

time to retire: why americans claim benefits early & how to encourage delay

Melissa A. Z. Knoll, Kirstin C. Appelt, Eric J. Johnson,
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abstract

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Tom has worked hard since his teen years and has contributed to the Social Security program for more than 40 years. A week before he turns 62 years old, friends at work point out that he will finally be able to start collecting Social Security retirement benefits. This seems tempting to Tom—after all, he thinks he deserves to start his retirement after so many years in the workforce. He would love to take the trips he has always dreamed about. But claiming now might be a mistake for Tom. If he’s like many Baby Boomers in America, he has about \$150,000 saved,¹ which will only give him

about \$500 a month in retirement income (using the standard rates provided in reference 2).

Tom logs on to the Social Security website and sees that if he claims his benefits now, he will get \$1,098 each month (this is the average monthly Social Security retirement benefit for 62-year-old claimants in 2014).³ He learns that if he waits until he is 66 years old to claim his benefits, he will get \$1,464 a month, and if he waits until he is 70, he will get even more: \$1,932 a month.³ Like the majority of Americans,^{4,5} Tom will have to rely on his Social Security benefits for most of his expenses, such as housing, food, transportation, and maybe even a vacation or two. Suddenly, Tom realizes he may have a lot to think about: Should he take the smaller benefit now or the significantly larger benefit later?

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Thirty-one million Americans are projected to retire within the next decade.⁶ Many, if not all, will face decisions like Tom's—whether about Social Security retirement benefits specifically or about other similarly structured public benefits or employer program benefits.^{7–9} Because people are living longer and retiring earlier,^{10,11} the average American now spends about 19 years in retirement—about 60% longer than in the 1950s.¹² The decision of when to claim benefits significantly affects retirees' financial well-being during this time of life. This is especially true for the many Americans who have little or no money saved by the time they retire.^{4,13,14}

Additionally, recent changes in the retirement savings landscape have put the responsibility of savings and decisionmaking on the shoulders of employees rather than employers.¹⁵ For example, the majority of employees with employer-sponsored retirement plans used to be covered by defined benefit plans, in which the employer provided a retirement benefit guaranteeing monthly payments for life. Now, most are covered by defined contributions plans, in which workers receive a lump sum at retirement and then must make their own decisions about how to manage that money. This means that getting the Social Security benefit claiming decision right is more important than ever. However, many Americans could be making a suboptimal choice: Claiming benefits early significantly and permanently decreases the size of the monthly benefit, yet almost half of all Social Security recipients claim their benefits as early as possible.^{16,17} Why are people claiming their benefits early? How can they be encouraged to delay claiming?

The Claiming Decision

Like Tom, people thinking of claiming benefits have many factors to consider when making this important decision. On the one hand, as people get closer to Social Security's early eligibility age of 62 years, the notion of leaving the workforce and/or tapping into the Social Security funds they have contributed to for years is tempting. Tom could be like the large proportion of Americans who claim benefits as early as possible.^{16,17} On the other hand, waiting to claim benefits provides retirees with more monthly income for the rest of their lives—the longer someone waits to claim benefits (up to age 70 years), the larger the monthly benefit. This extra

money could mean the difference between enjoying retirement and struggling to make ends meet, especially in later years when health care costs may rise and retirement savings may have dried up. Indeed, research suggests that delaying claiming is the wiser economic decision for many.^{10,18,19}

Prospective retirees must weigh the pros and cons of the claiming decision. Given the importance of the retirement decision to their future financial well-being, one might expect that prospective retirees put a lot of thought into this decision well in advance of actually retiring. Unfortunately, surveys show that 22% of people first think about when to start claiming Social Security benefits only a year before they retire. Another 22% first think about it only six months before retirement.²⁰ Research also shows that the retirement decision is malleable and affected by the way the decision is presented.^{21,22}

Not all early claiming is caused by poor health or health-related work limitations.^{4,23,24} Instead, there may be behavioral or psychological reasons why many individuals claim their benefits early (for a discussion, see reference 25). The National Commission on Fiscal Responsibility and Reform, also known as the Simpson–Bowles Commission, advocated in 2010 that the Social Security Administration (SSA) consider behavioral economics approaches “with an eye toward encouraging delayed retirement” (p. 52).²⁶ The commission did this with good reason: Insights from behavioral economics and psychology can help explain why people claim when they do and what can be done to help them make better decisions.

