



Planning for Health Care

How Excellent Health and Longevity
Impact Retirement Income Planning



September 2014

About the Insured Retirement Institute:

The Insured Retirement Institute (IRI) is the leading association for the retirement income industry. IRI proudly leads a national consumer coalition of more than 30 organizations, and is the only association that represents the entire supply chain of insured retirement strategies. IRI members are the major insurers, asset managers, broker-dealers/distributors, and 150,000 financial professionals. As a not-for-profit organization, IRI provides an objective forum for communication and education, and advocates for the sustainable retirement solutions Americans need to help achieve a secure and dignified retirement. Learn more at www.irionline.org.



©2014 IRI

All rights reserved. No part of this book may be reprinted or reproduced in any form or used for any purpose other than educational without the express written consent of IRI.

OVERVIEW

General consensus is that most Americans hope to enjoy a long, healthy retirement, with sufficient income to meet all of their needs. Achieving this goal means understanding how assets and other income sources can be most efficiently accessed to generate sustainable lifetime income, and the impact that various costs will have on spending power. Of these costs, none are more important to understand and to plan for than health care. Cumulative medical expenses, including premiums and out-of-pocket costs, can potentially reach hundreds of thousands of dollars over a retiree's lifetime. Intuitively, maintaining optimal health throughout retirement lowers the probability that medical costs will eat into income and lower a retiree's standard of living. However, in doing so, one also increases the probability of living to an advanced age and experiencing illnesses and infirmities more common at such ages, such as dementia. Put simply, poor health may require higher health care spending over a relatively shorter period of time, while excellent health and longevity threaten the exhaustion of retirement funds at an advanced age. Moreover, significant health care costs are more likely to be incurred in a retiree's later years, highlighting the importance of adequate, sustainable income.

Understanding how health status may impact longevity, medical expenses, and income needs can help advisors and retirees develop optimal strategies for constructing income portfolios and planning for health care costs.

