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**An Evaluation of SIPP 2004 Wave 1 Asset Ownership Reports**

Jeffrey C. Moore

Statistical Research Division  
U.S. Census Bureau  
Washington, DC 20233

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## An Evaluation of SIPP 2004 Wave 1 Asset Ownership Reports

Jeffrey C. Moore  
Statistical Research Division  
U.S. Census Bureau

### **Abstract:**

This paper presents preliminary comparisons of asset ownership estimates derived from wave 1 of the 2004 panel of the Survey of Income and Program Participation (SIPP) with estimates derived from the 2001 SIPP panel and from other sources. Of primary interest are the estimated ownership rates for “rare” asset types. In contrast to the procedures used in 2001, in the new questionnaire in use for 2004 some respondents, by design, do not receive the full battery of specific, individual questions about each of these asset types, but instead respond only to a single, global, screening question asking about “any other assets...” The primary goal of this instrument modification is to reduce burden – to increase efficiency generally, and in particular to reduce the number of unnecessary questions asked. Its primary risk, of course, is that removing specific cues for some types of assets might cause additional underreporting of asset income sources, beyond the baseline level of underreporting that is known to occur under standard interviewing practices. The paper also reviews evidence concerning the possible impact of other instrument changes on ownership estimates for retirement accounts and common income-producing assets, the other major categories of assets covered in SIPP.

**Keywords:** data quality, efficiency, questionnaire design, response burden, screening procedures

### **Executive Summary:**

The comparison of wave 1 estimates of asset ownership from the 2004 SIPP panel with estimates from the 2001 panel, and from other sources, suggests the following tentative conclusions:

- (a) Rare assets – The 2004 wave 1 (W1) ownership estimates for the six asset types in this category consistently exceed the estimates from 2001-W9, the survey wave conducted immediately prior to 2004-W1. The picture is more mixed for the comparison to 2001-W1. There the differences are quite small and often non-significant, but where significant differences exist, they are in the direction of reduced reporting levels in 2004. However, both the consistent declines in estimate levels from 2001-W1 to 2001-W9 and other data suggest that real trends in asset ownership were, in fact, down over this period of time, so the 2001-2004 wave 1 differences do not necessarily indicate a decline in quality. Overall, the results of the 2001-2004 comparison are consistent with the hypothesis that the new screening procedures had no adverse impact on ownership estimates for rare asset types.
- (b) Retirement accounts – Regardless of whether the comparison group is 2001-W1 or 2001-W9, estimated ownership of IRA/Keogh accounts and 401(k)/403(b)/thrift plans is significantly higher in 2004-W1 than in the 2001 panel. This probably indicates more

complete reporting of retirement account ownership in the new panel as a result of subtle changes to the retirement account questions.

- (c) Common assets – As with the rare assets, the 2004-W1 ownership estimates for the seven common asset types consistently exceed the estimates from 2001-W9, whereas the comparison to the 2001-W1 estimates yields inconsistent effects. These results, in concert with information about real trends over time, are consistent with the hypothesis of equivalent data quality in the 2004-W1 and 2001 reports, and may also indicate quality gains in some instances.

## **1. Introduction**

The primary focus of this paper is a comparison of wave 1 (W1) person-level estimates of asset ownership from two different Survey of Income and Program Participation (SIPP) panels, 2001 and 2004, in order to draw tentative conclusions about the data quality impacts of some of the SIPP 2004 instrument's new features. It also looks at data from wave 9 (W9) of the 2001 SIPP panel, from the 2001 version of the Federal Reserve Board's Survey of Consumer Finances (SCF), and from the past four administrations of CPS's "Annual Social and Economic Supplement" (ASEC; formerly known as the March Income Supplement). These other data sources offer some additional information to help combat the major limitation of the 2001-W1 vs. 2004-W1 comparison, which are (a) the confounding potential of real change in asset ownership rates over time with estimate changes due to instrument differences, and (b) the absence of benchmarks against which to assess the magnitude and direction of bias in the estimates. The 2001-W9 vs. 2004-W1 comparison largely removes the confounding factor of true change over time – the estimates are separated in time by only 4 months – but of course replaces it with another: differential nonresponse and its attendant (and imperfect) adjustments. The SCF results offer some useful clues concerning "true" ownership rates at approximately the time of the 2001-W1 panel, but there are rather severe limitations to using these data for this purpose, and there are no comparable data for the 2004-W1 time period. Although the CPS/ASEC data, too, suffer some important limitations, they provide useful evidence concerning real trends in asset ownership over approximately the same period covered by the 2001-W1 and 2004-W1 interviews.

SIPP's primary interest in asset holdings has to do with the income those assets generate; secondarily the survey is also interested in the wealth represented by those assets. In either case, obtaining a complete report of asset holdings is important. Research has demonstrated that a substantial proportion of inaccuracy in income reports in surveys results from failure to obtain a complete report of income sources; for assets, in fact, this may be the main source of underreporting bias. Although there may be much random error in asset income amount reports, the evidence, while scant, suggests that amount reports from reported asset sources are relatively unbiased (Moore, Stinson, and Welniak, 2000).

## 2. Data Sources and Analysis Procedures

The SIPP data used in the analyses described in this report derive from the preliminary “TransCASES” files produced and maintained by the Demographic Surveys Division (DSD). The TransCASES files are SAS datasets which are produced directly from the instrument output (see Finke, Downs, and Forsythe, 1999). TransCASES data are minimally edited and recoded, primarily only insofar as those manipulations are executed in the course of administering the instrument. For example, the TransCASES files contain no edited or imputed data to correct for nonresponse. In fact, unedited (or minimally edited) data are the most appropriate to use for this analysis, which is focused on how people *responded* to the SIPP questionnaire, as opposed to the estimates of population parameters one might make from these data.

Sample design differences between the 2001 and 2004 panels, and the potential for differential impacts of nonresponse, render unweighted analyses somewhat suspect. Thus, the primary analyses – the comparison of 2001 and 2004 asset ownership estimates – use weighted data. The weights used are SIPP final weights (still provisional for 2004; recently revised for 2001), which include adjustments for selection probability, wave 1 noninterviews, and a second-stage adjustment to population controls. See Boies (2003) for a description of SIPP 2004 weighting procedures. To accommodate a chi-square analysis of the weighted estimates, the actual weighting factor used was a “small” weight, calculated for each case as the actual weight divided by the average non-zero weight across all interviewed adults. Using the small weight in place of the actual, full weight does not change the estimates, but does result in a weighted n that is approximately equal to the unweighted n, and thus does not inflate the chi-square estimates. (Analyses were carried out on the unweighted data as well; those analyses do not point to any importantly different conclusions; see Table 3.)

