

THE PROCESS OF MANAGING RETIREMENT INCOME

BUILDING A CASH FLOW RESERVE LADDER



One of the challenges that confronts retirees and their advisors is how to prevent having to sell their hard earned retirement assets at the wrong time. We have all heard the age old investment adage “Buy Low and Sell High,” which tells us to buy assets when they are out of favor but to time the disposition of the assets when the markets are in your favor.

The road of retirement should be paved with more than good intentions. Soon-to-be retirees need to develop and follow a retirement income plan that balances current lifestyle and long-term sustainability of the retirement portfolio. The *Road of Retirement* series provides some best practices for accomplishing this balance.

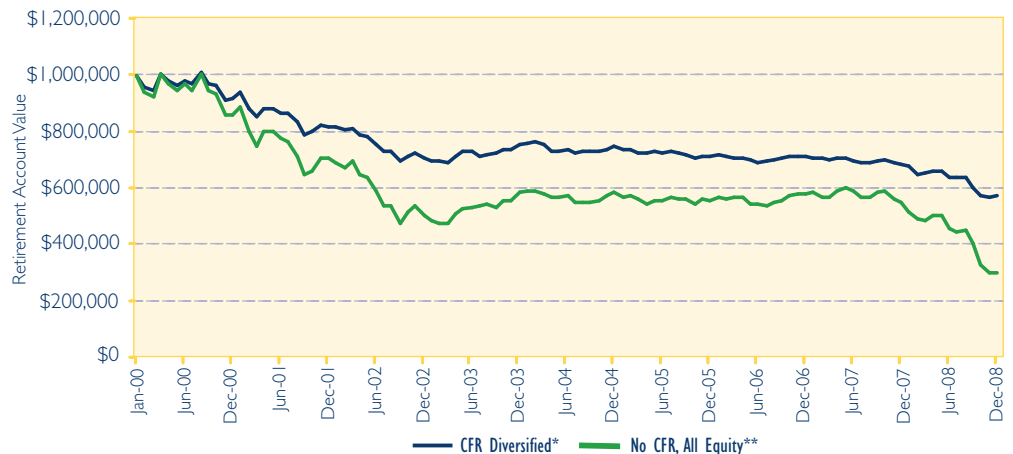
This timing is even more important for retirees since they are liquidating assets to support expenses and not reinvesting. Therefore, one goal for each retiree and their advisor is how to prevent being in a position of having to sell their retirement assets for less than their potential worth.

When structuring a retirement investment portfolio, there are two tenets that can be followed which may help achieve this goal. The first is to invest the retirement savings in a well-diversified portfolio that includes cash, fixed income, and equity investments. Preferably, the equity investment allocation should focus on providing a high and growing dividend income stream. The second is to implement a Cash Flow Reserve (CFR) Ladder that can provide monthly income during retirement and can allow the retiree

and their advisor the ability to dictate when to sell assets into the market. Historically, fixed income and equity assets have had a tendency to be favorably priced at different times in the market, giving the retiree the ability to time the disposition of the retirement assets when it may be most optimal. Using a ladder structure that includes a cash flow reserve for near-term expenses, and both fixed income and equity assets for intermediate and longer-term expenses, is one structure that may help achieve this goal.

The consequences of not being diversified and then forced to sell into a bear market can be significant. Illustrated below are the account values for a hypothetical retiree who retired on January 1, 2000 with \$1 million in retirement savings, withdrawing \$50,000 a year, and indexed to inflation. Compared are

FIGURE 1. HYPOTHETICAL ILLUSTRATION OF DIVERSIFICATION AND A CFR LADDER IN RETIREMENT



* 5% Morningstar Municipal Money Market Index, 5% Barclays Capital 5-year Municipal Bond Index, 25% Barclays Capital 10-year Municipal Bond Index, and 65% S&P 500 Index

** S&P 500 Index

Diversification is no guarantee against loss of principal.
Past performance does not guarantee future results.

Source: Thornburg Investment Management



two hypothetical retirement portfolios: one that is diversified among asset classes and uses a Cash Flow Reserve Ladder versus one that is allocated to only equity and does not use a Cash Flow Reserve Ladder.

