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StriveTogether[®]

Cradle-to-Career Outcomes Data Guides: *Employment*

Developed in
partnership with





Employment

StriveTogether's recommended indicator for employment is based on a measure that captures a population's ability to achieve economic security and mobility. This guide provides information on why employment matters, recommended indicators, data sources for indicators, detailed data specifications, how to calculate this outcome, data disaggregation, frequently asked questions, learning resources and data sharing. This guide also recommends data collection strategies, sources and methods for building data practices that can be used to better serve communities.

>>>>>> Why this outcome matters

Key takeaways:

- **Employment is directly related to economic success and other mobility factors like physical health, mental health and social well-being.**
- **Workforce participation can positively influence wealth accumulation, but disparities in wealth distribution are prevalent by race, income, gender and age.**
- **Wage disparities contribute to racial and gender inequities in the labor market. Workers receiving a lower wage are more likely to be young and racially and ethnically diverse and have completed less formal education.**

Employment is the final milestone in the continuum of cradle-to-career outcomes that facilitate economic mobility. Employment is directly linked to economic success, defined as being when a person has adequate income and assets to support their own, and their family's material well-being ([Urban](#)). Employment can also influence individuals' physical health, mental health and social well-being. Workforce participation can contribute to a person's sense of belonging and social connectedness to their community ([McMillan 1996](#); [Wilcock 2011](#)). A high-quality job is critical to maintaining proper health because it can provide stability and opportunities to live in healthier neighborhoods, lead to better educational opportunities for children, and provide access to child care services and access to more nutritious food ([Robert Wood Johnson Foundation](#)). Higher income is associated

with greater life expectancy. The life expectancy difference between the 1% of people with the most wealth and the 1% with the least wealth was 14.6 years for males and 10.1 years for females, and those gaps have grown over time ([Chetty et al. 2016](#)).

A key benefit of workforce participation is wealth accumulation, but wealth is unevenly distributed by race and ethnicity across the United States ([CAP](#)). White families have a median wealth of \$187,300, compared with \$31,770 for Latine families and \$14,100 for Black families ([Census](#)). Even among two households with similar earnings, wealth distribution varies significantly, with higher wealth among households with past income or inheritances. Wealth gaps are also prevalent across age, with fewer wealth development opportunities for younger generations.

Earnings vary based on a person's degree type, age, race, ethnicity and occupation ([Carnevale, Rose, and Cheah](#)). Pay disparities contribute to racial and gender inequities in the labor market. Workers receiving lower wages are more likely to experience job loss, barriers to work reentry and displacement. Generally, these workers are young and racially and ethnically diverse and have completed less formal education than their counterparts in higher-wage occupations ([Brookings 2021](#)). Supporting workers receiving a lower wage is necessary for creating a more equitable economy.

Many factors influence workforce participation and upward mobility, but actionable, evidence-based metrics play a crucial role in building public will and shaping local action to create conditions that boost upward mobility and narrow racial and ethnic inequities for communities ([Turner et al. 2022](#)).

Recommended indicators

There are various evidence-based metrics that monitor employment and project mobility from poverty at the community level. This guide focuses on the **income sufficiency rate**, which is the calculated percentage of households whose household income is greater than or equal to the University of Washington's self-sufficiency standard ([University of Washington](#)). We recommend working with your local community to choose the best way to measure workforce progress and economic mobility.

The income sufficiency rate

The income sufficiency rate can be conceptualized as the proportion of households in a community that meet the level of income required to achieve a necessary standard or particular level of living. It is based on household income, number of total

individuals in the household and basic living costs.

This indicator is designed to measure whether the employment environments in communities provide an adequate wage. It can also shed light on the quality of earnings in relation to living costs within the geographic community.

In the early 1960s, the development of the poverty threshold led to the concept of income insufficiency, which demonstrated the *minimum* standard of living ([ASPE](#)). Instead, income sufficiency can demonstrate how much is enough to achieve a *sufficient* standard of living.

The total household income is compared to the self-sufficiency standard to determine the income sufficiency rate.

Data sources for indicators

StriveTogether prioritizes the income sufficiency rate. Other potential indicators are discussed in the frequently asked questions section below.

There are two primary data sources for calculating the income sufficiency rate, the census and the self-sufficiency standard. As mentioned above, the sufficiency rate is the ratio of three data components: household income, age and number of people in household and the self-sufficiency standard, which measures basic, yet adequate, living wages. The following data components are listed by data source:

Household income and household characteristics

The total household income is sourced from the [Census ACS](#) (American Community Survey) using public use microdata sample (PUMS) data, five-year

estimates for 2017-2021. Total income for each household includes both public assistance income and non-public assistance income ([Census ACS PUMS](#)).

