RESEARCH BRIEF | MARCH 2023

Why Are Young Workers Leaving Their Jobs?

Executive Summary

The American labor market has experienced dramatic changes since the start of the global COVID-19 pandemic in the early spring of 2020, with historic job losses followed by a sharp employment recovery. Since 2021, the pandemic labor market has entered a third phase, with a dramatic reshuffling of workers in the labor market. Commonly referred to as the "Great Resignation," workers have left their jobs at extraordinary rates, particularly younger workers. While some argue that young workers left their jobs to rely on the federal stimulus money or other forms of public assistance, others believe that young workers left their current jobs for ones with better pay, benefits, or other working conditions.

Are workers quitting because they do not want to work, or because they want to find better work? Using data from the Shift Project collected between Spring 2020 and Spring 2022, we test these competing narratives of the Great Resignation by directly examining workers' jobs and job leaving during this period.

Younger workers (ages 18 to 24) often faced challenging job conditions in the form of low pay, unpredictable schedules, and limited benefits, but these circumstances varied substantially between jobs and employers. This variation in job quality made a significant difference in job satisfaction and retention intentions. Across most measures, poorer baseline job quality is significantly associated with greater job dissatisfaction and higher likelihood to seek a new job for young workers.

Beyond workers' stated intentions, we can also examine which workers did, in fact, leave their jobs, and how their job exits were associated with the quality of their baseline jobs. Using detailed longitudinal data

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that tracks younger workers from the Spring of 2021 to the Spring of 2022, we find that workers who began in the most precarious jobs were much more likely to exit their jobs than workers with higher baseline job quality (e.g., better wages, more stable schedules).

By using the Shift panel data which tracks workers over time, in addition to knowing which workers left their job, we also observe the employment trajectories of workers who left their jobs. This allows us to test whether workers are using job leaving as a way to "upgrade" their jobs or are simply leaving employment. In total, 49% of young workers stayed at their job, while 39% of workers left for a new job and only 12% transitioned to unemployment, most of whom were actively looking for work, were in school, or were providing care. Less than 1% of younger workers were sitting out of the labor market because they didn't need to work.

Rather than large shares of workers leaving the ranks of the employed, the far more common outcome was to either stay put in their job or to move from one job to a new position. And, focusing exclusively on those who moved to a new job (i.e., excluding those who transitioned to unemployment), we find strong evidence that young workers who moved jobs were able to upgrade to higher wages and more stable schedules.

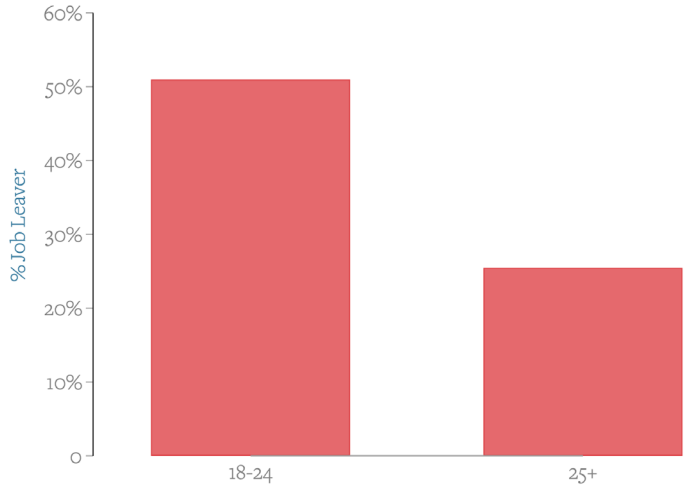
Our results suggest that young workers in the service sector seized the opportunities provided by a pandemic and an extremely tight labor market to improve their working conditions. Rather than being trapped in jobs with low pay or unstable schedules, these workers sought out roles that were a better fit for their own personal and professional goals.

Introduction

The American labor market has experienced dramatic changes since the start of the global COVID-19 pandemic in the early spring of 2020, with historic job losses followed by a sharp employment recovery. Since 2021, the pandemic labor market has entered a third phase, with a dramatic reshuffling of workers in the labor market. Commonly referred to as the "Great Resignation,"[1] workers have left their jobs at extraordinary rates, as seen in the rise of both job opening and job quit rates.[2] This trend has been particularly prominent among younger workers. Since early 2021, young workers (ages 18 to 24) in the U.S. service sector have left their jobs in large numbers, with the share of young workers quitting their job surpassing that of the broader workforce. Among respondents in the Shift Project survey, 51% of service sector workers ages 18 to 24 left their job at least once between Spring 2020 and Spring 2022. This is significantly higher than the 25% of older service sector workers (25 and older) who left their job over the same period (Figure 1). This is consistent with findings from other recent research comparing younger and older workers.[3]

Why did young workers leave their jobs at such high rates? One perspective is that young workers left their jobs to rely on the federal stimulus money or other forms of public assistance. Conservative political commentators often professed this view,

Figure 1. Job Leaving by Age Group



arguing that workers who quit their jobs were lazy and would prefer to live off of government support rather than their hard work.[4] There were also some concerns that young workers' absence from the labor force would have some scarring effects on their future employment potential.[5]

However, a competing narrative is that young workers seized a moment of extraordinary worker power in the labor market, leaving their current jobs for ones with better pay, benefits, or other working conditions. Rather than quitting because they do not *want* to work, this perspective holds that workers left because they wanted *better* work.[6] Given the disproportionate impact of the COVID-19 pandemic on industries where young workers are concentrated,[7] it's possible that young workers used the Great Resignation as an opportunity for upward career mobility.

Firms have both added more jobs and increased wages to attract workers,[8] and there is some evidence that workers are quitting in search of these better paying jobs. In a survey of job-leavers conducted by Pew Research, most workers said that their new jobs offered better pay, more career advancement opportunities, and better work-life balance.[9] Others have pointed to younger workers' desire to find more fulfilling work,[10] with some workers exiting service sector jobs for higher paying professional jobs.[11] However, while suggestive, this prior work relies on workers' retrospective assessments of their job leaving and do not directly observe the characteristics of workers' old or new jobs.

Are workers quitting because they do not want to work, or because they want to find better work? In this brief, we test these competing narratives of the Great Resignation by directly examining workers' jobs and job leaving during this period. We focus on younger workers in the service sector, the workers at the very heart of the "Great Resignation."

To do so, we draw on data collected between Spring 2020 and Spring 2022 as part of the Shift Project, which surveys service sector workers in the U.S. recruited through targeted advertisements on Facebook and Instagram.[12]

We use two types of Shift Project data. We use pooled cross-sectional data from Spring 2021, Fall 2021, and Spring 2022, with a total of 2,939 early career service sector workers between the ages of 18 and 24. We also draw on three waves of panel data, with one baseline survey (conducted in Spring 2020, Fall 2020, or Spring 2021) and two reinterview surveys (Fall 2021 and Spring 2022). This panel data includes 1,395 early career service sector workers between the ages of 18 and 24. Both the cross-sectional and the panel data contain unusually rich measures of workers' job attributes, including pay, work schedules, and access to paid time off.

First, we describe the working conditions faced by early career workers in the service sector, with particular attention to the variation in wages, schedules, and other aspects of job quality encountered by these workers. Second, we describe which young workers expected to leave their jobs and examine how working conditions shaped workers' expectations of leaving or staying in their job. Third, we draw on the Shift Project follow-up surveys, which track workers over time, to analyze which workers actually did leave their jobs, testing how job quality shaped workers' actual job exits. Finally, fourth, we examine the employment trajectory of workers who left their jobs, showing how job leaving affects workers' wages, benefits, and schedule control.

What are the characteristics and working conditions of young workers in the service sector?

We begin by providing a brief descriptive portrait of the job conditions faced by young workers in the Shift Project sample (Appendix Table 1). For a more detailed overview of who these workers are, see an earlier brief on early career workers in the service sector.[13] In general, we find that younger workers in the service sector often faced challenging job conditions in the form of low pay, unpredictable schedules, and limited benefits, but that these circumstances varied substantially between jobs and employers, with many workers encountering relatively high pay, greater stability, and access to time off and career advancement.

A key element of job fit is wage, and we find that mean wages over the period Spring 2021 through Spring 2022 were $12.97, though notably average wages rose from $12.66 in Spring of 2021 to $13.06 in Spring of 2022. Further, wages varied significantly during this period, with workers at the tenth percentile of wages earning just $9.25 an hour against $16.50 an hour at the 90th percentile.

However, as prior Shift Project research shows, wages are far from the complete picture of job fit in the service sector. Work schedule stability and predictability also have important independent effects on worker economic security and wellbeing.[14] We find that most of the younger workers surveyed by Shift in 2021 and 2022 experienced some level of schedule instability, as 78% had experienced changed timings to their shift (in the past month), while 47% had worked a "clopening" shift and 30% had worked an on-call shift in the past month. Further, 68% had less than 2 weeks of scheduling notice and 67% had to keep their schedules open and available or their job. But, here too, there was substantial variability as 5% of workers experienced no canceled shifts, no last-minute timing changes, no clopenings, no on-call shifts, and received at least two weeks' notice of their schedules.