As **figure one** illustrates, using a Cash Flow Reserve Ladder and being well diversified provided a benefit during this retirement period which included two significant bear markets in 2000–2002 and 2008.

Structuring a Cash Flow Reserve Ladder

A Cash Flow Reserve Ladder is comprised of three “rungs” that strive to align the least volatile assets to meet the retiree’s near-term expenses while giving equity assets the opportunity to grow. This potential growth of the equity investments is intended to offset the eroding effects of inflation on the retirement savings. As illustrated in **figure two**, the three rungs include: a checking account, a cash flow reserve, and an investment portfolio. The intended investment time horizon for each rung is shown across the bottom and the intended refill timeline is shown across the top.

Now let’s examine how each rung is designed to work and what types of investments might be chosen for each.

Checking Account

On the first of each month, the retiree writes a check from the cash flow reserve and deposits it into the checking account to pay for expenses. This provides a monthly cash flow, which from a behavioral finance perspective is very healthy and allows the retiree to budget for monthly spending accordingly.

Cash Flow Reserve

The cash flow reserve is comprised of two years’ worth of spending needs in short-term assets such as a money market account and possibly a limited-term bond fund. The retiree draws a check from the cash flow reserve to deposit into the checking account at the beginning of each month. The relative liquidity of this rung can provide the retiree with the ability to cover two years of spending. Having two years’ worth of disposable assets can be key to helping alleviate ill-timed selling into a bear market. At the end of each year, or as the market dictates, the advisor will sell either fixed income or equities from the investment portfolio to refill the cash flow reserve to cover the next two years of expenses.

Investment Portfolio

Fixed income investments have historically performed better when equities are out of favor; therefore, having a balanced portfolio of fixed income and equity investments can help alleviate selling retirement assets at a less opportune time in order to fund retirement spending. In this rung of the ladder, there will typically be enough fixed income investments to pay for an additional four to five years of spending. Also

included in this rung is an allocation to equity investments, which have historically been more volatile than fixed income assets but also provide the potential for higher returns over time. While the equity investments may provide the necessary growth to help offset the eroding effects of inflation in retirement, retirees also need to have the flexibility to sell assets when the markets are attractively valuing those investments. The assets from this rung are used to replenish the funds in the cash flow reserve as needed. Again, the goal is to have the flexibility to sell either the equity or the fixed income assets at an opportune time.

Asset Allocation Alternatives

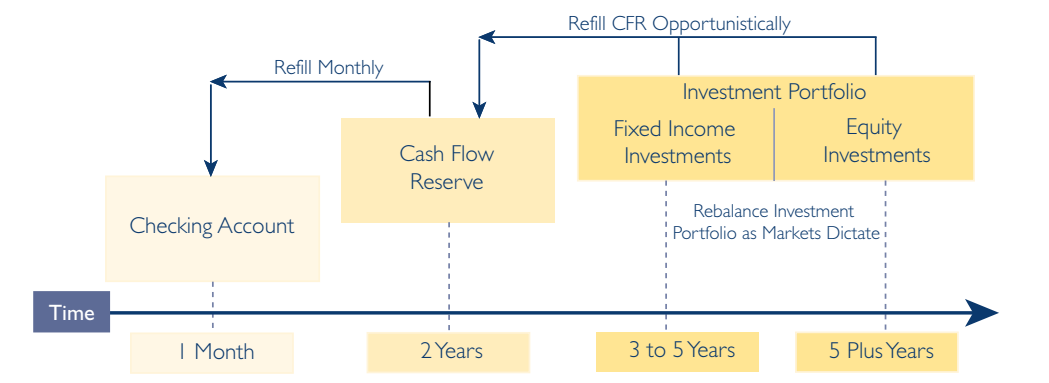
Now that we know the basic structure and operation of a Cash Flow Reserve Ladder, let’s discuss just a few of the many ideas for how the retirement assets can be allocated to each rung. The most appropriate investments will vary depending on an individual’s needs and investment objectives and should be discussed with a financial advisor. For illustration purposes, let’s assume a retiree has a \$1 million portfolio and wishes to spend \$50,000 each year, indexed to inflation. In **figure three** is an example of how the savings could be allocated among the various rungs of the ladder.

