

Another Penny Saved

The Economic Benefits of Higher US Household Saving



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Foreword: A message from our Steering Committee

Economists of every school have always recognized savings as the source of investment that fuels an economy's long-term growth. Nations whose citizens and leaders have acted on this insight have gained powerful competitive advantage over time. Saving, in short, can ultimately translate into rising living standards and a more stable economic environment.

Too often in recent years, however, American policy-makers and media pundits have treated savings as a mere “leftover”—after deducting consumption from a nation's total output. And many remain worried about saving as a potential drag on growth, fearing what John Maynard Keynes called “the paradox of thrift”—a downward spiral driven by falling consumption.

Yet policies that foster saving are ultimately aimed at prosperity—not austerity. Nations that adopt well-crafted saving policies stand to win over time, through their citizens' personal solvency and independence, as well as the investments those citizens' savings fund. America's own retirement saving system, for example, based mainly on workplace payroll deductions, has played a major role in creating the world's deepest and most liquid capital markets.

Policy-makers in Washington have been tempted in recent years to simply cut back saving incentives in our tax code. They mistakenly treat saving deferrals as a pure “tax expenditure,” even though some revenues are captured when retirees draw down their balances—and they fail to realize that private savings today means less government spending on safety net programs in the future. Based on this serious category error, multiple proposals have been made to curb or even eliminate saving incentives in order to capture more revenue for the government.

This misguided line of thinking effectively pits Americans' personal solvency against national solvency—even as we face the widely acknowledged risk of a retirement savings shortfall for millions of workers. Given currently low US saving rates, any move to reduce saving incentives would not only risk a rise in elder poverty, but undercut America's long-term growth potential.

By contrast, as you will learn in this report, policies that succeed in raising household saving can enhance America's ability to finance its future, lift potential growth rates, and contribute trillions of dollars in added output—and higher living standards—over the coming decades.

Oxford Economics' study, *Another Penny Saved: The Economic Benefits of Higher US Household Saving*, offers dramatic evidence that raising America's household saving rate should be a policy imperative—with benefits to both Americans and America's economy.

This project has brought together an extraordinary, widely diverse group of sponsors drawn from the financial services, non-profit, and policy-analysis communities, representing tens of millions of Americans. We are proud to be part of this project, which we hope will spur a lively national conversation—and action—to raise America's household saving and help secure a more prosperous future.

Another Penny Saved is produced by Oxford Economics in conjunction with a group of financial and public-policy organizations that have come together to encourage an open debate and positive action on increasing saving to renew America's economy. Supporting companies and organizations are: AARP, the American Society of Pension Professionals & Actuaries, the Aspen Institute, Bank of America Merrill Lynch, the Financial Services Roundtable, John Hancock Financial, LPL Financial, Natixis Global Asset Management, the New England Council, Putnam Investments, and the US Chamber of Commerce.

EXECUTIVE SUMMARY

The importance of saving

Americans have fallen out of the saving habit. According to the Bureau of Economic Analysis, the household saving rate, which fell to low single digits in the run-up to the 2007–08 financial crisis, is just 3.8% today,¹ and over 75% of Americans do not have enough saved to cover six months' expenses,² whether the need arises because of job loss or an unexpected life event. Projecting the current rate forward, and adjusting only for the aging of the population, we found that the saving rate will fall to an extremely low 3% in the 2030s.

Unless they can boost their saving during their working years, as they approach retirement age many US households will have to choose between working much longer, accepting a lower standard of living in old age—or running out of money altogether. Inadequate household saving is also a critical issue for the nation as a whole: with businesses expected to spend down their existing cash hoards, and government unlikely to run a fiscal surplus for years to come—if ever—a larger portion of national saving to finance business investment will need to come from households. Otherwise, undersaving will either place the economy on a slow growth path as domestic investment in productive assets slows to match domestic saving, or investment strengthens but is financed with ever-increasing external debt, potentially undermining economic stability and the value of the dollar.

Policy-makers should view saving incentives as promoting individual long-term economic security and national long-term economic prosperity. But in practice, they often focus on reducing incentives to meet short-term goals. Caught up in successive efforts to stimulate consumption, reform the tax code, and reduce the deficit, Congress in recent years has entertained a series of proposals that would curb tax-based saving incentives.

Instead of retrenching, the retirement saving system needs to be enhanced to address the challenges it presents to potential savers. Many employers, for example—especially small and medium-sized businesses—still do not offer 401(k) plans or other opportunities for their employees to save through payroll deductions.

Working with a group of partners drawn from the financial services, non-profit, and policy communities, we conducted a rigorous study of US saving patterns and their impact on both household financial security and the prospects for the nation's economy as a whole. Our research drew on original macroeconomic analysis of saving patterns, the impact of lower saving on households and the larger economy, and the potential impact of a shift to higher saving rates. Through our research, we found that:

- **The saving gap is large for many households—especially lower-income individuals and families—and filling it will be a struggle.** We analyzed the latest modeling results from the Employee Benefit Research Institute to determine the extent to which US households are currently undersaving. These numbers reveal that the saving gap—the difference between their projected lifetime savings and the amount they would need to support an adequate lifestyle in retirement—is a scant

Unless they can boost their saving during their working years, as they approach retirement age many US households will have to choose between working much longer, accepting a lower standard of living in old age—or running out of money altogether.

¹ US Department of the Treasury, US Economic Statistics—Quarterly Data. <http://www.treasury.gov/resource-center/data-chart-center/monitoring-the-economy/Documents/quarterly%20ECONOMIC%20DATA%20TABLES.pdf>.

² <http://money.cnn.com/2013/06/24/pt/emergency-savings/>.

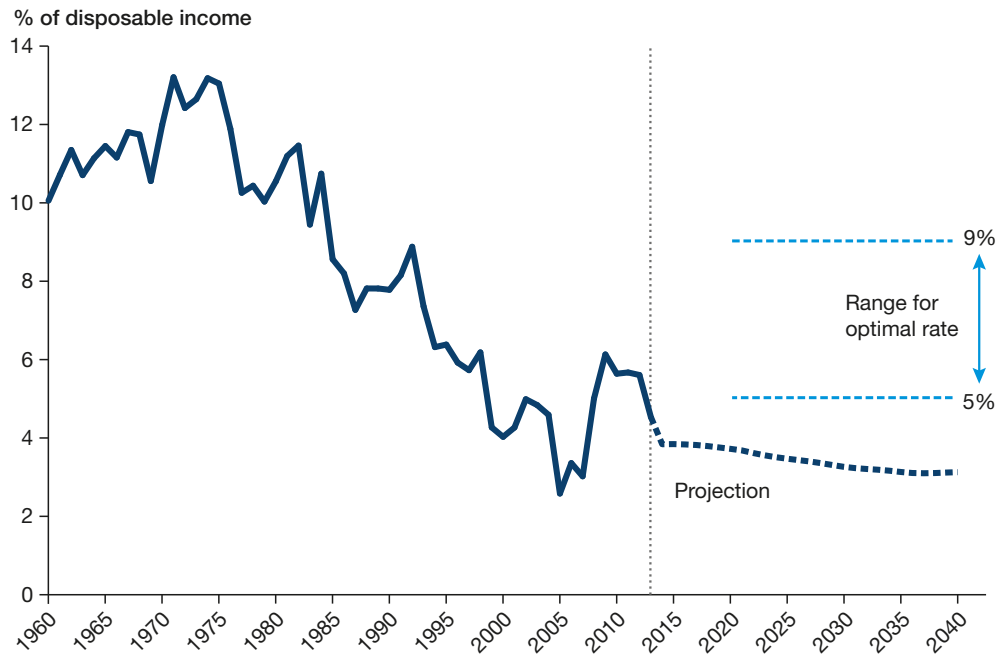
0.15% for the top 25% of households by total income. Those in the bottom quartile, however, need to save about 21% more of pre-tax income than they already do, on average, and even those in the second-lowest quartile will need to save an additional 4%, more than the current average saving rate for households.

■ **An optimal, or healthy, range of investment for the economy as a whole would equal 20%–25% of GDP.** Until recently, the US had no problem staying within this range—but only by borrowing increasingly from overseas investors, reflected in a large current-account deficit. Unless the household saving rate increases, getting back to that healthy range for the long term will mean relying even more heavily on foreign capital, resulting in greater exposure to capital flight and currency volatility. To achieve a more sustainable profile for the US’s net foreign borrowing, the household saving rate will have to increase by one to five percentage points over current levels, or to between 5% and 9% of GDP (see Fig. 1).

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Fig. 1: Estimating the optimal household saving rate

US: Personal saving rate forecasts*



*Profile based on projected demographic trend
 Source: Bureau of Economic Analysis, Oxford Economics

■ **A boost in saving would make the US less dependent on foreign capital, make households more secure, and strengthen long-term economic growth.** If investment rose to average 22.5% of GDP in the long run—the midpoint of our healthy range—matched by higher household saving, we found that GDP would be about 3% higher in 2040, equivalent to about \$3,500 per person in today’s prices. Incrementally, the additional GDP would amount to a net present value of \$7 trillion—equivalent to about half of US GDP today. Not only would the US generate greater household wealth, but the economy would be better insulated from international capital shocks.

The importance of government policy in encouraging saving

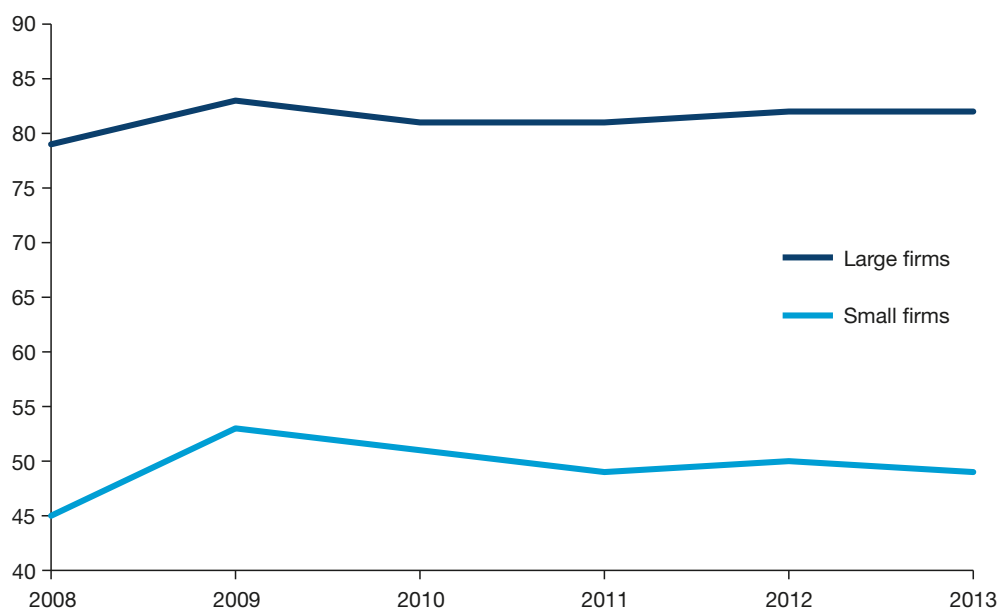
Underlying the US retirement saving framework, however, is a complex interplay between government incentives, household decision-making processes, and employers' decisions about whether to offer saving plans and payroll deductions in the first place. The most powerful factor encouraging greater saving is the opportunity to save for retirement through payroll deductions at work—and the willingness of employers to offer these plans.

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Employers must be supported so they can provide a plan for their employees. While 401(k)s and similar plans have become widespread among larger employers, small firms are currently much less likely to offer them because of the costs involved (see Fig. 2). Extending these opportunities to save at work through payroll deductions could get millions more workers to save. It's important, then, that lawmakers and regulators, at a minimum, don't make the rules governing workplace plans more onerous.

