

## Risk, Return, and the Overthrow of the Capital Asset Pricing Model

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Harding Loevner invests based on common-sense principles drawn from our founders' experience: we stick to high-quality, growing companies that we can identify through fundamental research. This general philosophy flows naturally from our nature as cautious, patient people. It has been a constant throughout our firm's existence since it was founded in 1989. In contrast to the boring continuity of thought in our little community, the prevailing wisdom in the larger world of academic investment theory has turned about completely over this same quarter century. Theories regarding market behavior and investment outcomes that were proclaimed as essential verities and celebrated with Nobel Prizes at the beginning of this period were subsequently overturned at the end. That academic battle is an engrossing tale that we have followed with interest. But, when it comes to our own story, we continue to invest in accordance with our belief that the steady-growth, high-quality segment of the global equity universe provides the best returns and risk experience over time.

In 1990 the Nobel Prizes for Economics were awarded to William Sharpe, Harry Markowitz, and Merton Miller, theorists who had been influential in the investment world for some time. Their work suggested an investment approach quite different from our own. In fact, it implied that if we thought we could achieve better returns through fundamental research—especially on less-risky, high-quality companies—we were destined to fail! The essence of the emergent consensus at the time Harding Loevner was founded was that the only future predictor of stock returns was "beta," a measure of risk calculated by taking the slope of the regression of a stock's past returns against the market. However, over the following two decades it became clear that the award-winning theories of 1990 failed to describe market behavior and, like the emperor who was seen to have no clothes, their authority declined. New Nobel Prize-winning theories cast doubt upon the old consensus, and may even grant some validity to the common-sense approach to which we have consistently adhered; namely, using fundamental research to identify growth opportunities, and reducing risk through quality and diversification.

To explain the overthrow of the old "1990 Consensus" and its replacement with a new set of investment perspectives, it is helpful first to explain in more detail our investment process and its divergence from this consensus.

Harding Loevner's primary assessment of risk and return is driven by judgments about unique and concrete company and industry fundamentals rather than calculations of historical stock return volatilities and co-movements. We marry both qualitative and quantitative analysis to identify strong and sustainable corporate business models. To assure that there is rigor in the qualitative aspects of our analysis, we require that every company in which we consider investing possess each of these four criteria: Competitive Advantage, Sustainable Growth, Financial Strength, and Quality Management. These four criteria form the backbone of our investment process and imply that there are distinctions amongst equities that are identifiable and that predict differences in future returns.

Competitive advantage within a favorable industry structure is a prerequisite for durable profitability in a company. A company in an industry with unfavorable dynamics has a much steeper challenge than one well-positioned with few rivals and strong bargaining power over buyers and suppliers. But, we also require that our companies possess competitive advantages that will allow them to sustain superior levels of return over time. Our analysts are primarily organized by industry rather than by geography as we believe that the understanding of industry structure and peer groups is key to identifying such investment opportunities.

Sustainable growth allows cash flow and earnings to compound as a consequence of predictable long-term forces, like demographic trends, rising product penetration rates, and consumer substitution of higher-quality goods as incomes rise. Over time, these forces will mitigate the short-term impacts of unpredictable economic cycles. Sustainability also means that our companies are growing within the limits of their strategic and financial resources and are adding to the sum of human wealth.

Financial strength protects equity investors from the risks of illiquidity or dilution. It provides security during difficult economic environments, and protects our interests at other times as well, since, when a company's debt becomes too large relative to its business or cash flows, management tends to sacrifice the long-term interests of equity investors to the immediate demands of creditors. Firms with strong balance sheets and sharp management teams can also act opportunistically to snap up attractive assets when weaker competitors cannot.

Management quality is the least quantifiable of our four criteria, but is crucial in protecting us from failures of strategy, execution, and intent. We have often seen companies with competitive advantages and growth potential fail to deliver due to incompetent management. Strong corporate governance is another prerequisite in this category to assure that the resources of the firm are directed to shareholder wealth creation rather than management enrichment.

After determining that a potential investment meets our fundamental criteria, our analysts and portfolio managers convert their understanding of company and industry fundamentals into growth forecasts and estimates of fair value. We recognize that forecasting and valuation are difficult and imprecise arts, but are committed to investing at valuations that appear reasonable based on past history and future prospects.

So, that is what we do, and we have been steadfast in our adherence to this process throughout our history, while always endeavoring to improve our skills in applying it.

Let's now review the theories honored by the 1990 Nobel Prizes and the bases for their conclusions that none of our four investment criteria (or any other fundamental research) could help investors predict risk or return.

Certainly, the most influential and widely promulgated theory to be recognized by a Nobel Prize was William Sharpe's Capital Asset

Pricing Model (CAPM), which stated that beta (the co-movement of stocks versus the index) is the only factor explaining expected stock and portfolio returns, and that the greater the beta (i.e., the higher the risk) the higher the expected returns. Sharpe's CAPM was based on several important assumptions—namely that investors are perfectly rational; that they are perfectly informed about all security fundamentals; and that they all share the same view about the relationship between risk and return. In addition, the CAPM assumed that all investors create “optimal” portfolios through diversification, a tool for portfolio construction developed by Harry Markowitz and also awarded a Nobel Prize in 1990. Merton Miller’s theory that, in a perfect market, a company’s choice between debt and equity financing will not impact its value won the Nobel Prize in 1990 as well. In summary, the 1990 consensus proclaimed that business fundamentals don’t matter when forecasting prospective stock returns because markets are so efficient that all investors understand and price stocks perfectly and hold them in fully optimized portfolios. The only important factor was beta—the sole differentiator of stock returns.

