

ASSESSMENT OF SURVEY DATA FOR THE ANALYSIS OF MARRIAGE AND DIVORCE AT THE NATIONAL, STATE, AND LOCAL LEVELS

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EXECUTIVE SUMMARY

Whether they are assessing options for reforming Social Security, contemplating changes to the tax code, or trying to improve the well-being of children, policy makers require an accurate assessment of trends in marriage, divorce, and other living arrangements. Historically, vital statistics data collected at the state and local levels and consolidated by the National Center for Health Statistics (NCHS) provided the most complete information on marriage and divorce rates. These data were based on administrative records of actual marriages and divorces that occurred in the reporting jurisdictions. In 1996, however, NCHS discontinued funding to states for the collection of detailed marriage and divorce data; NCHS continues to collect counts.

The Administration for Children and Families and the Office of the Assistant Secretary for Planning and Evaluation, within the U.S. Department of Health and Human Services (DHHS) contracted with the Lewin Group and the Urban Institute to explore options for collecting marriage and divorce information. This report examines the feasibility and potential benefits of using existing survey data sets to provide reliable, timely information on marriage and divorce. It assesses the ability of a variety of data sets to produce marriage and divorce statistics at the national, state, and local levels. The main criterion is whether the existing survey data sets provide or can be modified to provide information on marriage and divorce rates, as was collected under the vital statistics system.

To identify survey data sets that have the greatest potential for collecting marriage and divorce statistics, the research team established five evaluation criteria. These criteria are used to assess the surveys' overall relevance and potential for providing marriage and divorce rates over time. The criteria are: (1) relevancy – survey data can be used to calculate marriage and divorce rates, (2) reliability – survey design is likely to provide estimates of marriage and divorce rates that match an external source, (3) representativeness – survey captures broad U.S. population and survey provides state and/or local level estimates, (4) ongoing – survey is planned to continue into foreseeable future, and (5) contains correlates of interest – survey includes correlates and outcomes of interest to research and policy communities. Based on these criteria, three data sets are identified as having the greatest potential for measuring marriage and divorce statistics. These data sets are:

1. The American Community Survey (ACS)
2. The National Survey of Family Growth (NSFG)
3. The Survey of Income and Program Participation (SIPP)

A summary of these three primary data sets is provided in **Exhibit 3** of the report and the questions that these three data sets ask about marriage and divorce are presented in **Appendix B**. In addition, **Appendix A** summarizes information about the 17 other data sets examined but determined not to be strong data sets for measuring marriage and divorce. Selected information about the three key data sets is presented below.

American Community Survey (ACS)

- The ACS is a cross-sectional survey that is replacing the Decennial Census long form and is planned to continue annually. The most recent ACS data available is for 2006.

- Prior to the 2008 questionnaire, the ACS had a single question on current marital status, so could not be used to calculate marriage and divorce rates. Beginning in 2008, the ACS questionnaire includes retrospective questions on marriage and divorce that can be used to calculate marriage and divorce rates.
- State-level marriage and divorce rates can be computed for all 50 states and the District of Columbia on an annual basis. Estimates for most counties are available using three years of pooled data and Census tract-level estimates are available with five years of pooled data.
- The survey samples approximately 3 million addresses per year and includes persons living in military barracks and institutions.
- The ACS provides information on the demographic characteristics, program participation, and economic status of households, although the correlates are more limited set than what is available in the SIPP and NSFG.

National Survey of Family Growth (NSFG)

- The NSFG is a cross-sectional survey that provides retrospective information on marriage, divorce, and cohabitation. These retrospective histories allow marriage and divorce rates to be calculated.
- The NSFG includes the civilian noninstitutionalized population between the ages of 15 and 44, and can provide estimates of marriage and divorce rates for this population at the national and regional levels (four Census regions). The NSFG can be used to calculate national marriage and divorce rates but cannot be used to calculate marriage and divorce rates at the state or local level.
- NSFG data are currently available from six cycles (1973, 1976, 1982, 1988, 1995, and 2002) and a seventh cycle is underway (2006-2010). The first data from Cycle 7 is expected to be released in late 2009.
- The sample size for the 2002 NSFG sample was 12,600. Cycle 7, which will be administered continuously from 2006 through 2010, is expected to have a total sample size of 20,000, with an average of 5,000 interviews per year.
- The NSFG provides information on many correlates of marriage, divorce, and cohabitation. This includes questions on attitudes toward marriage, parenthood, and gender roles, as well as family planning practices, pregnancy, and birth histories.

Survey of Income and Program Participation (SIPP)

- The SIPP is a longitudinal data set that also collects retrospective information on marriage and divorce, and thus, marriage and divorce rates can be calculated.
- Each SIPP panel is a nationally representative sample of the U.S. civilian non-institutionalized population. The SIPP can only provide reliable estimates of marriage and divorce rates at the national level and for the four Census regions.

- SIPP panels began annually from 1984 to 1993 and in 1996, 2001, and 2004; panels are typically two to four years in length. A 2008 panel is planned and a re-design of the SIPP instrument is underway.
- The SIPP only provides reliable estimates of marriage and divorce rates once in each panel, or every three to five years
- The 2004 SIPP panel is the largest panel to date and includes 46,500 households. The 1996 and 2001 SIPP panels include 36,800 and 35,100 households, respectively.
- The SIPP provides a wide variety of correlates beyond demographic characteristics, including benefit reciprocity, employment, and fertility histories, as well as child and adult well-being.

I. INTRODUCTION

Whether they are assessing options for reforming Social Security, contemplating changes to the tax code, or trying to improve the well-being of children, policy makers require an accurate assessment of trends in marriage, divorce, and other living arrangements. Historically, vital statistics data collected at the state and local levels and consolidated by the National Center for Health Statistics (NCHS) provided the most complete information on marriage and divorce rates.¹ These data were based on administrative records of actual marriages and divorces that occurred in the reporting jurisdictions. Prior to 1996, the federal government provided more financial support to states to collect marriage and divorce data. In 1996, NCHS discontinued funding for the collection of detailed marriage and divorce data for a number of reasons.² First, there were resource constraints. By ending funding to states for the collection of detailed marriage and divorce data, the agency was able to redirect \$1.25 million per year to maintaining birth and death data systems. Second, there were coverage and quality concerns. NCHS was not consistently receiving data from all states. Similarly, the quality of the data never rose to the level expected by NCHS or researchers. Data reporting was often incomplete or of uncertain reliability. States were facing staffing shortages and internal funding issues, resulting in many relegating the reporting and collection of marriage and divorce data to a lower priority than birth and death data. Finally, the collection of marriage and divorce information was an uneasy fit for an agency that focuses on health statistics. Few NCHS staff worked with marriage and divorce data; thus, when the budget needed to be cut, there were few advocates for the continuation of its collection. In addition, staff argued that the data could be captured in surveys, such as the National Survey of Family Growth, and in Census data. As a result, the quantity and quality of national, state, and local information on marriage and divorce deteriorated while policy makers' need for this information increased.

The Administration for Children and Families and the Office of the Assistant Secretary for Planning and Evaluation, within the U.S. Department of Health and Human Services (DHHS) contracted with the Lewin Group and the Urban Institute to explore options for collecting marriage and divorce information. This report examines the feasibility and potential benefits of using existing survey data sets to provide reliable, timely information on marriage and divorce.³ It assesses the ability of a variety of data sets to produce marriage and divorce statistics at the national, state, and local levels. The main criterion is whether the existing survey data sets provide or can be modified to provide information on marriage and divorce rates, as was possible using data collected under the vital statistics system.

Beyond their potential to provide information on marriage and divorce rates, survey data sets can also provide information on current marital status, alternative living arrangements such as cohabitation, and the correlates of marriage, divorce, and other living arrangements.

This report first describes criteria for evaluating survey data sets on their ability to provide information on marriage and divorce. It then highlights three data sets that were

¹ NCHS is part of the Centers for Disease Control and Prevention, an agency within the U.S. Department of Health and Human Services (DHHS).

² NCHS still provides states with a small amount of financial support to collect and send to NCHS basic counts of marriages and divorces.

³ A separate project report explores the vital statistics system. Lewin Group. Collection of Marriage and Divorce Statistics by States. Final report to U.S. Department of Health and Human Services. April 2008.

identified as being most likely to meet these criteria and capture marriage and divorce information, although some require modifications. These three data sets are:

1. The American Community Survey (ACS)
2. The National Survey of Family Growth (NSFG)
3. The Survey of Income and Program Participation (SIPP)

Many other data sets have merit but do not adequately meet the criteria established for this assessment; information on these data sets, along with the criteria they failed to meet, appears in **Appendix A**. Within the presentation of the three preferred data sets, the report discusses potential modifications that could improve their usefulness.

II. CRITERIA FOR EVALUATION

To identify survey data sets that have the greatest potential for collecting marriage and divorce statistics, we establish five evaluation criteria. These criteria are used to assess the surveys' overall relevance and potential for measuring marriage and divorce. Failure to meet all five criteria does not imply the data are not useful for measuring marriage and divorce. Rather, we use information gathered from these assessments to explore ways to modify the data sets to best meet these criteria. The criteria are:

1. Relevancy: Survey data can be used to calculate marriage and divorce rates
2. Reliability: Survey design is likely to provide estimates of marriage and divorce rates that match an external source
3. Representativeness:
 - Survey captures broad U.S. population
 - Survey provides state and/or local level estimates
4. Ongoing: Survey is planned to continue into foreseeable future
5. Contains correlates of interest: Survey includes correlates and outcomes of interest to research and policy communities

Below, each of these criteria and the justification for considering them is discussed.

Relevancy: Survey Data Can Be Used to Calculate Marriage and Divorce Rates

The U.S. vital statistics system provided marriage and divorce rates, so this criterion evaluates the extent to which survey data can provide this information. Calculating marriage and divorce rates (the number of marriages and divorces per 1,000 people in a particular year) requires information on marital status over time. Specifically, marriage rates are calculated by identifying individuals who transition from being not married (last year) to married (this year), and divorce rates are calculated by identifying individuals who were married last year but are divorced this year. Alternatively, these rates can be calculated if the survey asks individuals about their marital histories (i.e., if and when they married and divorced). Surveys that only provide information on marital status at a single point in time cannot be used to calculate marriage and divorce rates; however, these data do provide important information about the marital status of the U.S. population (e.g., the percent currently married or currently divorced).

Whether and how a survey can be used to calculate marriage and divorce rates depends on its design. Survey data can be grouped into four design categories: (1) cross-sectional (i.e., single point in time) surveys that do not include retrospective relationship information; (2) cross-sectional surveys that include retrospective relationship information; (3) longitudinal (or panel) surveys that track the same individuals over time but provide no retrospective information; and (4) longitudinal surveys that also contain retrospective relationship data. These four types of survey data vary in their ability to provide estimates of individuals' marital status at a point in time, transitions in and out of marital (and cohabiting) relationships, and the marital and relationship histories of individuals.

In general, cross-sectional surveys that do not ask about relationship histories can capture marital and cohabitation status at a point in time but provide no information on changes in marital status. Thus, marriage and divorce rates cannot be calculated. This is a significant drawback of these data. In contrast, cross-sectional surveys that specifically ask about past marriages and divorces provide information on both current marital status and changes in status, allowing marriage and divorce rates to be calculated.

Longitudinal data sets that ask about marital status multiple times during the panel can capture current relationship status as well as changes that occur during the time survey respondents are tracked. These longitudinal data, however, provide only a limited window of time in which transitions are captured (i.e., the duration of the panel). Finally, longitudinal data with retrospective information capture current status as well as past and present changes in relationship status.

Thus, longitudinal data sets and data sets that include retrospective marriage and divorce data provide information required to calculate marriage and divorce rates and best satisfy the “relevancy” criterion.

Reliability: Survey Design Likely to Provide Estimates of Marriage and Divorce Rates that Match an External Source

This section examines the reliability of estimates of marriage and divorce rates based on longitudinal and retrospective data. **Exhibit 1** summarizes the advantages and disadvantages of retrospective versus longitudinal data for examining marital transitions and histories.⁴

Retrospective information on marital events generally coincides with information collected in longitudinal data. For example, Lillard and Waite compare the 1985 Panel Study of Income Dynamics (PSID) retrospective data with marital events over the previous 17 years of panel data and find significant agreement between the two.⁵ Retrospective histories require individuals to recall past events while longitudinal surveys capture events shortly after they occur. Although some have argued that retrospective data are prone to recall error and may systematically under-record brief status changes and embarrassing events,⁶ research shows that

⁴ As noted above, some data sets include both retrospective and longitudinal data.