Fig. 2: Smaller companies are less likely to offer retirement saving plans

% of employees with access to any retirement (DB or DC) plan at small (<100 employees) and large (≥100 employees) firms



Source: BLS National Compensation Survey

Once a workplace plan is established, employees must be encouraged to take it up. Incentives come in three principal types—two of them behavioral, one financial:

- **Nudges** rely on workers' intuitive judgments and educated guesses to take a specific action, rather than financial rewards. In one study, when randomly selected workers received an email asking them to sign up for the company's 401(k) plan that included a high savings goal example, their saving rose by up to 1.9% of income.³

³ James J. Choi, Emily Haisley, Jennifer Kurkoski, Cade Massey, "Small cues change savings choices." NBER Working Paper No. 17843 (2012).

Evidence suggests that behavioral approaches—passive incentives and nudges—have a more powerful effect on saving practices than active incentives.

- **Passive incentives** set default options that encourage an individual to save unless she specifically opts out. The most common passive incentives are automatic enrollment and escalation.⁴
- Matching contributions from the employer are an example of an **active incentive**, pushing the individual to take specific actions to obtain financial rewards.

Evidence suggests that behavioral approaches—passive incentives and nudges—have a more powerful effect on saving practices for most employees than active incentives. Active incentives target active savers, who tend to be wealthier and more financially savvy. But because plan sponsorship is voluntary in the US employment system, the impact of active tax incentives on the voluntary sponsorship of these plans by employers is extremely important. Smaller-business owners tend to be active savers, and active incentives are needed to ensure that this group provides work-based plans to all of its employees.

Active and passive incentives, nudges, and the availability of options geared to a long-term asset-accumulation strategy, such as target-date funds, can be combined to create a retirement saving framework that provides adequate retirement income—with automatic participation, steadily growing contributions, and a long-term, consistent investment strategy.

From debt to saving—key strategies

Achieving a pro-saving, pro-growth policy set within the boundaries of a private-sector system will require government, employers, and financial services providers to work together. Public policy, therefore, should never pit personal solvency and national solvency against each other in a misguided quest for fiscal savings.

- **Existing saving incentives and vehicles should be preserved and restructured** to maximize savings, both in aggregate and among the groups currently least able to save, including the large proportion of workers not covered by workplace plans. Matching contributions and other enhanced incentives to support saving by low-income Americans, such as refundable tax credits, should be considered.
- **The success of workplace payroll saving plans should be recognized as the prime driver of asset accumulation for working Americans.** Employers should be encouraged to automate features and direct participants to adopt more appropriate deferral rates.
- **Working households have a role to play in this process as well.** Employees can push for other workplace opportunities that their employers may have overlooked. The person who is self-employed or between jobs can urge her elected representatives to broaden access to tax-advantaged saving vehicles, or to liberalize rules governing contributions.

⁴ Schlomo Benartzi and Richard Thaler, “Heuristics and biases in retirement savings behavior,” *The Journal of Economic Perspectives* (2007): 81–104.

1

Why it's important to save

Saving is vital to any country's economic health, both at the household and national levels. For households, saving builds resilience against recessions and life events and creates wealth that can ensure citizens an adequate income in retirement. For any nation, saving provides a vital engine for long-term economic prosperity and stability. In the US, saving has helped to create the world's deepest and most liquid capital markets and a dynamic, entrepreneurial economy. Nations that work to encourage and nurture saving stand to gain a competitive advantage over time, along with rising standards of living for households.

Maintaining a healthy national saving rate is neither simple nor easy, however. Savings can come from three places: business, government, and households. Going forward, US business is not expected to add to its existing hoard of cash as it reinvests in productive capacity. Government, meanwhile, will not be adding to national savings anytime soon; while fiscal deficits are declining, no surplus is projected over the next decade and beyond. That leaves households as the crucial source of national saving.

The US personal saving rate fell to low single digits in the run-up to the 2007–08 financial crisis, and is currently just 3.8%.

But US households are not saving enough. The personal saving rate—saving as a percentage of disposable income—fell to low single digits in the run-up to the 2007–08 financial crisis, and is currently just 3.8%. Over 75% of Americans do not have enough saved to cover six months of expenses.¹ With growing numbers of Baby Boomers leaving the workforce, the aggregate saving rate is expected to fall even further, even if household saving behavior remains the same. Projecting the current rate forward,² and adjusting only for the aging of the population, the saving rate will fall to an extremely low 3% by the 2030s (see Fig. 3), suggesting that younger Americans are not saving enough to generate adequate retirement income.

If Americans are not able to save a significant amount of financial capital, millions of working households will have to choose between working much longer, accepting a lower standard of living in retirement—or running out of money altogether.

But inadequate household saving is also a critical issue for the nation as a whole. Economic growth may be weakened if older Americans fail to save adequately during their working years and their post-retirement consumption—a major factor buoying the economy during recent recessions—declines, says Jack VanDerhei, research director at the Employee Benefit Research Institute (EBRI). Undersaving at the national level could also place the economy and government on an unsustainable path, marked by an ever-increasing external debt that could ultimately undermine financial stability. In addition, it could mean more government spending diverted from long-term investment in education and infrastructure into the safety net to make up the gap—further hobbling GDP.

¹ <http://money.cnn.com/2013/06/24/pf/emergency-savings/>.

² US Department of the Treasury, US Economic Statistics—Quarterly Data. <http://www.treasury.gov/resource-center/data-chart-center/monitoring-the-economy/Documents/quarterly%20ECONOMIC%20DATA%20TABLES.pdf>.

Fig. 3: Saving rates have steadily declined

US: Personal saving rate forecasts*



*Profile based on projected demographic trend
 Source: Bureau of Economic Analysis, Oxford Economics

“A low saving rate also means less money available for investments in new businesses, technologies, and mortgages, which translates to lower long-term economic growth and fewer jobs,” notes Sen. Rob Portman (R-Ohio), voicing a concern shared by many policy-makers.

Since the housing bubble collapse and financial crash of 2007–08, however, the issue of insufficient saving has taken a back seat as national policy-makers and central bankers have focused on the pressing economic issue of generating recovery from recession. Efforts to reform the US tax code in recent years have mostly focused on flattening tax rates and broadening the tax base rather than refining or expanding the array of saving incentives.

The nascent recovery provides an opportunity to refocus on incentives to save. The employer-based retirement saving system, the single most effective means for working Americans to save, needs improvement to address the challenges it faces. Many employers—especially small to medium-sized businesses—still do not offer 401(k)s or other job-based opportunities for their employees to save through payroll deductions, even though these now form the basis of the US private-sector retirement saving system. Even employees at many of the largest companies still do not feel enough incentive to participate or save more through tax-deferred workplace saving plans like 401(k)s. For self-employed people, participation in IRAs and similar vehicles is even lower.

Despite these concerns, policy-makers in Washington have entertained a succession of proposals that would trim saving-related tax incentives, generally in pursuit of deficit reduction (see “Political and policy constraints on savings growth,” p. 27). Both the tax reform package released this year by House Ways and Means Committee chair David Camp and President Obama’s 2015 budget included tighter rules for tax incentives, for example.³

Policy-makers should view incentives to increase household solvency as reinforcing national solvency—not as competing goals. While they have understandably focused on economic stimulus and deficit reduction in recent years, an improving fiscal picture should allow them to focus on creating a stronger economy for the long run. They must avoid the temptation to discourage saving as they work to restructure the tax code and reduce the deficit, and focus again on incentivizing it.

What are the consequences likely to be if they do not? What are the potential benefits if they do? Working with a group of partners drawn from the financial services, non-profit, and policy analysis communities, we conducted a rigorous study of US saving patterns and their impact not only on household financial security but the future prospects of the nation’s economy as a whole. Our report consists of four sections:

- **Assessing saving rates at the household level.** Here we estimate the magnitude of the US household saving gap, across both income and age groups.
- **Is there a macroeconomic investment gap?** We examine the hazards facing an economy in which investment capital is supplied increasingly by foreign investors rather than domestic household savings.
- **What would be the impact of higher saving?** We consider the benefits to households and the economy of achieving a higher-growth equilibrium in which both saving and investment go up.
- **The importance of government policy in encouraging saving.** We look at how government, employers, and financial services providers can incentivize households to save more.

³ John Manganaro, “Industry Group Defends Retirement Plan Tax Incentives,” plansponsor.com, April 14, 2014 (http://www.plansponsor.com/Industry_Group_Defends_Retirement_Tax_Incentives.aspx); Hazel Bradford, “Obama’s 2015 budget limits retirement tax deductions, increases PBGC premiums,” pionline.com, March 4, 2014 (<http://www.pionline.com/article/20140304/ONLINE/140309959/obamas-2015-budget-limits-retirement-tax-deductions-increases-pbgc-premiums>).

The up-and-down history of the US saving rate

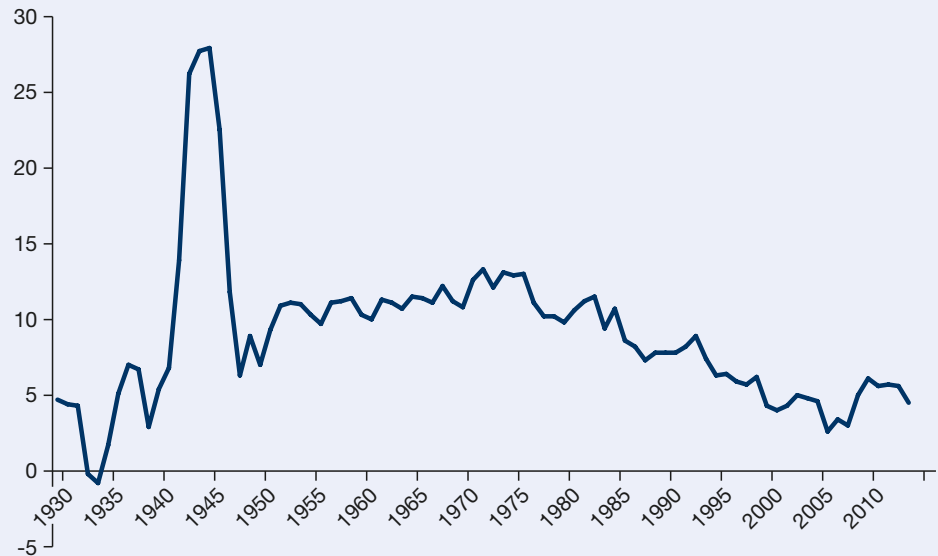
Americans seem to have grown accustomed to low levels of household saving over the past three decades. Over that period, the personal saving rate has averaged 5.9% of disposable income; it currently rests at just 3.8%.

But it was not always so. From 1950 to 1985, personal saving averaged a much higher 11.1%, while from 1941 to 1945—the World War II years—the saving rate averaged 23.6%, peaking in 1944 at a remarkable annual average of 27.9%, more than seven times today’s rate.

Fig. 4: A 30-year decline in personal saving

Personal saving rate

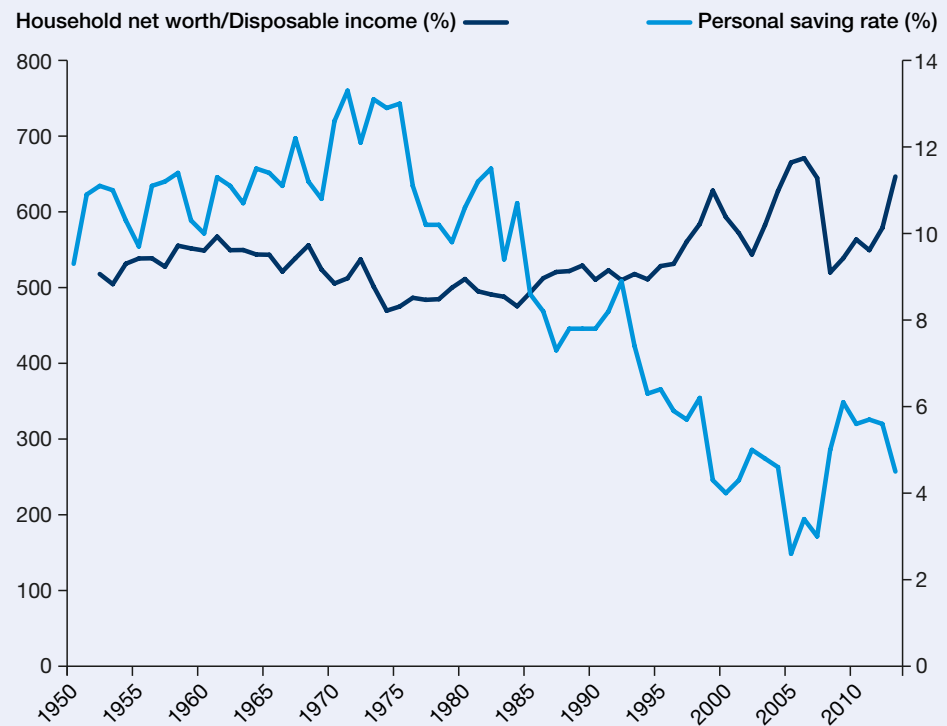
% of disposable income



Source: Bureau of Economic Analysis

The war years were an exceptional period when saving was not voluntary but reflected a rare combination of near-full employment and government-mandated rationing of consumer staples. But that still leaves the so-called “golden age” that followed the war, a prosperous era when GDP soared, income rose broadly, productivity expanded rapidly—and both consumer spending and personal saving grew.

