking for a long-term relationship may have different characteristics (Paul, 2014). In the present study, our main interest is in those who found long-term partners via the Internet.

Based on previous literature, we may expect that meeting a partner online as compared to meeting a partner offline could have certain family-related outcomes, although they are not necessarily univocal, nor apply similarly to all birth cohorts. First, the idea that meeting via the Internet may (especially if a couple meets via a dating site) mean that couples share similar beliefs and goals led us to predict that those who met online have more stable relationships and better relationship satisfaction than those who met offline. However, it is not clear that meeting online, even via dating sites, is related to better relationship quality because ‘choice overload,’ for instance, may postpone the decision to cohabit, and lower relationship quality. Second, based on the idea that meeting online may be selective, such that the individuals who form relationships via the Internet are more likely to start a family than others, we may predict a faster transition to different family-related outcomes (e.g. cohabitation or parenthood) for those who meet online as compared to those who meet offline. Third, selection can also be based on birth cohort, meaning that finding a long-term partner is more urgent for older single people for whom the Internet may be their last chance to find a partner, whereas for younger birth cohorts dating online may be a more common way to find a partner. Thus, people of different birth cohorts with different relationship goals may use online venues in different ways to form relationships (Stephure et al., 2009).

The present study. This study investigates the following six questions by making comparisons between three birth cohorts: (Q1) whether individuals who met their partners online have better relationship satisfaction than those who met their partners offline; (Q2) whether people who met their partners online have less intention to separate than those who met their partners offline; (Q3) are individuals who met their partners online less likely to separate than those who met their partners offline; (Q4) are individuals who met their partners online more likely to move in together than those met their

partners offline; (Q5) are individuals who met their partners online more likely to have intentions to have a child than those who met their partners offline; and (Q6) are people who met their partners online more likely experience a transition to parenthood than those who met their partners offline?

Data and methods

We use eight waves from the Panel Analysis of Intimate Relationships and Family Dynamics (Pairfam) data, which provides longitudinal data on three German birth cohorts born in 1971–1973, 1981–1983, and 1991–1993 (Brüderl et al., 2017; Huinink et al., 2011). The first Pairfam wave was conducted in 2008–2009, when the cohort members were aged approximately 15–17, 25–27, and 35–37 respectively. The sampling scheme is representative of German-speaking persons (regardless of nationality) living in private households in Germany. Further data collections were conducted annually. The Pairfam data samples vary between 12,402 respondents in the first wave and 5461 respondents in the eighth wave. We include in our analyses only heterosexual respondents who had a partner in the first wave, or who met a partner during waves two to eight, and who have data on all variables studied here. These restrictions result in a sample of 37,616 observations from 8177 persons.

Our main explanatory variable indicates whether a respondent met a partner online or offline. In the Pairfam, a partner is defined as someone with whom the respondent has an intimate relationship. Thus, having a partner does not necessarily mean marital spouse, or even cohabiting partner. The respondents who had a partner were asked ‘how did you meet?’ with response options that included ‘through the Internet.’ Offline meeting venues mentioned in the questionnaire included ‘school or training,’ ‘work,’ ‘hobby, club, association, or sports,’ ‘bar, night-club,’ ‘through friends or acquaintances,’ ‘through relatives,’ ‘through a personal ad,’ ‘vacation,’ and ‘other.’ In the first wave of Pairfam, those who reported having a partner were asked to name the venue where they met this partner. In subsequent waves, the question was asked only of those with a new partner. Those participants who met a new partner during waves two to eight could have either been single in the first wave, or their relationship with the first wave partner had ended, and they now had a new partner. For the analyses, we formed a variable that cumulatively accounts for the meeting venue of partners in each of the eight waves studied. We code the variable as 0 if the meeting venue was offline and 1 if the meeting venue was online. Between the first and eighth Pairfam wave the cumulative proportion of participants who met their partners via the Internet rose from 5% to 9%. Among individuals who formed a new relationship between the second and eighth wave, the proportion of those who met online rose from 11% to 21% (Danielsbacka et al., 2019). From wave four onwards, it was possible to separate those who met online via partner-finding services from those who met online via social networks, or chat rooms. Regarding those who met a new partner, in 2011–2012 (wave four), only 3% met via an online partner-finding service, and 7% via online social networks or chat rooms, whereas in 2015–2016 (wave eight), these proportions were 8% and 13% respectively (see Appendix Table A1).

Our main outcome variables relate to perceived relationship satisfaction, assessed in Pairfam through the question; ‘overall, how satisfied are you with your relationship?’ (ranging from 0 = very dissatisfied, to 10 = very satisfied). Intention to separate was assessed

through the question; ‘did you seriously consider a separation or a divorce during the past year?’ (0 = no intention to separate, 1 = intention to separate). Intention to have a first or subsequent child was assessed as follows; ‘do you intend to become a mother/father in the next two years?’ (0 = no intention to have a/nother child, 1 = intention to have a/nother child). We also built outcome variables exploiting the longitudinal nature of the data by measuring the outcomes one wave after the independent variable measures (meeting a partner online). In the case of whether the respondent experienced an actual separation (0 = no separation, 1 = experienced a separation), moved in with a partner (0 = no move in together, 1 = moved in together), and whether the respondent had become a parent (0 = no entry into parenthood, 1 = entry into parenthood), we treated these outcomes as right censored. As such if entry into parenthood, moving in together or separation happened, that individual was censored out of the data because the present study is interested in the first appearances of these events. In case of having a first child, we have in our analysis only those respondents who do not have children at baseline.

In terms of covariates, we use age, birth cohort, highest education, ethnicity, having the same vs. new partner, whether the respondent currently lives in East Germany, relationship duration, and personality (measured with the Big Five personality traits, which include openness to experience, conscientiousness, extraversion, agreeableness, and neuroticism). Because personality was questioned only in waves two and six, we had to extract this information for other waves, which means there was a drop in observations, especially in the first wave. However, for sensitivity purposes, we also ran our analyses without the first wave, which did not change the results considerably (not shown here, but available upon request). In addition, in analyses concerning intention to separate, actual separation, cohabitation, and relationship satisfaction between partners, we controlled for the number of children and in analyses concerning intention to separate, actual separation, relationship satisfaction, intention to have a child and entry into parenthood, we controlled for whether the respondent is married or not (0 = not married/civil union, 1 = married/civil union) (see [Table 1](#) for descriptive statistics).

