

---

# *Fama – French*五因子模型在上证市场的实证检验

## 摘要

*Fama*和*French* (2015) 提出*FF*五因子模型在以美国为代表的成熟资本市场得到验证, 样本数据研究表明该模型的解释能力很强。但是, 由于我国证券市场尚不成熟, 对*Fama – French*五因子模型是否能适用于上证市场提出了质疑。本文旨在验证*FF*五因子模型在我国上证市场的适用性。

本文选取 2005 年 6 月至 2020 年 5 月间的样本数据, 对*FF*五因子模型的因子构建方法进行详细地阐述, 并进行描述性统计分析和相关性检验。利用五因子模型分别对规模-账面价值比组合、规模-盈利组合、规模-投资组合这三类组合进行 75 ( $3 \times 5 \times 5$ ) 次回归, 通过观察各投资组合中的截距项显著不为 0 的个数, 证明*FF*五因子模型适用于我国上证市场。再通过五因子模型回归系数显著性检验, 得出上证市场具有非常显著的规模效应, 价值效应和盈利效应, 而投资因子的解释能力整体上并不显著。最后给出理性的投资建议。

**关键词:** 资产定价模型; *Fama – French*五因子模型; 上证市场

---

# Empirical test of Fama-French five-factor model in Shanghai Stock Market

## ABSTRACT

Fama and French (2015) proposed that the FF five-factor model was verified in the mature capital market represented by the United States, and the study of sample data showed that the model had a strong explanatory ability. However, due to the immature stock market in China, whether the Fama-French five-factor model can be applied to the Shanghai Stock market has been questioned. This paper aims to verify the applicability of FF five-factor model in Shanghai Stock Market of China.

In this paper, sample data from June 2005 to May 2020 were selected to elaborate the factor construction method of the FF five-factor model, and descriptive statistical analysis and correlation test were conducted for the five-factor model. Using the five-factor model of SMB - HML combination, SMB - RMW combination and SMB – CMA combination, these three kinds of portfolio for 75 times regression, by observing the number of non-zero intercept terms in each portfolio, it is concluded that FF five factor model is applicable to the Shanghai stock market in our country. Through the significance test of the regression coefficient of the five-factor model, it is concluded that the Shanghai stock market has very significant scale effect, value effect and profit effect, while the explanatory ability of investment factors is not significant on the whole. Finally give rational investment advice.

**Key words:** Asset pricing model; Fama-French five-factor model; The Shanghai securities market

---

## 目录

|   |    |
|---|----|
| 摘要.....                                       | I  |
| ABSTRACT.....                                 | II |
| 一、绪论.....                                     | 1  |
| (一) 研究背景和意义.....                              | 1  |
| (二) 论文研究的目的.....                              | 2  |
| (三) 论文的结构安排.....                              | 3  |
| (四) 论文的创新之处.....                              | 3  |
| 二、国内外文献综述.....                                | 5  |
| (一) 国外研究文献综述.....                             | 5  |
| (二) 国内研究文献综述.....                             | 6  |
| 1、关于 <b>Fama – French</b> 三因子模型的实证研究.....     | 6  |
| 2、关于 <b>Fama – French</b> 三因子模型的拓展.....       | 7  |
| 3、关于 <b>Fama – French</b> 五因子模型的实证研究.....     | 8  |
| (三) 本章小结.....                                 | 9  |
| 三、多因子模型的理论基础.....                             | 10 |
| (一) 资本资产定价模型 ( <b>CAPM</b> ) .....            | 10 |
| (二) 套利定价理论 ( <b>APT</b> ) .....               | 10 |
| (三) <b>Fama – French</b> 三因子模型.....           | 11 |
| 四、 <b>Fama – French</b> 五因子实证模型构建和数据描述.....   | 12 |
| (一) <b>Fama – French</b> 五因子模型.....           | 12 |
| (二) 样本的选取和数据处理.....                           | 12 |
| 1、样本范围的选取.....                                | 12 |
| 2、样本区间的选取.....                                | 13 |
| 3、数据的来源及定义.....                               | 14 |
| (三) 五因子模型的因子构建方法.....                         | 14 |
| 1、市场因子 <b><math>RM = rm - rf</math></b> ..... | 14 |

---

以上内容仅为本文档的试下载部分，为可阅读页数的一半内容。如要下载或阅读全文，请访问：<https://d.book118.com/917020160045006115>