For most workers, their jobs provided few or no fringe benefits. Out of a set of 8 standard benefits (paid sick, paid vacation, health insurance, dental insurance, paid parental leave, retirement plan, tuition, and childcare), we find that 28% of workers received no benefits, 16% only one benefit, and 12% only had two. The most common benefits were health insurance (51.4%), paid vacation (43.1%), and paid sick leave (40.3%), while the least common benefits were childcare (5.1%), paid parental leave (23.5%), and retirement plans (28.7%). A minority of workers, though, had access to a relatively generous set of benefits, with 15% of young workers having access to at least six of the eight benefits.

Young workers also typically had little opportunity for career advancement, as 58% believed either that a promotion was unlikely (36%) or that there were no advancement opportunities available (22%).

Finally, the majority of young Shift respondents reported that they were satisfied with their jobs (70%), but most were also likely to seek a new job in the next three months (59%).

How did job fit shape young workers' expectations of retention?

Younger workers in the service sector in 2021 and 2022 then faced some challenging job conditions, but this experience was far from universal, with a minority of workers experiencing relatively high levels of job quality. We next examine how this variation in job characteristics (i.e., wages, schedules, benefits) maps onto respondents' reported expectations of retention, measured by their job dissatisfaction and their likelihood of seeking a new job. Which younger workers were most dissatisfied with their jobs and most likely to plan to seek a new job?

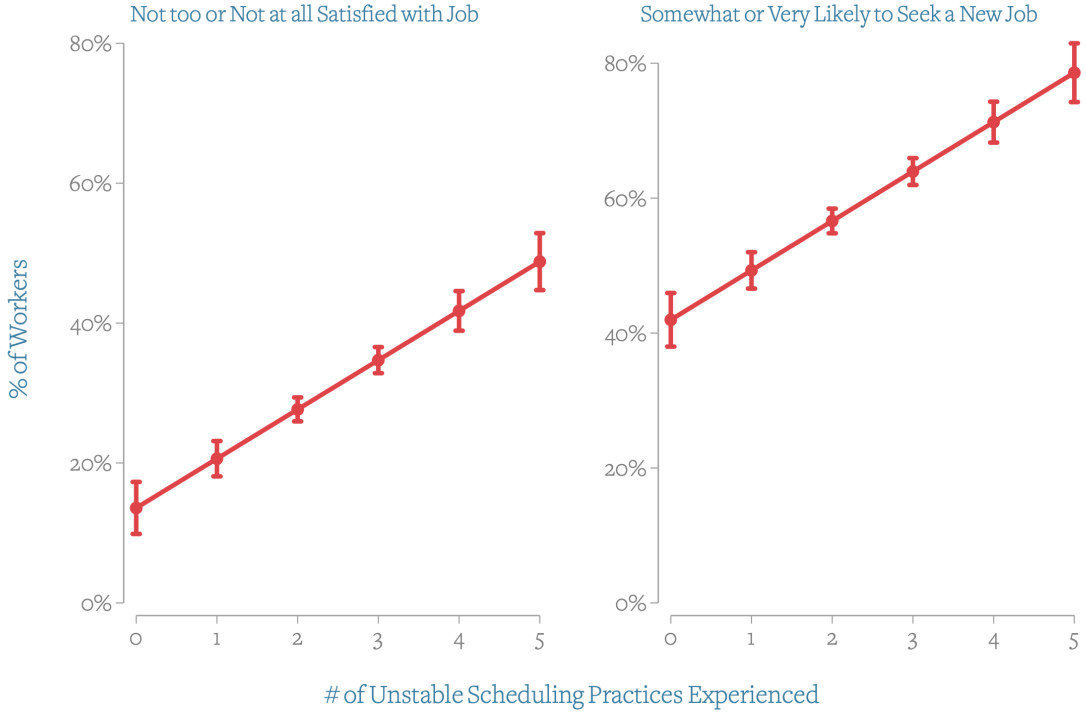
We find that job quality made a significant difference in job satisfaction and retention intentions. Across most measures, poorer baseline job quality is significantly associated with greater job dissatisfaction and higher likelihood to seek a new job for young workers (see Appendix Table 2). Figures 2-5 show plots of these relationships.

We find that higher wages are associated with less job dissatisfaction and lower likelihood to seek a new job. As seen in Figure 2, about 34% of young workers making minimum wage ($7.25/hour) are dissatisfied with their jobs, compared to 29% making $15/hour and 22% making $25/hour. Similarly, about 63% of workers making $7.25/hour plan to seek a new job soon, compared to 58% of workers making $15/hour and 52% of workers making $25/hour.

Greater exposure to schedule instability, measured on a six-point scale (0-5), is also associated with higher job dissatisfaction and higher likelihood to seek a new job (Figure 3). This trend follows the same pattern as the wage gradient above: as job quality decreases, respondents' job satisfaction and likelihood to seek a new job increase. Individual measures of schedule instability are likewise associated with high job dissatisfaction, including having experienced a canceled shift (39% dissatisfied vs. 29% of those without canceled shift), having had an employer change the timing of a shift (32% dissatisfied vs. 22% of those without changed timing), having worked a

Figure 2. Young Workers' Feelings About Their Jobs as a Function of Hourly Wage

Figure 3. Young Workers' Feelings About Their Jobs as a Function of Schedule Instability



clopening shift (32% dissatisfied vs. 28% who did not work clopening), and having received less than two weeks of scheduling notice (33% dissatisfied vs. 24% with more than two weeks of notice). These relationships are plotted in Appendix Figures 1 and 2.

For young workers, greater schedule instability is also associated with a higher likelihood to seek a new job, including having experienced a canceled shift (73% vs. 57% of those without canceled shift), having had an employer change the timing of a shift (61% vs. 55% of those without changed timing) having worked an on-call shift (64% vs. 57% who did not work on-call shift), and having received less than two weeks scheduling notice (62% vs. 54% of those with more than two weeks of notice).[15]

Working in jobs with more benefits, measured as a count of benefits (0-8), is associated with less job dissatisfaction and less likelihood to leave that job (Figure 4). Two benefits, in particular, are significantly associated with lower job dissatisfaction: access to paid sick leave and to paid parental leave (Appendix Figure 3). For example, 27% of those with paid sick leave are dissatisfied with their jobs, relative to 32% of those without paid sick leave. Having access to more benefits is also associated with lower likelihood of seeking a new job, in particular access to paid vacation, access to dental insurance, and access to a retirement plan (Appendix Figure 4).

Finally, having fewer opportunities for career advancement is associated with greater job dissatisfaction and likelihood to leave one's job. Relative to feeling that a promotion is likely, feeling that a promotion is unlikely or that there are no promotion opportunities is significantly and positively associated with job dissatisfaction and the likelihood to leave the job. Young workers who feel that a promotion is likely are rarely dissatisfied with their jobs (only 15%) and fewer than half are likely to seek a new job (42%), while those who feel that there are no advancement opportunities at all are very dissatisfied (46%) and quite likely to seek a new job (72%).

Figure 4. Young Workers' Feelings About Their Jobs as a Function of Total Benefits

