Impact of non-executive directors on financial performance of food production enterprises in Vietnam

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Abstract

Corporate governance is being acknowledged by almost all kinds of business communities and firms as an ultimate driver to improve the firm financial performance. This study examined the association between corporate board structure and corporate financial performance using a regression linear model. Principles of corporate governance deliver an explicit board structure for the purpose to facilitate the board members, which helps in making good decisions. The board of directors consists of the CEO, the chairman, the internal directors, and the external non-executive directors to work for the shareholders. This study undertakes different corporate governance attributes, including non-executive directors, age, gender, experience, and board size, and examines its effect on firm performance using ROA. The findings show that most of the governance variables are endogenous by nature. Results are consistent with agency theory. The study found that higher education and industry experience of non-executive board members improve company performance, while age, gender diversity, and the proportion of non-executive members have no significant impact. It provides the theoretical and empirical evidence to better explain the association between corporate board structure and corporate firm performance in listed food production firms in Vietnam.

Keywords**:** *non-executive director, corporate governance, internal audit, structure, board size.*

1. Introduction

Currently, falsifying financial statements to gain profits is not uncommon for businesses, especially organizations listed on the stock market. This problem is not only a serious problem in Vietnam but also around the world for many years. With sophisticated tricks used, forms of financial reporting fraud are increasingly complex and difficult to identify. Normally, auditing and financial analysts will only realize when the incident has occurred. After the shocking collapse of many large corporations such as Enron, WorldCom and a number of other large corporations, the United States enacted a Sarbanes-Oxley Act (2002) to prevent financial fraud and protect investors. Sarbanes Oxley's influence is not only in the US but also spreads throughout the world. The corporate governance mechanism is constantly updated and changed to help better monitor the operations of the company's executive apparatus, to ensure safety and protection for shareholders. Board members are non-executive and independence is emphasized more within the department.

In Vietnam, independence in businesses does not seem to be given much attention. Recent scandals in many large firms such as SCB, JVC, and DCL have raised many alerts to the corporate governance transparency of many organizations. Vietnamese law does not provide the concept of non-executive members or independent members. The 2020 Enterprise Law only regulates the standards and conditions of independent members and requires a minimum number of independent members. The Securities Law 2019 only requires the Board of Directors of public companies to ensure a balance between executive and non-executive members of the Board of Directors, and the number of independent members of the Board of Directors to ensure the independence of the Board of Directors (Point a, Clause 3, Article 41). And for the most part, non-executive board members only apply to the public administration of businesses. Having non-executive board members in the business to monitor and increase transparency of the company's operations is necessary. Non-executive directors play a very important role in reducing the risk of abuse of power by company managers, contributing to protecting the legitimate interests of shareholders, especially shareholders. small shareholders, contributing to more transparent and effective corporate governance. The role of non-executive members or independent members on the Board of Directors is becoming increasingly important for companies listed on the stock market. In Vietnam there are very few studies on this topic. Previous empirical studies abroad also provide conflicting evidence on whether non-executive directors affect corporate performance business or not. Identifying the effects of non-executive members of the Board

of Directors on the company's performance will help businesses plan and develop more appropriate policies, thereby improving profits and minimizing cost as well as avoiding conflicts of interest between shareholders and public managers. Besides, the author found that the food production industry in Vietnam has great potential both now and in the future. According to the representative of the Ministry of Industry and Trade, the production value of the food processing industry is the industry that accounts for the highest proportion among Vietnam's processing and manufacturing industries, up to 19.1%. This demonstrates the importance of the industry in ensuring people's food needs as well as meeting export requirements. In addition, the high proportion of production value shows that the food manufacturing and processing industry has many strengths with many large, reputable brands such as Masan, Vinamilk, Dabaco, Vinh Hoan. This is a stable market and highly competitive compared to other businesses abroad and there is still much room for development.

This research aims to find out the relationship between non-executive directors and the firm organizations of food industries. The paper also provides the evaluation of which variables of non-executive directors' characteristics will have the most impact on the firm's performance. Through the research results, the paper tries to make some recommendations to the government and listed firms to make a more transparent policy.

2. Literature review

2.1 The role of corporate governance

A number of previous studies on the relationship or influence of non-executive directors on the corporate governance structure have shown the importance of this role in ensuring protect your integrity, transparency, honesty and efficiency of corporate operations.

According to (Hermalin & Weisbach, 1998), there is clear evidence of the positive impact of non-executive directors on the performance and value of the enterprise. Non-executive directors often bring independent judgment and scrutiny, thereby enhancing the transparency and oversight of the governance system. While some other authors do not find a positive impact, such as (FRC, 2024) argues that the main reason companies need non-executive directors on the board is to balance power. Non-executive directors must be independent from management, any business or any other relationship which would distract or impede their independent judgment. In addition, non-executive directors need to have business relationships and practical experience, two factors emphasized by the author. (Pass, 2004) also affirmed that experience and expertise are two important factors that promote the role and effectiveness of NEDs. However, he focuses more on the integrity of NEDs because he believes that shareholder interests must be protected by non-executive directors. Additionally, there must be a high degree of independence because they must be objective when dealing with company issues. Pass believes that NEDs are keeping a balance between the board's interests of its members and the interests of its stakeholders. Nevertheless, some concerns have been raised about issues such as the number of NEDs on the board or temporary positions on the board that could affect the independence of the directors.

2.2 Corporate governance structure

Until now, there have been many studies on the relationship between the structure of non-executive directors or independent directors on the board of directors and company performance. The results of these studies have shown a relationship between the above two factors in two opposite directions.

Some authors find the negative relationship between NEDs and firm performance such as research by (Cho & Kim, 2007) analyzed the influence of independent directors on company performance during the governance reform movement in Korea in 1999 and 2007 as well as the impact of major shareholders and management ownership. Research results show that the appearance of independent directors in the corporate governance structure in Korea initially did not create much significant impact on the performance of the company and major shareholders. However, it still has many major impacts on the corporate governance process even though this has a negative impact on business operations. (Kumar & Singh, 2012) by researching 157 non-financial companies showed that the proportion of independent directors has a positive but relatively weak statistical impact on performance. performance of the enterprise. A study of companies listed on the New Zealand Stock Exchange for the period 2007-2011 by (Fauzi & Locke, 2012) shows a significant negative association between the number of non-executive directors and company performance.

Research conducted by (Belkhir, 2009) evaluated the impact of governance structure on ROA index based on samples collected from 174 banks and savings and loan companies. The results of this study even show that increasing the proportion of independent directors in banks does not even improve performance but also has a negative impact on banks' performance.

