

## Funding Savings Needed for Health Expenses For Persons Eligible for Medicare

By Paul Fronstin, Dallas Salisbury, and Jack VanDerhei, Employee Benefit Research Institute

---

### EXECUTIVE SUMMARY

**UPDATED MODELING:** This report updates earlier modeling by EBRI on the level of savings needed for health care expenses in retirement. Some prior estimates have been significantly revised down as a result of changes to Medicare Part D cost sharing that will be phased in by 2020 due to recently enacted health reform. However, the research indicates that retirees will continue to need a substantial amount of savings to cover their health care expenses in retirement, and that uncertainty related to health care use, prescription drug use, and longevity will still play a major role in planning for retiree health care.

As before, EBRI's research shows that women will need significantly higher levels of savings than men, due to their greater longevity. Results are shown by the desired level of probability (50, 75, and 90 percent) of having enough savings to cover health costs in retirement.

**SAVINGS TO SUPPLEMENT MEDICARE WITH MEDIGAP AND PART D:** EBRI finds that a man with median drug expenditures would need \$65,000 in savings and a woman would need \$93,000 if they want an average (50 percent) chance of having enough money to cover health care expenses in retirement. For a higher (90 percent) chance of having enough, a man would need \$124,000 and a woman \$152,000. A couple both with median drug expenses would need \$158,000 for a 50 percent chance of having enough money, and \$271,000 for a 90 percent chance. At the highest (90<sup>th</sup> percentile) level of drug spending, a man would need \$187,000 and a woman \$213,000 to have a 90 percent chance of having enough money to cover health care expenses in retirement.

**SAVINGS TO SUPPLEMENT MEDICARE WITH SUBSIDIZED EMPLOYMENT-BASED COVERAGE:** A 65-year-old man retiring in 2010 with retiree health benefits from a former employer will need \$66,000 to have a 50 percent chance of having enough savings to cover health care expenses in retirement; for a 90 percent chance, he would need \$125,000. Women would need \$88,000 and \$143,000, respectively. Few employers continue to provide subsidized retiree health coverage.

**SAVINGS TO SUPPLEMENT MEDICARE WITH EMPLOYMENT-BASED COVERAGE WITHOUT SUBSIDY:** Retirees who have employment-based retiree health benefits to supplement Medicare and whose former employer *does not subsidize premiums* will need to save more money than retirees whose premiums are subsidized. A man without subsidized premiums would need \$109,000 in savings to cover health care costs in retirement if he wants a 50 percent chance of having enough money to cover health care expenses in retirement, while a woman would need \$146,000. To have a 90 chance of having enough savings to cover health care costs in retirement, a man would need \$211,000 and a woman would need \$242,000 if the benefit is through a former employer and not subsidized.

**WIDE VARIATION IN MEDIGAP PREMIUMS AFFECTS SAVINGS TARGETS:** There is wide variation in Medigap premiums. The average premium was \$1,479 for Plan F in 2010, but Connecticut had the highest average premium for Plan F at \$2,493. Indiana has the higher premium variation, with at least one plan offering Plan F at a premium of \$14,604.

Paul Fronstin is director of the Health Research and Education Program at the Employee Benefit Research Institute. Jack VanDerhei is director of research at EBRI. Dallas Salisbury is president and CEO of EBRI. This *Issue Brief* was written with assistance from the Institute's research and editorial staffs. Any views expressed in this report are those of the authors, and should not be ascribed to the officers, trustees, or other sponsors of EBRI, EBRI-ERF, or their staffs. Neither EBRI nor EBRI-ERF lobbies or takes positions on specific policy proposals. EBRI invites comment on this research.

**Copyright Information:** This report is copyrighted by the Employee Benefit Research Institute (EBRI). It may be used without permission but citation of the source is required.

**Recommended Citation:** Paul Fronstin, Jack VanDerhei, and Dallas Salisbury, "Funding Savings Needed for Health Expenses For Persons Eligible for Medicare," *EBRI Issue Brief*, no. 351, December 2010.

**Report availability:** This report is available on the Internet at [www.ebri.org](http://www.ebri.org)

This report is available on EBRI's website at [www.ebri.org](http://www.ebri.org)

## Table of Contents

Introduction .....	3
Modeling Technique.....	4
The Medicare Program.....	5
Retirees Without Employment-Based Retiree Health Benefits .....	6
Impact of PPACA .....	7
Savings Needed for Health Care Expenses in Retirement: The Case of Employment-Based Retiree Health Benefits .....	7
Savings Needed for a 65-Year-Old in 2020 (Currently Age 55) .....	8
Medigap and Medicare Part D.....	8
Employment-Based Retiree Health Benefits .....	8
Sensitivity Analysis on Medigap Premiums .....	10
Conclusion .....	10
Bibliography.....	13
Endnotes .....	14