Following guidance from Steve Mack (DSMD), in addition to the “small” weight adjustment, a design effect adjustment was also implemented, to account for the clustering of the SIPP sample and other departures from a simple random sample design. Final/official estimated design effects for the 2004 panel have yet to be produced. It is assumed that design effects for the 2004 panel will be comparable to those calculated for the 2001 panel. For the current analysis, therefore, DSMD recommended assuming a design effect of 1.94 – the mid-point between the estimated figure for 2001 wave 1 (1.77) and 2001 wave 9 (2.12). In the analyses presented below, the design effect is used to adjust the critical value of chi-square in tests of statistical significance. In essence, the chi-square statistic (in this case, produced by SAS) is evaluated against the standard critical value adjusted by a factor of 1.94 – e.g., for  $p < .10$  and 1 df the critical value is not 2.71, but  $2.71 \times 1.94$ , or 5.26.

Note that the estimates presented in this report are preliminary, and based only on actual responses to the survey. They are presented here only for the purpose of this methodological investigation, and no claims are made as to their concordance (or lack thereof) with more rigorously developed “official” estimates of asset ownership in the U.S. population.

### **3. New Instrument Procedures In 2004-W1 Regarding Asset Ownership**

New procedures were introduced throughout the SIPP instrument in 2004, based on the results of a multi-year research and development program known as the SIPP Methods Panel. (See Doyle, Martin, and Moore, 2000, for details.) Table 1 contrasts the procedures used in SIPP 2001 and SIPP 2004 to capture asset ownership. The instrument differences for retirement accounts and common asset types are relatively minor. The retirement account questions are simply separated out from the list of other assets covered in the SIPP interview. (This change, which seemed minor at the time it was implemented, in fact appears to have had a significant positive impact on data quality for retirement accounts – see section 6a.). The common asset questions have some modest changes in wording and fills.

The “rare” asset questions, however, are subject to major new screening procedures in 2004. The 2004 interview proceeds directly to the set of individual questions about rare asset types only if the person reports ownership of at least one of the “common” types. (This slight oversimplification captures the gist of the new procedures; see Table 1 for details.) If the person reports no common assets, he/she is asked a global “...or any other financial investments” question. A “no” to the global question results in a “no” being coded for all of the rare assets; a “yes” (or DK) defaults to the standard practice of administering each individual rare asset question. These procedures were based on research which confirmed that respondents who reported owning none of the common asset types were very unlikely to own any of the rare ones – see Moore (2001b). In contrast, all 2001 SIPP panel respondents were asked individual questions about each of the rare asset types regardless of their reports about the common ones.<sup>1</sup> A legitimate concern about the new procedures is whether they might result in reduced reporting of the rare asset types. Analysis of Methods Panel field test results did not show any evidence of data quality problems of this sort (Moore, 2001b), but it is important to assess whether or not the screening procedures are similarly benign in the “live” 2004 SIPP panel.

### **4. Rare Asset Screening Procedure Usage in 2004-W1**

As noted above, ownership questions for the six rarest types of assets included in SIPP were individually administered to only a subset of respondents in 2004-W1. Details are as follows (also see Table 2): The 2004-W1 sample yielded about 86,000 interviewed adults, of whom

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<sup>1</sup> Table 1 does not reveal the fact that the 2001 wave 1 questionnaire allowed interviewers to record a response of “N” if the respondent spontaneously reported owning no assets, which automatically resulted in a “no” being recorded for each individual asset type. This procedure was the cause of some concern among both subject matter experts and methodologists, on the grounds that it provided an overly easy and uncontrolled “escape” from the entire asset ownership question battery. A high rate of use of the “N” option (approximately 23% of all 2001 wave 1 interviews had this response recorded) and a clear upward trend in its use across wave 1’s four rotation groups (indicating that interviewers’ familiarity with the presence of the “N” option increased its use; data not shown) lent credence to these concerns. Thus the new 2004 procedures sought a middle ground which would allow some questions to be avoided, but only under conditions supported by empirical evidence, and only under the strict control of the automated instrument itself.

approximately 84,300 had non-blank data in the asset ownership series. (Presumably, the 1700 or so others with blank data throughout the asset ownership series were partial interview “break-offs,” in which the interview was terminated before the asset ownership questions could be administered.) Of the 84,300 adults to whom the W1 asset ownership question series was administered, approximately 37,400 reported owning none of the relevant common assets (shown in Table 1 as the starred (\*) asset types associated with the ASSET1 variable for 2004-W1). These respondents were administered the new screening question; the other 46,900 respondents (approximately) skipped the screening question and simply continued on with the full battery of individual questions about each of the six rare asset types. Only about 1.5% of the 37,400 people who were asked the screening question responded “yes;” they also proceeded on to the individual questions about rare assets. The remaining 36,850 individuals said “no” to the global “any other asset” screening question, and thus were automatically recorded as a “no” for each of the six specific rare asset types. These procedures resulted in a 14.5% reduction in the number of questions asked in 2004-W1 to establish asset ownership, compared to what would have been the case without any screening procedures; see Table 2. (A re-analysis of results presented in Moore (2001b) yields an almost identical efficiency estimate – a 14.4% reduction in asset ownership questions – in the Methods Panel’s 2000 field test.)

## 5. Comparison of Asset Ownership Estimates

Table 3 shows the 2001-W1, 2001-W9, and 2004-W1 ownership rate estimates for all 15 asset types covered in SIPP, both weighted (see Section 2, above) and unweighted. Where appropriate, it further breaks ownership down into jointly-owned and individually-owned assets. The table’s four sections cover: (1) retirement accounts; (2) “common” assets; and “rare” assets, treated both (3a) separately; and (3b) as a group (ownership of any rare asset). The “Difference” columns subtract the 2004 estimate from the 2001 estimate; thus, negative differences (shown in parentheses) mean that the 2004 estimate exceeds the 2001 estimate. All differences *except* those few that are individually shaded are statistically significant (see note 4 of Table 3).