In the opposite direction, there are quite a few research articles suggesting that the impact of the number of independent directors or non-executive directors on the board of directors has a positive impact on business performance. (Choi, Park, & Yoo, 2007) conducted a study on the impact of independent directors in Korea after the Asian financial crisis, the results indicated that the impact of independent directors on company performance is relatively significant. Some research articles also have similar results like research of (Morekwa Nyamongo & Temesgen, 2013). In this article, authors showed that the number of independent members on the board of directors has a positive impact on the performance of banks in Kenya. (Ameer, Ramli, & Zakaria, 2010) also suggested that firms with more independent directors in their board structure are significantly correlated with better firm performance; Research by (Wu, Lin, Lin, & Lai, 2009) concluded that corporate performance has a positive and relatively large relationship with independent boards of directors. The authors point out that the presence of independent directors leads to better corporate performance. Another study using data collected from businesses in China was conducted by (Liu, Miletkov, Wei, & Yang, 2015) show that in China the level of board independence has a positive and significant relationship with company performance, especially in government-run companies. Government controls and companies have little information about costs input and monitor.

Besides the above positive relationship, there are also other research articles that provide additional results on the influence of non-executive directors or independent directors in the corporate governance structure. Research by (De Andres & Vallelado, 2008) analyzed a large number of international commercial banks to evaluate the role of the board of directors. The results show that the ratio of independent directors on the board of directors has a positive impact on bank performance. However, research also shows that the independent board of directors and the ratio of independent directors are also limited because the structure of the board of directors is also limited. Therefore, a balance between the ratio of executive directors and non-executive directors in the governance structure will bring better efficiency to the company's operations. (Bhatia & Gulati, 2021) used a synthetic analysis method with data from 56 studies on corporate governance of banks published from 2007-2019 and also showed similar results showing that the association A large board of directors with a high proportion of nonexecutive directors will have a positive impact on business performance, however, administrators also need to focus on appointing a number of independent directors. fit on the board of directors of banks. From studying businesses in Italy, (Merendino & Melville, 2019) have shown that the number of executives on the board of directors has a positive impact on the performance of businesses but needs to be adjusted. They suggested a balance in the structure of the board of directors and there is no need to have a larger number of executives.

2.3 The role of non-executive directors

In reality, the role of non-executive directors or non-executive Board members is very important. According to (Tài, 2018) and (Annuar & Abdul Rashid, 2015) analyzed and showed that independent members of the Board of Directors are responsible for protecting the interests of stakeholders including shareholders, employees, creditors or partner.

In the study of (Long, Dulewicz, & Gay, 2005) in listed and non-listed companies in the UK non-executive directors have a higher level of involvement in strategy development, financial oversight, shareholder communication and the overall board. In the same opinion as the above researchers, (Barratt & Korac-Kakabadse, 2002) also summarized in her research that NEDs provide a comprehensive and reflective insight into the challenges of enterprise systems that can ability to enhance the well-being of the organization, society and the environment. Besides, NEDs with good skills and abilities can stimulate the desire to change the leadership role of the organization and thus prevent future crises. In contrast to the results of the above studies, (Chiến & Dũng, 2022) concluded that there is no relationship between the participation of independent members in the board of directors and financial performance of the enterprise. This reflects the participation of independent members on the board of directors at Vietnam listed companies is not really effective. These researches suggest a lot of lessons for companies in Vietnam, because the role of NEDs are not clearly mentioned in many companies' policy.

2.4 Research gap

Previous studies have been of great significance in determining the level of influence of managers on business performance, thereby providing appropriate solutions to promote business performance. Karma. However, most of the above studies were conducted abroad, so the comments and solutions given are not appropriate to the culture, environment and context of Vietnam.

(Tejerina-Gaite & Fernández-Temprano, 2021) argued that when analyzing the experience of the board of directors, it is necessary to consider the difference between internal directors and external directors. The oversight duties and areas of expertise assigned to outside directors improve with longer board tenure and younger ages. and remuneration (i.e., better company performance can lead to higher remuneration for directors). According to (Vo & Phan, 2013), female members of the Board of Directors and the education of members of the Board of Directors have a positive relationship with company performance. This is also the result given by (Carter, Simkins, & Simpson, 2003) Carter et al., (2003), (Erhardt, Werbel, & Shrader, 2003).

In addition, previous studies have been conducted on businesses in many different industries, but no research has been conducted on businesses in food production and processing enterprises. This is an important, potential industry that is meaningful not only to individuals but also to the entire country. The relationship between business performance and food safety and hygiene is always close, so a business with good performance will pay more attention to food safety and hygiene, ensuring resources clean food for society. Furthermore, in Vietnam, there is currently only research on the influence of the characteristics of executive directors on business performance, but no research on the influence of non-executive directors. Meanwhile, the authors found that the level of influence of non-executive directors on corporate performance is not small, so I decided to evaluate the level of influence of non-executive directors on business performance, thereby proposing solutions to improve the performance of the enterprise. The results of this research will hopefully contribute to the policy maker to help strengthen the role of NEDs and address the importance of these positions in the regulation.

3. Methods

3.1 Research hypothesis

Agency Theory explores the relationship between principals (owners or shareholders) and agents (managers or executives) in a business setting. It focuses on the conflicts that can arise when the interests of the principals and agents diverge. Principals delegate decision-making authority to agents, but because agents may pursue their own interests—such as higher salaries or personal perks—rather than maximizing shareholder value, conflicts of interest may occur. The theory emphasizes the need for proper incentives, contracts, and monitoring mechanisms to align the goals of the agents with those of the principals, ensuring that agents act in the best interest of the owners. Agency Theory is widely applied in corporate governance, finance, and management to understand and address these potential conflicts.

According to this theory, non-executive board members have a positive influence on the performance of businesses. Research conducted in China in 2001 to examine the impact of board independence reform found a positive impact on firm value (Liu et al., 2015) Research in Korea by (Black & Kim, 2012) on reforming board independence from controlling shareholders and minority shareholder protection shows a positive impact of board independence on firm value.

First, gender diversity on boards of directors is considered to have a positive influence on the performance of companies. According to (Anh & Trang, 2019); (Imade, 2019), the number of female members on the Board of Directors is positively related to corporate performance. (Zelechowski & Bilimoria, 2004) and (Bart & McQueen, 2013) reported the same finding that female executives have a variety of experiences from both work and non-work life. They understand more business market segments than men, thereby increasing quality and innovation in the decision-making process. For empirical research, (Pathan & Faff, 2013) surveyed 212 large joint stock banks in the United States during the period 1997–2011 and found that gender diversity. (Dong, Girardone, & Kuo, 2017) provided evidence that having a larger proportion of female directors on the Board of Directors increases the profitability and reduces the risk level of the business.