We used random-intercept multilevel regression to study associations between meeting online and family-related outcomes and conducted between-person models to represent the results across individuals. Between-person models were used because the study is interested in the differences in outcomes between those who met their partners online, and those who met their partners offline. Because there were few individuals in the data who had multiple subsequent relationships during data collection and who would have had variation according to meeting venue (online or offline), we were unable to implement fixed-effect regressions. We ran between-person regression models where the outcome variables are used as time-lagged (i.e. measured one wave after rather than concurrently with the independent variable and covariates). All analyses include an interaction term between meeting online and birth cohort because the three birth cohorts followed in Pairfam are at different stages of their life courses, which may affect their partnership and reproductive behaviours.

Results

First, we investigated whether meeting venue (online or offline) is associated with relationship satisfaction (Q1) or stability (i.e. intention or likelihood of separation; Q2

Table 1. Descriptive statistics across Waves 1–8 in the Pairfam.

	Total no	No. of persons	%	Mean (SD)	Within person SD
Meeting venue					
Offline	35,082	7767	93.3		
Online	2534	832	6.7		
Relationship satisfaction	36,651	8012		7.9 (2.17)	1.58
Cohabitation					
No	8009	3500	80.6		
Yes	1928	1813	19.4		
Intention to have a child					
No	10,616	4537	60.2		
Yes	7021	2841	39.8		
Entry into parenthood					
No	13,567	4385	94.3		
Yes	815	815	5.7		
Intention to separate					
No	29,601	7177	86.1		
Yes	4767	2544	13.9		
Separation					
No	21,705	6080	97.4		
Yes	580	580	2.6		
Sex					
Men	16,118	3694	42.9		
Women	21,498	4483	57.2		
Age at interview	37,616	8177		31.5 (8.10)	1.9
Cohort					
1991–1993	8403	2543	22.3		
1981–1983	13,045	2670	34.7		
1971–1973	16,168	2964	43.0		
Currently living in East Germany					
No	27,658	6121	73.5		
Yes	9958	2215	26.5		
Ethnicity					
German native	30,112	6468	80.1		
Ethnic-German immigrant	1645	385	4.4		
Half-German	2119	452	5.6		
Turkish background	972	242	2.6		
Other non-German background	2768	630	7.4		
Highest education					
currently enrolled	2288	1362	6.1		
primary and lower secondary	3339	1063	8.9		
upper secondary	14,998	3572	39.9		
post-secondary	6339	1938	16.9		
Tertiary	10,652	2096	28.3		
Partner					
Same partner	32,479	7255	86.3		
New partner	5137	3691	13.7		
Marital status					
Not married/civil union	17,930	5296	48.9		
Married/civil union	18,768	3751	51.1		
Number of children	37,616	8177		1.0 (1.14)	0.29
Relationship duration (in months)	37,616	8177		100.6 (85.0)	23.2
Extrovert	37,616	8177		14.2 (3.18)	
Agreeableness	37,616	8177		13.1 (2.9)	
Neurotic	37,616	8177		10.6 (3.18)	
Openness	37,616	8177		18.1 (3.57)	
Conscient	37,616	8177		15.4 (2.64)	

Notes: Total no. = Number of total person-observations; No. Of persons = Number of unique person; SD = Overall standard deviation; Within-person SD = Within-person standard deviation.

and Q3). The meeting venue did not correlate with relationship satisfaction between partners or intention to separate in any of the birth cohorts when all covariates were added to the model (Tables 2 and 3). However, meeting online as compared to

meeting offline was associated with lower relationship satisfaction among the youngest birth cohort before the Big Five personality traits were added to the model (Table 2). Moreover, actual union dissolution was significantly more likely to take place in the youngest birth cohort among those who met their partners online as compared to those who met their partners offline, even in the fully adjusted model (Table 4).

Next we investigated whether meeting venue is associated with a transition to cohabit (Q4). However, the meeting venue did not correlate with moving in together among any of the cohorts when all covariates were added to the model (Table 5).

Then we examined intentions to have a first or subsequent child (Q5). As meeting offline was the reference category, meeting online was associated with increased intention to have a first child in the youngest birth cohort, even after controlling for all confounding variables (Table 6). There were no differences in intentions to have another child among parents in any of the birth cohorts when comparing those who met online and offline after adding all covariates to the model (see Table 7). We also ran models without forward-lagged dependent variables because meeting a partner may not precede having intentions to have a child, as these may be concurrent events. The results were fairly similar compared to the models with forward-lagged dependent variables (not shown here, but available upon request).

In addition, because having intentions to have a/nother child may be an impetus to look for a partner, we ran models with meeting online in the subsequent wave as a dependent variable, and intentions to have a child in the baseline as an independent variable. The results indicate that higher intentions to have a child may indeed be associated with being more likely to meet a (new) partner online. Among childless persons in the youngest birth cohorts, those who were more likely to have intentions to have a child in the baseline wave were also more likely to meet their (new) partner online in the subsequent wave ($\beta = 0.22$, $p = 0.001$, 95% CIs = 0.09–0.34, see Appendix Table A2). Because so few parents met a new partner during waves two to eight, we were unable to study the reverse associations on mothers and fathers.

Finally, we studied whether the meeting venue is associated with having a first child (Q6). Despite the findings concerning intentions to have a child, those in the youngest cohort who met their partners online were not more likely to actually have a first child during the panel study when compared to those who met their partners offline (Table 8). However, in the oldest cohort, those childless persons who met their partners online were more likely to have their first child during the panel study as compared to those who met their partners offline (Table 8). Thus, meeting online may be associated with the transition to parenthood among older individuals.

Discussion

In this study, we began to disentangle whether digitalized online partnership markets and online partnering influence family-related outcomes using data from three German birth cohorts. Meeting online was not associated with relationship satisfaction, moving in together, or intentions to separate in any of the birth cohorts after adding all covariates, including personality traits to the models. Our results are in line with Rosenfeld and Thomas (2012), who used data from the United States and found no difference in relationship satisfaction in relation to meeting venue. However, our results are

Table 2. Association between meeting venue and relationship satisfaction.

