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Racial and Ethnic Disparities in the Effects of COVID-19 on Employment Disruption and Financial Precarity

Abstract

Existing studies find that COVID-19 disproportionately affected the employment and financial security of minoritized workers. However, few studies have examined the employment and financial impact of COVID-19 among different groups of older workers. Furthermore, there is limited information on how pre- and post-COVID-19 financial precarity are associated. To address these gaps, we analyzed data from the 2016 and 2018 waves of the Health and Retirement Study (HRS), as well as the 2021 HRS Perspectives on the Pandemic mail-in survey, to evaluate racial differences in the consequences of COVID-19-related job disruption and financial precarity among workers 51 and older. Results indicate that non-Hispanic Black and Hispanic workers had higher rates of COVID-19-related job disruptions than their white counterparts. Further, non-Hispanic Black older workers were more likely to have stopped work due to illness than their white counterparts. Results also show that non-Hispanic Black and Hispanic older workers experienced more post-COVID-19 financial consequences than their white counterparts. Finally, analysis of interaction terms indicated that the association between pre-COVID-19 financial precarity status and post-COVID-19 financial precarity outcomes was dependent on race. Specifically, although pre-COVID-19 financial precarity was associated with significantly higher rates of post-COVID-19 precarity for all racial groups, white older workers without pre-COVID-19 precarity were uniquely protected from post-COVID-19 precarity, whereas Black and Hispanic older workers were likely to experience relatively high rates of post-COVID-19 precarity even in the absence of pre-COVID-19 precarity.

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Introduction

The COVID-19 pandemic was responsible for the death of one out of every 100 adults 65 and older in the United States during the pandemic's first two years (Bosman et al. 2021). Minoritized (i.e., non-Hispanic Black and Hispanic) older adults were especially likely to be affected, experiencing higher rates of infection and death (Hill and Artiga 2022). Furthermore, minoritized older workers who continued to work during the pandemic were more likely to be in jobs that exposed them to the public, thus elevating their risk of experiencing illness themselves (Rogers et al. 2020) or were more likely to be in a household with another person who became ill and consequently required care (Greenaway et al. 2020).

The consequences of exposure to infections on labor force participation among older workers and their families could have important implications for financial security. Relative to job disruptions before the pandemic, those that occurred during the COVID-19 pandemic were more widespread and coupled with financial support provided to the population via the Economic Impact Payment (EIP) program associated with the Coronavirus Aid, Relief, and Economic Security (CARES) Act that passed in 2020 (U.S. Department of the Treasury 2023). Despite this relatively universal financial benefit to offset the consequences of job disruptions, Black and Hispanic older workers are more likely to work in low-paying "essential" service jobs in which they have less access to paid time off, paid sick days, or flexible work arrangements (i.e., working from home). As a result, Black and Hispanic older workers were more likely to experience a loss of job hours, employment disruptions, and reduced income associated with illness or

caregiving compared to their white counterparts during the pandemic (Jason et al. 2023a, 2023b).

Financial precarity associated with the COVID-19 pandemic may also have been influenced by the financial conditions individuals faced prior to the pandemic. Minoritized older individuals were more likely than their white counterparts to report financial difficulties and difficulty paying monthly bills pre-COVID-19 (Katikireddi et al. 2021; Mamluk et al. 2020). Consequently, one reason that Black and Hispanic older workers may be more susceptible to financial precarity occurring in association with COVID-19-related employment disruption could be related to previous experiences with financial precarity rather than merely the effects imposed by the pandemic itself.

Informed by current evidence suggesting that structural barriers may pre-condition minoritized older workers to experience job disruptions (Fairlie et al. 2020), we hypothesize that:

H1: Relative to their white counterparts, minoritized older workers (i.e., non-Hispanic Black and Hispanic) were more likely to have experienced job disruptions in association with the pandemic.

Among those who did experience job disruptions, we hypothesize that:

H2: Job disruptions experienced by minoritized older workers (i.e., non-Hispanic Black and Hispanic) were more likely to be due to their own illness or providing care to another person.

Given well-established research showing the disproportionate risks of job disruptions on financial well-being for minoritized workers prior to the pandemic (Jason et al. 2023a, 2023b), we hypothesize that:

H3: COVID-19-related job disruptions were more likely to lead to COVID-19-related financial precarity for minoritized older workers (i.e., non-Hispanic Black and Hispanic) relative to their white counterparts.

Finally, we anticipate that minoritized older workers were more likely to have experienced pre-COVID-19 financial precarity compared to their white counterparts; and given this, minoritized older workers would be more likely to experience consequences associated with COVID-19-related financial precarity. That is, we hypothesize that:

H4: Relative to their white counterparts, minoritized older workers (i.e., non-Hispanic Black and Hispanic) were more likely to experience pre-COVID-19 financial precarity, and that pre-COVID-19 financial precarity was related to more significant post-COVID-19 financial precarity for minoritized older workers.

Methods

Data and sample

Data for this study are drawn from the Health and Retirement Study (HRS). Specifically, our sample is derived from individuals who completed the 2021 HRS Perspectives on the Pandemic mail-in survey, fielded during the spring and fall of 2021. The 2021 HRS Perspectives on the Pandemic mail-in survey is particularly useful to this study because it documents COVID-19 exposures, experiences, and stressors, as well as employment disruption and financial setbacks for respondents between March 2020 and the time of data collection, thereby allowing us to evaluate at least one year of COVID-19-related job disruptions and any associated financial precarity. Several of our demographic and contextual pre-COVID-19 variables are drawn from the 2018 survey

wave available in the RAND HRS Longitudinal File. Additionally, our measure of pre-COVID-19 financial precarity is drawn from the HRS Psychosocial and Lifestyle Questionnaire (PLQ). The PLQ is completed on a rotating basis every two years, and half of HRS respondents are surveyed in every two-year wave. Therefore, to establish respondent-level, pre-COVID-19 financial precarity, we use data taken from either the 2016 or 2018 survey waves of the PLQ depending on when respondents were interviewed.

Given our focus on racial and ethnic differences, this study excludes respondents who identify as "other" race, focusing only on three key groups: 1) non-Hispanic white, 2) non-Hispanic Black, and 3) Hispanic older workers. To address our first study hypothesis, we first evaluate participants who were employed in March 2020 when the pandemic began (N=3,140). For our second and third study hypothesis, our sample includes older workers who completed the 2021 HRS Perspectives on the Pandemic mail-in survey questions related to pre-COVID-19 work and post-COVID-19 job disruptions and financial precarity and who had valid data on relevant control measures (N=1,262). To address our final study hypothesis, we evaluate the subset of this sample that provided data on pre-COVID-19 financial precarity obtained from the HRS PLQ (N=954).

Key measures of interest

To address our first hypothesis, we included an *Employment Disruption* measure drawn from the 2021 HRS Perspectives on the Pandemic mail-in survey. The measure was based on the question: "Since March 2020, was there a period of two weeks or more when you were not working?" Respondents who indicated that they experienced

an employment disruption of two weeks or more were coded “1” and all others who did not experience an employment disruption of two weeks or more, were coded “0.”

To address our second hypothesis, we evaluated differences in the reasons why respondents experienced an employment disruption. These *Employment Disruption Reason*s measures were based on the 2021 HRS Perspectives on the Pandemic mail-in survey question, “Why did you stop working?” Respondents had the choice to identify one or more factors from the following list: (1) lost job/laid off permanently, (2) furloughed/laid off temporarily, (3) illness, (4) care for others who needed me, or (5) retired. To determine overall rates and race-specific rates, each reason was evaluated separately. For each of the five reasons, respondents who indicated they stopped working for that reason were coded “1” and respondents who did not indicate that reason, were coded “0.”

For our third hypothesis, we evaluated how COVID-19-related employment disruption differentially influenced the likelihood of experiencing financial difficulties among non-Hispanic Blacks and Hispanics relative to non-Hispanic whites. Specifically, we evaluated *post-COVID-19 financial precarity.* These measures were based on the 2021 HRS Perspectives on the Pandemic mail-in survey question: “Since March 2020, how often did you experience any of the following?” Respondents had the choice to identify one or more from the following list: (1) missed any regular payments on rent/mortgage, (2) missed any regular payments on credit cards or other debt, (3) missed any other payments such as utilities or insurance, (4) could not pay medical bills, (5) didn’t have enough money to buy food, or (6) any other financial hardship not in this list. Responses ranged from never, sometimes, often, always, or nearly always. For

the current study, we excluded category “6” from our analyses. We categorized *post-COVID-19 financial precarity* in three distinct ways. First, we created a binary measure indicating *1+ financial precarities,* where respondents who reported “sometimes” or more frequently to any of the five listed financial setbacks were coded “1” and all others who did not experience any of the major financial setbacks at least “sometimes,” were coded “0.” Additionally, we evaluated each of the listed precarities separately. For each, respondents who indicated “sometimes” or more frequently for that precarity were coded “1” and respondents who did not indicate at least “sometimes” were coded “0.” Lastly, we evaluated the *total number of precarities*. This measure is the sum of all precarities a respondent reported occurred “sometimes” or more frequently (range is 0 to 5).

