



**Real-time Poverty Estimates During the COVID-19 Pandemic
through December 2021***

[Jeehoon Han](#), Zhejiang University
[Bruce D. Meyer](#), University of Chicago, NBER, and AEI
[James X. Sullivan](#), University of Notre Dame and [LEO](#)

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Poverty Continues to Hold Steady

The past two years have seen unprecedented job loss due to the pandemic, three rounds of government stimulus payments, expanded unemployment insurance, and many changes in other policies that have affected incomes and spending patterns. The government response to the pandemic has been at times generous but uneven across people and time.

What has been the effect of the pandemic, government stimulus, and other economic changes on poverty? Our most recent estimates, which include data through December 2021, indicate that the poverty rate for December 2021 was 11.4 percent, up slightly from the prior month. This rate is only slightly higher than it was prior to the pandemic—in January 2020 the poverty rate was 10.7 percent—although it is 2.2 percentage points higher than at its low point in May 2020.¹

We also find little change in poverty between November and December for subgroups. The estimate for Hispanic individuals rose noticeably, but estimates for this subgroup have fluctuated from month to month quite a bit since the start of the pandemic, likely due to small sample sizes. The child poverty rate was virtually unchanged (down 0.1 percentage points) this past month, while poverty rose for adults and those 65 and over by at least half of a percentage point, although the difference across groups is not statistically significant.

The child poverty rate is down about a half of a percentage point as compared to the first half of the year, suggesting some short-term benefit of the advance payment of the Child Tax Credit and recent increases in employment.² However, we still do not see the sharp decline in the poverty rate for children that had been forecasted.³ Although our income measure is not explicitly designed to include tax credits, the survey question on which it is based asks respondents to report total money income. Evidence from early in the pandemic indicates that respondents included Economic Impact Payments, which are also tax credits, in their responses to this global question, suggesting that the advance payment of the Child Tax Credit is at least partly reflected in this income measure.⁴ However, the modest decline may be due, in part, to the global income

¹ Due to the moderate sized samples available to construct these monthly rates, the estimates are imprecise. Consequently, changes in poverty between consecutive months and the difference in poverty between January 2020 and December 2021 are not statistically significant. Larger changes, such as the rise from May 2020 to December 2021 are statistically significant.

² Our poverty rate is estimated using household income over the past twelve months including the interview month. So, the poverty rate for December 2021 is calculated using the reference period for income from January 2021 through December 2021. This window now includes several months of the advance Child Tax Credit payments as well as the period when millions of workers lost unemployment insurance benefits.

³ Center on Poverty and Social Policy (2021), “A Poverty Reduction Analysis of the American Family Act,” Poverty & Social Policy Fact Sheet, Columbia University.
<https://static1.squarespace.com/static/5743308460b5e922a25a6dc7/t/600f2123fdfa730101a4426a/1611604260458/Poverty-Reduction-Analysis-American-Family-Act-CPSP-2020.pdf>

⁴ The global income question in the Monthly CPS asks respondents to report total money income over the past 12 months from all sources. Although this question is not designed to include taxes, there are reasons to believe many respondents would include advance CTC benefits. First, there is no mention of subtracting out taxes, or mention of taxes at all in the question. Rather it asks that money income from all sources be included. Second, the interviewers are not trained to provide specific guidance as to whether the CTC payments should be excluded, although the CPS Interviewing Manual does state to exclude tax refunds. Third, advance CTC payments are monthly payments, and the interviewer instructions list periodic money income as countable income. Finally, our estimates of changes in

question not fully capturing these payments. Information on household consumption will provide a more accurate assessment of the effect of the Child Tax Credit on poverty, but data on consumption for the last quarter of 2021 are not expected to be available until September of 2022.