	Model 1				Model 2				Model 3				Model 4			
	Coeff.	<i>p</i>	95% CI Lower	upper	Coeff.	<i>p</i>	95% CI lower	upper	Coeff.	<i>p</i>	95% CI lower	upper	Coeff.	<i>p</i>	95% CI lower	upper
Meeting venue																
Offline (ref.)																
Online	-0.35	0.034	-0.67	-0.03	-0.37	0.026	-0.69	-0.05	-0.37	0.024	-0.70	-0.05	-0.26	0.105	-0.58	0.05
Cohort																
1991–1993 (ref.)																
1981–1983	-0.23	0.000	-0.34	-0.12	-0.55	0.001	-0.87	-0.23	-0.71	0.000	-1.04	-0.38	-0.82	0.000	-1.16	-0.49
1971–1973	-0.47	0.000	-0.58	-0.37	-1.03	0.001	-1.66	-0.40	-1.28	0.000	-1.91	-0.64	-1.45	0.000	-2.09	-0.81
Meeting venue x cohort																
Online x 1991–1993 (ref.)																
Online x 1981–1983	0.26	0.230	-0.16	0.68	0.25	0.248	-0.17	0.67	0.35	0.105	-0.07	0.78	0.32	0.128	-0.09	0.73
Online x 1971–1973	0.03	0.902	-0.41	0.47	0.04	0.847	-0.40	0.49	0.28	0.222	-0.17	0.74	0.13	0.560	-0.31	0.58
Gender																
Male (ref.)																
Female					-0.13	0.001	-0.21	-0.05	-0.14	0.001	-0.23	-0.06	-0.08	0.059	-0.17	0.00
Age at interview					0.02	0.219	-0.01	0.05	0.02	0.166	-0.01	0.06	0.03	0.087	0.00	0.06
Currently living in East Germany																
No (ref.)																
Yes					-0.03	0.529	-0.12	0.06	0.00	0.934	-0.09	0.10	-0.02	0.607	-0.12	0.07
Highest education																
Currently enrolled (ref.)																
Primary and lower secondary					0.15	0.213	-0.09	0.40	0.23	0.066	-0.02	0.47	0.19	0.111	-0.04	0.43
Upper secondary					0.09	0.459	-0.14	0.31	0.07	0.571	-0.16	0.29	-0.01	0.915	-0.23	0.21
Post-secondary					0.17	0.154	-0.06	0.41	0.17	0.158	-0.07	0.41	0.13	0.260	-0.10	0.36
Tertiary					0.35	0.005	0.10	0.59	0.31	0.012	0.07	0.56	0.23	0.057	-0.01	0.47
Ethnicity																
German native (ref.)																
Ethnic-German immigrant					0.10	0.337	-0.10	0.29	0.06	0.545	-0.13	0.26	0.11	0.271	-0.08	0.30
Half-German					-0.03	0.746	-0.21	0.15	-0.02	0.866	-0.19	0.16	0.01	0.940	-0.17	0.18
Turkish background					0.28	0.029	0.03	0.53	0.23	0.078	-0.03	0.48	0.17	0.170	-0.07	0.42
Other non-German background					0.08	0.289	-0.07	0.24	0.08	0.331	-0.08	0.23	0.07	0.380	-0.08	0.22
Partner																
Same partner (ref.)																
New partner									-0.21	0.018	-0.39	-0.04	-0.20	0.027	-0.37	-0.02
Relationship duration (in months)									0.00	0.103	0.00	0.00	0.00	0.265	0.00	0.00

Marital status								
Not married/civil union (ref.)								
Married/civil union	0.33	0.000	0.20	0.47	0.32	0.000	0.19	0.45
Number of children	-0.14	0.000	-0.19	-0.08	-0.13	0.000	-0.19	-0.08
Extraversion					0.00	0.817	-0.02	0.01
Neuroticism					-0.09	0.000	-0.11	-0.08
Agreeableness					0.04	0.000	0.03	0.06
Conscientiousness					0.06	0.000	0.04	0.08
Openness					0.01	0.160	0.00	0.02

Note: In addition to other covariates, we controlled for the time period (in months) between the baseline and outcome measure interview

Model 1 number of observations: 28,004 number of groups: 7308.

Model 2 number of observations: 27,308 number of groups: 7131.

Model 3 number of observations: 27,043 number of groups: 7084.

Model 4 number of observations: 26,661 number of groups: 6848.

Table 3. Associations between meeting venue and intentions to separate.

	Model 1				Model 2				Model 3				Model 4			
	Coeff.	<i>p</i>	95% CI Lower	upper	Coeff.	<i>p</i>	95% CI Lower	upper	Coeff.	<i>p</i>	95% CI lower	upper	Coeff.	<i>p</i>	95% CI lower	upper
Meeting venue																
Offline (ref.)																
Online	0.03	0.363	-0.03	0.08	0.04	0.163	-0.02	0.09	0.04	0.174	-0.02	0.09	0.02	0.446	-0.03	0.08
Cohort																
1991–1993 (ref.)																
1981–1983	-0.12	0.000	-0.14	-0.10	0.02	0.466	-0.03	0.08	0.07	0.020	0.01	0.12	0.08	0.005	0.02	0.14
1971–1973	-0.16	0.000	-0.18	-0.14	0.11	0.044	0.00	0.22	0.19	0.001	0.08	0.30	0.20	0	0.09	0.31
Meeting venue x cohort																
Online x 1991–1993 (ref.)																
Online x 1981–1983	0.03	0.462	-0.04	0.10	0.02	0.568	-0.05	0.09	-0.01	0.790	-0.08	0.06	0.00	0.932	-0.07	0.07
Online x 1971–1973	0.06	0.131	-0.02	0.13	0.05	0.196	-0.03	0.13	-0.02	0.532	-0.10	0.05	0.00	0.997	-0.08	0.08
Gender																
Male (ref.)																
Female					0.03	0.000	0.01	0.04	0.04	0.000	0.02	0.05	0.02	0.009	0.00	0.03
Age at interview					-0.01	0.000	-0.02	-0.01	-0.01	0.000	-0.02	-0.01	-0.01	0	-0.02	0.00
Currently living in East Germany																
No (ref.)																
Yes					-0.01	0.533	-0.02	0.01	-0.01	0.166	-0.03	0.00	-0.01	0.28	-0.02	0.01
Highest education																
Currently enrolled (ref.)																
Primary and lower secondary					-0.06	0.005	-0.11	-0.02	-0.08	0.000	-0.12	-0.04	-0.06	0.004	-0.11	-0.02
Upper secondary					-0.08	0.000	-0.12	-0.04	-0.08	0.000	-0.12	-0.04	-0.06	0.004	-0.10	-0.02
Post-secondary					-0.06	0.006	-0.10	-0.02	-0.07	0.002	-0.11	-0.02	-0.06	0.004	-0.10	-0.02
Tertiary					-0.09	0.000	-0.14	-0.05	-0.09	0.000	-0.14	-0.05	-0.08	0	-0.12	-0.04
Ethnicity																
German native (ref.)																
Ethnic-German immigrant					0.003	0.859	-0.03	0.04	0.02	0.278	-0.01	0.05	0.01	0.498	-0.02	0.04
Half-German					0.04	0.007	0.01	0.07	0.04	0.012	0.01	0.07	0.03	0.075	0.00	0.06
Turkish background					-0.02	0.487	-0.06	0.03	0.01	0.725	-0.03	0.05	0.01	0.484	-0.03	0.06
Other non-German background					0.03	0.060	-0.001	0.05	0.03	0.025	0.00	0.06	0.03	0.029	0.00	0.05
Partner																
Same partner (ref.)																
New partner									0.06	0.000	0.03	0.09	0.05	0.000	0.02	0.08
Relationship duration (in months)									0.00	0.000	0.00	0.00	-0.0004	0.000	-0.0005	-0.0002