There are also many other opinions that say that businesses with a number of female Board members often have better performance than other groups. Therefore, the proposed research hypothesis is as follows:

Hypothesis H1: The presence of female non-executive directors on the Board of Directors has a positive impact on the performance of listed food manufacturing enterprises in Vietnam.

Second, one of the characteristics of NEDs that has a clear impact on corporate performance is the proportion of non-executive members of the Board of Directors according to (Dalton, Daily, Ellstrand, & Johnson, 1998). However, research results to date have not been consistent. A small portion of research reports a negative relationship (Kumar & Singh, 2012) or no relationship between the proportion of non-executive directors and company performance (Bhagat & Black, 2001). On the other hand, the majority of studies based on agency theory (Brickley & Coles, 1995) suggest that there is a positive effect between the ratio of independent directors and financial efficiency. A higher proportion of independent board members leads to a more effective monitoring role and limits "opportunism" in management. This will lead to increased returns to shareholders (Byrd & Hickman, 1992) and enhanced economic and financial performance of the company (Waldo, 1985) measured by return on assets (ROA), profit margin and dividend yield (Brown & Caylor, 2004). Similar results to the above study, (Rosenstein & Wyatt, 1990) argued that shareholder benefits are affected by the ratio of non-executive directors; with positive stock price results upon the announcement of the appointment of an additional NEDs. This confirms that the role of independent directors in monitoring and controlling management is fundamental to reducing the possibility of financial reporting fraud (Beasley, Carcello, Hermanson, & Lapides, 2000), (Beasley, 1996) and has the potential to benefit shareholders. Research by (Dahya, Dimitrov, & McConnell, 2008) found a positive relationship between the proportion of independent directors and corporate value across 22 countries, especially in countries with good protection mechanisms for minority shareholders. number. Case study in the Hong Kong market by (Leung, Richardson, & Jaggi, 2014) confirms that the ratio of 1/3 of NEDs is an appropriate and necessary. The Board of Directors can be transparent and objective in making decisions, thereby affecting the performance of joint stock companies, especially in non-family joint stock companies.

Therefore, a second hypothesis was proposed:

Hypothesis H2: The ratio of non-executive members of the Board of Directors in the Board of Directors has a positive impact on the performance of listed food manufacturing enterprises in Vietnam

Third, the educational level of the Board of Directors is one of the factors that constitute the quality of the Board of Directors (Jalbert, Rao, & Jalbert, 2002). Companies with boards of directors with better operating quality will have higher stock returns than companies with boards of directors with poor operating quality (Hayes & Lee, 1998). And also, according to the authors, a Board of Directors consisting of better quality non-executive directors will oversee the activities of the Board of Directors. more effective management. Therefore, the company will be more successful in the future. In addition, educational level is one of the important measures of knowledge, especially qualifications and degrees in fields such as finance, accounting, economics, research and law, because of the demand for education. The application of these fields in corporate governance is huge (Yusoff, 2010). Boards of directors with highly educated NEDs are often willing to accept changes in the structure or strategy of the business, because they have the ability to minimize systemic risks during the change process thanks to their perspectives. Unique strategies, quick problem-solving mind and deep understanding in business operations of enterprises (Jensen & Zajac, 2004). Based on a higher degree, it means having more access to specialized knowledge, members are more thoroughly trained, leading to better ability to handle work and make decisions. Empirical studies also show that the educational level of NEDs is positively related to company performance (Darmadi, 2013).

From the above bases, the third hypothesis was proposed:

Hypothesis H3: Educational factors of non-executive members of the Board of Directors have a positive impact on the performance of listed food manufacturing enterprises in Vietnam

Fourth, according to previous empirical studies, the more seniority, experience and industry knowledge non-executive members of the Board of Directors have, the better the business operates and the more opportunities it has to gain profits. high profits, typically as researched by (Ilhan Nas & Kalaycioglu, 2016). The fact that NEDs have much experience also promotes information exchange with members of the Board of Directors and has close relationships with other businesses in the industry or with the government, creating a competitive advantage for businesses in particular and the government. business in general (Forbes & Milliken, 1999). However, another study offers a unique perspective on the industry seniority of non-executive Board members when this study shows that it is the diversity in seniority among NEDs that is

effective. highest performance for businesses (Wellalage & Locke, 2013). These two authors believe that diversity in seniority helps businesses enjoy sustainable development advantages for members with high seniority, while members with low seniority can come up with more innovative and creative business directions, create a multi-dimensional working environment, and seek new good markets. because they are not limited by prior knowledge and experience about the industry and business. In summary, previous studies on the impact of career seniority of non-executive board members have drawn conclusions in many different directions, with no consistency across businesses or research environments. However, most studies have in common that, to ensure profits for businesses, non-executive members of the Board of Directors still need a number of members with a certain amount of professional experience by non-executive independent members. Executives are often experts in each field, able to promote their professional strengths in controlling decision-making and supervising the implementation of decisions of the executive board (Fama & Jensen, 1983).

Therefore, fourth hypothesis was proposed:

Hypothesis H4: The experience factor of non-executive members of the Board of Directors has a positive impact on the performance of listed food manufacturing enterprises in Vietnam

Fifth, there are many studies that have shown that the age diversity of Board members is positively related to business performance. Research by Dagsson and Larsson (Dagsson & Larsson, 2011) concludes that the effects of young board members often bring profits to the business after 2 years, while older members ensure steady growth of the board. short-term profits. This study also shows that the age of Board members will have a clear impact on the profits of small businesses, and this impact gradually decreases as the size of the business increases to medium and large. In addition, the further away age is from the golden age threshold, there will be an inverse relationship with profits. Based on research by (Yusoff, 2010), the average age of Board members is 58 years old and advises that businesses should have diversity in the age of Board members, preferably in between 30-70 years old. Therefore, a fifth hypothesis was proposed:

Hypothesis H5: The age factor of non-executive members of the Board of Directors has a positive impact on the performance of listed food manufacturing enterprises in Vietnam.

3.2 Research model

Aiming to examine the influence of non-executive members' characteristics on the Board of Directors on business performance, inheriting from previous studies, the authors propose the following research model:

Firm Performance = β0 + β1GEND + β2AGE + β3EDU + β4EXP + β5PROP + β6SIZE + β7 FAGE + β8BOARD + ε

Dependent variable: Firm Performance: is a variable that measures business performance expressed through ROA and ROS indicators

Independent variable:

GEND: is a variable measuring the proportion of female members in the total number of non-executive members on the Board of Directors

AGE: is a variable representing the average age of non-executive members in the Board of Directors.

EDU: is a variable representing the educational level of non-executive members in the company board including highest degree obtained, field of study. The data is measure by the total number of non-executive Board members with university degrees in economics or finance / Total number of non-executive Board members in the enterprise.