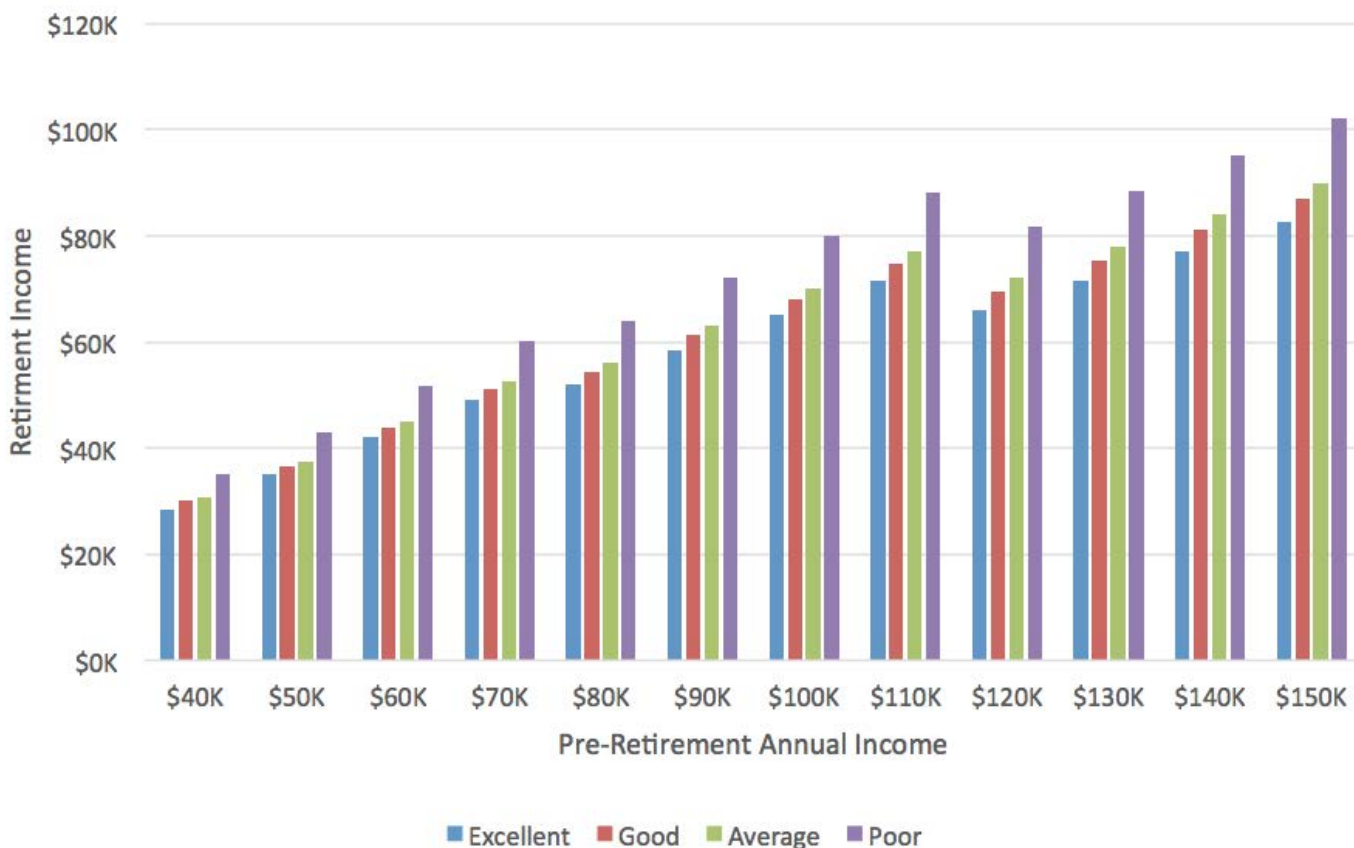
KEY FINDINGS AND ANALYSIS

- A 65-year-old male in excellent health can expect to live to age 87, while the same male in poor health (e.g. high blood pressure, high cholesterol, and tobacco use) has a life expectancy at age 65 of approximately 81 years¹.
- Medicare will only pay approximately 60% of health care expenses; the rest must be covered by supplemental insurance or out-of-pocket spending².
- Average cumulative health care expenses including insurance premiums, for a 65-year-old male in excellent health can be expected to reach \$345,000; the corresponding estimate for a 65-year-old male in poor health is about \$246,000³.
- Those in excellent health will spend less on an annual basis, but more over their retirement due to their longer expected lifespans.
- Healthy individuals have lower projected annual income requirements than unhealthy individuals due to lower expected annual health care costs, but can expect to incur higher total health care costs due to increased longevity.
- Retirement income strategies using only systematic withdrawals fall short, and risk depletion of assets at an advanced age, when the majority of Social Security income may be consumed by health care expenses.
- Average investor returns in allocation funds over the past 30 years are 1.9%, far short of the returns needed to sustain a systematic withdrawal approach over a lengthy retirement⁴.
- Retirement income strategies using annuities can increase the probability a healthy individual will be able to manage health care expenses and maintain their standard of living in the face of unpredictable, rising health care costs over the course of a lengthy retirement.

INCOME NEEDS AND HEALTH STATUS

Estimates show that income replacement needs are likely to vary based on health status, with those in excellent health requiring less annual income than those in poor health due to lower anticipated annual health care expenses. For example, an individual in excellent health with pre-retirement after-tax income of \$100,000 who plans little or no discretionary spending, such as travel, may need after-tax replacement income of \$65,000 annually. The same individual in poor health may need \$80,000 in retirement income due to the increase in expected health care expenditures.

INCOME REPLACEMENT NEED BY HEALTH STATUS

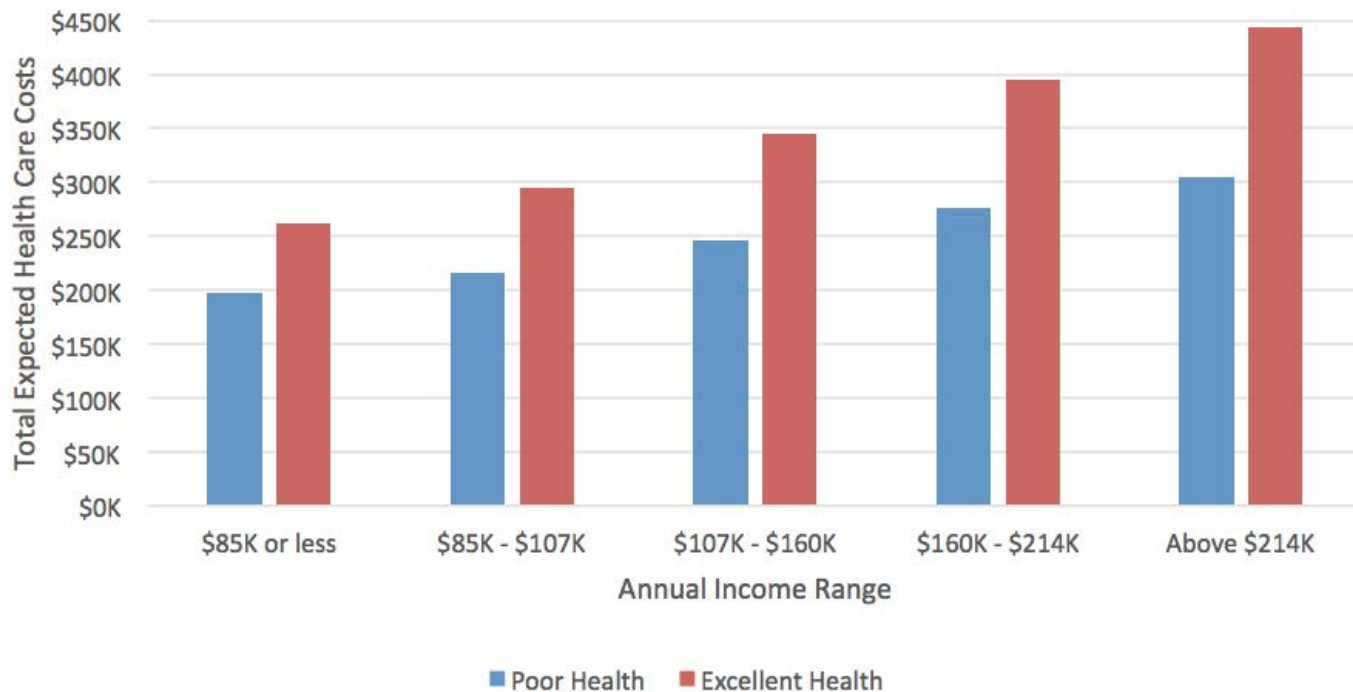


Sources: Fidelity Benefits Consulting, 2013; Bureau of Labor Statistics Consumer Expenditure Survey, 2012

