

CENTER for RETIREMENT RESEARCH at BOSTON COLLEGE

WOULD AUTO-IRAS AFFECT HOW LOW-INCOME HOUSEHOLDS COPE WITH EMERGENCY EXPENSES?

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Abstract

State auto-IRA initiatives provide coverage to workers without an employer-sponsored retirement plan. These workers tend to have lower incomes and often have limited savings to cope with emergency expenses. Hence, the auto-IRAs also serve a secondary purpose – precautionary savings that can help workers avoid credit cards, payday loans, or other high-cost forms of borrowing. However, a number of factors may prevent households from tapping auto-IRAs during an emergency – a desire to leave retirement savings intact, worries about taxes and penalties, and administrative hassles associated with withdrawals.

Using a randomized survey experiment, this paper examines workers' willingness to use auto-IRAs as precautionary savings, as well as potential deterrents. The results show that only around 10 percent of households would tap a (hypothetical) auto-IRA account to cover a \$400 emergency expense. A desire to preserve retirement savings and concerns about the financial costs of withdrawals are the two most cited reasons for not planning to tap the accounts. Framing the accounts as easily accessible alleviates some concerns about taxes and improves respondents' subjective financial well-being; nevertheless, many are still worried about the tax implications of withdrawing funds. These results suggest that uncovered workers may be more likely to participate in auto-IRAs if they better understood the program's Roth design.

Introduction

About half of private sector workers in the United States are not covered by an employersponsored retirement plan at their current job, and few workers save outside of such plans.¹ In recent years, a number of states have passed legislation to implement auto-IRA programs, which require employers who do not offer a retirement plan to automatically enroll their workers in an Individual Retirement Account (IRA).² The uncovered workers targeted by these programs tend to be less attached to the labor force, highly mobile, and have lower earnings. Consequently, they not only lack retirement savings, but often have trouble coping with emergency expenses.³ Recognizing these challenges, policymakers designed the auto-IRAs as Roth accounts: since contributions are made with post-tax income, participants can withdraw their contributions at any time without paying additional taxes or penalties. As a result, the auto-IRAs could serve a secondary purpose as precautionary saving, helping workers avoid credit cards, payday loans, or other high-cost forms of borrowing.

The question is how participants use these accounts in practice. Households may not tap their savings during an emergency due to mental accounting (i.e., the funds are earmarked for retirement), administrative hassles associated with withdrawals, or worries about taxes and penalties. Participants may not understand the distinction between traditional 401(k) plans – to which they may have had exposure through a previous employer, friend, or family member – and Roth accounts. Moreover, even in a Roth, avoiding taxes and penalties requires knowing how much of the balance derives from contributions versus investment earnings, a calculation that could be too complicated in an emergency.

Hence, this study asks four questions: 1) In an emergency, would auto-IRA participants use their savings instead of higher-cost forms of borrowing? 2) Would a simple communications nudge affect the likelihood that participants tap their auto-IRA accounts in an emergency? 3) What are the major deterrents for those who do not plan to tap these accounts? and 4) Does saving in an auto-IRA improve participants' subjective financial well-being?

¹ This lack of coverage is one of the main reasons why workers end up in retirement with 401(k) assets that are a third of what they might have otherwise had if they had saved continuously throughout their careers (Biggs, Munnell, and Chen 2019).

² As of December 2023, seven states (Oregon, Illinois, California, Connecticut, Maryland, Colorado, and Virginia) have up-and-running mandatory auto-IRA programs. Rather than imposing penalties, Maryland provides a moderate financial incentive to complying employers (Center for Retirement Research at Boston College 2023). ³ Dushi, Iams, and Lichtenstein (2015) and Munnell and Bleckman (2014).

Using a randomized survey experiment targeting low- to moderate-income workers, we find that only around 10 percent of our sample would tap their (hypothetical) auto-IRA accounts to cover a \$400 emergency expense. Instead, 43 percent of participants would turn to higher-cost forms of borrowing in an emergency. Those who do not tap their auto-IRA have several reasons for not making withdrawals: 54-60 percent say that they prefer to save the money for retirement; around half cite concern about taxes and penalties; and just under 30 percent state that withdrawing in an emergency would be too much hassle. While framing the accounts as either illiquid (withdrawals subject to taxes and penalties) or liquid (withdrawals can be made easily at any time) does not seem to impact behavior, the liquid framing does reduce concerns about taxes and penalties. Moreover, participants are more satisfied with the program when they believe that their savings would be easily accessible.

The rest of this paper proceeds as follows. The next section reviews the prior literature and provides background on state auto-IRA programs. The third section describes our survey experiment. The fourth section presents results, and the fifth section concludes with implications for policy.

Background

This section summarizes what is known about how households use retirement savings in an emergency, introduces the history and design of state auto-IRA programs, and considers why participants may or may not use auto-IRAs as precautionary savings.

Retirement Accounts as Precautionary Savings

Most households will at some point face an unexpected event that current income cannot support. Adequate preparation for a financial emergency is especially important for low- and moderate-income households, who have less access to traditional credit and whose tighter budgets make saving more difficult. However, according to a Federal Reserve survey, 40 percent of U.S. households do not feel confident that they could easily cover a \$400 emergency expense, and this percentage is higher among low-income households and those in historically disadvantaged groups.⁴ Without access to precautionary savings, families might delay paying

⁴ Chen (2019) and Chase, Gjertson, and Collins (2011).

bills, sell possessions, seek a formal or informal loan, or resort to high-cost borrowing such as a payday loan.⁵

In this context, early withdrawals from defined contribution (DC) retirement accounts may sometimes be the least-bad option. Early (before age 59½) withdrawals from traditional plans often incur a 10-percent penalty on top of the income tax due on contributions and investment earnings. Workers are exempt from the 10-percent penalty in "hardship" cases, such as when they withdraw to pay for large medical expenses.⁶ Withdrawals are easier from Roth retirement plans where contributions are made on a post-tax basis. As a result, participants can withdraw their contributions at any time without taxes or penalties, although the investment earnings may still be subject to tax.⁷