EXP: is a variable representing the experience of non-executive directors which identify years in the industry, previous positions.

PROP: is a variable representing the proportion of non-executive members in the Board of Directors.

Control variable:

SIZE: is a variable that represents the size of the business, measured by the total assets of the business.

FAGE: is a variable representing the seniority of a business in the industry, which is measured by the number of years the business operated in the industry.

BOARD: is a variable representing the scale of Board of Directors.

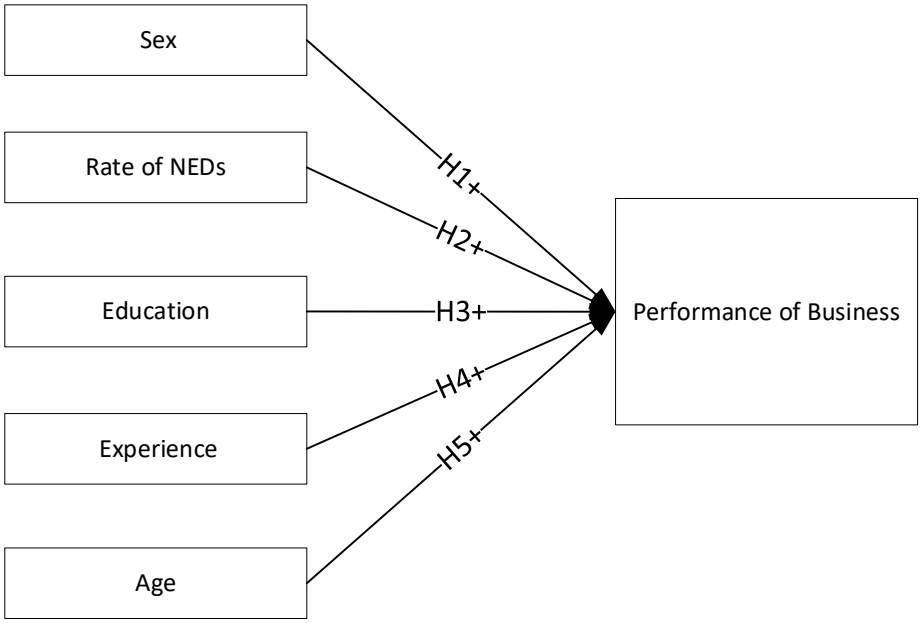

Figure 1: Research model on the impact of non-executive directors on the performance of food manufacturing enterprises in Vietnam

3.3 Methods of collecting and processing data

The author collected secondary data from food manufacturing enterprises, listed on two Vietnamese stock exchanges, HNX and HOSE, over a 5-year period from 2018 to 2022 to to analyze the impact of non-executive director characteristics on firm performance. Data on the characteristics of non-executive directors are collected from the Annual Report and Management Report. Enterprise performance assessment indicators are measured based on audited financial statements, publicly posted on enterprise websites and Vietstock Finance website. After collecting all the necessary data, 140 samples were processed, screened, and calculated and performed test using STATA 17 software.

4. Results and Discussion

4.1 Results

Table 1: Descriptive statistics of variables in the model

Variable	Obs	Mean	Std.dev.	Min	Max
ROA	140	-0.0681976	0.0821077	-0.2974	-45116
R0S	140	0.0652393	0.0740921	-0.111	0.4485
GEND	140	0.226729	0.3081413	0	1
AGE	140	40.49175	20.97911	0	66
EDU	140	0.6829286	0.4227769	0	1
EXP	140	18.84522	11.03555		40
PROP.	140	0.3753195	0.2557371		0.888889
SIZE	140	12.23862	0.589835	10.75	13.7269
FAGE	140	1.278235	0.3397975	0	1.79
BOARD	140	0.7727052	0.1555465	0.477121	1.113943

Table 2: Regression results of REM model against ROA

Random-effects GLS regression.					Number of obs = 140	
Group variable: MA					Number of groups = 28	
R-squared:					Obs per group	
Within = 0.0332					min = 5	
Between = 0.1753					avg = 5.0	
Overall = 0.1070					max= 5	
					Wald chi2(8) = 8.86	
corr(u_i, X) = 0 (assumed)					Prob > chi2 = 0.3545	
ROA	Coefficient	Std.err.	z	P>|z|	[95% conf.	Interval]
GEND	0.0406242	0.028631	1.42	0.0156	-0.015491	0.096739
AGE	-0.000373	0.001051	-0.35	0.723	-0.002434	0.0016876
EDU	0.0038825	0.03004	0.13	0.897	-0.054995	0.0627601
EXP	-0.001158	0.001665	-0.07	0.487	-0.004421	0.0021055
PROP	0.0366969	0.050221	0.73	0.465	-0.061735	0.1351284
SIZE	0.009381	0.019042	0.49	0.622	-0.02794	0.0467021
FAGE	0.0478751	0.031461	1.52	0.128	-0.013787	0.1095369
BOARD.	0.019123	0.052458	0.36	0.715	-0.083692	0.1219377
sigma_u	0.0482459					
sigma_e	0.6224814					
cho	0.3752791	(fraction of variance due to u_i)				

Table 3: Regression results of REM model against ROS

Random-effects GLS regression.					Number of obs = 140	
Group variable: MA					Number of groups = 28	
R-squared:					Obs per group	
Within = 0.037					min = 5	
Between = 0.3205					avg = 5.0	
Overall = 0.1457					max= 5	
					Wald chi2(8) = 7.72	
corr(u_i, X) = 0 (assumed)					Prob > chi2 = 0.4613	
ROS	Coefficient	Std.err.	z	P>|z|	[95% conf.	Interval]
GEND	0.0291201	0.0253400	1.15	0.25	-0.020545	0.0787856
AGE	-0.0001911	0.0092370	-0.21	0.836	-0.002001	0.0016193
EDU	-0.0049334	0.0264783	-0.19	0.852	-0.05683	0.0469631
EXP	-0.0011187	0.0014781	-0.76	0.449	-0.004016	0.0017784
PROP	0.0748883	0.0443515	1.69	0.091	-0.012039	0.1618156
SIZE	0.119136	0.1662677	0.73	0.464	-0.01997	0.0437976
FAGE	0.0326429	0.2668830	1.22	0.221	-0.196652	0.084951
BOARD.	0.0054057	0.0467126	0.12	0.908	-0.086149	0.0969607
_cons	-0.1289907	0.1895031	-0.68	0.496	-0.50041	0.242486
sigma_u	0.03892355					
sigma_e	0.05636353					
cho	0.32290671	(fraction of variance due to u_i)				

Hausman test is used to compare the agreement of FEM estimates and REM estimates. With hypothesis H0: REM estimation is better than FEM estimation. The test results in the two tables below show that the p-value of both models is less than 0.05, thus rejecting the hypothesis H0, meaning that the FEM estimate is better than the REM estimate. So, in conclusion, FEM estimation is the chosen model.