Marital status								
Not married/civil union (ref.)								
Married/civil union	-0.08	0.000	-0.10	-0.06	-0.07	0.000	-0.10	-0.05
Number of children	0.02	0.000	0.01	0.03	0.02	0.000	0.01	0.03
Extraversion					0.00	0.000	0.00	0.01
Neuroticism					0.01	0.000	0.01	0.02
Agreeableness					-0.01	0.000	-0.01	-0.01
Conscientiousness					-0.01	0.000	-0.01	-0.01
Openness					0.00	0.000	0.00	0.01

Note: In addition to other covariates, we controlled for the time period (in months) between the baseline and outcome measure interview.

Model 1 number of observations: 27,151 number of groups: 7155.

Model 2 number of observations: 26,473 number of groups: 6981.

Model 3 number of observations: 26,216 number of groups: 6937.

Model 4 number of observations: 25,843 number of groups: 6705.

Table 4. Associations between meeting venue and separation.

	Model 1		95% CI		Model 2		95% CI		Model 3		95% CI		Model 4		95% CI	
	Coeff.	<i>p</i>	Lower	upper	Coeff.	<i>p</i>	lower	upper	Coeff.	<i>p</i>	lower	upper	Coeff.	<i>p</i>	lower	upper
Meeting venue																
Offline (ref.)																
Online	0.07	0.019	0.01	0.12	0.03	0.209	-0.02	0.09	0.06	0.010	0.01	0.11	0.06	0.008	0.02	0.11
Cohort																
1991–1993 (ref.)																
1981–1983	-0.34	0	-0.36	-0.32	0.10	0.005	0.03	0.17	0.04	0.268	-0.03	0.10	0.03	0.301	-0.03	0.10
1971–1973	-0.44	0	-0.46	-0.42	0.41	0.000	0.28	0.54	0.16	0.012	0.03	0.28	0.15	0.019	0.02	0.27
Meeting venue x cohort																
Online x 1991–1993 (ref.)																
Online x 1981–1983	0.004	0.928	-0.08	0.08	0.05	0.210	-0.03	0.12	-0.06	0.112	-0.12	0.01	-0.06	0.096	-0.13	0.01
Online x 1971–1973	0.02	0.601	-0.06	0.11	0.08	0.043	0.00	0.16	-0.06	0.102	-0.13	0.01	-0.06	0.097	-0.14	0.01
Gender																
Male (ref.)																
Female					-0.05	0.000	-0.06	-0.03	-0.01	0.110	-0.03	0.00	-0.01	0.100	-0.03	0.00
Age at interview																
Currently living in East Germany																
No (ref.)																
Yes					0.03	0.005	0.01	0.05	0.02	0.065	0.00	0.04	0.02	0.049	0.00	0.04
Highest education																
Currently enrolled (ref.)																
Primary and lower secondary					-0.08	0.000	-0.12	-0.04	-0.14	0.000	-0.17	-0.10	-0.13	0.000	-0.17	-0.10
Upper secondary					-0.13	0.000	-0.17	-0.10	-0.18	0.000	-0.21	-0.15	-0.18	0.000	-0.21	-0.15
Post-secondary					-0.16	0.000	-0.19	-0.12	-0.22	0.000	-0.25	-0.18	-0.22	0.000	-0.25	-0.18
Tertiary					-0.14	0.000	-0.18	-0.10	-0.18	0.000	-0.22	-0.14	-0.18	0.000	-0.22	-0.14
Ethnicity																
German native (ref.)																
Ethnic-German immigrant					-0.06	0.001	-0.10	-0.03	-0.05	0.005	-0.08	-0.01	-0.05	0.006	-0.08	-0.01
Half-German					-0.01	0.576	-0.05	0.03	-0.01	0.433	-0.04	0.02	-0.02	0.323	-0.05	0.02
Turkish background					-0.07	0.003	-0.11	-0.02	-0.07	0.002	-0.11	-0.02	-0.06	0.007	-0.10	-0.02
Other non-German background					-0.02	0.152	-0.05	0.01	-0.03	0.059	-0.05	0.00	-0.02	0.114	-0.05	0.01
Partner																
Same partner (ref.)																
New partner									0.49	0.000	0.46	0.52	0.50	0.000	0.47	0.53
Relationship duration (in months)									0.00	0.000	0.00	0.00	0.00	0.001	0.00	0.00

Marital status								
Not married/civil union (ref.)								
Married/civil union	-0.08	0.000	-0.10	-0.05	-0.07	0.000	-0.10	-0.05
Number of children	0.00	0.330	-0.01	0.02	0.01	0.253	0.00	0.02
Extraversion					0.002	0.176	0.00	0.00
Neuroticism					0.001	0.426	-0.002	0.004
Agreeableness					-0.004	0.003	-0.007	-0.001
Conscientiousness					-0.002	0.109	-0.005	0.001
Openness					0.003	0.020	0.000	0.005

Notes: In addition to other covariates, we controlled for the time period (in months) between the baseline and outcome measure interview.

