

# Past Returns Are Not a Reliable

## Guide to the Past

**We need to stop looking at past returns and spend more time thinking**

We make the case that performance statistics are anything but a reliable guide to the past, let alone the future. Our conclusion is that while performance statistics are important to consider, they must be heavily supplemented by qualitative insight. This should not be surprising, since making decisions about the future is inherently uncertain.

### A quick quiz

Consider the following four questions:

1. The annualized return for the S&P 500 index for the 20 years ended December 31, 2010, was 9.1% per annum (pa). What annualized return did the average equity mutual fund holder achieve?
2. The Dow Jones Industrial Average Index was created on May 26, 1896 (opening value 40.94), and has risen from its all-time low of 28.48 (in the summer of 1896) to around 13,000 (rounded up, May 2012). If the index measured total return, with dividends reinvested, instead of the price-only return, what value would it be at now?
3. According to the Barclays Equity Gilt Study 2012 the real (above-inflation) return on U.S. equities from 1925 to the end of 2011 was 6.6%. How would actual investor results be distributed around this result?
4. We create a hypothetical, highly skilled investor who can outperform cash by 15% each year, with a volatility of 10% pa. Assuming the investor works eight hours a day (480 minutes), how many minutes a day is the investor ahead of the market?

### And the answers are...

The answers are potentially surprising, but are hopefully illuminating. For the first question, while it is possible for a single investor, or small group of investors, to outperform the market, it is clearly not possible for the aggregate. We will assume the reader also knows to deduct average mutual fund costs of around 2%, so a reasonable opening guess would be a return of 7.1% pa for the 20-year period. The actual answer is that the average equity mutual fund investor earned a return of 3.8% pa, which was only 1.2% pa above inflation.<sup>1</sup> This answer ought to shock us. It is an almost incredible, needless destruction of value. It turns out that retail investors in mutual funds aren't very good at "buy and hold" and instead chase higher returns with tragic results. The story is essentially the same for institutional investors, although the scale of value destruction is smaller.<sup>2</sup>

<sup>1</sup> Dalbar Quantitative Analysis of Investor Behavior 2011

<sup>2</sup> "The Selection and Termination of Investment Management Firms by Plan Sponsors," May 2005, by Amit Goyal and Sunil Wahal of the Goizueta Business School, Atlanta.



The answer to the second question should be equally arresting. Meir Statman, a respected finance professor, calculated where the Dow Jones would now stand if dividends had been reinvested. His answer is in excess of 1,300,000, or 100 times above the level we are familiar with.<sup>3</sup> Even index values can be a poor guide to past returns — and that is before we start worrying about whether the index is the appropriate one to use.

This leads us straight onto our third question. The power of investing comes from compounding — reinvesting the dividends and earning a return on an ever-growing capital sum. So, to answer the question, we need to consider who is disciplined enough to constantly reinvest dividends for 85+ years. Even perpetual endowments need to take an income. Warren Buffett has only done it for around 50 years (and who knows how many of his original investors have left their initial investment untouched?).

Then there is the cost of reinvesting dividends — until the Internet and low-cost dividend reinvestment prices, it would have been prohibitive for “normal” private investors. If you are getting a mutual fund manager to reinvest your dividends for you, then the cost drag remains substantial. And then there is tax.

The 6.6% per real return assumes the reinvestment of gross dividends, which tax-paying investors clearly cannot do. Now, we accept that

it is theoretically possible for an investor to have had a highly concentrated portfolio and achieve a return considerably higher than real 6.6% pa. We just don't think there are many such investors around. And so our answer to the question is that we believe the vast majority of actual investor real results would be less than 6.6% pa. In other words, in this case past returns are a guide to the reasonable *maximum* expected return an investor could have earned.

Our questions so far have sought to illustrate that we need to apply context and understanding to the raw data. We need to adjust for costs, activity, inflation, compounding and whether the implied investment strategy can be replicated in practice.

Our fourth question changes tack slightly and considers whether the frequency of measurement matters. The highly skilled investor we created has a 93% probability of making money in any one year, which is well above real-world expectations. But on a minute-by-minute basis, the very same statistics tell us that there is now a 50.17% probability of being ahead. So during an eight-hour day, our investor will have 241 pleasurable minutes against 239 unpleasant ones. Not only will our investor be emotionally drained, but we also know from behavioral finance that he or she will feel the losses far more keenly than any boost from the gains. In addition to the high emotional cost, high-frequency performance measurement makes it difficult to distinguish between noise and signal. Our conclusion once more is that past returns alone are a weak guide to the *past*, let alone the future.

