



## The composition of the board of directors and the structure of capital in banks in the Tehran Stock Exchange

**MOHSEN KOSARI \***

Email: [mohsen.rabin@yahoo.com](mailto:mohsen.rabin@yahoo.com)

*Original Article:*

Received 2 September, 2018 Accepted 5 September, 2018 Published 26 Sep. 2018

### ABSTRACT

The purpose of this study was to investigate the effect of composition and structure of the board of directors and its characteristics on the structure of capital in banks. The spatial domain of this research is the companies accepted in the Tehran Stock Exchange and the domain of the years 2012 to 2017. The present research is in applied research. If the classification of types of research based on the nature and method is considered, the method The present research is essentially a descriptive research and is considered as a correlation in the research field. In this research, library method was used to collect data and information. In the research data section, we collected data from sample companies by referring to financial statements, explanatory notes and monthly stock exchange of the Stock Exchange. Based on the systematic elimination method, 134 companies were selected as the statistical sample. Descriptive and inferential statistics were used to describe and explain the collected data. In order to analyze the data, pre-test variance analysis, F lemma test, Hausman test and Jarck test were used. Then, multivariate regression test was used to confirm and reject the research hypotheses (EViews software). The summary of the research results showed that the ratio of non-executive directors and gender composition of the board of directors does not affect the structure of capital in banks, and the size of the board affects the structure of capital in banks. The financial expertise of the members of the board affects the structure of capital in banks.

*Key words:*

*Composition and structure of the board of directors, capital structure, banks*

*\*Corresponding author: KOSARI*

Peer review under responsibility of **UCT Journal of Management and Accounting Studies**

**Introduction:**

Creating value and increasing shareholder wealth in the long run are among the most important goals of the company. Maximizing the value of companies requires the implementation of profitable projects by them. The implementation of profitable projects also requires financing. Existing strategies to capitalize on corporate capital structure are effective. Choosing the type of financing, whether new shares or borrowing, on the desired structure of capital and capital structure also affect the total value of the company. In order to optimize the capital structure of companies, understanding and understanding of their various financial resources and the costs incurred to provide various financial resources is important for corporate finance managers in order to decide on financing to maximize company value (Mehrani and Rasayeian 1393). The structure of corporate capital plays a decisive role in investment decisions. Some previous studies indicate the relationship between financial leverage and factors such as stock returns, return on assets, size of a company, market value ratios to book value of equity and net worth, machinery and equipment of a company (Wadey et al., 2012). Theories of capital structure state that managers of companies with proper growth opportunities should choose less leverage, because if they increase their external debt, they will not be able to use the benefits of their investment opportunities, resulting in a negative relationship. There is a future growth and leverage, since managers with high growth opportunities will choose a low leverage. Such results can be found in regressions that control growth opportunities.

**Theoretical Foundations**

One of the main decisions of financial managers in public corporations is to determine the composition of debt and equity, which should be made in order to maximize shareholder wealth (Vend, 2016). The traditional view of capital structure was based on the theory that leverage could increase the value of a company. But the start of the modern views of capital structure can be seen from Modigliani and Miller's earlier paper, which stated that, under certain circumstances, the value of a company is independent of the structure of capital (Georg et al., 2016). In fact, the cost of capital is the rate at which the projects are discounted or rejected, and the life of the organizations depends on the selection and implementation of profitable projects. Of course, the structure of an organization's capital can affect other organizations, such as investment companies, banks, etc., as the life of these organizations also depends on how they can fund other organizations and earn money through it. And thus survive (Jin Yu and Zen Dongli, 2016). Companies need financing to build, carry out projects and save lives. The financing needed to carry out future plans of the company or to improve the company's financial structure can be from the place of debt or equity (Faurer et al., 2015). Capital structure is a very important issue. In fact, deciding on the use of various financial resources and identifying the optimal capital structure that maximizes the wealth of shareholders, one of

the most important issues that managers always face is that companies can meet their financial needs. From different sources, each with its own cost. Capital structure policy establishes a balance between risk and returns.