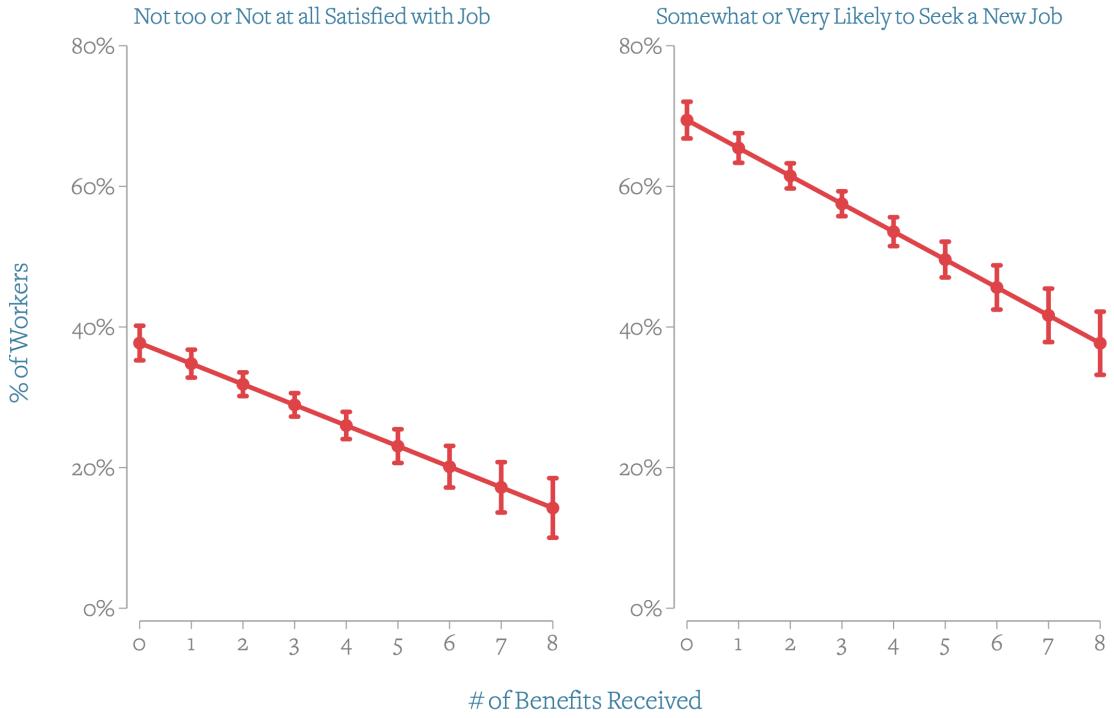
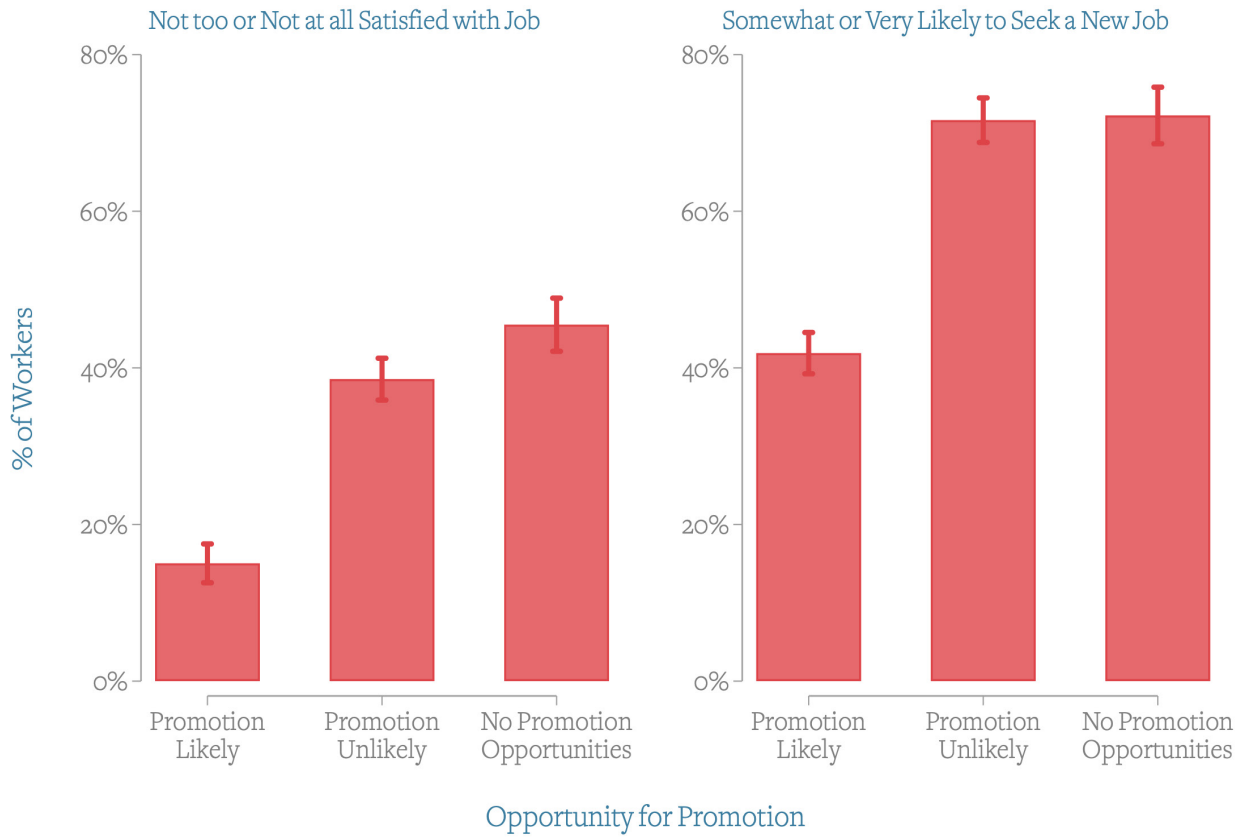


Figure 5. Young Workers' Feelings About Their Jobs as a Function of Advancement Opportunity



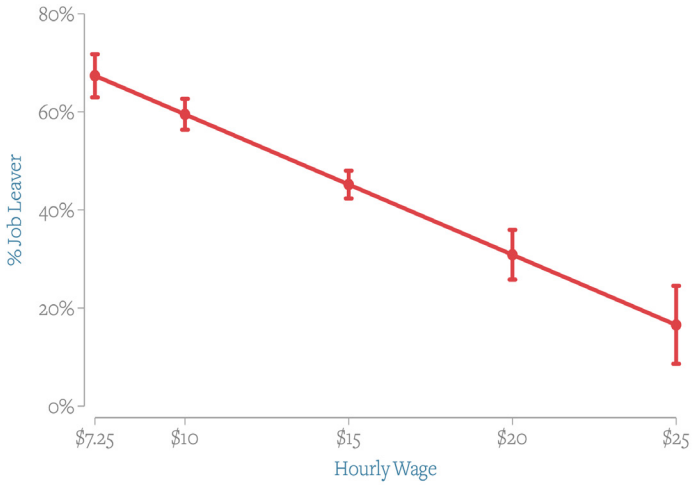
Overall, we find that two precursors to job turnover – job satisfaction and intention to find a new job – were strongly patterned by younger workers' job conditions. Those workers who faced the lowest wages, most unstable schedules, fewest benefits, and most limited opportunities for advancement were least satisfied with their jobs and most likely, by a wide margin, to report planning to find a new job. Far from a broad-based retreat from work, these results suggest that workers facing precarious working conditions were looking for alternatives. In the next section, we examine whether these stated intentions translated to job leaving and if working conditions played a similar role in behavior as in expectations.

Which workers left their jobs?

In the previous analysis, we looked at which working conditions predicted workers' expectations of leaving their job. Because the Shift Project included follow-up surveys with workers, we can also examine which workers did, in fact, leave their jobs, and how their job exits were associated with the quality of their initial, or baseline, jobs. In other words, did lower quality working conditions push young workers to leave their jobs? In this analysis, we define job leaving as exiting a baseline job for either a new job or unemployment.

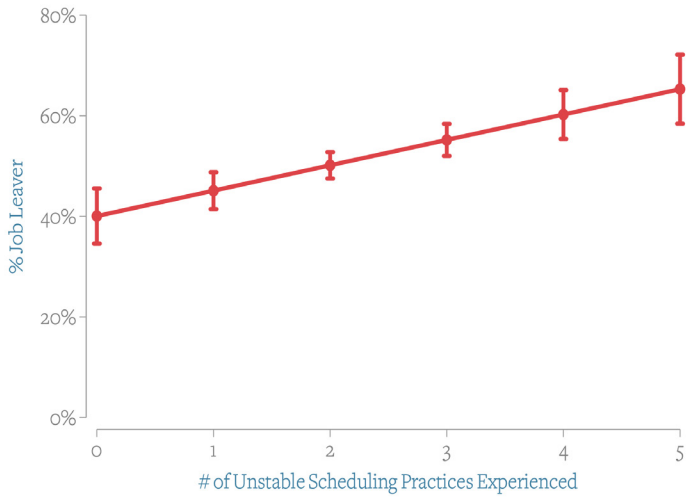
We find significant negative associations between baseline job quality and workers exiting their jobs (Appendix Table 3). As job quality increases (e.g., better wages, more stable schedules), young workers are less prone to leaving their jobs. For example, hourly wage is significantly and negatively associated with job leaving. As shown in Figure 6, the majority of workers who earned minimum wage (67%) left their jobs, relative to 45% of workers making $15/hour and only 17% of workers making $25/hour. This patterning of actual job leaving by wage level is far stronger than the patterning we saw in workers' stated intentions.

Figure 6. Job Exits as a Function of Baseline Wages



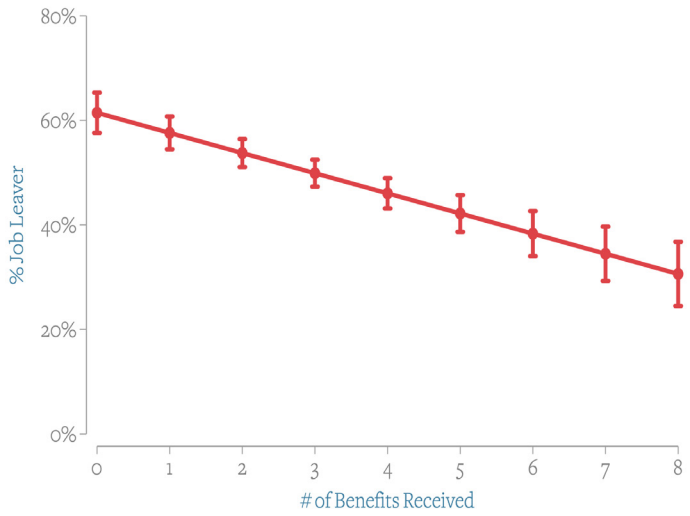
Unpredictable and unstable schedules are also associated with job exits. In particular, having experienced a canceled shift in the past month is significantly associated with job exits, as is having less than two weeks of scheduling notice. Around 60% of workers who experienced a canceled shift and 57% of workers who had less than two weeks of notice left their jobs, compared to 49% who did not experience a canceled shift and 41% with more than two weeks of notice. The cumulative effect of increased schedule instability, as measured by a six-point scale (0-5), is strongly

Figure 7. Job Exits as a Function of Schedule Instability



positively associated with job leaving (Figure 7). While just 40% of workers with the most stable and predictable schedules left their jobs, the share was significantly higher, at 65%, of those exposed to the most schedule unpredictability and instability. We show full results for each scheduling practice in Appendix Figure 5. Benefits are also important for job retention, both cumulatively and individually. Overall, 60% of workers employed in positions that entirely lacked benefits had left their jobs at follow-up as compared with just 30% of workers in jobs with the most generous set of benefits (Figure 8). Workers in jobs with paid vacation are significantly less likely to leave their jobs than those without (46% vs. 54%, respectively). Similarly, workers with access to paid parental leave exit their jobs less often than those without that leave (45% vs. 53%), while workers with access to retirement plans leave their jobs less often than those without (46% vs. 53%). We show full results for each benefit in Appendix Figure 6.