⁵ Lillard, L.A., and L. J. Waite. 1989. “Panel versus Retrospective Data on Marital Histories: Lessons from the PSID.” In *Individuals and Families in Transition: Understanding Change through Longitudinal Data* (243-53). Washington, DC: U.S. Bureau of the Census.

⁶ Bumpass, L., K. Raley. 2007. “Measuring Separation and Divorce.” In *Handbook of Measurement Issues in Family Research*, edited by Sandra L. Hofferth and Lynne M. Casper (125-44). Mahwah, NJ: Lawrence Erlbaum Associates.

these data do a fairly good job of capturing marital history. For example, Krieder and Fields compare vital statistics data to retrospective histories collected in a topical module of the 1996 SIPP and find that the SIPP captures 97-98 percent of the total recent marriages.^{7,8} In addition, research suggests the histories were still relatively accurate 10 to 15 years in the past; however, retrospective divorce data are not as accurate as marriage data.⁹ Further, retrospective information on the formation and dissolution of cohabitating unions is expected to be less reliable than changes in marital status.¹⁰

Exhibit 1. Advantages and Disadvantages of Retrospective versus Longitudinal Data

Type of Data	Advantages	Disadvantages
Retrospective Data	<ul style="list-style-type: none"> • Capture more marital events over longer periods of time than longitudinal data • Covers a more representative sample than longitudinal data 	<ul style="list-style-type: none"> • May be prone to recall error • Underreports brief status changes or sensitive information • Data not as accurate for measuring divorce as marriage • Less reliable data on formation and dissolution of cohabitating unions than changes in marital status
Longitudinal Data	<ul style="list-style-type: none"> • Captures events as they occur • Measures correlates of marital events at time of occurrence • Useful for examining causes and consequences of changes in marital status • May be more reliable than retrospective data for capturing changes in cohabitation 	<ul style="list-style-type: none"> • Attrition bias • Marital status may change multiple times between waves of a panel • Does not capture complete marital histories

There are several drawbacks to using longitudinal (i.e., panel) data to study marital events. First, the participants who drop out of longitudinal studies may be more unstable than those who remain, leading to attrition bias.¹¹ It is not uncommon for individuals to exit panel surveys at a time of separation or divorce, leading to under-representation of marital status changes. Evidence of this comes from the 1986 panel of the SIPP where the divorce/separation rate of couples when neither spouse exited the survey was around 2 percent compared with 60

Lillard, L.A., and L. J. Waite. 1989. "Panel versus Retrospective Data on Marital Histories: Lessons from the PSID." In *Individuals and Families in Transition: Understanding Change through Longitudinal Data* (243-53). Washington, DC: U.S. Bureau of the Census.

⁷ Kreider, R. M., and J. M. Fields. 2002. "Number, Timing, and Duration of Marriages and Divorces: 1996." Current Population Reports, Series P-70, No. 80. Washington, DC: U.S. Bureau of the Census.

⁸ The Survey of Income and Program Participation is discussed in detail in Section IV.

⁹ Kreider, R. M., and J. M. Fields. 2002. "Number, Timing, and Duration of Marriages and Divorces: 1996." Current Population Reports, Series P-70, No. 80. Washington, DC: U.S. Bureau of the Census.

¹⁰ Manning W., and P. Smock. 2003. "Measuring and Modeling Cohabitation: New Perspective from Qualitative Data." Center for Family and Demographic Research Working Paper #2003-10. Their findings suggest that because cohabitation is sometimes not a deliberate decision, there may not be a clear beginning and end date of cohabitation, and couples may have a difficult time remembering when they started cohabiting.

¹¹ Lillard, L.A., and L. J. Waite. 1989. "Panel versus Retrospective Data on Marital Histories: Lessons from the PSID." In *Individuals and Families in Transition: Understanding Change through Longitudinal Data* (243-53). Washington, DC: U.S. Bureau of the Census.

percent for longitudinal panel members where one spouse left the panel.¹² Similarly, longitudinal data sets may become less representative of the overall population after the initial year as the population changes due to factors such as immigration. Another drawback of panel surveys that only ask current marital status is that marital status may change multiple times between waves of a panel study. Finally, longitudinal data only span the time in the panel and cannot cover individuals' complete marital histories. It is important to note, however, that panel data may be preferred to retrospective data in the case of cohabitation, as individuals' recall related to when cohabiting unions began and ended might be less accurate than their recollection about when a marriage or divorce occurred.

In general, retrospective histories can capture more marital events over longer time periods and for more representative samples of the population than longitudinal data. Longitudinal data, however, measure the correlates of marital events at the time they occur and are more useful for examining the causes and consequences of changes in marital status than retrospective histories.¹³

Representativeness: Survey Data Capture Broad U.S. Population and Provide State and/or Local Level Estimates

Ideally, survey data would provide marriage and divorce rates for the entire U.S. population, as well as for states and localities. However, even broad-based national surveys may exclude some populations from their sample universes (e.g., persons in institutions), and others may target specific population subgroups (e.g., adolescents). The evaluation of this criterion considers the degree to which the sample population is restricted to a subset of the total U.S. population. For example, a survey that includes individuals' ages 15 to 45 is more useful for providing marriage and divorce data and has a greater potential for modification (i.e., it would likely be easier and more straightforward to modify) than a survey that focuses on adolescents only.¹⁴

In addition to the particular population selected for the survey, a second issue arises when considering longitudinal data sets: the extent to which these data continue to represent the U.S. population in the years after the sample population is initially drawn. For example, a sample population drawn in the 1960s will not be representative of the current U.S. population because of compositional shifts, such as the change in the immigrant population (both in terms of number and country of origin). For this reason, long panels that do not include refresher samples to account for changes in the composition of the U.S. population will not meet this criterion.

Finally, the goal is to have survey data that provide marriage and divorce statistics at the national, state, and local levels. To calculate state-level marriage and divorce rates, for example, it is not enough for a data set to simply identify individuals' state of residence. Rather, the sample size and sample design must be such that the data set has a sample that is

¹² Hill, D. H. 1997. "Adjusting for Attrition in Event-History Analysis." *Sociological Methodology* 27: 393-416. Further information on attrition-related biases in the PSID and SIPP can also be found in Beckett et al. (1988), Fitzgerald, Gottschalk, and Moffitt (1998), Lillard and Panis (1998), and Zabel (1998).

¹³ There are other issues that could be considered here, such as the survey response rates and the permissibility and use of proxy responses. These issues are addressed in the discussion of selected data sets in Section IV below.

¹⁴ Surveys that are not broadly representative can, nonetheless, be useful for examining outcomes for specific population subgroups (e.g., adolescents, a single birth cohort, or new parents).

"representative" of the state's population. The same is true for other geographic areas. Further, the goal is to have data sets that provide information on a large portion of the U.S. population. A data set that is specific to one state or selected cities, for example, is not particularly useful for measuring marriage and divorce statistics to the extent that vital statistics once provided these data.

Ongoing: Survey Planned to Continue into Foreseeable Future

The goal of this study is to identify survey data sets that can be used to calculate marriage and divorce statistics in the coming years. Focusing on ongoing surveys and identifying ways in which these surveys can be modified to provide the information of interest is considerably less expensive than proposing new survey efforts. However, it is also useful to review discontinued surveys because they help identify ways to modify ongoing survey efforts to reach the data goals. Ideally, the data sets would provide information on an annual or biennial basis, and there would not be a long lag between data collection and release.

Surveys implemented on an ongoing basis provide information from which to evaluate changes in marriage rates over time. However, marriage and divorce are relatively rare events, so detecting small changes over time requires relatively large samples. The annual marriage rate for males and females ages 15 and older, for example, is roughly 25 per 1,000 persons (or 2.5 percent).¹⁵ With an annual sample size of 10,000, one has an 80 percent chance of detecting a change in the percent of people married of at least 0.56 percentage points.¹⁶ In other words, one can expect that samples will lead to a statistically significant difference when the true change is from 2.5 percent to 3.1 percent, but less confident that they will reveal a significant difference when the true change is smaller (e.g., from 2.5 percent to 2.8 percent). With an annual sample size of 100,000, one can be confident of detecting changes of at least 0.18 percentage points. Thus, a large sample is important if a goal is to detect changes over time.¹⁷

These calculations do not imply that marriage rates calculated with modest sample sizes are not useful, only that it is difficult to detect changes over time with modest sample sizes. The precision of the estimated marriage rate within a year is much greater. If the marriage rate is calculated with a survey sample size of 10,000 and the estimated percentage of people who get married is 2.5 percent, then one can be 90 percent confident that the true percentage falls within 0.26 percentage points of the estimated value – or between 2.24 percent and 2.76 percent.

¹⁵ Clarke, S.C. Advance Report of Final Marriage Statistics, 1989 and 1990. *Monthly Vital Statistics Report* 1995; 43(12): 7. The numbers reported are for 1990 – the marriage rate for males and females ages 15 and older were 26.0 and 24.1 per 1,000 persons, respectively.

¹⁶ These calculations are based on two criteria that are commonly used by statisticians to assess a proposed sample size. First, the significance level is set at 10 percent. That is, if no true change exists, one should find statistically significant differences less than 10 percent of the time. A two-tailed test is used. Second, the "power" is set to 80 percent. That is, if a true difference exists, we require at least an 80 percent chance of finding a statistically significant difference in the sample. These two criteria are then used to calculate the smallest change for which our proposed sample has at least an 80 percent chance of finding "statistically significant" difference. Note that these calculations are based on the Poisson distribution and assume that the sample is randomly drawn.

¹⁷ Similar issues arise if one was evaluating differences in marriage rates across states.

Contains Correlates of Interest: Survey Includes Correlates and Outcomes of Interest to Research and Policy Community

In addition to having data to calculate marriage and divorce rates at the national, state, and local level, survey data would ideally include information necessary to calculate these rates for different subpopulations (such as by age, gender, race/ethnicity, immigration status, and urban versus rural). As a result, this criterion considers the extent to which survey data sets include these characteristics. Beyond this, many in the research and policy community are interested in understanding and researching the relationship between marriage and divorce and outcomes such as participation in public assistance programs, families' economic and material well-being, and children's well-being. With these data, for example, one could study the impact of divorce on children's well-being. For this reason, this review considers the extent to which data sets include characteristics of families and children that may affect or be affected by marital status and changes in marital status. Finally, data sets that measure marital and relationship quality are examined. However, since having detailed correlates is not important for calculating marriage and divorce rates, this criterion is considered a secondary criterion.¹⁸

Summary

The five evaluation criteria – relevancy, reliability, representativeness, ongoing, and containing correlates of interest – serve as a framework for assessing how effectively survey data sets can be used to compute information comparable to vital statistics and to analyze the correlates and consequences of marriage and divorce. The next section discusses data sets identified as having the greatest potential for providing this information.

III. KEY DATA SETS IDENTIFIED AND THE CRITERIA THEY MEET

Three data sets have been identified as having the greatest potential for measuring marriage and divorce statistics. As noted above, these data sets are the American Community Survey (ACS), the National Survey of Family Growth (NSFG), and the Survey of Income and Program Participation (SIPP). Until recently, none of these data sets met all of the criteria discussed above, nor did they provide data comparable to the pre-1996 vital statistics system. However, with the implementation of changes to the ACS in 2008, the ACS now meets all five criteria. While the NSFG and SIPP do not meet all five criteria, they are important data sets for understanding marriage and divorce. Below, these three data sets are discussed in the context of the five criteria presented above.¹⁹ **Exhibit 2** identifies the criteria that the three data sets meet. More specific information about each of these data sets is presented in **Section IV** below.

¹⁸ All of the surveys examined collect information on basic demographic characteristics (e.g., age, gender, race/ethnicity), which are necessary to calculate marriage and divorce rates for subpopulations.

¹⁹ Appendix A identifies and presents information on 17 other data sets reviewed for this study. These data sets were determined to be relatively weak candidates for providing marriage and divorce statistics comparable to the former vital statistics system.

Exhibit 2: Evaluation Criteria Attained by Key Data Sets

Survey Data Set	Relevancy	Reliability	Representativeness		Ongoing	Correlates
			Broad U.S. Population	State/Local Estimates ¹		
American Community Survey (ACS)	x	x	x	x	x	x
National Survey of Family Growth (NSFG)	x	x			x	x
Survey of Income and Program Participation (SIPP)	x	x	x		x	x

* An x indicates that the data set fulfills the criterion.

¹ The 2004 SIPP panel provides a representative sample of the civilian non-institutionalized population for 30 states, but Census staff caution against using the SIPP to calculate state-level marriage and divorce rates because of sample size concerns. Earlier SIPP panels do not provide a representative sample for any state.

