

The value premium and long-run bull and bears

MARINA ARANTES BRAGA PRADO

FACULDADE DE ECONOMIA, ADMINISTRAÇÃO E CONTABILIDADE DA UNIVERSIDADE DE SÃO PAULO - FEA

JOSÉ ROBERTO FERREIRA SAVOIA

FACULDADE DE ECONOMIA, ADMINISTRAÇÃO E CONTABILIDADE DA UNIVERSIDADE DE SÃO PAULO - FEA

The value premium and long-run bull and bears

Introdução

According to Cakici, Fabozzi, and Tan (2013), the value premium is a superior return of stocks with higher book equity to market equity (B/M). There is a considerable number of researches identifying the value premium. However, these analyses usually do not consider splitting the data into bull and bear cycles and reviewing more recent Brazil data.

Problema de Pesquisa e Objetivo

The purpose of this paper is threefold. First, is to verify and analyze the value premium in Brazil. The second is to identify and analyze the Brazilian stock market's bull and bear cycles from December 1967 to June 2020 and verify if the value premium changes during bear and bull markets. The third is to compare the value premium using the first and the second half of the data set. It is worth mentioning that this work is in the Covid-19 Pandemic context, which had significant impacts on global exchanges. The results consider these impacts.

Fundamentação Teórica

Fama and French (1998), considering a dataset of 13 countries from 1975 to 1995, concluded that the value premium was 7.7% in 12 of the 13 analyzed markets. However, using more recent data, Fama and French (2020) found a value premium that is statistically equal to zero for the North American market. Regarding market cycles, Chan e Lakonishok (2004) found evidence that value stocks suffered less than Growth during periods of weak profitability in the economy or the stock market.

Metodologia

We used a secondary dataset and adopted descriptive and empirical-analytical approaches, with quantitative analysis. We collected monthly stock data, the Ibovespa index, the exchange rate, Selic, CDI, IPCA, CDI, and savings return available from Economática. The data were retrieved from December 1967 to June 2020 for Ibovespa, and from December 1986 for the stocks. The data were processed using the programs RATS 2017 Estima, Microsoft Excel 2010, and MATLAB R2017a. The cycle identification follows Albuquerque et al. (2015) and Nefin (2017) methodology for the value portfolio definition.

Análise dos Resultados

We were able to identify of four cycles complete bull and bear cycles in the Brazilian stock market in dollars from 1967 to June 2020, with each cycle lasting from seven years to 15 years, on average 12 years. The value premium during the bear cycle was, on average, 0.77% per month and significantly different from zero. During bull cycle is was equal to zero. The first half of the data's premium value was 0.65% and decreased to 0.42% but was still significant, possibly because the standard deviation in the first half of the period is much higher than the second one.

Conclusão

Long term bull and bears exist in Brazil, and they last for an average of twelve years (six years of high and six years of low), which is highly related to economic and political cycles. The value premium is 0.54% per month and significantly above zero because these stocks have higher profitability than the market during the bear cycles. The value premium decreased in the second half of the 1986-2020 period, however, it was still significantly above zero indicating that it is still possible to gain excesses return investing in value.

Referências Bibliográficas

Albuquerque, R., Eichenbaum, M., Papanikolaou, D., & Rebelo, S. (2015). Long-run bulls and bears. *Journal of Monetary Economics*. Cakici, N., Fabozzi, F. J., & Tan, S. (2013). Size, value, and momentum in emerging market stock returns. *Emerging Markets Review*. Chan, L. K. C., & Lakonishok, J. (2004). Value and Growth Investing: A Review and Update. *Financial Analysts Journal*, 60(1), 71-86. Fama, E. F., & French, K. R. (1998). Value versus Growth: The International Evidence. *The Journal of Finance*. Fama, E., & French, K. (2020). The value premium. Chicago Booth. Nefin. (2017). Methodology