After twenty five years, have our efforts thus been a pointless waste of time, as would be indicated if returns are, indeed, determined by beta alone? The short answer is no. Years of data support different conclusions: academic research has found that within equity universes risk and return have not been positively correlated; that fundamental company characteristics matter (e.g. profitability, leverage, and valuation); and that investors and markets may not be as informed and rational as previously thought. Evidence has shown that, counter to the central CAPM tenet, low-beta equities have outperformed the market over decades and across geography.<sup>1</sup>

Noting that the past couple of decades of data were not supportive of the 1990 consensus, the academicians got to work formulating theories with better explanatory power. In 2013 the Nobel Committee awarded the supreme accolade to economists whose recent research validates the importance of company characteristics and valuation in determining equity returns, though these economists have differing views on what this means for the question of market efficiency. Eugene Fama was awarded the Prize based on his work on the Fama-French three-factor model, which augments the CAPM model by adding size and value as additional factors in determining returns, noting the inadequacy of using beta alone. A proponent of the theory of efficient markets, Fama continued to seek an empirical model that would capture additional factors influencing stock prices. Recently he and French introduced a five-factor model that—along with beta, size, and value—suggests company quality (i.e., profitability) and investment behavior are also important.<sup>2</sup> Robert Shiller, another 2013 Nobel recipient and a critic of efficient markets theory, was honored in part for his research into the long-run predictability of asset returns. His work suggests the importance of valuation, illustrating that stocks that are highly priced relative to their dividends tend to generate lower long-run returns than higher-yielding equities.<sup>3</sup>

Other recent research has validated our long-held preference for companies with consistently higher profitability and lower indebtedness than the averages in their sectors by showing that such companies do, indeed, outperform their lower-quality peers.<sup>4</sup> The issuance in 2012 of new “Quality Indices” by MSCI is a further endorsement of the relevance of company quality. In backtests, MSCI found its World

Quality Index, which represents developed markets, outperformed its standard World Index by 1.84% annually in the trailing 10 years through the end of February 2014. The MSCI Emerging Markets Quality Index outperformed the standard Emerging Markets Index by 3.56% annually in this same period.

While we’re pleased to see theory moving in our direction, our track record over the last two decades is more compelling evidence to us than academic studies. We prefer our real-time experience and observations over academic studies of finance for many reasons. One major limitation of such studies is they can only rely upon what can be quantified, while our fundamental analysis incorporates more qualitative analysis of business models and industry characteristics whose uniqueness and specific applicability to the particular company and sector under examination make them less amenable to generalization or standardization. These characteristics are essential in informing analysts’ judgments, even though they are difficult to quantify and compare.

We don’t deny that qualitative investment research has its own weaknesses, including behavioral biases, subjectivity, and the difficulty of forecasting. Our process, favoring companies with high and steady profitability and growth, and strong balance sheets, was designed to help us overcome some common investor emotional biases, and reduce our dependence on forecasting unpredictable forces such as economic cycles (which we, like nearly all other investors and economists, do poorly). Over the years we have attempted to increase the objectivity of our company research, and created decision-making structures that reduce the impact of bias. We have also discovered that the higher confidence engendered by the superior quality and track records of our companies have made us less vulnerable to emotional, knee-jerk reactions.

We will continue to take an active interest in academic debates and disputes but, having no Nobel Prize winners among us, we are ill equipped to solve them! Rather, we are gratified by the experience of actually applying our common-sense approach to the meaningful benefit of our clients. We think our process of focusing on the long-term fundamentals of high-quality, value-creating companies around the world, and owning their stocks at prices supportive of future positive returns, is a rational way to invest, and one that can continue to produce above-average returns, while exposing our clients to below-average levels of risk.

<sup>1</sup>Malcolm Baker, Brendan Bradley, Jeffrey Wurgler, “Benchmarks as Limits to Arbitrage: Understanding the Low-Volatility Anomaly,” *Financial Analysts Journal* 67:1 (2011).

<sup>2</sup>Eugene Fama and Kenneth French, “A Five-Factor Asset Pricing Model,” Draft Manuscript, Fama-Miller Working Paper Series, University of Chicago Booth School of Business, November 2013.

<sup>3</sup>For a discussion of the contributions by the 2013 Nobel Prize winners in economics, including extensive citations to the work of Eugene Fama and Robert Shiller, see: Royal Swedish Academy of Sciences, *Understanding Asset Prices*, 14 October 2013. [www.nobelprize.org/nobel\\_prizes/economic-sciences/laureates/2013/advanced-economicsciences2013.pdf](http://www.nobelprize.org/nobel_prizes/economic-sciences/laureates/2013/advanced-economicsciences2013.pdf)

<sup>4</sup>See, for example, Max Kozlov and Antti Petajisto, “Global Return Premiums on Earnings Quality, Value, and Size,” Blackrock, Inc., January 2013.