

DO WOMEN ON BOARD, RISK MANAGEMENT, INVESTMENT IN NON-CORE BUSINESS AND STRATEGIC CHOICES AFFECT EARNING PERSISTENCE? - CASE IN INDONESIA

by Hasnawati , Etty Murwaningsari Harti Budi Yanti, Suhendar

Submission date: 13-Sep-2023 10:23AM (UTC+0700)

Submission ID: 2164711058

File name: 7admin,_hssr.2019.7483_pp634-643.pdf (527.31K)

Word count: 6919

Character count: 39123

DO WOMEN ON BOARD, RISK MANAGEMENT, INVESTMENT IN NON-CORE BUSINESS AND STRATEGIC CHOICES AFFECT EARNING PERSISTENCE? - CASE IN INDONESIA

53 Hasnawati^{1*}, Ety Murwaningsari², Harti Budi Yanti³, Suhendar⁴

^{1,2,3}Accounting Department, Faculty of Economics and Business, Trisakti University, Jakarta, Indonesia, ⁴Accounting Department, Faculty of Economic and Islamic Business, The State Islamic Institute of Raden Intan Lampung, Indonesia.
Email: ^{1*}hasnawati@trisakti.ac.id, ²etty_nasser@yahoo.com, ³hartigunawan@gmail.com, ⁴suhendar@radenintan.ac.id

Article History: Received on 25th July 2019, Revised on 31st August 2019, Published on 27th September 2019

Abstract

Purpose of the study: The objectives of this research are (a) to determine association of gender diversity on boards of commissioners and boards of directors, risk management and infrastructure investment in non-core business to earnings persistence; (b) to find out whether strategy choices could moderate association of gender diversity of the board of commissioners and board of directors, risk management and infrastructure investment in non-core business to earnings persistence.

Methodology: This research used multiple regression with five years of observation (2011-2015) and used IBM SPSS statistic version 22 to test the hypotheses. The sampling technique was purposive sampling. The results obtained 79 companies from the selection that met the criteria and hence, the total observations are 395 samples.

Findings: This research found that gender diversity on board of directors had a positive effect on earning persistence and investment in non-core business had a negative impact on earning persistence. On the other hand, there was no direct effect of diversity gender on board of commissioners and risk management to earning persistence. However, when gender diversity on board of commissioners combined with the type of prospector strategy, it had a positive effect on earnings persistence, so did risk management.

Novelty/Originality: This study has a practical contribution to shareholders, investors, board, and academics. This paper underlines that women should be courageous to take part in the business either as a board of commissioners or directors, and the company should provide wider opportunities for women. An investor should carefully with the companies' strategic choice. This study also has an empirical contribution to filling the literature gap of factors that influence the earnings persistence beyond financial factors. There are limited researches that examined earning persistence, which includes risk management, investment in non-core business infrastructure and strategy as variables.

Keywords: Gender Diversity, Board, Risk Management, Investment in Non-core Business, Strategy, Earning Persistence.

INTRODUCTION

Earning Persistence is a profit that can be used to predict future earnings. Sustained earnings persistence is expressed as a profit that has high quality; On the contrary, if the company has an unusual profit, then it means that it has a poor quality of earning (Penman & Zhang, 2002). Persistence of earnings is more informative than earnings, because if earnings were less persistent, then they would be less informative (Tucker & Zarowin, 2006). Higher quality earnings provide more information about the features of a firm's financial performance that is relevant to a specific decision made by a specific decision-maker (SFAC No. 1). Kormendi and Lumsdaine (1987) examined whether the magnitude of unexpected earnings effects of the stock return correlated (positively) with the present value of the expected future earnings revisions. It was obtained from the univariate time series model. By applying the valuation implications of the time-series properties of earnings, they found a new dimension to the information content of earnings but found no evidence that the stock return reaction to unexpected earnings excessively fluctuates. Tucker and Zarowin (2006) found that the change in the current stock price of higher-smoothing firms contains more information about their future earnings than does the change in the stock price of lower-smoothing firms.

A study in Malaysia (Al-Dhamari & Ismail, 2013) examined the relationship of corporate governance structures to earning predictability. This study showed that the ability to predict high earnings existed in companies with a small number of boards, independent chairperson, and high institutional share ownership. However, the independent board had a significant negative effect on earnings predictability. The results also showed that investors did not consider independent audit committees, but the active audit committees, audit committee competence, and high management share ownership as a good indicator of earning with high predictable values.

Board characteristics could also be seen from the variations of attributes owned by the board of directors. The existence of gender diversity on board of commissioners and directors can be interpreted as a mix of diverse individuals between individual members of commissioners and directors who are associated with decision-making and other management within the board of commissioners. Gender diversity is expected to color the decisions taken by the council. A study by Robinson and Dechant (1997) found that diversity provided an efficient solution to complex problems. He suggested that different perspectives would emerge from diversity, allowing decision makers to consider more perspectives and learn more carefully.

Hili and Affles' (2012) study in France did not find any significant differences among companies that had female and male directors. Krishnan and Parsons (2008) found that companies with high gender diversity reported more conservative earnings than low-diversity firms. The results also showed a negative relationship between income smoothing, avoidance to suffer loss and gender diversity, but had a significant positive relationship with earnings persistence. How companies manage risks is also one of the factors that could certainly affect the company to create earnings and maintain achievement. Thomya (2016) found that there was a positive relationship between the existence of the risk management committee and the earnings persistence, but there was no relationship between the existences of risk management committees with timely loss recognition.

In order to create earnings, some companies invest infrastructure beyond their core business. They expect that investment outside of their core business can increase the company's earnings. Benkraiem (2016) found that core and non-core earnings of the current year on SMEs in France could predict next year's performance. However, only the current year earnings persistence from core business was responded by the stock market.

