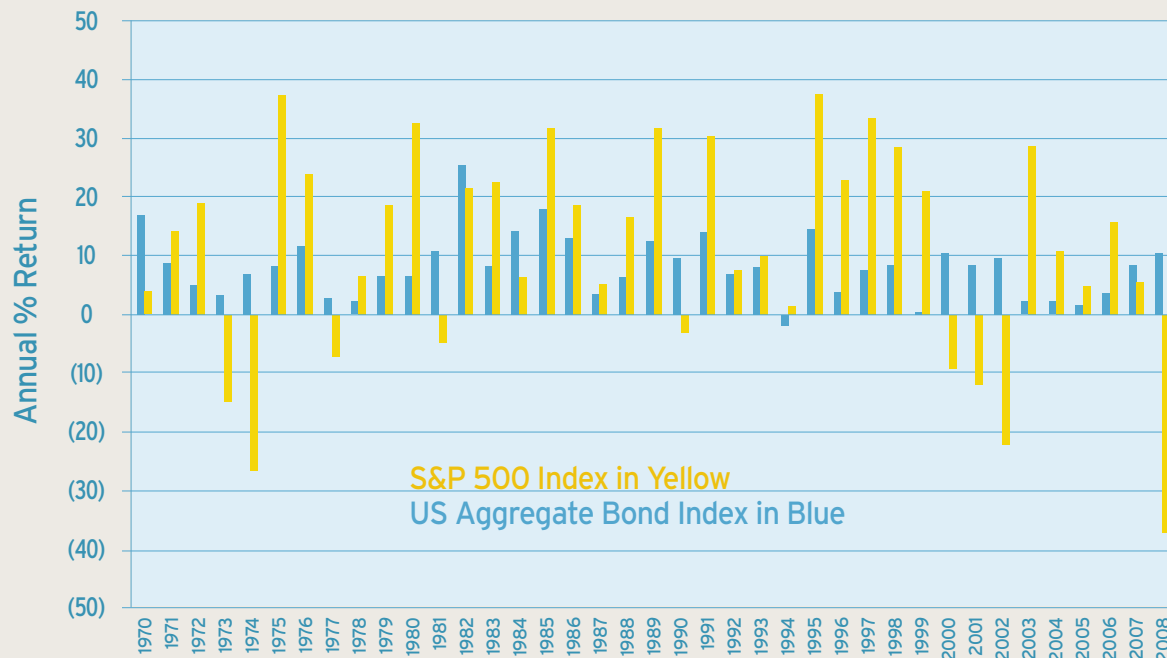




THE PORTFOLIO

STOCKS VS. BONDS

A look at annual returns from 1970 to 2008 shows that stocks provide more growth potential than do bonds, but with significantly more volatility in the year-to-year returns.



Source: Raw data obtained from Morningstar Principia

lio. The result provides a risk/reward combination that is more desirable than either asset individually—a central tenet in modern portfolio theory. Indeed, prudent investing requires the construction of multi-asset portfolios.

“Asset Lineup,” on page 116, shows the risk and return attributes of seven individual investment assets. For example, the worst three-year return for bonds was a positive 6.4%. Conversely, large U.S. stocks had a worst-case three-year loss of more than 37% (which occurred from 2006 to 2008).

There are also three portfolios in the table. The first is a simple two-asset portfolio consisting of U.S. stocks and U.S. bonds. The stock portion is given a 60% allocation and the bond portion has a 40% allocation, the mix commonly referred to as a balanced portfolio. At the end of each year the portfolio is rebalanced back to a 60/40 allocation.

The 60/40 portfolio had a 39-year average annual return of 9.4%, which

was very close to the return of the S&P 500 (which is a 100% stock portfolio). However, as a result of the stock/bond mix, the worst three-year loss was reduced to 13.9%. Thus, blending stocks and bonds almost completely maintained the performance of stocks, while cutting the risk in half. The portfolio effect (that is, the synergistic result of combining investment assets with different performance attributes) is evident.

The second portfolio is an age-based 60/40 portfolio, where the investor’s age determines the percent allocation to bonds and the remainder is invested in a 60/40 portfolio. The impact of an age-based approach on risk and return was surprisingly subtle. The average annualized return was slightly higher at 9.4%, and the worst three-year loss was marginally reduced to 13.3%.

The third portfolio is an age-based multi-asset portfolio that combines all seven assets in equal portions. The

investor allocates his or her age to bonds and the balance to the multi-asset portfolio.

So, for example, a 40-year-old would invest 40% of his portfolio in bonds and the remaining balance of 60% into the multi-asset portfolio, which uses all seven individual assets in equal portions. A 65-year-old would invest 65% of her assets into bonds and 35% into the multi-asset portfolio.

This 39-year performance analysis assumes a 25-year-old investor in 1970. Each year the allocation to the bond index increases by one percentage point and the allocation to the 60/40 or the multi-asset portfolio decreases by one percentage point as the investor gets older.

AND THE WINNER IS . . .

The historical performance of an age-based multi-asset portfolio is impressive. Performance over the 39-year period was superior to either 60/40