THE WORLD'S 8TH WONDER

HARNESS THE POWER OF COMPOUNDING

"Compound interest is the eighth wonder of the world. He who understands it, earns it…he who doesn't…pays it."

~ generally attributed to Albert Einstein

It's no secret that Albert Einstein was a brilliant scientist. But few people realize that his exceptional understanding of mathematics provided him with keen insights into the world of finance as well. It is widely believed that Einstein considered compound interest to be one of the most powerful forces in the universe, and it's an important concept that every investor should understand.

Time and compound investment returns can be powerful allies when it comes to investing, and one of the best ways to take advantage of this is to begin investing as soon as you can. What follows should inspire you to begin taking advantage of what Einstein is believed to have coined "the eighth wonder of the world."

Understanding compound interest

Compound interest and/or compound investment returns arise when profits from an investment are added to the principal, so that from that moment on, the profit that has been added also has the potential to earn additional profits. This addition of profit to the principal is called compounding, and it can be an important consideration when choosing how to invest your savings.

Compound interest can work against you as well. When you incur debt, you pay interest and principal to the lender until the loan is paid off. If you fail to pay off any part or all of the principal, the level of debt you will carry has the potential to increase until it is nearly impossible to pay off the loan. For example, if you have credit card debt charging 20 per cent interest and you fail to make payments, your debt will double in 3.6 years. If you continue to avoid making payments, your debt would double again in another 3.6 years, and so on.

Compound investment returns in action

To help illustrate how compound returns can work in your favour, let's assume we have three different

CHART 1: Simple interest compared to compound interest

	Investor	6% interest	Value after 30 years
Investor receiving simple interest	Frank – $1,000	30-year investment, **simple interest paid annually**	$2,800
Investors receiving compound interest	Carl – $1,000	30-year investment, **compound interest paid annually**	$5,743
	Susan – $1,000	30-year investment, **compound interest paid monthly**	$6,023

For illustrative purposes only. This is a fictional scenario.

investors – Frank, Carl and Susan – each with $1,000 to invest. Frank invests in a 30-year investment that pays six per cent simple interest annually. Carl and Susan also put their money into a 30-year investment that pays six per cent, the difference being that Carl's investment compounds yearly, and Susan's investment compounds monthly.

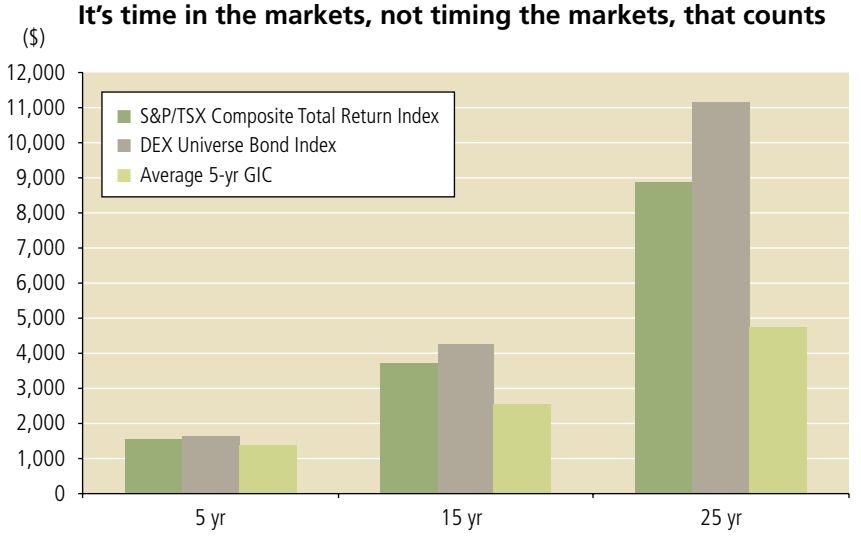
While it is not easy in today's markets to obtain an investment that pays six per cent interest, Chart 1 helps illustrate how compound interest can work for you over time. The difference between earning simple interest and compound interest can lead to dramatically different results. Reinvesting on a monthly or even daily basis can increase returns to an even greater degree. That's the power of compound interest working for you and it underscores the importance of reinvesting your profits and harnessing the benefit of time.

What history can tell us

While no one can predict the direction of the financial markets, we can turn to history to gain some potential insights into how markets can produce compound investment returns over the long-term. Chart 2

REINVESTING ON A MONTHLY OR EVEN DAILY BASIS CAN INCREASE RETURNS TO AN EVEN GREATER DEGREE.