Profit earned by the company is also influenced by the implemented strategy. There are varieties of business theories; one of the famous strategic theories is created by Porter (1980) that divides business strategy into cost leadership and differentiation. It was found that companies with cost leadership strategies were more eager to implement enterprise risk management (ERM) than the companies implemented differentiation strategies. The results also showed that ERM implementation had a significant positive impact on company performance. Although ERM was a partial mediator of the relationship between cost leadership strategy and firm performance, ERM does not mediate the relationship between differentiation strategy and firm performance (Soltanizadeh, 2016).

Ajay and Madhumathi (2015) found that multinational companies with diversified products had lower levels of leverage than firms that focus on their capital structure. Asset-based earnings management has a positive effect on the diversification (market/product) of the company. It was also found that earnings management with discretionary expenditure (project-based) spending was found to be higher for a diversified market than a product-focused company. The method of income smoothing was found in many companies that focus on capital structure. Houque et al. (2013) found that defensive strategy was associated with higher levels of earnings management and a prospector strategy related to accounting conservatism. Gan and Evans (2015) found that higher earnings persistence relates to companies with a strategic orientation that links to the drivers of corporate social responsibility.

Research factors that influence earnings persistence generally used financial variables as a predictor (Yassin et al., 2016). Little research discussed women on board, how they manage financial risks in their companies and investment decisions outside of core business. We want to fill this research gap. In Indonesia, women already had started to get a chance to have the highest position in the company. The combination of gender and competence and supported by the right strategy is expected to affect the success of the company to generate profit. In addition, many companies have also realized the importance of managing risk and investing outside the core business as part of the strategy to improve their earnings quality.

The objectives of this research are (a) to find out whether gender diversity on board of commissioners and board of directors, risk management and investment in non-core business influence earnings persistence, (b) to find out whether strategy choice can moderate the correlation of gender diversity on board and risk management with earnings persistence. This research is expected to provide practical and empirical contribution. Based on the practical aspect, this research information is expected to assist investors in making investment decisions, especially related to the existence of women on board of commissioners and directors in influencing earnings persistence besides impact of risk management and strategic choices. In addition to practical contributions, it is expected that this study also contribute empirically by filling the literature gap associated with predictor variables of earnings persistence.

LITERATURE REVIEW

Gender, Earnings Persistence, and Business Strategy

The agency theory (Jensen & Meckling, 1976) states that there would be a conflict of interest between the principal and the agent in the company operation, resulting in information asymmetry. Therefore, a strong mechanism in the management of the company is needed to reduce the level of asymmetry information or in other words improve the reported earnings quality. The earnings quality can be seen from the persistence of the company's earnings. According to Scott (2015), earnings' persistence is the expected future earnings' earnings implied by earnings innovations in the current year, so that earnings persistence is seen from the current earnings innovations associated with changes in stock prices. Profits are considered increasingly persistent, if the coefficient of variation is smaller. Penman and Zhang (2002) define earnings' persistence as a revision in expected future earnings (earnings' earnings) due to earnings innovation (current earnings).

The existence of women on board of commissioners and directors indicates that the company provides equal opportunities for everyone without any discrimination. Women are considered to have a very high caution attitude, tend to avoid risks, and more thoroughly than men so that it will reveal more information to shareholders (Wagland and Taylor, 2009). Compared to men who have a greater obligation in terms of material achievement is more likely to be a far more opportunistic act than women. Krishnan and Park (2005) argue that the presence of women in the board of the company is an honor for women, because women are considered difficult to obtain seats in commissioners and directors where they have to face various challenges. A study by Robinson and Dechant (1997) found that diversity provides an efficient solution to complex problems.

Krishnan and Parsons (2008) research found that firms with high gender diversity reported more conservative earnings than low-diversity firms. This study also showed a negative relationship between income smoothing, avoidance of loss tendency with gender diversity in the management, as well as a significant positive relationship with earnings persistence. Based on this it can be derived hypothesis:

H1: The gender diversity on board of commissioners positively influence earnings persistence

H2: The gender diversity on board of directors positively influences earnings persistence

and Afles (2012) research did not show a significant difference among companies with female and male directors. Krishnan and Parsons (2008) investigated the relationship between earnings quality and the proportion of senior women managers in the context of the United States. They use six measures of earnings quality: asymmetric timeliness and conservatism, earning skewness, accrual-based measure of conservatism, smoothness, avoidance of loss tendency and persistence. The study found that firms with high gender diversity reported more conservative earnings than low-diversity firms. The results also show a negative relationship between income smoothing, loss avoidance tendency with gender management diversity, and a significant positive relationship with earnings persistence.

The nature of men and women in taking risks would usually affect the decision-making and strategy model to be taken if the person occupies the top management position or as a supervisor within the company. The chosen strategy certainly can strengthen or weaken gender relations with earnings persistence. Soltanizadeh (2016) found that firms with cost leadership strategies were more eager to implement enterprise risk management (ERM) than companies with differentiation strategies. Houque et al. (2013) found that defensive strategy is associated with higher levels of earnings management and prospector strategies related accounting conservatism. However, the relationship between business strategy and earnings quality changed during periods of high and low economic growth. Hogan and Evans (2015) conclude that higher earnings persistence deals with companies with a strategic orientation that links to the drivers of corporate social responsibility. Based on this it can be derived hypothesis:

H3: Business strategy moderates the correlation between gender diversity on board of commissioners and earnings persistence

H4: Business strategy moderates the correlation between gender diversity on the board of directors and earnings persistence.