Why Do People Claim Early?

Tom's choice about when to claim benefits is what behavioral economists and psychologists call a classic *intertemporal choice* problem—a choice between getting something smaller now and getting something larger later. In the case of the Social Security benefit claiming decision, choosing to claim sooner means that Tom will have a smaller monthly benefit for the rest of his life, but he gets the benefit starting now. Choosing to claim later means Tom will have a larger monthly benefit for the rest of his life, but he must wait to get it (for an analysis of Social Security retirement benefits, see reference 25; for more general reviews of intertemporal choice, see references 27 and 28).

It is important to note that people faced with intertemporal choices often emphasize receiving the reward right away.²⁹ For Social Security benefits, this may explain why so many people want to claim benefits as soon as possible, a pattern observed in surveys and in administrative data.^{16–18,29,30} We suspect that many people claim their benefits early because, like Tom, they become impatient as the opportunity to claim benefits finally approaches. If this is the case, then interventions that have helped people make more patient decisions in other financial contexts, such as saving for retirement,^{14,31–33} may also affect Social Security benefit claiming.

To explore how people make this intertemporal choice, we applied a psychological theory of decision making called *query theory*, which offers insight into how people make decisions in many contexts.^{34–38} Query theory suggests that many people are just like Tom: When they think about the claiming decision, the first thoughts that come to mind have to do with claiming right away. Thoughts about reasons to wait to claim often only come after thoughts in favor of claiming early. This sequence of thoughts generally leads people to have more thoughts supporting early claiming and to choose to claim benefits early. According to query theory, if people reverse the order in which they consider the choice options, they will change their choice:^{37,39,40} What would happen, we asked, if we altered the order in which people considered the consequences of claiming at different ages?

Can Later Claiming Be Encouraged?

To answer this question, we used query theory to develop and test interventions that encourage people to wait to claim Social Security benefits. First, we tested what we called a *representation intervention*, which passively alters how the options within a choice are presented but does not explicitly encourage people to change how they think about the decision (for examples of representation interventions, see references 41–43). A representation intervention can be as simple as reframing a choice, such as asking employees to contribute to their savings account from a future raise rather than from a current paycheck.¹⁴ In the case of Social Security benefits, later claiming is often framed as a gain (a larger monthly benefit compared with what is received if one claims early). Here, early claiming acts

as a reference point or status quo option. One representation intervention that has had mild success in influencing claiming age reframes the choice options so that early claiming is framed as a loss (a smaller monthly benefit compared with what is received if one claims later).²¹ We developed a representation intervention that communicated this reframing graphically, but it did not encourage participants to change the order in which they considered their options.

We next tested a *process intervention*, an active intervention that changes how people approach a decision. A process intervention for an intertemporal choice problem may simply ask people to focus on the future first (rather than following the common inclination to focus on the present first).^{37,39} We applied this to the Social Security benefit claiming decision by asking people to list their thoughts in favor of later claiming before listing their thoughts in favor of early claiming. This process intervention successfully reversed the order in which participants considered their options and led them to prefer later claiming.