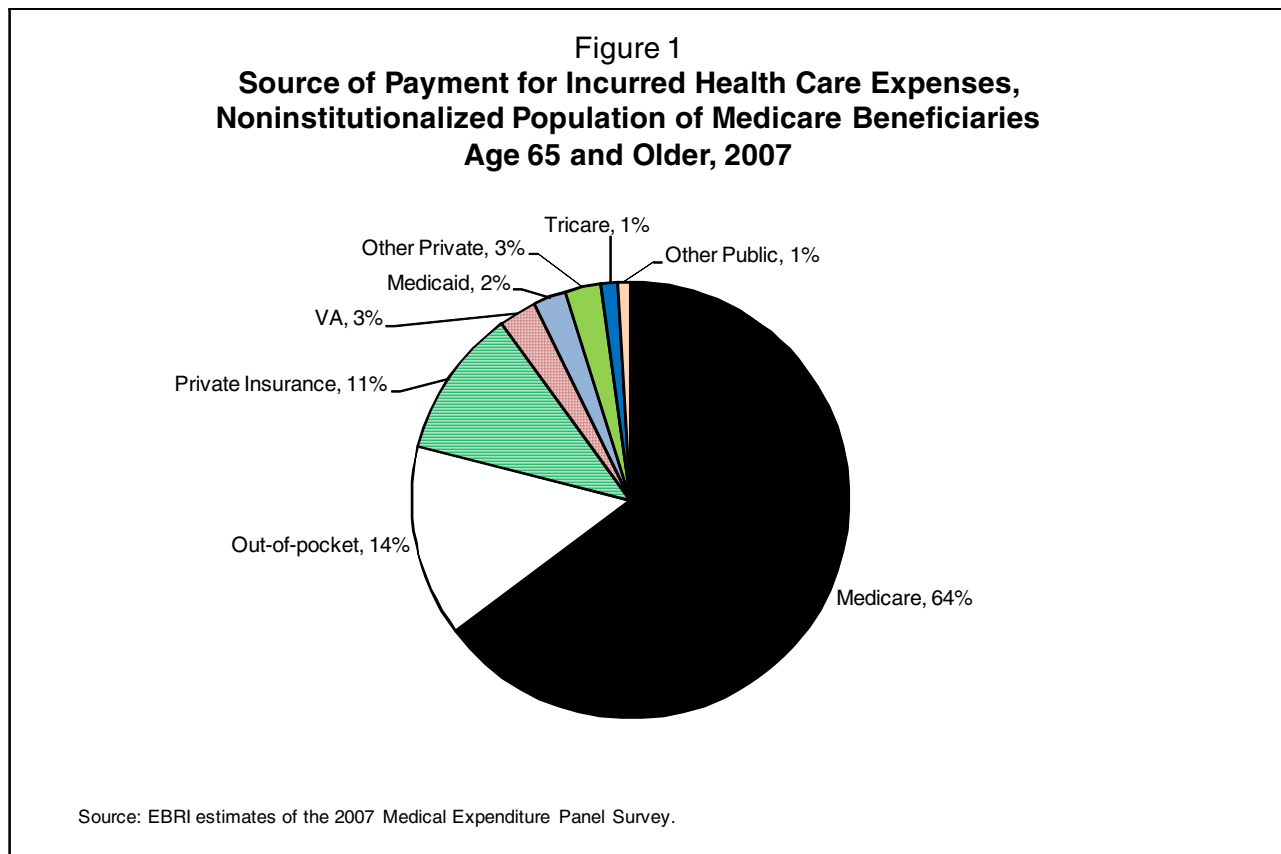
## Figures

Figure 1, Source of Payment for Incurred Health Care Expenses, Noninstitutionalized Population of Medicare Beneficiaries Ages 65 and Older, 2007 .....	3
Figure 2, Savings Needed for Medigap Premiums, Medicare Part B Premiums, Medicare Part D Premiums, and Out-of-Pocket Drug Expenses for Retirement at Age 65 in 2010.....	9
Figure 3, Savings Needed for Employment-Based Health Premiums, Medicare Part B Premiums, and Out-of-Pocket Costs for Retirement at Age 65 in 2010 .....	9
Figure 4, Savings Needed for Medigap Premiums, Medicare Part B Premiums, Medicare Part D Premiums, and Out-of-Pocket Drug Expenses for Retirement at Age 65 in 2020.....	9
Figure 5, Savings Needed for Employment-Based Health Premiums, Medicare Part B Premiums, and Out-of-Pocket Costs for Retirement at Age 65 in 2020 .....	12
Figure 6, Sensitivity Analysis: Impact of Medigap Premium on Savings Needed for Medigap Premiums, Medicare Part B Premiums, Medicare Part D Premiums, and Out-of-Pocket Drug Expenses for Retirement at Age 65 in 2010 .....	12

## Introduction

The percentage of private-sector establishments offering health benefits to early retirees (younger than age 65) fell from 11.3 percent in 1997 to 6.2 percent in 2009.<sup>1</sup> As a result, the eligibility rate for retiree health benefits from a former employer has been declining. In 1988, about one-third of workers ages 46–64 reported that they would be eligible for employment-based health benefits to supplement Medicare upon retirement (Fronstin, 1996). However, by 2005, only about 23 percent of Medicare beneficiaries had these benefits (Fronstin, Salisbury, and VanDerhei, 2008). It is important that both workers and retirees understand their responsibility for these costs and the associated risks, during both their working and retirement years.

In 2007, Medicare covered 64 percent of the cost of health care services for Medicare beneficiaries age 65 and older, while out-of-pocket spending accounted for 14 percent (Figure 1). One of the risks associated with retirement is predicting the cost of health care. Relevant for retirement planning is the fact that during the 33-year period from 1975–2008, growth in Medicare costs outpaced growth in the economy by 2.5 percent,<sup>2</sup> resulting in cost increases in the mid-single digits. However, most retirees have been experiencing larger cost increases. During 2003–2008, Medicare Part B premiums increased 10 percent on average, with increases of more than 13 percent in 2003 and 2005, and a 17.4 percent increase in 2004. During 2009, Part B premiums were unchanged, but they jumped 14.6 percent in 2010. They are projected to increase 8.7 percent in 2011, but then decrease 5.2 percent in 2012. Thereafter, through 2019, Part B premium increases are expected to average 4.2 percent.<sup>3</sup>



The average annual premium increases projected under current law may grossly understate actual premium increases and thus the amount of money retirees will need for Part B premiums in retirement. Under current law, Medicare updates to physician payment rates are scheduled to decline 23 percent on Dec. 1, 2010, an additional 6.5 percent in January 2011, and 2.9 percent in 2012.<sup>4</sup> Although a physician payment reduction of –4.8 percent took effect in 2002, during 2003–2009 other scheduled reductions in physician rates of at least 5 percent were blocked by Congress, responding to pressure from physicians. It is expected that Congress will continue to override future expected cuts in physician payments,<sup>5</sup> which will have the effect of increasing Part B premiums above the existing law’s estimates.

Individuals can expect to pay even more in premiums and out-of-pocket for health care services in retirement because of the deteriorating financial condition of the Medicare program. The Part A trust fund is expected to become insolvent in 2028 or 2029, under intermediate cost assumptions.<sup>6</sup> In order to address the funding shortfall, the Medicare trustees indicate that the payroll tax would need to be increased immediately from 2.9 percent to 3.56 percent if the funding shortfall is to be paid by workers and employers. If the funding shortfall is to be paid by Medicare beneficiaries, an immediate 15 percent reduction in government spending on the Part A portion of the program would be necessary. Given the magnitude of the changes needed to address the Part A trust fund funding shortfall, it is likely that future retirees will have to pay more for health care services.

Variation in Medigap premiums may also make it difficult for individuals to save an appropriate amount of money for health care expenses in retirement. Medigap plans are standardized, which means a Medicare beneficiary purchasing Medigap Plan F in one state will have the same exact *coverage* as a Medicare beneficiary purchasing Medigap Plan F in a different state. However, *premiums* for Medigap Plan F vary considerably by state. In 2010, the average premium across the U.S. in metropolitan statistical areas was about \$1,500, and it ranged by state from \$1,350 to \$2,500,<sup>7</sup> a wide variation that cannot be accounted for by any difference in the comprehensiveness of the coverage.<sup>8</sup> Wide variation was also found in premiums within states.