Model 1 number of observations: 22,620 number of groups: 6750.

Model 2 number of observations: 22,103 number of groups: 6597.

Model 3 number of observations: 22,012 number of groups: 6563.

Model 4 number of observations: 21,966 number of groups: 6545.

Table 5. Association between meeting venue and moving in together.

	Model 1		95% CI		Model 2		95% CI		Model 3		95% CI		Model 4		95% CI	
	Coeff.	<i>p</i>	lower	upper	Coeff.	<i>p</i>	lower	upper	Coeff.	<i>p</i>	lower	upper	Coeff.	<i>p</i>	lower	upper
Meeting venue																
Offline (ref.)																
Online	0.08	0.034	0.01	0.15	0.06	0.106	-0.01	0.13	0.05	0.179	-0.02	0.12	0.05	0.153	-0.02	0.12
Cohort																
1991–1993 (ref.)																
1981–1983	0.29	0.000	0.26	0.32	0.35	0.000	0.26	0.44	0.41	0.000	0.33	0.50	0.40	0.000	0.31	0.49
1971–1973	0.16	0.000	0.12	0.20	0.37	0.000	0.19	0.56	0.49	0.000	0.31	0.68	0.48	0.000	0.29	0.66
Meeting venue x cohort																
Online x 1991–1993 (ref.)																
Online x 1981–1983	-0.14	0.010	-0.24	-0.03	-0.11	0.036	-0.22	-0.01	-0.12	0.026	-0.22	-0.01	-0.12	0.021	-0.22	-0.02
Online x 1971–1973	0.01	0.830	-0.11	0.13	0.03	0.568	-0.08	0.15	0.04	0.497	-0.08	0.16	0.03	0.665	-0.09	0.15
Gender																
Male (ref.)																
Female					0.04	0.008	0.01	0.06	0.05	0.001	0.02	0.07	0.05	0.001	0.02	0.08
Age at interview					-0.01	0.004	-0.02	-0.005	-0.02	0.000	-0.03	-0.01	-0.02	0.000	-0.03	-0.01
Currently living in East Germany																
No (ref.)																
Yes					0.02	0.144	-0.01	0.06	0.03	0.047	0.00	0.06	0.03	0.050	-0.00001	0.06
Highest education																
Currently enrolled (ref.)																
Primary and lower secondary					0.13	0.000	0.07	0.18	0.13	0.000	0.08	0.19	0.13	0.000	0.07	0.19
Upper secondary					0.12	0.000	0.07	0.17	0.13	0.000	0.08	0.18	0.12	0.000	0.07	0.17
Post-secondary					0.14	0.000	0.08	0.19	0.14	0.000	0.09	0.20	0.14	0.000	0.09	0.20
Tertiary					0.16	0.000	0.10	0.22	0.16	0.000	0.10	0.23	0.16	0.000	0.10	0.23
Ethnicity																
German native (ref.)																
Ethnic-German immigrant					0.02	0.479	-0.04	0.08	0.03	0.334	-0.03	0.09	0.03	0.283	-0.03	0.10
Half-German					0.01	0.804	-0.05	0.06	0.01	0.687	-0.04	0.07	0.02	0.544	-0.04	0.07
Turkish background					0.03	0.572	-0.07	0.12	0.04	0.431	-0.06	0.13	0.02	0.682	-0.07	0.11
Other non-German background					-0.05	0.095	-0.10	0.01	-0.06	0.033	-0.11	0.00	-0.05	0.061	-0.11	0.002

Partner								
Same partner (ref.)								
New partner	0.23	0.000	0.18	0.27	0.23	0.000	0.19	0.28
Relationship duration (in months)	0.001	0.007	0.0002	0.001	0.001	0.014	0.0001	0.001
Number of children	-0.02	0.106	-0.04	0.004	-0.02	0.107	-0.04	0.004
Extraversion					-0.001	0.615	-0.01	0.003
Neuroticism					-0.0003	0.904	-0.005	0.004
Agreeableness					-0.0003	0.884	-0.005	0.004
Conscientiousness					0.003	0.252	-0.002	0.01
Openness					-0.003	0.131	-0.01	0.001

Note: In addition to other covariates, we controlled for the time period (in months) between the baseline and outcome measure interview.

Model 1 number of observations: 6709 number of groups: 3075.

Model 2 number of observations: 6576 number of groups: 3011.

Model 3 number of observations: 6562 number of groups: 3006.

Model 4 number of observations: 6490 number of groups: 2954.

Table 6. Associations between meeting venue and intentions to have a first child.