TOTAL HEALTH CARE EXPENSES BY INCOME LEVEL AND HEALTH STATUS

Estimates concluding that healthy individuals require less income in retirement are intuitive; a healthy individual will likely not need to allocate as much annual income to health care expenses. However, that coin has another side: longevity and the impact of health expenditures later in life. Contrary to popular opinion, Medicare does not cover all medical costs and it is not free. Out-of-pocket costs, premiums for supplemental coverage, and means testing drive significant costs to retirees. Medicare can be expected to cover 60% of health care expenses, while the other 40% must be covered by individuals through supplemental private insurance and out-of-pocket payments⁵. And as the chart on the following page shows, someone in excellent health can expect to spend more throughout a retirement beginning at age 65 than someone in poor health (variance at different income levels is driven by means testing thresholds that increase Medicare Part B premiums):

TOTAL EXPECTED HEALTH CARE COSTS IN RETIREMENT BY HEALTH STATUS



Source: HealthView Services, Inc.

LONGEVITY AND RELATIVE HEALTH CARE COSTS

A 65-year-old male in excellent health can expect to live to age 87, while the same male in poor health (see “Health Metrics” below) has a life expectancy at age 65 of approximately 81 years; a 65-year-old female in excellent health has a life expectancy of 89, or 84 in poor health⁶.

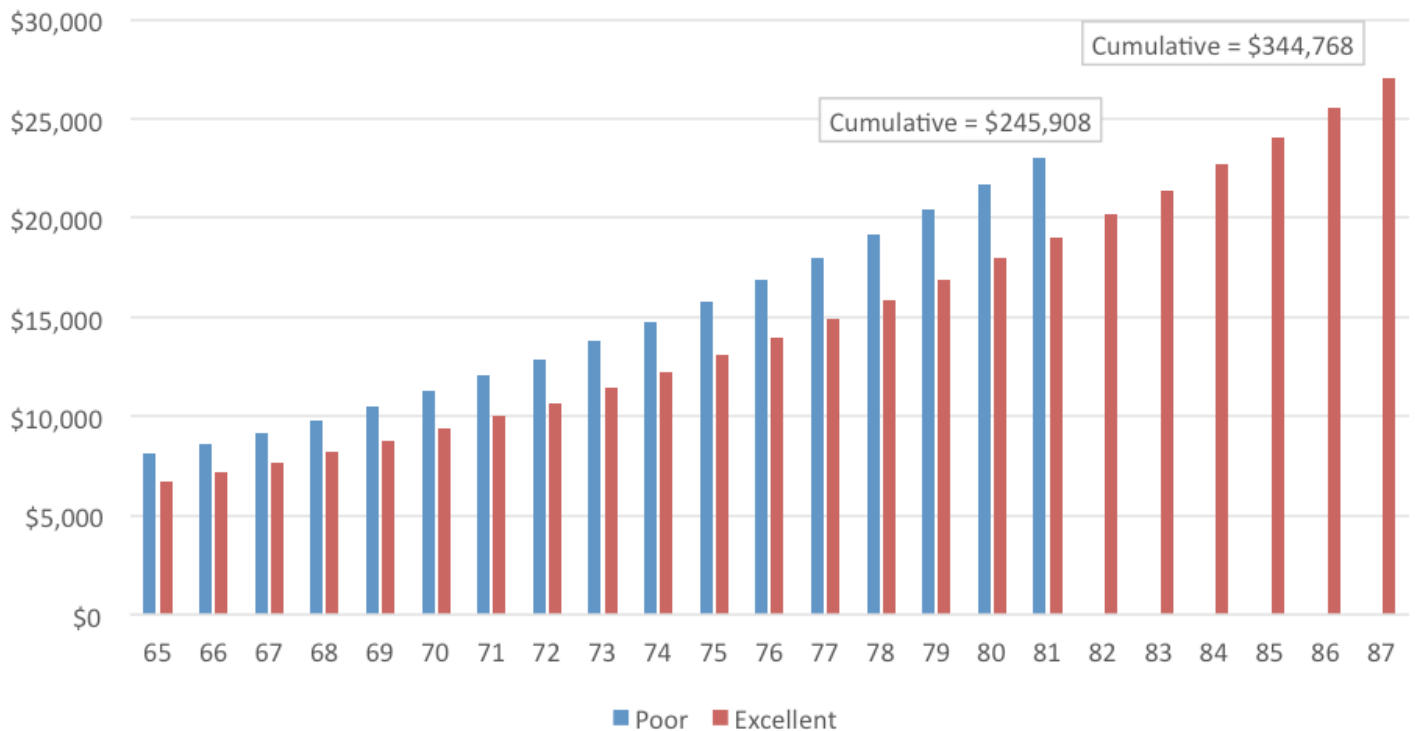
In the real world, in terms of health metrics, most individuals will not exhibit all risk factors or all healthy criteria, but rather a combination of traits. For the purpose of this analysis, excellent and poor health are defined using the common risk factors shown in the table below.