In this example the \$100,000 placed in the cash flow reserve is evenly divided between a money market account and a limited-term bond fund. For taxable accounts, you can use municipal money market funds and/or municipal limited-term bond funds as they can be attractive here. Remember that the primary goal of this rung is principal protection.

The investment portfolio is divided into two separate components. The \$250,000 allocation to fixed income represents 25% of the assets and if need be, can provide up to five years of additional spending at \$50,000 per year. The intermediate-term bond fund portion has a time horizon of five to ten years, and should be conservatively managed with a primary goal of principal protection.

The \$650,000 in the equity portion of the investment portfolio represents 65% of the overall asset allocation of the portfolio. This portion is intended to provide the possibility of long-term growth that may offset the eroding effects of inflation. The Cash Flow Reserve Ladder approach allows the retiree and advisor time to liquidate these assets into potentially more favorable markets. Using a high and growing dividend-paying

FIGURE 2. HYPOTHETICAL CASH FLOW RESERVE LADDER



stock fund in this rung may provide the double benefits of a growing dividend stream to contribute to the current income needs of the retiree and the potential growth that is historically associated with equity investments.

Let's return to the hypothetical retirement that began on January 1, 2000. At that time, the retiree chose to spend \$50,000 per year and indexed to inflation. **Figure four** illustrates the values of the hypothetical portfolio and the different allocations as they appeared on January 1 of the first, sixth, and tenth year of retirement.

On January 1, 2000, the retiree had just transferred \$4,167 into the checking account to cover the monthly expenses, with \$95,833 in the cash flow reserve, and \$900,000 in the investment portfolio for a total value of \$1 million. The current year's spending is the \$4,167 times twelve months for \$50,004, and the spent-to-date is zero since the retirement just started. Now moving through the years to January 1, 2005, you can see how the spending has increased due to an annual rise in the cost of living as measured by the CPI. The cash flow reserve now has \$120,903, which is approximately two years of spending. The investment portfolio has grown due to the positive investment results in the equity markets and the spent-to-date in retirement shows how much has been withdrawn from the hypothetical portfolio cumulatively to support the retiree's expenses. The current withdrawal rate is at a reasonable 4.1%, and, since retirement began, the retiree has spent \$264,085.

On January 1, 2009, following the significant declines of 2008, the retiree had just placed \$5,383 in the checking account, and the cash flow reserve was down to \$77,231 since a deci-

FIGURE 3. HYPOTHETICAL CASH FLOW RESERVE LADDER

Rung of Ladder	% of Portfolio	\$ Allocation	Asset Type
Checking Account	0%		Cash from Cash Flow Reserve
Cash Flow Reserve	10%	\$50,000 \$50,000	Money Market Account Limited-term Bond Fund
Investment Portfolio			
• Fixed Income Investments	25%	\$250,000	Intermediate-term Bond Fund
• Equity Investments	65%	\$650,000	Hypothetical Dividend Growers Portfolio

sion was made not to sell any of the assets in the investment portfolio in late 2008 to replenish the cash flow reserve. The preference was to hold off selling any assets until the markets stabilized. The total portfolio was down to \$1,061,941, which is off from the 2005 level but approximates the \$1 million originally invested in the portfolio. Not to be forgotten, the retiree has spent \$502,247 during the first nine years of retirement and the current spending rate is 5.6%. This rate appears reasonable given the recent poor market performance. All in all, the Cash Flow Reserve Ladder performed well given the very challenging markets that have impacted this retirement period.

In summary, utilizing the structure of a Cash Flow Reserve Ladder with a well-diversified portfolio during the distribution phase of retirement can provide retirees with the necessary foundation and discipline to alleviate selling their retirement assets into a bear market. The cash flow reserve has the ability to provide two years of liquidity, thus allowing expenses to be met readily. The investment portfolio has a mix of intermediate-term fixed income and equities focusing on a high and growing dividend income stream that may be liquidated during opportune times in the market to refill the cash flow reserve. Hopefully, this type of structure can help the retiree stay on plan and meet expenses.