Household characteristics, such as the number of people within a household, age, race and gender are also sourced from the Census ACS PUMS data.

Only householders ages 25 to 34 are included in the analysis, as this is the age range of young adults exiting the education pipeline.

Self-sufficiency standard

The self-sufficiency standard, developed by the Center for Women's Welfare at the University of Washington, defines the income a family must earn to meet basic yet adequate needs. The standard is

an affordability measure and was developed as an alternative to the official poverty measure.

In developing this measure, the University of Washington considered the following data characteristics:

- standardized or equivalent methodology nationwide
- obtained from scholarly or credible sources, such as the U.S. Census Bureau
- set at minimum but adequate levels (e.g., nutrition levels)
- updated annually
- varied geographically and by age as appropriate

This measure is based on family composition, ages of children and geographic cost differences. It includes all major budget items working adults face. The basic minimum living costs calculated into the measure include costs of housing, child care, food, transportation, health care and miscellaneous items, as well as taxes and credits (([University of Washington](#))).

The standard is calculated for 719 family types for each county or area in a state. Family types vary by number and age of children and number of adults. The family types include all one-, two- and three-adult families with zero to six children and range from a single adult with no children, to one adult with one infant, one adult with one preschooler and so forth, up to three-adult families with six teenagers (Methodology). The following are sample family types:

- 1 adult and 2 infants
- 2 adults, 2 infants, 1 preschooler, 1 school-age child and 1 teenager
- 3 adults, 1 school-age child and 1 teenager

The self-sufficiency standard measure calculates the costs across various basic necessity factors using the following data sources:

Housing

To calculate housing costs, the standard leverages the most recent fiscal year's [fair market rents](#) (FMRs), calculated annually by the U.S. Department of Housing and Urban Development (HUD). The FMRs are based on data from the census [one-year and five-year American Community Survey \(ACS\)](#) data and are updated using Consumer Price Index data. [Census relationship files](#) are used to cross-walk the data to local geographies. The FMRs are calculated for metropolitan statistical areas, HUD Metro FMR Areas (HMFAs) and nonmetropolitan counties.

Child care

Child care is calculated using facility weights from the [U.S. Census Bureau](#) and the Survey of Income and Program Participation and are adjusted for inflation from [the Bureau of Labor Statistics](#).

Food

The standard for 2023 uses low-cost food plans for food costs data for June 2022 from the [U.S. Department of Agriculture](#). Costs vary by the number of and ages of children and the number of adults. The standard accounts for geographic differences in food costs within states by establishing a relative price index informed by [Feeding America](#) research.

Transportation

The transportation measure accounts for public transportation and private transportation. A public transportation system is considered adequate if a high percentage of the working population uses it to commute to work. This measure was calculated using [2016–20 American Community Survey five-year estimates](#) to calculate the percentage of the county population that commutes within the county by public transportation. For the private transportation measure, costs are based on average costs of owning and operating a car. To calculate this, the standard uses 2015–19 auto insurance premiums from the [National Association of Insurance Commissioners](#), fixed auto costs using Bureau of Labor Statics data, inflation using the Consumer Price Index from the [Bureau of Labor Statistics](#), and per mile

costs from the [American Automobile Association](#).

Health care

Employer-sponsored health insurance for workers and their families is an integral part of a self-sufficiency wage. The standard obtains health care premiums from the [Medical Expenditure Panel Survey \(MEPS\)](#) developed by the U.S. Department of Health and Human Services. The premium costs are adjusted for inflation using the [Consumer Price Index](#). Health care costs also include [out-of-pocket](#) costs calculated using data obtained from the MEPS, adjusted by census region using the MEPS Household Component analytical tool and adjusted for inflation using the [Medical Care Price Index](#). This measure also accounts for state-specific geographic rating areas through the [Center for Medicare and Medicaid Services](#).

Miscellaneous

The standard leverages three data sources to build an expense category that consists of broadband and cell phone expenses, as well as the costs of other essentials, including clothing, shoes, paper products, diapers, nonprescription medicines, cleaning products, household items and personal hygiene items. To calculate monthly broadband cost, the standard uses annual [Federal Communications Commission](#) urban rate survey data. Phone cost estimates are estimated using the [household broadband](#)

[guide](#) from the Federal Communications Commission. The standard assumes that each adult in a household needs access to a cell phone with up to five gigabits of data per month. This measure adds local fees and taxes onto the monthly service fee charge, and local sales tax was added to the phone's cost. These tax estimates were informed by the [Tax Foundation](#).

