Married to Your Health Insurance: The Relationship between Marriage, Divorce and Health Insurance.

Extended Abstract

Introduction:

As of 2007, 45.7 million Americans had no health insurance, including 8.1 million children under the age of 18 (U.S. Census Bureau, 2008). Americans lacking health insurance experience well known problems related to health, health care access and financial stability. They receive less preventive care, are diagnosed at later stages of diseases, have higher mortality, and are more likely to be admitted to the hospital after visiting the emergency room. In this paper we focus on the risk of losing or gaining health insurance coverage due to divorce.

In the U.S. health insurance is most frequently provided through an employer. Data for 2005 show that 32 percent of those under age 65 are covered as the primary beneficiary through their employer's health insurance plan and 30 percent are covered as a dependent (Pollitz, 2006). Medicaid or other public programs provide insurance for 15 percent of Americans, and only 5 percent are covered through private non-group plans.

Because many individuals receive health insurance as dependents on their spouses' health insurance plans, we would expect health insurance rates to decrease after divorce as this source of insurance is no longer available. Some previous research supports this hypothesis, though work in this area has been very limited. In the only publication we are aware of looking at the relationship between marital status change and health insurance, Zimmer (2007) finds that women are 13 percentage points more likely to lose insurance after a divorce compared to women who remain married. A 2002 working paper (Willis and Weir 2002) found that near elderly divorced or never married women were less likely to be insured that married women, but more likely to be insured than widows.

Family structure is an important determinant of the likelihood of having health insurance for children as well. Weinick and Monheit (1999) found that one-fifth of children in single parent families, including both those whose parents were previously married and whose parents never married, were uninsured. In contrast, children in intact homes were the least likely to be uninsured (Monheit and Cunningham 1992). These children are more likely to be covered by private insurance. Heck and Parker (2002) found that 34.8 percent of single-mother families have employer-sponsored insurance, compared to 71.2 percent of two parent families.

Hypotheses:

These are the hypotheses that we test:

1. Women are more likely than men to be covered as a dependent, so we expect health insurance coverage to fall after marital dissolution more for women than for men.

2. Because children can still be covered as dependents on the non-custodial parent's policy and because public health insurance programs are more available for children, we expect marital dissolution to have a smaller effect on children's coverage than on women's coverage.

3. In the months after dissolution we expect some recovery in the coverage status for men, women, and children as they switch from dependent coverage to either primary employer based coverage or public health insurance. The degree and speed of recovery is likely to be positively related to the adult's employment status and job characteristics, so we expect the speed and degree of recovery to be greater for men than for women and greater and for those with more education.

4. We expect that the degree of loss in health insurance for children whose parents divorce and the speed of recovery after dissolution will be positively related to the generosity of the state's eligibility requirements for public health insurance. We expect that the loss in health insurance with marital dissolution will be smaller for more recent historical time periods, as Medicaid eligibility has been expanded and SCHIP programs have been implemented.

5. We expect that the loss in health insurance will be larger at the point of divorce compared to separation, because a spouse is generally eligible to be covered as a dependent until the divorce is finalized.

6. We expect that first marriage and remarriage will increase health insurance coverage. To the extent that rates of marriage have decreased over time for certain groups, we expect to find that insurance rates for those groups of women have fallen over time relative to the population.

Data:

We use data from the Surveys of Income and Program Participation (SIPP). The SIPP are a series of 13 panel data sets collected in various years between 1984 and 2004 (covering years 1984-2007). Each panel interviews a different nationally representative sample of households in the U.S. and includes basic demographic and economic data and information about household members' participation in various public programs. We identify each panel by the year in which the sample was first interviewed (see U.S. Census Bureau, 2001) for more information about these data). For each panel, all individuals in the household over age 15 are interviewed (if they are not available a proxy response is obtained). The interviews take place every four months (SIPP refers to each 4 month interview within a given panel as a 'wave'), and information is collected about certain variables for each of the 4 months in the wave. If original household members over age 15 move to a new address, then they are followed as well. With the exception of one of the panels (1989) that was discontinued in midstream, panels range from 7 to 12 waves with a modal length of 9 waves (almost 3 years). We use data from the 12 completed panels. Depending on the panel, sample sizes range from 14,000 to 46,500 households.