CHART 2:
It's time in the markets, not timing the markets, that counts



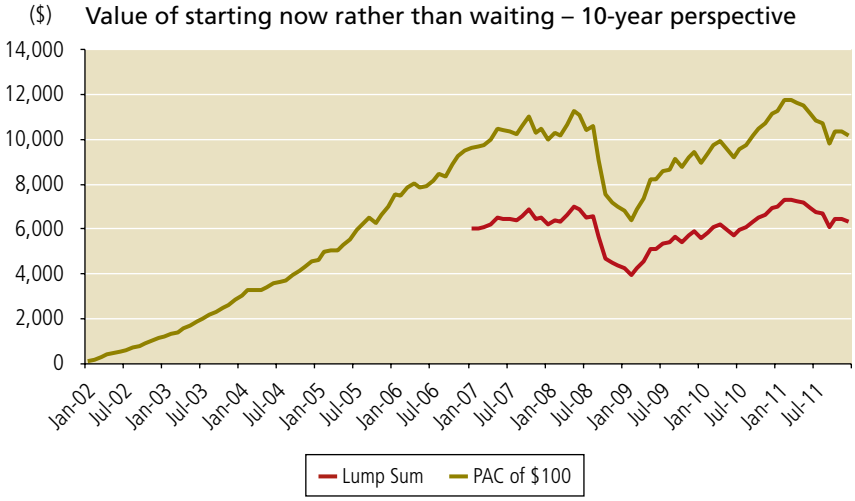
Source: Morningstar Direct as of December 31, 2011. For illustrative purposes only. Past performance is not indicative of future returns.

provides a comparison of a $1,000 investment into three different asset classes using their 30-year average annualized rates of return. For stocks, the annualized compound rate of return is nine per cent; for bonds, the annualized rate of return is 10 per cent; and for Guaranteed Investment Certificates (GICs) with a five-year term to maturity, the annualized rate of return is six per cent. Using these figures, it's easy to see that the longer your money remains invested in the markets, the more you can capture the benefits of compound investment returns over time.

Now that you understand it, get ready to earn it

It's hard to save up large amounts of money to invest at one time. That is why many Canadians utilize Pre-Authorized Chequing Plans (PACs) to automatically invest smaller, more affordable amounts at regular intervals. One advantage of this process is that by investing through a PAC, you can also take advantage of an investment strategy called dollar-cost averaging. With dollar-cost averaging, you buy more units of a mutual fund when its price is lower and fewer units when its price is higher, reducing the average cost of your mutual

CHART 3:
The benefits of dollar-cost averaging



Source: Morningstar Direct as of December 31, 2011 using the S&P/TSX Composite Total Return Index. Cannot be purchased directly by investors. For illustrative purposes only. Past performance is not indicative of future returns.

WHAT ARE MUTUAL FUNDS?

A mutual fund is an investment that pools money from many individuals and invests it according to the fund's stated objectives. Professional money managers make investment decisions on behalf of mutual fund investors, buying and selling investments such as money market investments, bonds and stocks. When investing through a mutual fund, it's important to make sure that all distributions are reinvested in order to take full advantage of the power of compound investment returns over time.

fund units over time.

Dollar-cost averaging has the potential to produce superior returns while minimizing risk. Chart 3 compares a scenario in which one investor saved up to make a large lump-sum investment and another made smaller, more affordable payments and was therefore able to begin investing much earlier. The investor that began earlier and made 60 separate payments of approximately $100 then stopped making payments achieved superior results than the investor who saved $6,000 over a five-year time period and invested the entire amount at one time.

In this scenario, the dollar-cost averaging approach produced a superior result during a volatile period in the markets. The added benefit was that the investor choosing the dollar-cost averaging approach was able to take advantage of the effects of compounding earlier, and they didn't have to worry about timing the market, which can be a detrimental side effect of committing an entire investment at one time.

Speak with your advisor

Now that you understand the power of compounding and how it can maximize your earning potential, it's time to earn it. Speak with your advisor today to find out how you can make compounding part of your investment strategy. •

Scan this QR code to watch the video version of this article.

To view this video from your desktop computer visit manulifesolutions.ca

Solutions

Manulife Investments

For your future™

TMK1333E 04/12