Relevancy: Survey Data Can Be Used to Calculate Marriage and Divorce Rates

All three data sets provide the information needed to calculate marriage and divorce rates. The NSFG is a cross-sectional data set that includes retrospective information on marriage and divorce, thereby allowing marriage and divorce rates to be calculated. The SIPP is a longitudinal data set that also includes retrospective information on marriage and divorce, and thus, marriage and divorce rates can be calculated. Prior to 2008, the ACS, which is a cross-sectional survey, asked only a single question on current marital status, with no information on prior status from which to calculate marriage or divorce rates. Beginning in 2008, however, the ACS questionnaire includes retrospective questions on marriage and divorce that can be used to calculate marriage and divorce rates.

In addition to providing information to calculate marriage and divorce rates, the NSFG and SIPP, unlike the ACS, collect marital histories. These data provide information on marriage duration and allow for analyses of how individuals' transition into and out of marriage over time. The NSFG, for example, has been used to examine the probability that a first marriage dissolves, the probability of remarriage following a divorce, and the probability that a second marriage dissolves.²⁰

Reliability: Survey Design Likely to Provide Estimates of Marriage and Divorce Rates that Match an External Source

All three data sets collect retrospective information on marriage and divorce, and as discussed above, research suggests that retrospective questions provide information that closely resembles vital statistics, particularly for marriage rates. This information is only available from the ACS beginning with the 2008 data, so currently available ACS data cannot be used to calculate marriage and divorce rates. The SIPP's retrospective data is gathered early in the SIPP panel, so that sample attrition is not a serious concern with these retrospective marriage and divorce

²⁰ Bramlett, M.D., and W. D. Mosher. 2002. "Cohabitation, Marriage, Divorce, and Remarriage in the United States." National Center for Health Statistics. *Vital Health Statistics* 23(22). Available at http://www.cdc.gov/nchs/data/series/sr_23/sr23_022.pdf (Accessed February 12, 2008).

data. The SIPP also collects marital status through its longitudinal panel; however, research suggests that the higher rates of sample attrition among individuals who experience a marital disruption lessens the reliability of marriage and divorce rates estimated from longitudinal data.

Representativeness: Survey Data Capture Broad U.S. Population and Provide State and/or Local Level Estimates

The ACS sampling design is superior to the NSFG and SIPP in meeting this criterion. Unlike many surveys, the ACS sample includes persons living in military barracks and in institutions. In addition, the ACS has a very large sample size—3 million households *per year*—and allows for location-specific annual estimates of all areas with 65,000 or more people; this includes all 50 states and the District of Columbia. Further, estimates for most counties are available with three years of pooled data and Census tract-level estimates are available with five years of pooled data.

Each panel of the SIPP is a nationally representative sample of the U.S. civilian non-institutionalized population, so the SIPP sample is slightly more restrictive than the ACS sample. The 2004 SIPP panel is the largest panel to date and includes 46,500 households. Historically, SIPP data could only provide representative estimates at the national level and for the four Census regions.²¹ The 2004 SIPP panel also provides a representative sample for 30 states, but Census staff caution against using the SIPP to calculate state-level marriage and divorce rates. The state sample sizes are modest and marriage and divorce are relatively rare events, so state-level marriage and divorce rates would be based on only a handful of marriages and divorces.

The NSFG is also limited to the civilian non-institutionalized population, and its sample is further restricted by age. The two most recent NSFG cycles (2002 and 2006-10) have the broadest populations the survey has had to date and include men and women between the ages of 15 and 44.²² This restriction on age limits the extent to which the survey captures marriage and divorce activity for the U.S. population. Further, the NSFG cannot be used to produce state- and local-level estimates. It does, however, provide national-level estimates and estimates for the four Census regions.

Ongoing: Survey Planned to Continue into Foreseeable Future

All three surveys—ACS, NSFG, and SIPP—are planned to continue into the future. The frequency with which they will be administered and the speed with which their data will be made available vary considerably across the three data sets. The ACS, which is replacing the Decennial Census's long form, provides annual data on 3 million households. The NSFG has been administered intermittently in the past (1973, 1976, 1982, 1988, 1995, and 2002); however, the current cycle of the NSFG (Cycle 7) has continuous interviewing from 2006 through 2010. Although interviews will occur annually and each year of interviews will be a nationally

²¹ The four Census regions are Northeast, Midwest, South, and West. For more detailed information, see http://www.census.gov/geo/www/us_regdiv.pdf (Accessed February 4, 2008).

²² In earlier cycles, the NSFG sample was also restricted by gender and marital status.

representative sample, NCHS staff (who administer the NSFG) recommend that a minimum of two years of data be used to calculate estimates of marriage and divorce rates (because of relatively small sample sizes—an average of 5,000 per year). NCHS expects that the NSFG will be continuous, collecting data every year, indefinitely.

The most recent SIPP data available is from the 2001 and 2004 panels, which include 36,700 and 46,500 households, respectively.²³ A 2008 panel began in September 2008 and a re-design of the SIPP instrument is also underway. Although the SIPP schedule over the last decade is such that new panels have generally begun as old ones end, the key information on retrospective marital histories is collected only once in each panel. Consequently, the SIPP only provides reliable estimates of marriage and divorce rates once in each panel, or every three to five years.

As discussed in **Section II** above, the size of the survey has implications for detecting differences in marriage and divorce rates over time. The ACS has the largest sample size for determining whether differences over time are statistically significant, followed by the SIPP and then the NSFG.

Contains Correlates of Interest: Survey Includes Correlates and Outcomes of Interest to Research and Policy Community

In terms of correlates and outcomes related to marriage and divorce, the SIPP has a great deal of information related to program participation, economic and material well-being, and child well-being, among other individual and household characteristics. The NSFG also includes many correlates where the focus is on the individual being surveyed, not the family or household. Finally, the ACS provides information on program participation and economic status of the household, although it contains a more limited set of correlates and outcomes than the SIPP and NSFG. **Section IV** below details this information to a greater extent.

Comparison of ACS, SIPP, and NSFG

Currently available SIPP and NSFG data can be used to estimate marriage and divorce rates, although neither data set can reliably provide this information for states or localities. While currently available ACS data cannot be used for this purpose, it will be possible to calculate marriage and divorce rates beginning with the release of the 2008 ACS. A significant advantage of the ACS over the NSFG and SIPP is its ability to provide annual state-level estimates (for all states plus D.C.), and local-level estimates with three to five years of pooled data.

The 2004 SIPP panel provides a representative sample for 30 states, but Census staff caution against using the SIPP to calculate state-level marriage and divorce rates because the state sample sizes are too small to accurately estimate the extent to which these relatively rare events occur. The SIPP sample is small compared to the ACS—the 2004 SIPP sample is 46,500 households, whereas the ACS sample is 3 million households. Another drawback of the SIPP is that reliable estimates of marriage and divorce rates are only available once during each panel (currently every three to five years). The NSFG provides a viable alternative for measuring

²³ All waves of the 2004 panel are not yet available

marriage and divorce rates at the national level on a continuous basis. However, as currently designed, the NSFG only includes individuals between ages 15 and 44 and so does not capture marriages and divorces for the full population.

IV. DETAILS OF THE THREE KEY DATA SETS

The previous section discussed the extent to which the ACS, NSFG, and SIPP meet the five criteria for measuring marriage and divorce. This section explores each data set in detail. For each data set, a brief overview of the data set is presented, followed by a discussion of the following areas: (1) current marriage, divorce, and cohabitation questions (**Appendix B** includes a listing of marriage and divorce questions currently contained in the three surveys); (2) data availability, access, and clarity; (3) marriage, divorce, and cohabitation correlates; (4) survey response rate; (5) survey administration; and (6) process for modifying the survey. **Exhibit 3** presents a summary of the three key data sets.

Exhibit 3: Summary of Key Data Sets¹

	American Community Survey (ACS)	National Survey of Family Growth (NSFG)	Survey of Income and Program Participation (SIPP)
Owner	<ul style="list-style-type: none"> U.S. Census Bureau 	<ul style="list-style-type: none"> National Center for Health Statistics 	<ul style="list-style-type: none"> U.S. Census Bureau
Survey Type	<ul style="list-style-type: none"> Cross-sectional with retrospective data 	<ul style="list-style-type: none"> Cross-sectional with retrospective data 	<ul style="list-style-type: none"> Longitudinal with retrospective data
Frequency	<ul style="list-style-type: none"> Annual 	<ul style="list-style-type: none"> 1973, 1976, 1982, 1988, 1995, 2002, 2006-2010 	<ul style="list-style-type: none"> 1984-1993, 1996, 2001, 2004
Population	<ul style="list-style-type: none"> Total U.S. Population 	<ul style="list-style-type: none"> Civilian non-institutionalized population ages 15-44 	<ul style="list-style-type: none"> Civilian non-institutionalized population
Sample Size	<ul style="list-style-type: none"> 3,000,000 households 	<ul style="list-style-type: none"> 12,600 individuals 	<ul style="list-style-type: none"> 46,500 households
Mode	<ul style="list-style-type: none"> Mail-in² 	<ul style="list-style-type: none"> Face-to-face 	<ul style="list-style-type: none"> Face-to-face and telephone
Response Rate	<ul style="list-style-type: none"> 97.5%³ 	<ul style="list-style-type: none"> 79% 	<ul style="list-style-type: none"> 78.1%⁴
Representative Areas	<ul style="list-style-type: none"> Nation 4 Census regions All states Local areas⁵ 	<ul style="list-style-type: none"> Nation 4 Census regions 	<ul style="list-style-type: none"> Nation 4 Census regions 30 states⁶
Marriage/Cohabitation Questions	<ul style="list-style-type: none"> Marital status Cohabitation status of reference person Changes in marital status in the past year Number of marriages Year of last marriage 	<ul style="list-style-type: none"> Marital status Cohabitation status Marital history for all marriages Cohabitation history 	<ul style="list-style-type: none"> Marital status Cohabitation status Marital history for up to 3 marriages

¹ Unless otherwise noted, information on the ACS is based on the 2008 survey, the NSFG is based on Cycle 6 (2002), and the SIPP is based on 2004 panel.

² Households that do not return the mail-in questionnaire within one month are contacted for a telephone interview, and one-third of those that do not respond to either the mail-in questionnaire or the telephone interview are contacted for a face-to-face interview.

³ The ACS response rate is from the 2006 survey.

⁴ This response rate is for Wave 2, when marital history data are collected. The Wave 1 response rate was 85.1 percent.

⁵ Estimates of areas with between 20,000 and 65,000 people (including most counties) can be computed by pooling three years of data, and estimates of Census-tract areas with less than 20,000 people can be computed by pooling five years of data.

⁶ While the 2004 SIPP panel provides a representative sample for 30 states, Census staff caution against using the SIPP to calculate state-level marriage and divorce rates because of sample size concerns.

American Community Survey (ACS)

The ACS is a cross-sectional survey that was designed to replace the Decennial Census long form.²⁴ Like the Decennial Census, response to the ACS is required by law; it is the only survey for which completion by the surveyed household is mandatory. The survey has been given in test areas since 1996 and reached full implementation in 2005. In 2005, all households were eligible to be surveyed, and starting in 2006 persons living in institutions and group quarters (e.g., military barracks, prisons, college dormitories, homeless shelters, nursing homes) were also eligible to be surveyed. The survey samples approximately 3 million households per year (and 253,000 per month).²⁵ The ACS is the largest annual survey in the United States and is designed to be representative down to the Census tract level. State-level statistics can be computed for all 50 states and the District of Columbia on an annual basis. Annual statistics are also available for all population areas with 65,000 people or more, which includes most Metropolitan Statistical Areas (MSAs). Further, reliable county-level statistics can be computed using three years of data and Census tract-level statistics can be computed using five years of data.

For each household that completes an ACS questionnaire, one individual is identified as the “household respondent.” The respondent is the person who owns or rents the house or apartment and is the individual primarily responsible for completing the questionnaire.²⁶ The ACS collects information on all household members.

Marriage, Divorce, and Cohabitation Questions. Prior to the 2008 questionnaire, the ACS had a single question on marital status. This question identified an individual as married, widowed, divorced, separated, or never married. As such, the ACS could not be used to calculate marriage and divorce rates. This has been remedied, however, through the addition of questions about changes in marital status to the 2008 questionnaire. These questions ask about (1) change in marital status in the past 12 months, (2) number of times married, and (3) year last married.²⁷ These additional questions are expected to remain in the survey for the foreseeable future.

The ACS does not have a direct question about cohabitation status. Rather, cohabitation status in the ACS is captured through a question about “relationship to respondent,” where one of the allowable responses is “unmarried partner.” As a result, cohabitation status is only available for survey respondents (and their partners). So, in cases where neither cohabiting partner is the survey respondent, the cohabiting relationship is missed.