<sup>3</sup> Jason Zweig's “Intelligent Investor” column in *The Wall Street Journal*, March 3 – 4, 2012

## Practical takeaways

- The short-term performance information in defined contribution (DC) annual statements should be downplayed in prominence to discourage DC investors from being tempted to transact after a market fall, which is rarely the best course of action (and we consider a single year's result to be short term).
- Past data alone, even information ratios, have limited value; interpretation is everything.
- We should reduce the frequency of our performance monitoring to a level compatible with fulfilling fiduciary duties.
- We need to introduce a monitoring process that is independent of performance results. In other words, we need to do more qualitative monitoring. We should only ever take action in the light of anticipated future performance. The problem with monitoring investment performance is that it leads us into extrapolating recent trends, which, in investment, is often a dangerous business.
- The rule is "Investor know thyself." If we are likely to want to make a "sell" decision based on bad results, then we should develop processes to act as a check on that behavior.

So maybe it is time to stop looking at past returns, and instead spend the time doing some hard thinking about possible future outcomes.

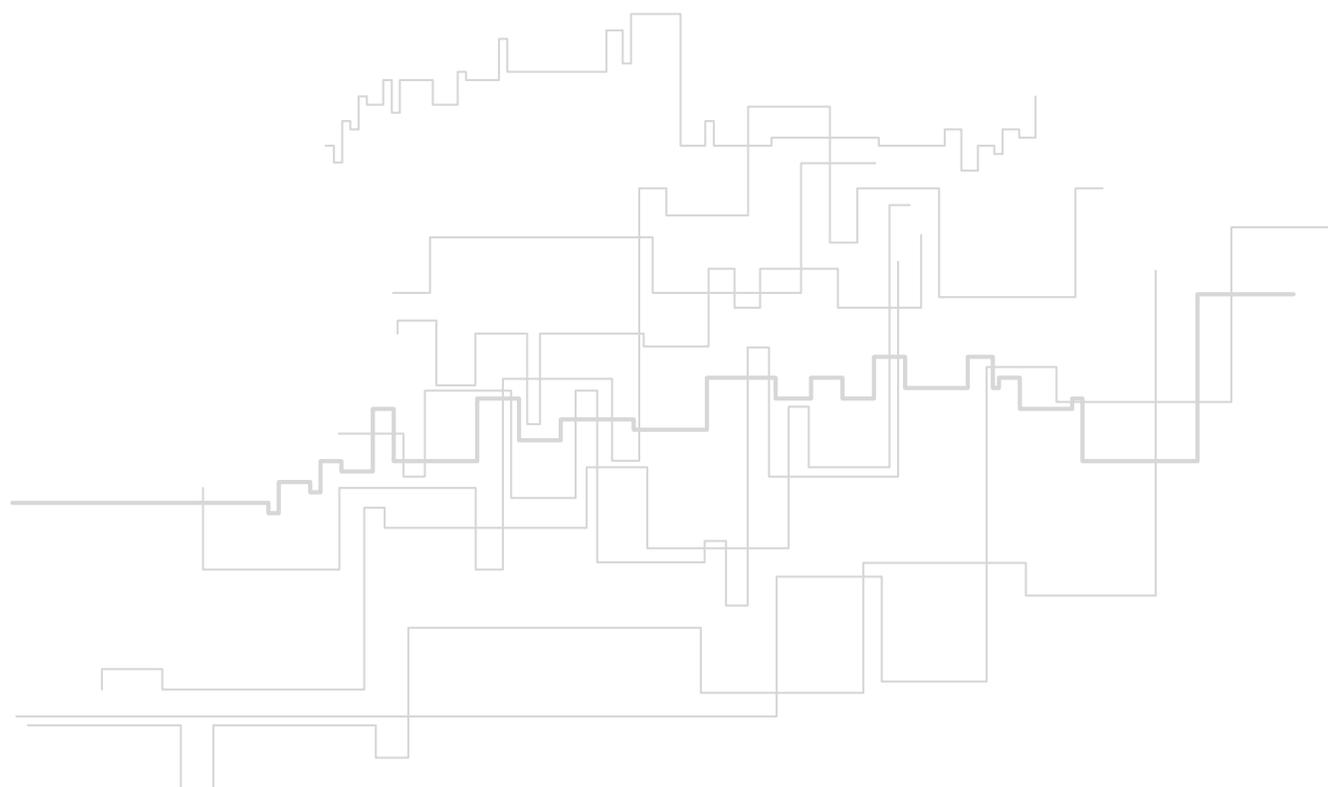
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