Health Metrics	Excellent Health	Poor Health
Blood pressure	Normal	High
Cholesterol	Normal	High
Last full physical	Within past 12 months	More than 12 months ago
Exercise	2 or more hours per week	Less than 2 hours per week
Diet	Healthy, well balanced	Poor
Tobacco use	No	Yes
Family history of diabetes or cardiovascular disease	No	Yes

Source: HealthView Services, Inc.

So while the healthy individual, due to longer life expectancy, is projected to incur higher total health care expenses, the individual in poor health can expect to incur higher annual expenses, eating further into retirement income and potentially lowering standard of living. The difference at the \$107,000 to \$160,000 income-level range at retirement is striking:

ANNUAL HEALTH CARE EXPENSES: COMPARISON BY HEALTH STATUS

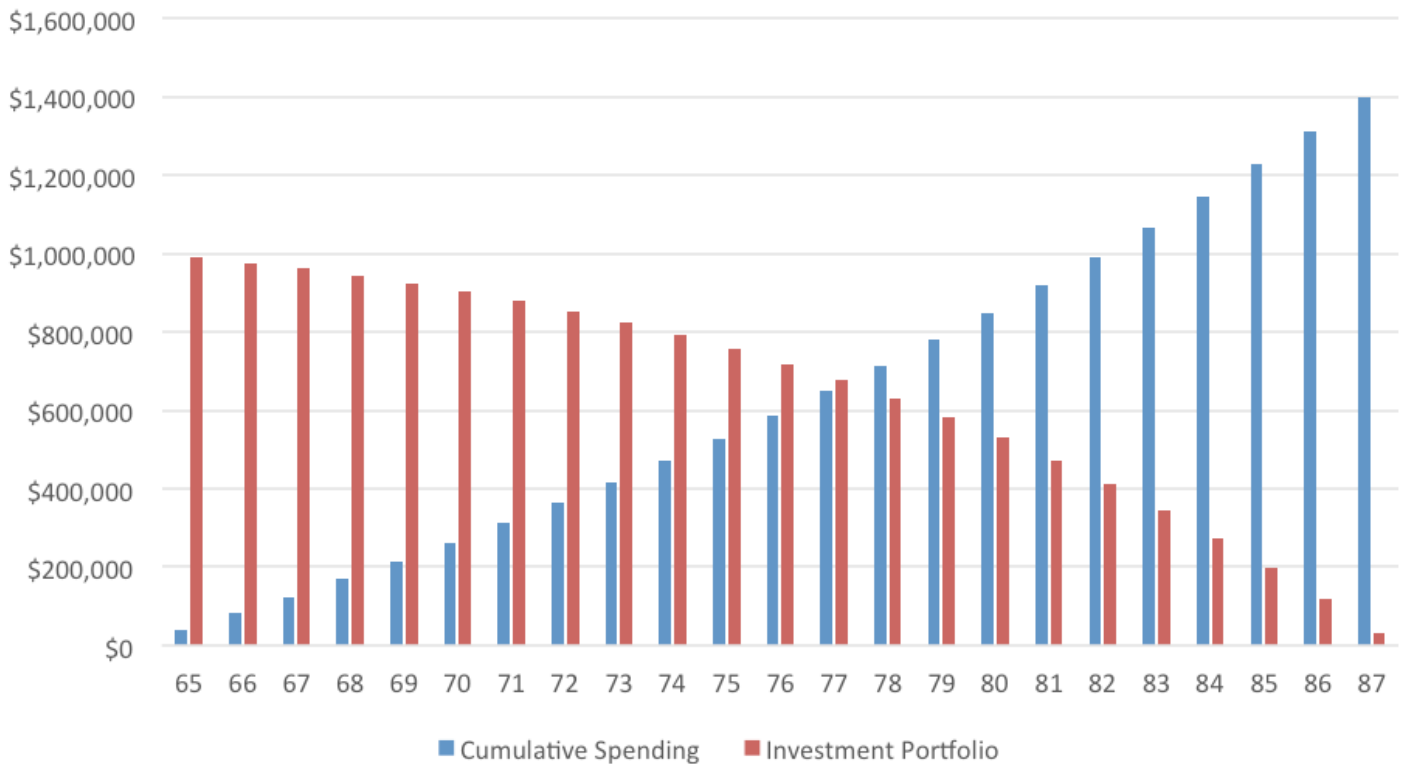


Source: HealthView Services, Inc.