Data Availability, Access, and Clarity. Unlike many surveys, the main data product of the ACS is a series of several hundred tables. These tables include information on marital status. Tables based on one year of data are published for all geographic jurisdictions with populations of 65,000 or more (e.g., states, towns, cities, American Indian reservations). With three years of data, tables will be published for geographic jurisdictions with populations of 20,000 or more. With five years of data, tables will be published down to the tract and block group level (similar to what was published based on the Decennial Census long form data). These multi-year

²⁴ Administration of the Decennial Census long form ended in 2000.

²⁵ The ACS sample is spread across every county in the U.S. and includes all municipalities in Puerto Rico.

²⁶ The ACS directions say that if no such person meets this criterion, the respondent can be any adult living in the household.

²⁷ The exact ACS question can be found in Appendix B.

estimates will be released for the first time in 2008 and 2010. ACS data tabulations are available through the Census Bureau's official data dissemination system, American FactFinder.²⁸

In addition to these tables, a public use data file is available for free download from the Internet using DataFerrett.²⁹ For confidentiality purposes, the public use data file only identifies areas with populations of 100,000 or more and is, at most, a one-third sample. Because of the difference in samples, estimates calculated using this data file will not necessarily match the published Census tables.

The tables and public use data file are typically released eight months after data collection for each calendar year has ended. Because retrospective marriage and divorce data were first collected in 2008, calculating marriage and divorce rates on geographic jurisdictions with populations of 65,000 or more will first be possible with data released in summer/fall 2009. Examining smaller jurisdictions require the data to be pooled across years, so marriage and divorce rate data on geographic jurisdictions with populations of 20,000 or more will first become available in 2011 and for Census tracts the data are expected to first become available in 2013. Data for all these units will then be released annually.

Like other Census data available on DataFerrett, the ACS data is very easy to download and use and the documentation is clear and extensive.

Marriage, Divorce, and Cohabitation Correlates. The ACS provides information on many demographic characteristics including age, race, ethnicity, immigration status, citizenship status, and country of origin. The ACS also provides information on housing situations, such as type of building, number of bedrooms, and whether there are complete plumbing and kitchen facilities. In terms of public assistance programs, the ACS contains information on whether anyone in the household received food stamps, as well as individuals' receipt of welfare benefits and Supplemental Security Income (during the past 12 months). The survey also provides information on individuals' employment, earnings, and total income (during the past 12 months). Finally, the ACS includes information on births in the last year.

Survey Response Rate. The ACS has a response rate of 97.5 percent (2006), the highest of any Census Bureau demographic survey. Response rates have been found to vary by race and ethnicity; households in minority-concentrated Census tracts have been found to have significantly lower response rates. In the 2000 ACS, which had an overall response rate of 95 percent, the response rate in Census tracts where 75 percent of the population reported their race as "black or African-American" was 92.4 percent, compared to 95.9 percent of tracts where at least 75 percent were white.³⁰ This response rate of 92.4 percent in minority-concentrated areas is still high compared to other survey response rates (including the NSFG and SIPP).

Survey Administration. The Census Bureau uses three modes of data collection – mail-in questionnaires, telephone interviews, and in-person interviews – which contribute to high

²⁸ The American Factfinder website is located at <http://factfinder.census.gov>.

²⁹ DataFerrett is an application designed to create data extracts (for certain data sets) and to create tables without having to download the entire raw data file. It is available for download through the Census website.

³⁰ The difference between these rates is statistically significant. U.S. Bureau of the Census, 2002. "Meeting 21st Century Demographic Data Needs—Implementing the American Community Survey: May 2002. Report 2: Demonstrating Survey Quality." Washington, DC: U.S. Bureau of the Census, p. 17.

response rates.³¹ As a first step in the survey's administration, pre-notification letters are sent to all households selected for the survey. This letter informs households that they have been selected for the survey and that they will be receiving a questionnaire in the mail. Following this pre-notification letter, a questionnaire is sent out to each household in the sample. As mentioned above, roughly 253,000 questionnaires are mailed out each month. If the household does not return the questionnaire a reminder card is sent to the nonresponding household, followed by another questionnaire if the household still does not respond.

Households that do not respond to the mail-in questionnaire and for whom the Census Bureau has a telephone number are contacted for a telephone interview (a Computer-Assisted Telephone Interview, CATI) roughly one month after the questionnaire was first mailed out. A subsample of households (one out of every three) that do not respond to either the mail-in questionnaire or the telephone interview are selected for a face-to-face interview (a Computer-Assisted Personal Interview, CAPI) two months after the questionnaire was first mailed out.

The ACS questionnaire takes roughly 40 minutes to complete.³² Unlike many other surveys, including the NSFG and SIPP, there is no monetary incentive for completing the questionnaire. With the mandatory nature of the ACS and high response rates, Census Bureau staff do not currently see a need for monetary incentives.

Survey Modification. Most of the ACS content is mandated or required by law and modifications to the survey require Office of Management and Budget (OMB) approval. The Census Bureau does not have a vested interest in making changes to the content of the ACS questionnaire. However, in recent years, Census staff worked with OMB and other Federal agencies (e.g., DHHS) to identify and test changes to the questionnaire. The resulting changes were incorporated into the 2008 questionnaire. As discussed above, the 2008 questionnaire includes three new questions about marriage and divorce.

Much of the work required to change the 2008 ACS questionnaire occurred in 2005 and 2006. This included preparing preliminary question wording, testing the questions, and then finalizing the wording. The 2008 questionnaire was finalized and approved by OMB in 2007. OMB's task is to ensure that the survey does not place undue burden on respondents. The 2008 questionnaire asks about *change* in marital status in the previous year, so no additional changes are necessary for overall marriage and divorce rates to be calculated at the national, state and local levels.³³

National Survey of Family Growth (NSFG)

The NSFG is a cross-sectional survey that provides retrospective information on marriage, divorce, cohabitation, childbearing, and the health of women and infants. It is administered by the National Center for Health Statistics.³⁴ NSFG data are currently available from six cycles

³¹ Information on survey administration is from U.S. Bureau of the Census. 2008a. Survey Basics: Data Collection. American Community Survey. <<http://www.census.gov/acs/www/SBasics/DataColl.htm>>. Accessed January 2008.

³² This average is for the 2007 questionnaire.

³³ There are no plans to change the marriage/divorce questions in the ACS beyond the changes introduced in the 2008 survey. The Census bureau will, however, evaluate the quality of the responses to these questions to determine if any changes are necessary.

³⁴ The National Center for Health Statistics is part of the Center for Disease Control and Prevention (CDC) and the CDC is part of DHHS.

(1973, 1976, 1982, 1988, 1995, and 2002) and a seventh cycle is underway (2006-2010). The first data from Cycle 7 is expected to be released in late 2009.³⁵

Unlike the ACS, the NSFG sampling unit is the individual, not the household. Over the course of the NSFG cycles, the sample population has changed somewhat, although it has always been limited to the civilian noninstitutionalized population between the ages of 15 and 44.³⁶ For the 1973 and 1976 surveys, the sample only included ever-married women, while the 1982, 1988, and 1995 surveys expanded to include all women (between 15 and 44).³⁷ For the 2002 and 2006-2010 surveys, the sample population includes both men and women (ages 15 to 44).³⁸ Because the survey excludes individuals over the age of 44, the marital histories are not representative of the entire population (i.e., they do not represent marriage and divorce experience after age 44).

The NSFG sample is significantly smaller than the ACS and SIPP samples. The sample sizes for the 1995 and 2002 NSFG samples (Cycle 5 and 6) were 10,800 and 12,600, respectively. Cycle 7, which is scheduled to be administered continuously from 2006 through 2010, is expected to have a total sample size of 20,000, with an average of 5,000 interviews occurring per year.³⁹ In essence, the Cycle 7 NSFG interviews are being spread over a series of years as a way to increase the sample size without increased resources; cost savings result from the need to train fewer interviewers, for example. Because the annual sample size is relatively small, the first year of data will not be released alone. Rather, a data file containing between 12,000 and 13,000 interviews from 2006-2008 will be released in late 2009, with subsequent data files being released about every 2 years. NSFG staff suggest that a minimum of two years of Cycle 7 data be used to calculate marriage and divorce rates. Because the NSFG sample is relatively small, it cannot be used to detect small changes in marriage and divorce rates over time.

The NSFG sample is representative only at the national and regional levels (four Census regions) and cannot be used to calculate marriage and divorce rates at the state or local level.⁴⁰ The NSFG provides limited geographic information on the public use data file. Beginning with the 2002 data, the public release files do not provide information on region (state of residence was not on earlier files). Thus, researchers who want to examine marriage and divorce by region of the country need to obtain access to the restricted data file.⁴¹ There is only a single geographic variable on the 2002 public release file – whether individuals live in a (1) Standard Metropolitan Statistical Area (SMSA), central city; (2) SMSA, other; or (3) non-SMSA.

Marriage, Divorce, and Cohabitation Questions. In addition to current marital status, the NSFG collects marital history information. Marital history for females is collected through a series of questions that ask how many times the respondent has been married and details about their marriages.⁴² From 1973 to 1988, detailed information was collected on up to three

³⁵ Unless otherwise noted, information is provided for the most recent data available – the 2002 NSFG.

³⁶ Starting with the 2002 survey, someone who is active duty military and not living on a military base can be included in the survey.

³⁷ Prior to the 1988 survey, the sample was restricted to the continental United States.

³⁸ The 2006-2010 sample population is somewhat broader, as it includes people living in group quarters.

³⁹ While Cycle 7 of the NSFG is spread across five calendar years, it is considered a four-year cycle with interviews scheduled for the four-year period from June 2006 through May 2010.

⁴⁰ Each year of Cycle 7 interviews will be a nationally representative sample.

⁴¹ The restricted data file also includes information on state of residence and an indicator of urban versus rural.

⁴² See Appendix B for detailed questions.

marriages, and beginning in 1995, it was collected for all marriages. This information includes the date of marriage, if and when the marriage ended, how the marriage ended (death, divorce, or annulment), as well as information on separations.⁴³ Additionally, for each marriage, the survey collects data on the husband, including whether or not he had been married before and if he had any children from previous relationships. For the current husband (or first husband if not currently married), the survey also asks about age, race, ethnicity, and educational attainment. The male questionnaire collects largely the same marital history information as the female questionnaire; however, it does not ask about separations within each marriage or about the educational attainment of the former wife.⁴⁴

Current cohabitation status has been collected since 1973, but cohabitation histories were first collected in 1995. Female respondents are asked, for each marriage, if they lived with their spouse prior to marriage, the date they began cohabitating, and whether or not there were periods when they stopped cohabiting. In addition, the NSFG collects information about cohabiting partners the female respondent did not marry. Information is collected on the current cohabiting partner and up to eight previous cohabiting partners. Collection of cohabitation for males is much more limited; the survey asks about the dates of cohabitation and demographic characteristics of only the first cohabiting partner.

Data Availability, Access, and Clarity. In Cycles 1 through 6, NSFG data have been released to the public about two years after collection. Data from the 2002 survey was released to the public in December 2004. The data release schedule for the next cycle of the NSFG is not as straightforward, since the interviews will take place over several years—from 2006 through 2010. It is expected that the data collected from 2006 through 2008 will be released in late 2009, with the final Cycle 7 data file being released about one year after data collection ends.

The NSFG public use data files are available on CD-ROM and can be requested free of charge from NCHS. In addition to the raw data files, the CD-ROM includes the questionnaire and data dictionary. For Cycle 6 (2002), the NSFG documentation is also on the internet with interactive features, and therefore allows for updates as necessary.

Researchers wishing to use the restricted NSFG data can gain access through the NCHS Research Data Center (RDC), located at the NCHS headquarters in Hyattsville, Maryland. One must fill out an application to gain access to the data. NCHS's goal is to ensure that the user does not use the data illegally (i.e., attempt to identify individuals). Once access to the restricted data has been granted, there are three ways to use the data. The first option (available for \$200 per day) is to conduct the analysis on site at the RDC. This is costly because NCHS has a staff member on call to answer questions and prevent inadvertent disclosures of confidential data. The second, and cheapest, option (\$500 per year) is to use the restricted data remotely with SAS; users submit their SAS programs to the RDC via email, and output is emailed back to the user. The third option is called "staff-assisted remote access," in which a user submits a program and an RDC staff member runs it. There is usually a per-run charge for this procedure. Most people go to the RDC first for a day or two to get everything set up and then use it remotely afterwards. However, because only SAS is used for remote access, people who wish to use STATA or another program must do so in the RDC.

⁴³ The NSFG provides information on both the month and year events (such as marriage and divorce) occur.

⁴⁴ Information on educational attainment is collected for only the current wife.