Another risk associated with retirement is predicting longevity. It has been estimated that the average husband and wife will need about \$250,000 in savings to cover what is not covered by Medicare.<sup>9</sup> However, individuals cannot simply assume to be average: 50 percent of men turning age 65 in 2010 will live to age 81, and 50 percent of women will live to age 84. Furthermore, 25 percent can be expected to live until ages 87 and 90, respectively, and 1 in 10 men can expect to live until 91, while 1 in 10 women can expect to live to 95.<sup>10</sup>

Ultimately, the real issue retirees face in planning for health care expenses in retirement is uncertainty. The remaining number of years an individual will live is uncertain. Health care costs and increases in those costs are uncertain. Inflation and interest rates are uncertain. And health status is uncertain. As workers and retirees become increasingly responsible for planning for retirement, the risk of uncertainty will make retirement planning increasingly complicated.

This report examines the uncertainty related to saving for health care expenses in retirement. The research presented here builds on past research by examining the randomness of longevity and investment risk as well as the uncertainty of future health care cost increases. It updates data presented in the June 2009 *EBRI Notes* (Fronstin, Salisbury, and VanDerhei, 2009). Some of the prior estimates have been significantly revised down as a result of changes to Medicare Part D cost sharing that will be phased in by 2020. However, the estimates provided in this report suggest that retirees will continue to need a substantial amount of savings to cover their health care expenses in retirement—and uncertainty related to health care use and longevity will still play a major role in planning for health care once they are retired.

## Modeling Technique

Determining how much money an individual or couple needs in retirement to cover health care expenses is a complicated process. The amount of money a person needs will depend on, among other factors:

- The age at which he or she retires.
- Length of life after retirement.
- The availability of health insurance coverage after retirement to supplement Medicare and the source of that coverage.
- Health status and out-of-pocket expenses.
- The rate at which health care costs will increase.
- And interest rates and other rates of return on investments.

## The Medicare Program

Medicare is the federal health care insurance program for the elderly and disabled. Medicare was created in 1965 as part of President Johnson's Great Society program, and helps pay the medical bills of nearly all Americans over age 65 as well as those receiving disability benefits or those with serious kidney problems. As a result, a higher percentage of senior citizens have health insurance than any other age group in American society.<sup>11</sup>

Medicare is divided into three parts:

- **Part A** basically pays for inpatient hospital care. It is funded by taxes paid by current employers and employees and is automatically made available to eligible Americans.
- **Part B** covers outpatient services including physician visits. Those eligible have the option of participating by paying a monthly premium. This covers approximately one-quarter of the program's annual cost. The government uses general revenues to pay the remainder of the bill.
- **Part D** pays for non-hospital prescription drugs. It is funded by beneficiary premiums, transfer payments from the federal treasury, and transfers from state governments. Premiums are to cover one-quarter of Part D costs.

In addition, there are two major types of plans that individuals can use to supplement Medicare:

- Because Medicare does not pay for all costs, many individuals purchase personal **Medigap** policies to provide insurance for uncovered health care services. Several different types of Medigap policies are available, with standardized national coverage by plan type.
- **Medicare Advantage Plans** are health plan options that are part of the Medicare program. If you join one of these plans, you generally get all your Medicare-covered health care through that plan. This coverage can include prescription drug coverage. Medicare Advantage Plans include Medicare health maintenance organizations (HMOs), preferred provider organizations (PPOs), private fee-for-service plans, and Medicare special needs plans. To join a Medicare Advantage Plan, an individual must have Medicare Part A and Part B.<sup>12</sup>

In addition, public policy that changes any of the above factors will also affect spending on health care in retirement. While it is possible to come up with a single number that individuals can use to set retirement savings goals, a single number based on averages will be wrong for the vast majority of the population.

This analysis uses a Monte Carlo simulation model<sup>13</sup> to estimate the amount of savings needed to cover health insurance premiums and out-of-pocket health care expenses in retirement. Separate estimates are presented for persons who supplement Medicare with 1) employment-based retiree health benefits, and 2) a combination of individual health insurance through Plan F Medigap coverage and Medicare Part D for outpatient prescription drug coverage. For each source of supplemental coverage, the model simulated 65,000 observations allowing for the uncertainty related to individual mortality and rates of return on assets in retirement,<sup>14</sup> and computed the present value of the savings needed to cover health insurance premiums and out-of-pocket expenses in retirement at age 65. These observations were used to determine asset targets for having adequate savings to cover retiree health costs 50 percent, 75 percent, and 90 percent of the time. Estimates are also jointly presented for a stylized couple both of whom are assumed to retire simultaneously at age 65.

These probability ranges are provided because there are varying chances that individuals will “succeed” at having enough money for health care in retirement:

- The **50<sup>th</sup> percentile** represents the savings needed if the individual’s goal is to have a 50–50 chance that he or she will have enough money saved to cover health insurance premiums and health care expenses in retirement.
- An individual who wants to have a **75 percent** chance of having enough savings in retirement to cover premiums and other expenses would need to have the amount of money shown for the 75<sup>th</sup> percentile.
- And for a **90 percent chance** of having enough money to cover health insurance premiums and out-of-pocket expenses in retirement, he or she will need to have saved the amount of money shown for the 90<sup>th</sup> percentile.

Although the median (mid-point) amount needed for a couple is approximately the same as the sum of the amounts needed for each individual spouse at the median, the same is not true at the larger percentiles. Due to the benefits of pooling available with even two people, the 75<sup>th</sup> percentile total needed for a couple is less than the sum of the 75<sup>th</sup> percentiles for the male and female separately. The difference between the 90<sup>th</sup> percentile for a couple and the sum of the 90<sup>th</sup> percentiles for a single male and a single female are even more pronounced.

## Retirees Without Employment-Based Retiree Health Benefits

Figure 2 contains the savings estimates for a person who purchases Medigap Plan F and Medicare Part D outpatient drug benefits to supplement Medicare. As discussed above, there will be uncertainty related to a number of variables, such as health care costs, longevity, and interest rates. Among persons with Medicare Part D, there is also the uncertainty related to health status and prescription drug use. Projections of savings needed to cover out-of-pocket expenses for prescription drugs are highly dependent on the assumptions used for drug utilization. There are three columns of estimates in Figure 2: one where prescription drug use is at the *median* throughout retirement, one where prescription drug use is *higher* (at the 75<sup>th</sup> percentile throughout retirement), and one where prescription drug use is *much higher* (at the 90<sup>th</sup> percentile throughout retirement).

Separate estimates are presented for men and women. Because women have longer life expectancies than men, they will generally need larger savings than men to cover health insurance premiums and health care expenses in retirement when examining needed savings at the median and at the 75<sup>th</sup> and 90<sup>th</sup> percentiles. In other words, women will need greater initial savings than men when both set a goal—for example, of having a 90 percent chance of having enough money to cover health expenses in retirement.