	Model 1		95% CI		Model 2		95% CI		Model 3		95% CI		Model 4		95% CI	
	Coeff.	<i>p</i>	lower	upper	Coeff.	<i>p</i>	lower	upper	Coeff.	<i>p</i>	lower	upper	Coeff.	<i>p</i>	lower	upper
Meeting venue																
Offline (ref.)																
Online	0.09	0.001	0.04	0.15	0.07	0.018	0.01	0.12	0.07	0.014	0.01	0.12	0.06	0.020	0.01	0.12
Cohort																
1991–1993 (ref.)																
1981–1983	0.51	0.000	0.49	0.54	0.32	0.000	0.25	0.40	0.27	0.000	0.20	0.34	0.27	0.000	0.20	0.35
1971–1973	0.65	0.000	0.61	0.69	0.30	0.000	0.15	0.45	0.20	0.012	0.04	0.35	0.20	0.012	0.04	0.35
Meeting venue x cohort																
Online x 1991–1993 (ref.)																
Online x 1981–1983	−0.10	0.012	−0.19	−0.02	−0.07	0.091	−0.15	0.01	−0.05	0.266	−0.13	0.03	−0.04	0.303	−0.12	0.04
Online x 1971–1973	−0.07	0.237	−0.19	0.05	−0.06	0.286	−0.18	0.05	−0.01	0.881	−0.13	0.11	−0.01	0.930	−0.12	0.11
Gender																
Male (ref.)																
Female					0.07	0.000	0.05	0.09	0.06	0.000	0.04	0.08	0.06	0.000	0.03	0.08
Age at interview					0.02	0.000	0.01	0.02	0.02	0.000	0.01	0.02	0.02	0.000	0.01	0.02
Currently living in East Germany																
No (ref.)																
Yes					0.05	0.000	0.03	0.07	0.05	0.000	0.03	0.08	0.05	0.000	0.03	0.08
Highest education																
Currently enrolled (ref.)																
Primary and lower secondary					0.15	0.000	0.11	0.20	0.15	0.000	0.10	0.19	0.15	0.000	0.10	0.19
Upper secondary					0.08	0.000	0.04	0.12	0.07	0.001	0.03	0.11	0.06	0.003	0.02	0.10
Post-secondary					−0.01	0.626	−0.06	0.03	−0.01	0.559	−0.06	0.03	−0.01	0.513	−0.06	0.03
Tertiary					0.13	0.000	0.08	0.18	0.11	0.000	0.06	0.16	0.11	0.000	0.06	0.16
Ethnicity																
German native (ref.)																
Ethnic-German immigrant					0.06	0.009	0.02	0.11	0.05	0.040	0.00	0.09	0.05	0.041	0.00	0.09
Half-German					0.05	0.040	0.00	0.09	0.04	0.051	0.00	0.09	0.04	0.056	0.00	0.09
Turkish background					0.07	0.069	−0.01	0.14	0.04	0.239	−0.03	0.11	0.05	0.139	−0.02	0.12
Other non-German background					0.03	0.125	−0.01	0.07	0.02	0.382	−0.02	0.06	0.03	0.234	−0.02	0.07

Partner								
Same partner (ref.)								
New partner	-0.01	0.542	-0.05	0.02	-0.01	0.424	-0.05	0.02
Relationship duration (in months)	0.0003	0.118	-7.7E-05	6.8E-04	0.0003	0.141	-1E-04	0.00067
Marital status								
Not married/civil union (ref.)								
Married/civil union	0.19	0.000	0.15	0.23	0.19	0.000	0.15	0.23
Extraversion					0.000	0.814	-0.003	0.004
Neuroticism					0.000	0.808	-0.004	0.003
Agreeableness					0.001	0.436	-0.002	0.005
Conscientiousness					0.003	0.186	-0.001	0.007
Openness					0.000	0.840	-0.003	0.003

Note: In addition to other covariates, we controlled for the time period (in months) between the baseline and outcome measure interview.

Model 1 number of observations: 10,529 number of groups: 4046.

Model 2 number of observations: 10,358 number of groups: 3975.

Model 3 number of observations: 10,288 number of groups: 3956.

Model 4 number of observations: 10,195 number of groups: 3884.

Table 7. Associations between meeting venue and intentions to have a subsequent child.

	Model 1		95% CI		Model 2		95% CI		Model 3		95% CI		Model 4		95% CI	
	Coeff.	<i>p</i>	lower	upper	Coeff.	<i>p</i>	lower	upper	Coeff.	<i>p</i>	lower	upper	Coeff.	<i>p</i>	lower	upper
Meeting venue																
Offline (ref.)																
Online	-0.13	0.531	-0.53	0.27	-0.13	0.513	-0.53	0.27	-0.17	0.396	-0.57	0.22	-0.13	0.547	-0.57	0.30
Cohort																
1991–1993 (ref.)																
1981–1983	0.31	0.000	0.19	0.42	0.39	0.000	0.22	0.56	0.37	0.000	0.19	0.54	0.41	0.000	0.23	0.58
1971–1973	0.17	0.004	0.06	0.29	0.33	0.020	0.05	0.61	0.34	0.017	0.06	0.62	0.41	0.005	0.13	0.70
Meeting venue x cohort																
Online x 1991–1993 (ref.)																
Online x 1981–1983	0.15	0.495	-0.27	0.56	0.14	0.513	-0.28	0.56	0.17	0.428	-0.25	0.58	0.13	0.583	-0.33	0.58
Online x 1971–1973	0.40	0.063	-0.02	0.83	0.39	0.074	-0.04	0.81	0.34	0.117	-0.08	0.76	0.30	0.201	-0.16	0.76
Gender																
Male (ref.)																
Female					0.00	0.981	-0.04	0.04	0.02	0.459	-0.03	0.06	0.02	0.448	-0.03	0.06
Age at interview					-0.01	0.299	-0.02	0.01	0.00	0.659	-0.02	0.01	-0.01	0.372	-0.02	0.01
Currently living in East Germany																
No (ref.)																
Yes					-0.01	0.710	-0.06	0.04	-0.01	0.781	-0.06	0.04	0.01	0.700	-0.04	0.06
Highest education																
Currently enrolled (ref.)																
Primary and lower secondary					0.14	0.721	-0.63	0.91	0.12	0.756	-0.64	0.88	0.11	0.781	-0.65	0.86
Upper secondary					0.16	0.676	-0.60	0.93	0.15	0.703	-0.61	0.90	0.14	0.718	-0.61	0.89
Post-secondary					0.15	0.707	-0.62	0.91	0.13	0.745	-0.63	0.88	0.11	0.771	-0.64	0.87
Tertiary					0.25	0.522	-0.52	1.02	0.22	0.562	-0.53	0.98	0.22	0.573	-0.54	0.97
Ethnicity																
German native (ref.)																
Ethnic-German immigrant					-0.05	0.243	-0.14	0.04	-0.03	0.564	-0.11	0.06	-0.02	0.712	-0.11	0.07
Half-German					0.04	0.453	-0.06	0.13	0.04	0.354	-0.05	0.14	0.04	0.365	-0.05	0.14
Turkish background					0.03	0.619	-0.09	0.15	0.06	0.342	-0.06	0.18	0.06	0.327	-0.06	0.18
Other non-German background					-0.05	0.153	-0.13	0.02	-0.06	0.142	-0.13	0.02	-0.05	0.200	-0.12	0.03

Partner								
Same partner (ref.)								
New partner	-0.26	0.000	-0.37	-0.15	-0.26	0.000	-0.38	-0.15
Relationship duration (in months)	0.00	0.000	0.00	0.00	0.00	0.000	0.00	0.00
Marital status								
Not married/civil union (ref.)								
Married/civil union	0.00	0.985	-0.05	0.05	0.01	0.797	-0.05	0.06
Extraversion					0.007	0.05	1.45E-05	0.01
Neuroticism					0.000	0.896	-0.01	0.01
Agreeableness					0.003	0.484	0.00	0.01
Conscientiousness					-0.009	0.053	-0.02	0.000
Openness					-0.002	0.482	-0.01	0.004

Note: In addition to other covariates, we controlled for the time period (in months) between the baseline and outcome measure interview.

