

Determinants of Financial Performance of Real Estate Firms Listed on the Vietnamese Stock Exchange

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Abstract:

This paper aims to investigate the factors affecting the performance of 58 real estate business is trading on Ho Chi Minh and Ha Noi stock Exchange through two indicators is return on equity (ROE) and return on assets (ROA). By using multivariate linear regression using ordinary least squares method (OLS) to estimate the, the findings shows that the performance of the real estate business is affected by the ratio of loans / total debt, ratio of fixed assets / total assets, the ratio of fund shares / total equity, cost ratio for sales and business management and uptime of business. From the results of the subject has also proposed a number of measures to improve the performance of the real estate business in the current period

Key words: Financial performance, Real estate firms, Vietnam.

I. INTRODUCTION

Firm performance is a significant issue for different groups of people. This can be explained as all agents that have to make any financial decision about the firms are concerned with its financial provision (Vira, 2008). Therefore, modeling that

help to analyse and predict the performance of the firms attracts the all agents such as managers, potential investors, banks and other financial institutions.

Profitability of a firm is an important consideration as it has the ability to absorb market shocks and contribute to the stability of the system in general and the firm in particular. Due to its significant duty on determining of financial performance of the firms, since investors and other stakeholders pay most of their attention on profitability before dealing with firms. Also, more profits will mean more future investments, which will generate employment opportunities and enhance the income of people. Nevertheless, some of firms have experienced the opposite of their stated objectives, thus for organizations to obtain their set objectives. Different types of firms performance management systems must be used (Kolawole, 2013) to determine the factors affecting on the firm's performance.

Since Vietnam joined the World Trade Organization (WTO) to the present economic situation, there are many positive movements: open up many investment opportunities, increased income that may fuel the increase of housing demand for the people. Thus, the development of the real estate business is inevitable. However, due to the profit of this relatively high field has attracted other businesses, encourage enterprises to strengthen the business, expanding the scale of their activities, from which form the virtual rush for real estate market and "real estate bubble" is inevitable. Accompanied by the recent economic crisis together with the Government's policy to curb inflation as rising public investment, monetary policy, restricting loans Africa produced caused for businesses not less difficult, challenge. The biggest challenge is the stiff competition of the market economy, with the more powerful opponents of capital, technology, wiser than in the use of capital, the way management. In terms of such stiff competition, how to maintain the effectiveness of business

activity, create profits for the business. This is a natural question for the study of the real estate industry.

This paper is constructed into 5 parts. First part is the introduction. Second part illustrates the literature reviews on the firms' financial performance studies. Methodology is presented in the third part. Fourth part shows the findings. Conclusion and recommendations regarding to the the factors affecting on the financial performance of firms will be on the last part.

II. LITERATURE REVIEW

To determine the factors that influence performance of firms, Bala&Matthew (2005) suggest that performance of firms can be explained by various characteristics that could be firm specific or and industry specific. Consequently, certain factors are likely to either improve or impair a firm performance. Therefore, emphasis of firms performance cannot be over looked to a reasonable extent since the performance of firms could be and are most often used as yardstick or benchmark as well as comparison measures to know if the motives behind the establishment of these firms have been achieved or not.

Furthermore, performance has been explained by Sabine and Michael (1990), to be a multi-dimensional conception. It is also seen to be a complex trend and this has consequently increased the studying of firm performance and its determinants worldwide. In particular, Andreas (2010) suggested that determinants of firm's performance are measured as a well addressed research topic in the field of Industrial organization however, there seems to be no consensus as to the actual proxy and measurement of firms' performance.

Particularly, firm's performances over time have been measured differently by researchers' fewer than three major groupings: profitability ratios, growth rates and margins.

According to given measurement, Kemp et al., (2003) concluded that performance can be defined and measured in several ways depending on the objectives and context of the research.