Prior research in this area focuses on traditional DC plans. It finds that 4 to 8 percent of participants make early withdrawals from their accounts each year.⁸ Low-income households are much more likely to take penalized distributions. Job change, income, and marital shocks are some of the primary reasons behind early withdrawals, suggesting that younger households tap their retirement savings in response to financial strains.⁹

The History and Design of State Auto-IRA Programs

Despite the importance of employer-sponsored retirement plans, only about half of the private sector workforce is covered at any given point in time.¹⁰ Uncovered workers tend to be temporary, part-time, and lower-wage employees, with many working for new and small employers. As a result, roughly a third of households are solely reliant on Social Security

⁵ Zinman (2010) finds that restricting access to payday loans resulted in shifts to bank overdrafts and late bill payment, increasing financial hardship among former borrowers.

⁶ Other exceptions to the penalty include taking early distributions to purchase a first home or make tuition payments. Moreover, for employees ages 55 or older, the 10-percent penalty does not apply if they take an early withdrawal when separating from an employer.

⁷ Investment earnings are subject to income taxes and penalties depending on whether the account holder is younger than 59½ and the account is less than five years old.

⁸ See Bryant, Holden, and Sabelhaus (2011); Butrica, Zedlewski, and Issa (2010); Munnell and Webb (2022); Sabelhaus (2000); U.S. Government Accountability Office (2009); and Vanguard (2019). Pre-retirement withdrawal rates depend on the data used in the study – self-reported survey data, tax data, or plan administrative data – and the time period.

⁹ See Amromin and Smith (2003); Argento, Bryant, and Sabelhaus (2015); and Engelhardt (2002) for the factors that contribute to pre-retirement withdrawals from traditional plans. Since these papers typically use tax data to study early withdrawals, they can only observe shocks that are directly reported on tax returns (such as a sharp decline in income).

¹⁰ Dushi, Iams, and Lichtenstein (2015) and Munnell and Bleckman (2014) provide estimates of retirement plan coverage across a variety of datasets.

benefits in retirement, with many ending up on safety net programs such as Medicaid.¹¹ At the national level, policymakers have attempted to expand coverage by creating IRAs for uncovered workers, and making it simpler for small employers to sponsor plans.¹² Yet, these initiatives have not had much effect.

In the absence of a federal solution, state auto-IRA programs have gained steam over the past five years. These programs are now up and running in California, Colorado, Connecticut, Delaware, Illinois, Maine, Maryland, New Jersey, Oregon, and Virginia, with another five states preparing to launch.¹³ Most of these states have adopted the same basic program design.¹⁴ On the employer side, firms are required to submit timely payroll records to the program but have no fiduciary responsibility and cannot make matching contributions. On the employee side, workers are automatically enrolled and allowed to opt out. The accounts are set up as Roth IRAs, so participants can withdraw their contributions at any time, and contribution rates auto-escalate.¹⁵ One program, MarylandSaves, goes even further, diverting the first \$1,000 of contributions into a separate account earmarked for emergencies, with additional contributions and earnings earmarked for retirement.

Looking ahead, the federal Saver's Tax Credit will effectively become a matching contribution for the auto-IRA programs. This credit currently allows low- and middle-income workers to receive a nonrefundable tax credit of up to 50 percent of their contributions to a retirement plan. However, because many auto-IRA participants have no tax liability due to low income, they never receive this nonrefundable credit. In 2027, a provision in the SECURE 2.0 Act will replace the existing Saver's Credit with a Saver's Match. This change will provide a universal match rate of 50 percent on the first \$2,000 of employee contributions and make the matched federal contribution refundable – deposited directly into workers' retirement accounts.¹⁶

¹¹ See Biggs, Munnell, and Chen (2019) or Dushi, Iams, and Trenkamp (2017) for analyses on resources available in retirement. While Social Security provides a higher replacement rate to lower versus higher earners, lower earners are more likely to claim early, incurring an actuarial penalty that reduces their monthly benefit.

¹² These options for small employers include the SEP, the SIMPLE-IRA, the Payroll Deduction IRA, myRA (which is no longer available), and the "open" MEP.

¹³ These states are New York, Minnesota, Nevada, Rhode Island, and Vermont.

¹⁴ Center for Retirement Research at Boston College (2023).

¹⁵ Initial contributions are typically set to five percent of pay and funds are invested in a target date fund by default. While employer cooperation is mandatory, employee participation is voluntary – employees can choose to stop contributing at any time after being defaulted into the program.

¹⁶ The Saver's Match cannot be deposited into a Roth IRA because the match will be a pre-tax contribution; however, the auto-IRA programs may be able to set up a companion traditional IRA account to ensure receipt of the match (Scott and Olson 2024).

Will Households Tap Auto-IRAs in an Emergency?

In principle, we expect the rate of early withdrawals from auto-IRAs to be higher than from traditional 401(k)s. The programs have been set up as Roth accounts, and auto-IRA participants have lower incomes, less-stable employment, and less liquidity than their counterparts in traditional plans – characteristics that have been shown to increase the rate of withdrawals. Although the primary policy goal is to encourage retirement saving, many auto-IRA participants could benefit from the program even if they occasionally use it as a precautionary savings account.¹⁷

Three factors might hinder participants' ability to access auto-IRAs when in need. First, unless the program has an explicit precautionary savings component (as in MarylandSaves) participants may consider funds in an auto-IRA as earmarked for retirement and choose not to take withdrawals due to mental accounting.¹⁸ Second, workers could find it costly to submit the paperwork to initiate withdrawals, particularly during an emergency. Finally, workers may not fully understand the distinction between Roth and traditional retirement accounts and overestimate the taxes and penalties associated with early withdrawals.