To address our fourth hypothesis, we evaluated pre-COVID-19 financial precarity. This measure, *pre-COVID-19 financial strain,* was based on responses provided in either the 2016 or 2018 wave of the Psychosocial and Lifestyle Questionnaire (PLQ). Respondents were asked, “Please read the list below and indicate whether or not any of these are current and ongoing problems that have lasted 12 months or longer.” Respondents were asked to indicate how upsetting each of the ongoing problems were with responses ranging from (1) yes, not upsetting, (2) yes, somewhat upsetting, and (3) yes, very upsetting. We coded those who indicated having experienced financial strain and reported that the problem was “somewhat upsetting” or “very upsetting” as “1” and coded respondents who reported the problem as “not upsetting” or who did not report the problem as ongoing as “0.”

Racial and ethnic group measures

Our three measures of race and ethnicity were evaluated based on two variables drawn from the RAND HRS Longitudinal File: an indicator for self-reported racial category (choices included white, Black, or Other) and an indicator regarding whether individuals identified their ethnicity as Hispanic. Respondents were coded *white* if they reported their race as "white" and their ethnicity as "not Hispanic." Respondents were coded as *Black* if they reported their race as "Black" and their ethnicity as "not Hispanic." Respondents were coded as *Hispanic* if they reported their ethnicity as "Hispanic" regardless of their self-reported racial category. For the current study, all respondents who identified as both non-Hispanic and "other" race were excluded from our analyses.

Control measures

For this study, we included several demographic and contextual control measures. All statistical controls were drawn from the 2018 wave of the RAND HRS Longitudinal File. Our measure for *U.S. born* was coded so that respondents who reported they were born in the United States were coded "1" and respondents who reported they were born outside of the United States were coded "0." *Female* was coded such that respondents who identified as female were coded "1" and those who identified as male were coded "0." *Age* is a continuous measure of chronological age in 2018 (ranging from 51 to 95). *Number living in household* is the total count of individuals living within the respondent's household, including the respondent (responses ranged 1 to 12). *Geographic location* is a categorical measure denoting the geographic region in which respondents live. Respondents who reported living in the North/Northeast were coded "1", respondents who reported living in the Midwest were coded "2", respondents

who reported living in the South were coded “3”, and respondents who reported living in the West were coded “4”. *Poverty threshold* is a measure drawn from the RAND Longitudinal File and is a continuous measure based on a ratio of household income to the associated income requirement to qualify as “poor” according to the Federal Poverty Limit. Respondent’s self-reported *Years of Education* is a continuous measure, ranging from 0 to 17. *Pre-COVID-19 self-reported health* is measured as a continuous measure ranging from 1=poor health to 5=excellent health. *Pre-COVID-19 Depressive Symptoms* is a continuous measure based on the total number of symptoms reported in 2018, ranging from 0 to 8.

Analytic approach

To address our first study hypothesis, we first evaluated the proportion of each of our three racial-ethnic groups who indicated being employed in March 2020 when the pandemic began (N=3,140), and subsequently experienced a COVID-19-related job disruption. We evaluated differences in job disruption by race-ethnicity, conducting bivariate chi-square tests and comparing each racial-ethnic pair to all others.

To address our second hypothesis, we included only those individuals who reported a job disruption (N=1,262) and evaluated the reasons for the job disruption using individual logistic regression models, predicting odds of experiencing each reason for disruption for each racial-ethnic group. Using nested-models, we calculated the odds of employment disruption by racial-ethnic group, first without statistical controls and then with statistical controls. We calculated marginal effects for the predicted proportion, indicating each reason for job disruption, net of all controls. We present the results as a percentage in each racial-ethnic group predicted to have experienced each reason for

job disruption. Marginal difference tests were used to evaluate statistical differences across each group.

To address our third hypothesis, among those who experienced a job disruption (N=1,262), we evaluated whether they experienced post-COVID-19 financial precarity. Here we used nested logistic regression models to estimate the odds of reporting 1+ precarities and each of the individual financial precarities by racial-ethnic group, with and without statistical controls. We used OLS regression for the models predicting total number of precarities. We calculated marginal effects for the predicted proportion/total number for each post-COVID-19 financial precarity measure, net of all controls. We present the results as a percentage of each racial-ethnic group predicted to have experienced each precarity for dichotomous measures. Marginal difference tests were used to evaluate statistical differences across each group.

Finally, to address our fourth hypothesis, we look at individuals who had data on pre-COVID-19 financial precarity (N=954), evaluating the direct effects by racial-ethnic group net of all control factors. This allows us to examine whether racial-ethnic differences in post-COVID-19 financial precarity outcomes persist when accounting for pre-COVID-19 financial strain. We then evaluate the interaction between racial-ethnic group and pre-COVID-19 financial strain to determine if racial-ethnic differences in post-COVID-19 financial precarity are dependent on pre-COVID-19 financial precarity. In all models, we calculate the significance of the combined interaction between racial-ethnicity category and pre-COVID-19 financial strain using a post-estimation test that accounts for the direct effects of each measure: We hold the alternative measure at 0 or in association with the referent group and the calculated interaction between each

measure relative to the interaction effect for the referent group (i.e., non-Hispanic whites). Specifically, we used a post-estimation command in Stata called "*testparm*" that presents results based on an F-test of the interaction between the two measures. Finally, to more carefully evaluate within and across group differences, we calculate marginal-effect predictions associated with the proportion for each/total number of post-COVID-19 precarities by race-ethnicity and pre-COVID-19 financial precarity. We use difference tests to evaluate differences by pre-COVID-19 financial precarity within and across racial-ethnic groups. Standard errors in all regression models are robust.

Results

To address our first study hypothesis, we evaluated whether there were racial-ethnic differences in experiencing a COVID-19-related job disruption. Results in Table 1 show that non-Hispanic white older workers were significantly less likely to experience a COVID-19-related job disruption than non-Hispanic Black and Hispanic older workers. Non-Hispanic Black and Hispanic older workers were similarly likely to experience a job-related disruption.

Before evaluating our subsequent study hypotheses, we first evaluated the characteristics of our study sample, including differences across racial-ethnic groups for our primary variables of interest and for all controls (using *t*-tests for continuous measures and chi-square tests for categorical measures). Overall, in Table 2, we observe that non-Hispanic white older workers reported a lower proportion who stopped work due to illness and a higher proportion who stopped work due to retirement than their non-Hispanic Black and Hispanic counterparts. Non-Hispanic white older workers were also significantly less likely to experience each of the post-COVID-19 financial

precarities and had a lower overall number of precarities relative to their non-Hispanic Black and Hispanic counterparts. Of particular note, while 54% of non-Hispanic Black and 45% of Hispanic older workers reported at least one precarity, only 18% of non-Hispanic white older workers reported at least one precarity. We also observed a higher proportion of non-Hispanic Black older workers reporting pre-COVID-19 financial strain relative to their non-Hispanic white counterparts (39% versus 25%).

To address our second study hypothesis, Table 3 shows individual logistic regression models evaluating the reasons for job disruptions by racial-ethnic group, net of controls. Results indicate that accounting for all other factors, there was only one significant factor predicting differences in the reasons for job disruption by racial-ethnic group. Specifically, non-Hispanic Black older workers had 70% higher odds of leaving work due to illness than their non-Hispanic white counterparts ($p<0.05$). The predicted percentage by racial-ethnic group is shown in Figure 1. Marginal difference tests show that non-Hispanic Blacks (16%) had a greater probability of stopping work due to illness compared to both their non-Hispanic white (10%) and Hispanic (13%) counterparts ($p<0.05$).

To address our third study hypothesis, we evaluated post-COVID-19 financial precarities by racial-ethnic group, shown in Table 4. In Table 4, Model 1 presents findings for each financial precarity measure without controls and Model 2 includes controls. Our full models with controls (Table 4, Model 2) indicate that non-Hispanic Black older workers had 2.34 to 4.06 times the odds of experiencing each of the financial precarities and reported experiencing a higher total number of precarities relative to their white Counterparts ($p<0.001$). Similar results were shown for Hispanics,

but only regarding 1+ precarities (twice the odds; $p<0.01$) and overall numbers of precarities relative to their white Counterparts ($p<0.05$). Predicted probabilities for all individual dichotomous outcomes and subsequent racial differences for each are shown in Figure 2. Specifically, marginal difference tests show that non-Hispanic Black older workers had a greater probability of reporting each of the post-COVID-19 financial precarities compared to their non-Hispanic white counterparts ($p<0.001$) and Hispanic older adults had a greater probability of not having enough money to buy food compared to their non-Hispanic white counterparts ($p<0.05$). Furthermore, marginal difference tests between non-Hispanic Black older workers and Hispanic older workers show that non-Hispanic Black older workers had a greater probability of missing regular payments on credit cards or other debt, missing payments on utilities or insurance, and not having enough money to buy food compared to their Hispanic counterparts ($p<0.05$, $p<0.001$, and $p<0.01$, respectively). Additional marginal difference tests evaluating racial-ethnic differences for 1+ post-COVID-19 financial precarities and total number of post-COVID-19 financial precarities can be found in Appendix 1 and Appendix 2, respectively.

