

ARTICLE THREE IN A MERCER AND STANFORD CENTER ON LONGEVITY SERIES

# KNOWING YOUR FUTURE YOU APPLYING BEHAVIORAL SCIENCE TO IMPROVE RETIREMENT SAVINGS PATTERNS

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Employers, retirement plan sponsors, and their advisors have long scratched their heads over the reasons most Americans have not saved much money for retirement.

Is it lack of knowledge? Are people simply unaware of how much money they need to ensure adequate retirement income? Or are their budgets stretched so thin that there is just not enough money left over to set aside after paying their monthly bills? Maybe it's a lack of motivation — do people prefer to spend today rather than save for a more secure future?

For years, behavioral scientists have been analyzing this phenomenon, and they have studied how people make tradeoffs between present and future rewards. One common explanation for low savings amounts is referred to as "hyperbolic discounting", which means that people value money spent today much more than they value the idea of deferring their spending far into the future. When people are faced with a choice of spending today versus saving for the future, many of us just can't resist spending now. That is because, for most people, buying stuff today provides a much bigger psychological boost than saving money for the future and having to put off their spending for many years.

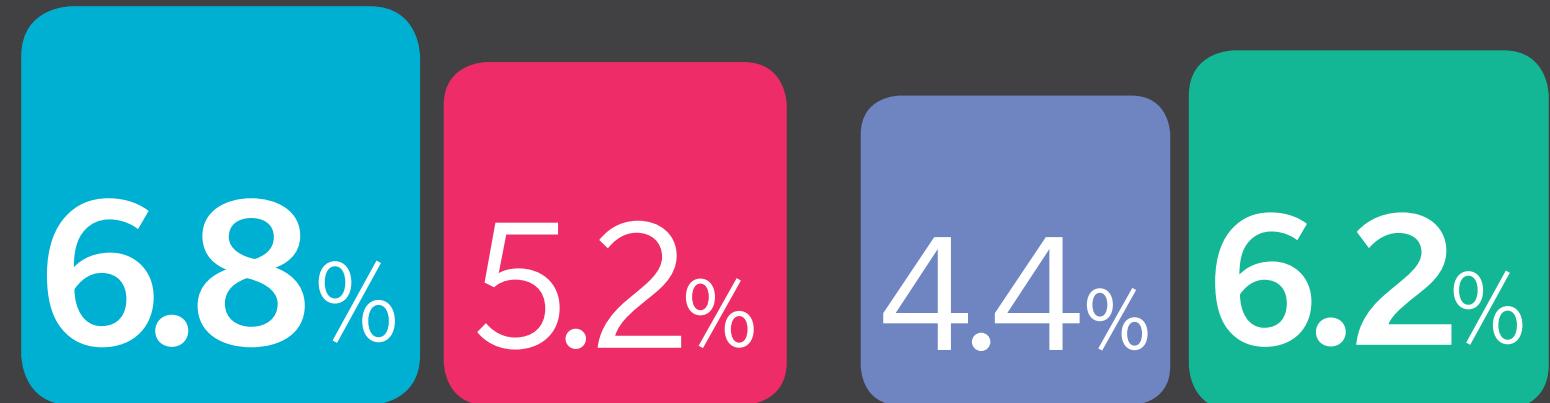
One can argue that the way plan sponsors are presenting information to their participants is actually compounding this problem. It is difficult for participants to imagine what their 401(k) account balances might convert into in terms of a retirement income. Even those forward-thinking sponsors who provide income projections are likely to find that presenting income numbers alone will not change savings behavior. Few participants find it easy to imagine their future selves and circumstances or — in language a psychologist would use — establish an emotional connection to their future selves.

