Methodology: Survey of Nontraditional Workers (Also Known as Contingent, Independent, or Gig Workers)

The Pew Charitable Trusts hired NORC to conduct an online and telephone survey of nontraditional workers to better understand their access to retirement savings plans through work or outside of work. The study also aimed to assess nontraditional workers' demand for retirement savings plans and, for those who are interested in obtaining access, the structure and form of retirement savings plans that would best meet their needs.

The survey was fielded online and by telephone, in English and Spanish, from June 4, 2020, to July 1, 2020. The survey obtained 1,026 qualified interviews from individuals ages 18 and over who worked in nontraditional jobs (also referred to as contingent, independent, or gig jobs). Quotas were used to ensure enough survey completes for three sub-targets: workers who supplement traditional employer-employee income with nontraditional work (400), workers whose income is dependent on nontraditional work from a single source (400), and workers whose income comes from multiple sources of nontraditional work (200). As a result of the quotas, the study obtained 409 responses from those for whom nontraditional work was a primary source of income, 408 responses from those for whom nontraditional work supplemented a traditional (W2) job, and 209 responses from those who had multiple sources of nontraditional work. In total NORC collected 1,026 interviews, 993 by web mode and 33 by phone mode.

Panelists were offered the cash equivalent of $3 for completing this survey. Toward the end of the field period, the incentive was increased to the cash equivalent of $10 to boost participation. Median survey completion time was 14 minutes.

The sample was drawn from NORC's nationally representative AmeriSpeak Panel. The sampling frame for the AmeriSpeak Panel is NORC's 2010 National Frame, which used a two-stage probability sample design to select a representative sample of households in the United States. The first stage sampling unit—the primary sampling unit—is a National Frame Area (NFA), which is either an entire metropolitan area (made up of one or more counties) or a county (some counties were combined so that each NFA contains a population of at least 10,000). Within the selected NFAs, the second stage sampling unit is a segment, defined in terms of either Census tracts or block groups, containing at least 300 housing units according to the 2010 Census. A stratified probability sample of 1,514 segments was selected into the National Frame with probability proportional to size.

NORC's National Frame contains almost 3 million residential addresses, including over 80,000 rural addresses added through in-person listing. The panel provides sample coverage of approximately 97% of the U.S. household population and addresses in almost every state. Those excluded from the sample include people with P.O. Box only addresses, some addresses not listed in the USPS Delivery Sequence File, and some

newly constructed dwellings. While most AmeriSpeak households participate in surveys by web, noninternet households can participate in AmeriSpeak surveys by telephone.

For the states that are not included in the National Frame, AmeriSpeak selected address-based samples (ABS) in 2016 through 2018 from the USPS DSF to assure AmeriSpeak sample representation for all U.S. states and Washington, D.C. To build the AmeriSpeak Panel, NORC randomly selected U.S. residential addresses from the National Frame and ABS frames with a known, non-zero probability of selection. These sampled addresses are then contacted by U.S. mail, telephone, and field interviewers (face to face) for panel recruitments. Further information on the AmeriSpeak Panel is available at http://bit.ly/Amsptechnical or https://amerispeak.norc.org/Documents/Research/AmeriSpeak%20Technical%20Overview%202019%2002%2018.pdf

The sampling frame for this study consists of AmeriSpeak panelists who are employed or self-employed. A random sample of 11,771 panel members was drawn from the sampling frame with a known probability of selection, which allows for unbiased estimation under design-based inferences. Of the full sample of 11,771 panelists, 3,637 responded to the screener survey, 1,200 qualified as nontraditional workers, and 1,026 completed the main survey. This resulted in a screener completion rate of 30.9 percent, an eligibility rate of 33.0 percent and a survey completion rate of 85.5 percent, as shown in Table 1.

Table 1: Key Survey Outcome Rates

Sampled/invited panelists	Screening interviews completed	Screener completion rate	Panelists eligible for interview	Incidence/ eligibility rate	Survey interviews completed	Interview completion rate
11,771	3,637	30.9%	1,200	33.0%	1,026	85.5%

A final weight is computed for each respondent to correct for potential biases due to unequal selection probabilities and nonresponse. Weight calculations started with the calculation of a base weight for each sample member. The base weight is the inverse of the probability of selection for the sample member under the sample design. Since the study sample was selected from the AmeriSpeak Panel, the base weight is computed as the AmeriSpeak Panel weight divided by the selection probability from the panel, which reflects the cumulative selection probabilities associated with the panel as well as the study sample.

AmeriSpeak Panel weights reflect the selection probabilities of the panel members as well as weighting adjustments to ensure that the weighted panel represents the U.S. household population. The sample design and recruitment protocol for the AmeriSpeak Panel involve subsampling of initial nonrespondent addresses. These subsampled

nonrespondent addresses are selected for an in-person follow-up. The subsample of addresses that are selected for the nonresponse follow-up have their panel base sampling weights inflated by the inverse of the subsampling rate. The base sampling weights are further adjusted to account for unknown eligibility and nonresponse among eligible housing units. The household-level nonresponse adjusted weights are then post-stratified to external counts for number of households obtained from the Current Population Survey. Then, these household-level post-stratified weights are assigned to each eligible adult in every recruited household. Furthermore, a person-level nonresponse adjustment accounts for nonresponding adults within a recruited household.

Following the base weight calculations, an adjustment for screener nonresponse inflated the base weights of the sample members that responded to the screener to compensate for those that did not respond to the screener. The screener nonresponse adjustment factor was calculated using the following formula:

> *(weighted sum of screener respondents + weighted sum of screener nonrespondents) /*
> *(weighted sum of screener respondents)*

where the weighted sum of screener nonrespondents =

> *(weighted sum of screener respondents) /*
> *(weighted sum of screener respondents + weighted sum of screener ineligible) ×*
> *(weighted sum of unknown eligibility)*

The count of screener nonrespondents is an estimate of the expected number of eligible sample members among screener nonrespondents. The expected number of eligible cases was estimated by taking the eligibility rate among the known cases and applying it to the unknown cases. The adjustment cells were defined by crossing some key variables that are highly correlated with screener response rate.

Similar to the screener nonresponse adjustments, the weights of the sample members who responded to the main survey needed to be inflated to compensate for those who failed to respond to the survey. The main nonresponse adjustment factor was calculated within each cell using the following formula:

> *(weighted sum of main respondents + weighted sum of main nonrespondents) /*
> *(weighted sum of main respondents)*

At the final stage of weighting, the nonresponse adjusted weights were calibrated to the benchmarks through raking ratio adjustments. To develop these benchmarks, AmeriSpeak Panel weights for screener completes were raked to external population benchmarks associated with, age, sex, education, race/Hispanic ethnicity and Census Division among employed individuals. These external population totals and distributions

were obtained from the most recent Current Population Survey. The weighted sum and distribution of nontraditional work status among the eligible screener respondents were then used as benchmarks to account for the quota sample design. The final weights assigned to survey completes conform to the estimated benchmark distributions with respect to types of nontraditional workers (primary, supplemental, multiple supplemental) and their demographics.

Any extreme weights were trimmed based on a criterion of minimizing the mean squared error associated with key survey estimates. After weight trimming, the distribution of the final weights was realigned so that they still conform to the benchmarks along all raking dimensions. With a design effect of 1.94, the study sample should support proportion estimates with a margin of error no greater than 4.26 percentage points.