Path of Poverty During the Pandemic

The effect of the pandemic on the economy and the government's response have had a noticeable impact on poverty rates over the past year. In a [recent study](#), published in the *Brookings Papers on Economic Activity*, we developed a new poverty measure that provides near-real-time poverty estimates using U.S. Census Bureau data. These estimates, which can be produced with a lag of only a few weeks, provide immediate information on how the pandemic is affecting individuals and families. As a result, the estimates should guide government policies and programs that help prevent people from slipping into poverty during sharp downturns in the economy. These monthly updates are also available through our Poverty Measurement Dashboard at <http://povertymeasurement.org/covid-19-poverty-dashboard/>.

Our initial study provided estimates through June 2020. In Table 1, we report these estimates as well as updated results through December 2021. As these results show, poverty declined by 1.3 percentage points in the first few months after the start of the pandemic from 10.7 percent in January 2020 to 9.4 percent in June 2020. Poverty declined across a range of demographic groups and geographies, with some of the most noticeable declines evident for people with low levels of education and for those who fall into the “other race” (neither white nor Black) category. In our initial study, we also showed that the entire decline in poverty through June 2020 can be accounted for by the one-time stimulus checks the federal government issued, predominantly in April and May 2020, and the expansion of unemployment insurance eligibility and benefits. Those stimulus payments provided up to \$1,200 to individuals and \$2,400 to married couples without dependents, and the unemployment insurance benefits were initially supplemented by \$600 per week and eligibility was broadened. Our analyses indicate that in the absence of these programs, poverty would have risen sharply.

In the last 6 months of 2020, however, poverty rose sharply, as some of the benefits that were part of the initial government relief package expired. Poverty rose by 2 percentage points from 9.4 percent in June to 11.4 percent in December, adding 6.7 million people to the ranks of the poor. Poverty rose each month between June and November even though the unemployment rate fell by 40 percent (from 11.1 percent to 6.7 percent) during this period. This disconnect between poverty and unemployment is not surprising given that many government benefits expired and unemployment insurance benefits are typically only about half of pre-job loss earnings.

The increase in poverty in the latter half of 2020 was more noticeable for Blacks, children, and those with a high school education or less. For Blacks, poverty rose by 2.9 percentage points

poverty based on this income measure during the first few months of the pandemic strongly suggest that EIP payments were, at least partially, included in responses.

between June and December. Poverty also rose noticeably for those with a high school education or less, from 16.7 percent in June to 21.7 percent in December.

A new round of stimulus payments of up to \$600 per person started going out in January and Pandemic Unemployment Compensation, which provides supplemental benefits to those collecting unemployment insurance, was revived at a lower amount (\$300 per week as compared to the \$600 per week supplement that expired in July 2020). The American Rescue Plan provided additional stimulus payments of up to \$1,400 per person as well as an extension of the \$300 Pandemic Unemployment Compensation payments to September 2021, although some states stopped providing these supplemental benefits a few months earlier.

Methods

To calculate near-real-time estimates of poverty, we use data from the monthly Current Population Survey (CPS), a nationally representative survey of about 60,000 households each month — the same survey that is used to calculate official monthly unemployment statistics. This survey includes a global question about family income that is asked of a quarter of the sample and provides the data necessary to estimate poverty. We show that, historically, the real-time poverty estimate from the monthly CPS has been a good predictor of changes in the official poverty rate.

We should caution against overinterpreting the month to month variation in poverty rates for smaller subgroups of the population. Given the smaller sample available to construct real-time poverty estimates, one may want to average a few months to reduce this volatility.

We should also note some important limitations with this approach. First, as with the official measure of poverty, this income source does not include in-kind benefits such as food stamps and housing subsidies. It also may miss some taxes, although as discussed above there are reasons to believe tax payments such as the advance CTC would be included. Another potential limitation with our approach for tracking poverty over time is that the price index used to adjust thresholds overstates inflation. In previous work, we have shown that this price index bias significantly affects estimates of changes in poverty over several decades.⁵ Such bias, however, is likely to be very small when calculating changes in poverty within a year. It is also important to note that income in surveys has been shown to be significantly underreported, especially for those with few resources, and the extent of under-reporting has increased over time.⁶ This underreporting, however, is less likely to be a concern for the very short run changes that we examine, unless the pandemic significantly affected reporting. Despite these limitations, our approach arguably provides the most comprehensive information available on household resources and poverty in real time for a nationally representative sample.