On the one hand, the use of more debt increases the risk of corporate profitability and, on the other hand, leads to more expected returns (Zhao and Zhou 1, 2015). Organizations decide for their own decisions in terms of their abilities and limitations, as well as other factors and constraints in the outside world. However, they are faced with the problem of choosing the optimal capital structure and they can not quickly adapt themselves to changes. Various factors to adapt (ISAA and Ben 2015). Unfortunately, this non-adaptation of capital structure changes by changing other factors in Iranian companies is more severe than other countries, and this has led to a capital structure and, consequently, a non-optimal cost of capital, thereby increasing the costs and disadvantages of Iranian companies and reducing their ability to compete with International companies have arrived (Evino and Ben Yukajbou 3, 2014).

The capital structure is attributed to how the various financial resources of a company are reflected on the left side of the balance sheet. Today, companies are expected to see the ratio of debt to equity. Provide a good situation (Behbahani and Nourbakhsh, 1395). Determining the capital structure is one of the most important issues that financial managers face in reaching their financial goals. Companies always seek to maximize the value of a company by determining the best combination of capital structure (Yahyai, Shahmiri, 1395). The rate of adjustment and capital structure changes in firms with poor corporate governance is more than firms with strong corporate governance (Zoorhi and Abadi, 1394). Organizations in different situations choose different capital structures, they sometimes choose cost-effective and low-risk methods of low cost and risky methods (Hejazi et al., 1394). The timely mismatch comes from not knowing the relationship of other variables with the structure of capital. How the company finances the funds needed to sustain its operations ultimately shapes the corporate structure of the company.

Capital structure and earnings quality are two important issues in financial and accounting discussions. Considering these two issues can be a great deal of aid for investments, in which the capital structure is always considered as an internal factor affecting the stockholders' wealth. (Alam al-Hadi et al., 2014).

Many studies sought to explain the capital structure used by large banks to finance their investments. A leading line of research, The Hierarchy of Myers (1984) and Myers and Maglev (1984). This theory argues that, because of the unfavorable choices of choice, banks have the priority in using their finances. The theory predicts that banks prefer to use accumulated surplus over debt, short-term debt over long-term debt and debt over equity. This hierarchy results from the asymmetry of information between managers and foreign investors. This study is based on hierarchical

theory and analysis of the impact of board composition on the structure of bank financing resources. We assume that a more independent and effective board of directors will lead to an increase in the quality and quantity of information provided by internal factors to the general public and thus to reduce the cost of unfavorable choices according to the hierarchy theory. To test this hypothesis we analyze And analysis of the impact of the Board of Directors on the structure of various sources of financing. In other words, the research question examined here, asks whether the composition of the board affects the structure of financial resources, or not. Given the less information asymmetry results in less use of accumulated profits, the impact of a more independent board of directors on equity use can be difficult to assess because the accumulated interest is considered as part of the bank's equity.

In order to address this issue, the present study analyzes the effect of board composition on foreign stock and the production of domestic stocks (accumulated profits). In addition, the hierarchy predicts that if debt is needed to provide capital, then the bank should use short-term debt instead of long-term debt, we will accumulate financing resources for the bank, short-term debt and debt Long-term separation. Subsequently, we analyzed the relationship between the composition of the board of directors and the structure of each of these sources of funding. After controlling a broad set of control or control variables, the results of empirical research supported the hypotheses presented. In particular, it has been determined that the ratio of independent directors to the board has a positive relationship with the ratio of external financing. In addition, the independence of the board of directors also has a positive relationship with the debt structure consisting of longer-term debt than short-term debt. In addition, banks with more independent directors have a capital structure consisting of more external shares of long-term debt. The results also provide evidence that more gender diversity is the board of directors and where the non-executive director can lead the company to a capital structure of longer-term financing sources. These results are robust and robust for a number of robust specifications and tests. This study leads to the expansion of empirical work on the impact of corporate governance on capital structure in three main ways. First, the focus of the present study is on certain attributes of the board structure, namely the total number of independent directors, the fraction or ratio of female executives, the size of the board of directors and, if it is also the chief executive officer or chief executive officer of the board of directors. This centralized analysis is important because many cumulative indicators may include governing bodies that are both for the benefit of both shareholders and the benefit of bondholders, which are considered as counter-take-holders (Bradley and Chen, 2011).