After 1984—the last year it reached double digits, at 10.7%—the saving rate began to slide. One long-standing hypothesis explaining the decline focuses on the growth in household asset values starting in 1985. As a share of disposable personal income, net assets (financial assets and housing) rose from 462% to around 639% currently. As household wealth increases, households feel less need to save for retirement out of current income, since the assets—and net returns they generate—will help fund retirement and other household goals.

Fig. 5: As household net asset values rise, personal saving falls

Note: Household net worth/Income is shown on the left-hand axis of the chart; personal saving rate on the right-hand axis.

Source: FRB, Bureau of Economic Analysis

Researchers have also emphasized the powerful impact that access to credit has on consumption and the saving rate.⁴ The waves of financial innovation that rapidly succeeded one another starting in the mid-1980s enabled US households to tap into the unrealized capital gains on their assets, including equities and housing, by borrowing against them. The problem, as we have seen twice in the US within the past 15 years, is that speculation can inflate these assets well above supporting fundamentals, creating asset bubbles—and equity and home prices can then abruptly change direction and decline.

Low saving can thus make households more vulnerable, worsen downturns, and slow recovery. As the asset bubbles collapse, both falling asset values and increased debt burdens ravage the household balance sheet. US households, in aggregate over the past seven years of recession and slow recovery, have curtailed their spending, paid down debt, and—to a limited extent—rebuilt savings. This abrupt shift has slowed the economic recovery. Indeed, household saving levels today are comparable with rates during the late 1930s—the later years of the Depression and another period of slow economic recovery, high unemployment, and episodes of fiscal austerity.

⁴ Christopher Carroll, Jiri Slacalek, and Martin Sommer, “Dissecting Saving Dynamics: Measuring Wealth, Precautionary, and Credit Effects,” IMF Working Paper, September 2012. <https://www.imf.org/external/pubs/ft/wp/2012/wp12219.pdf>.

2

Assessing saving rates at the household level

How big is the saving gap for US households—the difference between what they are expected to save over their working careers and what they will need to generate an adequate income in retirement?⁵ EBRI has conducted some of the most detailed data collection and modeling of saving trends among different population groups. Its model covers households whose head was born in 1974 or earlier (younger generations are not included because they are not yet old enough to accurately predict what their lifetime age and wage profiles will be), and uses a representative sample for the general population, taking into consideration such factors as periods of unemployment, escalating healthcare costs, and provision for long-term care. We analyzed the latest modeling results from EBRI to determine to what extent US households are currently undersaving.

The saving gap for US households in the top quartile for total pre-retirement income is a scant 0.15%—but those in the bottom quartile need to save an additional 21% of pre-tax income, on average, to adequately support themselves when they reach retirement age.

A large saving gap for lower-income households

The research conducted by EBRI projects that, relative to pre-tax income, the saving gap for the top income quartile—those occupying the top 25% by total earned income up to the age of retirement—is a scant 0.15%.⁶ In other words, these high-income households need to save only an extra 0.15% of pre-tax income to provide adequate post-retirement income—that is, the income level needed to cover regular expenses such as food, clothing, and housing, as well as possible healthcare and long-term nursing care, over the remainder of an individual's life.

Many lower-income households, however, face a vastly more worrisome saving gap, even when adding in the value of their housing equity as a means to supplement their retirement income. Those in the bottom quartile for total pre-retirement income need to save around an additional 21% of pre-tax income, on average, to adequately support themselves when they reach retirement age, while those in the second-lowest income quartile need to save an additional 4% of their income, more than the current average saving rate for households (see Fig. 6).

Even these troubling aggregated figures may not reflect the full severity of the problem. The figures represent averages for each quartile, which obscures the fact that even in the top group a significant percentage of households may be undersaving. Looking instead at the proportion of households within each group that are “at risk”—meaning they are not on track to have enough financial capital to adequately fund their expenditures in retirement—shows a potentially more widespread saving deficiency, with over 80% of households in the lowest-income quartile and around 50% of those in the second-

⁵ We use EBRI's definition of adequate income in retirement, which is calculated as the income needed to cover regular expenditures (food, clothing, housing, etc.) and possible healthcare and long-term nursing care over the remainder of an individual's life. We take this definition as a representation of an average household's target for retirement, where some households may target a higher level of expenditure and others a lower level.

⁶ EBRI calculates pre-retirement income similarly to Social Security's average indexed monthly earnings (AIME) computation. All earned income is included up to the age of retirement. Instead of indexing for changes in average national wages, the model indexes based on an assumed after-tax rate of return on asset allocations that is a function of the individual's age in each year. In addition to income from accumulated savings, the EBRI model also includes projected Social Security benefits for the household. Percentile distributions are established based on population statistics for each five-year age cohort, and the households are then split into four income groups.

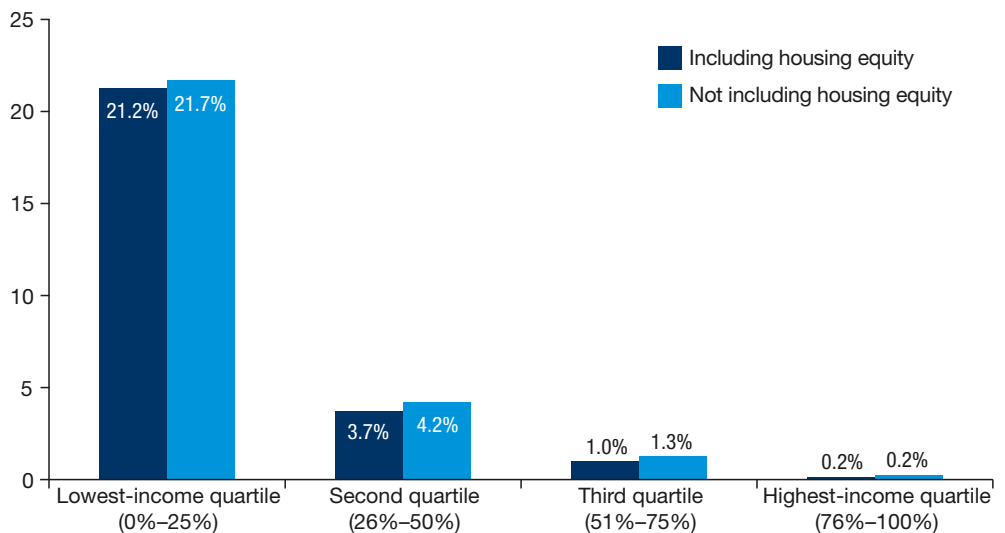
lowest quartile at risk of underfunding their retirement. Even for the second-highest quartile, between 28% and 36% of households are at risk; for the highest, between 13% and 20%, depending on whether housing equity is included (see Fig. 7).

“Since the recession, economic insecurity is creeping up the income scale,” says Jeremy Smith, a policy advisor to the Aspen Institute. “Job insecurity, wage stagnation, high debt levels, and underwater mortgages affect a lot more people in the middle income quartiles. They may have to rely a lot more on personal savings at a time when savings have taken a big hit.”

Over 80% of households in the lowest-income quartile and around 50% of those in the second-lowest quartile are at risk of underfunding their retirement.

Fig. 6: The saving gap varies widely by income—even factoring in housing equity...

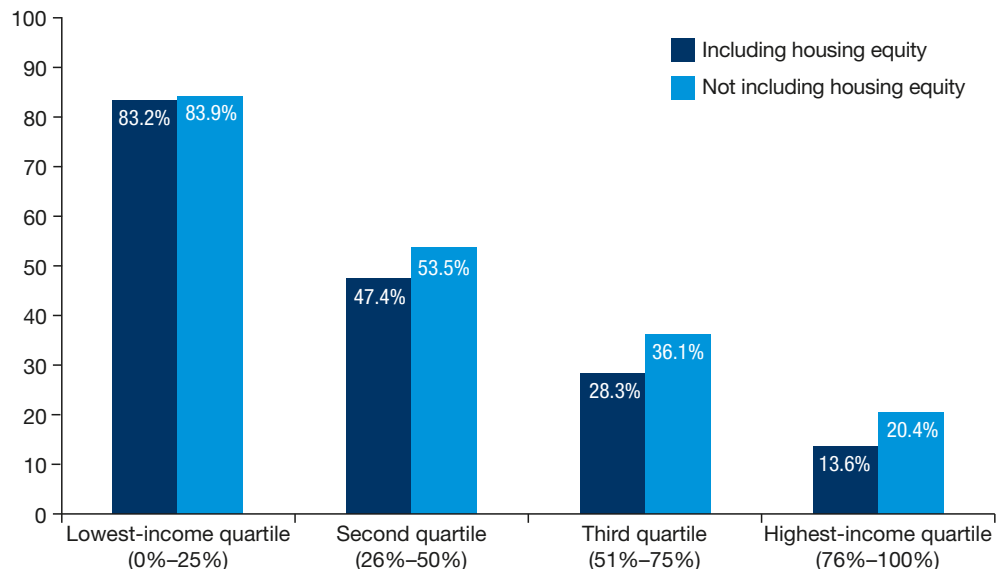
% of additional pre-tax income that needs to be saved to adequately fund retirement



Source: Employee Benefit Research Institute

Fig. 7: ...placing significant groups at risk in all income quartiles

% of households at risk of not having adequate funds for retirement



Source: Employee Benefit Research Institute

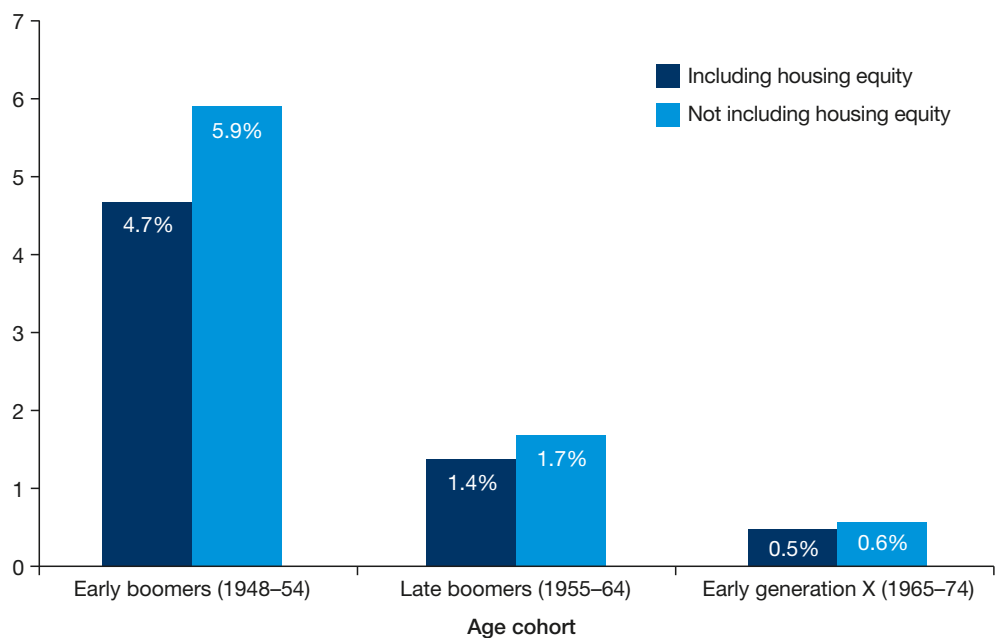
A challenge for older households

Income level is only half of the retirement saving issue—the other half is age. Here, the critical matter is the amount of time households in each income quartile have to earn and save. The challenge is particularly acute, according to EBRI’s estimates, for older workers—especially “early boomers,” those born between 1948 and 1954.⁷ EBRI finds a saving gap of between 4.7% and 5.9% of income for this group, depending on the assumed use of housing equity (see Fig. 8). But again, the average conceals worrying variations. Among early boomers in the bottom half of the income distribution, for example, the saving gap is 28%; some 70% or more of lower-income households in this age group are at risk of having inadequate retirement income.