Given that most state auto-IRA programs are still in initial stages, we have limited realworld evidence on participant behavior. Quinby et al. (2020) and Chalmers et al. (2021) both look at participation and early withdrawals in the first couple years of OregonSaves (an early adoption state). They find that participation ranged between 48 and 67 percent, depending on the treatment of missing data, suggesting that many workers chose not to opt out. Moreover, 20 percent of participants made at least one pre-retirement withdrawal between 2017 and 2018, removing \$1,000 on average. More recent data on two other early auto-IRA programs, CalSavers and Illinois Secure Choice, similarly show withdrawal rates ranging from 15 to 21 percent in 2023.¹⁹ However, these data do not tell us what share of withdrawals were made in an emergency, as opposed to cash-outs at job change or workers leaving the program altogether.²⁰

¹⁷ See Beshears et al. (2020) and Center for Retirement Research at Boston College (2015).

¹⁸ For example, see Thaler (1985, 1999).

¹⁹ Additionally, withdrawal rates show a clear increasing trend as programs continue the rollout process and employee knowledge improves. See California State Treasurer (2023), Illinois State Treasurer (2023), and Oregon Retirement Savings Board (2023). Another benchmark is the sum of withdrawals as a share of total contributions in up-and-running state auto-IRA programs, which is about 25% (Georgetown University Center for Retirement Initiatives, 2024).

²⁰ Early evidence on withdrawals during the pandemic shows that total withdrawals ticked up in March 2020 compared to 2019, suggesting that workers in need might be tapping these savings (Scott and Blevins 2020).

With this background in mind, our study assesses whether workers are likely to use their auto-IRA accounts for precautionary, as well as retirement, savings and the implications for their financial well-being. Since we do not have administrative data on program participants – the gold standard – we instead rely on a survey experiment described in the next section.

Data and Methodology

Our survey was administered by NORC at the University of Chicago to their nationally representative AmeriSpeak panel. Participants were eligible for this study if they had income below \$85,000, or the bottom three quintiles of household income.²¹ Individuals in the *Current Population Survey* whose households fall into the same income range as our sample have similar salaries as actual auto-IRA program participants.²² The survey also oversampled Black and Hispanic households and those living in states with up-and-running auto-IRA programs. It was fielded online in English and Spanish in August 2023, and included a total of 4,750 respondents.²³

The AmeriSpeak panel already includes demographic information about respondents, such as gender, race, education, and marital status, and basic financial characteristics such as income and homeownership. To obtain more information on the household balance sheet, the survey first asked about the types of assets held by the household – including employer-sponsored retirement plans and IRAs – and then about outstanding debt, as well as the household's use of credit cards. Respondents were also asked to rate their financial well-being as a baseline response.²⁴

Experimental Treatments

One common metric of precautionary savings is whether the household can cope with a \$400 emergency expense. This question has been featured in the Federal Reserve Board of Governor's annual *Survey of Household Economics & Decisionmaking* (SHED) since 2013 and

²¹ According to U.S. Census (2023), the upper limit for the bottom three quintiles of the household income distribution is \$94,000.

²² See Appendix Table A1.

 $^{^{23}}$ The complete survey featured 6,359 respondents, but – as will be discussed – we drop one treatment group from the analysis.

²⁴ Specifically, respondents were asked to choose one of four options that best describes their household's financial situation: "living comfortably," "doing okay," "just getting by," and "finding it difficult to get by."

is also the backbone of our study. Specifically, our survey randomly assigned respondents to three groups:

Group 1: "Benchmarking." Respondents were told to think about the money they currently have for emergencies and then answer how they would cover a \$400 emergency expense. To benchmark our results against prior literature, the emergency expense question is taken directly from the SHED:

Suppose that you have an emergency expense that costs \$400. Based on your current financial situation, how would you pay for this expense? Please select all that apply:

- *Put it on my credit card and pay it off in full at the next statement*
- Put it on my credit card and pay it off over time
- With the money in my checking/savings account or with cash
- Using money from a bank loan or line of credit
- *By borrowing from a friend or family member*
- Using a payday loan, deposit advance, or overdraft
- By selling something
- *I wouldn't be able to pay for the expense right now*

Group 2: "Auto-IRA with Taxes and Penalties." This group was told to imagine a hypothetical situation in which they have some additional savings in an IRA. In order to mimic the language used on many program websites at the time of our experiment, respondents were not told that the account is a Roth. Instead, they saw a sentence mentioning possible taxes and penalties:²⁵

"Now imagine that, in addition to your current financial resources, you have saved some of your earnings in an Individual Retirement Account (IRA). You can access the money before retirement, but withdrawals may be subject to taxes and penalties."

Then, respondents answered three questions:

- 1) Would these savings change your household's financial situation?
 - It would help a lot
 - It would help a little
 - No change
 - It would make things worse

 $^{^{25}}$ The questionnaire was designed to encourage respondents to think about their own specific employment and financial situation. We opted not to show a specific account balance for the hypothetical auto-IRA in order to avoid bias. For example, anchoring to the average real-life auto-IRA account balance -\$1,800 – could bias low- to moderate-income household towards withdrawing, since they likely would not have saved as much in practice. Future research could explore whether respondents behave differently when shown a personalized account statement.

- 2) Suppose that you have an emergency expense that costs \$400. In the scenario described above, how would you pay for this expense? (Please select all that apply)
 - With the money in my checking account
 - With the money in my savings account
 - With savings in cash
 - Withdrawing money from my retirement plan/account
 - Put it on my credit card
 - Using money from a bank loan or line of credit
 - *By borrowing from a friend or family member*
 - Using a payday loan, deposit advance, or overdraft
 - By selling something
 - *I wouldn't be able to pay for the expense right now*

Note that the possible responses for question 2) differ from the Fed question used for

benchmarking.²⁶

Finally, if respondents chose not to tap the retirement account, we asked:

- 3) Why did you choose not to use funds from your retirement plan/account to cover the emergency expense? (Please select all that apply)
 - *I* want to save the money for retirement
 - I don't want to pay taxes or penalties
 - Too much hassle to access the money
 - I have never had an account like this
 - *Other, please specify*

Group 3: "Auto-IRA Easy Access." Like Group 2, this group was also asked to imagine a hypothetical situation with savings in an auto-IRA. The framing for this group removed any mention of taxes and penalties; rather, respondents were told that they can tap these savings easily:

"Now imagine that, in addition to your current financial resources, you have saved some of your earnings in an Individual Retirement Account (IRA). You can access this money at any time by going online or calling a hotline."

