

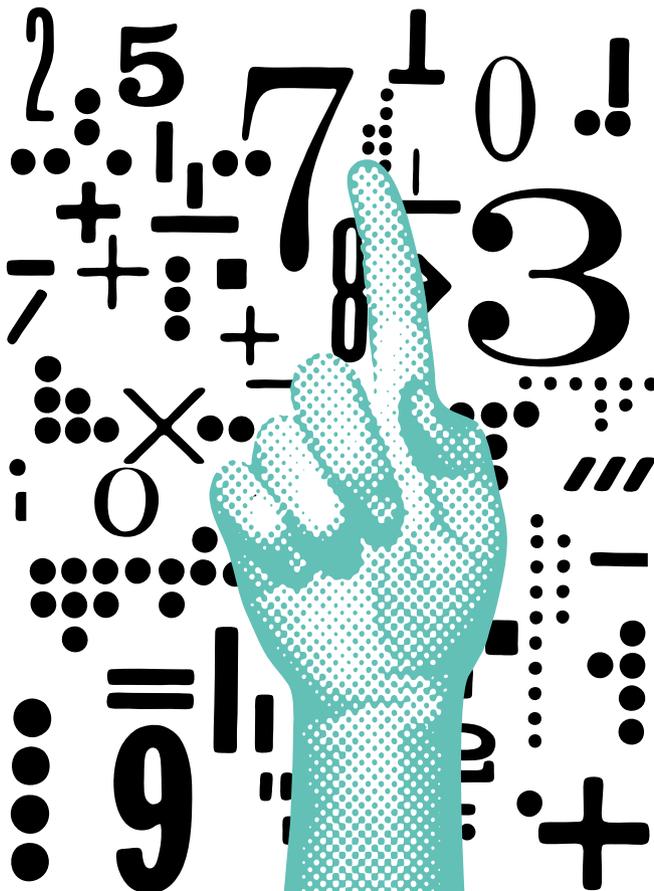
FOCUS ON FACTORS

IOF4

A series of articles that answer the most common questions about factor investing

WHAT YOU
NEED TO
KNOW ABOUT...

VALUE



Value investing, which relies on cheap assets to provide higher returns than expensive assets, requires patience and a solid understanding of Value metrics and strategies

TOMMI JOHNSEN AND ELISABETTA BASILICO

Before we delve into the most common questions asked about the value factor, it is worth taking a quick step back and looking at a bit of history. Professors Eugene Fama and Kenneth French established the foundation for factor investing in the early 1990s with the publication of two influential papers: The Cross Section of Expected Returns (1992) and Common Risk Factors in the Returns on Stock and Bonds (1993). With those publications, Value as a factor was born and the race to build quantitative versions of Value products began. We now have an abundance of factor strategies, and an industry estimated by BlackRock to be worth \$2 trillion today.

Thanks to the burgeoning number of academic studies on the topic, factors are now everywhere, defined every which way and promise all kinds of advantages.

Value was one of the original three factors set out by Fama and French, alongside size and risk. It has been in the news for much of the post-crisis era due to lagging in a roaring growth market, but what is it and how does it work? Read on to find out as we answer investors' most common questions about Value.

WHAT IS THE NARRATIVE BEHIND THE VALUE PREMIUM?

Conventionally speaking, the Value premium refers to the tendency for relatively cheap assets to provide higher returns relative to expensive assets. The research is consistent, clear and emphatic on this. Value, when deployed as a strategy, has exhibited higher than expected average returns. The inconsistency in the research comes from the underlying theory as to why higher average returns are the case. Two camps have emerged taking opposite sides of this debate, which asks: Is it risk or is it an inefficient market that drives factor returns?

The risk camp argues that the Value premium is compensation for investing in a riskier security. Fama and French argue this case forcefully in their landmark 1992 study. Stocks with high book-to-market ratios are fundamentally riskier in one way or another, perhaps default risk, and their higher average returns are simply compensation for bearing that extra risk.

The mispricing camp counters that emotion and human psychology will impart undue influence on investing decisions and will produce systematically mispriced securities. In the case of Value stocks, for example, investors may incorporate much lower expected growth rates into share prices, oversell them and thus generate a set of stocks that are not only out of favor but consistently and systematically underpriced.

In either case, the outperformance of Value as a factor has been documented in academic literature and successfully exploited in various quantitative Value strategies, which are packaged and sold successfully as retail products.

	BOOK-TO-MARKET	DIVIDEND-TO-PRICE	SALES-TO-PRICE	EARNINGS-TO-PRICE	FREE CASH-FLOW-TO-PRICE	EBIDTA-TO-EV
CANADA	●	●	●	●	●	●
UNITED STATES	●	●	●	●	●	●
UNITED KINGDOM	●	●	●	●	●	●
FRANCE	●	●	●	●	●	●
GERMANY	●	●	●	●	●	●
ITALY	●	●	●	●	●	●
JAPAN	●	●	●	●	●	●
AUSTRALIA	●	●	●	●	●	●
HONG KONG	●	●	●	●	●	●
SINGAPORE	●	●	●	●	●	●

HOW IS VALUE MEASURED AND WHICH METRIC IS BEST TO USE?

We studied this question for 10 developed markets over the period from January 1995 to May 2019 with results summarized in figure 1. We were looking for a relationship between forming a portfolio based on the Value metric and future stock returns.

We found the clear winning characteristics to be free cash-flow-to-price, followed by earnings-to-price and earnings before interest tax

depreciation and amortization (Ebitda) and to enterprise value.

With the exception of Japan, Canada and Singapore, the best and worst metrics were consistent across the remaining countries.

WHY SHOULD YOU CARE?

It is important to be aware that the method of constructing factors may vary considerably from provider to provider and could differ from the definition used in academic articles that establish their significance and robustness. That could be a problem because the relative performance of a value strategy will vary depending on the metric used.

It is true that most vendors use the book-to-market metric, but we found its performance disheartening at best. Book-to-market was statistically significant in only one out of 10 countries supporting rumors that one of the most studied and commercially used metrics may no longer be effective at capturing the Value premium.

SHOULD WE WORRY THAT VALUE IS DEAD?

Despite the evidence about book-to-market, and the not quite up to par performance of Value in general over the last decade, we believe the rumors that the Value premium has disintegrated and disappeared are premature.

Factors can and have had periods where large drawdowns occur. Notably, the Value drawdown during the tech bubble of 2000 and the crisis of 2007 were very similar in size and length to the dismal performance of 2018-2019.

If the Value premium is to falter it would occur as a result of a fundamental change in the manner in which investors behave or the way markets reward risk taking. The robustness of the research on Value investing has been documented and is a convincing reason to conclude that the return regularities observed are in fact, an economic reality rather than the results of datamining or sampling error.

FINAL THOUGHTS:

Be patient. Investors often focus on stocks that pay off over horizons much shorter than is required by most Value strategies. An examination of the return performance, over time, of Value suggests that it may take a number of years to pay off, with periods of underperformance interspersed throughout the investment period.

It is best to diversify. That means across Value metrics and across Value strategies globally. And though the historical performance of Value could return in full force, it really wouldn't hurt to lower your return expectations below that guidance.

Tommi Johnsen, PhD, and Elisabetta Basilico, PhD, CFA, are co-editors of academicinsightsoninvesting.com. Their book, *Smart(er) Investing: How Academic Insights Propel the Savvy Investor*, is due out in December.