**Median Drug Expenses:** According to Figure 2, a man with median drug expenditures would need \$65,000 in savings and a woman would need \$93,000 if each has a goal of having a 50 percent chance of having enough money saved to cover health care expenses in retirement. If an individual instead wanted a 90 percent chance of having enough savings, \$124,000 would be needed for a man, and \$152,000 would be needed for a woman.<sup>14</sup>

A couple *both* with median drug expenses would need \$158,000 to have a 50 percent change of having enough money to cover health care expenses in retirement. They would need \$218,000 to have a 75 percent chance of covering their expenses, and \$271,000 to have a 90 percent chance of covering their expenses.

**75<sup>th</sup> Percentile in Drug Expenses:** Among individuals with drug expenditures at the 75<sup>th</sup> percentile, needed savings would be \$79,000 for a man and \$105,000 for a woman if each wanted a 50 percent chance of having enough savings to cover health care expenses in retirement. A man would need \$151,000 and a woman \$173,000 to have a 90 percent chance of having enough savings.

**90<sup>th</sup> Percentile in Drug Expenses:** At the 90<sup>th</sup> percentile in drug spending, a man would need \$187,000 and a woman would need \$213,000 to have a 90 percent chance of having enough money to cover health care expenses in retirement.

## Impact of PPACA

It is important to note that the Patient Protection and Affordable Care Act of 2010 (PPACA) had an impact on reducing the needed savings as compared with EBRI's prior estimates. Prior to PPACA, individuals with Medicare Part D would be responsible for 100 percent of the costs of prescription drugs in the "doughnut hole."<sup>15</sup> PPACA phases coinsurance down to 25 percent through 2020, resulting in lower out-of-pocket spending for individuals with relatively high drug utilization.

The savings estimates for persons with median drug expenses fell 20–30 percent. Most of this decline can be attributed to the re-benchmarking of the Medigap Plan F premium, as individuals with median drug expenses will not be incurring expenses in the doughnut hole. In contrast, estimated needed savings to cover premiums and out-of-pocket expenses for an individual in the 90<sup>th</sup> percentile of drug utilization declined 40–50 percent. For instance, a man who wants to have a 90 percent chance of having enough money to cover his health care expenses in retirement, with drug utilization in the 90<sup>th</sup> percentile, saw his needed savings decline from \$378,000 to \$187,000. The reduction in needed savings can be attributed both to the reduction of coinsurance in the doughnut hole and the re-benchmarking of the Medigap Plan F premium.

## Savings Needed for Health Care Expenses in Retirement: The Case of Employment-Based Retiree Health Benefits

Figure 3 provides estimates of savings needed to pay for health insurance premiums, Medicare Part B premiums, and out-of-pocket health care costs during retirement for a person with employment-based retiree health benefits as a supplement to Medicare. The amounts that a married couple will need are also shown. As mentioned above, about 23 percent of Medicare beneficiaries had retiree health benefits through a former employer as a supplement to Medicare in 2005 (Fronstin, Salisbury, and VanDerhei, 2008).

Figure 3 contains two columns of estimates: one assumes that the employer subsidizes a portion of the premium, and the other assumes that the retiree is responsible for paying the entire premium. Prior research has found that, when employers provide a subsidy, retirees are responsible for about 40 percent of the premium;<sup>16</sup> however, it is becoming more common for employers to provide "access-only" plans where the retiree pays the entire premium, if any retiree health benefit is provided at all.

This model uses predicted excess cost growth in Medicare plus per-capita growth in the economy to predict health care premium increases. It also assumes that at age 65 an individual spends nearly \$900 out-of-pocket annually on health costs and that this amount grows at the same rate as premiums grow.

Figure 3 shows that a 65-year-old man retiring in 2010 with retiree health benefits from a former employer and *premiums subsidized by that former employer* will need \$66,000 if he is comfortable with a 50 percent chance of having enough savings to cover health care expenses in retirement. In contrast, a man who wants a 90 percent chance of having enough money to cover health care expenses in retirement would need \$125,000. Women, because of their higher life expectancy, would need savings of \$88,000 and \$143,000, respectively, or 33 percent more than a man at the median and 14 percent more than one at the 90<sup>th</sup> percentile. A married couple would need savings of \$153,000 at the 50<sup>th</sup> percentile, \$212,000 at the 75<sup>th</sup> percentile, and \$262,000 at the 90<sup>th</sup> percentile.

Retirees who have employment-based retiree health benefits to supplement Medicare and whose former employer *does not subsidize premiums*—an increasingly common situation—will need to save more money than retirees whose premiums are subsidized. A man without subsidized premiums would need \$109,000 in savings to cover health care costs in retirement if he wants a 50 percent chance of having enough money to cover health care expenses in retirement, while a woman would need \$146,000. To have a 90 chance of having enough savings to cover health care costs in retirement, a man would need \$211,000 and a woman would need \$242,000 if the benefit is through a former employer and not subsidized. A couple with unsubsidized retiree health benefits will need \$256,000 at the 50<sup>th</sup> percentile, \$356,000 at the 75<sup>th</sup> percentile, and \$443,000 at the 90<sup>th</sup> percentile.

The 2010 savings target for men and for women range from 2–13 percent lower than the same estimates just one year ago for individuals retiring at age 65 in 2009 (Fronstin, Salisbury, VanDerhei, 2009). The joint estimates for a married couple retiring at age 65 in 2010 ranges from 1 percent lower to 7 percent higher than the same number in 2009. The declines occurred because of a revision in the 2009 health inflation estimate, reflecting negative economic growth in 2009.

### **Savings Needed for a 65 Year Old in 2020 (Currently Age 55)**

While the estimates in Figures 2 and 3 are useful, individuals who have already reached age 65 generally do not have time to save for health care expenses in retirement if they have not already done so. The general rule of thumb has always been the earlier an individual starts saving for retirement, the easier it will be to meet his or her goals. Previous EBRI research has shown that Baby Boomers and Generation X retirees will face a combined shortfall of a \$4.55 trillion between expected retirement income compared with what they will need to cover basic expenditures and any expense associated with an episode of care in a nursing home or from a home health provider (VanDerhei, 2010). The remainder of this section focuses on the amount of money an individual will need to save to cover health insurance premiums and out-of-pocket expenses in retirement for a person 55 years old in 2010 who will not retire until age 65 in 2020.

### **Medigap and Medicare Part D**

Figure 4 shows the level of savings required for a 55-year-old retiring at age 65 in 2020 to cover Medigap premiums, Medicare Part D premiums, and out-of-pocket prescription drug expenses. The three columns contain estimates that vary with different levels of prescription drug expenses during retirement, as well as different probability levels of having enough money to cover out-of-pocket health expenses in retirement.