Similarly, late boomers (those born between 1955 and 1964) in the bottom half of the income distribution still need to increase their saving by about 9% of income. Around 70% or more of these households are at risk of having inadequate retirement income.

Fig. 8: A larger saving gap for older households

% of additional pre-tax income that needs to be saved to adequately fund retirement



Source: Employee Benefit Research Institute

Other studies that focus on age and income groups also find certain categories of households especially vulnerable. For example, a study released last year by the Pew Charitable Trusts, focusing on total net worth of different age groups, found that Gen Xers lost a staggering 45% of their wealth in the last recession—an average of some \$33,000—while early and late boomers lost 28% and 25%, respectively. Pew projected that Gen Xers will have enough resources to replace only about half their pre-retirement income,⁸ typically not enough to cover the fast-rising costs of necessities such as healthcare, even if they downsize.

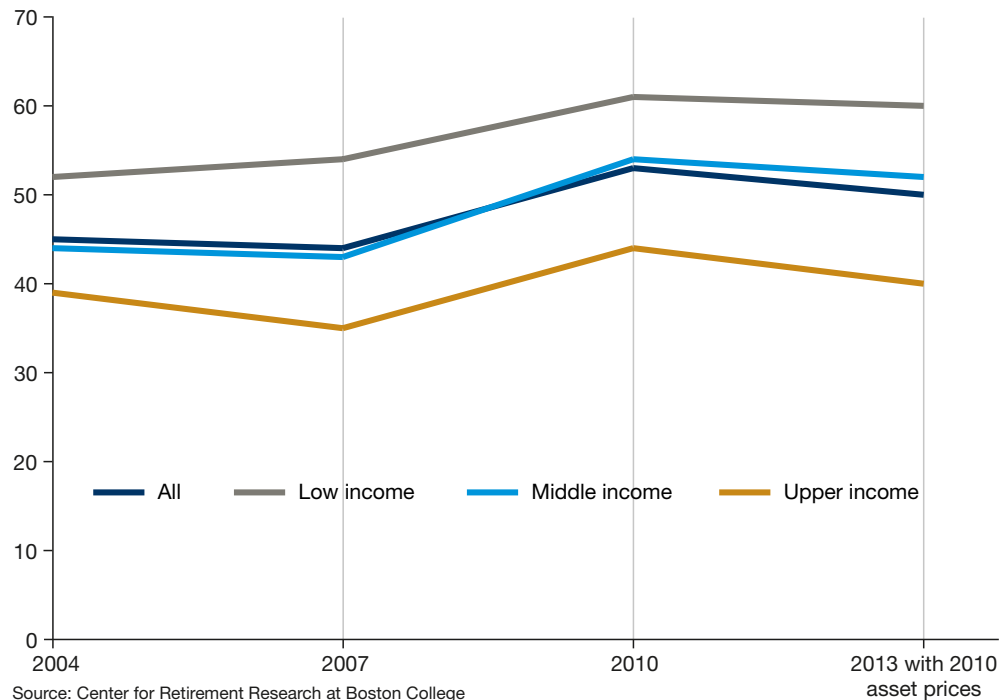
⁷ The saving gap is larger for older households as they have fewer years between now and retirement (assumed to be 65) to make up any deficit.

⁸ “Retirement Security Across Generations: Are Americans Prepared for Their Golden Years?” The Pew Charitable Trusts, 2013. www.economicmobility.org.

Even taking into account the rebound in asset and housing prices since the financial crisis, the Center for Retirement Research at Boston College found that as of 2013, half of all US households remained at risk of experiencing a lower standard of living in retirement, only slightly down from 53% in 2010 and up from 44% in 2007. Among low-income households, 60% remain at risk of seeing their standard of living fall, compared with 54% in 2007. Even among high-income households, the at-risk group is higher today than in 2007—40% versus 35%.⁹

Fig. 9: Post-recession, more households are at risk

% of households at risk of experiencing a lower standard of living in retirement



While some households have been saving adequately for their old age, the most recent studies send a clear message: significant proportions of households, even some top earners, are at risk of not being able to maintain their standard of living in retirement.¹⁰

9 Alicia H. Munnell, Anthony Webb, and Rebecca Cannon Fraenkel, “Will the rebound in equities and housing save retirements?” Center for Retirement Research at Boston College, Issue in Brief, December 2013, Number 13–17.

10 Some researchers are more sanguine. For example, using a life-cycle model that incorporates uncertain lifetimes, uninsurable earnings, uninsurable medical expenses, and borrowing constraints, Scholz and Seshadri (2008) find that “only 4 percent of [Health and Retirement Study] households have net worth below their optimal targets in 2004, though this percentage is somewhat higher for more recent HRS cohorts.” See John Karl Scholz and Ananth Seshadri (2008), “Are All Americans Saving ‘Optimally’ for Retirement?” University of Michigan Retirement Research Center working paper WP2008–189. A more recent study by the same authors also finds that “most Americans seem to be preparing well for financially secure retirements.” See John Karl Scholz and Ananth Seshadri (2012), “The Interplay of Wealth, Retirement Decisions, Policy and Economic Shocks,” University of Michigan Retirement Research Center working paper WP2012–271. Nevertheless, as our analysis of the EBRI data shows, some key groups are clearly undersaving for retirement.

3

Is there a macroeconomic investment gap?

National saving plays a key role in creating a stable, secure, and prosperous economic environment, and securing a sustainable level of investment and consumption. In the last decade in particular, the US has financed investment not just through domestic savings, but by taking advantage of net capital inflows (see “Fueling US capital markets,” p. 14). Foreign investors have been happy to hold what they regard as safe US assets—and this has allowed the US to run continuous deficits on the current account of its balance of payments as the counterpart to low levels of domestic saving.

At some point in the future, however, the US will need to increase the share of investment that it finances through domestic saving. Otherwise, there is a risk that, as America’s net foreign indebtedness increases, foreigners’ perceptions of the safety of US assets will be eroded, which could expose the economy to destabilizing episodes of exchange rate volatility. Policies that boost household saving can therefore play a beneficial role in increasing national saving and reducing dependence on foreign borrowing.

Correcting imbalances in international saving and investment is a complex problem, and higher national saving in the US is only part of the solution. L. Josh Bivens, chief economist at the Economic Policy Institute, traces the US savings-investment imbalance to the Asian debt crisis of the mid-1990s, which prompted developing nations that are large US trading partners to stockpile foreign-exchange assets—principally US Treasury bonds. “Too often, people think the cause-and-effect runs from US households deciding to do something, through the rest of the world adjusting to it,” he says. But “the really crucial variables over the last ten or 15 years have been things that happened at the international level” that affect exchange rate relationships and the US trade deficit.

Clearly, however, US household saving has a crucial role to play. Oxford Economics has developed a framework that enables us to highlight the beneficial role of saving in alleviating the risk of an unsustainable build-up in net US indebtedness to the rest of the world. We started by benchmarking the rates of investment needed for the US to ensure a steady improvement in prosperity and living standards. We then asked if current trends in national saving are sufficient to fund that level of investment, and how much households would need to change their own saving practices to achieve sufficiency and avoid an unsustainable increase in reliance on foreign capital.

Determining the optimal, or healthy, investment rate is a complex exercise that depends upon a number of factors, including:

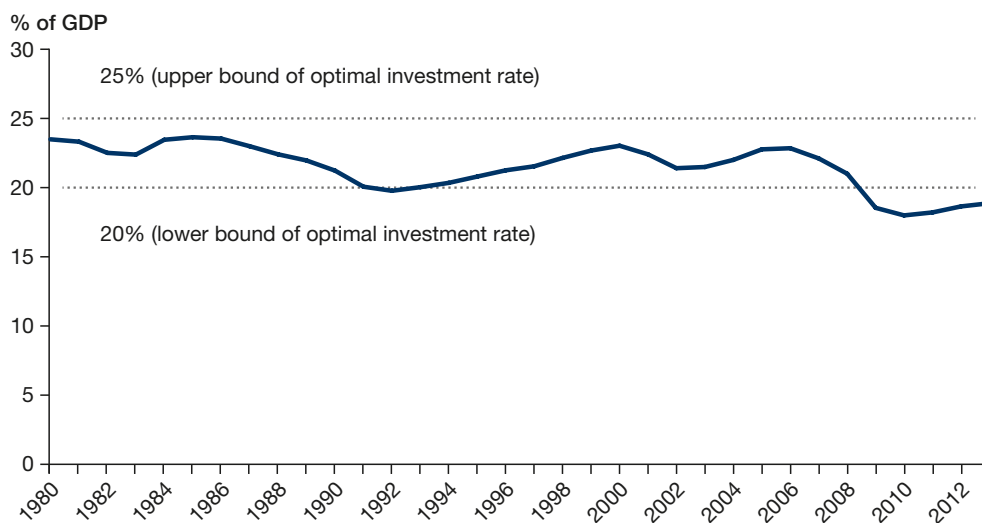
- The importance of capital in production,
- The rate of technological progress,
- The social rate of time preference¹¹ for consumption today over consumption tomorrow,
- The rate of depreciation, and
- Trends in the relative price and efficiency of investment goods.

¹¹ The discount rate we assume society applies to consumption tomorrow relative to today.

Taking these factors into account, and working with standard macroeconomic assumptions and historical trends in investment,¹² we conclude that US investment should fall within a range of 20%–25% of GDP. Investment generally stayed within this range until the 2007–08 financial crash. It was 19% of GDP in 2013 (see Fig. 10).

Fig. 10: Range of investment rates needed to drive healthy economic growth

US: Total gross fixed investment



Source: Bureau of Economic Analysis, Oxford Economics

If the US wants to achieve an investment rate of 25% of GDP in the absence of higher household saving, net borrowing from abroad will have to rise to a level equal to some 150% of GDP in 2040.

Reasonable projections for household, business, and government savings indicate that the three together will collectively continue to fall well short of that healthy 20%–25% range, requiring foreign capital to fill the gap. In particular, demographic changes suggest the household saving rate may continue to decline, and it is reasonable to presume that corporations will revert to their historical net saving rate of close to zero over the medium term. Neither is it likely that the government will contribute to national saving: given the prospect that it will eventually take steps to reduce its fiscal deficit, we expect the budget deficit will not widen in the long term on the scale projected by the Congressional Budget Office.¹³

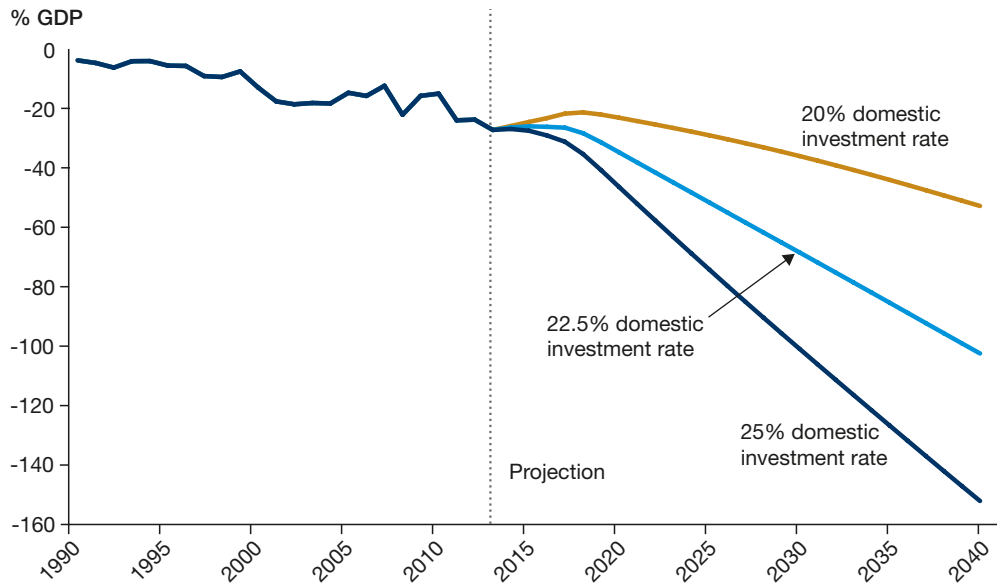
Based on our projections for investment and national savings, then, our analysis suggests that the US will have to rely on substantial amounts of foreign financial capital if it wants investment to climb back into the healthy range. For the US to achieve an investment rate of 20% of GDP, for example—at the low end of our healthy investment band—the level of net borrowing from abroad will need to rise to around 50% of GDP by 2040 (see Fig. 11). However, if the US lifted its investment rate to 25% of GDP—the top end of the healthy band—then in the absence of higher national saving, net borrowing from abroad will have to rise by far more, to a level equal to some 150% of GDP in 2040. In the latter case in particular, such dynamics could easily become explosive.