Marriage, Divorce, and Cohabitation Correlates. The NSFG provides information on many correlates of marriage, divorce, and cohabitation. A unique feature of the survey is a battery of roughly 20 questions on attitudes toward marriage, parenthood, and gender roles, which can shed light on patterns of marriage, divorce and cohabitation. In terms of the individuals' employment and economic situation, the survey asks individuals about employment history, earnings, total income and income sources (of the individual and family), and receipt of welfare benefits. The NSFG also provides data that enable researchers to examine the relationship between individuals' living arrangements throughout childhood and their marriage/divorce decisions as adults. Family planning practices, pregnancy, birth, and adoption histories are also collected. The survey collects selected information on the well-being of respondents' children. The female questionnaire includes questions about premature births, birth weight, smoking during pregnancy, and breast-feeding. The male questionnaire asks respondents about interactions and activities with children with whom he does and does not live, such as helping with homework, eating meals together, and talking with them, as well as how good of a father the respondent thinks he is. For children that the father does not live with, the survey also asks how often the respondent visits his children and if he is satisfied with the number of visits.

Survey Response Rate. The overall response rates were roughly the same in the two most recent completed NSFG cycles – 78.6 percent in the 1995 survey and 79 percent in the 2002 survey.⁴⁵ In the 2002 survey, the response rates were very similar for females and males (80 percent and 78 percent, respectively), but differed somewhat by race/ethnicity and age. The highest response rates were for Hispanic and black teenagers (84 percent), and the lowest rates were for adult white males ages 25 to 44 (approximately 75 percent). In the 1995 survey, the response rates varied very little by race and ethnicity; all races and ethnicities had response rates between 78 to 80 percent. However, response rates did differ significantly by age; women ages 25 to 29 had a response rate of 75 percent, as opposed to the 83 percent rate for women ages 15 to 17.⁴⁶

Survey Administration. Unlike the ACS, all NSFG interviews are conducted face-to-face by the NSFG interviewer at the respondent's home. Prior to the interview, an advanced letter explaining the survey is sent to the household. NSFG interviews take place in-person because of the sensitive nature of the questions as well as the complexity of the questionnaire (e.g., collecting dates and other detailed information on prior marriages, divorces, and cohabiting relationships). These interviews are primarily conducted using Computer-Assisted Personal Interviewing (CAPI). Because the survey includes questions of a sensitive nature (e.g., abortion and sexual history), a portion of the NSFG is self-administered. This self-administered portion

⁴⁵ The 1995 response rate is from Kelley, J. E., W. D. Mosher, A. P. Duffer, and S. H. Kinsey. 1997. "Plan and Operation of the 1995 National Survey of Family Growth." *Vital and Health Statistics, Series 1, No. 36*. Hyattsville, MD: National Center for Health Statistics. (See Table F and pages 82-89).

The 2002 response rate is from Groves, R. M., G. Benson, W. D. Mosher, J. Rosenbaum, P. Granda, W. Axinn, J. Lepkowski, and A. Chandra. 2005. "Plan and Operation of Cycle 6 of the National Survey of Family Growth." *Vital and Health Statistics, Series 1, No. 42*. Hyattsville, MD: National Center for Health Statistics. (See page 50).

⁴⁶ Burstein, N., L. Lindberg, D. Fein, L. Page, and R. LaRock, Jr. 2003. "Guide to Data Sources on the Determinants of Marriage and Cohabitation." Bethesda, MD: Abt Associates. (See page 51).

of the interview is conducted using Audio Computer-Assisted Self-Interviewing (A-CASI), in which respondents enter answers directly into the computer.⁴⁷

The 2006-2010 NSFG survey takes males an average of 60 minutes to complete and females an average of 80 minutes. NCHS began offering incentives to respondents for their participation in 1995. Respondents received \$20 for completing the 1995 survey; the incentive increased to \$40 for the 2002 and 2006-2010 surveys.

Survey Modification. Modifications to the NSFG can be suggested by current or potential funding agencies (funding agencies are also referred to as “collaborators”). There are three major collaborators – NCHS, National Institute of Child Health and Human Development (NICHD), and the Office of Population Affairs at DHHS; other collaborators include Division of Reproductive Health (within the Centers for Disease Control and Prevention, CDC), Divisions of HIV/AIDS Prevention (within the CDC), Office of the Assistant Secretary for Planning and Evaluation (ASPE, within DHHS), Administration for Children and Families (ACF, within DHHS), among others. Proposals to modify the survey should be specific and be submitted to NSFG staff at NCHS. For each cycle of the NSFG, the collaborators meet to design a survey instrument that meets their needs. Proposed changes to the NSFG are discussed by the collaborators, with meetings of the collaborators occurring on an as needed basis. For the Cycle 7 survey, which began in July 2006, the questionnaire was finalized by June 2005.

Each cycle of the NSFG requires Institutional Review Board (IRB) and OMB approval. The IRB process is an internal process within NCHS that seeks to guarantee that survey participation is informed and voluntary, and that the interests of respondents are protected.⁴⁸ As noted above, the OMB process is designed to ensure that the survey does not place undue burden on respondents and that it has practical utility for federal government programs. Prior to OMB submission, the NSFG survey package must be reviewed and approved by NCHS, CDC, and ASPE (in that order). Completing the IRB and OMB reviews takes six to eight months. After the survey has been submitted for OMB and IRB approval, it is still possible to modify the survey. The difficulty involved in modifying the survey depends on the extent of the proposed changes and the degree to which new questions elicit sensitive, personal information.

The NSFG provides national estimates of marriage and divorce rates, but does not provide state and local level estimates. Given recent changes to the ACS questionnaire (in 2008), along with the fact that the NSFG sample size and survey budget would have to increase substantially to provide state- or local-level estimates of marriage and divorce rates, the NSFG is not an appropriate vehicle for obtaining this information. All of the NSFG interviews take place face-to-face so are relatively costly to administer.

One improvement that would make the sample more representative of marriages and divorces in the U.S. would be to expand the age range of the NSFG beyond individuals ages 15 to 44. In 1995, 13 percent of all men and 9 percent of all women who married were over age 44.⁴⁹

⁴⁷ After the self-administered portion of the interview is complete, the respondent’s responses are locked and cannot be accessed until the data are processed at NCHS survey headquarters.

⁴⁸ The IRB process is administered by the CDC.

⁴⁹ Authors’ tabulations from the 1995 Marriage and Divorce Data of the National Vital Statistics System of the National Center for Health Statistics. 1995 is the most recently available vital statistics data.

Similarly, 24 percent of all men and 13 percent of all women who divorced were over age 44.⁵⁰ A broader age range would provide substantially more information on marriage dissolution and remarriage. An expansion of the age range should be accompanied by an increase in sample size. The NSFG is used to study demographic events, like childbearing, that tend to occur among younger adults (ages 15 to 44). Thus, it is important to maintain the number of 15- to 44-year-olds who are surveyed.⁵¹ Obtaining information on those over age 44 should be accomplished by adding additional individuals to the sample.⁵² While it would not make the rate determined through the NSFG representative of the entire U.S. population, as a source of cost-savings, the NSFG could limit the expansion of the sample to individuals ages 45 to 54. Age 54 is a reasonable upper bound because vital statistics data suggests that only a small fraction of marriages and divorces occur to individuals over age 54. In 1995, 5 percent of all men and 3 percent of all women who married were over age 54 and 7 percent of all men and 4 percent of all women who divorced were over age 54.⁵³

Another potential NSFG improvement would be to add marriage and relationship quality questions to the questionnaire. This important correlate of marriage and divorce is often omitted from large national data sets, including the NSFG (and ACS and SIPP). Incorporating these questions into the NSFG would allow researchers and policymakers to better understand the relationship between marital status changes, marital and relationship quality, and demographic and behavioral characteristics. While the NSFG has never asked questions about marital quality, the format of the NSFG interviews makes it a viable option for collecting these data. The NSFG interviews are face-to-face and also have a self-administered component, so respondents may feel more comfortable answering these questions honestly than in other survey formats.⁵⁴

Survey of Income and Program Participation (SIPP)

The SIPP is a panel study that focuses on the income and program participation of households and individuals, and is administered by the U.S. Census Bureau. Panels began annually from 1984 to 1993 and in 1996, 2001, and 2004. In addition, a 2008 SIPP panel began in September 2008. Each panel generally lasts between two and four years, with more recent panels lasting three to four years. Respondents are interviewed every four months about the previous four months, a period referred to as a wave. Each SIPP panel consists of a core questionnaire, which is administered in each wave, and topical modules, which collect supplemental information on a variety of topics. The number of topical modules and the topics that they cover vary by wave. All civilian non-institutionalized households are eligible to be sampled. The sample size has varied across panels; the 1996 panel includes 36,800 households, the 2001 panel 35,100 households, and the 2004 panel 46,500 households.

⁵⁰ Authors' tabulations from the 1995 Marriage and Divorce Data of the National Vital Statistics System of the National Center for Health Statistics.

⁵¹ This point was emphasized by NCHS staff.

⁵² At this time, NCHS and the NSFG's other funding agencies do not have the funds to expand the age range.

⁵³ Author's tabulations from the 1995 Marriage and Divorce Data of the National Vital Statistics System of the National Center for Health Statistics.

⁵⁴ Adding relationship quality questions to the NSFG may have monetary and/or non-monetary costs. Lengthening the survey would add monetary costs, while dropping questions to make room for the new material would mean giving up the information that could have been garnered from the deleted material. However, if only a small number of questions (e.g., 1-5) were added, then the cost could be modest.

The SIPP panels have typically provided representative estimates at the national and regional levels.⁵⁵ The 2004 panel also provides representative estimates for about 30 states (earlier panels did not provide a representative sample for any state). However, it will be difficult to detect whether small differences across states are statistically significant, because of the relatively small sample size per state. In addition to providing information on state of residence,⁵⁶ the SIPP identifies large metropolitan areas (MSAs), although the SIPP samples are not representative of the populations in the MSAs. The public use data file also has a metropolitan/residual residence variable. However, for confidentiality purposes, some respondents who live in metropolitan areas of states with small non-metropolitan areas are recoded as living in non-metropolitan areas.

Marriage, Divorce, and Cohabitation Questions. Marriage and divorce data are collected for all individuals in the surveyed household who are age 15 or older. The most reliable data from which to calculate marriage and divorce rates come from the marital history topical module, which is administered in the second wave of each panel.⁵⁷ This topical module asks individuals the number of times married, dates of marriage, dates of separation, dates that the marriage ended, and why it ended (e.g., death or divorce). The module covers up to three marriages – the first, second, and most recent. Because this retrospective history is collected early in the survey, attrition-related issues that hamper longitudinal event data are not likely to be problematic. The survey collects the month and year of marriages and divorces (as well as the month and year of births), but starting with the 2001 panel, the public release data suppresses the month of these events to ensure confidentiality. As a result, one cannot use the SIPP to study marriage duration where duration is measured in months.

SIPP collects information on current cohabitation status, but does not collect cohabitation histories. Information on current cohabitation is collected through a “relationship to reference person” question on the core questionnaire. Thus, for the reference person, cohabitation status is collected for each wave of the panel. Cohabitation status for other household members is available once during the panel – the Wave 2 household relationships topical module identifies the relationship of each individual in the household to one another. Census has tested questions that directly ask about cohabitation status, but not cohabitation history.

Data Availability, Access, and Clarity. There is a relatively long lag time between SIPP data collection and data availability. In the past, Wave 1 core data typically have been released approximately 20 months after data collection. For the 2004 panel, the Census Bureau released the preliminary version of the Wave 1 core data in April 2006, and the final version was released in January 2008. Final versions of the core data for Waves 2 through 4 were also released in January 2008. As of September 2008, core data were available through Wave 9. The

⁵⁵ Calculating marriage and divorce rates for all four Census of regions is not possible with the public release SIPP data prior to the 2004 panel. The public release file did not identify region of the country, and the variable that identified state of residence grouped together states that cross regional boundaries. In the 2001 panel, for example, North Dakota, South Dakota, and Wyoming were combined into a single group – North Dakota and South Dakota are in the Midwest and Wyoming is in the West.

⁵⁶ In the 1996 and 2001 panels, Maine and Vermont were combined into a single group, as were North Dakota, South Dakota, and Wyoming. In 2004, however, each state is identified individually.

⁵⁷ See Appendix B for detailed questions.

Census Bureau also began releasing topical module data in April 2006. Subsequent waves of core and topical module data are scheduled to be released by January 2009.

Data can be downloaded for free from the DataFerrett application and from the SIPP website. The user can also download SIPP documentation, such as questionnaires and codebooks. The Census Bureau provides many SIPP working papers on topics including the accuracy of SIPP data and using SIPP data for policy analysis.⁵⁸ The SIPP data can be difficult to use because of its longitudinal design. However, using only the Wave 2 data (the wave with marital history information) is relatively straightforward; the user simply has to merge together the core and the topical module data.