The follow-up questions were the same as for Group 2.²⁷

²⁶ Specifically, we combined the two credit-card options into one; separated checking accounts, savings accounts, and cash; and added retirement plan/account as a possible response. Also, unlike the Fed survey, we randomized the order in which respondents saw the list of options – some saw checking first, while others saw it last.

²⁷ The survey also included a fourth treatment group: "Checking Account." The objective of this treatment was to determine whether respondents would be less likely to tap their savings in an emergency if the money were in an account specifically earmarked for retirement. Specifically, this group was told: "*Now imagine that, in addition to your current financial resources, you have saved some of your earnings in a checking account*" with the same

Results

This section begins by describing our sample and benchmarking their finances against the SHED. Next, it evaluates whether respondents use their hypothetical auto-IRAs as precautionary savings and considers the importance of framing. It then analyzes the major deterrents to access. Finally, it presents the impact of auto-IRAs on subjective financial well-being.

Summary Statistics

Our survey focuses on low- to middle-income households, the target population of state auto-IRA programs. As expected given random assignment, the respondents in all three treatment groups have similar demographic characteristics (see Table 1). They are age 50, on average; 53 percent female and 65 percent White. Twenty-one percent have a college degree or higher. Forty percent are married, and a quarter are retired. The only notable difference is that Group 1 has a slightly lower share of the lowest-income households (those with less than \$30,000 in annual household income). In general, around 77 percent of respondents have household income below \$60,000.

Next, we turn to the characteristic of interest for this study – the household balance sheet. Virtually all respondents report that they currently have liquid assets held in checking and savings accounts or in cash (see Table 2). However, the coverage gap in retirement savings is substantial. Only 45 percent of our sample report having some sort of retirement plan, either an employer-sponsored plan from their current or a previous employer (37 percent) and/or an IRA (21 percent). As expected, the share with a plan increases substantially with income, from 22 percent among the lowest-income group to 66 percent for the highest-income group.

On the debt side, 38 percent of respondents report carrying an unpaid credit card balance, which can be associated with high interest rates. Only 25 percent hold a mortgage. Despite the high incidence of credit card debt, especially among higher-income households, a majority of respondents report "good" or "excellent" subjective financial well-being.

follow-up questions as Groups 2 and 3. However, as will be discussed in the next section, a problem with randomization prevents us from comparing Group 4 with Groups 2 and 3, so we drop Group 4 from the analysis.

Benchmarking Ability to Pay for a \$400 Expense

While most households report having liquid assets, prior studies using the SHED show that 40 percent cannot pay for a \$400 expense without resorting to borrowing or selling.²⁸ The results from Group 1 in our survey ("benchmarking") paint a similarly grim picture, with 50 percent of respondents having insufficient precautionary 7savings (see Figure 1). The share in our sample is higher than the national average because we focus on low- and middle-income households; for example, 68 percent of respondents with less than \$30,000 in annual household income do not have enough savings to cover the \$400 expense, compared to 34 percent for households with \$60,000 to \$80,000.²⁹ Instead, a fifth of the households in our sample would use revolving credit card debt to pay for this relatively small sum; 4 percent would take out a bank loan; another 4 percent would use a payday loan; and 8 percent would be forced to sell something (see Figure 2).³⁰ With these patterns in mind, the next question is whether respondents in Group 2 ("auto-IRA taxes and penalties") and Group 3 ("auto-IRA easy access") would use their hypothetical accounts as precautionary savings and whether access to auto-IRAs would reduce their reliance on borrowing or selling.

Using Auto-IRAs as Precautionary Savings

The next stage of the analysis shows what happens when respondents are allowed to tap their retirement accounts to cover the emergency expense.³¹ The first row of Table 3 suggests that 6 percent of respondents in Group 2 ("auto-IRA taxes and penalties") would withdraw funds to cover the expense, compared to 8 percent in Group 3 ("auto-IRA easy access"). This is within the range of 4 to 8 percent reported in past literature on 401(k)s, but is lower than rates currently observed in live auto-IRA programs.³² And it is surprisingly low given that Group 3 was nudged to consider the account easily accessible.

Part of the explanation is that many respondents without coverage in real life did not respond to our experiment because they could not imagine having an auto-IRA.³³ These

²⁸ Bhutta and Dettling (2018); Chen (2019); and U.S. Board of Governors of the Federal Reserve System (2023).

²⁹ Appendix Table A2 shows that our sample is similar to households in the SHED with income below \$100,000.

³⁰ The shares do not sum to 100 percent because respondents were allowed to select more than one response.

³¹ Recall that the SHED benchmark question did not include retirement accounts as a response option.

³² See Bryant, Holden, and Sabelhaus (2011); Butrica, Zedlewski, and Issa (2010); Munnell and Webb (2022); Sabelhaus (2000); U.S. Government Accountability Office (2009); and Vanguard (2018).

³³ Despite being prompted to think about a hypothetical auto-IRA, about one-third of respondents in Groups 2 and 3 stated that they do not own a retirement account, and hence could not tap it. This issue does not arise for our

individuals (often referred to as "never-takers" in experimental studies), have slightly lower household income, highlighting the difficulty of studying counterfactual behavior in the population targeted by auto-IRAs. If the never-takers are more likely to tap their auto-IRAs during an emergency, then the share of respondents treating auto-IRAs as precautionary savings may be underestimated.