A retiree in excellent health, based on national average costs, can expect to spend almost \$100,000 more on health care throughout retirement than someone in poor health, while experiencing lower annual health care expenses, at least in the early years of what may be a long retirement. The average 65-year-old will live to be 84.1 years old, but will be healthy for only 78.9 years⁷. The difference of 5.2 years, on average, represents the time from the onset of declining health until death. Intuitively, the probability also increases that those 5.2 years will represent a period of increased spending on health care. An individual in excellent health will likely be older than the average retiree when reaching “health expectancy” and entering a period of declining health, highlighting the importance of creating a sustainable income stream sufficient to help offset potentially increasing expenses. In other words, the healthiest retirees need to think about health care expenditures increasing significantly after many years living in retirement, and take steps to ensure they do not deplete their income sources prior to reaching health expectancy.

As an individual in excellent health approaches life expectancy, income needs and health care expenses accelerate, and given average historic investment returns, those cumulative expenses will likely outpace the systematic withdrawal portfolio’s ability to generate sustainable income.

CUMULATIVE SPENDING AND PORTFOLIO DEPLETION: MALE IN EXCELLENT HEALTH RETIRING AT AGE 65



Sources: Insured Retirement Institute and HealthView Services, Inc.

CREATING AN INCOME PLAN

Strategies that can help ensure that enough income will be available to cover unpredictable health care expenses and maintain one’s standard of living include using laddered single premium immediate annuities or deferred income annuities to match guaranteed income to expected liabilities. Single premium immediate annuities, or SPIAs, are purchased with a lump sum and immediately begin making lifetime payments for the lifetime of one person, or the longer lived of a married couple. Deferred income annuities, or DIAs, are also purchased with a lump sum and make lifetime payments, but the payments begin at some point two to 40 years in the future (five to 15 years is common). These strategies can be particularly effective for those in excellent health due to the ability of these individuals to maximize the value of mortality credits, as explained in more detail below.

Let’s take the case of a male in excellent health with pre-retirement income of \$120,000 per year and \$1,000,000 in spendable assets. This individual wants to secure an income of \$65,000 per year, growing at 2% annually to help offset the erosive effect of inflation on spending power, and net of expected health care expenses. The tables below shows how this individual’s income needs, with health care expenses added, might grow over time and compares combining a systematic withdrawal plan (SWiP) and laddered single premium immediate annuities (SPIAs) or deferred income annuities (DIAs) to supplement Social Security and cover income needs versus Social Security and the SWiP alone. For the SWiP-only portfolio and the remaining portfolio balance in the annuity-based plan we assume a conservative 3% growth rate. This may seem low, but bear in mind that the average investor return – that is the average return realized by investors as opposed to average stock, bond, and/or mutual fund returns – in asset allocation funds, which is used as a proxy for a balanced portfolio, over the 30-year period from 1984 through 2013 was only 1.9%⁸. With this in mind, a 3% compounded annualized return may in fact be a generous assumption. Taxes are ignored, both for simplicity and based on the premise that the average retiree’s spendable assets will be primarily located in qualified plans, resulting in similar tax treatment on both sides of the comparison.

COMPARING A SPIA/SWiP PLAN TO SWiP ONLY – MALE, EXCELLENT HEALTH:

Age	Base Need	Health Care	Total Need	Social Security	Shortfall	Annuity Purchase	Annuity Income	SWiP	Portfolio Balance w/ Annuity	Portfolio Balance (SWiP Only)
65	65,000	6,720	71,720	31,704	(40,016)	(250,000)	13,548	26,468	745,238	988,784
70	71,765	9,351	81,116	33,404	(47,712)		14,958	32,754	699,550	903,327
75	79,235	13,070	92,305	35,195	(57,110)	(250,000)	36,183	20,927	370,127	756,866
80	87,481	17,946	105,427	37,082	(68,346)		39,949	28,397	291,317	529,843
85	96,587	24,072	120,659	39,070	(81,589)		44,107	37,482	154,211	199,080
87	100,489	27,076	127,565	39,895	(87,670)		45,889	41,781	78,580	31,187

Sources: Insured Retirement Institute and HealthView Services, Inc.

The comparison illustrates a critical point: as life expectancy is approached, and with a significant percentage of the population surpassed, if the retiree’s investment returns have been average or below average – a likely scenario given historic data – and combined income needs and health care expenses have required use of principal, the risk of a SWiP-only approach completely depleting assets is quite real. When annuities are incorporated into the plan, the projected remaining balance in the portfolio is higher at life expectancy, and the projected income of \$85,783 (combined Social Security and SPIA income) will continue to grow, the annuity at 2% annually and Social Security by any COLA applied to those payments. The SWiP-only portfolio ultimately leaves the individual with only Social Security to fund both living expenses and health care expenses and will be inadequate given current projections of health care costs. Of course one might contend that using a higher expected return, achieved by investing more aggressively, would produce a higher return and demonstrate the sustainability of the SWiP portfolio. But this would assume that the individual is comfortable with greater investment risk, including after a period of poor or negative returns, when some individuals tend to allocate their portfolio more conservatively to protect principal, locking in losses and potentially missing out on subsequent gains when markets recover. Historically, it is exactly this investor behavior that is the primary cause of investor returns lagging asset class returns. To expect a retiree, who will likely never see another dollar of earned income, to behave differently is to take an overly optimistic – and unrealistic – approach to constructing an income portfolio. While certainly not a foregone conclusion, using income annuities to lock in a desired level of income may establish the guard rails individuals need to invest other non-annuity assets more aggressively and avoid “running to cash” during market downturns.