Recently, the use of model financial ratios as performance yardstick are best tool because they concern some degree of market risk and create more value as against classical financial ratios that provide information of firms' past performance (Kolawole, 2013 and Yana, 2010). Thus, the modern financial ratios are regarded more useful when compared to the classical financial ratios. In particular, the return on assets, return on equity and return of security are considered and seen to be more efficient in determining the financial performance of a firm. Wilson (2015) studied the role of capital market in the transformation of Rwanda economy. By using the data from firms listed at the Rwanda Stock Exchange (RSE) he state the importance of the steady increase in capital both for firms and for economic growth. The study concluded that there are still only few listed companies and a slow growth of the stock market. It is recommended a study on effect of capital structure and corporate governance on performance of firms listed at the RSE as he concluded that listed company financing decisions were identified involving a wide range of policy issues and such decisions were affecting capital structure, corporate governance and profitability of firms.

In addition, Sritharan and Vinasithamby (2014) investigated the determinants of capital structure a study of listed banks finance & insurance companies in Colombo Stock Exchange in Sri Lanka. The corporate finance pattern of the company is vital significance for the financial well being of companies in any sector. Corporate finance decisions affect the various areas of corporate management, which determine the wealth of investors. Public sector of Sri Lankan corporate finance decisions accomplishments influences not only the

financial soundness of the considered private equity but also the financial health of the nation as a whole, while these are primarily public investment decisions of the government and a number of Sri – Lankan Government agencies are involved in the process.

Surroca et al., (2010) suggested that there is a positive relationship between financial performance and Corporate Social Performance supporting the theory that slack resource availability and Corporate Social Performance are positively related. Corporate Social Performance is also positively associated with future financial performance meaning that the good management and Corporate Social Performance are positively associated.

Most of studies have been conducted to investigate determinants of financial performance of firms. For example, a study was conducted by Adediran and Alade (2013) to build up the relationship between dividend policy and corporate profitability, Mwangi et al., (2014) studied the relationship between capital structure and financial performance on non-financial companies listed in the Bairobi Securities Exchange, Vintila and Nenu (2015) investigated the effect of transparency and disclosure in reporting on financial performance of Bucharest Stock Exchange. No study has conducted on the aquacultural sector, especially for the Mekong Delta of Viet Nam. It is very meaningful to conduct this study tries to give the real finding for the policy markers and academic researchers.

III. METHODOLOGY

3.1. Data collection

Data used in the model were collected from the financial statements of the real estate business are listed on Vietnam's stock market. Metric analysis of the general economy, the real estate industry was author taken from the Vietnam General

Statistics Office (GSO), the General Department of population, family planning State Bank (SBV), the Ministry of Finance (MOF), the World Bank (WB) The International Monetary Fund, (IMF), the Asian Development Bank (ADB), the World Economic Forum (WEF), the Center predicts the level of competitiveness (PCI)

3.2. Data analysis and presentation

Descriptive statistics was used to perform data analysis. The mean scores were used to rate the factors in order of their importance. Stata was used to produce frequencies, descriptive and inferential statistics which were used to obtain conclusions and generalization regarding the population.

A multiple linear regression model was used to link the independent variables to the dependent variable as follows

$$Y_i = b_0 + b_1X_1 + b_2X_2 + b_3X_3 + \dots + b_kX_k$$

Where:

Y_i = financial performance of the firms

B_i = Estimate coefficients

X_k = Independent variables that are expected to affect on the financial performance of the firms.

Dependent variable Y_i is measured as return on equity (ROE); and return after tax to assets (ROA). The independent variables can be defined as:

X1: Debt ratio of firm i.

X2: Bank loan to total debt.

X3: Fixed asset to total asset.

X4: Stock capital to total equity.

X5: Inventory to total assets

X6: Sale and management cost to total cost

X7: Gender of the manager.

X8: Total assets increased growth.