Model 1 number of observations: 3420 number of groups: 1779.

Model 2 number of observations: 3306 number of groups: 1728.

Model 3 number of observations: 3257 number of groups: 1713.

Model 4 number of observations: 3199 number of groups: 1668.

Table 8. Associations between meeting venue and transition to parenthood.

	Model 1				Model 2				Model 3				Model 4			
	Coeff.	<i>p</i>	95% CI lower	upper	Coeff.	<i>p</i>	95% CI lower	upper	Coeff.	<i>p</i>	95% CI lower	upper	Coeff.	<i>p</i>	95% CI lower	upper
Meeting venue																
Offline (ref.)																
Online	-0.0003	0.990	-0.04	0.04	-0.01	0.448	-0.05	0.02	-0.01	0.448	-0.05	0.02	-0.01	0.504	-0.05	0.02
Cohort																
1991–1993 (ref.)																
1981–1983	0.15	0.000	0.13	0.16	0.36	0.000	0.31	0.41	0.33	0.000	0.28	0.38	0.34	0.000	0.29	0.39
1971–1973	0.14	0.000	0.12	0.16	0.64	0.000	0.54	0.74	0.56	0.000	0.46	0.66	0.58	0.000	0.47	0.68
Meeting venue x cohort																
Online x 1991–1993 (ref.)																
Online x 1981–1983	-0.04	0.171	-0.10	0.02	-0.01	0.777	-0.06	0.05	0.00	0.971	-0.05	0.06	0.00	0.962	-0.06	0.05
Online x 1971–1973	0.05	0.216	-0.03	0.12	0.09	0.016	0.02	0.17	0.10	0.011	0.02	0.17	0.08	0.029	0.01	0.16
Gender																
Male (ref.)																
Female					0.02	0.026	0.002	0.03	0.01	0.041	0.00	0.03	0.02	0.009	0.00	0.03
Age at interview					-0.03	0.000	-0.03	-0.02	-0.03	0.000	-0.03	-0.02	-0.03	0.000	-0.03	-0.02
Currently living in East Germany																
No (ref.)																
Yes					0.05	0.000	0.04	0.07	0.06	0.000	0.04	0.07	0.06	0.000	0.04	0.07
Highest education																
Currently enrolled (ref.)																
Primary and lower secondary					0.12	0.000	0.09	0.15	0.11	0.000	0.08	0.14	0.11	0.000	0.08	0.14
Upper secondary					0.11	0.000	0.08	0.14	0.09	0.000	0.07	0.12	0.09	0.000	0.06	0.12
Post-secondary					0.10	0.000	0.07	0.13	0.09	0.000	0.06	0.12	0.09	0.000	0.06	0.12
Tertiary					0.11	0.000	0.07	0.14	0.09	0.000	0.06	0.13	0.09	0.000	0.05	0.12
Ethnicity																
German native (ref.)																
Ethnic-German immigrant					0.04	0.015	0.01	0.07	0.03	0.109	-0.01	0.06	0.03	0.076	0.00	0.06
Half-German					0.02	0.294	-0.01	0.04	0.01	0.507	-0.02	0.04	0.01	0.341	-0.01	0.04
Turkish background					0.01	0.661	-0.04	0.06	-0.02	0.451	-0.06	0.03	-0.02	0.345	-0.07	0.02
Other non-German background					-0.01	0.369	-0.04	0.01	-0.04	0.007	-0.06	-0.01	-0.03	0.017	-0.06	-0.01

Partner								
Same partner (ref.)								
New partner	0.05	0.000	0.02	0.07	0.05	0.000	0.02	0.07
Relationship duration (in months)	0.00	0.001	0.00	0.00	0.00	0.001	0.00	0.00
Marital status								
Not married/civil union (ref.)								
Married/civil union	0.21	0.000	0.18	0.24	0.21	0.000	0.19	0.24
Extraversion					0.00	0.327	0.00	0.00
Neuroticism					0.00	0.016	-0.01	0.00
Agreeableness					0.00	0.259	0.00	0.00
Conscientiousness					0.00	0.247	0.00	0.00
Openness					0.00	0.029	0.00	0.00

Note: In addition to other covariates, we controlled for the time period (in months) between the baseline and outcome measure interview.

Model 1 number of observations: 13,832 number of groups: 4639.

Model 2 number of observations: 13,564 number of groups: 4,549.

Model 3 number of observations: 13,474 number of groups: 4,527.

Model 4 number of observations: 13,336 number of groups: 4,431.

inconsistent with the US study by Cacioppo and colleagues (2013), who found slightly better marital satisfaction among couples who met online via dating sites as compared to those who met offline. One must keep in mind that our results consider all couples, not just those who are married, which may partly explain the different results between our study and this investigation. In addition, our data includes couples who met via the Internet in general, not only, or mainly via dating sites.

Association between meeting online and relationship satisfaction was negative in the youngest birth cohort before adding personality traits to the model, which indicates that personality type may be associated with meeting a partner online. Indeed, a previous Pairfam study showed that among all three birth cohorts less extrovert personalities were associated with likelihood to meet online (Danielsbacka et al., 2019). In addition, and contrary to previous results (Cacioppo et al., 2013), we found that among the youngest birth cohort, those who met online were more likely to separate than those who met offline. Again, one should bear in mind that our results consider all union dissolutions, not just marital break-ups. One reason for the present findings could be that in our study sample the majority of those who met their partners online met via online social networks or chat rooms, whereas a smaller proportion met via dating sites. The idea that meeting online might lead to more stable unions could be more accurate in the cases of those who use online dating sites and meet their partners via those channels because dating sites typically use algorithms that match people. The present finding that online partnering is more often associated with separation than offline partnering in the youngest birth cohort is in line with the assumption that individuals in the youngest cohort may be more likely to be seeking short-term than long-term relationships online.

