Lessons from the research paper 'Buffett's Alpha'

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Warren Buffett has been immensely influential for PSG Asset Management

Firstly, his company – Berkshire Hathaway – is an important investment in our unit trusts. Secondly, his writings in each year's annual report (going back many decades) are a valuable source of investment wisdom and common sense.

An in-depth analysis of Berkshire Hathaway's performance provides key insights

In 2013, researchers affiliated with AQR Capital Management – a global asset manager that is well-known for their quantitative excellence – published a paper called 'Buffett's Alpha'. In this paper, they did an in-depth analysis of Berkshire Hathaway's investment performance. The researchers based their paper on a factor-based analysis, which we find ironic given the strictly bottom-up approach to stock selection consistently practised by Buffett:

> 'We select our marketable equity securities in much the same way we would evaluate a business for acquisition in its entirety. We want the business to be (1) one that we can understand, (2) with favourable long-term prospects, (3) operated by honest and competent people, and (4) available at a very attractive price.'
> Berkshire Hathaway's 1977 Annual Report

AQR's analysis confirms the uniqueness of Buffett's track record of investment excellence when compared to other stocks and mutual funds with a history of more than 30 years. However, it also provides some important insights that may have been overlooked when evaluating how Buffett delivered these returns. Their conclusions should not be viewed as controversial. As they put it: 'explaining Buffett's performance with the benefit of hindsight does not diminish his outstanding accomplishment'. Their conclusions are also well supported by quotes from Buffett's own writings.

Over the study period (1976 to end 2011) Berkshire Hathaway delivered an annual return of 19% in excess of the Treasury Bill (T-Bill) rate. (Equities generally delivered an excess return of 6.1%). This meant that $1 invested in Berkshire Hathaway in 1976 had compounded to $1 500 by 2011. In fact, the researchers comment that, if you were able to get into a time machine at the end of 2011 and went back to 1976 to select one stock, Berkshire Hathaway would be the best performing stock out of every single US stock listed in 1976.

This spectacular historic performance is, of course, well known. In this article, we review the key findings or lessons about this performance from the 'Buffett's Alpha' research. We also consider what it means for PSG Asset Management's investment process and business strategy. Finally, we reflect on what the findings mean for Berkshire Hathaway's future performance in a post-Buffett era.

Lesson 1: quality and value must be evaluated together

When the AQR researchers analysed Buffett's stock picks, they found that his portfolio shared several general features:
'He buys stocks that are "safe" (with low beta and low volatility), "cheap" (i.e. value stocks with low price-to-book ratios) and "high quality" (meaning stocks that are profitable, stable, growing and with high pay-out ratios).'

We know that Buffett dismisses the ability of beta or price volatility to correctly quantify investment risk. We can therefore assume that it plays no part in his decision-making. By building a portfolio of all the stocks that share the above characteristics, the researchers could recreate a portfolio that, once adjusted for leverage, generated similar returns to Berkshire Hathaway. Of course, this is done with hindsight. It does not diminish Buffett's ability to identify what kind of companies to focus on, and to relentlessly stick to that focus over the decades.

However, contrary to public opinion of Buffett as a value investor, AQR found that safe, quality stocks have been as important as value in determining historic performance. In other words, value alone is not enough. As Buffett said:

> 'I can give you other personal examples of "bargain-purchase" folly but I'm sure you get the picture: It's far better to buy a wonderful company at a fair price than a fair company at a wonderful price. Charlie understood this early; I was a slow learner. But now, when buying companies or common stocks, we look for first-class businesses accompanied by first-class management.'
> Berkshire Hathaway's 1989 Annual Report

So is Buffett a growth or a value investor?

> 'Many investment professionals see any mixing of the two terms as a form of intellectual cross-dressing … In our opinion, the two approaches are joined at the hip: growth is always a component in the calculation of value …'
> Berkshire Hathaway's 1992 Annual Report

It is clear that the ability of quality companies to generate good returns, and crucially re-invest those returns in compounding growth over long periods of time, is a vital consideration when evaluating what is an attractive price for potential investments.