Federal and state taxes

Both federal and state taxes are calculated into the standard. The federal taxes calculated in the standard include income tax and payroll taxes. State taxes calculated in the standard include income tax, payroll taxes and state sales tax where applicable. See more information in the [Self-Sufficiency Standard Technical Brief](#).

Emergency savings fund

The emergency savings fund is calculated using unemployment duration, savings rate and job tenure to indicate resources needed for one adult becoming unemployed over the average job loss period. Unemployment duration data come from the [Employment and Training Administration](#). This measure uses the weekly national savings rate from the [Federal Deposit Insurance Corporation](#) and job tenure data using [IPUMS](#).

For more information on data sources, see the [Self-Sufficiency Standard Technical Brief](#).



Detailed data specifications

Definitions

Head of household versus householder

In 1980, the Census Bureau discontinued the use of “head of household” and “head of family.” Instead, it uses “householder” and “family householder.” The updated terms recognize the social changes that have resulted in greater sharing of household responsibilities among the adult members making “head” inappropriate in the analysis of household and family data ([Census](#)). Only householders ages 25 to 34 are included in the analysis, as this is the age range of young adults exiting the education pipeline.

Income insufficiency

“Income insufficiency” refers to an income that is too low to meet basic needs, as measured by the self-sufficiency standard.

Geography

The self-sufficiency standard calculator can be used at the state and county level. But an important limitation to this source is that cradle-to-career partnerships have geographic areas that might span across county borders or areas smaller than counties.

Target population

In the self-sufficiency standard, the sample unit is the household. This includes all persons residing in households, including the householder, relatives

and nonrelatives, such as unmarried partners, foster children and boarders. This measure assumes that members of a shared household divide costs of basic needs ([Kucklick, Manzer, and Mast 2023](#)).

Household income

Total income for each household member will be summed up to obtain total household income. Income includes money received during the preceding 12 months by nondisabled and nonelderly adult household members.

Household composition

Standards are calculated utilizing a weighted average cost depending on the number of adults and number of children. For families with one to three adults with zero to six children, the standard varies further depending on presence of children in specific age categories:

1. Infants — zero to two years old (meaning zero through 35 months)
2. Preschoolers — three to five years old
3. School-age children — six to 12 years old, and
4. Teenagers — 13 to 17 years old.

Total household incomes will be compared with the standard annual income thresholds for the appropriate household composition and geographic location to determine how many households are at or above the standard.

>>>>>> Example

Formula for calculating the income sufficiency rate for the population within a geographic area:

$$\frac{\text{Number of households above the self-sufficiency standard}}{\text{Total number of households in geographic area}} \times 100$$

Here is example of the self-sufficiency standard calculated by a Cradle to Career Network member.

Delaware County

[Cradle to Career Muncie](#) is an example where all family types are aggregated and reported by

racial demographics. This means that the percentage of households at or above the self-sufficiency standard represents all 719 family types within the county.

>>>>>> Data disaggregation

The availability of workforce data disaggregated by demographics will depend on data sources (i.e., Census Bureau, Bureau of Labor Statistics, or credit bureau data) and which metric is used (i.e., self-sufficiency standard, MIT's Living Wage, ALICE).

Demographics specific to the self-sufficiency standard

• **Householder**

- For data disaggregation by race, the households of interest are based on the race of the householder.
- Household members not expected to work are excluded from household size and composition, and their income is excluded from the household income.

• **Household income**

- The standard assumes that all adult household members work and includes their work-related costs; therefore, adults older than 65 and adults with a work-limiting disability (an adult has a working disability if the adult is disabled and is not in the labor force or receives Supplemental Security Income or Social Security Income) do not count toward the household size, and their incomes are also excluded from the household income.

*Individuals living in group quarters — such as shelters, dormitories or prisons — are also excluded.

Frequently asked questions

How can I standardize the self-sufficiency standard for my geographic area?

Cradle-to-career partnerships have geographic areas that might span across county borders or areas smaller than counties. Partnerships' geographic service areas can be matched to counties or county subdivisions using spatial matching to create a relationship between public use microdata areas (PUMA) to county. PUMAs are statistical geographic areas that partition each state into geographic areas containing no fewer than 10,000 people.

There are three types of matching relationships:

1. one county to one PUMA
This first match is when a PUMA matches perfectly to county area
2. one county to many PUMA
This is when a county's standard is applied to all PUMAs.
3. many counties to one PUMA
This match usually occurs in rural areas. The PUMA is used for each individual county's standard. When calculating for the state, a weighted self-sufficiency standard can be calculated to apply a single standard as the income threshold for that PUMA.

How is the standard different from the official poverty measure?