Users can gain access to the restricted use data, which are located at the Census Bureau's Research Data Centers (RDC).⁵⁹ To gain access to the restricted data, users must submit a proposal to the Census Bureau's RDC and the Census Bureau's Center of Economic Studies. These proposals are reviewed on several criteria; most importantly, the proposals must demonstrate that the research will benefit Census programs.⁶⁰ If approved, researchers must apply for Special Sworn Status, which includes fingerprinting and a background check. Users should expect to wait at least six months between submitting the final proposal and beginning research.⁶¹

Marriage, Divorce, and Cohabitation Correlates. The SIPP provides a wide variety of correlates beyond demographic characteristics. The core questionnaire collects information about household composition, employment (e.g., hours worked per week, weeks worked, wage rate, occupation), income (e.g., earned and unearned income, income sources, and investments), and program participation. Topical modules supplement the core questionnaire on a range of issues, including benefit reciprocity history, fertility history, child care arrangements, child support agreements, child well-being, and adult well-being. The child well-being topical module, which was administered in Waves 3 and 9 of the 2004 panel asks questions about early childhood experiences, such as child care arrangements; parent-child interactions, including meals eaten and outings together; school-age enrichment, such as extracurricular activities; child's academic experience; parental educational expectations; and the parent's feelings toward his/her children. The adult well-being topical module, administered in Waves 5 and 11 of the 2004 panel, addresses living conditions, basic needs, and adequacy of food.

Survey Response Rate. Reporting the survey response rate for the SIPP is not as straightforward as for the ACS and NSFG, because response rates differ over the panel due to attrition. For Wave 1 (the initial interview), the response rate for the 2004 panel was 85.1 percent, slightly lower than the Wave 1 response rate of 86.7 percent for the 2001 panel. Recall

⁵⁸ Vaughn, D.R. 2000. "Type of OASDI Benefit and Year of Death based on an Exact Match to Social Security Administration Benefit Records, 1990 and 1991 Panels of the Survey of Income and Program Participation (SIPP): Description of the Development of the Data for Public Release and a Preliminary Evaluation of Data Quality." Washington, DC: U.S. Bureau of the Census. Weinberg, D.H. 2002. "The Survey of Income and Program Participation—Recent History and Future Developments." Washington, DC: U.S. Bureau of the Census.

⁵⁹ There are nine Census Bureau RDCs, located in Washington, DC, Cambridge, MA, Los Angeles, CA, Berkeley, CA, Durham, NC, Ann Arbor, MI, Chicago, IL, New York, NY, and Ithaca, NY.

⁶⁰ There are several ways to satisfy this requirement, including improving the quality of the data, leading to improved methodology, improving imputations, developing linkages across time or surveys, or improving the sampling frame.

⁶¹ For a more complete overview of the process, see U.S. Bureau of the Census, The Center for Economic Studies. 2008b. The Research Data Program. < <http://www.ces.census.gov/index.php/ces/researchguidelines> >. Accessed January 2008.

that the response rate is roughly 97 percent for the ACS and 80 percent for the NSFG. The response rate in the second wave is important, because marital history is collected in Wave 2. The Wave 2 response rate was 78.1 percent for the 2004 panel and 79.1 percent for the 2001 panel.⁶²

Survey Administration. The SIPP uses both face-to-face and telephone interviews, which are conducted using Computer-Assisted Interviewing (both CAPI and CATI). Initial interviews are always conducted in person, as are interviews with households that have moved. Use of telephone interviews has varied across panels. The 2001 panel also conducted face-to-face interviews for Wave 2 and used telephone interviews when possible for Wave 3 through Wave 9, while the 2004 panel maximizes the use of telephone interviews beginning with Wave 2.

The survey respondent (i.e., the SIPP reference person) for the household is the person in whose name the residence is owned or rented. For households owned jointly by a married couple, either spouse can be the reference person.⁶³ The SIPP attempts to interview all individuals 15 or older in each sampled household. If individuals are unavailable or uncooperative, proxy interviews (usually from the reference person) are accepted. Census staff estimates that approximately 25 percent of interviews are proxy interviews. This is a drawback of the SIPP because proxy respondents may be less familiar with individuals' experiences, such as their marital histories.

There are monetary incentives for some SIPP respondents. For households that are uncooperative, interviewers can offer a \$40 debit card as an incentive to participate. On average, households take 42 minutes to complete the core questionnaire and 21 minutes to complete the topical modules; thus, each wave takes households an average of 63 minutes to complete.⁶⁴ However, the length of the survey varies by wave, as waves have different numbers of topical modules administered.

Survey Modification. To propose a change to the SIPP survey, the interested agency should contact Census Bureau staff. The Census Bureau is organized around topic areas (not data sets) and proposals related to marriage and divorce should be addressed to the chief of the Population Division.⁶⁵ The Census Bureau evaluates proposals along several dimensions, including implications for respondent burden, administration of questions (e.g., where new questions will fit into the survey), sensitivity of questions, and the need for cognitive testing. If necessary, the Center for Survey Methods Research within the Census Bureau tests new and revised questions. The SIPP is funded by the Census Bureau, so agencies that propose a change to the SIPP are not responsible for providing the monetary resources needed to implement the change. However, the background materials, technical support, and data evaluation are the agencies' responsibility.

⁶² The response rate generally falls over the panel. The overall response rate for the 2001 SIPP panel was 68.1 percent, for example.

⁶³ In the first wave of the 2001 panel, the wife was the reference person in 34 percent of married households.

⁶⁴ These numbers are calculated based on an average of 2.1 adults age 15 years and older per household.

⁶⁵ Requests related to the TANF or food stamp programs, for example, would be addressed to the Division of Housing and Household Economic Statistics.

Any changes to the SIPP must be agreed upon by the OMB Interagency SIPP Committee, which was established in 1983 to assist the Census Bureau in developing and revising the SIPP questionnaire.⁶⁶ In addition to OMB and Census staff, the Committee comprises individuals from many agencies including DHHS, Department of Labor, Department of Agriculture, and Department of Housing and Urban Development. There are no regularly scheduled meetings.

Once the questionnaire is complete and has received Census Bureau approval, the survey, along with complete documentation, is sent to OMB for approval. Census staff must prepare a separate OMB package for each wave. The Wave 1 OMB package includes the core questionnaire and the Wave 1 topical modules. Since the core questionnaire does not change across waves, OMB packages for subsequent waves only need to include topical module questionnaires for approval. Since the different topical modules represent different burdens, approval for each wave is necessary. The OMB clearance process takes nine months on average.

Even after questions have been approved and appeared on the SIPP, the data garnered from them may not become available. Census reviews the questions and responses under its “disclosure risk process” to ensure the confidentiality of respondents. This process occurs approximately 60–90 days before each public data file release.

The process of making modifications to the SIPP questionnaire needs to begin at least two years prior to the start of the panel. The entire survey is locked at least one year before interviewing begins, depending on cognitive testing, instrument development, and processing considerations.

It would not be cost effective, given the recent changes to the ACS questionnaire, to expand the SIPP sample to provide state-level marriage and divorce rates. One improvement to the SIPP’s usefulness in studying marriage and divorce would be to add questions about relationship quality. The Census Bureau’s Survey of Program Dynamics (SPD), which was a continuation of the 1992 and 1993 SIPP panels, included three questions on relationship quality and conflict that appeared on the self-administered section of the questionnaire. Since the SPD questions were previously approved by the Census Bureau, they would not need cognitive testing. The SPD asked questions about (1) how happy the individual was with his/her relationship, (2) how often the couple discussed or considered separating from one another, and (3) whether arguments between partners had become physical in the last year. This relationship quality and conflict information, however, was never released to the public because of confidentiality concerns. According to Census Bureau staff, the questions were determined to be too sensitive in nature to release respondents’ answers to the public. Whether relationship quality questions could be released if asked in future panels of the SIPP would need to be reviewed by the Census Bureau.

Summary

All three data sets described above offer current national estimates on marriage and divorce and collect data on an ongoing basis. However, they have weaknesses along with their strengths.

⁶⁶ Citro C.F. and G. Kalton (eds.). *The Future of the Survey of Income and Program Participation*. Washington, D.C.: National Academy Press, 1993: 227-244.

- The ACS is best suited to provide state- and local-level information on marriage and divorce because its sample size will enable state-level estimates of marital status on an annual basis and county-level statistics based on three to five years of pooled data. Beginning with the 2008 ACS, changes in marital status can be identified, making it an ideal source for estimating local-level marriage and divorce rates.
- The NSFG provides the most detailed information on relationship histories and is the only survey of the three that collects a cohabitation history. With the change to continuous interviewing in 2006, the NSFG will provide updated national estimates of marriage on an annual basis.⁶⁷ However, the NSFG's relatively small sample size means that it cannot be used to detect small changes in marriage and divorce rates over time or provide state- and local-level estimates. Finally, as currently designed, NSFG respondents are limited to individuals between the ages of 15 and 44. Its rich data about marital, sexual and family history makes the NSFG an important data source for understanding the correlates of changes in marriage and divorce rates.
- The SIPP collects marital histories that can be used to calculate marriage and divorce rates at the national level and for the four Census regions. The 2004 SIPP panel provides a representative sample for 30 states, but Census staff caution against using the SIPP to calculate state-level marriage and divorce rates because the state sample sizes are too small to accurately estimate the extent to which these relatively rare events occur. Additionally, because of the panel structure of the SIPP, it cannot provide annual marriage and divorce rates. Rather, it provides reliable measures of marriage and divorce once every panel – or once every three to five years. However, like the NSFG, the rich set of data collected by the SIPP, especially around income and program participation, makes it an important data source for the understanding of changes in marriage and divorce rates.

⁶⁷ Recall that NCHS staff recommended that marriage and divorce rates be calculated with a minimum of two years of data (from the Cycle 7 interviews that will run from 2006 through 2010).

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VI. APPENDIX A: OTHER DATA SETS EXAMINED

In addition to the American Community Survey (ACS), the National Survey of Family Growth (NSFG), and the Survey of Income and Program Participation (SIPP), 17 other data sets were examined for their ability to measure marriage and divorce. However, based on the criteria discussed in **Section II**, it was concluded that these data sets were unable to produce valuable marriage and divorce statistics. In fact, as **Exhibit A.1** shows, most of these data sets failed to meet more than one of the criteria.⁶⁸ The following section describes each of these data sets (in alphabetical order) and how they failed to meet the criteria. Much of the information regarding these data sets is current as of January 2005.⁶⁹ **Exhibit A.2** summarizes the survey characteristics.

Current Population Survey. The Current Population Survey (CPS) is a monthly cross-sectional survey that includes approximately 57,000 households and 112,000 individuals. The survey captures the civilian, non-institutionalized population age 15 and older. These data provide representative estimates on a national level, and data pooled from multiple years can yield state-level estimates. The CPS provides information on marital status, but does not provide information to calculate marriage and divorce rates. The CPS did include a marital history supplement roughly every five years from 1971 to 1995, which enabled calculation of marriage and divorce rates, but it was discontinued. According to Census Bureau staff, the Wave 2 topical module of the SIPP has essentially replaced the CPS marital history supplement, and the Census Bureau currently has no plans to reintroduce it. Prior to 2007, cohabitation status was obtained from a question about "relationship to household respondent," so was only available for survey respondents and their partners. However, beginning in 2007, the CPS began to ask a direct question about cohabitation, so now provides this information for all adult household members.

Decennial Census. The Decennial Census has traditionally collected information on marital status, but the extensiveness of the information collected has changed over time. In the 2000 Decennial Census, current marital status was collected only on the long form. In 1990, it was collected on both the long and short forms.⁷⁰ Because the ACS is replacing the Decennial Census long form, marital status is not expected to be collected in the Decennial Census starting in 2010 and going forward. The Decennial Census currently provides information on the cohabitation status of household respondents and their partners. Like the ACS, cohabitation status is obtained from a question that asks about relationship to household respondent. This information is collected on the short form and is expected to continue in future rounds of the Decennial Census.

⁶⁸ Because each of these data sets has failed to meet at least one of the primary criteria, we do not discuss the availability of correlates of interest, which is a secondary criterion.

⁶⁹ The information reported in this appendix is from the most current survey as of January 2005, except for selected updates where information was readily available.

⁷⁰ The Decennial Census long form has traditionally been given to five percent of the U.S. population and asks more detailed questions than the Decennial Census short form questions, whereas the Census Bureau aims to have all individuals represented in the short form questionnaire.