Another approach to the income plan uses a DIA. Where the SPIA begins paying income immediately, the DIA begins income payments in the future. Using the same assumptions as above but replacing the laddered SPIA approach with a DIA leads to a similar outcome, with the DIA being a bit more attractive overall – due to the deeply discounted purchase payment* – in the event the retiree survives to the age at which the second SPIA would be purchased. Conversely, if death was premature and before the second SPIA purchase, then the SPIA approach would potentially leave a larger estate.

*Total premiums paid as part of the laddered SPIA approach, to create the same level of income in later years, are greater than the premiums paid for the DIA. In the examples provided, the laddered SPIA approach requires two payments of \$250,000 (or \$500,000 total) versus the \$295,270 paid for the DIA.

COMPARING A DIA/SWiP PLAN TO SWiP ONLY –MALE, EXCELLENT HEALTH:

Age	Base Need	Health Care	Total Need	Social Security	Shortfall	Annuity Purchase	Annuity Income	SWiP	Portfolio Balance w/ Annuity	Portfolio Balance (SWiP only)
65	65,000	6,720	71,720	31,704	(40,016)	(295,270)		40,016	684,655	988,784
70	71,765	9,351	81,116	33,404	(47,712)			47,712	550,759	903,327
75	79,235	13,070	92,305	35,195	(57,110)		36,183	20,927	385,411	756,866
80	87,481	17,946	105,427	37,082	(68,346)		39,949	28,397	309,037	529,843
85	96,587	24,072	120,659	39,070	(81,589)		44,107	37,482	174,753	199,080
87	100,489	27,076	127,565	39,895	(87,670)		45,889	41,781	100,373	31,187

Sources: Insured Retirement Institute and HealthView Services, Inc.

As the tables show, desired income and health care spending needs can be met through a combination of Social Security, SPIA or DIA payments, and systematic portfolio withdrawals. The income annuities lock in guaranteed income and enable slower drawdown of other assets, which may then be more efficiently used for other needs and goals, such as long-term care or bequeathing.

An unhealthy person faces a different trajectory of health care costs and life expectancy in retirement. Using the same retirement goals and substituting the life expectancy and health care expenses more likely to be experienced by someone in poor health at retirement, we see dramatically different outcomes based on higher costs and reduced life expectancy.

COMPARING A SPIA/SWiP PLAN TO SWiP ONLY –MALE, POOR HEALTH:

Age	Base Need	Health Care	Total Need	Social Security	Shortfall	Annuity Purchase	Annuity Income	SWiP	Portfolio Balance w/ Annuity	Portfolio Balance (SWiP only)
65	65,000	8,140	73,140	31,704	(41,436)	(250,000)	13,548	27,888	743,775	987,321
70	71,765	11,241	83,006	33,404	(49,602)		14,958	34,644	689,032	892,808
75	79,235	15,793	95,028	35,195	(59,833)		16,515	43,318	582,229	731,726
80	87,481	21,721	109,201	37,082	(72,120)		18,234	53,886	404,968	482,512
81	89,231	23,001	112,232	37,471	(74,761)		18,599	56,163	359,269	419,983

Sources: Insured Retirement Institute and HealthView Services, Inc.

COMPARING A DIA/SWiP PLAN TO SWiP ONLY –MALE, POOR HEALTH:

Age	Base Need	Health Care	Total Need	Social Security	Shortfall	Annuity Purchase	Annuity Income	SWiP	Portfolio Balance w/ Annuity	Portfolio Balance (SWiP only)
65	65,000	8,140	73,140	31,704	(41,136)	(295,270)		41,136	683,193	987,321
70	71,765	11,241	83,006	33,404	(49,602)			49,602	540,241	892,808
75	79,235	15,793	95,028	35,195	(59,833)		36,183	23,650	360,271	731,726
80	87,481	21,721	109,201	37,082	(72,120)		39,949	32,171	261,706	482,512
81	89,231	23,001	112,232	37,471	(74,761)		40,748	34,013	234,523	419,983