X9: The time operations of the business

Table 1. Variable measurement

Tên biến	Type	Measurement
Financial performance	Y	ROA ROE
Debt ratio of firm	X1	The percentage debt of the firms
Bank loan to total debt	X2	The ratio of bank loan to total debt of firm
Fixed asset to total asset	X3	Fixed asset to total asset
Stock capital to total equity	X4	The stock total capital divide total equity
Inventory to total assets	X5	Total inventory divide total assets
Sale and management cost to total cost	X6	Total sale and management costs divide total costs of the firms
Gender of the manager	X7	Dummy variable: 1 for male and 0 for the female
Total assets increased growth	X8	The growth rate of total assets
Firm's age	X9	The time operations of the business

IV. RESULTS AND DISCUSSIONS

4.1. Characteristics of the aquaculture firms

To conduct the analysis of the factors affecting the performance of the real estate business currently listed on Vietnam's stock market, the subject of using secondary data taken from the financial statements, prospectus, annual report of the real estate business. Due to data obtained in 3 years of economic volatility, politics has influenced more or less to the operation of the business in the year, so the figures in the subject to be adjusted to limit the disproportionate elements over the years by taking an average of 3 years.

Table 1: The summary statistics of the variables

Items	ROE	ROA	X1	X2	X3	X4	X5	X6	X7	X8	X9
Average	8.79	3.970	142.52	42.14	13.89	2.45	33.89	59.26	0.90	28.01	12.72
Maximum	31.31	16.03	546.58	97.07	59.92	25.50	88.65	95.83	1.00	535.47	33.00
Minimum	-18.44	-3.42	4.80	0.00	0.24	0.00	0.00	22.28	0.00	-18.92	5.00
Standard Deviation	9.16	3.72	108.71	25.23	14.82	4.75	25.88	18.74	0.31	71.70	7.18
Observation	58	58	58	58	58	58	58	58	58	58	58

Sources: Calculation by the author

4.2. Determinants of financial performance of real estates firms listed on the Vietnamese Stock Exchange.

The factors affecting on the financial performance of real estate firms representing by ROA, and ROE, were depicted in table 2.

Table 2. Determinants of ROA, ROE, ROS

Independent variables	Variables	ROA	ROE
Constant	C	2.258	1.510
Total debt/Total equity	X1	0.023***	0.001
Total loan/Total Debt	X2	-0.124***	-0.050***
Fixed Assets/Total Assets	X3	-0.241***	-0.070**
Stock Capital/Total Equity	X4	0.511**	0.200*
Inventory/Total Assets	X5	-0.039	0.001
Sale+Management Cost/Total Costs	X6	0.072	0.050**
Gender of manager	X7	3.659	0.910
The growth rate of total assets	X	0.001	0.001
Firm's age	X9	0.339**	0.150***
R squared		0.570	0.590
Durbin Watson Test		2.020	2.000
Sig F		6.940	7.520
Probability		0.000	0.000

Source: The calculation outcomes from the survey data

Notes: *, **, ***: Significant at 10%, 5% and 1%

Statistical value Prob (F) in both models are very small is 0.0000 shows Safety refuted the hypothesis Ho, means a linear relationship exists between the performance of the real estate business (measured by the ratio of profit on equity (ROE) and the rate of profit/total assets ROA) with at least one of the independent variable is the factor, so linear regression models are given consistent with the data.

Coefficient of determination R2 in these two models is 57% ROE and ROA 59% is reasonable, this index shows the General upheaval of the influence factors explain about 57% and 59% of performance-business property corresponds to the two only target ROE and ROA. Regression model part no measurable here is about 43% of the dependent variables with respect to ROE and 41% for target ROA is the other important impact factor to the performance of the business but because of not being should not be included into the regression model. Such as the Land Fund, effective leadership levels, the number of investment projects, the situation of

fluctuations of the economy, the policies of the Government will impact the performance of the business in a significant way.