According to Figure 4, a man with *median* drug expenditures would need \$109,000 and a woman would need \$156,000 in savings if he or she wants a 50 percent chance of having enough money to cover health care expenses in retirement. For a 90 percent chance of having enough savings, a man would need \$208,000 while a woman would need \$255,000.

Among individuals with *higher* drug expenditures (at the 75<sup>th</sup> percentile level), needed savings would be \$132,000 for a man and \$176,000 for a woman for a 50–50 chance of having enough savings to cover health care expenses in retirement. This same person would need \$253,000 (man) and \$290,000 (woman) in savings to have a 90 percent chance of having enough money for this purpose.

Men at the highest (90<sup>th</sup>) percentile of drug spending would need \$313,000 and women would need \$357,000 to have a 90 percent chance of having enough money to cover health care expenses in retirement.

### **Employment-Based Retiree Health Benefits**

Figure 5 provides estimates of savings needed for health insurance premiums, Medicare Part B premiums, and out-of-pocket expenses during retirement for a person with employment-based retiree health benefits. The estimates in this figure are for an individual who is 55 years old in 2010 and does not retire until age 65 in 2020. In column one, estimates are presented for a retiree whose premiums are subsidized by his or her former employer. In the second column, estimates are presented based on the assumption that the individual will have access to retiree health benefits through a former employer but that the plan is an access-only plan, such that the individual is responsible for paying the entire premium.

Figure 5 shows that, at the median, a 65-year-old man retiring in 2020 will need \$111,000 in savings at age 65 to pay for his portion of premiums and out-of-pocket expenses each year, and a woman would need \$147,000, assuming they have subsidized employment-based retiree health benefits. In contrast, a man retiring in 2020 at the median who pays the entire premium for a health benefit through a former employer would need \$183,000 in savings, while a woman would need \$245,000. If a retiree wants a 90 percent chance of having enough savings to cover health insurance premiums and out-of-pocket health care expenses in retirement, a man would need \$210,000 and a woman would need \$240,000 if premiums are subsidized by a former employer, and \$354,000 for a man and \$406,000 for a woman



**Figure 2**  
**Savings Needed for Medigap Premiums, Medicare Part B Premiums, Medicare Part D Premiums, and Out-of-Pocket Drug Expenses for Retirement at Age 65 in 2010**

	Median Prescription Drug Expenses Throughout Retirement	75th Percentile of Prescription Drug Expenses Throughout Retirement	90th Percentile of Prescription Drug Expenses Throughout Retirement
<b>Men</b>			
Median	\$65,000	\$79,000	\$100,000
75th Percentile	97,000	118,000	147,000
90th Percentile	124,000	151,000	187,000
<b>Women</b>			
Median	93,000	105,000	131,000
75th Percentile	121,000	137,000	170,000
90th Percentile	152,000	173,000	213,000
<b>Married Couple</b>			
Median	158,000	184,000	231,000
75th Percentile	218,000	255,000	317,000
90th Percentile	271,000	317,000	391,000

Source: Author simulations based on assumptions described in the text.

**Figure 3**  
**Savings Needed for Employment-Based Health Premiums, Medicare Part B Premiums, and Out-of-Pocket Costs for Retirement at Age 65 in 2010**

	Employer Subsidizes Premiums	No Employer Subsidy of Premiums
<b>Men</b>		
Median	\$66,000	\$109,000
75th Percentile	98,000	165,000
90th Percentile	125,000	211,000
<b>Women</b>		
Median	88,000	146,000
75th Percentile	114,000	192,000
90th Percentile	143,000	242,000
<b>Married Couple</b>		
Median	153,000	256,000
75th Percentile	212,000	356,000
90th Percentile	262,000	443,000

Source: Author simulations based on assumptions described in the text.

**Figure 4**  
**Savings Needed for Medigap Premiums, Medicare Part B Premiums, Medicare Part D Premiums, and Out-of-Pocket Drug Expenses for Retirement at Age 65 in 2020**

	Median Prescription Drug Expenses Throughout Retirement	75th Percentile of Prescription Drug Expenses Throughout Retirement	90th Percentile of Prescription Drug Expenses Throughout Retirement
<b>Men</b>			
Median	\$109,000	\$132,000	\$166,000
75th Percentile	163,000	198,000	246,000
90th Percentile	208,000	253,000	313,000
<b>Women</b>			
Median	156,000	176,000	220,000
75th Percentile	203,000	230,000	285,000
90th Percentile	255,000	290,000	357,000
<b>Married Couple</b>			
Median	265,000	308,000	387,000
75th Percentile	365,000	427,000	531,000
90th Percentile	454,000	531,000	655,000

Source: Author simulations based on assumptions described in the text.

if premiums are not subsidized and the retiree pays the entire premium. (As mentioned above, employers increasingly are moving to access-only plans.) Married couples would need \$742,000 if premiums are not subsidized and they want a 90 percent chance of having enough money to cover health insurance premiums and out-of-pocket expenses in retirement.

## Sensitivity Analysis on Medigap Premiums

In conducting the research for this report, it was found that there is wide variation in Medigap premiums. These plans have been standardized, which means a Medicare beneficiary purchasing Medigap Plan F in one state will have the same exact benefits as a Medicare beneficiary purchasing Medigap Plan F in a different state. The average premium was found to be \$1,479 for Plan F in 2010. However, premiums for Plan F vary considerably by state. For example, in 2010, the highest average premium for Plan F was found in Connecticut, where it was \$2,493. Neighboring New York had an average premium of \$1,722, and Rhode Island had an average premium of \$1,348.

State averages can mask an even wider variation in premiums that cannot be accounted for by any difference in the comprehensiveness of the benefits package. Even within a state there is often wide variation in the premiums offered by different health plans. Mississippi and New Jersey have the lowest premium variation. The highest premium is about two-thirds higher than the lowest premium in Mississippi and New Jersey. Indiana has the highest premium variation: The highest premium was found to be nearly 12 times as large as the lowest premium. The lowest premium was \$1,152, but at least one plan offered Medigap Plan F at a premium of \$14,604. California has the next-highest variation, with the highest premium being nearly four times the lowest premium.<sup>18</sup>

Figure 6 contains asset targets for having adequate savings to cover retiree health costs 50 percent, 75 percent, and 90 percent of the time for a person purchasing Medigap Plan F, Medicare Part B, and Medicare Part D. The scenario in the figure assumes median prescription drug expenses. The first column uses the same average Plan F premium that the savings estimates were based on in Figures 2–5. The middle column uses the lowest premium found, \$948 in Oregon. The last column uses the highest premium found, \$14,604 in Indiana.

It was determined that men in Oregon, where the lowest Plan F premium was found, would need 10–20 percent less in assets than men paying the average Plan F premium. Women would need 17–27 percent less, and married couples would need 12–24 percent less. In contrast, men in Indiana, where the highest Plan F premium was found, would need 400–450 percent more in assets. Women would need about 360–425 percent more in assets. And married couples would need about 375–450 percent more in joint assets.