Table 4 presents person-level ownership estimates for various categories of assets from several administrations of the Annual Social and Economic Supplement (ASEC) of the Current Population Survey (CPS), which is conducted each March and covers the preceding calendar year. The table shows estimates for the four most recent years for which data are available, which corresponds roughly to the time period from SIPP 2001-W1 to 2004-W1. Because of the many, many conceptual differences between the CPS/ASEC estimates and the SIPP estimates presented in Table 3, the former are not intended to serve as any sort of indicator of what the correct *level* of SIPP-reported ownership should be. Rather, they are intended to shed light on actual trends in asset ownership between the time of the SIPP 2001-W1 interview and SIPP 2004-W1. The CPS/ASEC results offer quite solid evidence that – at least for the asset categories included in the CPS/ASEC survey – ownership steadily declined over those four years. The estimates of the magnitude of the decline vary somewhat by asset type, but it appears that a reasonable “across the board” estimate of the drop from 2000 to 2003 is somewhere in the

neighborhood of 10 percent.

Table 5 offers a comparison of SIPP estimates of household-level asset ownership rates<sup>2</sup> of various kinds with estimates of “family” ownership rates from the Federal Reserve Board’s 2001 Survey of Consumer Finances (SCF; see Aizcorbe, et al., 2003). The SCF is considered by some to be the “gold standard” for wealth-related estimates. Although Table 4 shows the SIPP estimates for both 2001-W1 and 2004-W1, the latter have no SCF counterpart and are included in the table only for the sake of completeness. (The 2001 SCF provides the most current available data from the survey; SCF 2004 is now in the field, but its results will not even begin to be available for many months.) The SIPP/SCF comparison, while somewhat instructive, has many important limitations, including different units of analysis (SIPP households vs. SCF families), different time periods (a 4-month period in late 2000 through early 2001 for SIPP 2001-W1; calendar year 2000 for the SCF), and asset category definitions that in several cases do not line up exactly, and in a couple of cases have substantial differences. Ignoring these limitations, it appears, in general, that SIPP’s 2001-W1 estimates are reasonably comparable to the SCF where category definition differences are not an issue; where the definitions are at issue (see the shaded cells) the SIPP estimates are noticeably less comparable, generally on the too-low side.

## 6. Detailed Results

This section discusses some implications of the various estimate comparisons with regard to the quality of the data produced by the new 2004-W1 SIPP questionnaire procedures. It focuses separately on three general categories of asset types – retirement accounts, common assets, and rare assets – and does so in that order, the order in which they are covered in the SIPP instrument. It is worth noting once again that the major shortcomings in the design of this research for assessing data quality (its non-design, actually) do not permit anything beyond the most tentative of conclusions.

### 6a. Retirement accounts

For each of the two types of retirement accounts the 2004-W1 estimate is about ten percent higher than its counterpart in 2001-W1 and 2001-W9 (i.e., a difference of 1.5-2.5 percentage points against a base of around 20 percent – see Table 3). There are several reasons to believe that a higher estimate of retirement account ownership is a better estimate.

First, the difference between the 2001-W1 and 2004-W1 estimates is most likely the result of different measurement procedures, as opposed to simply reflecting a real change in the prevalence of this characteristic over time. A key piece of evidence in this regard is the fact that the findings for both types of retirement accounts are remarkably similar, in both direction and

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<sup>2</sup> Note that the SIPP *household-level* estimates in Table 5 – even for the categories comprised of a single asset type – do not match their *person-level* counterparts in Table 3, because of the fundamental difference in the estimate concepts.

magnitude, to the results obtained during the Methods Panel field tests, where true change across time could not possibly have played a confounding role. The consistent result, across all three MP tests, and both categories of retirement accounts, was for the estimate derived from the experimental instrument to be about ten percent higher than the estimate from the control instrument<sup>3</sup>. Obviously, the differences observed in each of the MP field tests are not attributable to real differences “on the ground,” but rather to the different measurement procedures of the control and experimental instruments – which are the same measurement procedures used in the 2001-W1 and 2004-W1 production SIPP instruments, respectively.

Another piece of evidence which argues against the notion that the 2001-2004 differences reflect true change in retirement account ownership is that there doesn’t seem to have been much, if any, true change. The 2001-W1 and 2001-W9 estimates differ only trivially, with the W9 estimates slightly (non-significantly; test results not shown) higher. Both of these facts set retirement accounts apart from almost every other type of asset shown in Table 3. In virtually every other case – checking accounts is the lone exception – the 2001-W9 estimate is smaller than the 2001-W1 estimate, and often by a substantial (and significant; test results not shown) amount. Thus, in contrast to the general downward trend for other asset types, visible both in Table 3 and in the CPS/ASEC results summarized in Table 4, retirement account ownership appears to have remained relatively stable across the three years separating the 2001 and 2004 SIPP panels.

If the true trend for owning a retirement account was flat, then estimate differences must indicate differences in measurement quality, and there is reason to believe that the higher estimate in 2004-W1 is a higher quality estimate. First, there is the known general tendency for asset income sources to be underreported (see, e.g., Moore, Stinson, & Welniak, 2000). An important caveat here is that retirement accounts are not specifically implicated in the work cited by Moore, et al., so the general tendency must be extrapolated to include retirement accounts. However, Table 5’s comparison of the 2001-W1 estimate with the estimate from the SCF offers some evidence that is consistent with the notion that the SIPP estimate is too low, which would suggest that the 2004 estimate might be more accurate. Again, however, the many obvious caveats accompanying the SIPP/SCF comparison render this conclusion rather weak.

On the other hand, two seemingly minor procedural changes in the 2004 panel’s new instrument might have served to improve the reporting of retirement accounts, relative to the 2001 version of the survey. First, the retirement account questions were pulled out of the main asset list and featured more prominently at the beginning of the ownership question series, with their own brief introduction (see ASSETIRA and ASSET401 in Table 1). These changes were primarily motivated by the desire for more precision in the description of these types of assets, which was to be attained by not lumping them in with the other assets as “assets that provide income” (see 2001’s ASSTINT wording), since they do not – at least not at the moment of the SIPP interview.

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<sup>3</sup> On average across the three MP field tests, the proportions of interviewed adults reporting an IRA/Keogh account were 20.2% (experimental) and 18.1% (control); for 401k/403b/thrift plans the corresponding proportions were 24.8% and 22.7%.



These changes may have improved attention to the desired concept in 2004, and thus resulted in more complete reporting. Second was a wording change, which was implemented with the specific intent of generating more complete reporting. At the suggestion of HHES staff, we added “403b” as a cue in the second retirement account question, on the grounds that such accounts are increasingly common, and thus deserved specific mention. However, the argument that this change was a factor in the higher 2004 estimate is weakened by the fact that a similar increase from 2001 to 2004 can be seen in the “IRA” estimate, where the cues were almost the same in the two panels.