To address our fourth and final study hypothesis, we evaluated post-COVID-19 financial precarity by racial-ethnic group among those with data on pre-COVID-19 financial strain. Results are provided in Table 5. In Table 5, Model 1 presents findings for each financial precarity measure without the inclusion of the interaction between racial-ethnic category and pre-COVID-19 financial strain, whereas Model 2 accounts for the interaction between racial-ethnic category and pre-COVID-19 financial strain. In all models that include the interaction, we calculate the significance of the combined

interaction between racial-ethnic category and pre-COVID-19 financial strain using post-estimation tests that account for each measure's direct effects, holding the alternative measure at 0 or in association with the referent group, and the calculated interaction between each measure relative to the interaction effect for the referent group (i.e., non-Hispanic whites). Specifically, based on post-estimation tests of the significance of the combined direct and interactive effects between race-ethnicity and pre-COVID-19 precarity, we conclude that the association between pre- and post-COVID-19 financial precarity is dependent on racial-ethnic category and statistically significant at the $p<0.01$ level in all models.

To evaluate these findings more carefully, we calculated marginal effects for each race and ethnicity group and pre-COVID-19 financial strain status based on our interaction models. We also evaluated within-group and across-group differences. To further compare the general racial disparities in post-pandemic financial precarity with and without pre-COVID-19 financial precarity, we plotted the occurrence of having one or more financial precarities (Figure 3) and the total number of financial precarities (Figure 4) across racial-ethnic groups. Within group differences in Figure 3 show that non-Hispanic white older workers with pre-COVID-19 financial strain had a higher probability of having one or more post-COVID-19 financial precarities when compared to non-Hispanic white older workers without pre-COVID-19 financial strain ($p<0.001$). Moreover, non-Hispanic Black older workers with pre-COVID-19 financial strain had a higher probability of reporting one or more post-COVID-19 financial precarities when compared to non-Hispanic Black older workers without pre-COVID-19 financial strain ($p<0.05$). Examination of racial-ethnic differences across groups show that both non-

Hispanic Black older workers and Hispanic older workers without pre-COVID-19 financial strain had a higher probability of reporting one or more-post-COVID-19 financial precarities when compared to non-Hispanic white older workers without pre-COVID-19 financial strain ($p<0.001$ and $p<0.01$, respectively). Furthermore, non-Hispanic Black older workers with pre-COVID-19 financial strain had a higher probability of reporting one or more post-COVID-19 financial precarities compared to non-Hispanic white older workers with pre-COVID-19 financial strain ($p<0.01$).

Similarly, within group differences in Figure 4 show that non-Hispanic white older workers with pre-COVID-19 financial strain had a higher predicted total number of post-COVID-19 financial precarities compared to non-Hispanic white older workers without pre-COVID-19 financial strain ($p<0.001$). Non-Hispanic Black older workers with pre-COVID-19 financial strain also had a higher predicted total number of post-COVID-19 financial precarities compared to non-Hispanic Black older workers without pre-COVID-19 financial strain ($p<0.05$). When examining differences across racial-ethnic groups, findings in Figure 4 show that non-Hispanic Black and Hispanic older workers without pre-COVID-19 financial strain had a higher predicted total number of post-COVID-19 financial precarities compared to non-Hispanic white older workers without pre-COVID-19 financial strain ($p<0.001$ and $p<0.05$, respectively). Moreover, among older workers with pre-COVID-19 financial strain, non-Hispanic Black older workers had a higher predicted total number of post-COVID-19 financial precarities compared to both non-Hispanic white and Hispanic older workers ($p<0.001$ and $p<0.05$, respectively). Additional marginal difference tests evaluating racial-ethnic differences by post-COVID-19 financial precarity type can be found in the Appendix (Appendix 3 to Appendix 7).

Importantly, findings presented in Figure 3 also show that non-Hispanic Black older workers *without* pre-COVID-19 financial strain had a similar probability of reporting one or more post-COVID-19 financial precarities as non-Hispanic white older workers *with* pre-COVID-19 financial strain. Additionally, Figure 4 shows that non-Hispanic Black older workers *without* pre-COVID-19 financial strain had a similar probability of reporting the same total number of post-COVID-19 financial precarities as non-Hispanic white older workers *with* pre-COVID-19 financial strain..

Discussion

Overall, this study found support for all four hypotheses. Supporting our first hypothesis, we found that non-Hispanic Black and Hispanic older workers have higher rates of experiencing pandemic-related job disruptions than their non-Hispanic white counterparts. Our second hypothesis was partially supported. Only non-Hispanic Black older workers were more likely to have stopped work due to illness than their non-Hispanic white counterparts. Providing support for our third hypothesis, we found that among people who stopped working during COVID-19, non-Hispanic Black older workers experienced more post-COVID-19 financial consequences on all measures of financial precarity compared with their non-Hispanic white counterparts. Similarly, although the difference between non-Hispanic white and Hispanic older workers on specific financial precarities (i.e., missing rent/mortgage, missing insurance payment, missing medical bills, not being able to afford to buy food) was not significant, Hispanic older workers still had higher odds of experiencing post-COVID-19 financial precarity and experienced more total post-COVID-19 financial precarities on average than non-Hispanic white older workers. Regarding our fourth hypothesis, based on moderation

analyses, we determined that the association between pre-COVID-19 financial precarity status and post-COVID-19 financial precarity outcomes was dependent on race and ethnicity. Specifically, even though pre-COVID-19 precarity was associated with post-COVID-19 precarity for all racial-ethnic groups, non-Hispanic whites without pre-COVID-19 precarity were protected from post-COVID-19 precarity, whereas Black and Hispanic workers were still likely to experience relatively high rates of post-COVID-19 precarity regardless of their pre-COVID-19 precarity status.

Our findings on the employment impact of COVID-19 among minoritized workers are largely consistent with the existing literature showing that older Black and Hispanic workers had higher rates of job disruptions during COVID-19 compared with their white counterparts (Fairlie et al. 2020; Hardy et al. 2021; Jason et al. 2023a, 2023b). For example, using data from the 2020 COVID-19-panel in HRS, one study found that Hispanic and non-Hispanic Black older adults reported more job losses and financial hardships than their white counterparts during the pandemic (Jason et al. 2023a). Previous studies using Current Population Survey (CPS) data conducted at the onset of COVID-19 through April 2020 also suggested that unemployment rates were higher among Hispanic versus Black workers due to a higher representation of Hispanic workers in lower-skilled occupations (Fairlie et al. 2020). Scholars suggested that a favorable industry distribution among Black workers might have protected them from the employment impact at the onset of COVID-19 (Fairlie et al. 2020). In contrast, the current study suggested that although both Black and Hispanic older workers experienced more post-COVID-19 financial consequences compared with their white counterparts, Black older workers had more financial precarity than their Hispanic

counterparts. Consistent with existing studies on minoritized workers (e.g., Hugo Lopez et al. 2020; Jason et al. 2023a, 2023b), the current study identified the financial vulnerabilities among Black older workers in the United States. This discrepancy is likely because different groups of minoritized workers experienced the employment impact at different times during COVID-19 (Hardy et al., 2021). Although Hispanic workers' employment was more affected at the start of the pandemic due to their over-representation in lower-skilled industries (Fairlie et al. 2020), Black workers became the group with the highest unemployment rate among all racial groups since July 2020 (Hardy and Logan 2021).

As one of the first quantitative studies on the financial impact of COVID-19 on minoritized older workers in the U.S., our results highlight disproportionate COVID-19-related financial precarity among Black and Hispanic older workers. Although COVID-19 has been referred to as a disease that transcends wealth and prestige (Mein 2020), this study suggests that the pandemic exacerbated the existing socioeconomic inequalities across racial-ethnic groups, consistent with studies that identified inequity along the racial-ethnic and native-migrant lines in the United Kingdom (Hu et al. 2020; Platt and Warwick 2020). Furthermore, this study identifies a positive association between pre- and post-pandemic financial precarity among minoritized older workers. The Economic Impact payment (EIP) does not seem to have eliminated the disproportionate financial precarity among minoritized older workers during COVID-19, although more studies on EIP are warranted. Note that this study initially included the receipt of EIP in 2021, but the vast majority (>70%) of the sample received an EIP payment, which may explain

why it was not a significant predictor of post-COVID-19 financial precarity. Consequently, we did not include receipt of EIP payment in our final models.

Limitations

Our findings have several limitations. This study only reflects one year of COVID-19-related job disruptions and the associated financial precarity. Future data on employment and financial precarity can further advance our understanding of the long-term employment and financial impact of COVID-19 on minoritized older workers. Although bivariate analysis suggests that Hispanic older workers lived in larger households than Black older workers, it is unclear how much older workers exchanged financial help with other household members during and after COVID-19 and whether financial exchange among family members might have contributed to the differences in post-COVID-19 financial precarity across racial and ethnic groups. Moreover, because there is limited information on which industries and occupations employ workers in this study (e.g., essential sectors, service industries), it is also unclear how occupational distribution and workplace culture (Jason et al. 2023a, 2023b) among white, Hispanic, and Black workers might have contributed to job disruptions and post-COVID-19 financial precarity across racial-ethnic groups. Additionally, this study provides limited information on the within-group heterogeneity among Black and Hispanic workers.