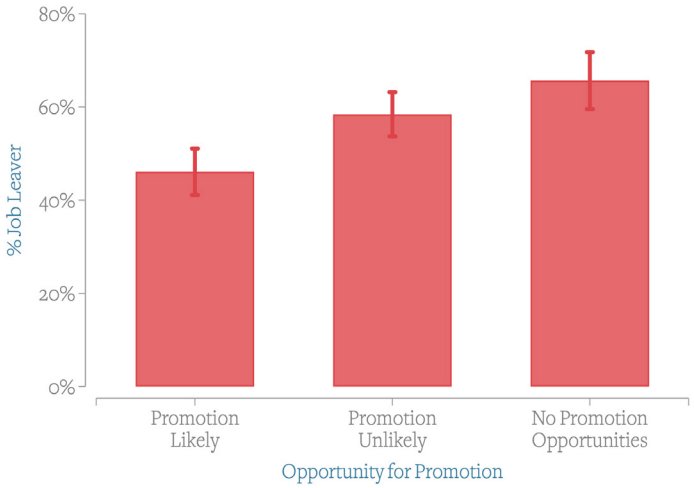
Figure 8. Job Exits as a Function of Benefits



Finally, young workers are more likely to leave jobs with few opportunities for career advancement (Figure 9). Relative to those who believe that a promotion is likely, workers who believe that a promotion is unlikely and those who believe that there are no promotion opportunities available are significantly

more likely to leave their jobs. For example, while only 46% of those who believe a promotion is likely left their jobs, 58% of those who believe a promotion is unlikely and 66% of those who say there are no promotion opportunities left their jobs.

Figure 9. Job Exits as a Function of Career Advancement Opportunities



Where Do Young Workers Go?

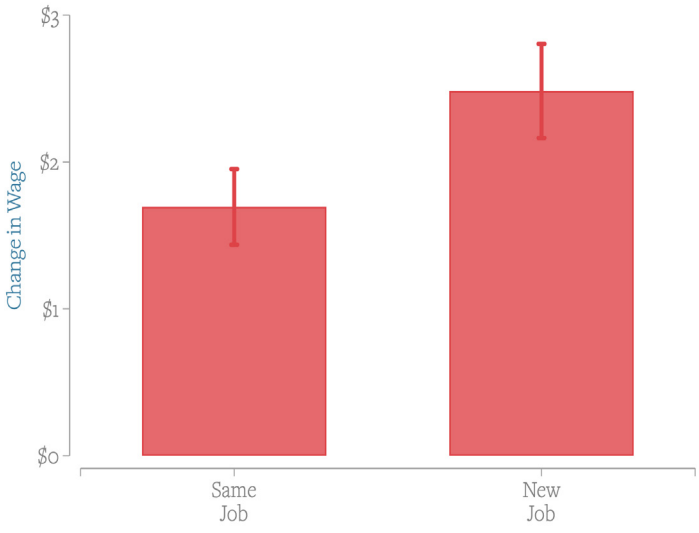
What were the employment trajectories of workers who left their jobs? In total, 49% of young workers stayed at their job, while 39% of workers left for a new job and only 12% transitioned to unemployment. Rather than large shares of workers leaving the ranks of the employed, the far more common outcome was to either stay put in their job or to move from one job to a new position.

Of those who transitioned to unemployment, 49% were looking for work and 51% were not looking for work when we followed-up with them. Those who were looking for a job were overwhelmingly doing so because they needed money (98%). Those who were not looking for a job planned to remain out of the labor force for a variety of reasons. Young workers' most common reason was because they were currently in school or a training program (69%). Other reasons include that they had a health condition (15%), they had childcare responsibilities (12%), they didn't feel safe searching for a job because of COVID-19 (9%), they had responsibilities to other family members (8%), they made money from odd jobs (8%), or they did not find a job after looking (8%). **Less than 1 percent of respondents who we surveyed at baseline had left their job, were unemployed, and were not looking for a new job because they reported having enough income from other sources.**

Were young workers who moved jobs able to improve their job quality?

By using the Shift panel data which tracks workers over time, in addition to knowing which workers left their job, we also observe which jobs workers transitioned into. This allows us to test whether workers are using job leaving as a way to "upgrade" their jobs or, rather, improve various working conditions by moving to a new job. Focusing exclusively on those who moved to a new job (i.e., excluding those who transitioned to unemployment), we directly compare the attributes of jobs that workers held in each period and find strong evidence that young workers who moved jobs were able to upgrade (Appendix Table 4).

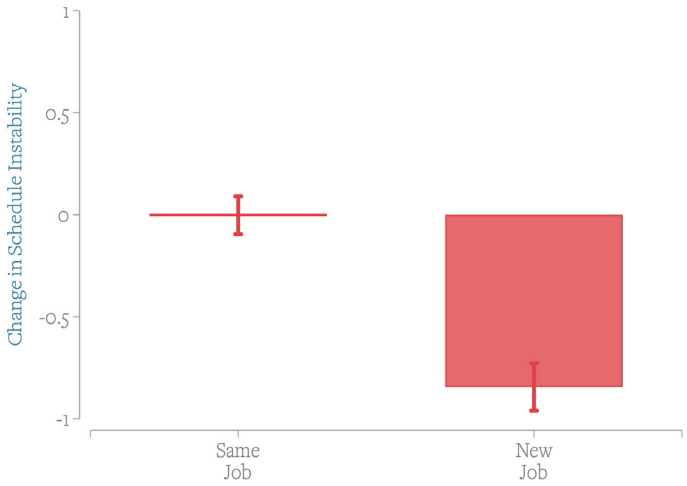
Figure 10. Changes in Hourly Wages as a Function of Job Leaving



Job leaving is positively associated with higher wages in a new job versus remaining in the same job as at baseline (Figure 10). Young workers who left their job often entered ones that pay better, and these pay gains exceeded raises received by workers who stayed at their jobs. For example, adjusting for demographic and work characteristics, workers who left their jobs began working at employers that paid about $2.50/hour more than their baseline job. Interestingly, and perhaps in line with reports that firms are raising wages to retain workers[16], workers who remained at their job also saw an increase in their hourly wages, though not as high as those who left (around $1.70/hour). The returns to changing employers were about $0.80/hour. This is a large difference as $0.80/hour represents an almost 7% additional pay increase for a worker earning the median wage at baseline.

Moving to a new job is also associated with declines in exposure to schedule instability, as measured by the 6-point scale (Figure 11). Across all metrics (i.e., canceled shifts, changes in timing of schedules, working a clopening shift, working an on-call shift, and receiving less than two weeks of scheduling notice), young workers move to jobs with more stable schedules (Appendix Figure 7).

Figure 11. Changes in Schedule Instability as a Function of Job Leaving



However, we find little evidence that workers upgrade their benefits when transitioning to a new job, based on both a measure of total benefits available and individual measures.

Finally, we explore the extent to which job leaving was a form of occupational or sector mobility by displaying the mobility between and out of service industry sectors using a Sankey plot (Figure 12). The left portion of Figure 12 displays the distribution of young workers across retail and food service sectors when first surveyed in Spring 2020 - Spring 2021 (Baseline). The right portion shows where this same set of workers were when we followed up with them in Fall 2021 - Spring 2022 (Follow-Up). In essence, the plot displays how workers flowed within and between sectors from the baseline to follow-up survey waves. For each sector at baseline, we trace where these workers were at follow-up (i.e., stayed at same job; moved within the same sector within the service industry, moved to a different sector within the service industry, exited the service industry, or transitioned to unemployment).