FIGURE 4. HYPOTHETICAL RETIREMENT ACCOUNT

Account Status	Jan 1, 2000	Jan 1, 2005	Jan 1, 2009
Checking Account	\$4,167	\$4,728	\$5,383
Cash Flow Reserve	\$95,833	\$120,903	\$77,231
Hypothetical Investment Portfolio*	\$900,000	\$1,264,088	\$1,061,941
Total Retirement Account	\$1,000,000	\$1,389,719	\$1,144,555
Hypothetical Retirement Metrics	Jan 1, 2000	Jan 1, 2005	Jan 1, 2009
Average Annual Return Since Retirement Inception	0%	11.75%	6.93%
Current Year's Withdrawal Amount	\$50,004	\$56,731	\$64,596
Years Since Retirement Inception	0	5	9
Spent-to-Date in Retirement	\$0	\$264,085	\$502,247
Current Withdrawal Rate	5%	4.1%	5.6%

Past performance does not guarantee future results.

*5% Morningstar Municipal Money Market Index, 5% Barclays Capital 5-year Municipal Bond Index, 25% Barclays Capital 10-year Municipal Bond Index and 65% S&P 500 Dividend Aristocrats Index

For illustration purposes only. Not indicative of a particular investment.

Source: Thornburg Investment Management

Disclosures:

Following this strategy does not assure or guarantee sustainability of a retirement portfolio, better performance, or protect against investment losses.

Investments in mutual funds carry risks, including possible loss of principal. Bond funds have the same interest rate, inflation, and credit risks that are associated with the underlying bonds. The principal value of bond funds will fluctuate relative to changes in interest rates, decreasing when interest rates rise. Unlike bonds, bond funds have ongoing fees and expenses. Investments in equity securities are subject to additional risks, such as greater market fluctuations. Investments in mutual funds are not FDIC insured, nor are they deposits of or guaranteed by a bank or any other entity.

The views expressed in this article are subject to change.

Notes:

The cash flow reserve structure is based upon the work done by Harold Evensky and Deena Katz of Evensky and Katz in Coral Gables, FL.

Investments in a money market are not FDIC insured, nor are they deposits of or guaranteed by a bank or any other entity. Although a money market fund seeks to preserve the value of your investment at \$1.00 per share, it is possible to lose money by investing in a money market fund.

Rebalancing – refilling the money market fund with an allocation from the equity account at the beginning of each year, except in 2009, when the decision was made not to replenish and ride through the turbulent equity and fixed income market. No further rebalancing was necessary.

Monthly Cash Flow – monthly check withdrawn from Cash Flow Reserve and assumed placed into checking account at the beginning of each month.

The Consumer Price Index (CPI) measures prices of a fixed basket of goods bought by a typical consumer, including food, transportation, shelter, utilities, clothing, medical care, entertainment and other items. The CPI, published by the Bureau of Labor Statistics in the Department of Labor, is based at 100 in 1982 and is released monthly. It is widely used as a cost-of-living benchmark to adjust Social Security payments and other payment schedules, union contracts and tax brackets. Also known as the cost-of-living index.

The S&P 500 Index is an unmanaged broad measure of the U.S. stock market.

Barclays Capital 5-Year Municipal Bond Index covers USD-denominated, investment-grade, tax-exempt bonds with maturities between four and six years. The index has four main sectors: state and local general obligation bonds, revenue bonds, insured bonds, and prerefunded bonds.

Barclays Capital 10-Year Municipal Bond Index covers USD-denominated, investment-grade, tax-exempt bonds with maturities between nine and eleven years. The index has four main sectors: state and local general obligation bonds, revenue bonds, insured bonds, and prerefunded bonds.

The S&P 500 Dividend Aristocrats Index is equally weighted and measures the performance of large cap, blue chip companies within the S&P 500 Index that have followed a policy of increasing dividends every year for at least 25 consecutive years

Morningstar Municipal Money Market category covers portfolios that invest in short-term municipal money market securities that are often exempt from some federal and state taxes. These funds provide current income and aim to preserve capital.

The performance of any index is not indicative of the performance of any particular investment. Unless otherwise noted, index returns reflect the reinvestment of income dividends and capital gains, if any, but do not reflect fees, brokerage commissions or other expenses of investing. Investors may not make direct investments into any index.

Before investing, carefully consider the investment goals, risks, charges, and expenses. For a prospectus containing this and other information, contact your financial advisor. Read it carefully before investing.