In all 9 variables are put into the model, there are five variables to explain the level of influence the performance of the real estate business through variables depends in varying meaning ROE from 1% to 5% , which is the total debt/total equity (X1), total debt/total loans (X 2), fixed assets/total assets (X 3), stock capital/total capital stock (X4), and the operating time of the business (X9). For the dependent variable is the ROA, the results showed that there are 5 variables affecting this indicator according to the different dimension and with the levels of meaning from 1% to 5%, including the variables Of the loan/total debt (X 2), fixed assets/total assets (X3) , Stock capital/total capital stock (X4), (cost of sale + cost of business management)/total cost (X6) and time of operation of the business (X9).

The remaining variables inventory/total assets (X5), the gender of manager (X7) and the growth rate of total assets (X8) almost does not affect the performance of these businesses. The specific result of each variable is as follows: the first Variable that can affect the performance of the enterprise's total debt/total equity and only positive effects for the target ROE with 1% significance level, no statistical significance for the ROA. This means that if the business has a high debt rate than home equity owns the operation would be more effective. However, the debt business should strengthen those are about less pressure charged interest, charged as root capital misappropriation, long-term bonds, because if the use of a bank loan debt ratio is high, the pressure to pay interest the original, larger businesses will work harder. According to the results from the model, estimated values are 0.02 means when the ratio of debt/equity increases 1% then the ROE will increase 0.02%. This result is contrary to the results of Arsov (2008).

The next variable that can affect the performance of the business's total debt loans/total debt in both ROE and ROA with the level of significance of 1%, Indebtedness of the business loans, particularly loans in Bank debts are currently affecting results business enterprises, at present in the enterprise especially real estate businesses have very high debt loans rate, adding that the real estate situation due to the freeze has affected many of the business activity of enterprises making profits of low business impact the performance of the business, according to the results of the model, the estimated value for the ROE is -0.12 and for ROA is -0.05, which means when the debt ratio debt/total loans of enterprises increased 1% 0.12% and reduced the ROE ROA will rising 0.05% respectively. This means that businesses need should limit loan debt to ensure more effective operations.

The rate of fixed assets / total assets affect corporate performance in both ROE and ROA in the corresponding significance level of 1% and 5%. The rate of fixed assets is too high in the real estate business during the estate freeze will cause difficulties for the operation of the business, making the ROA as ROE is reduced. In particular, the estimated value for the ROE is 0.24-this means that when the ratio of fixed assets/total assets increased 1%, the ROE of the business will drop 0.24 percent respectively. Similarly, the estimated value of this indicator of the ROA is -0.07 means the ratio of fixed assets/total assets increased 1%, then the 0.07% decrease in ROA. From this fact, enterprises must try more in the use of fixed assets, the lower this rate measures the search down by reducing the amount of fixed assets or increases the value of the assets of the business.

Similar criteria of fixed assets/total assets, the rate of stock funds/total equity also positively influence the performance of the business in the respective significance level was 5% in both ROE and ROA. According to the results from the model, the value of this variable estimates for target ROE is

0.51 This means business with buy about 1% of the amount of shares/total equity would increase the ROE of the business is 0.51%; with respect to the target value is 0.20 which are explained as the rate increased 1% in the rate of stock funds/total equity, the ROA of the business will increase to 0.20%.

The next variables also affect operational efficiency is the ratio of cost of sales and management costs/total cost activist however, this variable is only meaningful with the target ROA with the meaning is 5%. Estimated value is 0.05, does this mean the ratio of cost of sales and business management increased 1% the performance of enterprises is 0.05 respectively would increase the ROA%. This makes sense if the investment business who sewed many sales and manage the sales of real estate will be more easier, higher profits for the business.