Risk Management, Earnings Persistence, and Business Strategy

Risk management is a major part of an organization's strategic management. Organizations will attempt to address the risks that accompany their activities in a systematic manner, with an aim to achieve sustainable benefits in every activity and the entire portfolio of all activities. A good risk management focus is the identification and management of these risks.

One of the most crucial risks to manage is a financial risk. If the company fails to manage financial risks, then it can be predicted that the company will experience big losses, resulting in the dramatic decline of corporate profits. Thomya (2016) found that there is a positive relationship between the existence of the risk management committee and earnings persistence, but there is no relationship between the existence of the risk management committee and the recognition of the loss in a timely manner. From here, the hypothesis is derived as follows:

H5: Risk management positively affects earnings persistence

Risk management combined with the right strategy can make corporate profits stable also increase. According to Porter (1980) strategy is a tool to achieve competitive advantage, whereas according to Barney (2008), strategy is a resource allocation pattern that enables organizations to maintain their performance. The right strategy choice will create the best performance for the organization. Soltanizadeh (2016) found that companies with cost leadership business strategies are more eager to implement enterprise risk management (ERM) than companies with differentiation strategies. The results also show that ERM implementation has a significant positive impact on company performance. Although ERM is a partial mediator of relationship between cost leadership strategy and firm performance, it turns out ERM does not mediate the relationship between differentiation strategy and firm performance.

Ajay and Madhumathi (2015) studies on multinational corporations found that firms with diversified strategies had lower levels of leverage than firms that focused on their capital structure. Asset-based earnings management has a positive effect on the diversification (market/product) of the company. It was also found that earnings management with discretionary expenditures (project-based) spending was found to be higher for a diversified market than a product-focused company.

Houque et al. (2013) found that defensive strategy is associated with high levels of earnings management and prospector strategy related accounting conservatism. However, the relationship between business strategy and earnings quality changed during periods of high and low economic growth. From here, it is derived hypothesis as follows:

H6: Business strategies moderate the relationship between risk management and earnings persistence

Non-Core Investment and Earnings Persistence

In many financial management literatures, there is a famous jargon that is "Do not put all your eggs in one basket". This jargon suggests that companies diversify their businesses to minimize risk. If one of the business segments suffers losses, it can still be covered by profit from other segments. Firms that take risks usually dare to invest in infrastructure beyond their core business. It is expected that with this additional investment, the company's profits will also increase. However, investing outside the core business can also be detrimental to the company because there is a risk the company failed to manage the investment due to lack of knowledge and sufficient ability to manage the business in the field that is not cultivated. This failure can drag down the overall profit decline. Benkraiem (2016) research in France shows that core and non-core earnings of the current year were able to use to predict next year's performance. However, only the core earnings persistence of the current year is responded by the stock market. From here can be derived hypothesis as follows:

H7: Investments in non-core businesses affect earnings persistence

METHODOLOGY

This study is a causality study to determine whether board diversity, risk management, and infrastructure investment in non-core businesses have an influence on earnings persistence. This type of research data was pooling (panel) data. The population is a manufacturing company listed on Indonesia Stock Exchange (BEI). The sample in this research was selected by purposive sampling in the period from 2013 to 2015.

Variables and Measurement

This study has four independent variables, namely, board of commissioner's diversity, board of directors' diversity, risk management, and non-core investment. Board of commissioner diversity was measured by the proportion of female commissioners to total members of the board of commissioner. Diversity of the board of directors was measured by the proportion of the female board of directors to the total members of the board of director. Risk management was measured using content analysis. The company that did not provide any information regarding financial risk management will be scored 0; the company that did not complete disclosed items of financial risk will be scored 1 and if the company disclosed all items of financial risk (very complete) will be scored 2. Non-core investments were measured using content analysis. If a company did not provide any information about infrastructure investment outside the core business, it was scored 0; Score 1, if the company disclosed infrastructure investments outside the core business incompletely. Score 2, if the company disclosed in detail the infrastructure investment outside the core business.

dependent variable in this research is earnings persistence measured by using model Kormendi and Lipe (1987). Earnings persistence was measured by using the regression coefficient between accounting earnings in the current period with accounting earnings last period. The formula is below:

$$X_{it} = \alpha + \beta X_{it-1} + \varepsilon_{it}$$

where X_{it} = earning of i 's company in year t , α = constant, X_{it-1} = earning of i 's company in year $t-1$ and β = coefficient of regression (earnings persistence).

The moderating variable in this research was business strategy, which was divided into prospector, analyzer, and defender (Miles and Snow, 1978). The companies that used the defender type would be given a score of 1, the analyzer type was given a score 2 and the type of prospector was scored 3. Business strategy variables adopted the measurement methods that were used in Hill and Snell (1988), Inttner et al. (1997), Bentley et al. (2011), and Houge (2013).

This variable was proxied with composite scores using a composite strategy measure consisting of (1) Ratio of Research and Development to Sales (RDS): ratio of research and development expenditure (XRD) divided sales (SALE); (2) Ratio of employee to sales (EMPS): ratio of number of employees (EMP) divided by sales (SALE); (3) Change in total equity: sales changes a year ago averaged over 5 years; (4) Employee turnover (σ (EMP): standard deviation of total number of employees (EMP); (5) Marketing to sales (SGAS): sales cost, administration and general (SGA) ratio to total sales (SALE); (6) Capital intensity (CAP): capital intensity is calculated by net PPE divided by total assets (PPE / TA).