"THE ESSENTIAL DIFFERENCE BETWEEN EMOTION AND REASON IS THAT EMOTION LEADS TO ACTION WHILE REASON LEADS TO CONCLUSIONS".  
DONALD CAINE,  
NEUROLOGIST

Researchers affiliated with the Stanford Center on Longevity (SCL) have been investigating ways to strengthen this “emotional connection” with the future self and subsequently improve savings behavior<sup>1</sup>. Here is how it worked. First, they were able to establish that when people thought about their future selves, the neural patterns that are activated in their brains are surprisingly the same as when they think about a stranger. As a means of trying to counter that effect, the researchers conducted a series of experiments that gave some participants the opportunity to interact with 3-D avatars of their aged selves. Others were simply shown photographic renderings of their older selves.

By doing this, the SCL researchers were able to demonstrate that participants who had viewed their future selves were more willing to increase the amounts they would save for retirement. In one version of the studies, people who saw the age-enhanced photo of themselves were willing to put an average of 6.8% of their salary into a 401(k) plan, while those in the control group, who had not seen such a photo, said they would contribute an average of just 5.2% of their pay. Another version demonstrated increases in desired savings rates from 4.4% of pay to 6.2%.

Fortunately, plan sponsors eager to explore these techniques don't have to buy complicated 3-D software. Applications that automatically age photos are readily available and can be integrated into employee communications. Check out [Merrill Edge's software called Face Retirement](#) if you're brave enough!



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<sup>1</sup> Hershfield et al., *Increasing Saving Behavior Through Age-Progressed Renderings of the Future Self*, Journal of Marketing Research, Vol. XLVIII (November 2011), S23–S37  
<http://people.stern.nyu.edu/hhershfi/resources/Research/JMR-D-ce.pdf>

## Plan sponsors can also draw on the valuable lessons political scientists have learned in studying the question of how to get people to vote.

They have also seen the value of an “emotional connection”. As a result, political campaigns today are allocating a far larger portion of their budgets to activities at the community level so voters can hear about a candidate from someone they know instead of from a “robocall” or mass mailing. Similarly, plan sponsors may find that organizing office-level workshops is a far better use of scarce budgets than glossy planning brochures. Indeed, those workshops present an ideal opportunity to help participants make the connection to their future selves.

We advocate an approach that starts with a technical demonstration of the tools available to save more and plan for retirement. Then, instead of asking participants to imagine their future selves, we suggest asking them to imagine a short list of their financial needs in their old age. This presents the opportunity to take advantage of another observation from the political science community — “the planning effect”. Individuals asked to imagine how they will organize themselves to get to the voting booth are more likely to actually go! Workshop participants can be asked to plan the steps they will take to meet their future financial needs using the tools previously demonstrated.

It is interesting to contemplate whether these techniques and technologies can also be used to motivate healthy habits. According to the recently released book, *The Longevity Project*<sup>2</sup>, the personal characteristic most associated with longevity is conscientiousness. That makes sense — people are more likely to eat their vegetables, exercise, and save for the future if they are the type to stick to a reasonable action plan. If seeing their future self can help people be more conscientious about saving for retirement, it might work for improving their health as well. Imagine seeing a very realistic photo of yourself as an excessively aged person in your 70s and 80s — exactly what could happen if you do not eat right and exercise — compared to another photo of yourself as a fit, vital, healthy senior citizen. That could indeed provide a needed boost to motivate many Americans to take better care of their health, so they would be able to spend the money they have saved on more satisfying things than doctors and hospitals.

# INSTEAD OF ASKING PARTICIPANTS TO IMAGINE THEIR FUTURE SELVES, WE SUGGEST ASKING THEM TO IMAGINE A SHORT LIST OF THEIR FINANCIAL NEEDS IN THEIR OLD AGE.

<sup>2</sup> Friedman HS, Martin LR. *The Longevity Project: Surprising Discoveries for Health and Long Life From the Landmark Eight-Decade Study*. Penguin Group (USA), 2012.

In short, plan sponsors who have been frustrated by the limited changes in behavior that communication and education exercises have delivered now have an opportunity to produce a very different outcome by making the “emotional connection”. The robust lessons from psychology, behavioral finance, and political science are truly the next frontier in the design and communication of employer-sponsored retirement and benefit programs

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