Policy Options to Address Youth and Young Adult Poverty: METHODS

Center on Poverty and Social Policy at Columbia University

"Policy Options to Address Youth and Young Adult Poverty" examines the anti-poverty effects of federal policy and a set of federal policy alternatives (some recently enacted on a temporary basis, as part of the American Rescue Plan; some proposed, but not yet law) in the areas of basic needs, family tax, and economic opportunity. Anti-poverty effects are compared to what we term a 'pre-American Rescue Plan' baseline, but the poverty rates presented are not estimates of poverty in 2021. Rather, they are estimates of what youth and young adult poverty could have looked like in the years prior to the pandemic had these policies been in place. For each state, it breaks out the results by youth (ages 14 to 17), young adults (ages 18 to 24), and the whole youth and young adult population (ages 14 to 24). For the 14 to 24 year old population as a whole, it also examines the impact of anti-poverty policy across racial and ethnic groups—of particular importance, as nearly half of the youth population today are youth of color.

> Center on Poverty and Social Policy. 2021. "Policy Options to Address Youth and Young Adult Poverty." Poverty and Social Policy Fact Sheet. Columbia University.
> https://www.povertycenter.columbia.edu/policy-factsheets/youth-poverty

A full methodology of these analyses and policy details follows:

CENTER ON
POVERTY &
SOCIAL POLICY
at Columbia University

Methodology

The analysis is based on a 5-year sample of 2013-2017 calendar year (2014-2018 survey year) Current Population Survey (CPS) data, with all income variables from all years adjusted for inflation to 2018 dollars. We use CPS data adjusted for income underreporting using the Urban Institute's TRIM3 model and adjusted for post-tax income variables using NBER's TAXSIM27 in lieu of Census tax calculator variables. Calendar year 2017 is the most recent year used because TRIM3 microdata is not yet available for more recent years as of this writing. Because tax policy changes under the Tax Cuts and Jobs Act (TCJA) of 2017 were not in place for the calendar years of data used here, we used TAXSIM27 to apply TCJA tax policy to all years of data so that all baseline poverty rates and simulations presented here would be relevant to a post-TCJA policy landscape. Specifically, all baseline poverty rates across age groups assume receipt of the Child Tax Credit and Earned Income Tax Credit, post-TCJA changes.

Our analysis uses the Supplemental Poverty Measure (SPM) to assess poverty rates and the potential anti-poverty effects of policy changes. The SPM accounts for cash and noncash government benefits, necessary expenses like taxes, health care, commuting expenses, and child care, and adjusts poverty thresholds for family size and local housing costs when calculating individuals' poverty status. SPM income thresholds to determine poverty rates vary by location and a full list of SPM thresholds by metro area in 2017 can be found here. We account for policy changes (e.g., increased SNAP or tax credit benefit amounts) by adjusting total SPM resources after including new simulated resources from policy changes into total SPM resources.

The poverty rates titled 'Pre-American Rescue Plan' represent the baseline poverty rates for the 2013-2017 (inflation-adjusted to 2018) data as described above. The poverty rates under all alternative policy scenarios represent estimates of what poverty would have looked like in the 2013-2017 data had these policy adjustments been in place at the time. The age groups (e.g., 14 to 17 year olds; 18 to 24 year olds; and 14 to 24 year olds) represent individuals in those age categories in each individual year of CPS data. The race and ethnicity categories are mutually exclusive (e.g., 'White', 'Black', and 'Other' are individuals who are identified as such in the data and also identified as 'non-Hispanic'). The 'Other' category is a broad category that encompasses all other groups—including, Asian American and Pacific Islander, Native American, multi-racial, and more. Breaking out results for a more detailed set of racial and ethnic groups would be preferred, but small sample sizes in the youth and young adult age categories at the state level preclude this analysis.

Policy Details

American Rescue Plan Provisions, SNAP + Family Tax

Here, we examine three key anti-poverty elements included in the American Rescue Plan (ARP) Act, P.L.117-2—a 15% increase in SNAP, a CTC expansion, and an expansion of the childless portion of the EITC. The combined effects are not estimates of poverty in 2021; they are estimates of what youth and young adult poverty could have looked like in the years prior to the pandemic had the policies been in place. The SNAP expansion assumes a 15% increase in annual household SNAP benefits. We calculated the increase for each recipient by taking 15% of the monthly 2020 SNAP maximum allotment for their unit size and brought the increase to the annual level by multiplying the monthly amount by numbers of months of receipt in the CPS-ASEC microdata. We calculated the per person increase and then the total at the SPM unit level, then adjusted the SNAP 15% increase for the SPM unit for inflation to 2018 dollars and added this value to the SPM unit total resources and determined each SPM unit's poverty status with the new SNAP value. The CTC expansion is a fully refundable maximum benefit of $3000 for a dependent aged 6 to 17 and $3600 for a dependent under age 6), similar to the American Family Act, H.R. 1560 in the 116th Congress (see Center on Poverty and Social Policy (2021) American Family Act resource page for more information). This expansion increased the maximum value of the CTC and eliminated the earnings requirement and phase-in and enabled many low-income families who did not receive a CTC or receive a partial CTC to become eligible for a full credit. To simulate this policy change, we identified all individuals in the ASEC with dependents under the age of 18 and then calculated their new benefit value. All families with adjusted gross incomes (AGIs) below the new phase-out thresholds qualify for the maximum credit values specified above; this includes individuals with qualifying dependents who did not file taxes because they had very low or no earnings. The credit phases out for joint filers with an AGI above $115,000 and for single filers with an AGI above $75,000. To estimate the poverty impacts, we replaced the CTC values included in the CPS-ASEC microdata with the CTC values we calculated according to above parameters and determined each SPM unit's poverty status with the new credit. The EITC expansion increases benefits for childless workers along the ARP parameters. The minimum age to claim is reduced from 25 to 19 (except for full-time students); the credit phase-in and phase-out threshold is increased from 7.65% to 15.3%; the phase-out income threshold is $11,490; and the maximum credit increases from $538 to $1,487. To estimate the impact of this policy change, we used pre-ARP EITC eligibility rules to simulate the prior value of EITC benefits and used the ARP parameters to simulate the value of EITC benefits under the proposed continuation and calculated the net difference in EITC benefit value at the SPM unit level. To estimate the poverty impacts of the proposal, we added our calculated net difference in EITC value to the SPM total resources included in the CPS-ASEC microdata and determined each SPM unit's poverty status with the new total.