Regarding the outcomes related to intentions to have a child and entry into parenthood, childless individuals in the youngest birth cohort who met their partners online were more likely to have fertility intentions as compared to their counterparts who met offline. In addition, individuals in the oldest birth cohort who met their partners online were more likely to have a first child during the panel than their counterparts who met offline.

The result that meeting online as compared to meeting offline is associated with having more likely intentions to have a child and having a first child is in line with Rosenfeld's (2017) assumption, noting that those seeking a partner online may be more ready to start a family. However, we did not find that those who met online would be more or less likely to move in together than those who met offline.

A seemingly contradictory finding is that persons in the youngest cohort were more likely to break up if they met their partner online, and had more intentions to have a child if they met online as compared to those who met offline. Together with the result that among the youngest cohort there was no difference in actual transition to parenthood between those who met online and offline, this finding may indicate that partners do not share the same intentions, and that this results in break-ups. However, a more likely explanation (and one supported by the data) is that those persons in the youngest cohort who have intentions to have a/nother child and who separate are, in most cases, different persons. There were only 28 respondents who separated and had intentions to have a child, whereas 302 separated respondents in the youngest cohort did not have intentions to have a child. This may indicate that the respondents in the

youngest birth cohort are more heterogenous than the older ones. Some of them are looking for a long-term partner and some could be looking just for a short-term partner whereas respondents from older birth cohorts may be more homogenous and look for stability.

In fact, online partnering was associated with increased transition to parenthood in the oldest birth cohort. This finding is in line with the assumption that finding a long-term partner could be more urgent for older single people for whom the Internet might be the so-called last chance to find a partner. It is also possible that people belonging to the oldest cohort and who met their partners online are in some other way a selected group. Although we controlled for several socio-demographic factors and personality, all potentially confounding variables are hard, if not impossible to account for.

Despite the strengths of this study, there are also some limitations. In the case of entry into parenthood and separation, our lack of more significant differences may partly result from weak statistical power. Thus, in the case of these outcomes, we would need a larger sample to gain more accurate results. Attrition in the Pairfam panel sample could also cause biases, for instance, if those who separate then drop-off before the subsequent survey wave. Despite these limitations, our study makes an important contribution to the field because prior studies on the association between meeting online and family-related outcomes are scarce.

In summary, the present study found that when it comes to family-related outcomes between those who met their partner online and offline, differences exist between birth cohorts. Overall, there were few significant associations in family-related outcomes between those who met online and those met offline, and these were somewhat contradictory between the oldest and the youngest birth cohorts. Future studies should test whether cohort differences exist in other countries as well.

Acknowledgements

This paper uses data from the German Family Panel pairfam, coordinated by Josef Brüderl, Sonja Drobnič, Karsten Hank, Bernhard Nauck, Franz Neyer, and Sabine Walper. pairfam is funded as long-term project by the German Research Foundation (DFG). Analyses are based on data from the first eight waves of the German Family Panel (pairfam), release 8.0 (Brüderl et al., 2017). A detailed description of the study can be found in Huinink et al. (2011).

Disclosure statement

No potential conflict of interest was reported by the author(s).

Funding

This project has received funding from the European Research Council (ERC) under the European Unions Horizon 2020 research and innovation programme (grant agreement no. 694262), project DisCont - Discontinuities in Household and Family Formation. In addition, this work was supported by the Academy of Finland (grant nos. 331400, 316229, 317808, 320162, and 325857) and Kone Foundation, H2020 European Research Council and Koneen Säätiö.

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Appendices

Table A1. All heterosexual respondents who met new partners between 2011 and 2016 through online venues (%).

	Wave 4 2011/12	Wave 5 2012/13	Wave 6 2013/14	Wave 7 2014/15	Wave 8 2015/16
Other	89	88	85	83	79
Met online via partner finding service	3	3	4	5	8
Met online via social networks, chat rooms, etc.	7	9	12	13	13
Total (n)	875	722	570	470	426

Table A2. Associations between intentions to have a first child and meeting venue.

	Coeff.	<i>p</i>	95% CI lower	upper
Intentions to have a first child				
No (ref.)				
Yes	0.22	0.001	0.09	0.34
Cohort				
1991–1993 (ref.)				
1981–1983	0.05	0.569	−0.13	0.24
1971–1973	−0.17	0.661	−0.94	0.59
Intentions to have a first child x cohort				
Intentions x 1991–1993 (ref.)				
Intentions x 1981–1983	−0.17	0.059	−0.34	0.01
Intentions x 1971–1973	−0.12	0.758	−0.85	0.62
Gender				
Male (ref.)				
Female	−0.02	0.455	−0.08	0.04
Age at interview				
Age at interview	0.00	0.881	−0.02	0.02
Currently living in East Germany				
No (ref.)				
Yes	0.02	0.628	−0.05	0.08
Highest education				
Currently enrolled (ref.)				
Primary and lower secondary	0.00	0.959	−0.09	0.09
Upper secondary	0.06	0.141	−0.02	0.15
Post-secondary	−0.01	0.857	−0.11	0.09
Tertiary	0.12	0.093	−0.02	0.26
Ethnicity				
German native (ref.)				
Ethnic-German immigrant	0.07	0.361	−0.08	0.21
Half-German	−0.05	0.420	−0.17	0.07
Turkish background	−0.11	0.415	−0.36	0.15
Other non-German background	0.10	0.101	−0.02	0.22
Partner				
Same partner (ref.)				
New partner	0.01	0.885	−0.07	0.08
Relationship duration (in months)	−0.001	0.359	−0.002	0.001
Marital status				
Not married/civil union (ref.)				
Married/civil union	0.07	0.563	−0.17	0.30
Extraversion	−0.01	0.187	−0.01	0.00
Neuroticism	0.00	0.767	−0.01	0.01
Agreeableness	0.00	0.879	−0.01	0.01
Conscientiousness	0.00	0.708	−0.01	0.01
Openness	−0.01	0.137	−0.01	0.00

Note: In addition to other covariates, we controlled for the time period (in months) between the baseline and outcome measure interview.

Number of observations: 721 number of groups: 590.