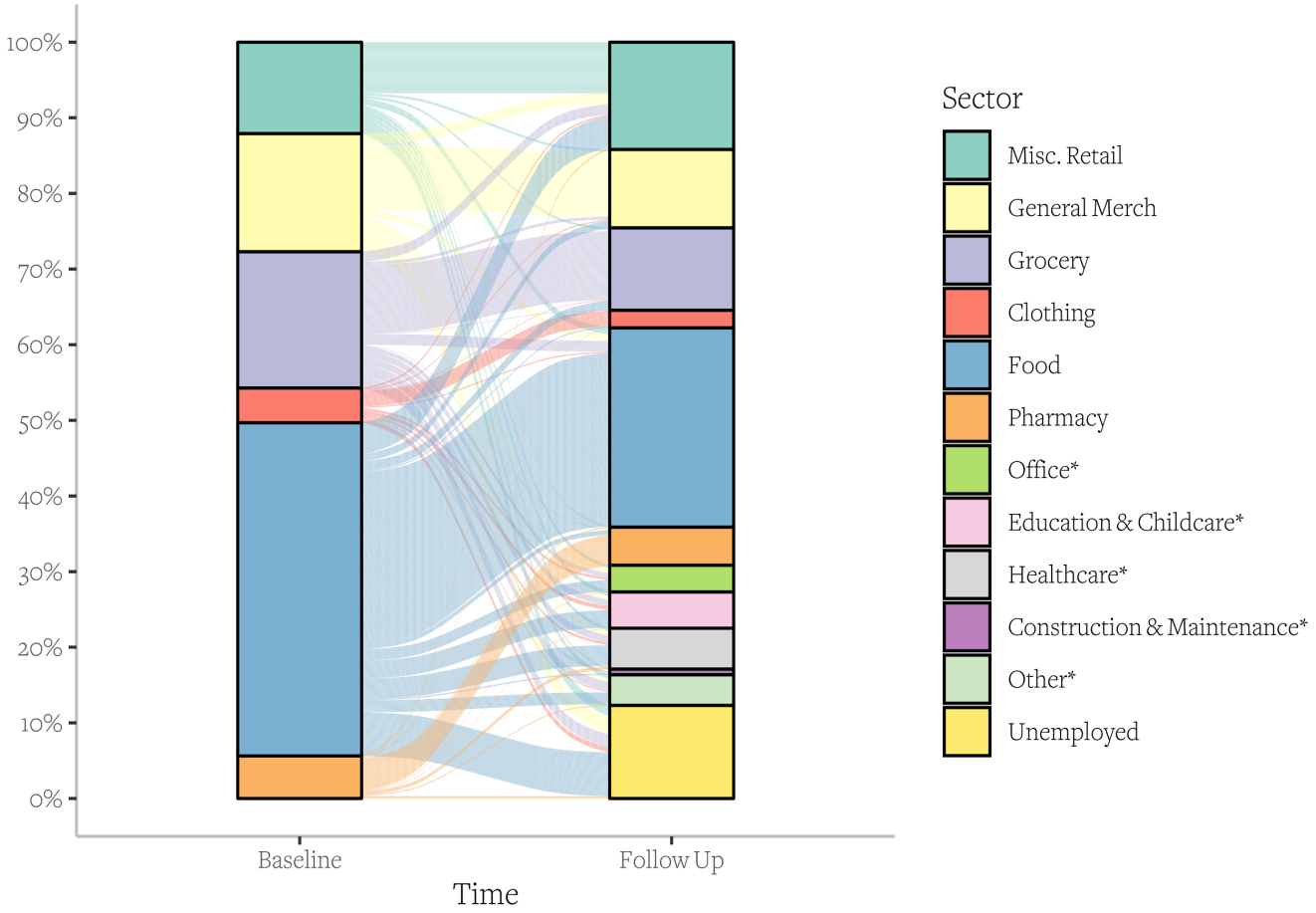
Averaging across all service industry sub-sectors (i.e., retail, general merchandise, grocery, food, pharmacy, clothing, and miscellaneous retail), the majority of workers remained in the service industry, with 46% staying in the same job, 7% moving to a new job within the same sub-sector (i.e. from one food service job to another), and 16% moving to a different sub-sector within the service industry (e.g., from food service to grocery). In total, 69% of workers stayed in the service-sector. A much smaller share, just 19% of young workers, moved to jobs outside of the service industry (e.g., to healthcare or education), and 12% moved to unemployment.

Among the young workers who made a job transition, these statistics show that 17% stayed within the same sub-sector of the service industry, 38% changed sub-sectors within the service industry, and 45% changed industries all together.

However, these rates of transition and the dynamics of sorting into (a) new employers in the same sub-sector or (b) a new sub-sector of the service industry, or (c) a new industry altogether, differed depending on the sub-sector in which workers started. For instance, Figure 12 demonstrates the high frequency of job transitions from food service, where 44% of young workers were employed at baseline and where nearly half (49%) of all job changes originated. Among those food service workers at baseline who changed jobs, 24% moved to a new job within the food sub-sector, 35% to a new job in a new sub-sector of the service industry, and 41% to a new industry all together. The comparatively large share of workers exiting food service highlights the precarity of this sector. This point is reinforced by the fact that comparatively few workers who started in other sub-sectors had moved into the food sub-sector by follow-up. Specifically, while 46% of workers who left their jobs for a new sector were in food service, only 6% of workers who left their job for a new sector moved into food service. Together, these data points suggest that there may be stronger push factors than pull factors among food service jobs.

In contrast, workers in the pharmacy industry were much more stable. Here, 71% stayed in their jobs and just 29% transitioned to a new job. Among those pharmacy workers at baseline who changed jobs, 6% moved to a new job within the pharmacy sub-sector, 39% to a new job in a new sub-sector of the service industry, and 55% to a new industry all together.

Figure 12. Sector Mobility as a Function of Job Leaving



* indicates non-service industry sectors (i.e. non food and retail sectors)

Conclusions

Scholars, business leaders, politicians, and members of the media have offered various competing narratives for what's driving the "Great Resignation." Are young workers leaving to become unemployed and rely on government assistance? Or, in a tight labor market where the scales of power are tipped toward workers, are they using it as an opportunity to "upgrade" their jobs? We find evidence for the latter explanation.

Using data from the Shift Project (Spring 2020 – Spring 2022), we find that while some young workers in the service sector receive relatively high wages, stable schedules, and employer benefits, many younger workers do not. This variation in job quality maps onto workers' job satisfaction and intention to look for new jobs. When working conditions were precarious, workers were far more likely to plan to find something better.

Looking across multiple interviews, we find that these expectations translate to action. Drawing on panel data that followed workers across multiple survey waves, we find that young workers were also more likely to leave lower quality jobs. The correspondence between baseline working conditions and job leaving was significant and substantial. For instance, while 67% of minimum wage workers left their jobs, only 17% of workers making $25 an hour did so.

Furthermore, while workers who remain in their jobs do see some modest improvements in job quality, workers who left their jobs most often did so for higher quality jobs, specifically jobs with higher wages and more stable schedules. For example, workers who left their jobs saw wage increases of $2.50/hour, compared to wage increases of only $1.70/hour for workers who stayed at their jobs. However, we find little evidence that workers improved their benefits in their new jobs.

Our results suggest that young workers in the service sector seized the opportunities provided by an extremely tight labor market to improve their working conditions. Rather than being trapped in jobs with low pay or unstable schedules, these workers sought out roles that were a better fit for their own personal and professional goals. In order to attract and retain younger workers, employers should offer competitive pay, benefits, and schedules.

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Methodological Appendix

Overview of Shift Project Data

The Shift Project has collected survey data from hourly service-sector workers employed at large retail and food establishments since the fall of 2016. Additionally, the project began compiling panel data in 2017 by re-contacting respondents to answer follow-up questions. This brief focused on a subsample of 2,939 hourly service-sector workers between the ages of 18 and 24 who were surveyed in Spring 2021, Fall 2021, or Spring 2022 as well as 1,395 early career, hourly service-sector workers who had at least two waves of panel data, with one baseline survey (conducted in Spring 2020, Fall 2020, or Spring 2021) and one or two reinterview surveys (Fall 2021 and Spring 2022).

The Shift Project recruits survey respondents using online Facebook/Instagram advertisements, targeted to workers employed at large retail and food-service employers. Those who responded to the Shift survey invitation were automatically routed to a survey landing page where they were asked to consent to participate in the study, then began the online self-administered survey using the Qualtrics platform. As an incentive, those who completed the survey and provided contact information were entered into a lottery for a $500 Amazon gift card. The survey included modules on job characteristics, work schedules, demographics, economic stability, health, parenting, and child outcomes. To screen out invalid survey responses, we used an attention filter (a question that instructed respondents to select a particular response category to verify the accuracy of their responses) as well as a speed filter (discarding data for surveys that were completed too hastily). We multiply impute the data for non-response.

The survey recruitment approach yields a non-probability sample of workers, which may differ from the broader population of service-sector workers. To mitigate potential bias, we have applied survey weights that adjust our sample to reflect the universe of early career service-sector workers in the U.S. These weights are constructed in two stages.

First, we construct survey weights to adjust the demographic characteristics of the Shift survey sample to match the demographic characteristics of service-sector workers in the American Community Survey (ACS) for the years 2008-2017. We align the ACS sample with the Shift sample by selecting workers in the ACS who are employed in the same occupations and industries as the Shift sample. These weights are constructed using age, gender, race/ethnicity, and educational attainment.

Second, to ensure that our sample accurately reflects the distribution of employment types among large retail and food-service employers, we use data from the Reference USA database of U.S. establishments. The RefUSA database contains a detailed listing of all retail and food establishments nationally. RefUSA contains the size of the workforce for each establishment, which we aggregate up to the industry level. Then, using the aggregated RefUSA employer data, we create weights to align our Shift survey sample to the distribution of workers by industry within state. The results we present in this report are unweighted, but in supplementary analyses we applied these ACS demographic and RefUSA employer weights and results did not vary substantially.

For a detailed discussion of The Shift Project data collection, methodology, and data validation, see Schneider and Harknett (2022).