PSG Asset Management's 3 Ms are crucial to our hunt for quality on sale

Our process explicitly evaluates the quality of a company. A good quality company has both a proven economic moat and excellent management. This would include a good operational track record, a history of astute capital allocation as well as respect for minority shareholders' rights. It is an unfortunate fact that there are few quality companies. When evaluating the price that we are prepared to pay for an investment, our quality ranking is a crucial component in determining the margin of safety required.

The majority of companies in our investment universe are not quality companies. Our process then requires a much wider margin of safety (in other words, a much lower price) when investing in these companies. So why not just buy quality and sit back for the ride? Buffet again:

> 'You can, of course, pay too much for even the best of businesses. Investors making purchases in an overheated market need to recognise that it may often take an extended period for the value of even an outstanding company to catch up with the price they paid.'
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> Berkshire Hathaway's 1998 Annual Report

That said, our holy grail is 3 M companies, with a moat, good management and a margin of safety. Unearthing and investing in these rare opportunities is an exercise in patience and long-term thinking.

While there can be occasional periods of extreme risk aversion where 'quality on sale' is widespread (for example in 2003 and 2009), it is more common for opportunities to arise when an individual company goes through short-term difficulties. This causes investors to de-rate the business to a level that implies a permanent secular decline.

Lesson 2: seek out cheap leverage where appropriate

Over the period of the AQR study (1976 to 2011), Berkshire Hathaway was leveraged an average of 1.6 times. Leverage is defined as the ratio of total assets less cash to shareholders' equity. This gearing played an important role in Berkshire Hathaway's investment returns. The study data shows about 4% per year of the company's outperformance of stocks in general can be attributed to leverage. Given that the average annual outperformance of stocks in general by Berkshire Hathaway was 13%, leverage contributes more than 30% to the excess return. Although the significant role of leverage in the delivery of exceptional returns gets little attention, we believe it is a crucial component of the company's strategy.

Important to note is Berkshire Hathaway's ability to source very cheap leverage. Firstly, an average of 36% of liabilities is related to the insurance businesses (the insurance 'float'). The study estimates that, over the period, these cost Berkshire Hathaway an average of more than three percentage points less than the T-Bill rate (an exceptionally low cost). In addition, Berkshire Hathaway has been an AAA-rated borrower for most of the study period, with a massive capital base. This enables bank or bond market finance at keenly priced rates. It should be understood that Berkshire Hathaway only borrowed within strict risk criteria:

> 'However, we are not phobic about borrowing. We are willing to borrow an amount that we believe – on a worst case basis – will pose no threat to Berkshire's wellbeing.'
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> Berkshire Hathaway's 1987 Annual Report

Once we understand the amount of leverage Berkshire Hathaway uses, the singular focus on safe, quality stocks makes even more sense. The combination of more volatile, value-type opportunities (which are often characterised by a wide range of possible outcomes) with significant gearing could be an especially toxic combination for shareholders.

Gearing-related lessons for us at PSG Asset Management

Gearing in any company should be evaluated carefully. Our investment vehicles (primarily unit trusts) do not gear. As a result, these vehicles can make investments with a wider range of potential outcomes, should there be attractive opportunities amongst more cyclical companies. The caveat, of course, is that our quality evaluation of these companies requires us to demand a much wider margin of safety when determining an entry price for inclusion in our portfolios.

Be wary of 'float economics' and seek out companies that generate substantial economic value from a cheap float of capital. (A non-insurance example from our portfolios is FirstRand, where funds deposited interest-free in customers' current accounts provide a valuable float.)

We should consider the combination of quality companies with a narrow range of outcomes and a prudent level of leverage in future alternative investment product design.