Table 4: Hausman test results according to ROA

	Coefficients			
	(b)	(B)	(b-B)	sqrt(diag(V_b-V_B))
	fe	re	Difference	Std.err.
GEND	0.0821274	0.0406242	0.0415032	0.0189572
AGE	-0.0006534	-0.000373	-0.0002804	0.0009682
EDU	-0.0038805	0.0038825	-0.007763	0.0252753
EXP	0.0001789	-0.001158	0.0013369	0.0011914
PROP	-0.0027739	0.0366969	-0.0394709	0.03864
SIZE	-0.1085404	0.009381	-0.1179214	0.0424678
FAGE	0.0084712	0.0478751	-0.0394039	0.0865897
BOARD	0.0515882	0.019123	0.0324652	0.0309447

b = Consistent under HO and Ha; obtained from xtreg.

B = Inconsistent under Ha, efficient under H0; obtained from xtreg.

Test of HO: Difference in coefficients not systematic

chi2(8) = (b-b)'[(V_b-V_B)^(-1)](b-B)
= 18.52

Prob>chi2 = 0.0176

Table 5: Hausman test results according to ROS

	Coefficients			
	(b)	(B)	(b-B)	sqrt(diag(V_b-V_B))
	fe	re	Difference	Std.err.
GEND	0.0158919	0.0291201	-0.0132282	0.018016
AGE	-0.0003609	-0.0001911	-0.0001698	0.0009064
EDU	-0.0025757	-0.0049334	0.0023578	0.0237175
EXP	-0.0000206	-0.0011187	0.0010981	0.0011188
PROP	0.0534144	0.0748883	-0.0214739	0.036399
SIZE	-0.0813113	0.0119136	-0.0932249	0.0388752
FAGE	-0.0299891	0.0326429	-0.062632	0.0790342
BOARD	0.0368434	0.0054057	0.0314377	0.0293108

b = Consistent under HO and Ha; obtained from xtreg.

B = Inconsistent under Ha, efficient under H0; obtained from xtreg.

Test of HO: Difference in coefficients not systematic

chi2(8) = (b-b)'[(V_b-V_B)^(-1)](b-B)
= 25.44

Prob>chi2 =.0013

Next, to check for violation of heteroscedasticity of the selected model, the author uses the Wald test, with hypothesis H0: There is no phenomenon of heteroskedasticity. The results show that the p-value of both models is less than 1%. Therefore, there is enough basis to reject the Ho hypothesis, meaning that both models suffer from heteroscedasticity violation.

Table 6: Wald test results with dependent variable ROA

Modified Wald test for groupwise heteroskedasticity in fixed effect regression model
H0: sigma(i)^2 = sigma^2 for all i
chi2 (28) = 3.4e+05
Prob>chi2 = 0.0000

Table 7: Wald test results with dependent variable ROS

Modified Wald test for groupwise heteroskedasticity in fixed effect regression model
H0: sigma(i)^2 = sigma^2 for all i
chi2 (28) = 1.1e+06
Prob>chi2 = 0.0000

Next, the author uses the Wooldridge test to check for violation of autocorrelation of the selected model, with the hypothesis Ho: There is no autocorrelation phenomenon. The results show that the p-value of the model with the dependent variable ROS is less than 1%. Thus, hypothesis Ho is rejected, meaning that this model has autocorrelation phenomenon. In contrast, the p-value of the model with the dependent sea is ROA greater than 1%. This means that the Ho hypothesis is accepted and this model does not violate the autocorrelation phenomenon.

Table 8: Wooldridge test results with the dependent variable ROA

. xtserial ROA GEND AGE EDU EXP PROP SIZE FAGE BOARD
Wooldridge test for autocorrelation in panel data
H0: no first-order autocorrelation
F(1, 27) = 2.395
Prob > F = 0.1333

Table 9: Wooldridge test results with the dependent variable ROS

Wooldridge test for autocorrelation in panel data
H0: no first-order autocorrelation
F(1, 27) = **33.515**
Prob > F = **0.0000**

Finally, the GLS regression method was performed to overcome the shortcomings model defects to get the best results

Table 10: Regression results using the GLS method with the dependent variable ROA

Cross-sectional time-series FGLS regression

Coefficients:	generalized least squares
Panels:	heteroskedastic
Correlation:	no autocorrelation

Estimated covariances	=	28	
Estimated autocorrelations	=	0	
Estimated coefficients	=	9	
Number of obs	=	140	
Number of groups	=	28	
Time periods	=	5	
Wald chi2(8)	=	35.67	
Prob > chi2	=	0	

ROA	Coefficient	Std. Err.	z	P>|z|	[95% Conf.	Interval]
GEND	0.0004256	0.0144038	0.03	0.976	-0.0278053	0.0286565
AGE	0.0062565	0.0049559	1.26	0.207	-0.0034577	0.0159708

ROA	Coefficient	Std. Err.	z	P>|z|	[95% Conf.	Interval]
EDU	0.0341585	0.0108198	3.16	0.002	0.0127558	0.0555611
EXP	-0.0027726	0.0007093	3.91	0	-0.0041627	-0.0013824
PROP	0.0367615	0.0092679	3.97	0	0.0185963	0.0549266
SIZE	0.0198725	0.0081237	2.45	0.014	0.0039503	0.0357947
FAGE	0.0287798	0.0113887	2.53	0.011	0.0064574	0.0511023
BOARD	0.0304953	0.0259837	1.17	0.241	-0.0204338	0.0814243
_cons	-0.2534767	0.1034861	2.45	0.014	-0.4563058	-0.0506476

Table 11: Regression results using the GLS method with the dependent variable ROS

Cross-sectional time-series FGLS regression

Coefficients: generalized least squares
Panels: heteroskedastic
Correlation: common AR(1) coefficient for all panels (0.5840)

Estimated covariances	= 28	Number of obs	= 140
Estimated autocorrelations	= 1	Number of groups	= 28
Estimated coefficients	= 9	Time periods	= 5
		Wald chi2(8)	= 32.42
		Prob > chi2	= 0.0001