The six values of the ratios were calculated on average over the previous five year period, then ranked by quintile, the highest quintile would be given value of 5, the quintile in the next position was assigned a value of 4, and so on (except for Capital Intensity (CAP), using reverse order). Then the value of each company for six sizes annually was summed, so the maximum value is 30 (a type of prospector strategy) and the minimum value is 6 (a type of defender strategy). As Bentley et al. (2011), the company was categorized as follows:

Defender if the average firm rank for 6 variable were at the lowest quintile (1 or 2), or had a total score ranging from 6 to 12. Prospector if the average firm rank for six variables was at the highest quintile (worth 5 or 4). Thus, companies that had total score in the range from 24 to maximum 30 are prospective companies. The analyzer had total score outside the above-mentioned range, which has a total score of 13-23 range. The company's strategy variable was measured using the dummy variable, i.e., 1 for the defender, 2 for the analyzer, and 3 for the prospector.

Population and Sampling

The population in this study was a manufacturing company listed in the Indonesia Stock Exchange (BEI) for the period 2013 to 2015. The sample was selected using purposive sampling method. The sampling criteria in this study are: Manufacturing companies listed in Indonesia Stock Exchange (IDX) for the period 2011-2015; Companies issuing financial statements for 2011-2015; the company earned profit during 2011-2015; the companies did not conduct merge, acquisition and other business changes. Based on these criteria then found 79 samples that meet the requirements. Since the observations were conducted for five consecutive years therefore total observations were totaled 395.

Table 1: Samples Selection

Description	Number
Manufacturing companies listed in Indonesia Stock Exchange (IDX) for the period 2011-2015	154
Manufacturing companies that do not include samples:	
1. Manufacturing companies did not issue financial statements as of December 31, 2011-2015	(6)
2. Manufacturing companies did not publish financial statements and annual reports completely for 2011-2015	(25)
3. Manufacturing companies that conducted mergers and acquisitions during 2011-2015	(44)
Manufacturing companies that met the criteria	79

Research Models

This study used two regression equations as follows:

$$PL = a + b_1.Dekom + b_2.Dir + b_3.RM + b_4.Invest + e \dots\dots\dots (1)$$

$$PL = a + b_1.Dekom + b_2.Dir + b_3.RM + b_4.Invest + b_5.Defender + b_6.Analyzer + b_7.Prospector + b_8.Dekom*Defender + b_9.Dekom*Analyzer + b_{10}.Dekom.Prospector + b_{11}.Dir*Defender + b_{12}.Dir*Analyzer + b_{13}.Dir*Prospector + b_{14}.RM*Defender + b_{15}.RM*Analyzer + b_{16}.RM*Prospector + e \dots\dots\dots (2)$$

where PL = Earning Persistence, DEKOM = Board of Commissioners' Diversity, DIR = Board of Directors Diversity, RM = Risk Management, INVEST = Investment in non-core business, Defender = Defender Business Strategy, Analyzer = Analyzer Business Strategy, Prospector = Prospector Business Strategy, e = Error term

RESULTS AND DISCUSSION

Descriptive Statistic and Matrix Correlations

Table 2: Descriptive Statistic

Descriptive Statistics	Women on Board of Commissioner	Women Board of Directors	Earnings Persistence
Mean	0.0936	0.11096	2.903389
Standard Deviation	0.16185	0.151438	27.2639577
Minimum	0.00	0.00	-358.7132
Maximum	0.67	0.667	180.3667

Table 2 shows that there are still few companies hired women for commissioners and directors positions. On average, the company only employs 9.36% women commissioners and 11.096% women directors. Maximum of a company employs 67% women commissioners and 66.7% women directors. Majority companies are choosing boards of commissioners and directors consisting entirely of men. From table 2 it can also be seen the average value of earnings persistence (beta coefficient) of 2.903389, minimum of -358,7132, maximum 180.3667 with standard deviation of 27.2639577.

Table 3: Table of Frequency of Risk Management

Risk Management Disclosure	Frequency	Percentage
None	88	22.3
Middle	81	20.5
Detail	226	57.2
Total	395	100.0

Table 3 shows the frequency of risk management. A total of 88 samples (22.3%) did not provide any information about their risk management, 81 samples (20.5%) revealed incompletely. More than half of samples revealed with complete risk management that they did 226 samples (57.2%).

Table 4: Frequency of Non-Core Business Infrastructure Investment

Disclosure of Investment in Non-Core Business	Frequency	Percentage
None	227	57.5
Middle	111	28.1
Detail	57	14.4
	395	100.0

Table 4 shows the number of companies invested in infrastructure in their non-core businesses. More than half of the sample did not disclose whether they invested infrastructure beyond the core business of 227 (57.5), 111 (28.1) revealed but not detailed and 57 (14.4%) provided detailed information.

Table 5: Frequency of Strategy Choice

Strategic Choice	Frequency	Percentage
Defender	80	20.3
Analyzer	235	59.4
Prospector	80	20.3
Total	395	100.0

Table 5 shows the type of strategy selected by the sample company. As many as 80 (20.3%) chose defensive strategies, equal to the number of samples that selected the prospector strategy. More than half or 235 companies (59.4%) choose strategy analyzer.

Hypotheses Results

In order to test the hypothesis, we used SPSS version 22. Before hypothesis testing, we already conducted normality and classical assumption tests, which include autocorrelation, multi-collinearity and hetero-skedasticity tests. At the first test, the data did not pass the normality test so the data was transformed by a combination of quadratic and inverse methods. Once transformed the data and then data retested and successfully passed the normality test and the classical assumption tests. Here are the results of hypothesis testing using model 1, which examines the direct relationship of all independent

variables (Gender Diversity of Board of Commissioners, Gender Diversity of Board of Directors, Risk Management, and Non-Core Investment), toward dependent variable (earning persistence).