The weight of evidence thus suggests that the higher estimate of retirement account ownership in 2004 is due to having set the questions off on their own in 2004, rather than any changes in wording or any real-world growth in true ownership. There is also some justification for concluding that a higher estimate in 2004 indicates an increase in data quality, although this conclusion rests on somewhat less solid evidence.

#### **6b. “Common” assets**

Compared to the 2001 estimates drawn from the closest point in time – 2001-W9 – the 2004-W1 estimates of the ownership rates for the common asset types are uniformly higher across all seven asset categories, and in every case the difference is statistically significant. Results for the W1-to-W1 comparison, however, are notably less consistent, with two of the seven asset types showing a significantly higher weighted estimate in 2004 than in 2001, and three showing a significantly lower estimate (the estimates for savings bonds and money market accounts do not differ significantly). If the assumption that asset income sources are generally underreported is valid, then higher estimates (as for checking accounts and savings accounts) may be evidence of improved data quality. The converse may not be true, however, since, as noted above, Table 4 suggests that the time period between the 2001-W1 and 2004-W1 interviews was marked by declines in ownership of interest-bearing assets and of stocks and mutual funds, a conclusion that draws additional support from the general trend toward lower ownership estimates in wave 9 of the 2001 panel compared to their starting points in wave 1. Thus, a lower estimate in 2004-W1 compared to 2001-W1 is not necessarily indicative of reduced quality, but may simply track real change over time, thus suggesting comparable quality. Absent validating data or solid benchmarks, these conclusions must remain tentative<sup>4</sup>.

Changes to this part of the wave 1 SIPP questionnaire between 2001 and 2004 were fairly minimal, which probably explains the absence of major differences between the wave 1 estimates, and the absence, even, of a consistent direction to the differences. Two minor changes were intended to remove two presumably quite minor barriers to complete reporting, and thus

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<sup>4</sup> Table 5 suggests that the 2001-W1 SIPP estimates are in reasonable accord with the best estimates for that time period – insofar as the SCF serves as a gold standard for assessing SIPP data quality – with some variation across asset categories. The 2001-W1 estimate for CDs is very close to the SCF estimate; the estimate for savings bonds is perhaps slightly low; and the SIPP estimates for stocks and mutual funds may be modestly too high. But again, given the many important conceptual differences between the SIPP and SCF estimates, these conclusions are subject to major caveats.

may serve as forces toward higher estimates in 2004: (a) The 2004 questionnaire introduces the series of asset ownership questions as simply “questions ... about assets and other investments,” eliminating the “assets that provide income” qualifier used in 2001 (compare 2001’s ASSTINT wording with 2004’s ASSET1 – see Table 1). SIPP’s intent is to capture ownership of all potentially income-producing assets, regardless of whether they are actually income-producing at the moment; the new wording was introduced to better convey that intent. (b) For respondents with young children in the household, the 2004 questionnaire added a specific cue – “including joint custodial ownership with children” – to remind respondents that such assets are in scope. Prior cognitive research has suggested that respondents occasionally fail to report assets held jointly with a child because, even though they may be co-owners in a legal sense, they think of those assets as belonging solely to the child (Moore, 2001a).

A third change, also implemented in the interest of more clearly conveying the intent of the SIPP questions, might be expected to reduce reported ownership of out-of-scope asset holdings, and thus serve as a counterbalancing force toward lower estimates in 2004. This is the addition of a qualifying phrase for retirement account owners, placed just before the “money market” question: “Aside from any assets held as part of your retirement accounts, did you own, either individually or jointly...” (again, see 2004’s ASSET1 item, in Table 1). The 2001 questionnaire first informed respondents of this exclusion long after they reported ownership, in the introduction to the section of the questionnaire which asked about asset income. It is interesting to note that all of the common asset types which show a lower overall ownership estimate in 2004-W1 compared to 2001-W1 follow the new “Aside from...” statement. Further evidence that the new 2004 procedures were effective at weeding out out-of-scope asset holdings is the fact that, among retirement account owners, the proportion who reported that an individually-owned asset yielded no income during the reference period was consistently higher in 2001 than in 2004 (data not shown) – presumably, reporting no income was a convenient “escape” from the income amount questions for those in 2001 who had just discovered that retirement account holdings were to be excluded from their asset income reports.

Another important difference between the 2001 and 2004 SIPP instruments is how they ask about joint ownership. In 2001, all joint ownership was captured via responses to a question of the following sort: “Did you own your [asset] jointly with your [husband/wife]?”<sup>5</sup> The only type of joint ownership recognized by the 2001 survey was joint-with-spouse; in fact, only married-spouse-present respondents were even asked about joint ownership of the assets that

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<sup>5</sup>Two of the common asset types – stocks and mutual funds – did not follow the same procedures in 2001 for establishing joint-with-spouse and individual ownership. Instead of asking directly and explicitly whether or not the asset was owned jointly with the spouse and/or owned individually, the 2001 instrument asked how much income was received from stocks/mutual funds held jointly with the spouse, and how much income was received from stocks/mutual funds owned individually. This question format leaves a response of “none” ambiguous as to whether there was no income from the assets owned jointly/individually, or whether that asset was simply not owned jointly/individually.

they reported they owned.<sup>6</sup> The 2004 instrument, in contrast, asks about joint ownership of assets without regard to the person’s marital status, and even for married people removes the explicit reference to the spouse as joint owner: “Did you own any [asset] jointly with someone else?” and, if yes, “Who do you own [asset] jointly with?” The 2004 survey allows anyone, even someone outside the household, to be listed as a joint owner.

A not surprising outcome, given this procedural difference, is a generally higher level of reported joint ownership in 2004-W1 than in either 2001-W1 or 2001-W9 (see the middle columns of Table 3; CDs comprise the only exception to this pattern). Interestingly, and more surprisingly, there appears to be a counterbalancing tendency for levels of individual ownership to display the opposite difference – ignoring mutual funds and stocks (because of the problematic nature of the way joint/individual ownership data were collected – see fn 5, above, and note 5 in Table 3), it appears as if the 2004-W1 procedures produced some shifting of ownership into the “joint” category from what would have been categorized as individually-owned before the instrument change. Perhaps some 2001 respondents who co-owned an asset with someone other than their spouse chose to report that fact in the only place that was open to them – in response to the questions about individually-owned (non-joint-with-spouse) questions. In the 2004 instrument, however, those assets had a clear place to be reported as jointly-owned. Of course, this is mere conjecture.