⁵ Meyer, Bruce and Jim Sullivan (2012), “Winning the War: Poverty from the Great Society to the Great Recession,” Brookings Papers on Economic Activity, Fall, p. 133-183. <https://www.brookings.edu/bpea-articles/winning-the-war-poverty-from-the-great-society-to-the-great-recession/>.

⁶ See Meyer, B.D., Mok, W.K.C. and Sullivan, J.X. 2015. Household Surveys in Crisis. *Journal of Economic Perspectives*, 29 (4), 199–226; Meyer, Bruce D. and James X. Sullivan, 2011. “Viewpoint: Further Results on Measuring the Well-Being of the Poor Using Income and Consumption.” *Canadian Journal of Economics* 44(1): 52-87; and Meyer, Bruce D. and James X. Sullivan, 2003, “Measuring the Well-Being of the Poor Using Income and Consumption,” *Journal of Human Resources* 38(S): 1180-1220.

Table 1: Poverty Rates, Monthly CPS, 2020-2021

Sample	All individuals	Individuals Age 0-17	Individuals Age 18-64	Individuals Age 65+	Race: White	Race: Black	Race: Other	Ethnicity: Hispanic	Ethnicity: Non-Hispanic	Gender: Male	Gender: Female	Education: H.S. Degree or below	Education: Head Some College or above	UI Reciprocity: High Q1 (>=35%)	UI Reciprocity: Low Q1 (<35%)
Jan-20	10.7%	15.1%	9.8%	7.6%	9.3%	18.5%	12.2%	20.0%	8.7%	10.2%	11.3%	20.8%	6.0%	9.3%	12.1%
Feb-20	10.7%	14.9%	9.6%	8.8%	8.9%	20.7%	11.9%	17.2%	9.3%	9.8%	11.7%	19.6%	6.3%	9.8%	11.6%
Mar-20	10.3%	16.5%	8.6%	7.3%	8.7%	21.8%	9.1%	16.4%	9.0%	8.9%	11.7%	20.6%	5.5%	8.5%	12.1%
Apr-20	9.2%	14.0%	7.8%	7.1%	7.7%	17.8%	9.3%	18.0%	7.2%	8.5%	9.9%	19.0%	4.6%	8.2%	10.1%
May-20	9.1%	12.7%	8.3%	6.6%	7.9%	16.1%	9.6%	18.1%	6.9%	8.4%	9.8%	17.7%	5.2%	8.4%	9.9%
Jun-20	9.4%	13.4%	8.4%	7.0%	7.9%	19.1%	8.3%	17.6%	7.4%	8.9%	9.9%	16.7%	6.1%	8.7%	10.0%
Jul-20	10.2%	15.5%	9.2%	5.9%	8.8%	18.5%	10.3%	19.4%	8.0%	8.9%	11.4%	19.3%	5.7%	10.0%	10.3%
Aug-20	10.4%	15.6%	9.3%	6.8%	8.0%	23.3%	11.5%	14.0%	9.6%	9.5%	11.3%	20.0%	5.8%	10.0%	10.8%
Sep-20	10.6%	16.0%	9.1%	8.0%	8.7%	22.5%	10.1%	17.4%	9.1%	9.9%	11.3%	20.5%	5.8%	8.5%	12.6%
Oct-20	11.3%	16.6%	10.0%	8.1%	9.5%	22.7%	10.3%	17.6%	9.8%	10.5%	12.0%	22.2%	6.0%	10.0%	12.5%
Nov-20	11.6%	15.8%	10.8%	8.5%	10.0%	20.9%	12.2%	21.0%	9.4%	10.8%	12.4%	22.2%	6.3%	10.4%	12.8%