¹² For our analysis, we rely primarily on inter-temporal neoclassical growth theory developed by Ramsay, Koopmans, and others. We also consider endogenous growth theories, which explicitly model the role of investment and research and development in technological progress.

¹³ We project a deficit of around 3.5% of GDP in the long run, which leads to a gentle fall in the debt-to-GDP ratio over time. The Congressional Budget Office's long-term budget projections show the deficit rising to 6.4% of GDP in 2038, based on the assumption that there is no change in current law. See CBO (2013), "The 2013 Long-Term Budget Outlook," Table 1–2, p. 11, <https://www.cbo.gov/publication/44521>.

Fig. 11: If the US's net foreign borrowing position worsens significantly...

US: Net international investment position

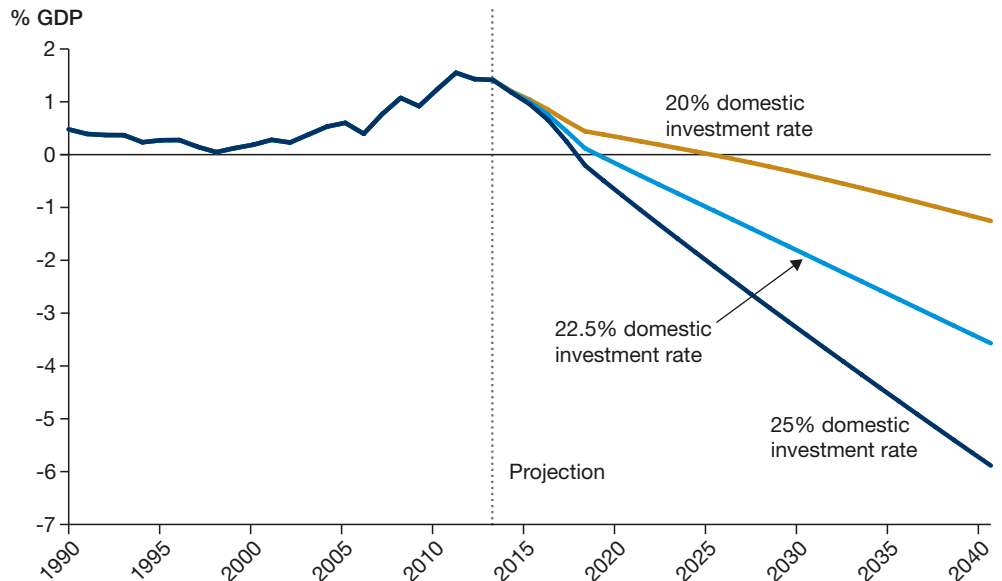


Source: Bureau of Economic Analysis, Oxford Economics

Any significant increase in foreign borrowing also has implications for the US's net investment income from abroad. Although the US is currently a net receiver of income—since the income generated by its foreign assets exceeds the payments made to foreigners holding US assets—this position would eventually reverse as the US's foreign debt stock grows. So in the absence of higher national saving, the US is set to shift from a position of surplus on its net international investment income to running significant deficits of between 1% and 6% of GDP a year by 2040. The shift takes place in all three scenarios we analyzed (see Fig. 12); the timing depends on the investment rate, and could unfold as early as 2020.

Fig. 12: ...then US net investment income will turn negative

US: Net international investment income



Source: Bureau of Economic Analysis, Oxford Economics

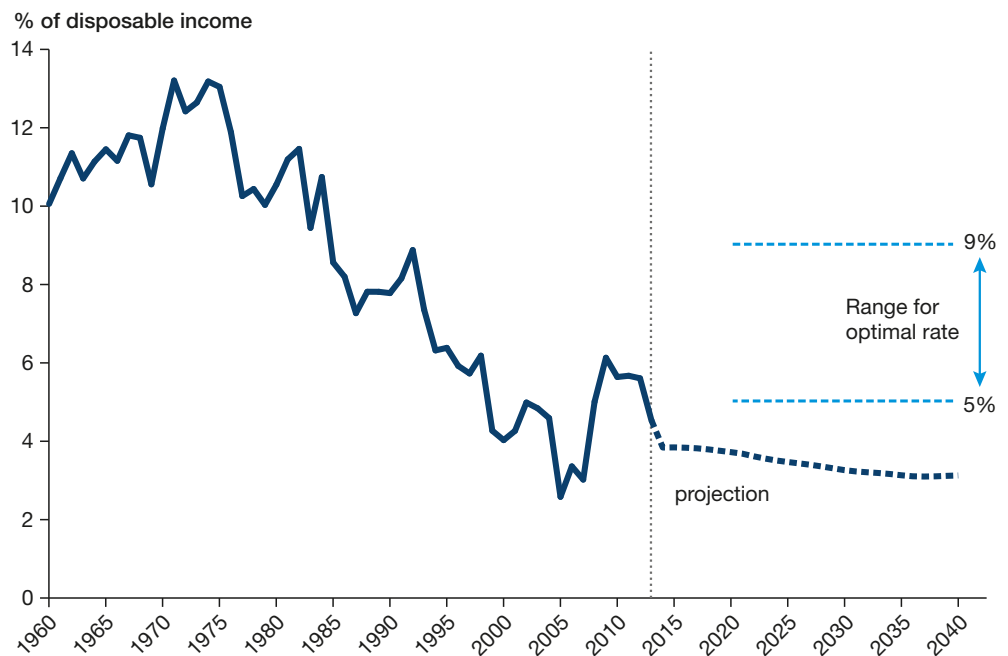
What household saving rate would be needed to ensure that healthy rates of investment do not result in an ever-deteriorating net international investment position? This depends in part on the assumptions we make for the other key elements of our framework: the path for investment, the extent to which foreign investors continue to hold US assets, the fiscal deficit, the corporate saving rate, and the relative return on domestic and foreign assets. Considering a number of scenarios for these factors, we computed a range for the household saving rate that will enable investment to climb back within the healthy band, but will also result in a sustainable profile for the US’s net foreign borrowing.

The healthy household saving rate is one to five percentage points higher than today’s—or roughly double the current saving rate.

The results are sobering. We conclude that the “healthy investment, sustainable foreign borrowing” scenario would require a saving rate that is one to five percentage points higher than today’s (see Fig. 13), at between 5% and 9% of GDP. For the average US household, this will mean roughly doubling its current saving rate.

Fig. 13: Estimating the optimal household saving rate

US: Personal saving rate forecasts*



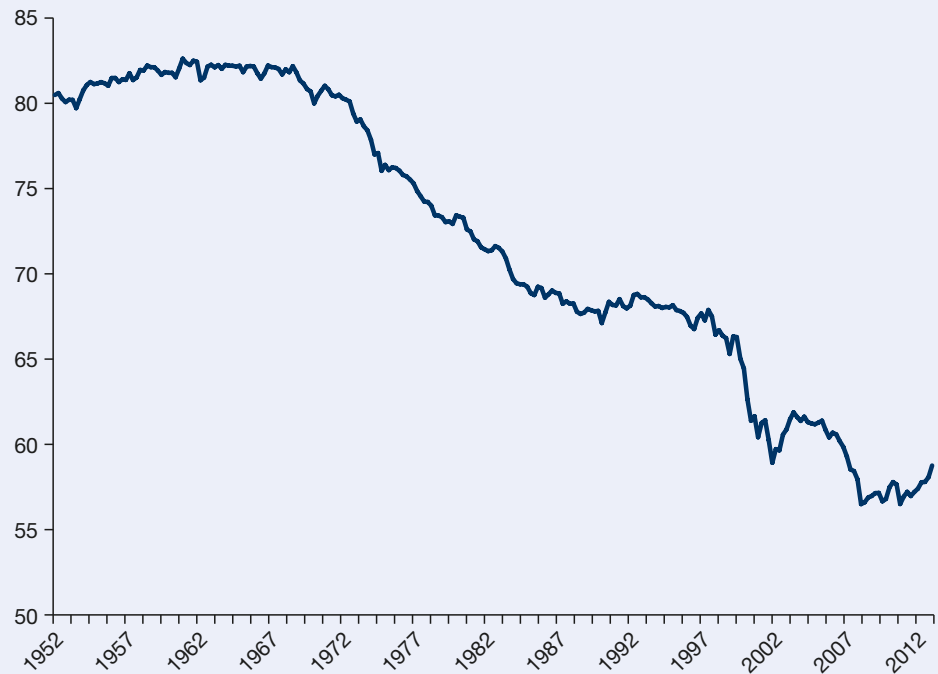
*Profile based on projected demographic trend
 Source: Bureau of Economic Analysis, Oxford Economics

Fueling US capital markets

Household saving is critically important to Americans working to prefund their future spending in retirement and for other purposes—but it also plays a vital role in supplying a stable source of funds to US capital markets. Some 51 million workers contributed \$171.5 billion to 401(k) plans in 2011—the most recent year for which data are available—together with \$95 billion of employer matching contributions.¹⁴ Households’ retirement savings currently amount to almost \$67 trillion, or 59% of the nearly \$114 trillion of financial capital provided by the non-financial sectors to the equity and bond markets—the corporate sector, government, and foreign investors are the other major contributors.

Fig. 14: Domestic households’ share of non-financial capital market assets has fallen...

% share of US non-financial capital market assets held by domestic households



Source: Federal Reserve Board

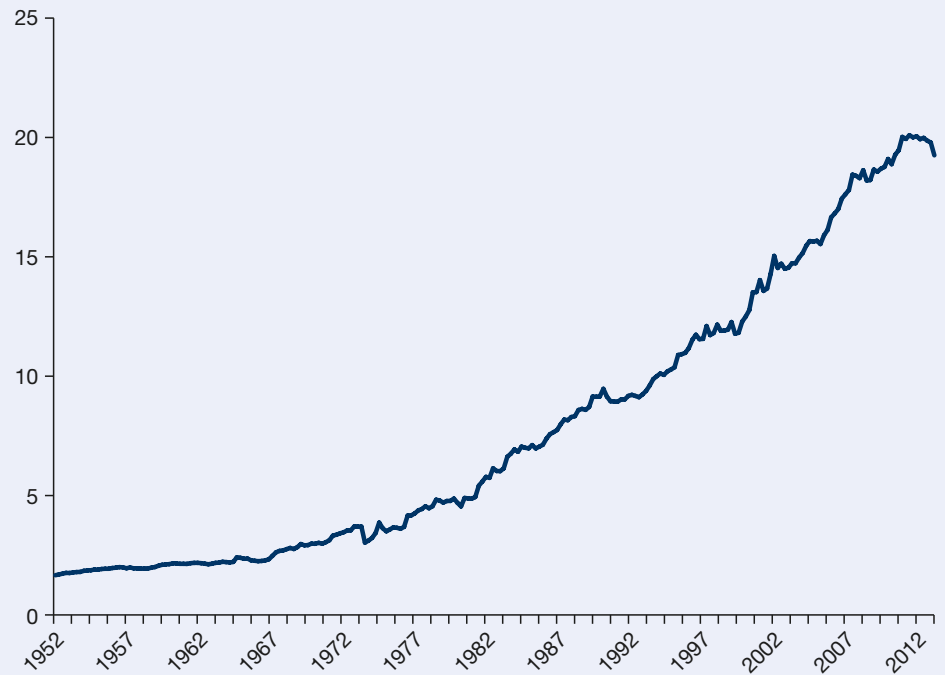
Together, these savings have made the US capital markets the largest, deepest, and most liquid in the world. And the dominance of domestic sectors in the distribution of capital holdings affords American enterprises and government a stable—and relatively inexpensive—source of funds that raises their capacity to produce more goods and services in the future.