The last meaningful variable is the operating time of the business, this variable also has a positive meaning in both ROE and ROA with the corresponding significance level was 5% and 1%. As for the ROE, estimate values for this indicator is 0.34 means when operating time increased to 1 year, the return on equity would rise respectively is 0.34% copper. Similarly, for this value is 0.15 which are explained with the operating time of the business increased to 1 year then the ROA will increase 0.15% respectively. This implies that, as firm grows in age, it should be able to understand its strength, weaknesses, threats and opportunity. Consequently, such firm is expected to work on its opportunities to do better. The result from this study is supported by the study of Erasmus (2013), but this result contradicts the works of Sumit (1997); Alex et al (2006) whose studies reported a negative significant impact on return on assets. Even though, they have studied a larger number of firms, different domain but almost the same time period. The finding of a negative significant impact of age on return on assets by the above studies confirms the assumption that firm

deteriorates as it grows older. That is, firm declines in its performance as it grows older as it is unable to solve collective action problem (Claudio and Urs, 2009). This assertion is further explained that why some firms will do better and improve their ROA as they age, others might not survive the future hence; they will go out of existence.

In addition, the relationship between firm age and ROA is showed. The result reveals that firm age has a positive significant impact on return on assets which meets our normal expectation. This implies that, as firm grows in age, it should be able to understand its strength, weaknesses, threats and opportunity. Consequently, such firm is expected to work on its opportunities to do better. The result from this study is supported by the study of Erasmus (2013), but this result contradicts the works of Sumit (1997); Alex et al (2006) whose studies reported a negative significant impact on return on assets. Even though, they have studied a larger number of firms, different domain but almost the same time period. The finding of a negative significant impact of age on return on assets by the above studies confirms the assumption that firm deteriorates as it grows older. That is, firm declines in its performance as it grows older as it is unable to solve collective action problem (Claudio and Urs, 2009). This assertion is further explained that why some firms will do better and improve their ROA as they age, others might not survive the future hence; they will go out of existence.

V. CONCLUSIONS AND APPLICATIONS

5.1. Conclusions

This paper aims at investigate the determinants of financial performance of shrimp processing firms in Mekong Delta. The financial performance is influenced by a variety of factors, but in practice we can take into account only some of them, for which researchers attempted to determine the extent to which

these variables explain the change of financial performance indicators. Topic models using multivariate linear regression using ordinary least squares method (OLS) to estimate the factors affecting the performance of 58 real estate business is trading on Ho Chi Minh and Ha Noi stock Exchange through two indicators is return on equity (ROE) and return on assets (ROA). The result shows that the performance of the real estate business is affected by the ratio of loans / total debt, ratio of fixed assets / total assets, the ratio of fund shares / total equity, cost ratio for sales and business management and uptime of business. From the results of the subject has also proposed a number of measures to improve the performance of the real estate business in the current period

5.2. Implications

Regarding to the findings, possible implications related to the independent variables need to be taken into account. Firstly, The State Bank has a credit policy to give preferential interest loans for low income housing projects, housing budget segment. Is restructuring the debt, adjusted reduced interest loans for real estate credits have high loan interest rate previously; look, new lending continues to complete corporate projects, complete products, maintaining and recovering production step by step

Secondly, it is expected that debt should increase performance. If debt has not increased financial performance, it means firms have engaged in unprofitable ventures using debt or leverage was considered as extra way to raise funds without considering the cost of capital in comparison with the investment. The pecking order pattern in the financial decision-making is found to be a proper capital structure strategy given a transition capital market environment, stimulating growth of the shrimp processing firms. As this study considers only the financial performance of the shrimp processing firms it would be interesting to investigate financial decisions for the entire certain sector including small-holders in order to more

specifically analyse the asymmetries in the capital and credit market. The possible policy implication should be that only profitable projects should be encouraged otherwise, all benefits would accrue to the provider of capital who must always be settled at the due date for repayment of debt.

In short, the proposed policies for the paper are related and built on the stakeholders' theory as pioneered by Freeman (1984) and used in the study that all variables mentioned in the research work must be considered and maximized by agents and managers of the firms to meet the expectations of all groups that have a stake directly or indirectly in the financial performance of the firms.

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