Secondly, since hierarchy theory has different empirical consequences in relation to different types of financing sources, this study analyzes the impact of the board structure on the ratio of accumulated profits, foreign stocks, short-term debt and long-term debt. Finally, this

study introduces new insights into capital structure design and adds to the theory of capital structure.

**In this research, we seek to answer this question:**

- Is the ratio of non-executive directors to the bank's structure of capital?
- Does the size of the board affect the structure of capital in banks?
- Is the composition of the board's gender affects the structure of capital in banks?
- Is the financial expertise of the members of the board of directors affected the structure of capital in banks?

**The research hypotheses are as follows**

- The ratio of non-executive directors to the board affects the structure of capital in banks.
- The size of the board affects the structure of capital in banks.
- The gender composition of the board affects the structure of capital in banks. - The financial expertise of the members of the board affects the structure of capital in banks

#### **research method**

The most difficult step in the research process is to identify the issue under study. First, there is doubt about one thing, an obstacle or a vague position, which is a doubt that needs to be determined. In each research, the type, nature, objectives and scope of research must first be determined in order to be able to use the appropriate rules and means Credible facts to realities (Hejazi et al., 2002).

Therefore, the present study is categorized based on the purpose, the type of applied research and then the event. The applied research is the development of applied knowledge in a particular context. Also, the present study is descriptive and correlational in terms of method and nature of research. Descriptive because its purpose is to describe the conditions or phenomena under examination, and to better understand the existing conditions of the relationship, due to the relationship between the variables in this study. The present study seeks to examine the relationships between variables and to prove this relationship in the current situation based on historical data. After the event, the event is used when the investigator examines the issues before the event.

#### **Community and Statistical Information**

The statistical population is all elements and individuals who have one or more common attributes on a specific geographic scale. The smaller the statistical society, the more accurate it can be to study a larger statistical society. The statistical population of the present study is banks and financial and credit institutes accepted in Tehran Stock Exchange. In a 5-year period, from 1391 to 1395, the statistical population is the research. The research sample is as follows:

### sampling method and statistical sample size

**Table 1-1 - Restrictions imposed on banks**

Number	Description of the restriction	Row
32	Total number of banks and financial and credit institutions and before restrictions	1
(4)	The end of their fiscal year was not the end of March each year.	2
(3)	Banks that changed their fiscal year during the period under review.	3
(5)	The information of the variables studied was not available in all the years tested.	4
<b>20</b>	<b>Total balance of remaining banks</b>	

Due to the limited statistical population, the sample selection criterion for this research is based on the cyclic sampling method and hence, 20 banks and financial and credit institute were selected as samples.

#### **Background of internal investigation**

Khajavi et al., 1397, in a research entitled *The Effect of Ethical Hazards on Capital Structure*. According to the hierarchical theory, companies, when they need resources, usually rely on capital due to information asymmetry, and rely on debt. Ethical hazards are a kind of information asymmetry, and on this basis, it is expected to be related to the structure of capital. The current research aims to investigate the effect of moral hazard on the structure of capital. The results of the research show that moral hazard has a significant negative effect on capital structure and control variables modify the negative effect of moral hazard on capital structure.

Fakhari and Fasayeh (1396) investigated the impact of family ownership on the capital structure of companies accepted in the Tehran Stock Exchange in a study entitled *"The Impact of Family Ownership on Capital Structure."* The results of this research show that family ownership has a positive and significant effect on the capital structure of the companies under study. Also, growth and development have a positive and significant moderating effect on the relationship between family ownership and corporate capital structure in the Iranian capital market. In Sinny (1395), in a study entitled *"Factors Influencing Financial Leverage"*, we examined the factors affecting the size of the use of financial leverage in public corporations. For this purpose, financial information about 88 companies was investigated in two periods of time. After analyzing the information using various statistical methods, it was determined that the hypothesis of direct relationship between size and financial leverage is confirmed only in some industries.