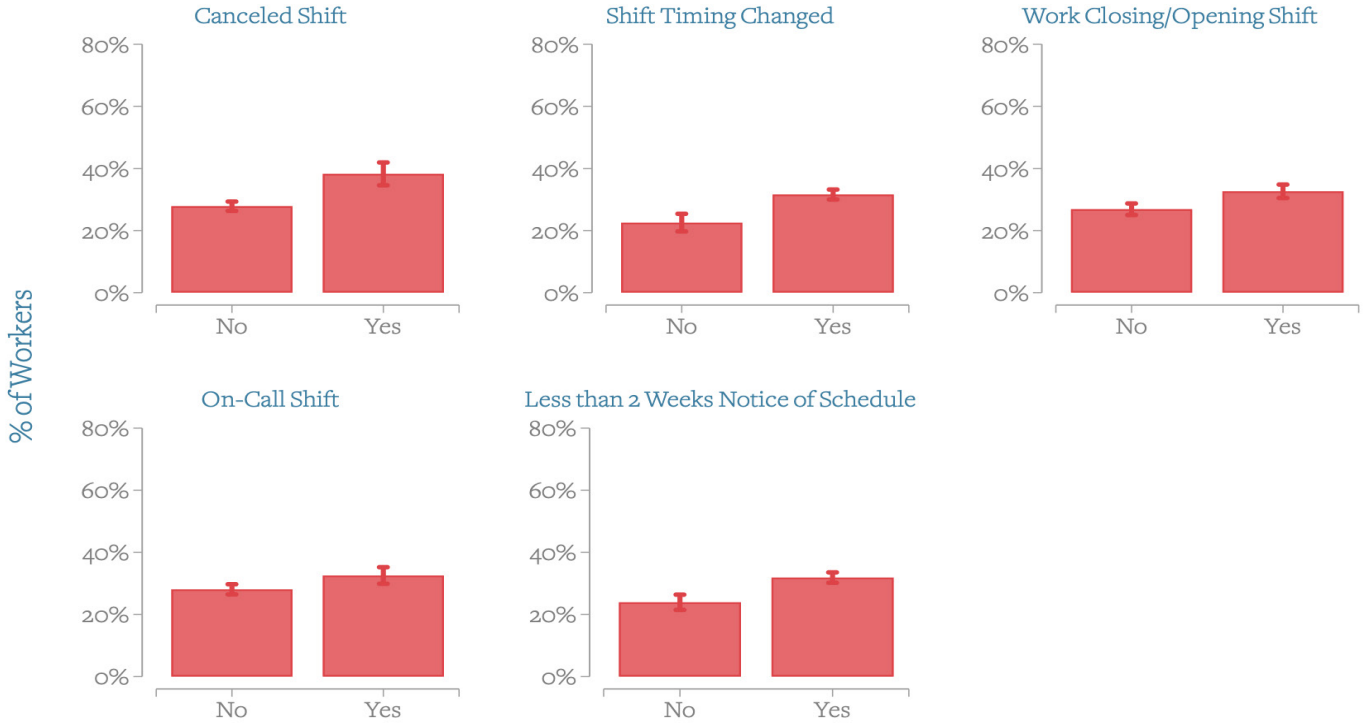
Data Analysis

We begin our analyses by providing descriptive statistics on the workers in the Shift Project sample. Next, we describe which young workers expected to leave their jobs and examine how working conditions shaped workers' expectations of leaving or staying in their job. In particular, we focus on workers' reported job satisfaction and their intention to leave their jobs within the next three months. We run a series of OLS regression models with each of these measures as outcome variables and various job quality characteristics (wages, benefits, schedules, and career advancement opportunities) as predictors. In each model, we control for demographic characteristics (gender, race, age, parenthood, English as a second language, school enrollment, and marital status) and work characteristics (job tenure, union membership, and managerial status).

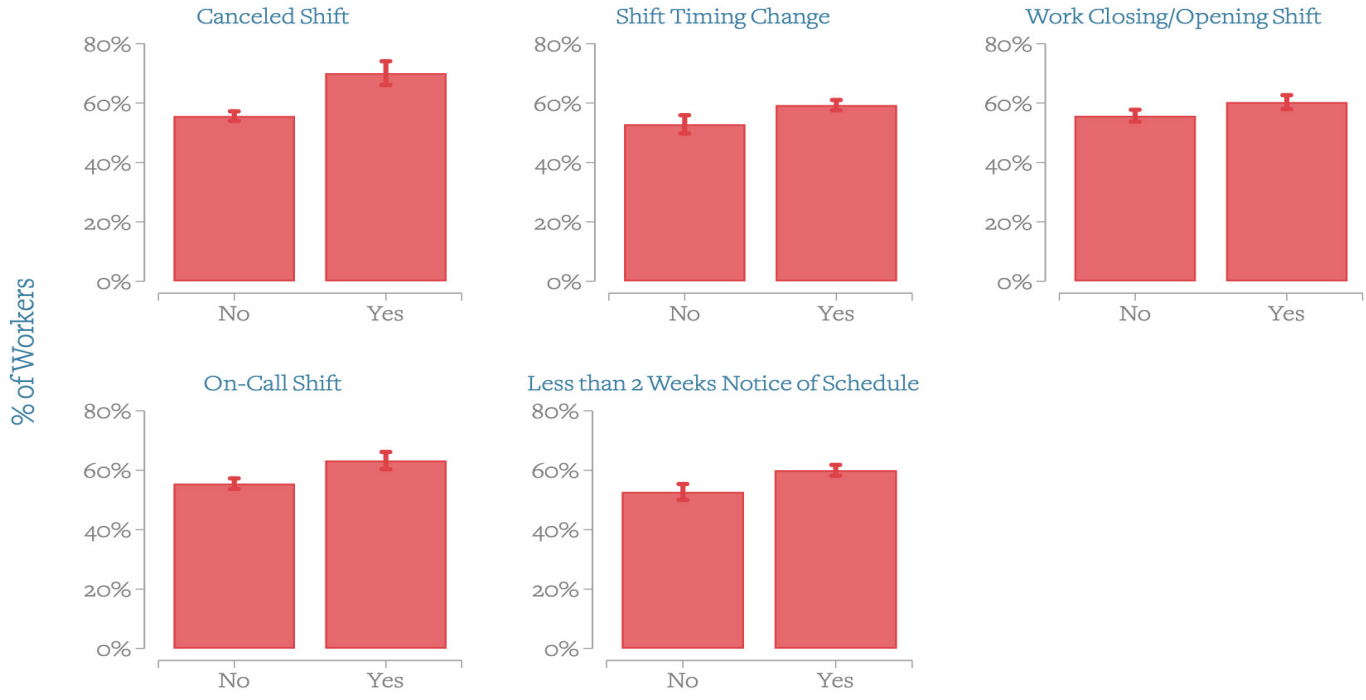
We then create a measure for whether workers left their jobs between survey periods, including to either a new job or to unemployment. First, we model job leaving as a function of job quality, running OLS models and controlling for the same set of demographic and work characteristics as in earlier models. Second, we model changes in job quality (i.e., changes in wages, schedule instability, and benefits) as a function of job leaving, also running OLS models and controlling for demographic and work characteristics.

We operationalize schedule instability and benefits as both continuous and categorical measures. For schedule instability, we include dichotomous measures of each scheduling practice (canceled shifts, timing change, clopenings, on-call shifts, and less than 2 weeks of scheduling notice), as well as a count for the number of these practices that a worker experienced (0-5). For benefits, we include dichotomous measures of each benefit (paid sick leave, paid family leave, paid vacation, health insurance, dental insurance, retirement plan, tuition assistance, and childcare), as well as a count for the number of benefits a worker received in their job (0-8). In the main text, we only show figures for the continuous measures of schedule instability and benefits. In this appendix, we also include figures for the categorical measures of schedules and benefits across models.

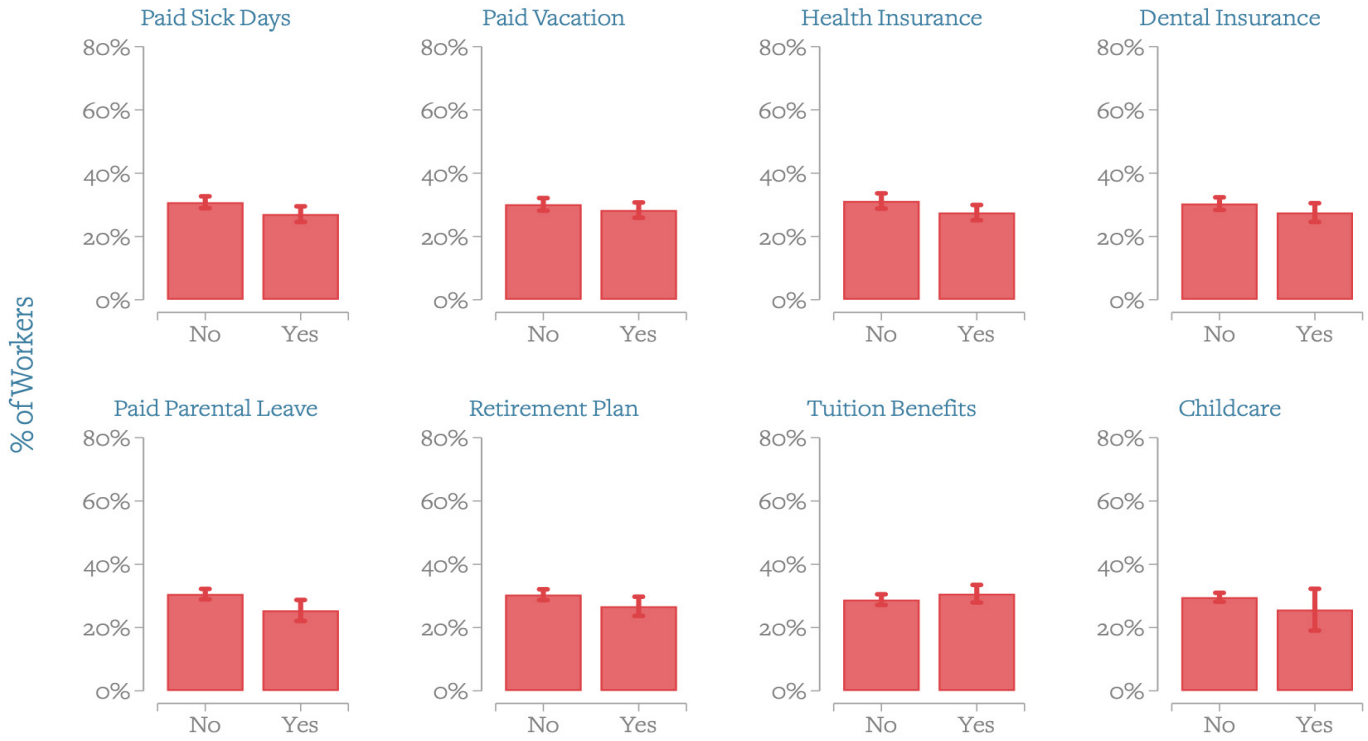
Appendix Figure 1. Young Workers' Job Dissatisfaction as a Function of Unstable Scheduling Practices