Conclusion

Our findings indicate that even when accounting for pre-COVID-19 financial precarity, Black and Hispanic older workers still experienced higher levels of post-COVID-19 financial precarity compared with their white counterparts. The finding that

pre-COVID-19 financial precarity significantly predicted post-COVID-19 financial precarity among minoritized workers further suggests that the cumulative inequities minoritized workers experienced were likely heightened by the pandemic (Fairlie et al. 2020; Hardy et al. 2021). The COVID-19 financial impact payment does not seem to have offset the higher post-COVID-19 financial precarity Black and Hispanic older workers experienced. Future studies could help determine the appropriate amount of financial stimulation for historically marginalized populations/industries and what additional policies could support their ongoing economic recovery.

Future studies identifying multilevel factors at the societal-, organizational-, interpersonal-, and household- level that might reinforce or alleviate the financial vulnerability of minoritized older workers during crises would be useful. In addition to the EIP during COVID-19, consistent reinforcement of equity-oriented employment and financial policies could address cumulative disadvantage among minoritized older adults. Results on the specific types of financial setbacks also indicate that enhancing general financial support might address the overall financial precarity Hispanic populations experience during crises such as COVID-19, whereas flexible housing, food, medical, and insurance policies might target the multifaceted financial precarity Black older workers experience.

Furthermore, this study complements existing studies on the disproportionate financial impact of COVID-19 on minoritized workers across the life course, highlighting the employment and financial impact COVID-19 exerted on minoritized older workers, who face more barriers to re-entering the labor market than their younger counterparts due to ageism in the labor market (Apriceno et al. 2021). Future studies examining the

factors that uniquely impact the financial well-being of minoritized older workers could also be useful. Because the federal declaration of COVID-19 as a Public Health Emergency ended on May 11, 2023 (U.S. Department of the Treasury 2023), future studies could continue to examine the long-term economic impact of COVID-19 and the ongoing economic recovery of minoritized communities as the policy support (e.g., support for small businesses, emergency rental assistance program) gradually comes to an end (U.S. Department of the Treasury 2023).

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Tables and figures

Table 1: Proportion of workers who stopped work for any reason, by race/ethnicity

	Proportion	Sample Size
All	0.42	3,140
NH white	0.39 [b,h]	2,014
NH Black	0.45	640
Hispanic	0.48	486

Note: [b] indicates statistically significant difference relative to non-Hispanic Black older workers; [h] indicates statistically significant difference relative to Hispanic older workers. Statistical difference is determined by chi-square test, $p<0.05$.

Table 2: Sample characteristics by race/ethnicity

	All (N=1262)		NH White (N=774)		NH Black (N=272)		Hispanic (N=216)			
	Mean	**SD**	**Mean**	**SD**	**Mean**	**SD**	**Mean**	**SD**	**Min**	**Max**
Race/Ethnicity Category										
Non-Hispanic white	0.61	0.49							0	1
Non-Hispanic Black	0.22	0.41							0	1
Hispanic	0.17	0.38							0	1
Employment Disruption Reasons										
Laid Off Permanently	0.12		0.11		0.13		0.12		0	1
Laid Off Temporarily	0.28		0.28		0.29		0.25		0	1
Stopped Work Due to Illness	0.12		0.09 [b,h]		0.17		0.16		0	1
Stopped Work - Caregiving	0.05		0.05		0.05		0.04		0	1
Retired	0.14		0.16 [b,h]		0.10		0.1		0	1
Post-COVID-19 Financial Precarity										
1+ Precarities	0.31		0.18 [b,h]		0.54 [h]		0.45		0	1
Missed Rent/Mortgage	0.11		0.06 [b,h]		0.21		0.17		0	1
Missed Credit/Debt Payment	0.15		0.08 [b,h]		0.32 [h]		0.22		0	1
Missed Utility/Insurance Payment	0.13		0.07 [b,h]		0.28 [h]		0.17		0	1
Could Not Afford Medical Bill	0.19		0.11 [b,h]		0.35 [h]		0.25		0	1
Could not Buy Food	0.16		0.09 [b,h]		0.28		0.25		0	1
Total Number of Precarities	0.74	1.38	0.41 [b,h]	1.06	1.45 [h]	1.75	1.06	1.48	0	5
Pre-COVID-19 Financial Precarity										
Financial Strain	0.28		0.25 [b]		0.39		0.30		0	1
Demographic & Control Factors										
US Born	0.85		0.97 [h]		0.94 [h]		0.33		0	1
Self-Employed Pre-COVID-19	0.23		0.24		0.19		0.2		0	1
Female	0.58		0.57		0.63		0.54		0	1
Age	62.18	7.08	62.92 [b,h]	7.42	61.51 [h]	6.52	60.35	6.02	51	88
Number Living in Household	2.4	1.26	2.24 [h]	1.06	2.39 [h]	1.43	2.96	1.51	1	9
Geographic Location										
North/Northeast	0.15		0.15 [h]		0.17 [h]		0.1		0	1
Midwest	0.23		0.28 [b,h]		0.20 [h]		0.08		0	1
South	0.38		0.32 [b,h]		0.54 [h]		0.42		0	1
West	0.24		0.25 [b,h]		0.09 [h]		0.41		0	1
Poverty Ratio	6.26	9.34	7.84 [b,h]	11.26	4.25 [h]	4.28	3.11	2.92	0	193.3
Years of Education	13.71	2.9	14.24 [b,h]	2.47	13.76 [h]	2.41	11.79	3.92	0	17
Pre-COVID-19 Self-Rated Health	3.38	0.92	3.5 [b,h]	0.89	3.17	0.86	3.19	1.01	1	5
Pre-COVID-19 # Depressive Sym	1.23	1.89	1.07 [b,h]	1.77	1.49	1.91	1.49	2.18	0	8

Note: [b] indicates statistically significant difference relative to non-Hispanic Black older workers; [h] indicates statistically significant difference relative to Hispanic older workers. Statistical difference is determined by chi-square test for dichotomous measures, and *t*-tests were used to evaluate continuous measures ($p<0.05$). Proportions reporting pre-COVID-19 financial strain are based on only those who responded to this question, including N=622 non-Hispanic whites, N=181 non-Hispanic Blacks, and N=151 Hispanics.

Table 3: Individual logistic regression models predicting stopping work and specific reasons for stopping work

	Laid Off Permanently	Laid Off Temporarily	Illness	Caregiving	Retired
Race/Ethnicity Category					
Non-Hispanic Black	1.118	1.013	1.696*	0.978	0.670+
	(0.252)	(0.174)	(0.365)	(0.318)	(0.162)
Hispanic	0.884	0.947	1.284	1.286	0.863
	(0.302)	(0.248)	(0.388)	(0.570)	(0.277)
Demographic & Control Factors					
US Born	0.821	1.369	0.860	1.915	1.445
	(0.270)	(0.381)	(0.259)	(0.905)	(0.503)
Self-Employed Pre-COVID-19	0.451**	0.345***	0.985	2.229**	0.620*
	(0.123)	(0.0659)	(0.217)	(0.646)	(0.136)
Female	0.713+	1.115	0.888	1.936*	0.859
	(0.129)	(0.148)	(0.158)	(0.626)	(0.148)
Age	0.951**	0.984	0.980	1.007	1.060***
	(0.0158)	(0.00973)	(0.0151)	(0.0214)	(0.0105)
Number Living in Household	1.034	0.895+	1.120+	1.130	1.017
	(0.0732)	(0.0516)	(0.0686)	(0.0998)	(0.0724)
Geographic Location[a]					
Midwest	0.641	1.046	0.991	0.892	0.951
	(0.191)	(0.215)	(0.294)	(0.381)	(0.278)
South	0.825	0.664*	0.926	0.838	1.282
	(0.219)	(0.129)	(0.248)	(0.327)	(0.334)
West	0.843	0.720	0.850	0.475	1.253
	(0.243)	(0.154)	(0.257)	(0.226)	(0.346)
Poverty Ratio	0.989	0.978*	0.999	0.955	1.019**
	(0.00992)	(0.0110)	(0.00962)	(0.0337)	(0.00598)
Years of Education	1.042	0.952*	0.956	1.104	1.016
	(0.0339)	(0.0225)	(0.0263)	(0.0687)	(0.0375)
Pre-COVID-19 Self-Rated Health	1.147	1.030	0.840+	1.151	0.972
	(0.120)	(0.0802)	(0.0853)	(0.209)	(0.106)
Pre-COVID-19 # Depressive Symptoms	1.078	0.908*	1.042	1.133*	0.916
	(0.0514)	(0.0363)	(0.0498)	(0.0720)	(0.0532)
Constant	1.782	3.338	1.217	0.00135***	0.00269***
	(2.156)	(2.754)	(1.364)	(0.00241)	(0.00276)

Note: *N*=1,262. Results provided are odds ratios. Robust standard errors are provided in parentheses. Statistical significance indicates: *** $p<0.001$; ** $p<0.01$; * $p<0.05$; + $p<0.1$.[a] reference group is North/Northeast.

