Swedroe: Retirement’s Routes To Failure

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Retiring without sufficient assets to maintain a minimally acceptable lifestyle (which each person defines in their unique way) is an unthinkable outcome. That’s why, when investors are planning for retirement, the most important question is usually something like: How much can I plan on withdrawing from my portfolio without having a significant chance of outliving my savings?

The answer is generally expressed in terms of what is referred to as a safe withdrawal rate—the percentage of the portfolio you can withdraw the first year, with future withdrawals adjusted for inflation.

A Simulation Solution
While historical returns can provide insights, it’s critical that investors not make the mistake of simply projecting the past into the future. Current valuation metrics should be used. Additionally, investors must address the issues involving our limited ability to estimate future returns and the fact that the order of returns matters a great deal. The way to do that is to use what is called a Monte Carlo simulator.

Monte Carlo simulations require a set of assumptions regarding time horizon, initial investment, asset allocation, withdrawals, rate of inflation and, very importantly, the distribution of annual returns for the different asset classes.

The expected final wealth distributions in Monte Carlo simulation programs are determined by two numbers: average annual return (which should be based on current valuations/yields, not historic ones), and the standard deviation of the average annual return. The Monte Carlo simulator randomly selects a return for each year and calculates the wealth values over the expected retirement period. This process is repeated thousands of times in order to calculate the likelihood of possible outcomes.
The Monte Carlo simulation output is typically presented showing the odds of success. For example, the simulation result might be that there is a 90% chance of you not outliving your assets.

Said another way, the failure rate, in this case, is an estimated 10%. However, while the failure rate has become an essential tool when evaluating withdrawal, as Javier Estrada, author of the October 2016 paper “Refining the Failure Rate,” points out: “This variable is silent about how long into the retirement period a strategy failed.” He continues: “Two strategies that sustained withdrawals for 10 and 25 years of a 30-year retirement period have both failed, but a retiree would be far from indifferent between them.”

**When Failure Happens Matters**

Estrada’s study, which covers 21 countries over the 115-year period from 1900 through 2014, showed that two strategies with the same failure rates may have failed at very different points along the retirement horizon, with one supporting a retiree’s withdrawals for a longer period.

For example, Estrada shows that over the 86 30-year retirement periods he considered, a 4% withdrawal strategy from a global 60/40 portfolio would have failed 20 times, or in 23% of the periods.

However, those 20 failures looked very different. In some cases, the plan failed with only two years remaining; in others, it failed with 14 years remaining. Those are two very different outcomes, with very different consequences. Yet they both count the same way in informing the failure rate.

Because of the problem that Estrada describes in his research, the Monte Carlo software we use (Planning Center powered by inStream) at Buckingham Strategic Wealth and The BAM Alliance not only reports the success/failure rate, it also shows the median age at which the plan fails, and the median amount by which it fails.

Thus, investors can not only determine the estimated odds of failure, but they can understand in such cases how long into retirement their portfolio was able to maintain their desired lifestyle, and how long a period was remaining.

They can also determine how big an adjustment would have been required to prevent failure. This enables them to design effective Plan B’s—a contingency plan that lists the actions that would be taken if financial assets were to drop below a predetermined level. Those actions might include remaining in or returning to the workforce, reducing current spending, reducing the financial goal, selling a home and/or moving to a location with a lower cost of living.

Does your financial plan consider the issues Estrada raised? And do you have a well-thought-out Plan B? If not, I hope this serves as a call for action.

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