Dec-20	11.4%	15.9%	10.4%	8.3%	10.0%	22.1%	9.6%	21.7%	9.0%	11.1%	11.7%	21.7%	6.5%	10.2%	12.7%
Jan-21	11.1%	16.0%	10.1%	7.1%	9.4%	20.9%	12.1%	17.6%	9.5%	10.5%	11.6%	21.3%	6.3%	10.3%	11.8%
Feb-21	11.2%	16.1%	10.2%	7.1%	9.1%	21.0%	13.2%	19.7%	9.1%	10.4%	11.9%	21.8%	5.7%	10.5%	11.7%
Mar-21	11.7%	17.4%	10.4%	7.8%	10.5%	21.2%	9.3%	20.6%	9.6%	10.6%	12.8%	22.2%	6.6%	9.3%	14.0%
Apr-21	11.3%	16.7%	10.1%	7.4%	9.6%	21.1%	10.9%	19.5%	9.3%	10.3%	12.2%	21.0%	6.5%	10.1%	12.4%
May-21	11.0%	16.3%	9.7%	7.5%	9.2%	22.4%	10.8%	20.5%	8.7%	10.1%	11.7%	21.1%	5.8%	10.0%	11.9%
Jun-21	11.0%	15.3%	10.1%	7.8%	8.9%	22.6%	11.6%	17.1%	9.5%	10.3%	11.6%	20.9%	6.2%	9.8%	12.1%
Jul-21	11.3%	16.4%	10.1%	7.9%	9.4%	21.4%	12.7%	21.0%	9.0%	10.6%	11.9%	21.2%	6.2%	10.3%	12.2%
Aug-21	11.6%	17.0%	10.5%	7.8%	9.4%	23.7%	14.3%	19.4%	9.7%	10.8%	12.4%	22.4%	6.2%	10.4%	12.8%
Sep-21	11.5%	16.2%	10.6%	8.1%	9.5%	23.0%	12.9%	20.1%	9.6%	10.4%	12.6%	21.9%	6.5%	10.4%	12.7%
Oct-21	11.5%	17.2%	9.8%	8.8%	10.3%	20.9%	9.2%	19.2%	9.5%	10.6%	12.2%	22.5%	5.9%	9.5%	13.3%
Nov-21	11.0%	15.4%	10.0%	8.0%	9.3%	20.3%	12.4%	18.7%	9.1%	10.5%	11.5%	20.9%	6.1%	8.7%	13.3%
Dec-21	11.4%	15.3%	10.5%	8.7%	9.8%	20.3%	12.4%	21.8%	8.8%	10.5%	12.2%	21.7%	6.2%	10.7%	12.0%
Jun-20 - Jan-20	-1.3%	-1.7%	-1.4%	-0.6%	-1.4%	0.6%	-3.9%	-2.4%	-1.3%	-1.4%	-1.3%	-4.1%	0.1%	-0.6%	-2.0%
Dec-21 - Jun-20	2.0%	1.9%	2.1%	1.8%	1.9%	1.2%	4.1%	4.3%	1.4%	1.7%	2.3%	5.0%	0.1%	2.0%	2.0%
Dec-21 - Jan-20	0.6%	0.2%	0.7%	1.2%	0.5%	1.8%	0.2%	1.8%	0.1%	0.3%	0.9%	0.9%	0.2%	1.4%	-0.1%

Note: This table is an update of Table 1 of Han et al. 2020. We now multiply impute income within brackets for all months using five draws, while Han et al. used a single draw. Starting in February 2021 we also draw within bracket values from the 2020 ASEC instead of the 2019 ASEC and use 2020 Census poverty thresholds. See the paper for additional methods. The sample includes individuals who are included in the householders' families and who are in their 1st or 5th month in the survey. Individuals with imputed income are excluded from the sample. The statistics are weighted using fixed demographic weights since March 2020.