Analysis of the determinants of yield spreads in European prime office real estate markets

Bachelor's Thesis in Asset Management

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Executive Summary

I. Research question

The objective of this study is to evaluate the factors that determine the yield spreads of European prime office real estate investments. The characteristics of the determining factors shall provide evidence whether real estate investors act rational in the acquisition process or not.

II. Approach

A database from Property Market Analysis (PMA) is provided by Sal. Oppenheim jr. & Cie. Corporate Finance (Switzerland) Ltd. The database contains time series from 1980 to 2008 for the most important office real estate markets in Europe. The data bases on transaction data. Using the PMA database two multiple regression models are set up with different theoretic assumptions. Model 1 suggests the yield spread as being determined by the risk of the investment, whereas Model 2 challenges this thesis. Model 2 presumes that investor set their required rates of return not as a markup on the risk free rate but rather in absolute terms. This second view is contradictory to a positive risk-return-relation and to a rational pricing.

III. Key results

The comparison of the two models points out Model 2 as being clearly superior and displaying the "true relations" more accurately. Using Model 2, three quarter of the total variation of the yield spread can be explained by the following five factors: the real risk free rate, the inflation, the GDP growth, the vacancy rate and the rental growth expectations. Moreover, Model 2 attests high significance to all explanatory variables along with theoretically established prefixes (positive or negative) of the regression coefficients.

IV. Conclusion

It can be said that real estate investors apply an absolute thinking when the required rate of return of an investment is set. Only a small part of the yield spread can be explained by the risk of the property investment. On the other hand, the interest level in an economy has a clearly negative impact on the yield spread. Thus, it can be stated that in markets with low interest levels, the yield spread is higher even though the risk in these markets is assumed not to be higher. In the context of this model, the findings do not support the theory of real estate investors as acting rational.