Vahediy Naghayi et al. (1394) in his research entitled *"Investigating internal and external factors affecting capital structure using fuzzy decision tree methodology"*, using fuzzy decision tree methodology to study the impact of economic and corporate variables On the structure of capital of the companies accepted in the Tehran Stock Exchange. After reviewing the literature and theoretical foundations, 31 key factors affecting the capital structure were identified and measured using 22 variables. The financial information of the companies was used to measure the variables of the research. As a result of data analysis using the classification algorithm, a model of relations between the capital structure and the factors affecting it was created and presented. The model consists of 1 pattern and according to the results, five factors of liquidity, profitability, size of the company, level of collateral of assets and middle leverage of industry from the level of importance are more than one percent. Also, the results of the research indicate the importance of the company's internal factors towards outsourcing factors. Among the factors inside the company, liquidity and profitability factors were more important than other factors.

#### **Background of foreign research**

Olahe et al. (2017), in an article entitled *"Factors Affecting Capital Structure and Its Impact on the Maturity of Debt of Textile Industry Companies"*, investigated the factors affecting capital structure. According to their analysis, the results of the research indicate that growth opportunities have no meaningful relation to the maturity of debt. On the other hand, the company's profitability and lifetime are affected by the structure of the capital structure and the maturity of the debt. Chris and George 2 (2017) in their research entitled *"Audience Reputation, Profit Management and Capital Structure"*

They examined the influence of auditor's reputation on the management of profits and capital structure in banks. Using the linear regression model, their results showed that auditing size and auditor's expertise in the industry significantly affected the management of profits and capital structure of banks.

Sediq et al. (2016) investigated business variables such as asset structure, flexibility, risk, and state ownership in their article entitled "Factors Affecting the Capital Structure of Iranian Companies". The method and approach of this research was to examine the different conditions of capital structure theories. They used the standard least squares method and data panel econometrics, such as fixed and accidental effects for their research. The results of the research showed that flexibility, company size, profitability, growth opportunities, liquidity and risk on capital structure Tehran Stock Exchange has a significant impact on capital structure.

The operational definition of variables and how they measure them

The most important and useful way to classify variables is to divide them into independent, dependent and controllable variables.

The dependent variable is a variable that the investigator intends to describe or predict its variability. An independent variable is a characteristic and property whose effect on the dependent variable is investigated by the researcher. The control variable is also a variable that is considered for the purpose of distinguishing the effect of the independent variable on the dependent variable from the effect of other variables (Khaki, 2008).

This type of classification is very useful and valuable due to its general application, simplicity and special importance in conceptualizing and designing the research as well as providing a report on its results

### 3-9-1- Research variables:

#### Independent variables:

Board size (BDSIZE<sub>it</sub>)

Measurement method: number of board members (Chen et al., 2016).

Gender Combination on the Board (FEM<sub>it</sub>)

Measurement method: The number of female members on the board (Chen et al., 2016).

Financial Aid Management Board (AACC)

The financial expertise of the board of directors equals the number of board members with financial knowledge (Paroti et al., 2017).

The ratio of non-executive directors to the board (bindit)

Which consists of dividing the number of non-executive members of the board of directors into the entire board of directors. For the non-executive member of the board of directors, a member who has no executive position in the company.

#### The dependent variable:

Capital structure structure

Capital structure: Debt to total assets of company *i* in year *t* (Sediq et al., 2016).

Control variables

In this study, the company's specific features include size, financial leverage as control variables.

-Firm Financial: The financial leverage is obtained by dividing the total debt of the company into the total assets. Jensen (1986) showed that a high level of debt would create representation issues. We used the total debt sharing on the book value of equity as a debt ratio. (Kurdistan et al., 1391).

The size of the company: The size of the company is obtained through the natural logarithm of the market value of the company. (Yegane et al., 2008).

Growth opportunities (sagr)

Is the condition and conditions that can be converted to profit (Sediq et al., 2016).

Profitability (prof)

The ability of the company or institution to generate enough income so that after paying the current costs, an additional amount will remain in the name of profit for the company (Sedig et al., 2016).