Overall, there is little evidence to suggest that there were important or consistent changes in data quality in the 2004-W1 common asset ownership reports, which is consistent with the absence of important procedural differences. Some tentative conclusions receive some support: higher estimates for some asset types in 2004 *may* indicate somewhat more complete reporting; lower estimates for others *may* be a combined result of reduced overreporting (of out-of-scope retirement account holdings) and a simple tracking of real downward trends in asset ownership; joint asset holdings *may* have been captured more completely in 2004-W1. In general these effects, to the extent that they are real, do not appear to be large. A definitive understanding of the true meaning of the 2001-2004 estimate differences, however, requires additional information that is not available to this evaluation.

#### **6c. “Rare” assets**

The most obvious and distinguishing feature of Table 3’s estimates comparing rare asset ownership in 2001-W1 and 2004-W1 is the extent to which, unlike the retirement account and common asset categories, the differences in overall ownership rates do not differ statistically. This is not the case with regard to the comparison of 2001-W9 and 2004-W1, which, as with the other categories, shows consistently higher rare asset ownership levels for 2004-W1 (generally, significantly higher). With regard to the reporting of joint and/or individual ownership of the rare assets, the difference between 2001-W1 and 2004-W1 are very small, of inconsistent sign, and mostly non-significant. The 2001-W9 estimates, on the other hand, are consistently lower

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<sup>6</sup>Rental property is the lone exception to this generalization; the 2001 instrument, in addition to asking about income from rental property co-owned with the spouse, also asked about income from property jointly owned with someone other than the spouse.

than those derived from 2004-W1, and the differences are (for the most part) statistically significant. (This general summary ignores rental property because, as noted in Table 3, the design of the 2001 instrument's questions about joint/individual ownership do not permit reliable estimates.)

It is worth noting that both rental property and mortgages – the two specific rare asset types which show a significantly lower ownership rate in 2004-W1 compared to 2001-W1 – are specifically mentioned in the single, global “... or any financial investments” question that for many 2004-W1 respondents substituted for the series of individual questions about each rare asset type (see the ASSET1 “pop-up” question in Table 1, Part 3). The point here is that, despite the new screening procedures, these rare asset types are in fact featured about as prominently as response cues in 2004-W1 as they were in 2001-W1, which suggests that the 2001-2004 difference in ownership rates for rental property and mortgages are unlikely to be a result of a difference in procedures. An alternative explanation is that the declines for these asset types signal a true change over time – this possibility is supported by the data summarized in Table 4, which suggests that the ownership trend was indeed negative over the 2001-W1 to 2004-W1 time period, at least for rental property.

Taken as a whole, the evaluation results using SIPP production data mirror the results of the more scientifically rigorous Methods Panel field experiments as reported in Moore (2001(b)). They suggest little reason to be concerned about reduced data quality in reports of ownership of rare assets due to the new screening procedures introduced in the 2004-W1 SIPP questionnaire.

## **7. Conclusions**

It is impossible to draw definitive conclusions about data quality from this non-experimental comparison of SIPP 2001 and 2004 panel data. With appropriate caveats, however, and using additional data sources, some tentative conclusions seem warranted. First, there appear to be no demonstrable data quality costs to offset the demonstrable efficiency benefits of the 2004 instrument's rare asset screening procedures. The evidence suggests that the 2004-W1 estimates of ownership of those types of assets are probably of equivalent quality to those obtained in the prior panel. Second, a similar conclusion – generally equivalent data quality – also seems appropriate for the more common types of assets. As stated above, higher estimates in 2004-W1 for some common asset types *may* indicate more complete reporting; lower estimates for others *may* indicate both reduced overreports and actual downward trends in ownership; and joint asset holdings *may* have been captured more completely. But any such improvements are likely of small magnitude, as befits the generally minimal procedural changes between 2001 and 2004 in how these data were gathered. Finally, it appears that some seemingly small instrument changes appear to have improved the reporting of retirement accounts.

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TABLE 1: Summary of Asset Ownership Questionnaire Differences – 2001-Wave 1 vs. 2004-Wave 1	
SIPP 2001 - Wave 1	SIPP 2004 - Wave 1
Part 1: Questions About Retirement Accounts	
<p>-ASSTINT- These next questions are about assets that provide income. PRESS “ENTER” TO CONTINUE</p> <p>-ASSET1- During the period from [MONTH1] 1<sup>st</sup> through today, did you own, either alone or jointly, any of the following: SHOW FLASHCARD. READ ALL CATEGORIES</p> <p>U.S. Government savings bonds (E or EE)? An IRA or Keogh account? A 401k or thrift plan?</p> <p><i>[continue with remaining “common” asset types; see below]</i></p>	<p>-ASSETIRA- Next are a couple of questions about retirement accounts. At any time since [MONTH1] 1<sup>st</sup>, have you owned an Individual Retirement Account (IRA) or a Keogh account?</p> <p>-ASSET401- Did you [also / ...] participate in a 401k, 403b, or thrift plan?</p>
Part 2: Questions About “Common” Asset Types	
<p>-ASSET1- <i>[continuing from above, after “A 401k or thrift plan”]</i></p> <p>An interest-earning checking account? A savings account? A money market deposit account? A certificate of deposit (CD)? Mutual funds? Stocks?</p> <p><i>[continue with “rare” asset types; see below]</i></p>	<p>-ASSET1- The next few questions are about assets and other investments, either individually or jointly owned [ / , including joint custodial ownership with children.] Since [MONTH1] 1<sup>st</sup>, did you own, either individually or jointly...</p> <p>... any U.S. Government savings bonds? ... an interest-earning checking account? ... a savings account? (*) [... / Aside from any assets held as part of your retirement accounts, did you own, either individually or jointly...] ... a money market (MM) deposit account or MM fund? (*) ... any CDs (that is, certificates of deposit)? (*) ... mutual funds? (*) ... stocks? (*)</p> <p><i>[(*) = used in “rare” asset screening procedures; see below]</i></p>