Studying the Claiming Decision

Interventions to change people's behavior must be tested before they are implemented, especially when the stakes are high, which is certainly the case with Social Security claiming decisions. We used a series of three framed field studies⁴⁴ to explore why people claim benefits early and to test how to encourage them to delay claiming. Framed field studies sample from the population that makes the real-world decision and use forms and materials similar to those used in the actual setting. Unlike a randomized control trial, framed field studies do not involve the actual decision and are usually less expensive and time-consuming to conduct. In our case, although participants made hypothetical, nonbinding decisions about their Social Security benefits, the participants were drawn from the relevant target population: older Americans who are eligible or soon to be eligible for benefits. Further, they were presented with realistic decision materials modeled after actual SSA materials. This combination of features offers insight into the decisionmaking process that would otherwise be unavailable and also increases the chances that our results will generalize to the target population. In each study, we asked participants a series of questions through an online survey. (Detailed

methods and results for each of our three studies are available in the Supplemental Material posted online.) Participants ranged in age from 45 to 70 years and were either eligible for Social Security retirement benefits or approaching eligibility.

Study 1: Exploring Impatience

In Study 1, with 1,292 participants, we tested the assumption that prospective retirees tend to be impatient and prefer to claim their benefits as early as possible. We used information modeled after SSA's own materials to explain to participants how benefit claiming works (that is, how the size of the monthly benefit varies as a function of the age at which an individual claims benefits; see Figure 1A). We then asked participants to indicate at what age they would prefer to claim benefits. We found that nearly half of participants preferred to claim before their full retirement age (the age at which people become eligible for their full monthly benefit) and a third preferred the earliest possible benefit claiming age of 62 years (see Figure 2). This mirrors previous survey results as well as observed choices in the real world.^{16–18,29,30}

We found it interesting that participants' decisions depended upon whether they were already eligible for benefits. Those who were eligible to collect benefits were much more likely to prefer claiming early compared with those who were not yet eligible (see Table S2 in the Supplemental Material). This suggests that people may have good intentions to delay claiming, but when the opportunity to claim finally presents itself, the temptation to claim right away can become too strong to resist. This strong preference for immediate rewards is what behavioral economists and psychologists call *present bias*, and it can explain why people make decisions that seem shortsighted.^{45–47} Because present bias applies to immediate rewards and not future rewards, we expected it to contribute to early claiming when individuals were eligible to claim, not beforehand. Indeed, we found that before people become eligible for benefits, factors that are traditionally used in rational economic models of claiming, such as perceived health, predict claiming preferences. (Healthier individuals expect to live longer and spend more time in retirement and thus benefit more from claiming larger benefits later.) In contrast, present bias

Figure 1. Monthly benefit amount as a function of claiming age, assuming full benefit of \$1,000 at full retirement age of 66 years