One way to include the never-takers in the analysis is to impute their missing withdrawal behavior based on household income. The result is almost identical to simply dropping them, as differences in the income distribution between never-takers and compliers is quite modest. The second row of Table 3 shows that this corrected withdrawal rate is 8 percent for Group 2 ("auto-IRA taxes and penalties") and 11 percent for Group 3 ("auto-IRA easy access"). Since treatment Groups 2 and 3 contain an equal share of never-takers, we can examine the effect of the two framing experiments even after dropping the never-takers; the difference across treatment groups is not statistically significant.³⁴

Another way to include the never-takers is to place bounds on the estimated rate of withdrawal. The lower bound assumes that the never-takers would never tap their accounts in an emergency, while the upper bound assumes that they would always tap their accounts. This bounding exercise places the share of respondents making withdrawals between 7 and 35 percent.³⁵ Regardless of our assumptions, the majority of participants would not use auto-IRAs as precautionary savings, even if that means having to borrow or sell to pay for an emergency expense. Moreover, respondents who complied with the experiment still reveal valuable information about differences in behavior across subgroups, reasons for not tapping the auto-IRA account, and improvements in subjective well-being. Therefore, the rest of the analysis excludes the never-takers and focuses on those who complied with the auto-IRA experiment.

Unsurprisingly, Figure 3 shows that low-income respondents are more likely to tap their retirement accounts in an emergency. Beyond income, withdrawal rates are similar across many demographic groups (see Figure 4). The only exception is a higher withdrawal rate for Black households, which is largely due to underlying income disparities.

original Group 4 ("checking account") because the vast majority of respondents already own a checking account. Given the high share of never-takers, comparing results from Groups 2 and 3 to Group 4 is likely to be misleading. ³⁴ See Appendix A4 for regression results, with and without additional controls, consistent with a simple comparison

of means across groups.

³⁵ While real-world data on withdrawal rates for emergency expenses are not yet available, information from early auto-IRA programs show overall withdrawal rates ranging from 15 to 21 percent.

The next question is whether auto-IRAs help respondents avoid borrowing or selling in an emergency. The third row of Table 3 presents the share of respondents who would cover the expense using revolving credit card debt, bank or payday loans, or by selling something, as well as those who state simply that they would not be able to pay.³⁶ Even with the auto-IRA, 43 percent of respondents still expect to borrow or sell.³⁷ And framing the account as easily accessible does not seem to affect their behavior.³⁸ The failure of the nudge, while disappointing, is consistent with a recent nudge study that also failed to deter households from accumulating revolving credit card debt (Guttman-Keney et al. 2023).

Deterrents to Accessing Auto-IRAs

So far, we have shown that only around 10 percent of households would tap auto-IRAs when faced with unexpected spending needs, and many would rather accumulate credit card debt or take out loans than make withdrawals. This section digs into the reasons households report for not withdrawing from their retirement accounts.³⁹

Table 4 presents the share of respondents in Groups 2 and 3 reporting various reasons for not tapping their retirement accounts in an emergency. The two most common reasons, each reported by around half of respondents, are concerns about taxes and penalties, and wanting to save the funds for retirement. Here, our experimental nudge does seem to matter. Respondents in Group 2 ("auto-IRA taxes and penalties") are 9 percentage points more likely to mention this concern.⁴⁰ Respondents in Group 3 ("auto-IRA easy access") are more likely to justify their actions – or lack of action, since they did not tap the IRA – as wanting to save the funds for retirement. Nevertheless, 46 percent of the Group 3 respondents who did not tap their accounts

³⁷ This result is not directly comparable to the SHED benchmark because the wording of the question differs in our survey (it includes retirement plans as an option and changes the order in which possible responses are presented). Another change is that we randomized households into two groups that face either the normal order of response options, listed from the least harmful payment strategies to not being able to pay, or the reversed order. Interestingly, as we show in Appendix Table A5, the order in which respondents see the options has an effect on their elections: options shown first are more likely to be chosen. As a result, the SHED may slightly overestimate

the incidence of borrowing as it lists credit cards as the first two payment options.

³⁶ The sample drops those who cannot imagine having an auto-IRA (the never-takers).

³⁸ See Appendix A6 for regression results, with additional controls, consistent with a simple comparison of means across groups.

³⁹ Individuals in Groups 2 and 3 who reject our experiment are dropped from this analysis. The reasons reported by respondents are not mutually exclusive, so the shares may add up to more than 100 percent.

⁴⁰ Appendix Table A7 uses regressions to show that these differences remain statistically significant and similar in magnitude after adding controls.

still claim to be worried about taxes, and nearly one third also believe that withdrawing is too much hassle despite being told that the funds can be withdrawn at any time.

Auto-IRAs and Subjective Financial Well-Being

Having funds set aside could be reassuring, help households meet their saving goals, and improve how they perceive their financial situation holistically.⁴¹ Indeed, 50 to 61 percent of respondents indicate that having some savings would improve their financial well-being (see Table 5). Importantly, believing that the savings are easily accessible matters a lot for this metric. Whereas half of respondents in Group 2 ("auto-IRA taxes and penalties") report improved well-being, the share rises to 61 percent for Group 3 ("auto-IRA easy access").⁴² This pattern holds across the income distribution, as well as for respondents with and without retirement plan coverage in real life.

Conclusion

Auto-IRAs provide a retirement savings vehicle for workers whose employer does not offer one, and can serve a secondary purpose as precautionary saving, helping workers avoid using credit cards, payday loans, or other high-cost forms of borrowing. However, households may refrain from tapping their accounts in an emergency because they want to save for retirement, are worried about taxes and penalties, or because they perceive that the paperwork is too much hassle. Using a survey experiment targeting low- to moderate-income workers, this paper tests whether individuals will use auto-IRAs as precautionary savings, examines whether the language on program websites affects withdrawal behavior, and explores potential deterrents to tapping auto-IRA funds.

