ESG Index, Risk Factors and Performance of Environmentally Sensitive and Non-Sensitive Industries

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Abstract

This study aims to investigate the relation among ESG Index, risk factors and equity index performance of environmentally sensitive and non-sensitive industries in the Stock Exchange of Thailand (SET). FTSE4Good Emerging Index is used as a benchmark for ESG tradable index investment in emerging markets. Risk factors include three volatility indexes which are CBOE Volatility Index (VIX), CBOE Crude Oil ETF Volatility Index (OVX), and CBOE Gold ETF Volatility Index (GVZ) that assess the market's expectation of future volatility in the stock, oil and gold markets respectively. Two dependent variables that are resources industry index return as a representative of environmentally sensitive industry performance, and agro and food industry index return as a representative of environmentally non-sensitive industry performance are included in this study. Secondary data are collected from January 4, 2021 to December 30, 2024 with the total of 917 daily observations. This research applies time series analysis and employs multiple linear regression with Newey-West standard errors to examine the correlation among independent and dependent variables. The findings demonstrate that FTSE4Good Emerging Index positively influences agro and food return while it does not have significant effect on resources return. Though VIX statistically impacts both agro and food and resources industry returns, VIX has a stronger effect on resources industry than agro and food industry. A similar result for the positive correlation between OVX and both industry returns is found that OVX has more impact on sensitive industry than non- sensitive industry. Finally, GVZ negatively relates to both industry returns.

Keywords: ESG Index; FTSE4Good Index,GVZ; OVX, Returns of Environmentally Sensitive and Non-Sensitive Industries, Risk Factors, VIX, Volatility Index