Exhibit A.1: Evaluation Criteria Attained by Other Data Sets¹

Name of Survey Data Set	Relevancy	Reliability ²	Representativeness		Ongoing
			Broad Population	State/Local	
Current Population Survey (CPS) ³			x	x ⁴	x ⁵
Decennial Census			x	x	x ⁶
Early Childhood Longitudinal Study - Birth Cohort (ECLS - B)	x				x
Early Childhood Longitudinal Study - Kindergarten Cohort (ECLS - K)	x				x
Fragile Families and Child Well-Being Study	x				x
Health and Retirement Study (HRS)	x				x
Marital Instability Over the Life Course Study	x				
Medicare Current Beneficiary Survey (MCBS)	x				x
National Health Interview Survey (NHIS)			x		x
National Longitudinal Survey of Mature Women (NLSMW)	x				
National Longitudinal Survey of Young Women (NLSYW)	x				
National Longitudinal Survey of Youth - 1979 (NLSY79)	x				x
National Longitudinal Survey of Youth - 1997 (NLSY97)	x				x
National Survey of America's Families (NSAF)	x	x	x	x ⁷	
National Survey of Families and Households (NSFH)	x				
Panel Study of Income Dynamics (PSID)	x				x
Survey of Program Dynamics (SPD)	x				

* An x indicates that the data set fulfills the criterion.

¹ All information is current as of January 2005, except for selected updates where information was readily available.

² For a data set to meet this criterion it must be able to provide recent estimates of marriage and divorce rates. Data sets that do not meet the 'relevancy' criterion (i.e., cannot be used to compute marriage and divorce rates) will not meet the 'reliability' criterion (i.e., marriage and divorce rates likely to match an external source).

³ The Current Population Survey included a supplement gathering retrospective marital histories approximately every five years from 1971 to 1995. It has since discontinued this supplement, so it no longer meets the 'relevancy' and 'reliability' criteria.

⁴ The CPS can provide state-level estimates by pooling two or more years of data.

⁵ The CPS still collects marital status at a point in time, but no longer collects marital histories.

⁶ The Decennial Census is ongoing, but starting in 2010, it will no longer collect marital status information.

⁷ The National Survey of America's Families has representative estimates for 13 states.

Early Childhood Longitudinal Studies: ECLS-K and ECLS-B. The Early Childhood Longitudinal Studies began in 1998 for the kindergarten cohort (ECLS-K) and in 2001 for the birth cohort (ECLS-B). Each study consists of a baseline interview (at entrance to kindergarten and at birth, respectively) with several follow-up interviews. It collects data for approximately 13,500 to 22,000 children and their parents. The survey collects information on parents' marital and cohabitation status at each interview date, enabling the study of the effects on marriage, divorce, and cohabitation on children. However, this information is only collected longitudinally (at each interview), so the reliability of the data is an issue for these two data sets. Additionally, the sample for adults is only representative (on the national level) of the parents with children in those two cohorts.

Fragile Families and Child Wellbeing Study. The Fragile Families and Child Wellbeing Study is a longitudinal survey of the mothers and fathers of newly born children in large city hospitals, with an emphasis on parents with non-marital births. Baseline interviews with 4,700 families took place between 1998 and 2000, with follow-up interviews one, three, and five years later. The baseline data and the first and third year follow-up data are available. The fifth year follow-up data is expected to be available in the summer/fall 2008. The survey follows the relationship quality between the mother and father, regardless of marital status, as well as any other relationships the parents may have with other partners. However, this data is collected longitudinally and represents only a very small, distinct subpopulation.

Health and Retirement Study. The Health and Retirement Study (HRS) is an ongoing panel survey of older Americans that provides retrospective marriage and divorce events information. The HRS began in 1992 and interviews individuals biennially. The sample includes individuals born in 1953 or earlier (ages 51 and older in 2004) and has a total of five cohorts. The two original cohorts, individuals born between 1931 and 1941 and individuals born in or prior to 1923, were first sampled in 1992 and 1993. Two other cohorts were added in 1998,⁷¹ and a fifth cohort was added in 2004. The HRS collected marital histories in the initial wave of the panel, for up to three marriages. For marital status changes since the initial wave, data users must rely on the longitudinal data. Additionally, since the HRS collects data only on older Americans, it captures only a small portion of marriages and divorces and is not representative for the population at large.

Marital Instability Over the Life Course Study. The Marital Instability Over the Life Course Study is a panel survey that began with 2,000 households in 1980 and continued through 2000. The sample includes married individuals who were between the ages of 18 and 55 in 1980. While the main focus of the study is marriage quality, it does collect a retrospective marital history. However, these estimates are representative only of married individuals in 1980, which makes studying marriage and divorce with this data set problematic. Moreover, the small sample only allows for analysis at the national level. Finally, the panel ended in 2000 and there are no plans to start a new panel.

Medicare Current Beneficiary Survey. The Medicare Current Beneficiary Survey (MCBS) is an ongoing survey of 12,000 individuals from the Medicare enrollment file, with data currently available from 1991 to 2002. Each individual is part of the study for four years, with

⁷¹ The cohort introduced in 1993 was originally a separate study, the Study of Assets and Health Dynamics Among the Oldest Old (AHEAD). The two studies were merged in 1998.

interviews taking place three times a year. Panels are rotated out of the survey each year, and new panels are added to replace old ones. The main focus of the MCBS is on health status, insurance coverage, access to care, and medical costs, but the study does collect data on marital status. The marital status data are collected longitudinally (not retrospectively), so the data on changes in marital status might not be wholly reliable. Also, since the sample population is drawn from Medicare beneficiaries, it is representative of only the subpopulation of older Americans on Medicare.

National Health Interview Survey. The National Health Interview Study (NHIS) is a cross-sectional survey of 36,000 households from 1957 to the present. Its main focus is on individuals' health problems, health insurance, access to coverage, and behavior that may lead to future health issues. In addition, the questionnaire asks about marital status, with cohabitation embedded within the marital status question. However, it does not ask about changes in marital status, so marriage and divorce rates cannot be calculated.

National Longitudinal Studies: NLSMW, NLSYW, NLSY79, and NLSY97. The National Longitudinal Surveys (NLS), a project of the U.S. Bureau of Labor Statistics, track the lives of selected respondents for upwards of 30 years. There are four National Longitudinal Survey data sets that we consider – NLS Mature Women (NLSMW), NLS Young Women (NLSYW), NLS Youth cohort 1979 (NLSY79), and NLS Youth cohort 1997 (NLSY97).⁷² Initially, data for each of the samples were collected annually; however, the NLSY97 cohort is the only group still followed each year.⁷³ These surveys collect data on current marital status and changes in marital status since the last interview. Additionally, in recent years, cohabitation status and changes in cohabitation status has also been collected. While the NLS has detailed marriage and divorce data for the past 30 years for several subgroups, problems of attrition lead to questions of its reliability. Additionally, these studies can only provide estimates at the national level and not at state or local levels.

National Survey of America's Families. The National Survey of America's Families (NSAF) is a survey of 43,000 households administered in 1997, 1999, and 2002. The survey is representative of the civilian, non-institutionalized population under 65 for the nation as a whole as well as thirteen oversampled states. The NSAF provides detailed relationship information of all household members, thereby capturing cohabitation status for all household members. The 1997 and 1999 surveys only collected current marital status, although the 2002 survey collected information on change in marital status, making it possible to calculate marriage and divorce rates. However, there are no plans to field another survey, so the NSAF cannot be used to measure marriage and divorce in the future.

National Survey of Families and Households. The National Survey of Families and Households (NSFH) is a panel survey of 9,600 households, sampling non-institutionalized civilians aged 19 and older. The survey included three waves and was administered in 1987-88, 1992-94, and 2001-02. There are no plans for additional waves of the survey. The NSFH

⁷² More specifically, these four cohorts are the 1968 Mature Women cohort (ages 30–44 as of 3/31/67), 1968 Young Women cohort (ages 14–24 as of 3/31/66), 1979 Youth cohort (ages 14–24 as of 12/31/78), and 1997 Youth cohort (ages 12–16 as of 12/31/96). Data for the mature women and young women cohorts were last collected in 2003; no future collection is planned. In addition to these cohorts, there were two additional male cohorts that have since been discontinued. These are the 1967 Older Men cohort (ages 45–59 as of 3/31/66) and the 1967 Younger Men cohort (ages 14–24 as of 3/31/66).

⁷³ The NLSY79 was fielded annually until 1994 and biennially since that time.

collected retrospective marital and cohabitation histories as part of the first wave and has collected marital status and changes in marital status for each subsequent wave. In addition, the survey collects information on marriage quality, including amount of time spent together and how they resolve disputes. The NSFH sample was representative of the U.S. population in the late 1980s, but is not representative of today's population. Further, the sample does not permit representative estimates at the state or local levels.

Panel Survey of Income Dynamics. The Panel Survey of Income Dynamics (PSID) is an ongoing panel survey of roughly 8,000 families and 37,500 individuals that has been running since 1968. Respondents were interviewed annually between 1968 and 1996 and biennially since 1997. While the PSID moved from annual to biennial collection in 1997, the survey directly asks questions about marital status changes since the last survey, capturing all marriage disruptions. The PSID also collected retrospective marital histories in 1985, 17 years after the start of the survey. Cohabitation status is gathered for the household head only. Because of the longitudinal nature of the PSID and the fact that many years elapsed between the start of the survey and the collection of marital histories, there are concerns that marriage and divorces statistics from the PSID are not reliable due to attrition. The PSID is also not representative of the current U.S. population, since the main sample was drawn in 1968.⁷⁴

Survey of Program Dynamics. The Survey of Program Dynamics (SPD) is a continuation of the 1992 and 1993 SIPP panels yielding data for roughly 16,000 households from 1992 until 2002. Retrospective marriage history data in the SPD is from the SIPP panel. Beyond what was collected in the SIPP, the SPD collected marital status information in each wave. In addition, the SPD included questions about marriage quality, such as how happy respondents are with their relationships, how often and why conflicts occur with their spouse/partner, and whether they have considered separating. This relationship quality and conflict information, however, was never released to the public because of confidentiality concerns. While the SPD collects data on marriage and divorce, there are issues with the SPD that preclude it from being used to measure marriage and divorce rates. The first problem is that the SPD has had significant amounts of attrition over the course of the panel. Secondly, there are no plans to continue the SPD in the future. Finally, the sample is only large enough to produce representative estimates at the national level and not the state level.

⁷⁴ The PSID introduced a sample of immigrants (with a focus on Latinos) in 1990, but dropped them in 1995.

Exhibit A.2: Summary of Other Data Sets¹

Name	Population	Sample Size²	Survey Design	Representative Areas³	Marriage/Cohabitation⁴
Current Population Survey (CPS)	Non-institutionalized civilians ages 15 and over	57,000 HH (112,000 individuals)	<ul style="list-style-type: none"> • Cross-sectional • Monthly data • Available: 1945 - 2007 	Nation, State (pooled)	Marital Status (CS) Cohabitation Status (CS) Marital Status Change (R) ⁵
Decennial Census	All individuals	All households and individuals ⁶	<ul style="list-style-type: none"> • Cross-sectional • Decennial • Available: 1790 – 2000; 1850 - 2000 (microdata) 	Nation, State, County, Census Tract ⁶	Marital Status (CS) Cohabitation Status (CS)
Early Childhood Longitudinal Study - Birth Cohort (ECLS - B) ⁷	Children born in 2001	13,500 individuals	<ul style="list-style-type: none"> • Single panel • Baseline: 2001 (Birth) • Follow-up: 18-, 30-, and 48-months old, kindergarten and first grade • Available: 2001 	Nation	Marital Status (PD) Cohabitation Status (PD) Marital Status Change (PD) Cohabitation Status Change (PD)
Early Childhood Longitudinal Study - Kindergarten Cohort (ECLS-K) ⁷	Children attending kindergarten in fall 1998	22,000 individuals	<ul style="list-style-type: none"> • Single panel • Baseline: 1998 (Kindergarten Fall) • Follow-ups: Kindergarten Spring, 1st, 3rd, and 4th grades • Available: 1998 -1999 	Nation	Marital Status (PD) Cohabitation Status (PD) Marital Status Change (PD) Cohabitation Status Change (PD)
Fragile Families and Child Wellbeing Study	Mothers and fathers of newly born children in hospitals in cities with populations over 200,000 people	4,700 families (8,000 individuals)	<ul style="list-style-type: none"> • Single panel • Baseline: 1998 - 2000 (Birth) • Follow-ups: 1, 3, and 5 years • Available: Baseline, 1 and 3 year follow-up 	Cities with populations over 200,000 and 20 selected cities ⁸	Marital Status (PD) Cohabitation Status (PD) Marital Status Change (PD) Cohabitation Status Change (PD)
Health and Retirement Study (HRS)	Individuals born before 1948 (non-institutionalized at baseline)	22,000 individuals ⁹	<ul style="list-style-type: none"> • Five single cohort panels¹⁰ • Baselines: 1992, 1993, 1998, 2004 • Biennial follow-ups • Available: 1992 - 2004 	Nation	Marital Status (PD) Marital Status Change (PD, R)
Marital Instability Over the Life Course Study	Individuals, ages 18-55, in intact marriages in 1980	2,000 individuals	<ul style="list-style-type: none"> • Single panel • Baseline: 1980 • Follow-ups: 1983, 1988, 1992-94, 1997, 2000 • All years available 	Nation	Marital Status (PD) Cohabitation Status (PD) Marital Status Change (PD, R) Cohabitation Status Change (PD)
Medicare Current Beneficiary Survey (MCBS)	Individuals in Centers for Medicare & Medicaid Services (CMS)'s Medicare enrollment file	12,000 individuals	<ul style="list-style-type: none"> • Four-year rotating panels (12 interviews) • Annual data • Available: 1991 - 2002 	Nation	Marital Status (PD) Marital Status Change (PD)