The results show that around 10 percent of participants would use their auto-IRAs to cover an unexpected \$400 expense. The primary deterrents to using the accounts are concern about taxes and penalties and a desire to save for retirement. Although describing the accounts as easily accessible has no effect on withdrawal behavior, it alleviates some concerns about taxes and penalties and improves participants' subjective financial well-being. Nevertheless, many

 ⁴¹ This consistent with Scott and Hines (2022)'s findings on improved self-reported financial security among participants of the Illinois Secure Choice retirement savings program.
⁴² See Appendix Table A8 for regression results, with additional controls, consistent with a simple comparison of

⁴² See Appendix Table A8 for regression results, with additional controls, consistent with a simple comparison of means across groups.

respondents still view the accounts as highly illiquid, even when told that withdrawals can be made at any time.

These findings suggest that participants may need more than a simple nudge to reassure them that their accounts can be accessed in an emergency and divert them from familiar forms of borrowing. Policymakers concerned about both retirement and precautionary saving could adopt the model in MarylandSaves, which earmarks a small portion of the account for emergencies, with the bulk dedicated to retirement. Moreover, since participants are more satisfied with the program when their savings are easily accessible, framing auto-IRAs as both precautionary and retirement savings might increase take-up, ultimately leading to more retirement savings.

Policymakers would also benefit from more research on participant behavior in auto-IRAs. The limitations of our survey highlight how difficult it is to predict how uncovered households might use an unfamiliar financial account. Future studies should target auto-IRA participants directly, assessing how different outreach and communication strategies impact actual contributions and withdrawals.

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Tables and Figures

	Group 1	Group 2	Group 3
Household characteristics	Benchmarking	Auto-IRA taxes	Auto-IRA
	Deneminarking	& penalties	easy access
Panel A. Demographics			
Age	51.0	49.4	49.5
Female	55%	52%	56%
Race: Black	15	15	15
Race: Hispanic	20	20	20
College-educated	23	20	22
Married	38	39	37
Retired	24	25	24
Lives in a state with an auto-IRA program	15	15	15
Panel B. Income			
<\$30,000	33	39	40
\$30,000-\$60,000	42	39	36
\$60,000-\$85,000	24	22	23
N	1,537	1,617	1,596

Table 1. Summary Statistics, by Treatment Group

Note: Auto-IRA states include California, Illinois, and Oregon, the three states with well-established programs as of August 2023.

Source: Authors' calculations from survey data provided by NORC at the University of Chicago.

Table 2. Household Balance Sheet, by Household Income

			Income group	groups		
	Full sample	Less than \$30,000	\$30,000- \$60,000	\$60,000- \$85,000		
Liquid assets	95%	91%	98%	99%		
Any retirement account	45	22	55	66		
Employer-provided retirement plan	37	17	45	57		
IRA	21	9	25	33		
Homeowner	59	43	64	77		
Mortgage debt	25	13	28	37		
Credit card debt	38	32	42	43		
Subjective financial well-being is good	61	48	64	78		

Table 3. Usage of Retirement Accounts as Precautionary Savings and Inability to Cover a \$400Emergency Expense, by Treatment Group

	Group 2	Group 3
	Auto-IRA taxes & penalties	Auto-IRA easy access
Uses retirement accounts as precautionary savings:		
All respondents	6%	8%
Respondents who accepted the experiment	8	11
Cannot cover a \$400 emergency expense:		
Respondents who accepted the experiment	43	43

Notes: Uncovered households are considered to have rejected the experiment if they answer that they have no retirement account. Households deemed unable to cover a \$400 emergency expense are those who report they would need to incur revolving credit card debt, take bank or payday loans, sell something, or just would not be able to pay.

Source: Authors' calculations from survey data provided by NORC at the University of Chicago.

Table 4. Reasons for Not Tapping Retirement Accounts to Cover a \$400 Emergency Expense, by Treatment Group

	Group 2	Group 3	
	Auto-IRA	Auto-IRA	
	taxes & penalties	easy access	
Worried about taxes and penalties	55%	46% **	
Save for retirement	54	60 **	
Too much hassle	29	28	

Notes: The sample includes households who chose not to make withdrawals during an emergency, excluding those who rejected the experiment. We further exclude 1 percent of respondents because they did not give a reason, 3 percent because they answered they have no need to tap, and another 4 percent who reported that they cannot withdraw because they are already retired and making regular withdrawals or believe that plan rules prohibit them from withdrawing. Stars indicate whether the share of workers citing each reason for not withdrawing is statistically different from Group 2. ** p < 0.05, *** p < 0.01.

	Group 2	Group 3
	Auto-IRAAuto-IRAtaxes & penaltieseasy access	
Full sample	48%	60%***
By income groups:		
<\$30,000	55	71 ***
\$30,000-\$60,000	49	57 **
\$60,000-\$85,000	39	52 ***
<i>By retirement coverage:</i>		
Covered workers	39	53 ***
Uncovered workers	62	71 *

Table 5. Share of Respondents Reporting Improved Financial Well-Being, by Treatment Group

Notes: The sample excludes uncovered households who have rejected the experiment by answering that they have no retirement account. Notes: Stars indicate whether the share of workers citing improved well-being is statistically different from Group 2. ** p < 0.05, *** p < 0.01. Source: Authors' calculations from survey data provided by NORC at the University of Chicago.

Figure 1. Share of Respondents Who Cannot Cover a \$400 Emergency Expense in Group 1 ("Benchmarking"), by Household Income



Note: Households unable to cover a \$400 emergency expense are those who report they would need to incur revolving credit card debt, take bank or payday loans, sell something, or just would not be able to pay. *Source:* Authors' calculations from survey data provided by NORC at the University of Chicago.

Figure 2. Share of Respondents Who Would Use Various Methods to Cover a \$400 Emergency Expense, Group 1 ("Benchmarking")



Note: Payment options are not mutually exclusive.

Figure 3. Share of Respondents in Group 2 ("Auto-IRA Taxes and Penalties") and Group 3 ("Auto-IRA Easy Access") Using Retirement Accounts as Precautionary Savings, by Household Income



Note: The sample includes households in groups 2 and 3 with retirement accounts (from real life or our experiment) and excludes uncovered households who rejected the experiment.