SIPP 2001 - Wave 1	SIPP 2004 - Wave 1
Part 3: Questions About “Rare” Asset Types	
<p>-ASSET1- <i>[continuing from above, after “Stocks”]</i></p> <p>Municipal or corporate bonds?  U.S. Government securities?  Mortgages from which payments are received?  Rental property?  Royalties?  Any other financial investments not already mentioned?</p>	<p>-ASSET2-</p> <p><i>If any one of the “starred” (*) common asset types [see above] is “yes,” D, or R (i.e., if they are <u>not</u> all “no”), then continue with:</i></p> <p>Did you also own, either alone or jointly...  ... any municipal or corporate bonds? [... / EXCLUDE MUNI/ CORP BONDS HELD IN MUTUAL FUNDS ALREADY REPORTED]  ... U.S. Government securities?  ... mortgages from which you received payments?  ... rental property?  ... royalties?  ... or any other financial investments?</p> <p><i>Otherwise, if savings, money market, CDs, mutual funds, and stocks are <u>all</u> “no”, then continue with:</i></p> <p>{pop-up} ... or any other assets that produced income, such as rental property, mortgages from which you received payments, or any other financial investments?  <i>If “NO” -&gt; mark all rare asset types as “no.”</i></p> <p><i>If R -&gt; end asset questions; leave all individual “rare” asset ownership variables blank</i></p> <p><i>If “YES” or D -&gt; continue with:</i>  What other kinds of assets did you own, either individually or jointly?  ... any municipal or corporate bonds? [... / EXCLUDE MUNI/ CORP BONDS HELD IN MUTUAL FUNDS ALREADY REPORTED]  ... U.S. Government securities?  ... mortgages from which you received payments?  ... rental property?  ... royalties?  ... or any other financial investments?</p>

**TABLE 2: Efficiency Gains in 2004-W1 Questions about Asset Ownership Due to the New Screening Procedures**

Type of Question:	Number of Asset Ownership Questions Administered in 2004-W1 (n ≈ 84,300 respondents)	
	THEORETICAL (assuming no screening)	ACTUAL (as implemented, with screening)
Questions (9) about retirement accounts and “common” assets	84,300 X 9 = <b>758,700</b>	84,300 X 9 = <b>758,700</b>
“Screener” Question (1)	[n/a]	37,400 <sup>[1]</sup> X 1 = <b>37,400</b>
<p>Note: [1] Approximately 37,400 respondents reported owning none of the common assets. Before any individual questions about “rare” assets were administered, these people were sent to the new screening question: “ ... or any other assets that produced income, such as rental property, mortgages from which you received payments, or any other financial investments?”</p>		
Questions (6) about “rare” assets	84,300 X 6 = <b>505,800</b>	(46,900 <sup>[2]</sup> + 550 <sup>[3]</sup> ) X 6 = <b>284,700</b>
<p>Notes: [2] Approximately 46,900 respondents reported that they owned at least one of the common assets. They thus skipped the screening question and simply continued on with the individual “rare” assets questions.</p> <p>[3] Of the 37,400 respondents to whom the screener question was administered, approximately 550 said “yes,” and thus continued on with the six individual questions about rare assets.</p>		
TOTAL NUMBER OF ASSET OWNERSHIP QUESTIONS	<b>1,264,500</b>	<b>1,080,800</b>
AS A RESULT OF THE NEW SCREENING PROCEDURES, % REDUCTION IN NUMBER OF ASSET OWNERSHIP QUESTIONS ASKED	$[(1,264,500 - 1,080,800) / 1,264,500] \times 100 =$ <p style="text-align: center;"><b>14.5%</b></p>	



**TABLE 3: Unweighted and Weighted Asset Ownership Rates (Overall, Joint, Individual) in 2001 and 2004: Comparison of 2001 and 2004 Wave 1 Estimates, and Comparison of Estimates from Approximately the Same Point in Time (2001 Wave 9 vs. 2004 Wave 1)**

ASSET TYPE		“OWN ANY...?” (% “yes”)					“Own any ... JOINTLY?” <sup>1/</sup>					“Own any ... INDIVIDUALLY?”					
		W1 2001 <sup>2/</sup>	W9 2001 <sup>2/</sup>	W1 2004 <sup>2/</sup>	DIFFERENCE		W1 2001	W9 2001	W1 2004	DIFFERENCE		W1 2001	W9 2001	W1 2004	DIFFERENCE		
					01W1- 04W1	01W9- 04W1				01W1- 04W1	01W9- 04W1				01W1- 04W1	01W9- 04W1	
Part 1: Retirement Accounts																	
IRA/KEOGH	unwtd	18.0	18.8	21.0	(3.0)	(2.2)											<sup>2/</sup>
	wghtd <sup>3/</sup>	19.0	19.3	21.0	(2.0)	(2.7)											
401K/THRIFT	unwtd	22.4	22.5	24.4	(2.0)	(1.9)											<sup>2/</sup>
	wghtd	23.0	23.3	24.5	(1.5)	(1.2)											
Part 2: “Common” Asset Types (in 2004, reports about these assets determine whether or not individual questions are asked about all “rare” asset types – see text)																	
SAV BONDS	unwtd	10.1	9.1	10.7	(0.6)	(1.6)											<sup>2/</sup>
	wghtd	10.6	9.3	10.6	(0.01) <sup>4/</sup>	(1.3)											
CHECKING	unwtd	27.6	28.9	30.4	(2.8)	(1.5)	16.9	17.9	20.7	(3.8)	(2.8)	12.5	12.4	12.0	0.5	0.4	
	wghtd	28.6	29.4	30.3	(1.7)	(0.9)	17.7	18.3	20.5	(2.8)	(2.2)	12.8	12.5	12.1	0.7	0.4	
SAVINGS	unwtd	43.8	43.5	47.3	(3.5)	(3.8)	23.6	24.4	29.7	(6.1)	(5.3)	22.7	21.0	20.7	2.0	0.3	
	wghtd	44.8	44.1	47.4	(2.6)	(3.3)	24.3	24.9	29.5	(5.2)	(4.6)	23.0	21.1	21.0	2.0	0.04	
MONEY MKT	unwtd	11.9	11.0	12.6	(0.7)	(1.6)	7.2	6.7	8.0	(0.8)	(1.3)	5.4	4.8	5.2	0.2	(0.4)	
	wghtd	12.6	11.3	12.9	(0.3)	(1.6)	7.6	7.0	8.2	(0.6)	(1.2)	5.7	4.9	5.4	0.3	(0.5)	
CDs	unwtd	11.0	8.6	9.7	1.3	(1.1)	6.0	4.6	6.0	(0.03)	(1.4)	5.6	4.4	4.2	1.4	0.2	
	wghtd	11.5	8.5	9.6	1.9	(1.1)	6.4	4.6	6.0	0.4	(1.4)	5.7	4.3	4.2	1.5	0.1	
MUTUAL FND	unwtd	14.6	12.4	13.9	0.7	(1.5)	6.1 <sup>5/</sup>	4.7 <sup>5/</sup>	7.8	(1.7)	(3.1)	5.0 <sup>5/</sup>	3.8 <sup>5/</sup>	7.1	(2.1)	(3.3)	
	wghtd	15.4	12.8	13.9	1.5	(1.1)	6.5 <sup>5/</sup>	4.8 <sup>5/</sup>	7.8	(1.3)	(3.0)	5.3 <sup>5/</sup>	3.9 <sup>5/</sup>	7.1	(1.8)	(3.2)	
STOCKS	unwtd	17.5	15.1	16.2	1.3	(1.1)	5.9 <sup>5/</sup>	4.9 <sup>5/</sup>	8.0	(2.1)	(3.1)	5.8 <sup>5/</sup>	4.5 <sup>5/</sup>	9.3	(3.5)	(4.8)	
	wghtd	18.4	15.7	16.4	2.0	(0.7)	6.2 <sup>5/</sup>	5.1 <sup>5/</sup>	8.1	(1.9)	(3.0)	6.0 <sup>5/</sup>	4.6 <sup>5/</sup>	9.4	(3.4)	(4.8)	
Part 3a: “Rare” Asset Types (for some respondents, new screening procedures in 2004 eliminate individual questions about each type of “rare” asset – see text)																	