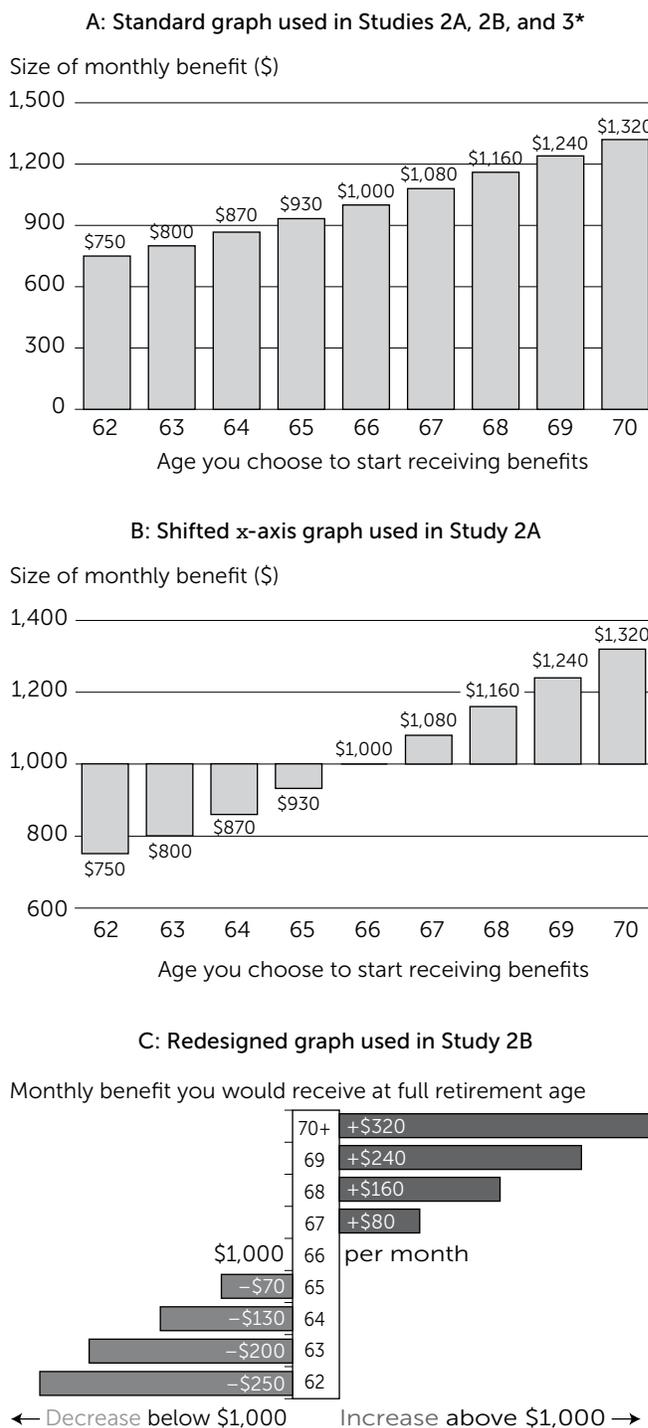
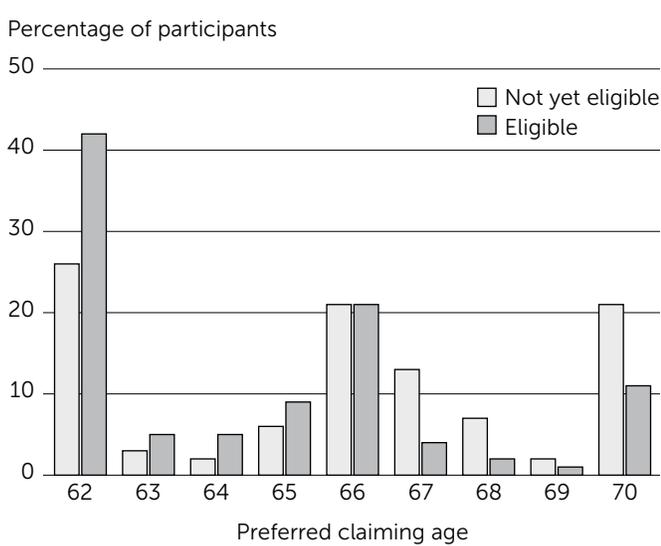


Figure adapted from *When to Start Receiving Retirement Benefits* (SSA Publication No. 05-10147, p. 1), Social Security Administration, 2014. Retrieved from <http://www.socialsecurity.gov/pubs/EN-05-10147.pdf>. (See the Supplemental Material for color versions of figures and detailed methods and results.) *In Study 1, the graph showed the monthly benefit as a percentage of full benefits.

Figure 2. Percentage of participants preferring to claim retirement benefits at each age from 62 to 70 years, by eligibility status, Study 1



predicts claiming for already-eligible participants (see Table S3 in the Supplemental Material). These results are particularly striking given the hypothetical nature of the task: Even though participants were asked to imagine that they were approaching retirement and eligible for benefits, their actual eligibility status influenced their claiming preferences.

