

Right on target? A study of realization of fertility intentions using linked survey-register data

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Introduction and prior research

More than half a century ago, demographers started to ask questions about future childbearing plans. Nowadays, one or more such questions seem to be routine in nearly all family and fertility surveys. The discussion of the usefulness of asking about fertility intentions and plans is, however, old too (see for instance Ryder 1973; Miller and Pasta 1995; Bongaarts 2001). This paper extends our knowledge about realization of fertility intentions using a *unique combination of Norwegian survey and register data covering the last 30 year period*.

Our contribution to the literature

The paper will answer three main research questions. First, we ask how powerful reported fertility intentions are as predictors of future behaviour, both at the individual and the aggregate level. Most studies confirm that there is a rather weak relationship between stated fertility expectations and subsequent births on an individual level. There is, however, one important exception. Women who say they do not expect to have a(nother) child seem to be highly trustworthy (Noack and Østby 2001; Toulemon and Testa 2005). Analyzed on an aggregate level there is a higher degree of consistency due to bias cancellation (Quesnel-Valle and Morgan 2003).

Second, we ask which social groups are most and least successful in reaching their intended fertility, and in what social *contexts* such reproductive goals are most easily attained. In effect, what are the social-demographic determinants of hitting the target? Some studies indicate that people with higher education more often reach their reproductive target than those with lower education (Toulemon and Testa 2005), but this is not confirmed using Norwegian data (Noack and Østby 2001). Another important question is the impact of attitudes towards gender equality and the organization of the household in matters such as sharing of housework. Couples' work/life balance is likely to be of importance as a first or additional child represents a substantial increase in household chores, and expectations about how these tasks will be shared between the partners are likely to shape fertility decision-making. The couple's union type (marriage or cohabitation) does not seem to vary with the success in reaching reproductive targets. Cohabitants are, however, a heterogeneous group and some

studies underline the importance of distinguishing between cohabitants with and without plan to marry (Brown and Booth 1996; Wiik, Bernhardt and Noack 2008). Finally, there might be a “threshold duration” for relationships so that when a couple has accumulated enough experience in the current union, their intentions hold significantly more predictive power compared to those who have yet to stay together for that long.

Finally, we also study whether the likelihood of reaching one’s reproductive target has declined since 1977. This is an important question, given the strong forces that now shape the lives of women of reproductive age. If the level of discrepancy between intention and behaviour has increased, this will suggest that it has become more difficult over time to reach one’s reproductive goal, perhaps due to a lower fecundity due to a later age at start of childbearing, the higher rates of divorce and dissolution of cohabitation that prevails over much of the industrialized world, more demands from employers, more flexible labour markets, in combination with women’s own career ambitions, or other factors at the societal level. Such knowledge might have important policy implications. If, however, fertility intentions and ideals decline, reaching reproductive goals will actually become easier. Most studies of intentions and subsequent behaviour are based on panel studies, studies which are relatively seldom and where non-response represents a serious challenge to the validity and reliability of results. Using a unique combination of survey data and register-based follow-up which is available in Norway, we can make strong claims about how powerful fertility intentions are on aggregate level as well as an individual level without panel mortality.

Our data are from Norway, which is a particularly interesting case, as the Scandinavian welfare state assumes relatively more responsibility for the family domain than in other countries. In addition the fertility in Norway is rather high and has been relatively stable for the last decades. Compared to most European countries Norway has also had a prosperous economy in the recent years, which has made it easy for younger generations to start living by their own and start family building.

Methodology and data

A major advantage of this project is the unique data which are available in Norway. Each resident living in Norway has his or her own personal ID number, and this number identifies the individual in public registers (see Røed and Raaum 2003 for more information on this type of data). The registers cover all demographic events that takes place in Norway, all educational activity and attainment, income and taxation, as well as uptake of various social security benefits (such as unemployment) and more. This allows us to obtain information on the behavior of persons interviewed earlier without re-interviewing the same respondents. In this way, we can easily link survey data on fertility intentions taken at one time point to childbearing histories and other time-varying register data on a variety of life domains that cover the period after the interview and up to now. At the same time we also avoid

all problems related to sample attrition, non-response and other problems that plague regular panel surveys.

Our data on fertility intentions come from three surveys. The latest is the New Families Survey, a nationally representative survey taken by Statistics Norway in 2003. The sample consists of men aged 23 to 47 and women aged 20 to 44 who had at least one Norwegian-born parent (N=6,317). The overall response rate was 63.3 %, which is as expected for a postal survey like this. The survey included three questions about fertility intentions. All respondents were asked if they intend to have children in the years to come. Those who answered positively were also asked how many children they intended to have and when they wanted their first/next child (within 1 year; 1-2 years; 3-4 years; 5 years or longer; no such plans). Similar data are also found in the two other surveys, the Norwegian version of the World Fertility Survey taken in 1977 and the Norwegian Family and Fertility Survey taken in 1988.

Our data on subsequent behaviour comes from national registry data. We follow up the survey respondents with information from the registers on their fertility behaviour following the survey dates. This information is very accurate and reliable, as it is reported by administrative systems and not the respondents themselves. For the 2003 survey, we can also follow the respondents' marital histories and changes in other domains such as economic activity and education. Linked together the data provide a very detailed picture of Norwegian women's fertility intentions and their realization of those intentions from late 1970s up to 2008.

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