But while it still plays the largest role in fueling the American capital markets, US household saving is not nearly as dominant as it once was. In part reflecting the slippage in the US saving rate, the share of households’ contributions to non-financial firm capital holdings has declined from over 80% prior to 1970 to a current level of 59%. Meanwhile, the share of capital held by foreign investors has increased from less than 4% in 1950 to just under 20% today.

14 “401(k) Plan Asset Allocation, Account Balances, and Loan Activity in 2011,” *ICI Research Perspective*, December 2012, Vol. 18, No. 9; “Abstract of 2011 Form 5500 Annual Reports,” *Private Pension Plan Bulletin*, US Department of Labor, Table D8, p. 52, <http://www.dol.gov/ebsa/pdf/2011pensionplanbulletin.pdf>.

Fig. 15: ...while foreign investors' share has grown steadily

% share of US non-financial capital market assets held by foreign investors



Source: Federal Reserve Board

Lower household saving is not the only reason for this shift—foreign investors have directed more of their attention to the US markets, especially since the 2007–08 financial crash ignited a scramble for safer assets.

Of course, the US economy needs business to invest and deploy capital. But that leaves the capital markets more dependent on households and foreign investors. Foreign inflows are likely to remain strong, given the attractions of US capital markets. Greater reliance on foreign capital is not inevitably destabilizing. But there is a serious risk that dependence on certain types of portfolio flows will expose the US markets and economy to greater uncertainty—possibly even a damaging episode of exchange rate volatility.

4

What would be the impact of higher saving?

The analysis in the previous section revealed that the US faces a difficult trade-off between higher saving and lower investment if its level of net foreign borrowing is to remain sustainable. In this section we use the Oxford Economics Global Economic Model to examine how much better off the US would be if it followed a higher saving path.

We compare two scenarios:

- 1. Continued low saving.** Household saving remains low, but the US avoids an unsustainable deterioration in its net investment position by accepting a long-term investment rate of 20% of GDP (at the bottom of our healthy range).

In this scenario the level of investment is constrained by a low level of domestic saving and the need to maintain a sustainable net foreign borrowing position. As a result, growth in physical capital stock is relatively slow, and this feeds through to a lower level of output in the long run.

- 2. Higher saving.** Investment averages 22.5% of GDP in the long run (in the middle of our healthy range), and household saving increases to fund this without any need for additional foreign capital compared with our low-saving scenario.

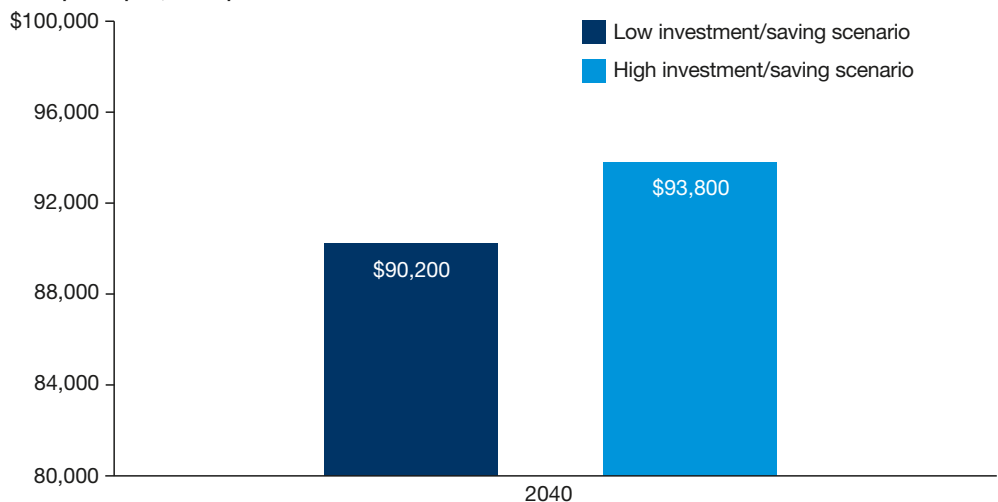
In the higher-saving scenario, the investment constraint is lifted, and a higher level of household—and national—saving enables an increase in investment without a worsening of the US’s foreign borrowing position. As a result, the nation’s physical capital stock grows more quickly, and the economy is able to maintain a faster pace of growth over the long run (see Fig. 16). Over time, the effect of this faster pace of growth is that by 2040, GDP per capita is around \$3,500 higher in today’s prices. For the economy as a whole, the cumulative net present value of the additional GDP is \$7 trillion, equivalent to around half of US annual GDP today.¹⁵

If American households boost their saving rate, by 2040 GDP per capita would increase by around \$3,500 (in today’s prices). In aggregate, the cumulative net present value of the additional GDP is \$7 trillion.

Fig. 16: Higher saving boosts GDP

Benefits of sustaining higher savings and investment

GDP per capita, 2014 prices



Source: Oxford Economics

¹⁵ The net present value of the increase in GDP was calculated using a discount rate of 2.5%.

Taken together, the two alternative scenarios highlight the potential for higher saving to improve the US's long-run economic prospects by facilitating a higher level of investment without requiring an unsustainable increase in foreign borrowing.

Higher saving, meanwhile, places households on a more secure footing by enabling them to diversify the sources of their income over the course of their lives, capturing more in the form of dividends, interest, and capital gains instead of acquiring all of it through wages, salaries, and home equity. And while higher saving by low-income households would increase current inequality in consumption—the gap between spending on goods and services by more affluent and less affluent households—it helps to offset economic inequality in the long term, contributing to greater social stability.

Moreover, higher savings balances could improve households' ability to optimize their economic decisions. For example, there is evidence that savers are able to adopt a longer planning horizon, focusing on personal goals such as saving for a house or starting a business, says David John, strategic policy advisor at AARP and deputy director of the Retirement Security Project at the Brookings Institution.

The US economy as a whole would not only be better insulated from international events, but households would assume a role as more direct drivers of growth, says Mark Casady, CEO of LPL Financial. “When people are savers, they also become owners in the economy—either through direct equity ownership of a company, through investments in their own business, or through investments in mutual funds,” he says. “Therefore, they take more interest in what decisions are being taken by those companies—in their governance. They think like shareholders, helping to create an ownership society.”

The short-run negative impacts of higher saving are likely to be limited, too, since the shift to a higher saving rate would be gradual, giving policy-makers time to react. If access to workplace savings were expanded, for example, most new plan participants would only make modest contributions to start with, and would only raise them slowly. “Escalation is a process, not something that's likely to induce an economic slowdown,” says Mr. John.

5

The importance of government policy in encouraging saving

If US households are to reach saving levels that will significantly narrow the saving gap and contribute to higher long-term GDP growth, government measures to encourage saving are not optional.¹⁶ At a time of slow growth, wage stagnation, and still-high debt burdens, however, the most essential pro-saving measures may be those that encourage businesses to invest and help achieve full economic recovery. The biggest obstacle to higher saving, says Sen. Portman, “is that the economy has been underperforming. When millions are unemployed, millions more have given up looking for work, and others are stuck in jobs not matching their qualifications, families have less money available to save. So we need to ensure people are working and earning healthy incomes.”

But conditions today may be more conducive than they were just a few years ago to policies that address the saving gap more directly. “The economy is fundamentally strong in the US, and it’s going to get stronger over time,” says Mr. Casady. “Government has actually shrunk in terms of head count, and inflation-based spending is down a little bit. Business has picked up spending, and consumers have picked up their spending. Now the government is at a point where it can start to move away from austerity. Businesses are certainly much more expansionary. So it’s the right time to encourage many more people to start to focus more on savings.”

Evidence from the 401(k) system, and particularly the widespread embrace of incentives like automatic enrollment since the Pension Protection Act of 2006 (PPA) encouraged their adoption, suggest that policies to encourage saving can be very effective, and that inertia, rather than conscious decisions not to save, may play an important role in holding saving rates down. For example, Bank of America Merrill Lynch found that over the past seven years, opt-out rates for the 300,000 participants in its client 401(k) plans who had the option remained steady at 5%–7%, with no wide divergence in individual years.

While some researchers have found some types of incentives to have little effect on saving, or that they lead merely to redistribution of existing savings for tax reasons, others have found the opposite. Overall, there is evidence that, when properly designed and targeted, incentives can make a significant difference.

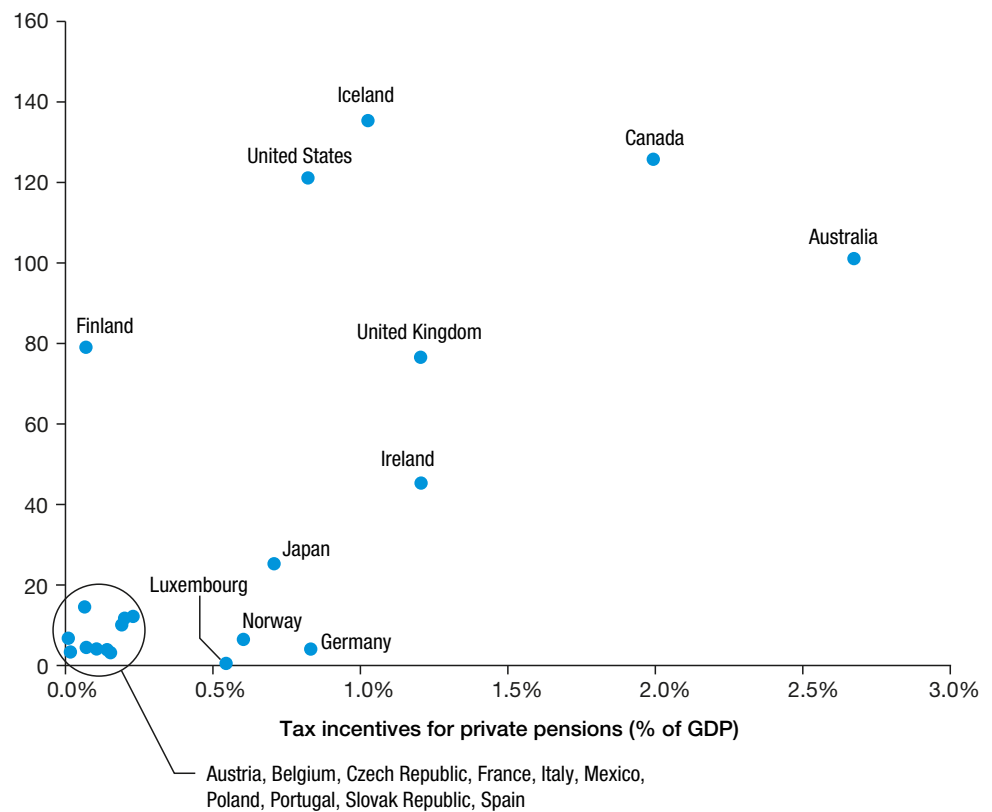
An international comparison using data from the Organization for Economic Cooperation and Development (OECD) indicates there is a correlation between the generosity of active incentives in the form of tax benefits for saving, and saving balances (see Fig. 17). Countries that do not offer private-sector saving incentives, or that offer extremely modest ones, such as France, Italy, and Mexico, enjoy only very small private pension balances. In countries with more generous incentives, such as Canada, the US, and Australia, these balances equal more than 100% of GDP (see “Mandatory saving in Australia,” p. 20).