Exhibit A.2: Summary of Other Data Sets¹

Name	Population	Sample Size²	Survey Design	Representative Areas³	Marriage/Cohabitation⁴
National Health Interview Survey (NHIS)	Non-institutionalized civilian individuals	36,000 HH	<ul style="list-style-type: none"> • Cross-sectional • Annual data • Available: 1957 - 2006 	Nation	Marital Status (CS) Cohabitation Status (CS)
National Longitudinal Survey of Mature Women (NLSMW)	Non-institutionalized civilian women born between 1923 and 1937	5,000 individuals (currently 2,300 individuals)	<ul style="list-style-type: none"> • Single panel • Baseline: 1967 • Follow-ups: Every few years, currently biennial • Available: 1967 – 2003 	Nation	Marital Status (PD) Cohabitation Status (PD) Marital Status Change (PD, R) Cohabitation Status Change (PD)
National Longitudinal Survey of Young Women (NLSYW)	Non-institutionalized civilian women born between 1942 and 1952	5,000 individuals (currently 2,800 individuals)	<ul style="list-style-type: none"> • Single panel • Baseline: 1968 • Follow-ups: Every few years, currently biennial • Available: 1968 – 2003 	Nation	Marital Status (PD) Cohabitation Status (PD) Marital Status Change (PD) ¹¹ Cohabitation Status Change (PD)
National Longitudinal Survey of Youth - 1979 (NLSY79)	Non-institutionalized individuals born between 1954 and 1964	12,600 individuals (currently 8,000 individuals)	<ul style="list-style-type: none"> • Single panel • Baseline: 1979 • Follow-ups: Annual until 1994, currently biennial • Available: 1979 – 2004 	Nation	Marital Status (PD) Cohabitation Status (PD) Marital Status Change (PD) ¹¹ Cohabitation Status Change (PD)
National Longitudinal Survey of Youth - 1997 (NLSY97)	Non-institutionalized individuals born between 1980 and 1984	9,000 individuals	<ul style="list-style-type: none"> • Single panel • Baseline: 1997 • Follow-ups: Annual • Available: 1997 – 2005 	Nation	Marital Status (PD) Cohabitation Status (PD) Marital Status Change (PD) ¹¹ Cohabitation Status Change (PD)
National Survey of America's Families (NSAF)	Non-institutionalized civilian individuals under age 65	43,000 HH (100,000 individuals)	<ul style="list-style-type: none"> • Cross-sectional • Annual data • Available: 1997, 1999, 2002 	Nation, 13 States	Marital Status (CS) Cohabitation Status (CS) Marital Status Change (R) ¹²
National Survey of Families and Households (NSFH)	Non-institutionalized individuals 19 and over	9,600 HH (13,000 individuals)	<ul style="list-style-type: none"> • Single panel • Baseline: 1987-88 • Follow-ups: 1992-94, 2001-02 • Available: 1987-88, 1992-94, 2001-02 	Nation	Marital Status (PD) Cohabitation Status (PD) Marital Status Change (PD, R) Cohabitation Status Change (PD, R)
Panel Study of Income Dynamics (PSID)	Non-institutionalized civilian individuals	8,000 families (37,500 individuals)	<ul style="list-style-type: none"> • Single panel • Baseline: 1968 • Follow-ups: Annual until 1997, currently biennial • Available: 1968-2005 	Nation	Marital Status (PD) Cohabitation Status (PD) Marital Status Change (PD, R) Cohabitation Status Change (PD)
Survey of Program Dynamics (SPD)	Non-institutionalized civilian individuals	16,000 HH	<ul style="list-style-type: none"> • Single panel • Baseline: 1992/93 SIPP panels • Follow-ups: Annual (1997 - 2002) • Available: 1992 - 2002 	Nation	Marital Status (PD) Cohabitation Status (PD) Marital Status Change (PD, R) Cohabitation Status Change (PD)

Exhibit A.2: Summary of Other Data Sets¹

Name	Population	Sample Size ²	Survey Design	Representative Areas ³	Marriage/Cohabitation ⁴
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¹ All information is current as of January 2005, except for selected updates where information is readily available.

² The sample sizes presented in this table are those of the most recent data available as of January 2005, except for selected updates where information was readily available.

³ This table reports the representativeness of each survey at the national, state, and local levels. Several of these data sets are also representative for regions of the country.

⁴ PD = Panel Data, CS = Cross-Sectional Data, R = Retrospective Data.

⁵ The Current Population Survey included a supplement gathering retrospective marital histories roughly every 5 years from 1971 until 1995.

⁶ Marital status was only included in the 2000 Census long form, a survey of 1-in-6 households. Marital status was included on the short form prior to 2000, yielding block level estimates.

⁷ Researchers may use the Early Childhood Longitudinal Surveys to look at marriage/cohabitation of sample children's parents.

⁸ The Fragile Families and Child Wellbeing Study is representative of non-marital births in cities with over 200,000 people. There is debate over its representativeness of marital births.

⁹ This sample size is for all cohorts interviewed in 2002. The sample size of the cohort introduced in 1992 was 12,600 individuals. The sample of AHEAD, the cohort introduced in 1993, was 8,200.

¹⁰ The original sample size for all four cohorts in the 1998 survey was 22,000.

¹¹ Two additional cohorts are scheduled to be introduced, one in 2004 and one in 2010.

¹² While all the National Longitudinal Studies contain some retrospective data, the marital and cohabitation status change information is almost entirely from the longitudinal data.

¹³ Marital status change is only available for the 2002 NSAF.

VII. APPENDIX B: MARRIAGE AND DIVORCE QUESTIONS

This appendix presents the questions each of the three key data sets ask about marriage and divorce. These questions are from the 2008 ACS, the 2002 NSFG, and the 2004 SIPP survey questionnaires.

American Community Survey (ACS)

1. *What is this person's marital status?*
 - 1) Now married
 - 2) Widowed
 - 3) Divorced
 - 4) Separated
 - 5) Never married

2. *In the past 12 months did this person get --*
 - 1) Married? (yes/no)
 - 2) Widowed? (yes/no)
 - 3) Divorced? (yes/no)

3. *How many times has this person been married?*
 - 1) Once
 - 2) Two times
 - 3) Three or more times

4. *In what year did this person last get married?*
Year _____

National Survey of Family Growth (NSFG)

1. *What is your current marital status?*
 - 1) Married
 - 2) Not married but living together with a partner of the opposite sex
 - 3) Widowed
 - 4) Divorced
 - 5) Separated, because you and your spouse are not getting along
 - 6) Never been married

2. *(Including your present marriage,) how many times have you been married?*
Number _____

Questions from female questionnaire:

Following questions cover all marriages:

3. *In what month and year were you and (HUSBAND) married?*

4. *How old were you when you got married (this [nth] time)?*
Age in years _____

5. How old was (HUSBAND) when you got married?

Age in years _____

6. In what month and year was he born?

7. Some couples live together without being married. By living together, we mean having a sexual relationship while sharing the same usual address. Did you and (HUSBAND) live together before you got married?

1) Yes

2) No

8. In what month and year did you and he first start living together?

9. At the time you began living together, were you and he engaged to be married or have definite plans to get married?

1) Yes

2) No

10. (Is/Was) (HUSBAND) Hispanic or Latino, or of Spanish origin?

(Asked only for the respondent's 1st or current/separated husband)

1) Yes

2) No

11. Which of the groups on Card 2 describes (HUSBAND)'s racial background? Please select one or more groups.

(Asked only for the respondent's 1st or current/separated husband)

1) American Indian or Alaska Native

2) Asian

3) Native Hawaiian or Other Pacific Islander

4) Black or African American

5) White

12. What is the highest level of education (HUSBAND) has completed?

(Asked only for current or separated husbands)

1) Less than high school

2) High school graduate or GED

3) Some college but no degree

4) 2-year college degree (e.g., Associate's degree)

5) 4-year college graduate (e.g., BA, BS)

6) Graduate or professional school

13. At the time you and he were married, had (HUSBAND) been married before?

1) Yes

2) No

14. *When you and he got married, did he have any children, either biological or adopted, from any previous relationships?*

- 1) Yes
- 2) No

15. *How many children did he have?*

Number _____

16. *How did your (nth) marriage end?*

(Asked if respondent is not married to or separated from this husband)

- 1) Death of husband
- 2) Divorce
- 3) Annulment

17. *In what month and year did (HUSBAND) die?*

18. *In what month and year did your (divorce become final/annulment take place)?*

19. *In what month and year did you and (HUSBAND) stop living together (for the last time)?*

Questions from male questionnaire:

20. *Have you ever lived together with a female sexual partner? By living together, I mean having a sexual relationship while sharing the same usual residence.*

- 1) Yes
- 2) No

21. *How many female sexual partners have you lived with in your life?*

Number _____

Following questions cover all marriages:

22. *In what month and year were you and she married?*

23. *How old were you when you and (WIFE) got married?*

Age in years _____

24. *Some couples live together without being married. By living together, we mean having a sexual relationship while sharing the same usual address. Did you and (WIFE) live together before you got married?*

- 1) Yes
- 2) No

25. *In what month and year did you and she first start living together?*

26. *How old were you when you and (WIFE) first started living together?*

Age in years _____

27. *At the time you first started living together with (WIFE), were you and she engaged to be married or did you have definite plans to get married?*

- 1) Yes
- 2) No

28. *How did your marriage end?*

- 1) Death of wife
- 2) Divorce
- 3) Annulment
- 4) Separation

29. *In what month and year did (WIFE) die?*

30. *In what month and year did your divorce become final?*

31. *In what month and year did your annulment take place?*

32. *In what month and year did you and (WIFE) last stop living together?*

33. *In what month and year was she born?*

(Asked if this woman is the respondent's current wife)

34. *How old is (WIFE) now?*

(Asked if this woman is the respondent's current wife)

Age in years at last birthday _____

35. *How old was (WIFE) when (she died/ your divorce became final/your annulment took place/ you and she last stopped living together)?*

Age in years _____

36. *Was/Is (WIFE) Hispanic or Latino, or of Spanish origin?*

(Asked if this woman was the respondent's first wife)

- 1) Yes
- 2) No

37. *Which of the groups describes (WIFE)'s racial background? Please select one or more groups. ENTER all that apply.*

(Asked if this woman was the respondent's first wife)

- 1) American Indian or Alaska Native
- 2) Asian
- 3) Native Hawaiian or Other Pacific Islander
- 4) Black or African American
- 5) White

38. *What is the highest level of education (WIFE) has completed?*

(Asked if this woman is the respondent's current wife)

- 1) Less than high school

- 2) High school graduate or GED
- 3) Some college but no degree
- 4) 2-year college degree (e.g., Associate's degree)
- 5) 4-year college graduate (e.g., BA, BS)
- 6) Graduate or professional school

39. *At the time you and she (were married/started living together), had she ever been married?*

- 1) Yes
- 2) No

Survey of Income and Program Participation

1. *What is your current marital status?*

- 1) Married, spouse present
- 2) Married, spouse absent
- 3) Widowed
- 4) Divorced
- 5) Separated
- 6) Never married

2. *How many times have you been married?*

- 1) 1
- 2) 2
- 3) 3
- 4) 4+

Following questions cover up to 3 marriages:

3. *In what month and year did you get married for the (nth) time?*

4. *Did your (nth) marriage end in widowhood or divorce?*

- 1) Widowhood
- 2) Divorce

5. *In what month and year were you widowed?*

6. *In what month and year were you divorced?*

7. *In what month and year did you actually stop living with your (nth) spouse?*