Table 4: Regression models predicting post-COVID-19 financial precarity outcomes (N=1,262)

	1+ Precarities		Missed Rent/Mortgage		Missed Credit/Debt Payment		Missed Utility/Insurance Payment	
	Model 1	**Model 2**	**Model 1**	**Model 2**	**Model 1**	**Model 2**	**Model 1**	**Model 2**
Race/ Ethnicity Category[b]								
Non-Hispanic Black	5.424***	4.057***	4.473***	3.131***	5.303***	3.481***	5.349***	3.786***
	(0.833)	(0.692)	(0.959)	(0.803)	(0.986)	(0.716)	(1.048)	(0.860)
Hispanic	3.133***	2.010**	2.917***	1.729	3.066***	1.739+	2.467**	1.323
	(0.683)	(0.509)	(0.904)	(0.631)	(0.840)	(0.541)	(0.760)	(0.476)
Demographic & Control Factors								
US Born	0.739	0.782	0.779	0.844	0.938	1.072	0.816	0.953
	(0.164)	(0.192)	(0.237)	(0.279)	(0.257)	(0.322)	(0.247)	(0.324)
Self-Employed Pre-COVID-19		0.972		1.249		1.062		1.010
		(0.170)		(0.301)		(0.231)		(0.239)
Female		1.013		0.915		0.920		1.000
		(0.146)		(0.194)		(0.165)		(0.192)
Age		0.975*		0.955**		0.963**		0.952**
		(0.0103)		(0.0165)		(0.0141)		(0.0146)
Number Living in Household		1.146*		1.134+		1.192**		1.206**
		(0.0636)		(0.0805)		(0.0742)		(0.0818)
Geographic Location[a]								
Midwest		1.516+		1.113		1.049		1.196
		(0.357)		(0.377)		(0.310)		(0.374)
South		1.484+		1.256		1.269		0.949
		(0.317)		(0.364)		(0.329)		(0.269)
West		1.052		1.052		0.906		1.070
		(0.254)		(0.338)		(0.272)		(0.337)
Poverty Ratio		0.923		0.916		0.836***		0.865*
		(0.0487)		(0.0862)		(0.0313)		(0.0632)
Years of Education		0.980		0.991		1.028		0.986
		(0.0266)		(0.0346)		(0.0306)		(0.0320)
Pre-COVID-19 Self-Rated Health		0.774**		0.754*		0.900		0.804*
		(0.0684)		(0.0917)		(0.0945)		(0.0871)
Pre-COVID-19 # Depressive Sym		1.204***		1.084+		1.111*		1.136**
		(0.0449)		(0.0528)		(0.0489)		(0.0505)
Constant	0.293***	3.099	0.0767***	3.416	0.0926***	1.206	0.0894***	4.421
	(0.0679)	(2.599)	(0.0250)	(4.379)	(0.0273)	(1.348)	(0.0289)	(4.960)

Note: N=1,262. Results provided are odds ratios. Robust standard errors are provided in parentheses. Statistical significance indicates: *** $p<0.001$; ** $p<0.01$; * $p<0.05$; + $p<0.1$. [a] reference group is North/Northeast. [b] reference group is non-Hispanic white.

Table 4: Regression models predicting post-COVID-19 financial precarity outcomes (N=1,262) (cont.)

	Could Not Afford Medical Bill		Could not Buy Food		Total Number of Precarities	
	Model 1	Model 2	Model 1	Model 2	Model 1	Model 2
Race/Ethnicity Category						
Non-Hispanic Black	4.412***	3.209***	3.885***	2.342***	1.039***	0.826***
	(0.757)	(0.643)	(0.713)	(0.478)	(0.113)	(0.116)
Hispanic	2.467***	1.569	2.703***	1.446	0.564***	0.300*
	(0.618)	(0.486)	(0.770)	(0.476)	(0.138)	(0.140)
Demographic & Control Factors						
US Born	0.902	0.988	0.734	0.781	-0.134	-0.0756
	(0.229)	(0.294)	(0.209)	(0.263)	(0.149)	(0.144)
Self-Employed Pre-COVID-19		0.841		1.063		0.0474
		(0.172)		(0.221)		(0.0848)
Female		1.093		1.051		0.0330
		(0.184)		(0.188)		(0.0731)
Age		0.964**		0.983		-0.0175***
		(0.0119)		(0.0126)		(0.00482)
Number Living in Household		1.146*		1.017		0.0855*
		(0.0728)		(0.0622)		(0.0346)
Geographic Location[A]						
Midwest		2.118**		1.039		0.124
		(0.605)		(0.309)		(0.113)
South		1.951**		1.109		0.133
		(0.505)		(0.291)		(0.111)
West		1.159		0.667		-0.0531
		(0.347)		(0.208)		(0.108)
Poverty Ratio		0.945		0.814***		-0.0126**
		(0.0574)		(0.0388)		(0.00450)
Years of Education		0.954		0.960		-0.0286*
		(0.0275)		(0.0287)		(0.0142)
Pre-COVID-19 Self-Rated Health		0.718***		0.809+		-0.155***
		(0.0688)		(0.0885)		(0.0416)
Pre-COVID-19 # Depressive Sym		1.110*		1.143**		0.0937***
		(0.0456)		(0.0486)		(0.0223)
Constant	0.136***	3.773	0.136***	3.107	0.536***	2.243***
	(0.0368)	(3.667)	(0.0414)	(3.132)	(0.150)	(0.447)

Note: N=1,262. Results provided are odds ratios, except for total precarities, which includes coefficients based on OLS regression. Robust standard errors are provided in parentheses. Statistical significance indicates: *** $p<0.001$; ** $p<0.01$; * $p<0.05$; + $p<0.1$. [A] Referent group is North/Northeast.

Table 5: Regression models predicting post-COVID-19 precarities by race/ethnicity and pre-COVID-19 precarity status (N=952)

	1+ Precarities		Missed Rent/Mortgage		Missed Credit/Debt Payment		Missed Utility/Insurance Payment	
	Model 1	**Model 2**	**Model 1**	**Model 2**	**Model 1**	**Model 2**	**Model 1**	**Model 2**
Race/ Ethnicity Category								
Non-Hispanic Black	4.554***	1.884***	3.922***	1.484**	3.853***	1.866***	4.536***	2.298***
	(0.982)	(0.273)	(1.274)	(0.506)	(1.008)	(0.371)	(1.359)	(0.420)
Hispanic	2.434**	1.338***	2.138+	1.274*	1.553	0.944+	1.981	1.526**
	(0.786)	(0.374)	(0.975)	(0.570)	(0.610)	(0.491)	(0.932)	(0.544)
Pre-COVID-19 Financial Precarity								
Financial Strain	3.268***	1.638***	2.988***	1.443**	2.415***	1.459***	1.929*	1.601***
	(0.625)	(0.257)	(0.844)	(0.472)	(0.584)	(0.368)	(0.513)	(0.413)
NH Black X Financial Strain		-0.862*		-0.191		-0.998+		-1.445**
		(0.424)		(0.614)		(0.513)		(0.555)
Hispanic X Financial Strain		-1.019*		-0.975		-0.883		-1.473*
		(0.457)		(0.664)		(0.561)		(0.637)
Demographic & Control Factors								
US Born	0.757	-0.232	0.790	-0.220	0.853	-0.116	0.942	-0.00371
	(0.242)	(0.310)	(0.338)	(0.422)	(0.320)	(0.374)	(0.416)	(0.430)
Self-Employed Pre-COVID-19	0.976	-0.0395	1.303	0.265	1.077	0.0761	0.835	-0.170
	(0.214)	(0.218)	(0.424)	(0.324)	(0.299)	(0.276)	(0.276)	(0.322)
Female	0.989	0.000104	0.918	-0.0993	0.961	-0.00734	1.076	0.109
	(0.177)	(0.180)	(0.254)	(0.274)	(0.221)	(0.227)	(0.268)	(0.247)
Age	0.996	-0.00297	0.965+	-0.0352+	0.977	-0.0218	0.967+	-0.0320+
	(0.0128)	(0.0130)	(0.0204)	(0.0211)	(0.0173)	(0.0177)	(0.0189)	(0.0194)