Appendix Figure 2. Young Workers' Likelihood to Seek a New Job as a Function of Unstable Scheduling Practices

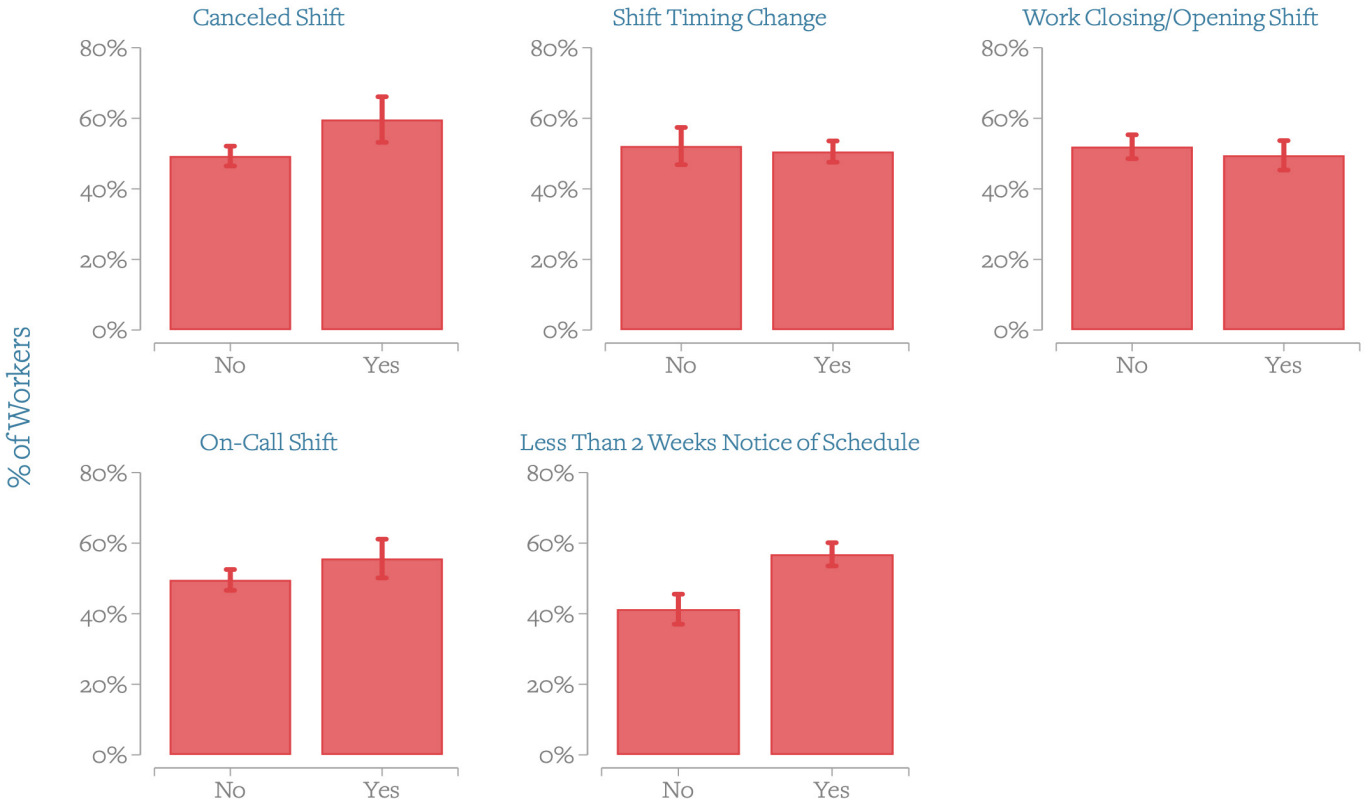


Appendix Figure 3. Young Workers' Job Dissatisfaction as a Function of Benefits

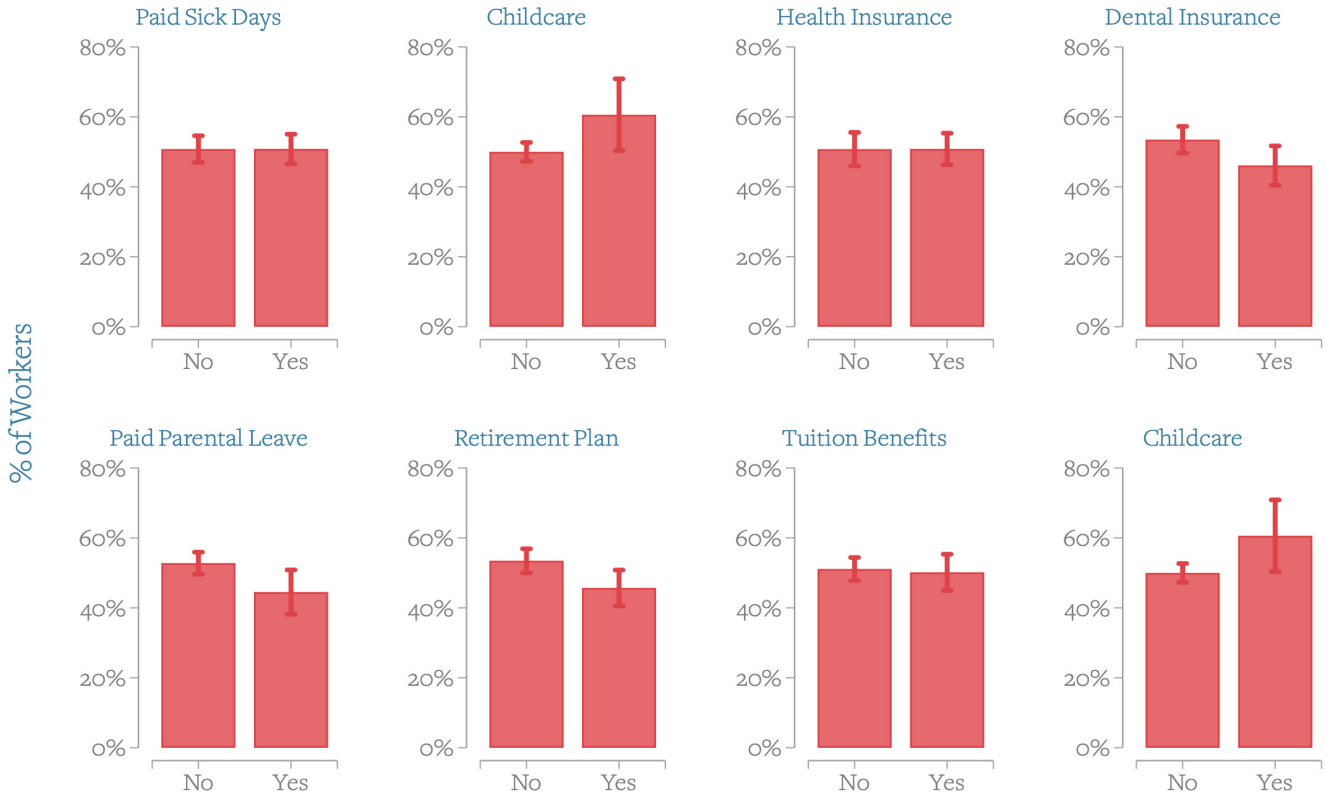


Appendix Figure 4. Young Workers' Likelihood to Seek a New Job as a Function of Benefits