## Conclusion

This report provides estimates for savings needed to cover health insurance to supplement Medicare and out-of-pocket expenses for health care services in retirement. It was found that men age 65 in 2010 retiring at age 65 will need anywhere from \$65,000 to \$109,000 in savings to cover health insurance premiums and out-of-pocket expenses in retirement if they want a 50–50 chance of being able to have enough money, and \$124,000 to \$211,000 if they prefer a 90 percent chance. Other findings:

### *Men:*

- Men who supplement traditional Medicare with Medigap and Medicare Part D and who have relatively high prescription drug expenses will need \$100,000 if comfortable with a 50 percent chance of having enough savings; to increase their odds to 90 percent, they would need \$187,000.
- Men with *subsidized* retiree health benefits will need \$66,000, if comfortable with a 50 percent chance of having enough savings to cover health care expenses in retirement.
- Those with *unsubsidized* retiree health benefits who want a 90 percent chance of having enough savings will need \$211,000.

### **Women:**

- Women retiring at age 65 in 2010 will need anywhere from \$88,000–\$146,000 in savings to cover health insurance premiums and out-of-pocket expenses in retirement if they are comfortable with a 50 percent chance of having enough money, and \$143,000–\$242,000 if they prefer a 90 percent chance.
- Women who supplement traditional Medicare with Medigap and Medicare Part D and who have relatively high prescription drug expenses will need \$131,000 if comfortable with a 50 percent chance of having enough savings, while those who prefer a 90 percent chance of having enough savings would need \$213,000.
- Women with *subsidized* retiree health benefits will need \$88,000 if comfortable with a 50 percent chance of having enough savings to cover health care expenses in retirement.
- Women with *unsubsidized* retiree health benefits who want a 90 percent chance of having enough savings will need \$242,000.

Persons currently age 55 will need even greater savings when they turn 65 in 2020. Needed savings for men range from \$109,000–\$354,000, while needed savings for women range from \$147,000–\$406,000 depending on their source of health insurance coverage to supplement Medicare, any employer subsidies, prescription drug use, and their savings goal related to their comfort level with having a 50 percent, 75 percent, or 90 percent chance of having enough savings to cover health insurance premiums and out-of-pocket health care expenses in retirement.

Most workers have always had the responsibility for their health care in retirement. The fact that seniors had greater financial needs but less financial protection than younger workers is one reason leading up to the passage of Medicare (Institute of Medicine, 1993). Nearly 90 percent of Medicare beneficiaries have some form of insurance coverage to supplement Medicare Parts A and B. As employers continue to move away from providing retiree health benefits, more of the retirees who have had subsidized employment-based coverage in the past will have to assume for themselves the financial risk associated with longevity. Predicted future erosion in Medicare benefits will exacerbate longevity risk.

This report's estimates comparing the savings needed for a person based on a 50 percent chance of having enough money to cover health insurance premiums and out-of-pocket health care costs with a 90 percent chance of having enough money highlights the impact of longevity and investment risk. While workers will have a difficult time saving enough money to cover health care expenses in retirement whether they live to average life expectancy or beyond, many are generally unprepared for *both* health care expenses in retirement and retirement expenses. In fact, many individuals will need more money than the amounts cited in this report because this analysis does not factor in the savings needed to cover long-term care expenses,<sup>18</sup> nor does it take into account the fact that many individuals retire prior to becoming eligible for Medicare. However, some workers will need to save less than what is reported if they choose to work during retirement and receive health benefits as active workers.

Finally, issues surrounding retirement income security are certain to become an even greater challenge in the future as employers continue to scale back retiree health benefits, and when policymakers begin to realistically address the financial shortfall in the Medicare program with solutions that are likely to shift more responsibility for health care costs to Medicare beneficiaries.

**Figure 5**  
**Savings Needed for Employment-Based Health Premiums, Medicare Part B Premiums, and Out-of-Pocket Costs for Retirement at Age 65 in 2020**

	Employer Subsidizes Premiums	No Employer Subsidy of Premiums
<b>Men</b>		
Median	\$111,000	\$183,000
75th Percentile	164,000	277,000
90th Percentile	210,000	354,000
<b>Women</b>		
Median	147,000	245,000
75th Percentile	191,000	322,000
90th Percentile	240,000	406,000
<b>Married Couple</b>		
Median	256,000	429,000
75th Percentile	355,000	597,000
90th Percentile	439,000	742,000

Source: Author simulations based on assumptions described in the text.

**Figure 6**  
**Sensitivity Analysis: Impact of Medigap Premium on Savings Needed for Medigap Premiums, Medicare Part B Premiums, Medicare Part D Premiums, and Out-of-Pocket Drug Expenses for Retirement at Age 65 in 2010**

	Average Medigap Premium	Lowest Medigap Premium	Highest Medigap Premium
<b>Men</b>			
Median	\$65,000	\$55,000	\$320,000
75th Percentile	97,000	81,000	486,000
90th Percentile	124,000	113,000	689,000
<b>Women</b>			
Median	93,000	73,000	431,000
75th Percentile	121,000	95,000	568,000
90th Percentile	152,000	130,000	794,000
<b>Married Couple</b>			
Median	158,000	127,000	751,000
75th Percentile	218,000	176,000	1,054,000
90th Percentile	271,000	243,000	1,483,000

Source: Author simulations based on assumptions described in the text.