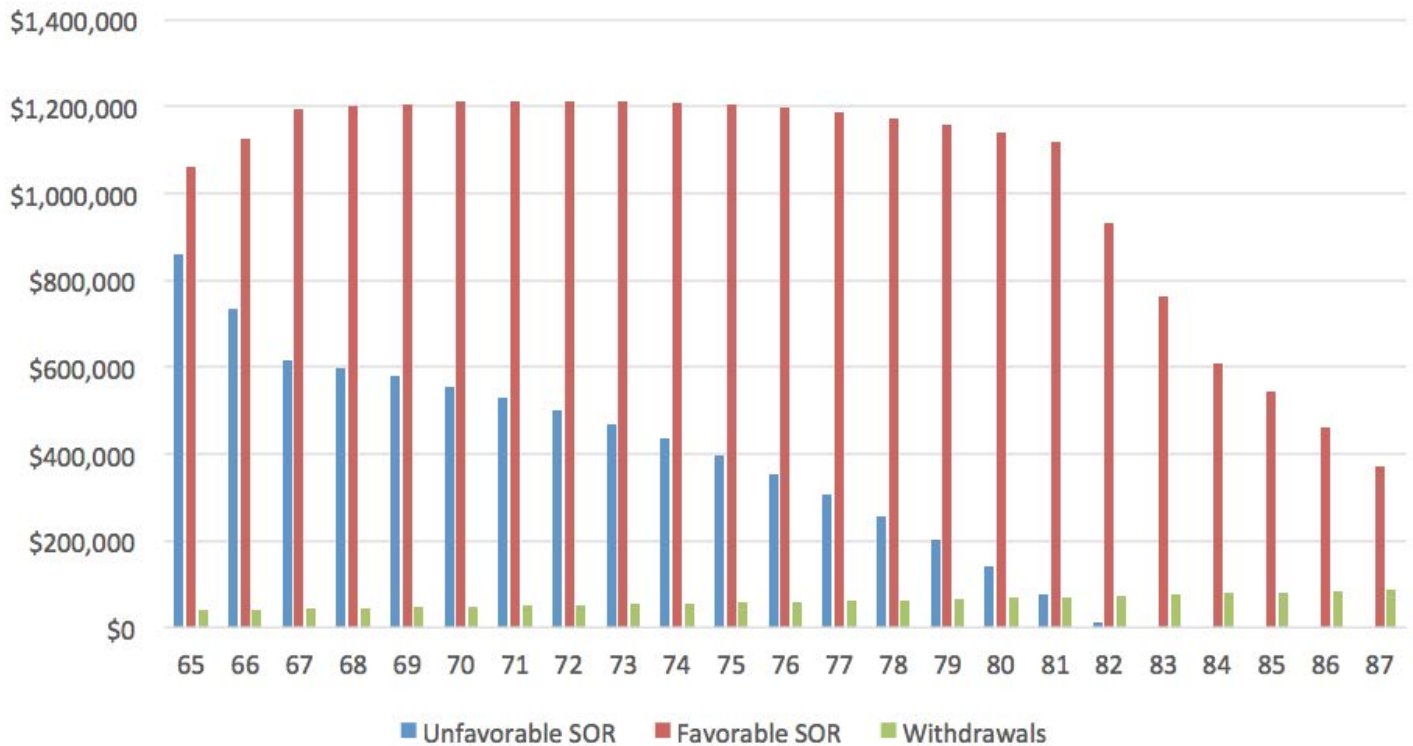
Sources: Insured Retirement Institute and HealthView Services, Inc.

In these examples, due to the shortened life expectancy of someone in poor health during retirement, the illustration shows the SWiP-only approach “winning,” leading one to conclude that the life annuity is not optimal for someone in poor health. This may indeed be the case, but such individuals may also be candidates for underwritten annuities, which produce a higher payout for the same investment (or conversely the same payout for a smaller investment) and would potentially tilt the analysis in favor of the approach using annuitization. The salient point is that the annuity option should be evaluated for each client, and a realistic assessment of expected health care costs and their relationship to income needs performed in order to develop the best approach for each unique individual.

A word on expected returns: as noted, we use a 3% average compound annual return in these analyses, conservative by historic blended asset class return observations but perhaps aggressive relative to investor returns. Regardless the assumption used, there is another risk important to address in the context of these analyses and the creation of income plans in general: “sequence of returns” risk. This is the risk that two individuals with the same average annual return can experience very different outcomes depending on the order in which the actual annual returns are experienced. Specifically, negative returns in early years can devastate a portfolio, whereas experiencing those returns in later years may only have minimal impact on outcomes.

The chart below compares two outcomes, both assuming the same \$1,000,000 portfolio, the desired income and expected health care expenses of a healthy individual retiring at age 65, and a 3% average annual compound rate of return (the same assumptions used in the SPIA/DIA analyses above). However, one portfolio experiences three years of -10% returns from age 65 to 68 and three years of +10% returns from age 85 to 88. The other experiences the positive returns in the first three years and the negative returns in the last three.

SEQUENCE OF RETURNS RISK



Source: Insured Retirement Institute

The outcomes are obviously quite different. The portfolio with early positive returns is worth nearly \$400,000 at life expectancy, whereas the one with early negative returns is exhausted five years earlier. The unpredictability of returns is a key reason income annuities are critical to ensuring that enough income will be available in the later years.

Putting everything together, there are several important considerations to highlight:

- The healthiest individuals have the highest probability of ending up at the top of the longevity curve, and even an average couple age 65 has a 40% chance of one of them living to age 95⁸. Using either the laddered SPIA or DIA approaches solves for income needs for those who live the longest.
- The systematic withdrawal approach requires a lower withdrawal rate to be sustainable for an indefinite planning horizon, resulting in significant adjustment of “base income” and a lower standard of living, if an individual lives to an advanced age and exhausts retirement assets.
- Given average investor returns, the SWiP portfolio can be expected to exhaust itself at some point, likely later in life when realistically there are no opportunities to generate additional income, leaving only Social Security to fund “post health expectancy” health care costs.
- There are always tradeoffs. Individuals who use systematic withdrawals alone are more likely to leave a larger estate if they do not reach an advanced age, but will require family or state care if they live into their late 80s or beyond and subsequently exhaust all their assets.
- In these examples, using a combination of annuities and systematic withdrawals leaves income of approximately \$77,500 versus eventually only Social Security of approximately \$40,000, which will increase only when and if cost of living adjustments are applied, with the SWiP-only approach. In healthy individuals this will occur after “health expectancy,” when health care costs are more likely to be significant and rising.
- The healthiest individuals, those with the highest probability of living past age 87, are at the highest risk of exhausting their portfolios and seeing health care eventually consume the lion’s share of Social Security income.
- Due to the smaller purchase payment of the DIA and the assumed portfolio growth, the DIA approach shows a slightly better outcome over the time horizon of the example.
- Changing assumptions such as using a lower or higher growth rate for the remaining portfolio would of course change the outcome, but an important distinction to make is that the DIA solves for needing income longer than average life expectancy while also potentially preserving more of the estate if death occurs earlier – but not too much earlier. A healthy individual using the laddered SPIA approach who dies at age 75 prior to purchasing the second SPIA would leave a remaining portfolio balance for heirs of approximately \$650,000, compared to approximately \$400,000 with the DIA. If death occurs subsequent to the second SPIA purchase, the remaining estate is similar between the SPIA and DIA approaches, with the DIA estate marginally larger at higher ages but not materially so.
- Using laddered SPIAs allows individuals to assess their health trajectory in retirement. In this example, if health were to decline significantly between age 65 and 75 the plan could be re-assessed.
- Healthy individuals, for whom medical expenses may be non-existent or minimal for many years in retirement, may withdraw excessively from their portfolios to fund travel and other leisure expenses. In a 2014 Fidelity study, 71% of respondents expected to have better than average health in retirement, supporting the notion that those in excellent health may not see health care costs as “their problem.”⁹
- Healthy individuals, by virtue of longer life expectancy, are able to maximize annuity mortality credits. That is, given their longer life expectancy, they have a higher probability of collecting SPIA or DIA annuity payments over a longer time horizon.

IMPLICATIONS FOR PRODUCT DEVELOPMENT

The needs of individuals are complex and likely to change throughout a lengthy retirement, and a lengthy retirement is a particular concern of those in excellent health. Products that incorporate both SPIA and DIA elements (for example customizable products that enable the consumer to “turn on” some income now and some income later) can be developed that would seamlessly and efficiently deliver income to a retiree at preset ages. This would avoid a retiree receiving payments from multiple products, and potentially from multiple companies. Another innovation might be to embed Medicare Supplemental Insurance (Medigap) into an income annuity. An individual purchasing a non-underwritten SPIA or DIA is likely in excellent health and may enable an insurance company to offer a more competitive Medigap premium using the income annuity purchase as a form of guaranteed issue underwriting.

CONCLUSION

It is critical to perform a thorough health assessment prior to making decisions about how to use financial assets to generate adequate, sustainable retirement income. Individuals in excellent health achieve a double benefit from an income perspective: they maximize the value of annuity mortality credits through their expected longevity, and they can anticipate having lower annual health care expenses. However, longevity can be a double-edged sword financial speaking – living longer means higher cumulative expenses for health care, and a higher probability that declining health will occur at an advanced age, when resources needed for health care may have been depleted during the earlier years of retirement. “Laddering” annuities to maximize mortality credits, or using deferred income annuities, takes advantage of longevity while securing against having insufficient income late in retirement. For individuals who are less healthy, medical advancements may prolong life, albeit at a higher average cost than those in excellent health will experience. These individuals should consider medically underwritten annuities. Only income annuities can guarantee that income will be available at advanced ages, when need may be most critical, and there are opportunities for insurance companies to develop products that pair coverage for these complementary risks, such as a combined income annuity/Medigap product.

FOOTNOTES

1. HealthView Services, Inc.
2. “Savings Needed for Health Expenses for People Eligible for Medicare: Some Rare Good News,” Employee Benefits Research Institute, October, 2012
3. HealthView Services, Inc.
4. “Quantitative Analysis of Investor Behavior, 2014,” DALBAR, Inc.
5. “Savings Needed for Health Expenses for People Eligible for Medicare: Some Rare Good News,” Employee Benefits Research Institute, October, 2012
6. HealthView Services, Inc.
7. Center for Disease Control and Prevention, “Health, United States, 2013,” Table 18; “State-Specific Healthy Life Expectancy at Age 65 Years – United States, 2007–2009”
8. “Quantitative Analysis of Investor Behavior, 2014,” DALBAR, Inc.
9. Fidelity Investments, “Retirement Savings Assessment,” 2013



Insured Retirement Institute

PHONE | 202-469-3000

FAX | 202-469-3030

EMAIL | MEMBERSHIP@IRIONLINE.ORG

WEB | MYIRIONLINE.ORG

FOLLOW | [TWITTER.COM/IRIONLINE](https://twitter.com/IRIONLINE)

[FACEBOOK.COM/INSURED.](https://facebook.com/insuredretirementinstitute)

[RETIREMENT.INSTITUTE](https://retirementinstitute.org)