Table 6: Model 1

Variable	Prediksi	Koefisien	p-value
a		.587	.184
Dekom	+	-.160	.056
Direksi	+	.227	.014 **
Risk Management	+	.387	.217
Investasi	No sign	-.476	.082*
F - test			.011
R ²			.033
Adjusted R ²			.023
Durbin Watson			1.955

Note: Dependent variable: earning persistence ** significant at 5 percent; * significant at 10%

Dekom = Board of Commissioners' Diversity, DIR = Board of Directors Diversity, RM = Risk Management, Invest = Investment in non-core business

Table 6 shows the test results for model 1. This result showed the adjusted value of R² of 0.023, which means the ability of variable independents (women commissioner board, women director, risk management, and infrastructure investment in non-core business) were able to explain earning persistence variance only 2.3%. The results of partial test (t test) showed that the women on board of directors had positive influence to earning persistence at the 5% level of significance; and investment in non-core businesses had a negative effect on earnings persistence at the 10% level of significance. The partial test on gender diversity on board of commissioners actually had a significant value also (t = 0.056, small than 10%) but had a negative direction, so it was not in line with the theory. Therefore, it means there was no effect of women on board of commissioner to earning persistence. This result was same with risk management variable where there was no effect on earnings persistence.

Table 7: Model 2

PL = a + b1. Dekom + b2. Dir + b3.RM + b4.Invest + b5.Defender + b6.Analyzer + b7.Prospector + b8.Dekom*Defender + b9.Dekom*Analyzer + b10.Dekom.Prospector + b11.Dir*Defender + b12.Dir*Analyzer + b13. Dir*Prospector + b14.RM*Defender + b15.RM*Analyzer + b16. RM*Prospector + e

Variable	Prediksi	Koefisien	p-value
a		-2.392	.615
Dekom	+	-.265	.012**
Direksi	+	.208	.057*
Risk Management	+	-.039	.924
Investasi	No sign	-.475	.093*
Defender	+	-.173	.841
Analyzer	+	.333	.557
Prospector	+	-1.499	.076*
Dekom*Defender	+	.030	.935
Dekom*Prospector	+	.386	.049**
Direksi*Defender	+	-.074	.811
Direksi*Prospector	+	.038	.882
Risk Management*Defender	+	.485	.555
Risk Management*Prospector	+	1.644	.040**
F-test			.041
R ²			.058
Adjusted R ²			.026
Durbin Watson			1.959
Observation			395

Table 7 shows the test results after including the moderating variable. There was a slight increase in the adjusted value of R² due to the entering of the moderating variable. The adjusted value of R² is 0.026, which means the ability to explain the independent variable to the earning persistence variation is 2.6%. Table 7 also presents partial test results on all independent variables and interactions between independent variables and moderation variables. The moderating variable was a type of strategy consisting of defensive, analyzer, and prospector strategies. All types of strategies were interacted with the diversity of the board of commissioners, the director's diversity, and risk management. After entering all the variables, the interaction variable of the board commissioner's interaction with strategy analyzer (Dekom * Analyzer), the

interaction of the board of directors with the strategy analyzer (Director Analyzer) and the risk management interaction with the strategy analyzer (Risk Management * Analyzer) were eliminated by the system.

After included moderating variable into the model, it gave different results for partial test. Gender diversity on board of commissioners and risk management variables on direct testing (model 1) did not have direct relationship with earnings persistence, but after combined with prospector strategy, the variables had influence. It can be seen from the t-significance value of the Dekom * Prospector variable of 0.049 and the t-significance value of the Risk Management * Prospector variable of 0.040, which means less than 5%. Therefore, it was seen here that the type of prospector strategy was able to moderate the relationship between gender diversity on board of commissioners and earning persistence. It variable strengthened the relationship due to the positive standardized beta coefficient values. From this fact, we can conclude if women on board commissioner combined with prospector strategy, it will have a good effect on earnings persistence. So did risk management. Selection of prospector strategy will strengthen the usability of risk management toward earnings persistence.

Discussion

Table 7 shows that gender diversity on board of commissioners had no effect on earnings persistence. This result was inconsistent with [Krishnan and Parsons \(2008\)](#), where their study found positive effect for gender diversity on earning persistence. This study also showed women on board of directors had a positive effect on earnings persistence. This finding was consistent with [Robinson and Dechant \(1997\)](#) which gender diversity provided an effective solution to complex problems, but inconsistent with [Hili and Affes \(2012\)](#), which gender diversity on board of directors had no impact on earnings quality.

[Krishnan and Parsons \(2008\)](#) found that high gender diversity firms reported more conservative earnings than low-diversity firms. The results of this study also showed a negative relationship among income smoothing, avoidance of loss-making trends with gender management diversity, as well as a significant positive relationship with earnings persistence. Seen from this finding, we can conclude that women in Indonesia could give significance impact on the company if they had been given the opportunity as board of commissioner or lead the company as management (director). As directors, women showed a significant contribution in advancing the company's performance. Perhaps this phenomenon is possible because women in Indonesia already have had the same opportunity to pursue higher education and on the other hand women tend to be more resilient, painstaking and tend to be more careful in taking and making decisions.

For hypothesis 3, it was found that if gender diversity on board of commissioner combined with the strategy type of prospector, it had a positive effect on earnings persistence. This is in line with the results of [Houque et al. \(2013\)](#) where the prospector strategy was related to accounting conservatism although business strategy and earnings quality change during periods of high and low economic growth. However, when women became directors (hypothesis 4), the earnings' persistence was not affected by the type of strategy selected by the company.

Regarding risk management, we found there was no effect on earnings persistence. However, after combined with the prospector strategy, risk management had a significant influence in determining the company's earnings persistence. It can be seen from Table 3 that 57.2% of companies or as many as 226 samples informed detail the risk management. This may indicate that manufacturing companies in Indonesia are extra careful in running their business mainly related to financial risks. Basically, risk management is like a double-edged knife. On the one hand, if the company is too worried about risk, the company will tends to avoid the risk that could result in losing the opportunity to achieve higher profits. On the other hand, if a company is too aggressive, the company has probability to reach a high profit or a big loss as well. However, in this study, we found when risk management had a positive effect on earning persistence when it was combined with a prospector's strategy.