The official poverty measure (OPM) presents poverty thresholds as a measure of income inadequacy, not of income adequacy. The basis of the poverty measure uses food as the only minimal standard budget item and multiplies the food budget by three to estimate the amount needed to meet other basic needs. The food budget was calculated using the "economy food plan" which is the cheapest food plan and is designed for temporary or emergency use. Since

its development, the poverty level has been updated annually using the Consumer Price Index, therefore food has remained at one-third of the OPM even through American families spend 13% of their income on food. Instead, the self-sufficiency standard accounts for various budget items in their income calculation and unlike the self-sufficiency standard, the OPM does not account for geographic variation or family compositions and is dated using a demographic model of a two-parent family with a "stay-at-home" wife ([University of Washington](#)).

What are other employment indicators?

MIT Living Wage Index

The [MIT living wage index](#) is a market-based measure that estimates the local wage rate that a full-time worker requires to cover the cost of their family's basic needs where they live. The following eight typical expenses are included as basic needs: food, child care, health care, housing, transportation, civic engagement, broadband and other necessities. This measure accounts for twelve different family types varying by the number of working adults and children. To account for geographic variation this index is available at the county level, some metropolitan statistical areas (MSAs or metros) and at the state level. To learn more about the MIT living wage index, see [methodology](#). For data sources see [technical documentation](#).

ALICE

The ALICE index (asset limited, income constrained, employed) is a measure that estimates the minimum cost of household necessities which include housing, child care, food transportation, health care and a basic smartphone plan. The ALICE is calculated at the

county level for five family types. To learn more about the ALICE index see methodology.

Urban Institute Upward Mobility Framework

The Upward Mobility Framework developed by the Urban Institute identifies five pillars that support mobility from poverty and their predictors.

The upward mobility framework was developed by a working group of scholars with expertise in economics, sociology, political science and psychology. This working group reviewed various factors that influence mobility from poverty for adults, families and children. In selecting

the metrics, Urban focused on seven shared characteristics: the metrics were valid, widely available, represented at regular intervals, geographically mindful, consistent over time and across geographies, structurally relevant, and structurally equitable and inclusive of important groups (Urban Methodology).

To learn more about the data sources for each mobility predictor, go to a specific metric under one of the five pillars and see “availability.”

These predictors are calculated and provided by the Urban Institute at the city and county levels.

Learning resources

Brolliar, Sarah, Annie Kucklick, Lisa Manzer, and Alyssa Mast. 2023. [“Technical Brief- The Self Sufficiency Standard 2023 Update”](#). Seattle Washington: University of Washington.

Carr, Stuart C., Eilish McAuliffe, and Malcolm MacLachlan. 2014. [“Servants of Empowerment.”](#) In *Industrial and Organizational Psychology Help the Vulnerable*, edited by Walter Reichman, 143–63. London: Palgrave Macmillan.

Center for Women’s Welfare University of Washington. [How to use the Standard](#). Seattle Washington: University of Washington.

Desilver, Drew, and Kristen Bialik. 2017. [“Blacks and Hispanics Face Extra Challenges in Getting Home Loans.”](#) Washington, DC: Pew Research Center.

Solari, Claudia D., Aaron R. Williams, Gregory Acs, Lily Robin, Tina Chelidze, Gabriel Morrison, Vivian Zheng, et al. 2023. [“Measuring Upward Mobility in Counties and Cities across the US.”](#) Washington DC: Urban Institute.

Streeter, Jialu, Tamera Sims, and Martha Deevy. 2018. [“Generational Shifts in Life Course Trajectories: Implications for Homeownership by Age 30.”](#) In *Sightlines Special Report: Seeing Our Way to Financial Security in the Age of Increased Longevity*, edited by the Sightlines Project. Stanford, CA: Stanford Center on Longevity.

United States Census Bureau. 2023. [Employment](#)

U.S. Bureau of Labor Statistics. 2023. [Quarterly Census of Employment and Wages](#)



Data sharing

The StriveTogether [Guide to data sharing](#) provides important information about requesting, storing and working with data. The recommended employment data is publicly available; therefore, cradle-to-career partnerships will not need

to obtain data-sharing agreements. But for those who are planning to use data from local institutions and networks, the data-sharing guide provides important information for doing so responsibly.

StriveTogether[®]

StriveTogether is a national movement with a clear purpose: help every child succeed in school and in life from cradle to career, regardless of race, ethnicity, zip code or circumstance. In partnership with nearly 70 communities across the country, StriveTogether provides resources, best practices and processes to give every child every chance for success. The StriveTogether Cradle to Career Network reaches more than 14 million students, including more than 7 million children of color and over 7 million children experiencing poverty. The network spans 29 states and Washington, D.C.

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