¹⁶ From one perspective, tax deferrals on saving are actually a form of relief from distortions and disincentives implicit in any form of income tax. This argument is based on the theory of “optimal capital income taxation,” which reasons that any capital income tax distorts individuals’ saving and consumption behavior by inducing them to substitute current consumption for future consumption. For purposes of this study, however, we define tax incentives as measures that encourage saving relative to a case in which individuals do not save and therefore must pay higher income tax.

Different institutional features make comparison an inexact science, of course. The OECD comparison—which does not include some countries with significant private saving incentives, such as Chile, Denmark, Greece, the Netherlands, and Sweden—only looked at private pension balances and did not test whether incentives cause people to shift from taxable to tax-advantaged accounts. If a particular country does not offer retirement saving accounts, or has very low cutoffs for such accounts, its retirement savings balances will be zero or very low—but households may still save for retirement through “regular” saving or brokerage accounts.

Fig. 17: Comparing international pension balances and tax incentives

% of GDP represented by private pension assets



Source: OECD

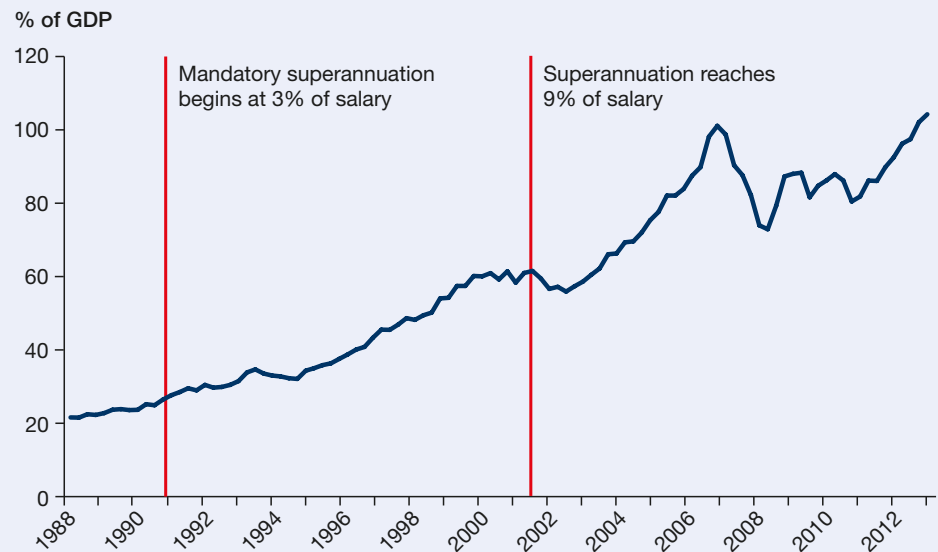
Mandatory saving in Australia

For more than 20 years, Australia has had a mandatory savings-account system financed by employers, amounting to 9% of pay—stepping up to 12% between July 2012 and July 2014. An older system of employer-based pensions was subsumed into the new program. Since the program was set up in 1992, the value of assets in Australian pension funds has climbed from roughly 30% of GDP to 100% in 2013. The speed of the increase suggests that the mandatory system can claim substantial credit for the shift. Australia also has a means-tested, pay-as-you-go public pension system that is comparable with Social Security in the US.

While the mandatory system is credited with boosting the middle class’s engagement with saving and investment, how well it serves the broad range of working households is debated. There are concerns that financial literacy is not high, and many managers charge high fees. The investment structure exposes participants to market risk: the 2008 financial crash hit those nearing retirement hard, as it did their counterparts in other countries.

Household debt ratios are higher in Australia than in other developed countries—1.8 times household disposable income, compared with 1.1 in the US¹⁷—prompting Brian Reid, chief economist at the Investment Company Institute, to suggest that “people are funding that mandatory superannuation contribution with debt, not a reduction in consumption.” Bolstering this concern is a US-based study¹⁸ of 401(k) plans that found that, controlling for other observed factors, homeowners with access to a 401(k) had no more net savings than other homeowners, suggesting that these households were funding their 401(k) savings through larger mortgages. On the other hand, renters who were eligible for 401(k)s saved significantly more overall than renters who weren’t.

Fig. 18: Rise in Australian pension fund assets



Source: Australian Bureau of Statistics “Total Financial Assets of Pension Funds” series normalized by Australian GDP

17 Figures from Australian Bureau of Statistics, cited in Pat McGrath, “Household debt the biggest threat to Australian economy,” ABC News, May 8, 2014, <http://www.abc.net.au/news/2014-05-07/household-debt-the-big-threat-to-australian-economy/5435844>.

18 D.J. Benjamin, “Does 401(k) eligibility increase saving? Evidence from propensity score subclassification,” *Journal of Public Economics* 87(5): 1259–1290, 2003.

Some experts are also concerned that Australia’s mandatory structure incentivizes workers to game the system by spending down their nest eggs, starting as early as age 55, then claiming a larger means-tested benefit in their later years, rather than annuitizing their savings.

Would such a system be appropriate or politically viable in the US? The American political establishment is averse to personal mandates, says Judy Miller, director of retirement policy at the American Society of Pension Professionals & Actuaries (ASPPA) and executive director of the ASPPA College of Pension Actuaries. Additionally, American workers already have a form of mandatory retirement saving through Social Security.

Putting a plan in place

Underlying the US retirement saving framework is a complex interplay between incentives to save, household decision-making processes, and employers’ decisions whether to offer saving plans and payroll deductions in the first place. Of all these, “the biggest factor is whether you have payroll deductions at work,” says Judy Miller, director of retirement policy at the American Society of Pension Professionals & Actuaries (ASPPA) and executive director of the ASPPA College of Pension Actuaries. “If you can’t save at work, it hardly moves the needle.”

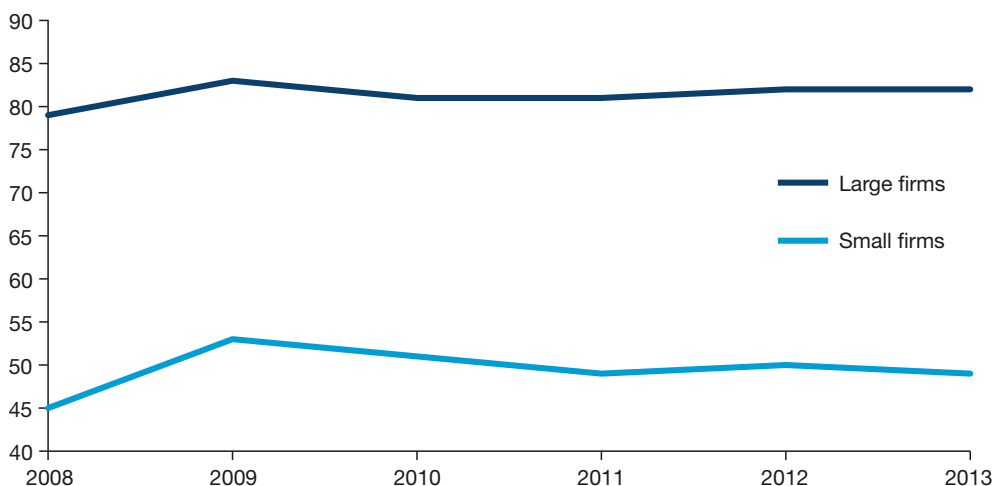
Employers must receive some level of support from government, through tax law and regulation, to provide a plan for their employees. While 401(k)s and similar plans have become widespread among larger employers, and have been augmented at some companies by Roth 401(k)s that offer participants the flexibility to set up an account that taxes contributions but does not tax withdrawals, many firms still do not sponsor a saving plan because of the costs involved (see Fig. 19). “Employers—especially small businesses—are very cash focused. And so the tax incentive for the employer as an individual oils the whole employer-based system. If that were not available or if it were reduced very much, it would be a very hard sell to show that employer how they can even afford to do something,” says Ms. Miller.

“The biggest factor [encouraging saving] is whether you have payroll deductions at work. If you can’t save at work, it hardly moves the needle.”

Judy Miller, director of retirement policy, American Society of Pension Professionals & Actuaries and executive director of the ASPPA College of Pension Actuaries

Fig. 19: Smaller companies are less likely to offer retirement saving plans

% of employees with access to any retirement (DB or DC) plan at small (<100 employees) and large (≥100 employees) firms



Source: BLS National Compensation Survey

Extending these opportunities to save at work through payroll deduction would enable millions more workers to save. Small employers, for instance, are less likely than large employers to offer a plan, despite the availability for many years of low-cost structures such as SEP and SIMPLE plans designed for smaller companies. “If you could figure out a way to incentivize small employers to start offering these plans, I think you would go a long way to solving many of the problems we have in the retirement system,” says Mr. VanDerhei of EBRI.

Some policy-makers have concluded that it’s time for Washington to look again at how it can augment and improve saving incentives. Sen. Portman suggests “streamlining” safe-harbor and non-discrimination rules to make them less “complicated and cumbersome” and perhaps “examining the effectiveness of the small-business credit” to see if it could be used more effectively to encourage plan sponsorship. Sen. Ben Cardin (D-Maryland), who has worked with Sen. Portman on retirement-related issues for years, advocates making it easier for small employers to join multiple-employer plans (MEPs) that allow them to pool administrative expenses and share fiduciary responsibilities, with “a tax credit for plans to reduce start-up costs.”

Congress has considered requiring all but the smallest employers to make available an “Automatic IRA” if they do not offer a comparable plan. More than a dozen states are considering similar structures for resident private-sector employees, including Oregon, Maryland, Connecticut, and California.

Getting employees to participate

Once a workplace plan is established, employees must be encouraged to take it up. Incentives come in three principal types—two of them behavioral, one financial:

- **Nudges** are not so much incentives as suggestions that require the worker to take specific action, but do not offer a financial reward. A significant literature review,¹⁹ as well as common experience, shows that most people do not carefully plan their savings, but instead rely on intuitive judgments or educated guesses to do what seems right. In one study, when randomly selected workers received an email asking them to sign up for the company’s 401(k) plan that used a higher savings goal as an example, their savings rose by up to 1.9% of income.²⁰

19 E.g., Shlomo Benartzi and Richard Thaler, “Heuristics and biases in retirement savings behavior,” *The Journal of Economic Perspectives* (2007): 81–104.

20 James J. Choi, Emily Haisley, Jennifer Kurkoski, Cade Massey, “Small cues change savings choices,” NBER Working Paper No. 17843 (2012).

- **Passive incentives** set default options that encourage the individual to save unless she specifically opts out. The most common passive incentive is automatic enrollment, which can be extended to automatic escalation/automatic fund allocation.²¹ “Auto-escalation is crucial,” says William Gale, director of the Retirement Security Project at the Brookings Institution, “because the evidence is that if you bring people in at a low contribution rate, they don’t opt out, but stick with it. So with auto-escalation, you can move them up in a relatively painless way.” A 2010 study found that since the PPA passed in 2006, employer adoption of automatic enrollment had jumped from 24% to 59%.²² But there is also some evidence that growth in adoption of “auto” plan design features is slowing, with both Vanguard and Fidelity reporting that although more companies are adding auto-enrollment, the pace of expansion has slowed in recent years.
- Matching contributions from the employer are an example of an **active incentive**, pushing the individual to take specific actions to obtain financial rewards. In a 2006 study,²³ matching IRA contributions were offered to randomly selected tax filers at H&R Block offices. These individuals were more likely to contribute to IRAs than other customers who were not offered the matches. These same people were eligible for the Retirement Savings Contribution Credit, which offers a comparable overall tax incentive—but lacks a matching contribution. Few took advantage.²⁴ Mr. John also suggests making the saver’s credit refundable, which would offer lower-income households a greater incentive to add to savings.

“Tax time and payday are the only two times when you have a captive audience for messages about saving.”

Lisa Mensah, executive director, Initiative on Financial Security, the Aspen Institute

Evidence suggests that behavioral approaches—passive incentives and nudges—have a more powerful effect on saving behavior. Active incentives target active savers, who tend to be both wealthier and more financially savvy, and thus better able to shift money in order to claim the benefit without actually saving more. By contrast, passive incentives and nudges target those least likely to do this, and are generally cheap or free.