This study was in line with [Thomya's study \(2016\)](#) that found there was positive relationship between the existence of the risk management committee with earning persistence and [Soltanizadeh \(2016\)](#) which found that firms with cost leadership business strategy more eager to implement enterprise risk management (ERM) than companies with differentiation strategies. This study was also consistent with [Houque et al. \(2013\)](#) that found defensive strategy was associated with higher levels of earnings management and prospector strategy related to accounting conservatism.

For infrastructure investment in non-core business, we found significant negative result (at t-sig = 10%). This means that more companies are investing in non-core businesses the earning persistence will decrease. This may occur because of lack of knowledge and expertise in taking care of business in non-core business activities. Therefore, it is not surprising that manufacturing companies in Indonesia are very cautious in investing. This result is consistent with [Benkraiem \(2016\)](#), that found the core and non-core earnings of the current year, allowing for predicting performance next year. However,

inconsistent with the [Ajay and Madhumathi \(2015\)](#) found that multinational firms and had diversified products had lower levels of leverage than firms that focus on their capital structure. In addition, it was found that earning management with discretionary expenditure (based on projects) would be higher for a diversified market than a product-focused company.

CONCLUSION, LIMITATIONS, AND SUGGESTION

This study found that gender diversity on board of commissioners had no direct effect on earnings persistence but gender diversity on the board of directors had positively influenced to earning persistence and investment on non-core business had negative influence toward earning persistence. Gender diversity on board of commissioners combined with the type of prospector strategy had positive effect on earnings persistence. However, when women become directors, the type of strategy chosen by the company did not affect earning persistence. This study also found that risk management did not have an effect on earnings persistence but after interacting with the type of prospector strategy, it had influence on earnings persistence. The results of this study should be interpreted very carefully because the coefficient of determination (adjusted R square) is small.

Value of adjusted R^2 is a limitation of this study. This may be due to the variability of gender diversity in the board of commissioners and the board of directors. Most of companies in Indonesia only hired male as board of commissioners and boards of directors. For variable risk management and investment in non-core business infrastructure, we used content analysis to measure these two variables. Content analysis had a weakness because of the subjectivity of the coder. For future research, proxy for infrastructure investment in non-core businesses and risk management are able to replace with other measurements.

In order to improve the results, the future research may add the socio cultural aspects. The results of this study provide practical contributions where women should be braver to take part in the business either as a board of commissioners or directors. On the one hand, the company should provide wider opportunities for women. The investors should analyze carefully the type of strategy that companies took. This study had literature contribution in regard factors influence earning persistence beyond financial factors.

REFERENCES

1. Ajay, Ranjitha & Madhumathi (2015), "Do corporate diversification and earnings management practices affect capital structure? An empirical analysis", *Journal of Indian Business Research*, Vol.7, <https://doi.org/10.1108/JIBR-01-2015-0008>
2. Al-Dhamari, R. A., & Ismail, K. N. (2013). Association between Board Characteristics and Earnings Quality: Malaysian Evidence. *Asian Academy of Management Journal of Accounting and Finance* , Vol. 9, No. 1 , 1-23.
3. Barney, Jay. B & William S. Hesterly. 2008. *Strategic Management and Competitive Advantage*. 2nd Edition. Pearson Printice Hall.
4. Benkraiem, Ramzi (2016) The information content of small business earnings. *Journal of Applied Accounting Research* Vol. 17 No. 1, *Journal of Applied Accounting Research* Vol. 17 No. 1, 2016 pp. 84-, 96 pp. 84-96. <https://doi.org/10.1108/JAAR-09-2013-0063>
5. Bentley, K. A., Omer, T. C., & Sharp, N. Y. (2013). Business strategy, financial reporting irregularities, and audit report. *Contemporary Accounting Research*, 30(2), 780-817. <https://doi.org/10.1111/j.1911-3846.2012.01174.x>
6. Hili, W., & Affes, H. (2012). Corporate Boards Gender Diversity and Earnings Persistence: The Case of French Listed Firms. *Global Journal of Management and Business Research Volume 12 Issue 22 Version 1.0* .
7. Hill, Charles W.L & Scott A. Snell (1988), External Control, Corporate Strategy, and Firm Performance in Research Intensive Industries, *Strategic Management Journal*, Vol. 9, 577-590. <https://doi.org/10.1002/smj.4250090605>
8. Hogan, Robert & Joce D. Evan (2015), Does the strategic alignment of value drivers impact earnings persistence?, *Sustainability Accounting, Management and Policy Journal*, Volume 6, No.3, <https://doi.org/10.1108/SAMPJ-11-2014-0073>
9. Houqe, Muhammad Nurul, Ryand Kerr & Reza Monem (2013), *Business Strategy and Earning Quality*, available <http://ssrn.com/abstract=2198626>. <https://doi.org/10.2139/ssrn.2198626>
10. Ittner, C. D., D. F. Larcker, & M. V. Rajan. 1997. The choice of performance measures in annual bonus contracts. *The Account Review* 72 (2): 231-55
11. Jensen, M. C., & Meiling, W. H. (1976). Theory of the Firm: Managerial Behavior. *Journal of Financial Economics*, V. 3, No. 4, , 305-360. [https://doi.org/10.1016/0304-405X\(76\)90026-X](https://doi.org/10.1016/0304-405X(76)90026-X)
12. Krishnan, A. & Park, D. (2005), A Few Good Women on Top Management Teams. *Journal of Business Research*, 1712 – 1720. <https://doi.org/10.1016/j.jbusres.2004.09.003>
13. Krishnan, G. V., & Parsons, L. M. (2008). Getting to the bottom line: an exploration of gender and earnings quality. *Journal of Business Ethics* , 65-76. <https://doi.org/10.1007/s10551-006-9314-z>