ASSET TYPE	“OWN ANY...?” (% “yes”)					“Own any ... JOINTLY?” <sup>1/</sup>					“Own any ... INDIVIDUALLY?”					
	W1 2001 <sup>2/</sup>	W9 2001 <sup>2/</sup>	W1 2004 <sup>2/</sup>	DIFFERENCE		W1 2001	W9 2001	W1 2004	DIFFERENCE		W1 2001	W9 2001	W1 2004	DIFFERENCE		
				01W1- 04W1	01W9- 04W1				01W1- 04W1	01W9- 04W1				01W1- 04W1	01W9- 04W1	
MUNI/CORP	unwtd	2.3	2.0	2.3	0.03	(0.3)	1.2	1.1	1.2	(0.03)	(0.1)	1.1	0.8	1.2	(0.1)	(0.4)
	wgtd	2.5	2.1	2.4	0.1	(0.3)	1.3	1.2	1.3	(0.03)	(0.1)	1.2	0.8	1.2	(0.07)	(0.4)
US GOVT SEC	unwtd	0.9	0.8	0.9	(0.02)	(0.1)	0.4	0.4	0.4	(0.01)	(0.07)	0.5	0.4	0.5	0.001	(0.1)
	wgtd	1.0	0.8	0.9	0.1	(0.1)	0.5	0.4	0.4	0.1	(0.03)	0.6	0.4	0.5	0.1	(0.1)
MORTGAGES	unwtd	0.9	0.5	0.7	0.2	(0.2)	0.6	0.3	0.5	0.1	(0.2)	0.3	0.2	0.3	0.01	(0.1)
	wgtd	1.0	0.5	0.7	0.3	(0.2)	0.6	0.3	0.5	0.1	(0.2)	0.3	0.1	0.3	0.02	(0.2)
RENTAL <sup>6/</sup>	unwtd	4.7	4.3	4.6	0.1	(0.3)	2.9 <sup>5/</sup>	2.6 <sup>5/</sup>	3.2	(0.3)	(0.6)	1.2 <sup>5/</sup>	1.1 <sup>5/</sup>	1.6	(0.4)	(0.5)
	wgtd	4.9	4.3	4.5	0.4	(0.2)	3.1 <sup>5/</sup>	2.6 <sup>5/</sup>	3.1	(0.02)	(0.5)	1.3 <sup>5/</sup>	1.1 <sup>5/</sup>	1.6	(0.3)	(0.5)
ROYALTIES	unwtd	0.6	0.5	0.6	(0.03)	(0.1)	<sup>2/</sup>									
	wgtd	0.6	0.5	0.6	(0.01)	(0.1)										
OTHER	unwtd	1.5	1.3	1.5	0.06	(0.2)	<sup>2/</sup>									
	wgtd	1.6	1.2	1.4	0.2	(0.2)										
Part 3b: Ownership of ANY “Rare” Asset Type																
ANY “RARE” <sup>8/</sup>	unwtd	9.1	8.0	8.5	0.6	(0.5)	[n/a]									
	wgtd	9.5	8.1	8.4	1.1	(0.3)										

**Table 3 Notes**

<sup>1/</sup> All adults who are co-owners of a jointly-held asset with another household member are recorded as owning that asset type jointly. Note that in 2001, with the exception of rental property, questions about joint ownership were only asked of married-spouse-present persons, and were only asked about assets owned jointly with the spouse. In 2004, in contrast, all adults were asked about joint ownership, and anyone – including non-spouse adults, children, and non-household-members – could be identified as a co-owner.

<sup>2/</sup> Total n (interviewed adults) ≈ 69,700 for SIPP 2001-W1; 51,600 for SIPP 2001-W9; 86,000 for SIPP 2004-W1. Cases with missing data (blank, don’t know, refused) are excluded from the analysis of individual asset types; the “any rare asset” estimates exclude sample cases with missing data for all six “rare” asset types. Ignoring slight item-to-item variations, approximate numbers of missing cases (approximate % of total) are as follows: 3,950 (6%) for SIPP 2001-W1; 4,300 (8%) for SIPP 2001-W9; 3,200 (4%) for SIPP 2004-W1.

**Table 3 Notes (cont’d.)**

<sup>3/</sup> The weighted estimates use DSMD’s final weights (still provisional for 2004; recently revised for 2001), which include adjustments for selection probability, wave 1 noninterviews, and a second-stage adjustment to population controls. See Boies (2003) for a description of SIPP 2004 weighting procedures. To avoid artificial inflation of chi-

square statistics for weighted estimates, a “small” weight was calculated for each case as the actual weight divided by the average weight across all interviewed adults; using the small weight in place of the actual weight does not change the weighted estimates, and produces a weighted n that is approximately equal to the unweighted n.