## Bibliography

- Employee Benefit Research Institute. *Measuring and Funding Corporate Liabilities for Retiree Health Benefits*. Washington, DC: Employee Benefit Research Institute, 1988.
- \_\_\_\_\_. *Retiree Health Benefits: What Is the Promise?* Washington, DC: Employee Benefit Research Institute, 1989.
- Fronstin, Paul. "Retiree Health Benefits: What the Changes May Mean for Future Benefits." *EBRI Issue Brief*, no. 175 (Employee Benefit Research Institute, July 1996).
- \_\_\_\_\_. "Employee Benefits, Retirement Patterns, and Implications for Increased Work Life." *EBRI Issue Brief*, no. 184 (Employee Benefit Research Institute, April 1997).
- \_\_\_\_\_. "Retiree Health Benefits: Trends and Outlook." *EBRI Issue Brief*, no. 236 (Employee Benefit Research Institute, August 2001).
- \_\_\_\_\_. "The Impact of the Erosion of Retiree Health Benefits on Workers and Retirees." *EBRI Issue Brief*, no. 279 (Employee Benefit Research Institute, March 2005).
- \_\_\_\_\_. "Savings Needed to Fund Health Insurance and Health Care Expenses in Retirement." *EBRI Issue Brief*, no. 295 (Employee Benefit Research Institute, July 2006).
- \_\_\_\_\_. "Sources of Coverage and Characteristics of the Uninsured: Analysis of the March 2007 Current Population Survey." *EBRI Issue Brief*, no. 310 (Employee Benefit Research Institute), October 2007.
- \_\_\_\_\_. "Scrambling for Health Insurance Coverage: Health Security for People between 55–64 Years of Age." Statement for the United States Senate Special Committee on Aging, April 3, 2008.
- Fronstin, Paul, and Dallas Salisbury. "Retiree Health Benefits: Savings Needed to Fund Health Care in Retirement." *EBRI Issue Brief*, no. 254 (Employee Benefit Research Institute, February 2003).
- \_\_\_\_\_. "Health Care Expenses in Retirement and the Use of Health Savings Accounts." *EBRI Issue Brief*, no. 271 (Employee Benefit Research Institute, July 2004).
- Fronstin, Paul, Dallas Salisbury, and Jack VanDerhei. "Savings Needed to Fund Health Insurance and Health Care Expenses in Retirement: Findings from a Simulation Model." *EBRI Issue Brief*, no. 317 (Employee Benefit Research Institute, May 2008).
- \_\_\_\_\_. "Savings Needed to Fund Health Insurance and Health Care Expenses in Retirement: An Examination of Persons Ages 55 and 65 in 2009." *EBRI Notes*, no. 6 (Employee Benefit Research Institute, June 2009): 2–11.
- Institute of Medicine. *Employment and Health Benefits: A Connection at Risk*. Washington, DC: National Academy Press, 1993.
- Salisbury, Dallas L., and Paul Fronstin. "How Many Medicare Beneficiaries Will Lose Employment-Based Retiree Health Benefits if Medicare Covers Outpatient Prescription Drugs?" *EBRI Special Report SR-43* (Employee Benefit Research Institute, July 18, 2003).
- VanDerhei, Jack. "Measuring Retirement Income Adequacy: Calculating Realistic Income Replacement Rates." *EBRI Issue Brief*, no. 297 (Employee Benefit Research Institute, September 2006).
- \_\_\_\_\_. "Retirement Savings Shortfalls for Today's Workers." *EBRI Notes*, no. 10 (Employee Benefit Research Institute, October 2010): 2–9.
- VanDerhei, Jack, and Craig Copeland. "Can America Afford Tomorrow's Retirees: Results From the EBRI-ERF Retirement Security Projection Model." *EBRI Issue Brief*, no. 263 (Employee Benefit Research Institute, November 2003).

## Endnotes

---

<sup>1</sup> See [www.ebri.org/pdf/FFE182.26Oct10.EarlyRets.Final.pdf](http://www.ebri.org/pdf/FFE182.26Oct10.EarlyRets.Final.pdf)

<sup>2</sup> See [www.cbo.gov/ftpdocs/115xx/doc11579/06-30-LTBO.pdf](http://www.cbo.gov/ftpdocs/115xx/doc11579/06-30-LTBO.pdf)

<sup>3</sup> Medicare beneficiaries with income below \$85,000 who have Part B premiums deducted from their Social Security checks did not experience an increase in premiums in 2010 and will not experience one in 2011. In 2010, Social Security benefits did not include a cost-of-living adjustment (COLA). The Social Security Act protects most beneficiaries from having a decrease in their Social Security benefits from one year to the next because of an increase in the Part B premium. As a result, most beneficiaries who have the Part B premium deducted from their Social Security benefit check continued to pay \$96.40 per month in 2010 and will continue to do so in 2011. New Social Security beneficiaries pay the posted Medicare Part B premium.

<sup>4</sup> See [www.cms.gov/ReportsTrustFunds/downloads/2010TRAlternativeScenario.pdf](http://www.cms.gov/ReportsTrustFunds/downloads/2010TRAlternativeScenario.pdf)

<sup>5</sup> On Dec. 1, 2010, physician payments are scheduled to decline 23 percent. Further declines are scheduled in 2011 (-6.5 percent) and 2012 (-2.9 percent).

<sup>6</sup> See [www.cms.gov/ReportsTrustFunds/downloads/tr2010.pdf](http://www.cms.gov/ReportsTrustFunds/downloads/tr2010.pdf)

<sup>7</sup> Premiums were generated from [www.aarphealthcare.com/](http://www.aarphealthcare.com/) for a 65-year-old newly eligible for Medicare.

<sup>8</sup> Prior research has found even higher premium variation. For example, in 2006, the average premium for Plan F was \$1,833, but ranged from about \$700 to nearly \$11,000 across the U.S. See [www.thestreet.com/story/10308492/thestreetcom-ratings-medigap-plans-vary-in-price.html](http://www.thestreet.com/story/10308492/thestreetcom-ratings-medigap-plans-vary-in-price.html)

<sup>9</sup> See [www.fidelity.com/inside-fidelity/employer-services/fidelity-estimates-couple-retiring-in-2010-will-need-250000-to-cover-healthcare-costs](http://www.fidelity.com/inside-fidelity/employer-services/fidelity-estimates-couple-retiring-in-2010-will-need-250000-to-cover-healthcare-costs)

<sup>10</sup> In the case of a married couple both currently age 65, the probability that at least one of the spouses will still be alive at various ages is even greater.

<sup>11</sup> See Chapter 4 of EBRI's *Fundamentals of Employee Benefit Programs*, sixth edition, online at <http://bit.ly/bvyECG>

<sup>12</sup> More information is available from Medicare at [www.medicare.gov/choices/advantage.asp](http://www.medicare.gov/choices/advantage.asp)

<sup>13</sup> A technique used to estimate the likely range of outcomes from a complex process by simulating the process under randomly selected conditions a large number of times.

<sup>14</sup> Nominal after-tax rates of return were assumed to follow a log-normal distribution with a mean of 1.078 and a standard deviation of 0.101. This provides a median nominal annual return of 7.32 percent.

<sup>15</sup> These estimates are lower than the prior estimates mainly because they include new data on Medigap Plan F premiums. In the prior estimates, data on premiums from 2005 were used and inflated based on trends in health care cost increases. Since the last report, new data on premiums became available for 2010, which allowed re-benchmarking of the Plan F premium, resulting in a premium that was lower than it would have otherwise been when inflating the 2005 estimates.

<sup>16</sup> The so-called "donut hole" is a coverage gap in the Medicare Part D prescription drug program. See "coverage gap" on the Medicare website at [www.medicare.gov/find-a-plan/staticpages/glossary/planfinder-glossary.aspx?let=C](http://www.medicare.gov/find-a-plan/staticpages/glossary/planfinder-glossary.aspx?let=C)

<sup>17</sup> See [www.kff.org/medicare/med121306pkg.cfm](http://www.kff.org/medicare/med121306pkg.cfm)

<sup>18</sup> Premium ranges for each state were determined using data provided at [www.medicare.gov](http://www.medicare.gov).