Lesson 3: secure permanent capital to align funding with a long-term investment horizon

One unwelcome consequence of leverage is an increase in the volatility of returns. Despite Berkshire Hathaway investing in safe, quality companies with a lower range of outcomes than the overall equity market, the company's share price has displayed volatility of 24.9% over the study period, compared to 15.8% for equities in general. Berkshire Hathaway has also weathered some very substantial drawdowns. The most notable was in the 20-month period from June 1998 to February 2000, when its share price declined by 44% while the broader market gained 32%, a relative underperformance of 76%! No matter what lip service shareholders pay to long-term returns, if Berkshire Hathaway was structured as an open-ended mutual fund there is little doubt they would have lost a large proportion of their investors – at just the wrong point in the cycle for all concerned.

Berkshire Hathaway is a listed company. Shareholders that wish to exit sell their shares on the market to other buyers, with no direct impact on the company's pool of investable funds. It is therefore effectively a permanent capital vehicle. This is the third component that is essential to their track record. Permanent capital provides the resilience necessary to weather severe drawdowns, to prevent shareholder actions affecting the investment strategy and to enable returns to compound over several decades.

A point not raised by the researchers, but that is of great importance, is that Buffett, as the largest shareholder, exercises control over Berkshire Hathaway. Even if an investment company is a permanent capital vehicle, shareholders that collectively have the voting power may well be motivated to change manager and strategy or return capital when faced with a substantial drawdown. The importance of the reputation of the manager and an alignment of interests between the manager and investors cannot be overcome by the investment structure in isolation.

Aligning clients' timeframes with our investment horizon is crucial for PSG Asset Management

Our primary investment vehicles are unit trusts. As they are open-ended, they leave us vulnerable to the risk of ill-timed subscriptions and redemptions. Simply put, this means that we could be forced to sell assets at very low prices to fund redemptions, or buy assets at elevated prices to invest subscriptions.

These risks are far more common in an equity-only strategy. In a multi asset strategy, the manager has more flexibility in positioning (for example, when shares are very attractively priced, redemptions can be financed from existing cash balances). This has the per-unit effect of raising equity exposure at a very favourable time. Similarly, subscriptions during a period of very high valuations can be kept in cash while we patiently wait for attractively priced investment opportunities.

We aim to balance the lack of permanent capital with consistent marketing and appropriate investor education. As the manager, we will try to align investors' timeframes with our investment horizon. We believe staying 'on message' throughout the cycle is essential. Importantly, we can enhance these efforts significantly in the future with appropriate fee incentives to reward our long-term investors.

We must also remain open to new products that, while meeting real client needs, can source permanent capital for us.

In conclusion: Berkshire Hathaway in a post-Buffett and Munger era

Buffett is 85; Charlie Munger (Berkshire Hathaway's Vice Chairman) is 92. It is natural as an investor to think about management succession and what it could mean for shareholders of Berkshire Hathaway. The main risk for shareholders is if Berkshire Hathaway's returns have been primarily driven by 'an idiosyncratic Buffett skill' inherent to Buffett himself, which would naturally be lost with his passing.

However, the findings of Buffett's Alpha provide good support for an investment in Berkshire Hathaway under a new management team in the future. The research shows that the company's historic returns can be explained by consistently adhering to some relatively simple principles and factors over a very long period of time. The genius of Buffett was identifying these principles nearly 50 years ago and consistently applying them, rather than a 'secret sauce' of alpha generation that can never be replicated.

> 'Ben Graham taught me 45 years ago that in investing it is not necessary to do extraordinary things to get extraordinary results.'
> Berkshire Hathaway's 1994 Annual Report

Berkshire Hathaway has the structural advantages of cheap leverage (due to the insurance 'float' and the company's credit rating) and permanent capital (it will never need to fire-sell investments to fund large investor redemptions). By benefitting from these structural advantages and focusing on buying high quality, safe, cheap stocks, we expect Berkshire Hathaway's next management team to be able to continue the long tradition of delivering superior returns to shareholders.

Sources:
'Buffett's Alpha', (A. Frazzini, D. Kabiller, L. Pedersen), Working Paper 19681, National Bureau of Economic Research, November 2013
'Berkshire Hathaway letters to Shareholders 1965 - 2013', Warren Buffett, as compiled by Max Olsen