Number Living in Household	1.188*	0.168*	1.345***	0.285**	1.312***	0.269***	1.198*	0.175+
	(0.0863)	(0.0736)	(0.118)	(0.0871)	(0.101)	(0.0789)	(0.108)	(0.0906)
Geographic Location[A]								
Midwest	1.921*	0.623*	1.613	0.463	1.495	0.355	1.366	0.261
	(0.616)	(0.314)	(0.720)	(0.447)	(0.592)	(0.392)	(0.563)	(0.410)
South	1.799*	0.530+	1.690	0.514	1.790+	0.507	1.177	0.0676
	(0.535)	(0.289)	(0.662)	(0.390)	(0.631)	(0.350)	(0.434)	(0.364)
West	1.149	0.0706	1.121	0.0887	1.103	0.0234	0.870	-0.249
	(0.384)	(0.327)	(0.525)	(0.464)	(0.457)	(0.410)	(0.381)	(0.428)
Poverty Ratio	0.958	-0.0413	0.880**	-0.125*	0.895**	-0.107**	0.936	-0.0588
	(0.0433)	(0.0454)	(0.0435)	(0.0494)	(0.0348)	(0.0388)	(0.0761)	(0.0795)
Years of Education	0.993	-0.00372	1.026	0.0276	1.041	0.0425	1.008	0.0122
	(0.0322)	(0.0322)	(0.0461)	(0.0433)	(0.0403)	(0.0379)	(0.0425)	(0.0402)
Pre-COVID-19 Self-Rated Health	0.762*	-0.267*	0.887	-0.114	0.860	-0.154	0.765+	-0.275+
	(0.0851)	(0.111)	(0.141)	(0.158)	(0.121)	(0.140)	(0.109)	(0.141)
Pre-COVID-19 # Depressive Sym	1.166***	0.156***	1.043	0.0479	1.080	0.0775	1.131*	0.125*
	(0.0525)	(0.0443)	(0.0664)	(0.0626)	(0.0614)	(0.0553)	(0.0685)	(0.0583)
Constant	0.255	-1.695+	0.206	-1.859	0.153	-2.339	0.555	-1.307
	(0.259)	(1.030)	(0.331)	(1.614)	(0.221)	(1.442)	(0.831)	(1.502)

Note: N=954. Results provided are odds ratios. Robust standard errors are provided in parentheses. Statistical significance indicates: *** $p<0.001$; ** $p<0.01$; * $p<0.05$; + $p<0.1$. [A] Referent group is North/Northeast.

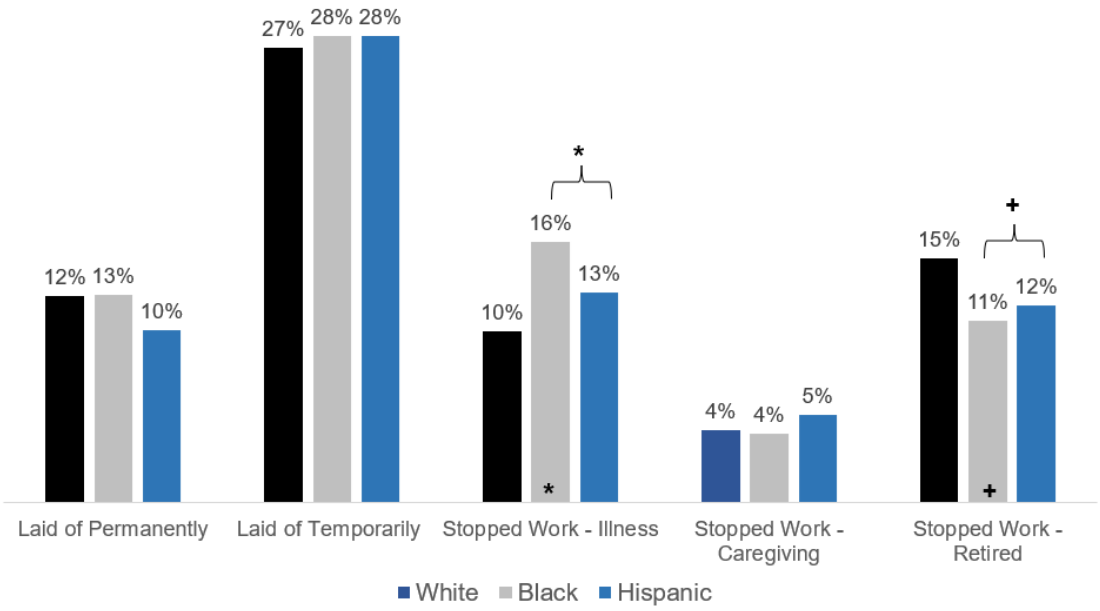
Table 5: Regression models predicting post-COVID-19 precarities by race/ethnicity and pre-COVID-19 precarity status (cont.)

	Could Not Afford Medical Bill		Could not Buy Food		Total Number of Precarities	
	Model 1	**Model 2**	**Model 1**	**Model 2**	**Model 1**	**Model 2**
Race/Ethnicity Category						
Non-Hispanic Black	3.516***	1.236***	3.161***	2.029***	0.764***	0.650***
	(0.906)	(0.369)	(0.780)	(0.375)	(0.128)	(0.134)
Hispanic	1.794	0.905+	1.631	1.547**	0.301*	0.338*
	(0.733)	(0.507)	(0.652)	(0.507)	(0.150)	(0.155)
Pre-COVID-19 Financial Precarity						
Financial Strain	3.179***	1.288***	2.348***	1.916***	0.562***	0.513***
	(0.733)	(0.329)	(0.526)	(0.365)	(0.102)	(0.107)
NH Black X Financial Strain		0.0528		-1.601**		0.308
		(0.493)		(0.502)		(0.287)
Hispanic X Financial Strain		-0.657		-1.975***		-0.128
		(0.535)		(0.560)		(0.273)
Demographic & Control Factors						
US Born	0.769	-0.237	0.679	-0.336	-0.114	-0.117
	(0.301)	(0.383)	(0.292)	(0.409)	(0.160)	(0.159)
Self-Employed Pre-COVID-19	0.904	-0.105	1.117	0.0992	0.0113	0.0121
	(0.246)	(0.270)	(0.284)	(0.253)	(0.0820)	(0.0815)
Female	1.218	0.181	1.066	0.0910	0.0355	0.0246
	(0.267)	(0.219)	(0.237)	(0.222)	(0.0732)	(0.0734)
Age	0.974	-0.0267+	0.999	0.00157	-0.00784	-0.00809+

	(0.0157)	(0.0160)	(0.0152)	(0.0155)	(0.00485)	(0.00481)
Number Living in Household	1.143	0.126	1.089	0.0753	0.0998**	0.0974*
	(0.0987)	(0.0865)	(0.0895)	(0.0846)	(0.0384)	(0.0380)
Geographic Location[A]						
Midwest	3.876**	1.360**	1.555	0.366	0.195+	0.201+
	(1.633)	(0.425)	(0.647)	(0.411)	(0.110)	(0.109)
South	2.948**	1.095**	1.966+	0.572	0.207+	0.222*
	(1.154)	(0.399)	(0.723)	(0.360)	(0.108)	(0.108)
West	1.247	0.215	1.185	0.0313	-0.0330	-0.0233
	(0.578)	(0.467)	(0.504)	(0.418)	(0.101)	(0.100)
Poverty Ratio	0.959	-0.0408	0.874*	-0.131*	-0.00673*	-0.00690*
	(0.0646)	(0.0679)	(0.0479)	(0.0563)	(0.00321)	(0.00320)
Years of Education	0.948	-0.0493	0.952	-0.0391	-0.0168	-0.0165
	(0.0357)	(0.0372)	(0.0356)	(0.0364)	(0.0147)	(0.0146)
Pre-COVID-19 Self-Rated Health	0.655***	-0.419***	0.802	-0.214	-0.124**	-0.122**
	(0.0822)	(0.126)	(0.111)	(0.138)	(0.0432)	(0.0433)
Pre-COVID-19 # Depressive Sym	1.063	0.0661	1.124*	0.120*	0.0669**	0.0684**
	(0.0566)	(0.0526)	(0.0606)	(0.0515)	(0.0243)	(0.0246)
Constant	1.076	-0.0663	0.357	-1.947	1.089*	1.111*
	(1.340)	(1.258)	(0.430)	(1.256)	(0.467)	(0.461)

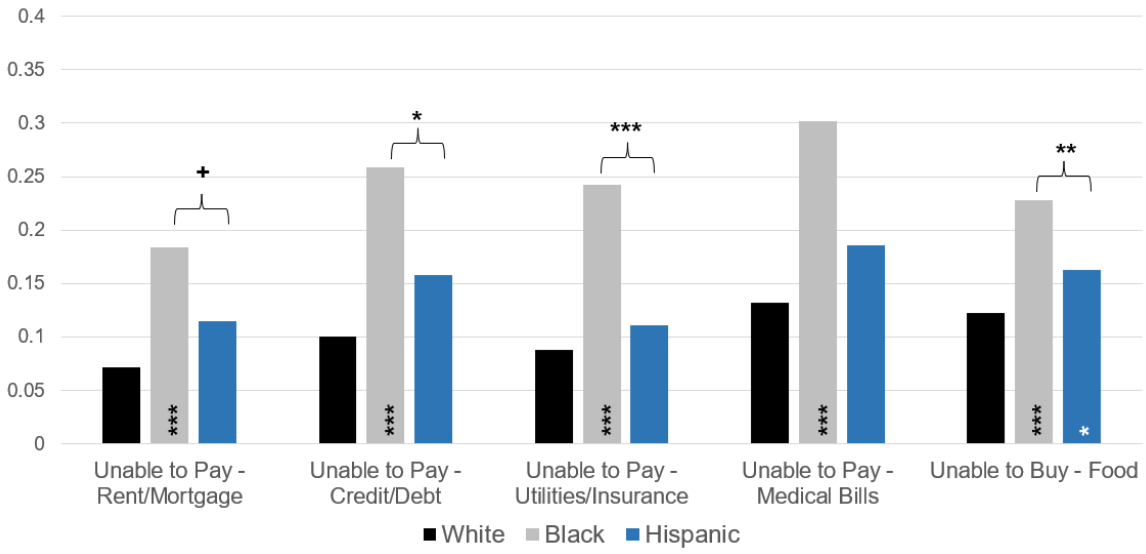
Note: N=954. Results provided are odds ratios, except for total precarities, which includes coefficients based on OLS regression. Robust standard errors are provided in parentheses. Statistical significance indicates: *** p<0.001; ** p<0.01; * p<0.05; + p<0.1. [A] Referent group is North/Northeast.