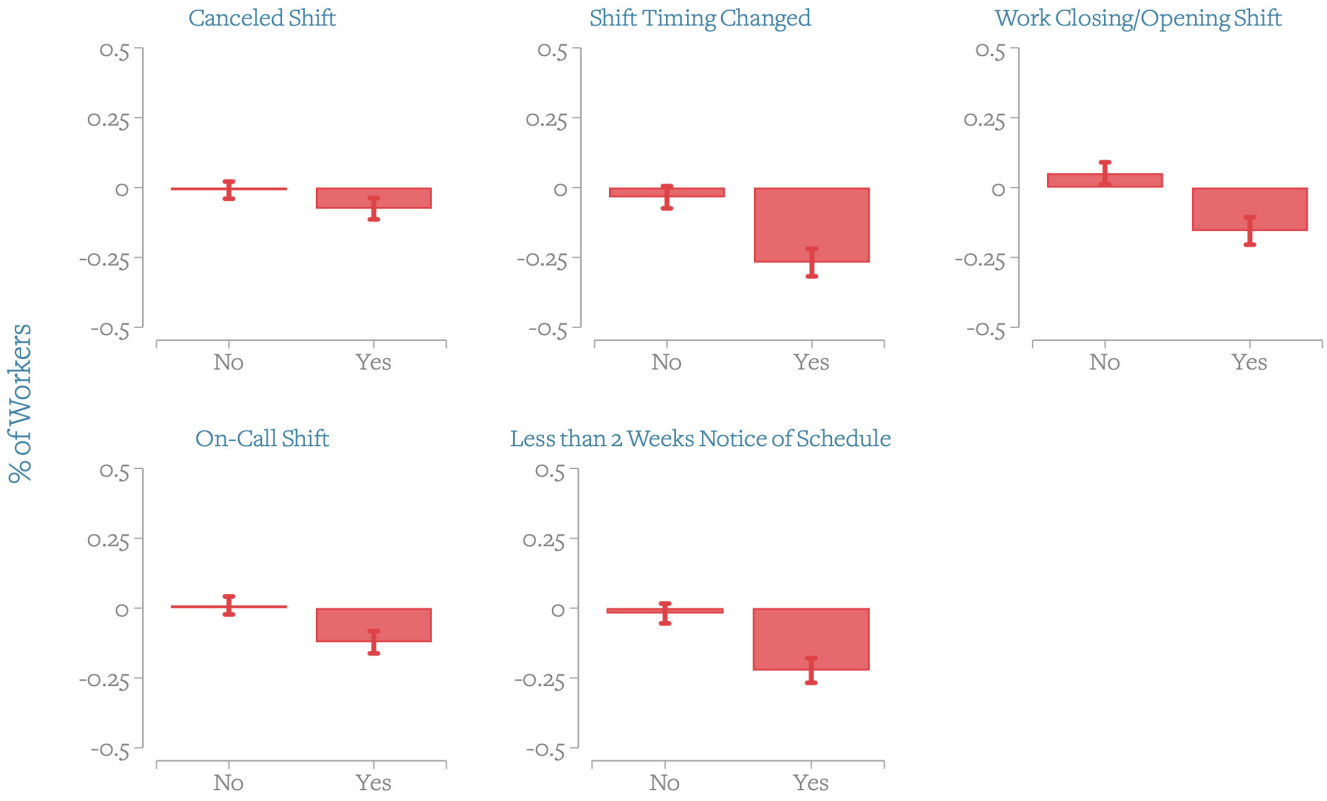
Appendix Figure 5. Job Exits by Scheduling Practice



Appendix Figure 6. Job Exits by Benefits Received



Appendix Figure 7. Changes in Schedule Instability as a Function of Job Exits



Appendix Table 1. Shift Cross-Sectional Sample Descriptives

Shift Sample Descriptives	*% of Total Sample*
Outcomes	
Job Dissatisfaction	
Satisfied	69.8
Not Satisfied	30.2
Likelihood to Seek New Job	
Likely	59.3
Not Likely	40.7
Demographics	
Gender	
Male	20.6
Female	74.2
Trans/Non-Binary	5.2
Race-Ethnicity	
White, Non-Hispanic	79.1
Black, Non-Hispanic	3.8
Hispanic	11.0
Other or 2 or more Races	6.1
Age	
18-19	41.5
20-21	30.2
22-24	28.2
Child Status	
No	92.7
Yes	7.3
English as a Second Language	
No	91.2
Yes	8.8
Currently Enrolled in School	
No	46.1
Yes	53.9
Cohabitation Status	
Married, Living with a Spouse	4.5
Living with a Partner	26.6
Not Living with a Spouse or Partner	68.9

Work	
Manager	
No	79.3
Yes	20.7
Job Tenure	
Less than 1 year	31.4
1 year	22.1
2 years	22.7
3 years	11.7
4 years	5.8
5 years	3.4
6+ years	2.9
Union Member	
No	92.6
Yes	7.4
Schedule	
Schedule Scale - No. of Unstable Scheduling Practices Experienced	
0	5.1
1	19.1
2	30.1
3	28.9
4	14.0
5	2.9
Employer Canceled Shift in the Past Month	
No	85.1
Yes	14.9
Employer Changed Timing of Scheduled Shift	
No	22.4
Yes	77.6
Worked a "Clopening" in the Past Month	
No	53.4
Yes	46.6
Had to be "On-Call" in the Past Month	
No	70.4
Yes	29.6
Less than 2 Weeks Scheduling Notice	
No	32.5
Yes	67.5

Control	
Keep Schedule Open/Available for Job	
No	33.5
Yes	66.5
Schedule Control	
Maximum Schedule Control	12.4
Some Schedule Control	44.0
No Schedule Control	43.7
Involuntarily Part-Time	
No	69.2
Yes	30.8
Benefits	
No. of Benefits Received	
0	27.9
1	15.9
2	11.7
3	10.6
4	9.6
5	9.0
6	8.0
7	5.2
8	2.2
Paid Sick	40.3
Paid Vacation	43.1
Health Insurance	51.4
Dental Insurance	36.0
Paid Parental Leave	23.5
Retirement Plan	28.7
Tuition	30.4
Childcare	5.1
Advancement Opportunity	
Promotion Opportunity	
It is likely that I will be promoted at my primary job	42.0
It is unlikely that I will be promoted at my primary job	36.0
There are no promotion opportunities available at my primary job	22.0
N	2939

Appendix Table 2. Regressing Intentions for Job Retention on Job Quality

	(1)	(2)
	Job Dissatisfaction	**Likelihood to See New Job**
Hourly Wage ($)	-0.01**	-0.01**
Schedules		
Canceled Shift	0.11***	0.16***
Timing	0.10***	0.06**
Clopening	0.04*	0.04
On-Call	0.03	0.07***
Less Than 2 Weeks Notice	0.09***	0.08***
Schedule Instability Scale (0-5)	0.07***	0.07***
Benefits		
Paid Sick Leave	-0.04*	-0.04
Paid Vacation	-0.01	-0.06*
Health Insurance	-0.03	-0.03
Dental Insurance	-0.03	-0.06*
Paid Leave	-0.05*	-0.05
Retirement Plan	-0.04	-0.05*
Tuition Reimbursement	-0.01	-0.00
Childcare	-0.05	-0.01
Benefits Scale (0-8)	-0.03***	-0.04***
Advancement Opportunity (ref: Promotion Likely)		
Promotion Unlikely	0.24***	0.30***
No Promotion Opportunities	0.30***	0.30***
N	*2939*	*2939*

Note: Each coefficient comes from a separate model. All models control for demographic characteristics (gender, race, age, marital status, children, enrollment in school, and English as a second language) and baseline job tenure.

Appendix Table 3. Regressing Job Leaving on Measures of Baseline Job Quality

	Job Leaving
Hourly Wage	-0.03***
Schedules	
Canceled Shift	0.10**
Timing	-0.02
Clopening	-0.02
On-Call	0.06
Less Than 2 Weeks Notice	0.16***
Schedule Instability Scale	0.05***
Benefits	
Paid Sick Leave	0.00
Paid Vacation	-0.08*
Health Insurance	0.00
Dental Insurance	-0.07
Paid Leave	-0.08*
Retirement Plan	-0.08*
Tuition Reimbursement	-0.01
Childcare	0.11
Benefits Scale	-0.04***
Career Advancement Opportunities (ref: Promotion Likely)	
Promotion Unlikely	0.12**
No Promotion Opportunities	0.20***
N	*1395*

Note: Each block of coefficients (bolded) comes from separate models. The sample size for the COVID models is significantly lower than other models (851). All models control for demographic characteristics (gender, race, age, marital status, children, enrollment in school, and English as a second language) and baseline job tenure. The sample size for the Career Advancement variable is 1036.

Appendix Table 4. Regressing Changes in Job Quality Measures on Job Leaving

	Job Leaving
Hourly Wage ($)	0.79***
Schedules	
Canceled Shift	-0.07**
Timing	-0.23***
Clopening	-0.21***
On-Call	-0.13***
Less Than 2 Weeks Notice	-0.21***
Schedule Instability Scale (0-5)	-0.84***
Benefits	
Paid Sick Leave	0.01
Paid Vacation	0.01
Health Insurance	0.01
Dental Insurance	0.06
Paid Leave	0.03
Retirement Plan	-0.01
Tuition Reimbursement	-0.07*
Childcare	-0.02
Benefits Scale (0-8)	-0.01
N	*1326*

Note: Each coefficient comes from a separate model. All models control for demographic characteristics (gender, race, age, marital status, children, enrollment in school, and English as a second language) and baseline job tenure.

End Notes

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13. Harknett, Kristen, Daniel Schneider, and Adam Storer. 2021. *Early Career Workers in the Service Sector.* Shift Project Research Brief.
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15. Figures visualizing these results can be found in the appendix.
16. Casselman, Ben. 2022. "The Job Market's Cues." *The New York Times*, November 3.