CENTER ON
POVERTY &
SOCIAL POLICY
at Columbia University

Basic Needs Policy Options

The 'Basic Needs' analysis explores two policy options: a 15% across-the-board increase in household SNAP benefits and an expansion of the Section 8 housing vouchers program to guarantee subsidy receipt for all who are eligible. It examines them individually and in combination. The details of the SNAP 15% benefit increase and our methodological approach are the same as those set out in the prior methods section for 'American Rescue Plan Provisions, SNAP + Family Tax'. The Section 8 expansion is similar to a proposal put forth by President Biden during his 2020 Presidential campaign. The approach follows that taken in Collyer et al. (2020) Housing Vouchers and Tax Credits, Poverty & Social Policy Brief, Vol 4, No. 9 (October), New York: Center on Poverty and Social Policy. Our assessments of the anti-poverty impact are based on pre-pandemic data; no poverty projections are made for 2021.

Economic Opportunity Policy Options

The 'Economic Opportunity' analysis explores two policy options: the establishment of a $15 per hour federal minimum wage and the introduction of a guaranteed youth employment program. Our model simulating the impacts of a $15 per hour federal minimum wage is largely based on the methodology in the National Academy of Sciences (NAS) report *A Roadmap to Reducing Child Poverty*. We estimated the hourly wages of all workers in the data using their total annual earnings and weeks worked and their usual hours worked. We then identified all workers who would be directly affected by the policy change as those with at or above the minimum wage in their state but below $15 per hour[1] and identified workers affected by spillover effects—workers with wages above $15 per hour would see their wages increase if the policy changed. The intuition here is that these workers had wages higher than the minimum wage before the policy change, and their wages would again adjust to be higher after. To find the upper-bound of the spillover range, we divided the net state-level increase in the minimum wages by two and added the difference to the new minimum of $15 per hour (ex. in a state with a $7.25 minimum wage, the net increase would be $7.75 (the difference between $15 and $7.25). Half the net increase is $3.88, thus we assumed that those with wages between $15 per hour and $18.88 per hour would be affected by the spillover effect. Directly affected workers were assumed to have their wage rise to $15 or more; those in the spillover range were assumed to see their wages rise, but the increase was not uniform (this follows the NAS methodology). After identifying the new wage rate for the directly and indirectly affected populations, we calculated their new annual income from earnings and used NBER's Taxsim27 to determine annual tax liability and tax credits changes. We also assumed some workers would become unemployed after the policy change. We estimated the total number of people who would lose work using a wage elasticity of 0.1125 for adults and 0.3375 for teenage workers and randomly selected workers who would lose work

---

[1] We allowed a $0.25 buffer, meaning that workers with wages between the minimum wage in their state and $0.25 below the minimum were classified as directly affected workers.

until meeting the target number of lost jobs derived from the elasticities and the average increase in wages (again following the NAS approach). We set the earnings of these workers to $0 and calculated tax liability changes resulting from their employment loss. The guaranteed youth employment policy looks at potential anti-poverty effects of a subsidized employment program modeled under the parameters of the Job Opportunities for All Act (HR 8485, 115th Congress). Our analysis assumes a 20% enrollment rate for the age groups considered. See Collyer et al. (2019) Fighting Poverty with JOBS: Projecting the Impacts of a National Subsidized Employment Program. New York & Washington DC: Center on Poverty and Social Policy & Georgetown Center on Poverty and Inequality. Our assessment of the anti-poverty impacts here is based on pre-pandemic data; no poverty projections are made for 2021.

Family Tax Policy Options

The 'Family Tax' section of this analysis explores two policy options: an expansion of the Child Tax Credit and an expansion of the childless portion of the Earned Income Tax Credit. It examines them individually and in combination. The parameters of each policy change are the same as those described in the 'SNAP + *Family Tax: Provisions of the American Rescue Plan*' above. Our assessment of the anti-poverty impacts here is based on pre-pandemic data; no poverty projections are made for 2021.