Figure 1: Predicted probabilities of employment disruption reasons, by race/ethnicity



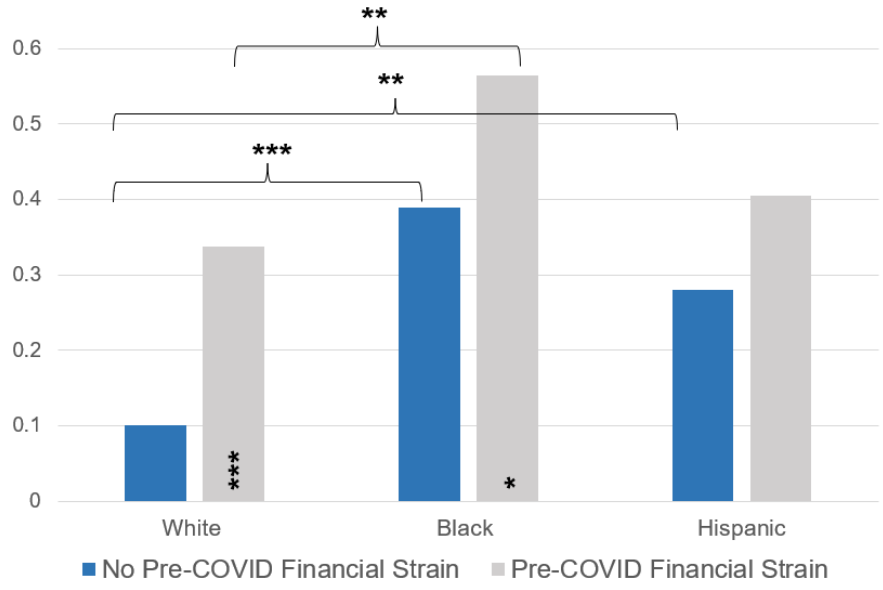
Note: Significance in bar indicates difference relative to white counterparts. Statistical significance indicates: *** $p<0.001$; ** $p<0.01$; * $p<0.05$; + $p<0.1$.

Figure 2: Predicted probabilities of post-COVID-19 financial precarity type, by race/ethnicity



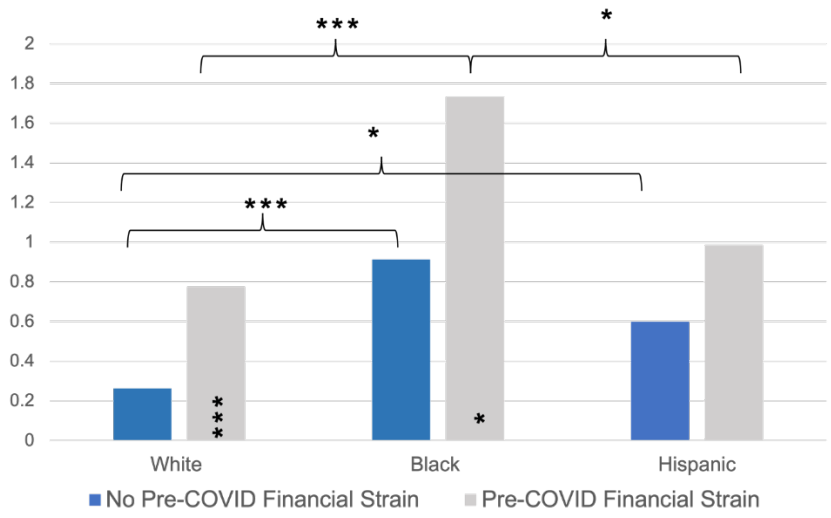
Note: Significance in bar indicates difference relative to white counterparts. Statistical significance indicates: *** $p<0.001$; ** $p<0.01$; * $p<0.05$; + $p<0.1$.

Figure 3. Predicted probabilities for 1+ post-COVID-19 financial precarities by pre-COVID-19 financial strain status, by race/ethnicity



Note: Significance in bar indicates within race/ethnic group difference. Statistical significance indicates: *** $p<0.001$; ** $p<0.01$; * $p<0.05$; + $p<0.1$.

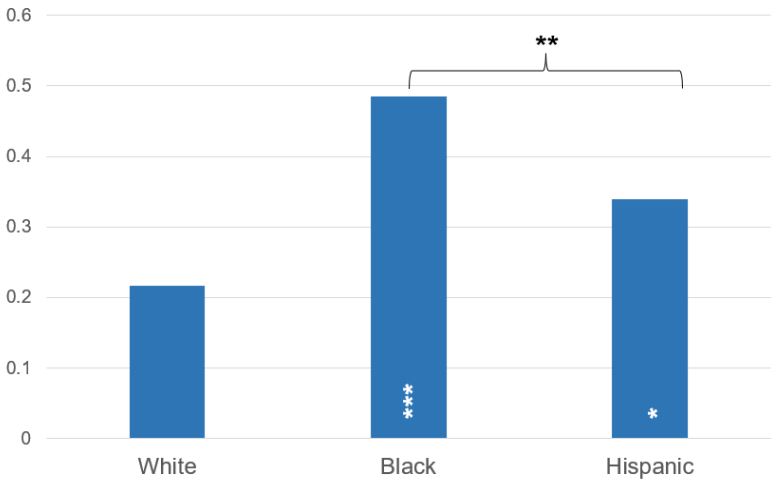
Figure 4. Predicted probabilities for total # of post-COVID-19 financial precarities by pre-COVID-19 financial strain status, by race/ethnicity



Note: Significance in bar indicates within race/ethnic group difference. Statistical significance indicates: *** $p<0.001$; ** $p<0.01$; * $p<0.05$; + $p<0.1$.

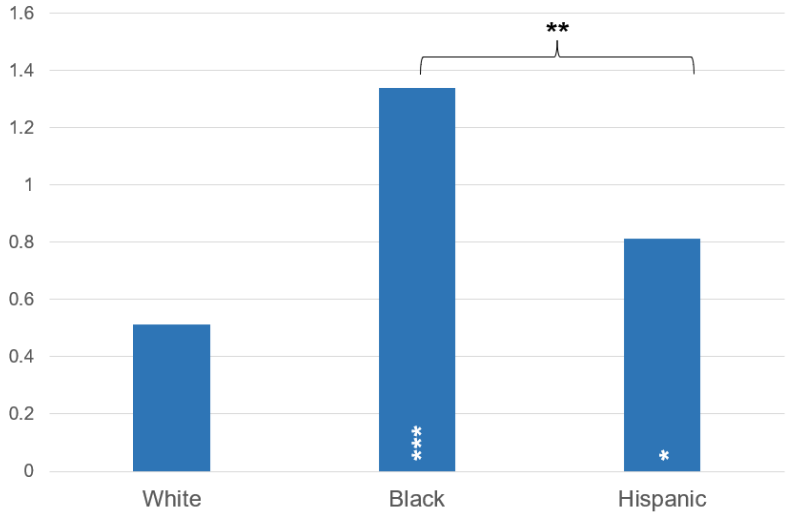
Appendices

Appendix 1. Predicted probabilities for 1+ post-COVID-19 financial precarities, by race/ethnicity



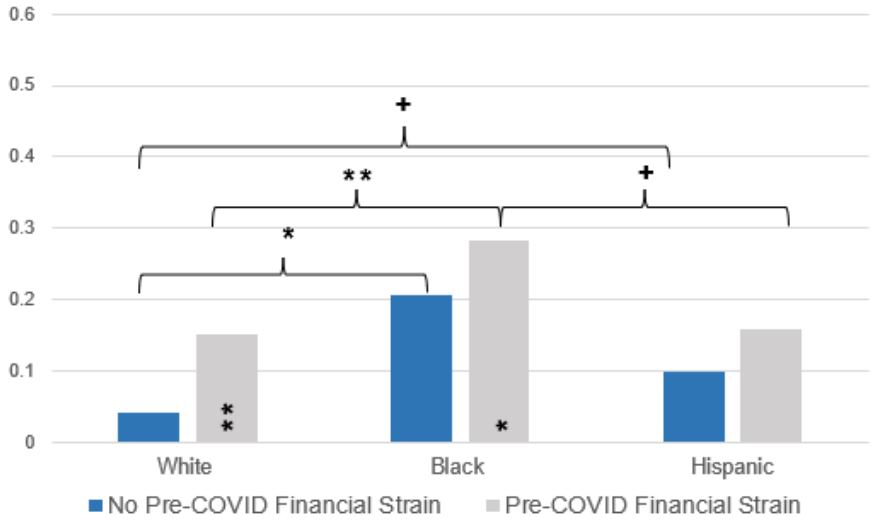
Note: Significance in bar indicates difference relative to white counterparts. Statistical significance indicates: *** $p<0.001$; ** $p<0.01$; * $p<0.05$; + $p<0.1$.