Because we successfully replicated real-world trends in claiming behavior, such as a preference for early claiming, we explored the claiming decision further to understand how people make their choice. We predicted that, like Tom, many participants would consider more reasons to claim their benefits early than reasons to claim later. We tested this hypothesis using a previously developed *type-aloud* protocol, often used in query theory studies, which asks participants to type every thought they have as they make a decision.^{36,37} An analysis of these typed-aloud thoughts confirmed that more participants thought predominately about early claiming (42%) than full claiming (18%) or delayed claiming (24%; see Table S4 in the Supplemental Material).

Next, we tested whether query theory—which highlights how the content and the order of thoughts predict preferences—can explain claiming preferences. We predicted that, like Tom, many participants would not only think more about claiming early than claiming later but would also think about claiming early before

they thought about claiming later; this greater prominence (that is, greater number and earlier occurrence) of early-claiming thoughts would then lead participants to prefer to claim early. Using participants' typed-aloud thoughts, we found that the earlier and more participants thought about the benefits of claiming at early ages, the earlier they preferred to claim benefits. The participants with the most prominent early-claiming thoughts (that is, participants scoring in the top 25% on prominence of early-claiming thoughts) preferred to claim benefits over 4.5 years earlier than did the participants with the least prominent early-claiming thoughts (that is, participants scoring in the bottom 25%). Indeed, the content and order of participants' claiming-related thoughts are strong predictors of preferred claiming age even when controlling for benefit eligibility and traditional rational economic factors, such as education, wealth, and perceived health (see Table S2 in the Supplemental Material).

Study 1 showed that when people are shown typical information about benefit claiming, many of them think sooner and more often about reasons to claim their benefits early than about waiting to claim their benefits. This is associated with a preference for early claiming in a hypothetical claiming decision.

Study 2: Shifting the Focus

Using insights from Study 1 as guidance, in Studies 2A and 2B, we tested a representation intervention intended to encourage later claiming. Specifically, we made a number of changes to the standard graph to highlight the economic benefits of claiming later. We expected that these new graphs would make participants think more and earlier about reasons to delay claiming and this, in turn, would lead people to prefer later claiming ages.

We showed 785 participants one of three graphs depicting how the monthly benefit size varies as a function of the age at which one claims benefits: the standard graph depicting benefits as a series of increasing gains relative to \$0 (see Figure 1A), a graph in which we shifted the x-axis from \$0 to the full benefit amount (see Figure 1B), or a graph with an even stronger manipulation that highlighted losses in red and gains in green and rotated the figure to put later claiming at the top of the display (see Figure 1C; a color version of this figure is available in the Supplemental Material). We expected

that making later claiming a visually prominent reference point would emphasize the later claiming option and reframe early claiming as a loss relative to full benefit claiming. This should increase the prominence of later claiming in participants' thoughts and shift participants' preferences to later claiming.

Our results, however, showed that neither representation intervention significantly influenced how participants thought about the claiming decision: Neither modified graph caused participants to think more or earlier about later claiming, and neither graph encouraged participants to prefer later claiming ages. Even though we believe that the graphs clearly make later claiming a visually prominent reference point, it is possible that the specific changes we made to the graphs were not strong or obvious enough to influence participants' thoughts. It is also possible, however, that graphical representations in general may not be an effective way to communicate retirement benefits information. This may be a particularly valuable finding because the SSA currently uses a graph to show how claiming age affects monthly benefits.

Study 3: Active Guidance

Query theory suggests that a process intervention that actively encourages people to change the order in which they think about the choice options can change the choice they make.³⁶ Previous research has shown that asking people faced with an intertemporal choice to focus on the future first encourages them to be more patient and choose a larger, later option over a smaller, sooner option.^{38–40} In Study 3, we applied this query theory–based process intervention to the claiming decision. We expected that asking participants to reverse the order in which they considered early and later claiming (that is, to think about later claiming first) would increase the prominence of later claiming thoughts and this, in turn, would get people to prefer later claiming ages.