<sup>19</sup> See VanDerhei (2006) for estimates of the impact of long-term care expenses on the amounts needed for sufficient retirement income at the 50th, 75th, and 90th percentiles.

**Where the world turns for the facts on U.S. employee benefits.**

Retirement and health benefits are at the heart of workers', employers', and our nation's economic security. Founded in 1978, EBRI is the most authoritative and objective source of information on these critical, complex issues.

**EBRI focuses solely on employee benefits research — no lobbying or advocacy**

EBRI stands alone in employee benefits research as an independent, nonprofit, and nonpartisan organization. It analyzes and reports research data without spin or underlying agenda. All findings, whether on financial data, options, or trends, are revealing and reliable — the reason EBRI information is the gold standard for private analysts and decision makers, government policymakers, the media, and the public.

**EBRI explores the breadth of employee benefits and related issues**

EBRI studies the world of health and retirement benefits — issues such as 401(k)s, IRAs, retirement income adequacy, consumer-driven benefits, Social Security, tax treatment of both retirement and health benefits, cost management, worker and employer attitudes, policy reform proposals, and pension assets and funding. There is widespread recognition that if employee benefits data exist, EBRI knows it.

**EBRI delivers a steady stream of invaluable research and analysis**

- EBRI publications include in-depth coverage of key issues and trends; summaries of research findings and policy developments; timely factsheets on hot topics; regular updates on legislative and regulatory developments; comprehensive reference resources on benefit programs and workforce issues; and major surveys of public attitudes.
- EBRI meetings present and explore issues with thought leaders from all sectors.
- EBRI regularly provides congressional testimony, and briefs policymakers, member organizations, and the media on employer benefits.
- EBRI issues press releases on newsworthy developments, and is among the most widely quoted sources on employee benefits by all media.
- EBRI directs members and other constituencies to the information they need, and undertakes new research on an ongoing basis.
- EBRI maintains and analyzes the most comprehensive database of 401(k)-type programs in the world. Its computer simulation analyses on Social Security reform and retirement income adequacy are unique.

**EBRI makes information freely available to all**

EBRI assumes a public service responsibility to make its findings completely accessible at [www.ebri.org](http://www.ebri.org) — so that all decisions that relate to employee benefits, whether made in Congress or board rooms or families' homes, are based on the highest quality, most dependable information. EBRI's Web site posts all research findings, publications, and news alerts. EBRI also extends its education and public service role to improving Americans' financial knowledge through its award-winning public service campaign *ChoosetoSave*® and the companion site [www.choosetosave.org](http://www.choosetosave.org)

**EBRI is supported by organizations from all industries and sectors that appreciate the value of unbiased, reliable information on employee benefits.** Visit [www.ebri.org/about/join/](http://www.ebri.org/about/join/) for more.

---

*EBRI Employee Benefit Research Institute Issue Brief* (ISSN 0887-137X) is published monthly by the Employee Benefit Research Institute, 1100 13th St. NW, Suite 878, Washington, DC, 20005-4051, at \$300 per year or is included as part of a membership subscription. Periodicals postage rate paid in Washington, DC, and additional mailing offices. POSTMASTER: Send address changes to: *EBRI Issue Brief*, 1100 13th St. NW, Suite 878, Washington, DC, 20005-4051. Copyright 2010 by Employee Benefit Research Institute. All rights reserved. No. 351

---

## Who we are

---

The Employee Benefit Research Institute (EBRI) was founded in 1978. Its mission is to contribute to, to encourage, and to enhance the development of sound employee benefit programs and sound public policy through objective research and education. EBRI is the only private, nonprofit, nonpartisan, Washington, DC-based organization committed exclusively to public policy research and education on economic security and employee benefit issues. EBRI's membership includes a cross-section of pension funds; businesses; trade associations; labor unions; health care providers and insurers; government organizations; and service firms.

## What we do

---

EBRI's work advances knowledge and understanding of employee benefits and their importance to the nation's economy among policymakers, the news media, and the public. It does this by conducting and publishing policy research, analysis, and special reports on employee benefits issues; holding educational briefings for EBRI members, congressional and federal agency staff, and the news media; and sponsoring public opinion surveys on employee benefit issues. **EBRI's Education and Research Fund** (EBRI-ERF) performs the charitable, educational, and scientific functions of the Institute. EBRI-ERF is a tax-exempt organization supported by contributions and grants.

## Our publications

---

*EBRI Issue Briefs* are periodicals providing expert evaluations of employee benefit issues and trends, as well as critical analyses of employee benefit policies and proposals. *EBRI Notes* is a monthly periodical providing current information on a variety of employee benefit topics. EBRI's *Pension Investment Report* provides detailed financial information on the universe of defined benefit, defined contribution, and 401(k) plans. EBRI *Fundamentals of Employee Benefit Programs* offers a straightforward, basic explanation of employee benefit programs in the private and public sectors. The *EBRI Databook on Employee Benefits* is a statistical reference work on employee benefit programs and work force-related issues. [www.ebri.org](http://www.ebri.org)

## Orders/ Subscriptions

---

Contact EBRI Publications, (202) 659-0670; fax publication orders to (202) 775-6312. Subscriptions to *EBRI Issue Briefs* are included as part of EBRI membership, or as part of a \$199 annual subscription to *EBRI Notes* and *EBRI Issue Briefs*. Individual copies are available with prepayment for \$25 each (for printed copies). **Change of Address:** EBRI, 1100 13th St. NW, Suite 878, Washington, DC, 20005-4051, (202) 659-0670; fax number, (202) 775-6312; e-mail: [subscriptions@ebri.org](mailto:subscriptions@ebri.org) **Membership Information:** Inquiries regarding EBRI membership and/or contributions to EBRI-ERF should be directed to EBRI President/ASEC Chairman Dallas Salisbury at the above address, (202) 659-0670; e-mail: [salisbury@ebri.org](mailto:salisbury@ebri.org)

**Editorial Board:** Dallas L. Salisbury, publisher; Stephen Blakely, editor. Any views expressed in this publication and those of the authors should not be ascribed to the officers, trustees, members, or other sponsors of the Employee Benefit Research Institute, the EBRI Education and Research Fund, or their staffs. Nothing herein is to be construed as an attempt to aid or hinder the adoption of any pending legislation, regulation, or interpretative rule, or as legal, accounting, actuarial, or other such professional advice.

*EBRI Issue Brief* is registered in the U.S. Patent and Trademark Office. ISSN: 0887-137X/90 0887-137X/90 \$.50+.50