Appendix 2. Predicted probabilities for total # of post-COVID-19 financial precarities, by race/ethnicity



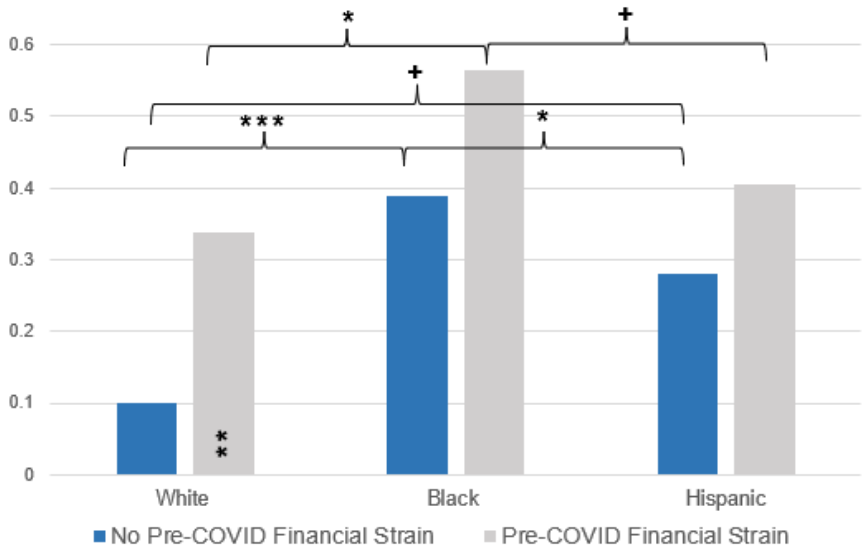
Note: Significance in bar indicates difference relative to white counterparts. Statistical significance indicates: *** $p<0.001$; ** $p<0.01$; * $p<0.05$; + $p<0.1$.

Appendix 3. Predicted probabilities for "rent/mortgage" financial precarity by pre-COVID-19 financial strain status, by race/ethnicity



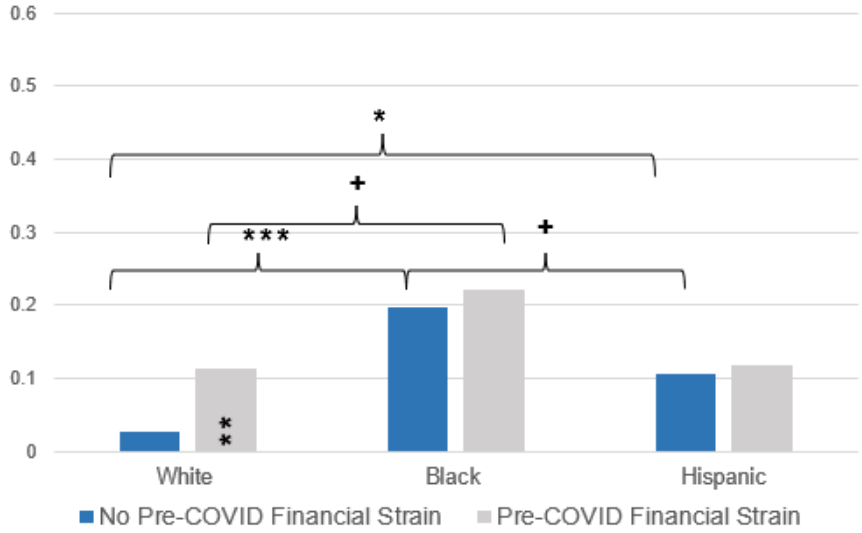
Note: Significance in bar indicates within racial/ethnic group difference. Statistical significance indicates: *** $p<0.001$; ** $p<0.01$; * $p<0.05$; + $p<0.1$.

Appendix 4. Predicted probabilities for "credit/debt" financial precarity by pre-COVID-19 financial strain status, by race/ethnicity



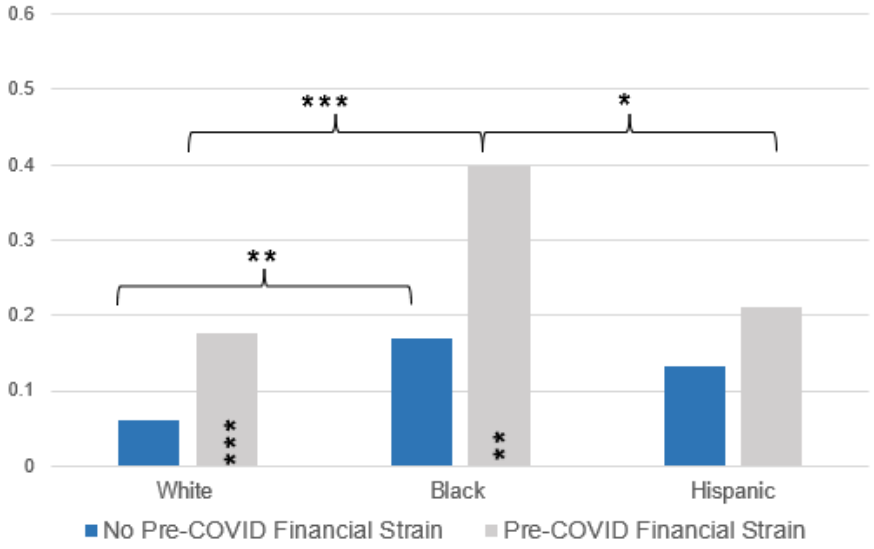
Note: Significance in bar indicates within racial/ethnic group difference. Statistical significance indicates: *** $p<0.001$; ** $p<0.01$; * $p<0.05$; + $p<0.1$.

Appendix 5. Predicted probabilities for "utilities/insurance" financial precarity by pre-COVID-19 financial strain status, by race/ethnicity



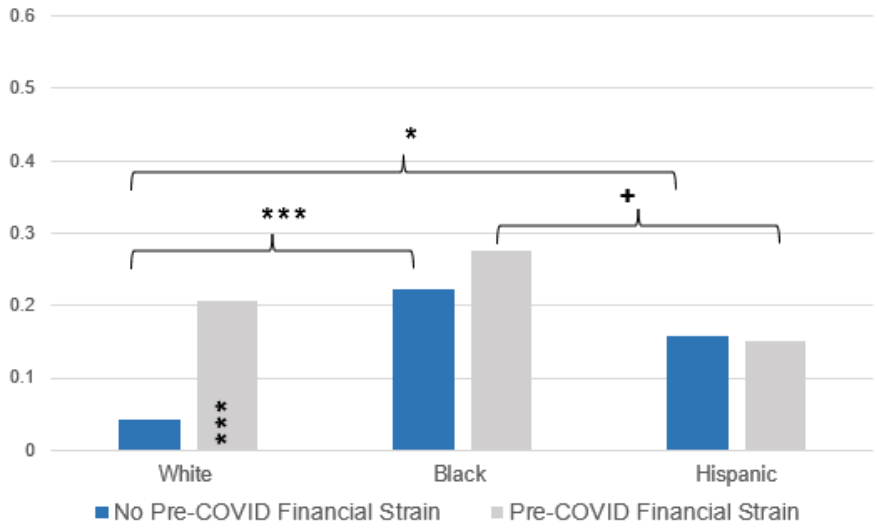
Note: Significance in bar indicates within racial/ethnic group difference. Statistical significance indicates: *** $p<0.001$; ** $p<0.01$; * $p<0.05$; + $p<0.1$.

Appendix 6. Predicted probabilities for "medical bills" financial precarity by pre-COVID-19 financial strain status, by race/ethnicity



Note: Significance in bar indicates within racial/ethnic group difference. Statistical significance indicates: *** $p<0.001$; ** $p<0.01$; * $p<0.05$; + $p<0.1$.

Appendix 7. Predicted probabilities for "food" financial precarity by pre-COVID-19 financial strain status, by race/ethnicity



Note: Significance in bar indicates within racial/ethnic group difference. Statistical significance indicates: *** $p<0.001$; ** $p<0.01$; * $p<0.05$; + $p<0.1$.