“Tax time and payday are the only two times when you have a captive audience for messages about saving,” says Lisa Mensah, executive director of the Aspen Institute’s Initiative on Financial Security. “When a working family has an unexpected cash flow from the Earned Income Tax Credit or a Child Tax Credit, that’s the occasion for a timely message from the employer or the financial provider that they might want to set aside, say, \$50 for an IRA or a child’s college fund.” Linking enrollment in the 401(k) plan or escalation of contributions with healthcare-plan enrollment periods is another way that some employers have found to spur decisions.

21 Benartzi and Thaler (2007).

22 “Hot Topics in Retirement 2010,” Hewitt Associates LLC, http://www.aon.com/attachments/thought-leadership/Hewitt_HotTopicsRet_Survey_2010_Findings.pdf.

23 Esther Dufo, William Gale, Jeffrey Liebman, Peter Orszag, Emmanuel Saez, “Saving incentives for low- and middle-income families: Evidence from a field experiment with H&R Block,” *The Quarterly Journal of Economics* 121 (2006): 1311–1346.

24 However, other studies found that rates of contribution to 401(k)s are surprisingly insensitive to employer match rates. See Gary V. Engelhardt and Anil Kumar, “Employer matching and 401(k) saving: Evidence from the health and retirement study,” *Journal of Public Economics* 91(10), (2007): 1920–1943; and Olivia Mitchell, Gary Mottola, Stephen Utkus, and Takeshi Yamaguchi, “The Inattentive Participant: Portfolio Trading Behavior in 401(k) Plans,” Working Paper 2006–2, Pension Research Council (2005).

Periodic reports on a worker's 401(k) performance function as nudges when they include a calculation of how much income she is likely to generate in retirement based on her current saving rate. Illustrating a similar approach is the "lifetime retirement income calculator" that the Labor Department includes on its website. "The indications are that when people see that lifetime income number, they contribute more, because it gives them a sense of what their savings are doing for them," says Ms. Miller.

Nudges can also be devised to encourage workers to avail themselves of the saver's credit, suggests Sen. Portman. "We can reform the saver's credit, and even ensure that the credit itself is deposited into the retirement fund, or perhaps put it on the 1040EZ tax form," he says.

Most people are passive savers. A 2013 study²⁵ found that when Denmark set up its Mandatory Savings Plan in 1998, and required everyone earning above a low-income threshold of about \$5,300 to contribute 1% of labor income, few individuals offset the MSP by saving less in other accounts—indeed, behavior just above and below the cutoff was very similar. The researchers concluded that 85% of individuals "are 'passive savers' who are unresponsive to subsidies but are heavily influenced by automatic contributions made on their behalf."

The Denmark study clearly suggests that passive incentives to save can result in significantly higher saving rates for many households. But in the US system, active incentives are crucial, as they ensure that employers are incentivized to provide access to plans in the first place.²⁶ Because plan sponsorship is voluntary in the US employment system, the tax incentive's impact on sponsorship of these plans by employers is extremely important.

"Active savers" want to take advantage of tax incentives, and they tend to be smaller-business owners who must save for their own retirement, or highly valued employees whose firms are eager to keep them happy. For smaller-business owners, active incentives to save are therefore a driver of plan creation and maintenance—without them, passive incentives are ineffective and nudges have limited impact. According to Mr. VanDerhei, "People in the \$30,000–\$50,000 annual income range who don't have an employer-sponsored retirement plan, they are just not going to do anything on their own." EBRI estimates that less than 5% of workers earning \$30,000–\$50,000 a year who lack access to an employer plan contribute anything to an IRA, compared with a 70% participation rate for workers who do have an employer plan.

Ease of access and addressing investment fears were the top two considerations as Walmart redesigned its 401(k) enrollment process over the past several years, says Karen Light, senior director of financial benefits. Today, 401(k) enrollment is linked with annual enrollment in other company benefits, a simple change that gave the company's associates easier access to the plan. Walmart also offered a simple solution to investment choice, an issue that often stymies participation. The plan includes a default investment option with enrollment, which automatically places contributions in professionally managed, custom target-date funds for associates who have low confidence in choosing their own investments.

²⁵ Raj Chetty, John N. Friedman, Soren Leth-Petersen, Torben Heien Nielsen, and Tore Olsen, "Active vs. Passive Decisions and Crowd-out in Retirement Savings Accounts: Evidence from Denmark." NBER Working Paper nb13-01 (December 2013).

²⁶ Sudipto Banerjee and Neviv Adams, "Tax preferences and mandates: Is the Danish savings experience applicable to the US?" EBRI notes, Vol. 34, No. 1, January 2013.

Each year, eligible associates are required to make a choice whether to participate or not, Ms. Light says. Each year thereafter, they are offered automatic escalation to their rate of deferral. Participation in the 401(k), which has more than 1 million participants and over \$21 billion in assets, has exceeded expectations and led to greater saving rates and account balances. Ms. Light attributes this to the simplicity of the process design that requires associates to make an active choice. The process encourages associates to think about the importance of saving and, in the majority of cases, to decide to participate, she says. Walmart's fully vested matching contribution—equal to 100% on each dollar deferred, up to 6% of compensation—complements the process, further helping to increase participation and deferral rates.

Do incentives pay for themselves?

From the perspective of government, incentives are not free. While more could be done to make the tax code favor saving over consumption, says Brian Reid, chief economist at the Investment Company Institute, “if savings are encouraged simply through additional tax credits that increase the government's deficit, and ultimately the savings is simply buying government debt, it really doesn't achieve anything.”

Yet these assets also form a fiscal buffer for the government, since current law requires that individuals draw down savings before they become eligible for means-tested benefits such as Medicaid. At the same time, most saving incentives are structured such that taxes are deferred and reduced, not eliminated—an effect the Treasury Department and the Congressional Joint Tax Committee's standard “tax expenditure” accounting does not adequately take into account. Since individuals save for retirement—or should—over the entirety of a 40-year working life, a 10-year horizon (as used in standard tax expenditure accounting) understates the revenue the government eventually will realize from 401(k) or IRA withdrawals. Indeed, 401(k)s, for instance, only began to become widespread some 30 years ago, and the shift from defined-benefit to defined-contribution plans is ongoing. Therefore, it will be some decades before the impact of deferred taxes is fully known.

The Congressional Budget Office itself is aware that taxes on 401(k)s, IRAs, and other tax-deferred accounts will eventually be paid, and estimates that this reduces these tax expenditures by 10% using a present-value approach.²⁷ A 2012 study for the American Society of Pension Professionals & Actuaries,²⁸ also using a net-present-value calculation, estimates that they will be reduced by approximately 29%. Our research indicates that the standard tax-expenditure methods also fail to take into account macroeconomic effects from increased saving, which could generate new tax revenue, compensating for reduced revenues in the early decades.

²⁷ “The Distribution of Major Tax Expenditures in the Individual Tax System,” Congressional Budget Office (May 2013) p. 24, http://www.cbo.gov/sites/default/files/cbofiles/attachments/43768_DistributionTaxExpenditures.pdf.

²⁸ Judy Xanthopoulos and Mary M. Schmitt, Retirement Savings and Tax Expenditure Estimates, American Society of Pension Professionals & Actuaries (May 2011), <http://www.asppa.org/Portals/2/APerspectiveOnTaxPolicyToPromoteRetirementSavingsMay2011.pdf>.

Assessing success

“Despite the progress that has been made in the savings policy area, more can be done on two fronts,” says Sen. Cardin: “first, by strengthening the incentive programs that work, and second, by formulating a more coordinated, life-long approach to personal saving policies.” The cumulative effect, says Mr. Gale, should be a combination of active and passive incentives that make workplace retirement saving plans behave more the way traditional defined-benefit pension plans do—with automatic participation, steadily growing contributions, and a long-term, consistent investment strategy.

Because automatic escalation is still a relatively new trend, knowing how long, on average, employees continue with it could take years.

Whether the current mixture of nudges and passive and active incentives is sufficient to achieve a system with a profile more like a defined-benefit plan may take a long time to determine. The same is true for incentives like automatic enrollment and automatic escalation: because automatic escalation is still a relatively new trend, knowing how long, on average, employees continue with it could take years. During an economic downturn, low-income workers in particular may cancel or reduce auto-escalation and opt out of auto-enrollment. Since these incentives only became widely adopted after the last downturn, predicting the overall effect is difficult. “Some incentives are looking better in the short run than they may once they have been in place for a while,” says Mr. VanDerhei.

Achieving a pro-saving, pro-growth policy set within the boundaries of a private-sector system will require government, employers, and financial services providers to work together and better understand the range of possible outcomes, preferences, and incentives. Public policy should, at a minimum, maintain incentives at the existing level, and ideally increase them and focus them better on households facing the largest saving gap.

Political and policy constraints on savings growth

The last decade saw Congress pass two major pieces of legislation that eased the rules governing tax-deferred retirement saving—the Economic Growth and Tax Relief Reconciliation Act of 2001, and the Pension Protection Act of 2006. In the wake of the 2007–08 financial crash, however, policy-makers were more concerned about reviving consumption than encouraging households to save. Since then, Congress has focused intensely on deficit reduction, making tax expenditures—including those for retirement saving—a tempting target for lawmakers.

“Washington looks at retirement saving as a revenue raiser, not something it wants to invest in,” says Judy Miller, director of retirement policy at the American Society of Pension Professionals & Actuaries (ASPPA) and executive director of the ASPPA College of Pension Actuaries. President Obama’s 2015 budget contained a 28% cap on itemized deductions and other tax preferences for families with incomes over \$225,000 a year—including for “retirement contributions.” And Rep. David Camp’s proposed Tax Reform Act would reduce the limit on pre-tax contributions to 401(k)s.

All too often, the Washington political dynamic leans against measures to promote saving. Republicans generally oppose “forced saving” measures. Democrats are reluctant to create new deferrals, out of concern that Washington already spends a great deal on tax incentives for retirement plans—although many would support boosting incentives for low-income households while restricting them at the top levels, says L. Josh Bivens, chief economist at the Economic Policy Institute. “So people who work on tax expenditures always start out by saying reduction of incentives is never going to happen,” he says. “But it has happened in the past, and it’s likely to have to happen at some point, although probably not any time soon.”

Budgetary pressures are not the only countervailing consideration for lawmakers, however. Another is the difficulty of understanding the true impact of tax-based incentives—and thus whether they are worth the cost to the federal government.

The danger, says Mark Casady, CEO of LPL Financial, is that Congress may keep focusing on the search for politically palatable ways to reduce incentives, driven by deficit concerns and budget gridlock, until a larger retirement crisis emerges. “This is the kind of issue that just does not provoke the crisis mentality that led to the creation of TARP, for example,” he says. “It’s unfortunate, because this will eventually become a crisis of some magnitude—but that could be 20 years from now.”

6

From debt to saving—key strategies

Increased household saving not only gives families greater financial security, but helps the national economy create sustainable prosperity. “If we can induce everyone to save 10% of their income, it wouldn’t solve all of our problems, but it would be a big step in the right direction,” says Mr. Gale.

Public policy, therefore, should never pit personal solvency and national solvency against each other in a misguided quest for fiscal savings.

- **Existing saving incentives and vehicles should be preserved, simplified, and restructured to maximize saving**, both in aggregate and among the groups currently least able to save, including those not covered by workplace plans. Matching contributions and other enhanced incentives to support saving by low-income Americans should be considered, including such means as refundable tax credits.
- **Workplace payroll saving plans should be recognized as the prime driver of asset accumulation for working Americans.** It must also be recognized that these plans work best when made fully “automatic” and directed to more appropriate deferral rates.
- **Working households have a role to play in this process as well.** Employees can advocate for other workplace opportunities that their employers may have overlooked. The person who is self-employed or between jobs can urge her elected representatives to broaden access to tax-advantaged saving vehicles, or to liberalize rules governing contributions.

In all of these matters, policy-makers must not work alone. They need to bring employers, financial services providers, and working households themselves into the process of determining the best ways to boost saving and investment, and build a more robust economy for the long run.

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