ROS	Coefficient	Std. Err.	z	P>|z|	[95% Conf.	Interval]
GEND	0.0102465	0.0139853	0.73	0.464	-0.0171642	0.0376571
AGE	0.0001193	0.0003793	0.31	0.611	-0.0006254	0.000864
EDU	0.0166949	0.0091491	1.82	0.066	-0.0011366	0.0345264
EXP	-0.0012587	0.0006454	1.95	0.051	-0.002523	0.00000617
PROP	0.000421	0.0281615	0.05	0.961	-0.0547948	0.0556368
SIZE	0.0462138	0.0314619	1.46	0.143	-0.0154964	0.1079241
FAGE	0.0349041	0.0110229	3.17	0.002	0.0132998	0.0565085
BOARD	0.0366674	0.0199835	1.83	0.068	-0.0026156	0.0753444
_cons	-0.1678325	0.0996329	1.68	0.092	-0.3631094	0.0274445

Table 12: Model results of POLS, REM, FEM, GLS according to ROA

Variable	Model 1 Coefficient	Model 1 t-statistic	Model 2 Coefficient	Model 2 t-statistic	Model 3 Coefficient	Model 3 t-statistic	Model 4 Coefficient	Model 4 t-statistic
GEND	0.008222	0.33	0.0821	2.33	0.0406	1.26	0.000426	0.03
AGE	-9.5E-05	-0.11	-0.00064	-0.46	-0.000373	-0.35	0.00045	1.26
EDU	0.03118	1.24	-0.00388	-0.1	0.0388	0.63	0.0342	3.13
EXP	-0.00264	-1.76	0.000179	1.07	-0.00116	-0.73	-0.00273	-3.94
PROP	0.0778	1.8	-0.08277	-0.04	0.00953	0.49	0.0368	1.55
SIZE	0.2317	2.8	-0.109	-2.33	0.00963	0.63	0.0199	2.4
FAGE	0.058	2.8	0.0847	0.89	0.0847	1.52	0.0278	2.64
BOARD	-0.0217	-0.46	0.0516	0.51	0.0516	0.51	0.0305	1.17
_cons	-0.376	-2.5	1.354	2.43	1.354	0.63	-0.253	-2.45

Table 13: Model results of POLS, REM, FEM, GLS according to ROS

Variable	Model 1 Coefficient	Model 1 t-statistic	Model 2 Coefficient	Model 2 t-statistic	Model 3 Coefficient	Model 3 t-statistic	Model 4 Coefficient	Model 4 t-statistic
GEND	0.0457	2.07	0.0159	0.51	0.0291	1.28	0.0102	0.53
AGE	-0.00013	-0.28	-0.00036	-1.07	-0.000191	-0.61	0.000193	0.53
EDU	0.0108	0.48	-0.0052	-0.19	-0.0084	-0.69	0.0096	0.84
EXP	-0.00202	-1.49	0.00002	-0.01	-0.00114	-0.76	-0.0021	-1.95
PROP	0.103	2.66	0.0534	1.93	0.0749	2.03	0.0176	1.46
SIZE	0.0271	2.3	-0.0813	-1.93	0.0119	1.18	0.0118	1.14
FAGE	0.0375	2.83	0.0043	-0.36	0.0326	1.22	0.0439	3.42
BOARD	-0.0289	-0.67	0.0367	1.23	0.0054	0.18	0.0367	1.17
_cons	-0.305	-2.27	1.063	2.11	-0.129	-0.68	-0.168	-1.68

After correcting errors by performing regression using the GLS method, the author obtained the final results table. On the model using ROA as a proxy for business performance, it can be seen that the FAGE and SIZE variables are statistically significant at the 5% level, the EDU variable is statistically significant at the 1% level, and the EXP variable is statistically significant at the 0.1% level and the remaining variables are not statistically significant.

Therefore, in the model using ROS as a proxy for business performance, the statistically significant variable is FAGE, the remaining variables are not statistically significant. After comparing specific results, the authors evaluate that company performance measured by the ROA index is more appropriate than ROS. There are some reasons why author chose ROA index rather than ROS for food industry. First, the rate of assets of these companies has a great proportion in total assets. Secondly, the growing of the food market is quite stable in the industry in relatively with the increase of the population, so the ROS is not a reliable index because the growing sales rate are quite similar across the industry. Specific results when measuring operating efficiency using ROA are as follows: First, with the independent variable EDU, the educational level of non-executive board members is statistically significant at the 1% level and positively correlated with ROA. The EXP variable is statistically significant at the 0.1% level, but has a negative correlation with hypothesis H4: The experience factor of non-executive members of the Board of Directors has a positive impact on operating efficiency. performance of listed food manufacturing enterprises in Vietnam. Hypothesis H2: The ratio of non-executive members of the Board of Directors to the Board of Directors has a positive impact on the performance of listed food manufacturing enterprises in Vietnam and is rejected as insignificant statistics in research articles. The remaining two variables, GEND and AGE, were found to have no impact on the performance of listed companies in the food manufacturing industry in Vietnam. Thus, hypotheses H1 and H5 are rejected.

4.2 Discussion

By using data samples collected on Financial Reports, Annual Reports and Management Reports of food manufacturing companies listed on the two stock exchanges HNX and HOSE Vietnam during the period in the 5 years from 2018 to 2022, the research has obtained some experimental results as follows: First, there exists a positive correlation between the educational level of non-executive members of the board of directors and the performance of food manufacturing companies in Vietnam This means that the higher the level of education and industry knowledge of non-executive directors, the more significant the improvement and enhancement of corporate performance. Second, the longer a non-executive member of the board has experience in the industry, the company's performance will also increase significantly. With long-term leadership and management experience, non-executive directors will gain more practical knowledge, recognize risks and come up with appropriate management strategies. management, helping businesses operate more effectively. In addition, the article did not find statistical significance of age, gender diversity on the board of directors and the proportion of non-executive members on the board of directors on the performance of food manufacturing enterprises in Vietnam.

5. Conclusion and recommendations

Currently, the role of independent members of the Board of Directors of public companies in Vietnam still has some shortcomings. According to a survey by the Vietnam Association of Independent Members of the Board of Directors of Enterprises (VNIDA), the appointment of independent members of the Board of Directors of these companies is mainly to meet the legal requirements on the minimum number. Although public companies are making progress in promoting governance practices and awareness regarding independent directors has increased, compliance with independent directors has not yet been given attention. Many companies have not complied, meaning they do not have independent members of the Board of Directors or have independent members of the Board of Directors but with a lower number than legal requirements. Many companies do not disclose complete information about the age, professional qualifications and remuneration of independent members of the Board of Directors. At the same time, the low level of remuneration in many companies shows that independent members of the Board of Directors do not play an important role and are mainly appointed to meet legal requirements. Therefore, it is necessary to further strengthen and promote the importance of corporate governance in general and independent members of the Board of Directors in particular; Strengthen the enforcement of regulations on independent members of the Board of Directors to provide a more complete legal framework for independent members of the Board of Directors to perform and maximize value from their expected tasks and responsibilities; and continuously improve the quality and standards of independent directors so that more companies can realize the benefits of independent directors and practice good practices. First, there needs to be a complete legal framework, specific authority and power of independent members of the Board of Directors. Currently, the authority and powers of independent members of the Board of Directors mainly depend on the company charter and are not specifically regulated by law. To a certain extent, shareholders control, through many other means each other, can affect the authority and power of independent members of the Board of Directors. One of the most important rights for independent members of the Board of Directors to carry out their roles, including both supervisory and advisory roles, is the right to access information. But the Enterprise Law 2020 only provides general regulations on the right of Board members to request information. However, because independent members of the Board of Directors do not spend all their time working in the company, they may not be able to keep up and understand all the issues that are happening. Therefore, members' right to access information Board independence should be given priority over other members of the Board of Directors.