Notes: The sample excludes uncovered households who rejected the experiment. Auto-IRA states include California, Illinois, and Oregon, the three states with well-established programs as of August 2023. Differences by retirement status and access to state auto-IRAs are not statistically significant. Black households are significantly more likely to make withdrawals due to lower income.

Household characteristics	Workers in our survey	Comparable CPS workers			
Panel A. Demographics					
Age	41.6	40.8			
Female	52%	48%			
Race: Black	16	15			
Race: Hispanic	23	25			
College-educated	24	26			
Married	36	32			
Panel B. Household income and earning	zs				
<\$30,000 in household income	30%	21%			
\$30,000-\$60,000 in household income	41	44			
\$60,000-\$85,000 in household income	29	35			
Individual earnings	-	\$33,042			
N	1,950	27,139			
Average participant salaries in October 2023 by program:					
CalSavers		42,807			
Illinois Secure Choice		29,801			
OregonSaves		35,048			

Table A1. Sample Summary Statistics Compared to the Current Population Survey (CPS)

Notes: Comparable CPS workers have household income below \$85,000. Average auto-IRA participant salaries are calculated based on the average contribution amount and deduction rate in program monthly reports. *Sources:* Authors' calculations from the *Current Population March Supplement* (2023), California State Treasurer (2023), Illinois State Treasurer (2023), and Oregon Retirement Savings Board (2023).

Table A2. Strategies for Covering a \$400 Emergency Expense, Group 1 ("Benchmarking") Compared to the SHED

	Group 1 Benchmarking	SHED
Credit card, paid off at once	31%	28%
Credit card, paid off over time	19	20
Checking/savings/cash	38	42
Bank loan	4	3
Borrow from friend or family	13	13
Using a payday loan, deposit advance, or overdraft	4	2
By selling something	8	7
Not able to pay for the expense right now	15	16
Cannot cover a \$400 expense	50	46

NoteS: SHED households with less than \$100,000 in annual income are included in this analysis. Percentages do not sum to 100 percent because respondents could select more than one response.

Sources: Authors' calculations from survey data provided by NORC at the University of Chicago and the U.S. Board of Governors of the Federal Reserve System (2023).

	Did not tap	Tapped;
	because they do	or did not tap
	not have a plan	for other reasons
Panel A. Demographics		
Age	45.4	45.2
Female	57%	51% *
Race: Black	18	20
Race: Hispanic	23	24
College-educated	10	11
Married	29	30
Retired	18	18
Lives in a state with an auto-IRA program	15	14
Assigned to Group 3 ("Easy Access")	53	47 *
Panel B. Income		
< \$30,00	60%	52%
\$30,000-\$60,000	28	34 **
<u>\$60,000-\$85,000</u>	12	14 *
N	777	788

Table A3. Summary Statistics for Uncovered Respondents in Group 2 ("Auto-IRA Taxes and Penalties") and Group 3 ("Auto-IRA Easy Access"), by Withdrawal Behavior and Reason

Notes: Auto-IRA states include California, Illinois, and Oregon, three states with well-established programs as of August 2023. Stars indicate whether household characteristics are statistically different from those who rejected the experiment. Robust standard errors are reported. * p < 0.1, ** p < 0.05. Source: Authors' calculations from survey data provided by NORC at the University of Chicago.

	Tap retirement account during an emergency				
Variables	(1)	(2)	(3)	(4)	
-	No controls	With controls	No controls	With controls	
Constant	0.062***	0.050*	0.084***	0.101***	
	(0.008)	(0.026)	(0.011)	(0.039)	
Group 3 ("Easy Access")	0.014	0.014	0.025	0.027*	
	(0.012)	(0.012)	(0.016)	(0.016)	
Resides in auto-IRA states		0.004		0.007	
		(0.015)		(0.020)	
Age		-0.000		0.000	
		(0.000)		(0.001)	
Female		-0.002		0.001	
		(0.012)		(0.017)	
College-educated		-0.023**		-0.027**	
		(0.011)		(0.013)	
Black		0.025		0.031	
		(0.016)		(0.023)	
Hispanic		-0.002		-0.009	
		(0.017)		(0.025)	
Married		0.025*		0.038**	
		(0.013)		(0.017)	
Has retirement accounts		0.036**		-0.019	
		(0.014)		(0.019)	
Homeowner		0.003		0.001	
		(0.014)		(0.020)	
Household finance is okay		-0.046***		-0.077***	
or better		(0.013)		(0.019)	
Sample	Groups 2 and 3		Groups 2 and 3 who accepted the experiment		
Ν	3,213	3,213	2,436	2,436	
R-squared	0.001	0.021	0.002	0.045	
Income controls	No	Yes	No	Yes	

Table A4. Impact of Framing Auto-IRAs as Easily Accessible on Retirement-Plan Withdrawals

Notes: The omitted group is Group 2 ("auto-IRA taxes and penalties"). Income controls include binary indicators of household income in 12 categories. Robust standard errors are reported. * p < 0.1, ** p < 0.05, *** p < 0.01. *Source:* Authors' calculations from survey data provided by NORC at the University of Chicago.

	Normal order	Reversed order	Difference	Difference with controls
Checking	39%	31%	-0.08***	-0.08***
Savings	25	26	0.01	0.02
Cash	9	10	0.01	0.01
Withdrawing money from retirement accounts	6	7	0.01	0.01
Use credit card	28	25	-0.02	-0.02
Bank loan	5	8	0.02**	0.03**
Borrow from friend or family	11	14	0.03	0.02
Using a payday loan, deposit advance, or overdraft	3	6	0.02**	0.02**
By selling something	8	10	0.02	0.02
Not able to pay for the expense right now	15	17	0.02	0.01
Cannot cover a \$400 expense	49	54	0.050**	0.038*

Table A5. Share of Treated Respondents Reporting Different Methods for Paying a \$400Expense, by Order in which Response Options were Displayed

Notes: Forty-nine percent of treated respondents were randomly assigned to be shown payment options in reversed order. Stars indicate whether the share of workers choosing each payment option in the reversed order is statistically different from the normal order. Robust standard errors are reported. * p < 0.1, ** p < 0.05, *** p < 0.01. *Source:* Authors' calculations from survey data provided by NORC at the University of Chicago.