18. Kormendi, Roger & Robert Lipe, Earnings Innovations, Earnings Persistence, and Stock Returns , *The Journal of Business*, Vol. 60, No. 3 (Jul., 1987), pp. 323-345. <https://doi.org/10.1086/296400>
15. Lipe, R. C. (1990). "The Relation Between Stock Return, Accounting Earnings And Alternative Information". *The Accounting Review*. (January): 49- 71.
16. Miles, R. et al., "Organizational strategy, structure, and process," *Academy of Management Review*, 1978, July, 335-562. <https://doi.org/10.5465/amr.1978.4305755>
17. Penman, S. H., & Zhang, X.-J. (2002). Accounting Conservatism, The Quality of Earning and Stock Returns. *The Accounting Review* , 237-264. <https://doi.org/10.2308/accr.2002.77.2.237>
18. Porter, Michael E. (1980). Hyperlink "https://en.wikipedia.org/wiki/Competitive_Strategy" "Competitive Strategy" Competitive Strategy. Free Press. Hyperlink "https://en.wikipedia.org/wiki/International_Standard_Book_Number" \o "International Standard Book Number" ISBN Hyperlink "<https://en.wikipedia.org/wiki/Special:BookSources/0-684-84148-7>" \o "Special:BookSources/0-684-84148-7" 0-684-84148-7 .
19. Robinson, G., & Dechant, K. (1997). Building a business case for diversity. *Academy of Management Executive* 11: , 21-30. <https://doi.org/10.5465/ame.1997.9709231661>
20. Scott, William R. (2005), *Financial Accounting Theory*, 7th ed, Pearson
21. Soltanizadeh, Sara; Siti Zaleha Abdul Rasid, Nargess Mottaghi Golshan, Wan Khairuzzaman Wan Ismail, (2016), Business strategy, enterprise risk management and organizational performance, *Management Research Review*, Volume 39, No. 9. <https://doi.org/10.1108/MRR-05-2015-0107>
22. Tucker, F. J. W., & Zarowin, P. A. (2004). Does Income Smoothing Improve Earnings Informativeness? *Accounting Review* Vol. 81, No. 1 , 251-270. <https://doi.org/10.2308/accr.2006.81.1.251>
23. Thomya, Wanlapa, Risk Management Committee and Earnings Quality, *WMS Journal of Management Walailak University* Vol.5 No.3 (Sep – Dec 2016): หน้า 1-10
24. Wagland, S.P., S. Taylor (2009), When it comes to financial literacy, is gender really an issue?, *Australian Accounting, Business and Finance Journal*, Vol 3
25. Yassin, M. M., Abdallah, A. A., & Al-Ibbini, O. A. (n.d.). *Earnings Quality Determinants: Literature Review and Research Opportunities*. Retrieved November 25, 2016, from www.zuj.edu.jo: www.zuj.edu.jo/wp-content/staff-research/economic/1.pdf

DO WOMEN ON BOARD, RISK MANAGEMENT, INVESTMENT IN NON-CORE BUSINESS AND STRATEGIC CHOICES AFFECT EARNING PERSISTENCE? - CASE IN INDONESIA

ORIGINALITY REPORT

19%

SIMILARITY INDEX

11%

INTERNET SOURCES

14%

PUBLICATIONS

12%

STUDENT PAPERS

PRIMARY SOURCES

1	Submitted to Universidade de Sao Paulo Student Paper	1%
2	Thankom Gopinath Arun, Yousf Ebrahem Almahrog, Zakaria Ali Aribi. "Female directors and earnings management: Evidence from UK companies", International Review of Financial Analysis, 2015 Publication	1%
3	btp.vgtu.lt Internet Source	1%
4	archive.nyu.edu Internet Source	<1%
5	Submitted to La Trobe University Student Paper	<1%
6	www.uva.fi Internet Source	<1%
7	Submitted to British University in Egypt Student Paper	<1%

8	repo.bunghatta.ac.id Internet Source	<1 %
9	Submitted to University of Stirling Student Paper	<1 %
10	core.ac.uk Internet Source	<1 %
11	garuda.kemdikbud.go.id Internet Source	<1 %
12	journals.ums.ac.id Internet Source	<1 %
13	Mohammed M. Yassin, Osama Samih Shaban, Dea'a Al-Deen Al-Sraheen, Khaldoon Ahmad Al Daoud. "Revenue standard and earnings management during the COVID-19 pandemic: A comparison between IFRS and GAAP", Journal of Governance and Regulation, 2022 Publication	<1 %
14	Submitted to Universitas Merdeka Malang Student Paper	<1 %
15	Oded Rozenbaum. "EBITDA and Managers' Investment and Leverage Choices", Contemporary Accounting Research, 2018 Publication	<1 %
16	repository.uinjkt.ac.id Internet Source	<1 %

17	Submitted to Universiti Utara Malaysia Student Paper	<1 %
18	Submitted to Kingston University Student Paper	<1 %
19	Raymond Leung. "EARNINGS MANAGEMENT MOTIVES AND FIRM VALUE FOLLOWING MANDATORY IFRS ADOPTION – EVIDENCE FROM CANADIAN COMPANIES", Corporate Ownership and Control, 2016 Publication	<1 %
20	id.123dok.com Internet Source	<1 %
21	rjoas.com Internet Source	<1 %
22	Submitted to Australian National University Student Paper	<1 %
23	Jerry Sun, Guoping Liu, George Lan. "Does Female Directorship on Independent Audit Committees Constrain Earnings Management?", Journal of Business Ethics, 2010 Publication	<1 %
24	Submitted to Erasmus University of Rotterdam Student Paper	<1 %