We asked 418 participants either to consider reasons favoring early claiming first and reasons favoring later claiming second (that is, the order in which participants consider the options given the standard presentation of benefits information in Study 1) or to consider reasons favoring later claiming first and reasons favoring early claiming second (that is, the reverse order). We found, as predicted by query theory, that participants who

were prompted to consider claiming later before they considered claiming early thought more about claiming later and actually preferred later claiming ages, compared with participants who were prompted to think about claiming in the typical order of early claiming first and later claiming second. In other words, participants focusing on the future first have more prominent thoughts about later claiming, and this leads to a preference for claiming benefits later.

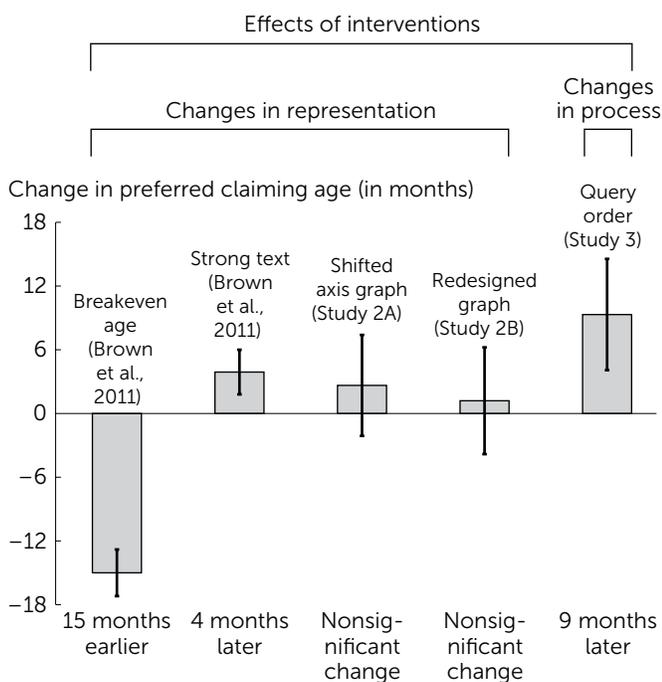
The different types of interventions we tested did not influence choices equally. Our process intervention was more successful than either of our representation interventions. The process intervention led to an average delay in preferred claiming age of 9.4 months, which is substantial when compared with the effects of various demographic and economic variables (for a discussion, see reference 21). Study 3 suggests that process interventions directing people to focus on the future first are a promising approach for nudging older Americans toward later claiming.

Policy Implications

As we described above, our research into consumers' decisions about when to claim Social Security benefits led us to test two types of interventions. In Study 2, representation interventions that changed the graphical depiction of monthly benefits produced nonsignificant delays in preferred claiming age of, at best, 2.6 months. In Study 3, however, a process intervention that encouraged people to focus on the future first resulted in a significant delay in preferred claiming age of, on average, 9.4 months.

Although this may seem like a modest change, it is sizeable when compared with the results of other interventions (see Figure 3). The accompanying permanent increase in monthly retirement benefits translates to substantially more money in the pockets of older Americans. For example, if Tom waited just nine months beyond his 62nd birthday to claim benefits, he would receive an extra \$55 per month (a 5% increase) for life (these calculations are based on models provided by the SSA at http://www.socialsecurity.gov/OACT/quickcalc/early_late.html). If Tom lived to 85 years of age, about the average for his cohort (average life expectancy is averaged across genders and based on results from SSA's Life Expectancy Calculator, found at <http://www.socialsecurity.gov/oact/population/longevity>).