<sup>4/</sup> Following guidance from Steve Mack (DSMD), in addition to the “small” weight adjustment described in note 3, an adjustment is also necessary to account for the clustering of the SIPP sample and other departures from a simple random sample design. A final/official estimated design effect for the 2004 panel has yet to be produced; Steve assumes “that design effects for the 2004 panel will not differ much from the 2001 panel,” and thus recommends using a design effect of 1.94 – the mid-point between the estimated figure for 2001 wave 1 (1.77) and 2001 wave 9 (2.12). Therefore, to determine statistical significance at the  $p < .10$  level I evaluate the chi-square statistic produced by SAS against an adjusted critical value for 1 df:  $2.71 \times 1.94 = 5.26$ . Dark-shaded cell entries indicate differences that are not statistically significant (i.e.,  $p > .10$ ) according to this adjusted criterion value. Because of SIPP’s large sample size, all but the smallest differences in the distribution of yes and no reports across the two panel-wave samples will be judged statistically significant according to a chi-square test. In fact, of the 72 weighted “Difference” estimates displayed in Table 3 (each of which summarizes a 2x2 (ownership x panel-wave) cross-tabulation), only 19 are not statistically significant; all other differences are significant at  $p < .05$  or greater (in fact typically  $p < .0001$ ).

<sup>5/</sup> Joint/individual ownership data for mutual funds and stocks were not captured directly in the 2001 instrument, and can only be derived through cumbersome procedures resulting in clearly incomplete tallies; to a somewhat lesser extent the same is true of rental property. Note that for all other asset types the sum of the joint and individual ownership rates meets or exceeds the overall rate – which is as it should be, since for any given asset type an individual may have both types of ownership arrangements. For these three asset types, however, the sum of the joint and individual ownership rates falls short of the overall rate, because the ambiguity of the questions leaves some owners of these assets unclassifiable as to the type of ownership arrangement. The estimates are shaded lightly to indicate that they should be viewed with some suspicion.

<sup>6/</sup> Unlike all other asset types, Rental Property in the 2001 instrument included a question asking about joint ownership with someone other than a spouse.

<sup>7/</sup> Neither the 2001 nor the 2004 instrument attempts to establish joint/individual ownership for savings bonds, IRA/Keogh accounts, 401k/403b/thrift accounts, royalties, or “other” assets.

<sup>8/</sup> The denominator for the “any rare asset” ownership estimate excludes persons with missing data for all six “rare” asset types (see Note 2).

**Table 4: CPS Annual Social and Economic Supplement (ASEC) Asset Ownership Estimates For Calendar Years 2000, 2001, 2002, and 2003**

CPS/ASEC Question Summary and Variable Name			Calendar Year Person-Level Estimates – % “Yes” (CPS/ASEC Administration Year)				% Change from 2000 to 2003
			2000 (2001)	2001 (2002)	2002 (2003)	2003 (2004)	
Did ... own (1) savings accts or money market accounts, (2) bonds, treasury notes, or certificates, (3) an interest-earning checking acct, or any other investment paying interest?	<b>UINT_YN</b> [unedited]	UNweighted	30.6	29.4	27.7	27.2	-11.1%
		Weighted	31.0	30.5	28.9	28.3	-8.7%
	<b>INT_YN</b> [edited]	UNweighted	36.4	34.5	32.7	32.5	-10.7%
		Weighted	37.0	36.3	34.6	34.2	-7.6%
Does ... own shares of stock ... or any mutual fund shares?	<b>UDIV_YN</b> [unedited]	UNweighted	14.3	13.8	12.8	12.3	-14.0%
		Weighted	14.8	14.6	13.6	12.8	-13.5%
	<b>DIV_YN</b> [edited]	UNweighted	17.1	16.2	15.2	14.7	-14.0%
		Weighted	17.7	17.2	16.3	15.5	-12.4%
Did ... (1) own rental property, (2) receive income from royalties or roomers/boarders, (3) receive income from estates/trusts?	<b>URNT_YN</b> [unedited]	UNweighted	3.6	3.3	3.19	3.16	-12.2%
		Weighted	3.5	3.4	3.2	3.3	-5.7%
	<b>RNT_YN</b> [edited]	UNweighted	4.2	3.8	3.71	3.68	-12.4%
		Weighted	4.0	3.9	3.82	3.83	-4.3%

[data source: original analysis of DSD-maintained CPS/ASEC data files]

SCF 2001 estimate of the percentage of FAMILIES <sup>1/</sup> holding various asset types in calendar year 2000	SCF Asset Types (see Table 5, Part B, in Aizcorbe et al., 2003)							
	Transaction accounts <sup>2/</sup>	CDs	Savings bonds	Bonds <sup>3/</sup>	Stocks	Mutual funds	Retirement accounts <sup>4/</sup>	Any financial asset <sup>5/</sup>
	90.9	15.7	16.7	3.0	21.3	17.7	52.2	93.1
SIPP 2001-W1 estimate of the percentage of HOUSEHOLDS holding various asset types during the 4-months preceding the wave 1 interview	More Comparable or <b>Less Comparable</b> SIPP Asset Types							
	Checking, savings, & money mkt accts	CDs	Savings bonds	Muni/corp bonds; US govt securities	Stocks	Mutual funds	IRA/Keogh accts; 401k/403b/thrift plans	Any asset <sup>5/</sup>
	61.7	15.0	13.8	4.2	24.2	19.7	44.3	69.9
SIPP 2004-W1 estimate...	65.5	13.4	14.8	4.1	22.9	18.6	50.6	75.0

**Table 5 Notes**

<sup>1/</sup> The SCF defines "families" as follows: "In the SCF, a household unit is divided into a 'primary economic unit' (PEU) – the family – and everyone else in the household. The PEU is intended to be the economically dominant single individual or couple ... and all other persons in the household who are financially interdependent with that person or those persons" [Aizcorbe et al., 2003, p30]. A sample household, therefore, can consist of multiple families.

<sup>2/</sup> Includes "checking, savings, and money market deposit accounts, money market mutual funds, and call accounts at brokerages" [Aizcorbe et al., 2003, p9].

<sup>3/</sup> Includes "corporate and mortgage-backed bonds; federal, state, and local government bonds; and foreign bonds" [Aizcorbe et al., 2003, p10, fn9].

<sup>4/</sup> Includes "IRAs, Keogh accounts, ... 401(k), 403(b), and thrift savings accounts ... ; other current job plans from which loans or withdrawals may be made; and accounts from past jobs from which the family expects to receive the account balance in the future" [Aizcorbe et al., 2003, p11, fn10].

<sup>5/</sup> Other asset types included in SCF's "Any financial assets" category (in addition to those shown in Table 5) are "cash value life insurance" (held by 28.0% of SCF families in 2001), "other managed assets" (6.6%), and "other" (9.3%). "Any asset" in SIPP also includes (in addition to the asset types shown in Table 4) "mortgages from which payments are received" (held by 1.3% of 2001-W1 households), "rental property" (6.2%), "royalties" (0.9%), and "other" (2.5%).