	Cannot cover a \$400 emergency expense				
Variables	(1)	(2)	(3)	(4)	
-	No controls	With controls	No controls	With controls	
Constant	0.506***	0.967***	0.428***	0.971***	
	(0.017)	(0.067)	(0.019)	(0.088)	
Group 3 ("Easy Access")	0.023	0.006	0.003	0.001	
	(0.023)	(0.020)	(0.027)	(0.023)	
Resides in auto-IRA states		-0.014		-0.006	
		(0.024)		(0.028)	
Age		-0.003***		-0.004***	
		(0.001)		(0.001)	
Female		0.064***		0.066***	
		(0.020)		(0.024)	
College-educated		-0.056***		-0.044*	
		(0.021)		(0.024)	
Black		0.071**		0.085**	
		(0.028)		(0.035)	
Hispanic		0.060**		0.101***	
		(0.029)		(0.037)	
Married		-0.008		-0.034	
		(0.023)		(0.026)	
Has retirement accounts		-0.085***		-0.004	
		(0.024)		(0.028)	
Homeowner		-0.113***		-0.102***	
		(0.025)		(0.029)	
Household finance is okay		-0.307***		-0.300***	
or better		(0.024)		(0.029)	
Sample	Groups 2 and 3		Groups	2 and 3	
			who accepted	the experiment	
N	3,213	3,213	2,436	2,436	
R-squared	0.001	0.257	0.000	0.215	
Income controls	No	Yes	No	Yes	

Table A6. Impact of Framing Auto-IRAs as Easily Accessible on Difficulty Covering a \$400 Emergency Expense

Notes: The omitted group is Group 2 ("auto-IRA taxes and penalties"). Income controls include binary indicators of household income in 12 categories. Robust standard errors are reported. * p < 0.1, ** p < 0.05, *** p < 0.01. *Source:* Authors' calculations from survey data provided by NORC at the University of Chicago.

	Preserve funds		Worried about	
	for retirement		taxes and penalties	
	(1)	(2)	(3)	(4)
Variables	No controls	With controls	No controls	With controls
Constant	0.538***	0.517***	0.548***	0.210***
	(0.021)	(0.110)	(0.021)	(0.068)
Group 3 ("Easy Access")	0.065**	0.062**	-0.090***	-0.099***
	(0.030)	(0.028)	(0.030)	(0.028)
Resides in auto-IRA states		-0.054		-0.012
		(0.037)		(0.035)
Age		-0.001*		0.001
		(0.001)		(0.001)
Female		-0.024		0.016
		(0.028)		(0.028)
College-educated		0.062**		0.089***
		(0.028)		(0.029)
Black		-0.048		-0.059
		(0.041)		(0.039)
Hispanic		-0.065		-0.014
		(0.043)		(0.041)
Married		0.018		0.004
		(0.030)		(0.030)
Has retirement accounts		0.077**		0.104***
		(0.034)		(0.033)
Homeowner		-0.081**		0.028
		(0.033)		(0.033)
Household finance is okay or better		0.151***		-0.132***
		(0.033)		(0.031)
	Group 2 and 3		Group	2 and 3
Sample	choosing not to tap and		choosing n	ot to tap and
	accepting the experiment		accepting th	e experiment
N	1,935	1,935	1,935	1,935
R-squared	0.004	0.071	0.008	0.079
Income controls	No	Yes	No	Yes

Table A7. Impact of Framing Auto-IRAs as Easily Accessible on the Desire to Preserve Funds for Retirement and Worries About Taxes and Penalties

Note: The omitted group is Group 2 ("auto-IRA taxes and penalties"). Income controls include binary indicators of household income in 12 categories. Robust standard errors are reported. * p < 0.1, ** p < 0.05, *** p < 0.01. *Source:* Authors' calculations from survey data provided by NORC at the University of Chicago.

	Improved subjective financial well-being			
Variables	(1)	(2)	(3)	(4)
	No controls	With controls	No controls	With controls
Constant	0.497***	0.716***	0.482***	0.813***
	(0.017)	(0.065)	(0.019)	(0.076)
Group 3 ("Easy Access")	0.115***	0.110***	0.118***	0.118***
	(0.023)	(0.022)	(0.026)	(0.025)
Resides in auto-IRA states		-0.026		-0.026
		(0.029)		(0.033)
Age		-0.002***		-0.002***
		(0.001)		(0.001)
Female		0.046**		0.046*
		(0.023)		(0.025)
College-educated		-0.015		-0.023
		(0.023)		(0.025)
Black		0.050		0.049
		(0.031)		(0.036)
Hispanic		0.062*		0.049
		(0.032)		(0.039)
Married		-0.037		-0.007
		(0.025)		(0.027)
Has retirement accounts		-0.110***		-0.135***
		(0.026)		(0.030)
Homeowner		-0.000		-0.026
		(0.026)		(0.030)
Household finance is okay or better		-0.084***		-0.115***
		(0.025)		(0.029)
Sample	Groups 2 and 3		Groups 2 and 3	
<u> </u>			who accepted the experiment	
IN Decement 1	4,822	4,822	4,045	4,045
K-squared	0.010	0.066	0.011	0.082
Income controls	No	Yes	No	Yes

Table A8. Impact of Framing Auto-IRAs as Easily Accessible on Improved Subjective Financial Well-Being

Notes: The omitted group is Group 2 ("auto-IRA taxes and penalties"). Income controls include binary indicators of household income in 12 categories. Robust standard errors are reported. * p < 0.1, ** p < 0.05, *** p < 0.01. *Source:* Authors' calculations from survey data provided by NORC at the University of Chicago.

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