Second, it is necessary to encourage interaction between independent members of the Board of Directors and shareholders. In case the chairman of the Board of Directors is not an independent member of the Board of Directors, the Board of Directors should appoint a leading independent member of the Board of Directors or a senior independent member of the Board of Directors who is accountable to shareholders. Such appointment of an independent member of the Board of Directors will provide an additional backup channel for shareholders to discuss issues in case the normal communication channel with the Board of Directors or the company's directors is interrupted. Lost connection. The presence of an independent director at the helm also provides an additional mechanism for all independent directors and non-executive directors to hold confidential meetings to discuss any issues. as well as create conditions to solve problems conflict of interest.

Third, it is necessary to supplement regulations on sanctions to strengthen the enforcement of regulations for independent members of the Board of Directors, and sanctions for actions that do not meet the regulations on the number of independent members. The establishment of Boards of Directors for public companies and credit institutions should be applied to other types of companies, including non-public joint stock companies that choose to operate under a single governance model. class.

Fourth, there is a need to have separate regulations for the election of independent members of the Board of Directors and develop regulations on specialized committees to enhance the specific role of independent members of the Board of Directors in the specialized committees of the Board of Directors. It is necessary to have a clearer legal framework for the organization and operation of these committees, instead of letting the public. Specifically, similar to the audit committee, model operating regulations of other committees/subcommittees also need to be issued.

Fifth, it is necessary to stipulate mandatory contents in the reports of independent members of the Board of Directors in the audit committee such as remuneration, operating expenses and other benefits of the audit committee; results of monitoring financial reports, operations and financial situation of the company; results of assessment of the company's risk management and internal control system, results of supervision

of the Board of Directors, directors and other executive members. The lack of regulations has led to a common situation where evaluation and reporting activities of independent members of the Board of Directors and the Board of Directors are only carried out roughly, superficially and ineffectively. To enhance the supervisory role of independent members of the Board of Directors, there should be detailed regulations on specific criteria and mandatory content for reports of independent members of the Board of Directors and reports of the Board of Directors, similar to regulations on reports of independent members of the Board of Directors. Finally, promote the role of independent member of the Board of Directors as a profession. To do this, associations and professional organizations should be encouraged to establish and maintain a platform or network to connect independent board members, setting standards/criteria for members. Independent Board of Directors, support for the voice of independent members of the Board of Directors, enhancing their expertise and sharing their experiences.

Although the article has some contribution in practice, but there are some limitations in the research. The research only focused on one typical industry; the use of secondary data is not reliable to some extent. Future studies could explore the reasons behind the non-significance of certain variables or the negative correlation between experience and performance.

Reference

Ameer, R., Ramli, F., & Zakaria, H. (2010). A new perspective on board composition and firm performance in an emerging market. *Corporate Governance: The international journal of business in society, 10*(5), 647-661. doi:10.1108/14720701011085607

Anh, H. T. P., & Trang, N. N. H. (2019). The Impact of Board Gender Diversity on Firm Performance: Evidence from Vietnamese Listed Firms. Dalat University Journal of Science, 9(1), 31-48. doi.org/10.37569/DalatUniversity.9.1.463(2019)

Annuar, H. A., & Abdul Rashid, H. M. (2015). An investigation of the control role and effectiveness of independent non-executive directors in Malaysian public listed companies. *Managerial Auditing Journal, 30*(6/7), 582-609.

Barratt, R., & Korac-Kakabadse, N. (2002). Developing reflexive corporate leadership: The role of the non executive director. *Corporate Governance: The international journal of business in society, 2*(3), 32-36.

Bart, C., & McQueen, G. (2013). Why women make better directors. *International Journal of Business Governance and Ethics, 8*(1), 93-99.

Beasley, M. S. (1996). An empirical analysis of the relation between the board of director composition and financial statement fraud. *Accounting Review*, 443-465.

Beasley, M. S., Carcello, J. V., Hermanson, D. R., & Lapides, P. D. (2000). Fraudulent financial reporting: Consideration of industry traits and corporate governance mechanisms. *Accounting horizons, 14*(4), 441-454.

Belkhir, M. (2009). Board of directors' size and performance in the banking industry. *International Journal of Managerial Finance, 5*(2), 201-221.

Bhagat, S., & Black, B. (2001). The non-correlation between board independence and long-term firm performance *Journal of Corporation Law , 27*, 231.

Bhatia, M., & Gulati, R. (2021). Board governance and bank performance: A meta-analysis. *Research in International Business and Finance, 58*, 101425.

Black, B., & Kim, W. (2012). The effect of board structure on firm value: A multiple identification strategies approach using Korean data. *Journal of financial economics, 104*(1), 203-226.

Brickley, J. A., & Coles, J. L. (1995). Outside Directors and the Adoption of Poison Pills. *Financial Services Review: The Journal of Individual Financial Management, 4*(1), 66. doi.org/10.1016/1057-0810(95)90033-0

Brown, L. D., & Caylor, M. L. (2004). Corporate governance and firm performance. *Available at SSRN 586423*.

Byrd, J. W., & Hickman, K. A. (1992). Do outside directors monitor managers?: Evidence from tender offer bids. *Journal of financial economics, 32*(2), 195-221.

Carter, D. A., Simkins, B. J., & Simpson, W. G. (2003). Corporate governance, board diversity, and firm value. *Financial review, 38*(1), 33-53.

Cho, D. S., & Kim, J. (2007). Outside directors, ownership structure and firm profitability in Korea. *Corporate Governance: An International Review, 15*(2), 239-250.

Choi, J. J., Park, S. W., & Yoo, S. S. (2007). The value of outside directors: Evidence from corporate governance reform in Korea. *Journal of financial and quantitative analysis, 42*(4), 941-962.

Dagsson, S., & Larsson, E. (2011). *How age diversity on the Board of Directors affects Firm Performance*. A Master's Thesis in Business Administration. Blekinge Institute of Technology School of Management.