Submitted to Universitas Diponegoro

25

Student Paper

<1 %

26

Submitted to Colorado State University,
Global Campus

Student Paper

<1 %

27

Arne H. Krumsvik. "Newspaper Ownership
And The Prioritization Of Digital
Competences", Digital Journalism, 2014

Publication

<1 %

28

B Solikhah, A Wahyudin, Subowo. "Carbon
emissions of manufacturing companies in
Indonesia stock exchange: a sustainable
business perspective", Journal of Physics:
Conference Series, 2020

Publication

<1 %

29

www.aaajournals.org

Internet Source

<1 %

30

Submitted to Northwest Missouri State
University

Student Paper

<1 %

31

Submitted to University of Sunderland

Student Paper

<1 %

32

Fanny M. Cheung, Diane F. Halpern. "Women
at the top: Powerful leaders define success as
work + family in a culture of gender.",
American Psychologist, 2010

Publication

<1 %

33

Submitted to Laureate Higher Education Group

Student Paper

<1 %

34

Erma Setiawati, Alifah Sekarningrum, Banu Witono. "Analysis of CSR Disclosure, Earnings Persistency, Earnings Growth, and Business Size on Earnings Management with Institutional Ownership as a Moderating Variable (Case Study on LQ45 Companies Listed on the Indonesia Stock Exchange (IDX) 2016-2020)", Riset Akuntansi dan Keuangan Indonesia, 2023

Publication

<1 %

35

Submitted to RMIT University

Student Paper

<1 %

36

Submitted to School of Business and Management ITB

Student Paper

<1 %

37

Sugeng Wahyudi, Deki Nofendi, Robiyanto Robiyanto, Hersugondo Hersugondo. "Factors affecting return on deposit (ROD) of sharia banks in Indonesia", Business: Theory and Practice, 2018

Publication

<1 %

38

Mediaty Mediaty. "Impact of board of directors on financial performance and the existence of risk management as an

<1 %

intervening variable", International Journal of Financial Engineering, 2021

Publication

39	ejournal3.undip.ac.id Internet Source	<1 %
40	www.aaapubs.org Internet Source	<1 %
41	Submitted to Tilburg University Student Paper	<1 %
42	thesis.eur.nl Internet Source	<1 %
43	Submitted to Multimedia University Student Paper	<1 %
44	Submitted to OTHM Qualifications Student Paper	<1 %
45	Submitted to Universiti Selangor Student Paper	<1 %
46	Submitted to University of Nottingham Student Paper	<1 %
47	Elisa Menicucci. "Earnings Quality", Springer Science and Business Media LLC, 2020 Publication	<1 %
48	Marwan Altarawneh, Rohami Shafie, Rokiah Ishak, Belal Ali Abdulraheem Ghaleb. "Chief executive officer characteristics and	<1 %

discretionary accruals in an emerging economy", Cogent Business & Management, 2022

Publication

49

ojs.unpkediri.ac.id

Internet Source

<1 %

50

repository.wima.ac.id

Internet Source

<1 %

51

Isabel-María García-Sánchez, Emma García-Meca. "CSR Engagement and Earnings Quality in Banks. The Moderating Role of Institutional Factors", Corporate Social Responsibility and Environmental Management, 2017

Publication

<1 %

52

Submitted to iGroup

Student Paper

<1 %

53

journal.binus.ac.id

Internet Source

<1 %

54

meridian.allenpress.com

Internet Source

<1 %

55

www.scirp.org

Internet Source

<1 %

56

Ahsan Habib, Mostafa M. Hasan. "Business Strategy and Labor Investment Efficiency*", International Review of Finance, 2019

Publication

<1 %

57	Augusto Villaschi, Fernando Galdi, Sylvania Nossa. "Análise fundamentalista para seleção de uma carteira de investimento em ações com baixa razão book-to-market", BASE - Revista de Administração e Contabilidade da Unisinos, 2011 Publication	<1 %
58	Submitted to Colorado Technical University, Institute for Advanced Studies Student Paper	<1 %
59	Submitted to Trident University International Student Paper	<1 %
60	Yuli Anwar. "The Effect of Working Capital Management on Profitability in Manufacturing Company Listed in Indonesia Stock Exchange", The Accounting Journal of Binaniaga, 2018 Publication	<1 %
61	epe.lac-bac.gc.ca Internet Source	<1 %
62	Donnice Cochenour. "Establishing a Current Periodicals Room: Colorado State University's Experience", Serials Review, 2013 Publication	<1 %
63	Robert Jacobson, David Aaker. "Myopic management behavior with efficient, but	<1 %

imperfect, financial markets", Journal of Accounting and Economics, 1993

Publication

64

Sultan Sikandar Mirza, Tanveer Ahsan. "Corporates' strategic responses to economic policy uncertainty in China", Business Strategy and the Environment, 2019

Publication

<1 %

65

www.jurnal.stie-aas.ac.id

Internet Source

<1 %

66

zbw.eu

Internet Source

<1 %

67

"Commentaries and Rejoinder to "Marketing and Firm Value: Metrics, Methods, Findings, and Future Directions": Linking Marketing Actions to Value Creation and Firm Value: Insights from Accounting Research", Journal of Marketing Research, 2009

Publication

<1 %

68

discovery.dundee.ac.uk

Internet Source

<1 %

69

Letian Zhang. "An Institutional Approach to Gender Diversity and Firm Performance", Organization Science, 2020

Publication

<1 %

Exclude quotes Off

Exclude matches Off

Exclude bibliography Off