Executive Summary

Survey estimates of public health insurance program enrollment tend to be lower than those compiled from administrative record data. This discordance is particularly apparent for Medicaid and this has become known as the “Medicaid undercount”. Many causes have been postulated for the undercount with varying potential implications for policy research and resulting policy recommendations. The crude Medicaid undercount in the Current Population Survey’s Annual Social and Economic Supplement (CPS ASEC), the most prominently used survey for policy research that measures health insurance coverage, was about 32 percent for both 2000 and 2001.\(^1\) In order to investigate reasons for the undercount, a team of researchers designed the analysis described in this report.

For this analysis, Centers for Medicare & Medicaid Services (CMS) provided the Census Bureau with a Social Security Number (SSN)-identified version of its Medicaid Statistical Information System (MSIS) files for 2000, 2001, and 2002. Following appropriate person-identity confirmation, record linkage, data security, and personal privacy protection procedures, Census staff joined the corresponding individual-level MSIS information to the Census internal CPS files for 2001 and 2002 at the person level.

By analyzing the resulting data files, we were able to identify two general causes of the Medicaid undercount. The first relates to difficulties aligning the concept of which persons are enrolled on MSIS and CPS. And the second relates to problems existing in the CPS survey data.

*Problems Aligning the Concept of Coverage Between the MSIS and CPS ASEC:* To make the concept of insurance and Medicaid coverage consistent across the MSIS and the CPS, we removed all MSIS enrollees who received only partial coverage (e.g., those receiving just emergency or family planning related services). We also removed enrollees who were on Medicaid in the previous year but died before the period of CPS fielding, and duplicate person records (e.g., usually due to receipt of Medicaid by the same person in two different states in a given calendar year). Finally, we removed all State Children's Health Insurance Program (SCHIP) enrollees from the MSIS count as SCHIP falls under the auspices of Medicaid only in some states and within those states sometimes inconsistently, and we presume SCHIP-participating families often are unaware of the distinction. After these adjustments, our analysis file had 40.5 million Medicaid enrollees in 2001, down from a 48.6 million in the full MSIS file. Corresponding figures for 2000 were 38.2 million and 45.0 million.

\(^{1}\) Based on CPS estimates of the number of people with Medicaid and MSIS administrative data counts tabulated in the second phase of our research project. Our revised MSIS estimates for 2000 indicated that 38.2 million people had full benefits Medicaid compared with 26.1 million estimated by the CPS. In 2001 our revised MSIS estimates indicated that 40.5 million people were enrolled in full benefits Medicaid versus 27.7 million in the CPS.
Sources of the Discrepancy Attributed to the Survey Data: Most of the remaining undercount appears to be explained by response error. We explored response error using those survey reportees for whom we had actual health insurance coverage responses (i.e., excluding imputed and allocated responses). Among the linked cases between the CPS and MSIS (i.e., when enrollment is indicated on MSIS for a CPS participating household member), we computed that 41 percent of these enrollees were not reported having Medicaid. Further computation led us to conclude that such response errors in the CPS are the major cause of the Medicaid undercount.

Also, these response errors appear to occur non-randomly. People with longer and more recent Medicaid enrollment (including those still enrolled in the CPS during the first four months of the year of the survey fielding—which is the one immediately subsequent to the one being asked about on the survey) were reported on better. Those enrolled later in the reference period (closer to the time of the survey), those enrolled at the time of the survey (which should not be relevant if respondents correctly interpret the CPS Medicaid coverage questions), and those enrolled for more days in the calendar year were more likely to be reported having Medicaid. Response errors also appear related to income and age. Respondents for enrolled children were more likely to report Medicaid coverage for them than those for adult enrollees. Enrollees in families with lower incomes were more likely reported on Medicaid (and less likely reported on some other type of coverage) and enrollees with higher income were less likely reported on Medicaid (but were more likely to be reported on some other type of coverage). Also enrollees receiving medical services provided by Medicaid in the periods under analysis (calendar years 2000 and 2001, separately) were more often reported enrolled than those who did not receive services. Finally, enrollees in some states were more likely reported so and less likely reported being uninsured (e.g., Massachusetts) than persons in other states (e.g., Louisiana).

Limitations of Our Study:
This report presents intermediate results from ongoing research. Although we did reweight to CPS data to partially adjust for the non-representativeness of the linkable CPS sample (i.e., those with PIKs), some bias undoubtedly remains. For example, the reweighted sub-sample of linkable cases makes no correction for missing PIKs in the administrative data. More research should be conducted on this 6 percent of the MSIS full benefits Medicaid enrollee cases to determine the role they play in the Medicaid undercount.