Dahya, J., Dimitrov, O., & McConnell, J. J. (2008). Dominant shareholders, corporate boards, and corporate value: A cross-country analysis. *Journal of financial economics, 87*(1), 73-100.

Dalton, D. R., Daily, C. M., Ellstrand, A. E., & Johnson, J. L. (1998). Meta-analytic reviews of board composition, leadership structure, and financial performance. *Strategic management journal, 19*(3), 269-290.

Darmadi, S. (2013). Board members' education and firm performance: evidence from a developing economy. *International Journal of Commerce and Management, 23*(2), 113-135.

De Andres, P., & Vallelado, E. (2008). Corporate governance in banking: The role of the board of directors. *Journal of banking & finance, 32*(12), 2570-2580.

Dong, Y., Girardone, C., & Kuo, J.-M. (2017). Governance, efficiency and risk taking in Chinese banking. *The British Accounting Review, 49*(2), 211-229.

Erhardt, N. L., Werbel, J. D., & Shrader, C. B. (2003). Board of director diversity and firm financial performance. *Corporate Governance: An International Review, 11*(2), 102-111.

Fama, E. F., & Jensen, M. C. (1983). Separation of ownership and control. *The journal of law and Economics, 26*(2), 301-325.

Fauzi, F., & Locke, S. (2012). Board structure, ownership structure and firm performance: A study of New Zealand listed-firms. *Asian Academy of Management Journal of Acounting and Finance, 8*(2), 43-67.

Forbes, D. P., & Milliken, F. J. (1999). Cognition and corporate governance: Understanding boards of directors as strategic decision-making groups. *Academy of management review, 24*(3), 489-505.

FRC. (2024). *UK Corporate Governance Code*. Access Date: 24 March 2024 Retrieved from:https://media.frc.org.uk/documents/UK_Corporate_Governance_Code_2024_ofM100g.pdf

Hayes, R. S., & Lee, D.-W. (1998). *IS BOARD QUALITY AN INDICATOR OF A FIRM'S FUTURE PERFORMANCE? Proceeding in the Allied Academies International Conference. Academy of Accounting and Financial Studies. 3(2), pp.1-245. Jordan Whitney Enterprises, Inc. Las Vegas. Retrieved from* https://citeseerx.ist.psu.edu/document?repid=rep1&type=pdf&doi=975a773815dfdf8a8febaab7284d43a9cf65fb8b#page=145

Hermalin, B. E., & Weisbach, M. S. (1998). Endogenously chosen boards of directors and their monitoring of the CEO. *American economic review*, 96-118.

Imade, O. G. (2019). Board gender diversity, non-executive directors composition and corporate performance: evidence from listed firms in Nigeria. *African Journal of Business Management, 13*(9), 283-290.

Jalbert, T., Rao, R. P., & Jalbert, M. (2002). Does school matter? An empirical analysis of CEO education, compensation, and firm performance. *International Business and Economics Research Journal, 1*(1), 83-98.

Jensen, M., & Zajac, E. J. (2004). Corporate elites and corporate strategy: How demographic preferences and structural position shape the scope of the firm. *Strategic management journal, 25*(6), 507-524.

Kumar, N., & Singh, J. (2012). Outside directors, corporate governance and firm performance: Empirical evidence from India. *Asian Journal of Finance & Accounting, 4*(2), 39.

Leung, S., Richardson, G., & Jaggi, B. (2014). Corporate board and board committee independence, firm performance, and family ownership concentration: An analysis based on Hong Kong firms. *Journal of Contemporary Accounting & Economics, 10*(1), 16-31.

Liu, Y., Miletkov, M. K., Wei, Z., & Yang, T. (2015). Board independence and firm performance in China. *Journal of corporate finance, 30*, 223-244.

Long, T., Dulewicz, V., & Gay, K. (2005). The Role of the Non-executive Director: findings of an empirical investigation into the differences between listed and unlisted UK boards. *Corporate Governance: An International Review, 13*(5), 667-679.

Merendino, A., & Melville, R. (2019). The board of directors and firm performance: empirical evidence from listed companies. *Corporate Governance: The international journal of business in society, 19*(3), 508-551.

Nas, T.I., & Kalaycioglu, O. (2016). The effects of the board composition, board size and CEO duality on export performance: Evidence from Turkey. *Management Research Review, 39*(11), 1374-1409.

Nguyễn, V. C., & Trần, M. D. (2023). Thành viên hội đồng quản trị độc lập và hiệu quả tài chính của doanh nghiệp–nghiên cứu trên sàn giao dịch chứng khoán. Tạp chí Kinh tế và Phát triển, (308 (2)), 102-110.

Nyamongo, E.M., & Temesgen, K. (2013). The effect of governance on performance of commercial banks in Kenya: a panel study. *Corporate Governance: The international journal of business in society, 13*(3), 236-248.

Pass, C. (2004). Corporate governance and the role of non-executive directors in large UK companies: an empirical study. *Corporate Governance: The international journal of business in society, 4*(2), 52-63.

Pathan, S., & Faff, R. (2013). Does board structure in banks really affect their performance? *Journal of banking & finance, 37*(5), 1573-1589.

Rosenstein, S., & Wyatt, J. G. (1990). Outside directors, board independence, and shareholder wealth. *Journal of financial economics, 26*(2), 175-191.

Tài, N. H. (2018). *Ảnh hưởng của giới tính nữ trong hội đồng quản trị đến hiệu quả hoạt động của các doanh nghiệp Việt Nam.* A mater's thesis at Trường Đại học Kinh tế Tp. Hồ Chí Minh.

Tejerina-Gaite, F. A., & Fernández-Temprano, M. A. (2021). The influence of board experience on firm performance: does the director's role matter? *Journal of Management and Governance, 25*, 685-705.

Vo, D., & Phan, T. (2013). Corporate governance and firm performance: Empirical evidence from Vietnam. *Journal of Economic Development, 7*(1), 62-78.

Waldo, C. N. (1985). *Boards of directors: Their changing roles, structure, and information needs*. Praeger .

Wellalage, N. H., & Locke, S. (2013). Corporate governance, board diversity and firm financial performance: new evidence from Sri Lanka. *International Journal of Business Governance and Ethics, 8*(2), 116-136.

Wu, M.-C., Lin, H.-C., Lin, I.-C., & Lai, C.-F. (2009). The effects of corporate governance on firm performance. *Changua: National Changua University of Eductaion*.

Yusoff, W. F. W. (2010). *Characteristics of boards of directors and board effectiveness: a study of Malaysian public listed companies.* A doctoral dissertation in Governance Research Programme. Victoria University.

Zelechowski, D. D., & Bilimoria, D. (2004). Characteristics of women and men corporate inside directors in the US. *Corporate governance: an international review, 12*(3), 337-342.