Methods:

Our first task is primarily descriptive. As a baseline, and for comparison with the few other studies that have been done, we first tabulate health insurance coverage by marital status, and we do separate tabulations for men, women, and children (where marital status for children is the marital status of the parents), by race/ethnicity, and for different time periods.

For the analysis of the transition from marriage to separation or divorce, we begin by identifying the sample of men and women who report being married in the first wave of each panel and who subsequently report being divorced or separated before the end of the panel. We also identify the children in those families. We then label the month in which they first report being either divorced or separated as month zero. Depending on the timing of marital dissolution, for panels of 9 waves (33 months), the data will include up to 32 months of data prior to marital dissolution (for those who report a marital dissolution late in the panel) or 32 months after marital dissolution (for those who report a marital dissolution early in the panel). Finally, we calculate the incidence of health insurance coverage and the type of health insurance coverage for each available month prior to and after marital dissolution. Note that because the timing of marital dissolution differs across individuals in our sample, each month (say, from -32 to 32) will contain a different number of individuals. The median dissolution occurs in month 18 of the panel, so more than half of the dissolutions that occur will have data for at least 12 months after dissolution. We also break down our results by type of insurance, as we expect that individuals will

primarily be losing dependent private coverage. Finally we run regressions using those who remain married for the entire panel as a control group and using propensity score matched samples.

Preliminary Findings:

Figure 1 shows results from a preliminary analysis all three panels that we use. Our sample size of individuals less than age 65 who report being married in wave 1 of the 2001 panel and then divorced or separated before wave 9 is 4665 (1466 men, 1907 women and 1292 children). Health insurance coverage for women begins to fall about 6 months prior to marital dissolution from about 84 percent sixmonths before the marital dissolution to 80 percent six months after.. Women's rates continue to fall reaching a low of 77 percent 18 months after the dissolution. For men, insurance coverage also begins to fall about a yearprior to dissolution from 83 percent to 79 percent at the time of dissolution. Men experience a significant recovery, reaching 81 percent by 18 months after the dissolution. Additionally, we find that children experience changes similar to those of women. Because the sample size gets smaller as the duration before or after dissolution increases, to minimize differences in sample composition over time we will concentrate our analysis on the 18 months surrounding the dissolution (note that two of the panels—1996 and 2004—follow individuals for four years, and we can use data from those panels to analyze what happens at longer durations following marital dissolution).

Reults on Request:

We use two methods taken from the program evaluation literature to estimate the causal relationship between our outcomes of interest (coverage rates, type of coverage, and the time path of coverage relative to marital status change) and a set of variables that capture employment and remarriage prospects and state policies relating to Medicaid, SCHIP, child support and welfare. The first is a difference in difference estimator and the second is based on propensity score matching techniques. Our sample includes all individuals who are married in wave 1 of a given panel. Some of them will remain married throughout the panel, and these are our control group. Others will experience a marital dissolution (treatment group). Our results for both the difference in difference estimator and the propensity score matching will be interpreted as the difference between the health insurance coverage (or type) for the treatment group compared to the control group at various times before and after marital dissolution (or a comparable time period for the control group).

For the difference in difference analyses that look at the dichotomous indicator of having any health insurance we use a logit specification, and for those analyses that look at the type of coverage we use a multinomial logit specification. Because we are particularly interested in the time path of health insurance change relative to the timing of marital dissolution we will use a flexible functional form to capture changes in health insurance coverage during the period prior to and after marital dissolution. Our specification in equation 1 follows that of Couch and Placzek (forthcoming) who estimate earnings losses of displaced workers before and after displacement. Our analysis is a straightforward extension of the models used in their work since there is a direct parallel between longitudinally studying outcomes for displaced workers (who suffer a separation from their firm) vs. those affected by marital change (a separation or divorce from a spouse), except that our dependent variable is binary and the model will be estimated using an appropriate technique. The general equation is of the following form:

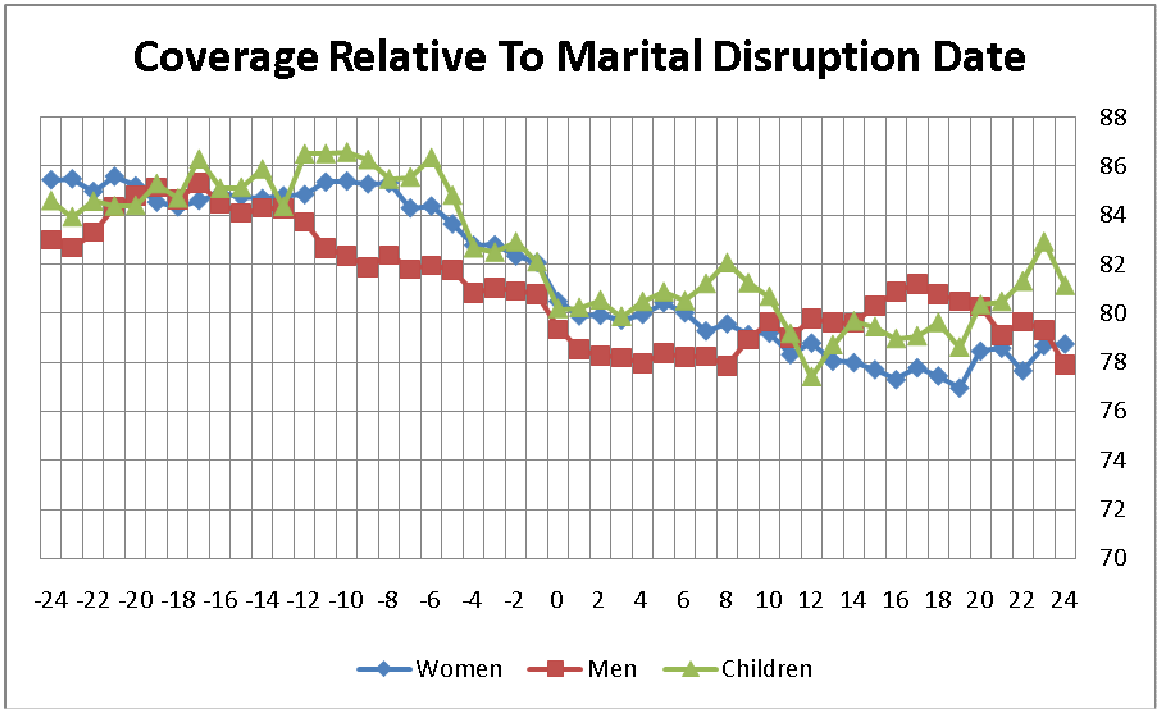
$$(1)\ HIit = \alpha i + \gamma t + Xit\beta + \Sigma k(Dkit\delta k) + \varepsilon it$$

In this equation, HI is health insurance status at for person *i* at time *t*; αi is the individual fixed effect; γt is a set of year dummies; k indexes a set of monthly dummy variables, Dit, that indicate the time period around marital dissolution and begin a year prior to divorce or separation. The parameters δk capture the impact of marital dissolution before during and after the event; and εit is a stochastic error term. To estimate the effect of our time-varying policy variables such as Medicaid expansions and indicators of the employment environment on the impact of divorce on health insurance, we interact these variables with

the set of dummy variables, Dit. These models are estimated separately for different types of health insurance and for different populations (women, men and children).

In addition to the variables that capture the time path, X is a matrix of individual and family socio-economic characteristics such as education, race/ethnicity, age at the start of the panel, number of children in the household, and whether the family in wave 1 reflects a blended family or whether all children in the household have the same mother and father. When individual fixed effects are included, the X vector consists only of time varying characteristics. But in order to see if the time path of health insurance is altered by the time invariant characteristics, we also interact the Dit variables with characteristics like race and education.

In the fixed effects regression specification above, those who eventually divorce are compared to all those who remain continuously married (with appropriate regression adjustments for observable differences in other predictors of health insurance). As an alternative method, we follow Couch and Plazeck (forthcoming) again and propose to use propensity score matching techniques to find a continuously married individual who is very similar to an individual who experiences a marital dissolution (or who experiences the marital dissolution of a parent, for the analyses of children). Propensity scores are calculated from a regression estimating the probability that a given individual will experience a marital dissolution. Individuals are grouped by similarity of propensity scores so that the control group is picked more appropriately when estimating the regressions above.



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