Figure 3. Change in preferred claiming age relative to control (in months), by intervention



Error bars are included to indicate 95% confidence intervals. These bars indicate how much variation exists among data from each group. If two error bars overlap by up to a quarter of their total length, this indicates less than a 5% probability that the difference was observed by chance (that is, statistical significance at $p < .05$).

html), this would add up to \$4,776 in additional benefits. If Tom lived to 100 years of age, this would grow to \$14,658 in additional benefits. The impact of seemingly modest delays is further magnified in aggregate, because more than 38 million Americans receive Social Security retirement benefits each month.⁴⁸

Figure 3 makes another point as well. Choice architecture (that is, the way decision information is presented) is never neutral. Until a few years ago, SSA personnel computed prospective beneficiaries' *break-even ages*, the age when the sum of the increase in monthly benefits from delaying claiming offsets the total benefits forgone during the delay period. This computation was intended to help potential retirees with their claiming decisions. However, as shown in Figure 3, this information accelerates preferred claiming age by 15 months,²¹ which was not SSA's intention. SSA revised its description of benefits (see Figure 1A for a similar description), but Study 1 suggests the new description still leads many people to focus on early

claiming.

Given that all presentations of benefits information will influence choices in one direction or another, it is imperative that interventions be well informed by research. Framed field studies, such as those we have described here, can be extremely useful in designing and testing interventions for important real-world choices. Although this methodology has some constraints (for example, the dependence on hypothetical scenarios), it is a powerful complement to traditional lab and field studies because of its many strengths: sampling from relevant populations (that is, people for whom the retirement decision is real and, in many cases, imminent), presenting participants with realistic stimuli (that is, benefits information modeled on actual materials provided by SSA) to approximate how people normally encounter information, and discovering valuable process understanding insights that lead directly to interventions that may be effective in changing behavior.

We recommend that full randomized control trials be pursued to further evaluate the interventions examined here and explore their effectiveness when the claiming decision is made with real consequences. Such research will likely require collaboration with SSA to expose retirees to interventions and provide access to data on retirees' actual claiming ages. With their new "my Social Security" website (<http://www.ssa.gov/myaccount/>), SSA may have a unique opportunity to prompt consumers to think about early or late claiming, gather consumers' thoughts about claiming, and see how their thoughts relate to their actual claiming behavior.

At the same time, it is important for researchers to continue exploring other process interventions, such as encouraging people to consider decisions in advance and precommit to a given option with the ability to choose differently later. Comparing different kinds of interventions and their effectiveness should be an active area of research both within the domain of retirement decisionmaking and beyond. For example, determining why changing the graphs in Study 2 did not shift participants' thoughts about the claiming decision could help clarify whether graphs are an effective way of communicating benefits information. Such comparisons will also help to determine how different interventions affect a heterogeneous population in which the ideal claiming age differs across individuals and many, but by no means all, people would

benefit from delaying claiming.

More broadly, our studies underscore the point that different types of interventions have different strengths and weaknesses. On the one hand, representation interventions that change the display of choice information tend to require very little effort on the part of decisionmakers; in fact, these interventions are often most helpful for quick or automatic decisions.⁴⁹ For example, rearranging grocery store displays so that fruit is more accessible than candy helps people quickly reach for a healthy snack without thinking much about the decision. On the other hand, representation interventions tend to be very specific and need to be customized to fit each decision—rearranging grocery store displays to encourage healthier eating does not help people make sound retirement decisions.

In contrast, process interventions that change the way people approach decisions may teach a skill that, once learned, can be generalized. Training people to consider an alternative option first is a general skill that can apply to many situations, whether it is considering healthy food before considering junk food or considering saving for tomorrow before considering spending today. Process interventions often ask more from decisionmakers because they must change their decision-making process to some degree. But there may be ways to reduce the amount of effort needed. For example, we are currently researching whether preference checklists can function as a low-effort substitute for type-aloud protocols; initial results suggest that asking participants to simply read and respond to lists of claiming-related thoughts has an effect similar to that of asking participants to type aloud their own thoughts. With their different strengths, representation interventions and process interventions can be used to complement and reinforce each other, helping policymakers design useful interventions. These interventions, in turn, will help individuals make choices to improve their welfare in many different arenas, including retirement benefit claiming.

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supplemental material

- <http://behavioralpolicy.org/supplemental-material>
- Methods & Analysis
- Additional Figures & Tables
- Additional References

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