### 3-9-2- Research Model:

#### Model 1 for hypothesis 1

$$\text{capital structure}_i(i, t) = \alpha_0 + \alpha_1 \text{bindit} + \alpha_2 \text{sizeit} + \alpha_3 \text{levit} + \alpha_4 \text{sagrit} + \alpha_5 \text{profit} + \epsilon_{it}$$

#### Model 2 for hypothesis 2

$$\text{capital structure}_i(i, t) = \alpha_0 + \alpha_1 \text{BDSIZEit} + \alpha_2 \text{sizeit} + \alpha_3 \text{levit} + \alpha_4 \text{sagrit} + \alpha_5 \text{profit} + \epsilon_{it}$$

#### Model 3 for hypothesis 3

$$\text{capital structure}_i(i, t) = \alpha_0 + \alpha_1 \text{femit} + \alpha_2 \text{sizeit} + \alpha_3 \text{levit} + \alpha_4 \text{sagrit} + \alpha_5 \text{profit} + \epsilon_{it}$$

#### Model 4 for hypothesis 4

$$\text{capital structure}_i(i, t) = \alpha_0 + \alpha_1 \text{Aaccit} + \alpha_2 \text{sizeit} + \alpha_3 \text{levit} + \alpha_4 \text{sagrit} + \alpha_5 \text{profit} + \epsilon_{it}$$

#### Descriptive Statistics

In this section, data analysis has been done using central indicators such as mean, median, faces (model) and standard deviation indexes, skewness and elongation.

**Table 1: Descriptive statistics of research variables**

	Average	Middle	Maximum	At least	Standard deviation	Skidding	Elongation
Capital Structure	0.027185	0.021972	0.127248	0.000391	0.023459	1.782955	7.460773
Board size	5.040000	5.000000	7.000000	0.000000	0.601681	- 5.327477	51.84445
Gender composition on the board	-	0.000000	1.000000	0.000000	0.479372	0.628971	1.395604
The proportion of non-executive directors in the board	-	1.000000	1.000000	0.000000	0.319058	- 2.446307	6.984416
Financial expertise of the board	3.838710	5.000000	6.000000	0.000000	2.060447	- 1.108925	2.464899
size of the company	14.60427	14.11827	19.06638	11.85897	1.898899	0.866498	2.869721
Financial Leverage	0.623820	0.664182	1.648045	0.135578	0.263502	0.653540	4.808532
Growth opportunities	0.165940	0.139883	0.487586	0.019748	0.120652	0.674763	2.457308
Profitability	0.125850	0.110226	0.455344	- 0.171415	0.123513	0.507093	3.387225

The average of the capital structure variable is 0.027, which indicates that most data are concentrated around this point. Middle is another central indicator that shows the state of the community. As the results show, the average of the capital structure variable is 0.021, which indicates that half of the data is less than this amount and the other half more than this value. Standard deviation is one of the most important parameters of dispersion and is a criterion for the amount of dispersion of observations from the mean; the highest value of this parameter for the capital structure variable is 0.023.

#### Statistical tests

As discussed above, the F-lemmmer test and, if necessary, the Hausman test are used to estimate the best model using one of the common effects methods, fixed effects and random effects. The F lemmmer test was first used to choose between the compilation data and the panel data method and its hypotheses are as follows:

H0 = Consolidated data method

H1 = panel data method

Test result		The significance level	Degrees of freedom	Test statistic
<b>Model 1</b>	<b>Panel</b>	<b>0.0253</b>	<b>(19,75)</b>	<b>1.182302</b>
<b>Model 2</b>	<b>Panel</b>	<b>0.0088</b>	<b>(19,75)</b>	<b>1.333841</b>
<b>Model 3</b>	<b>Panel</b>	<b>0.0231</b>	<b>(19,75)</b>	<b>1.421017</b>
<b>Model 4</b>	<b>Panel</b>	<b>0.0183</b>	<b>(19,68)</b>	<b>1.396887</b>

To fit between the two types of estimation patterns (compilation and panel), we first fit the Flemmer test. In compilation data, it is assumed that the width of the originals is equal. And in the panel pattern it is assumed that at least one of Originals are different with the rest. In the Flemmer test, if the hypothesis is not rejected, we use a combined pattern for fitting the data. Considering that the P-value obtained from the F lemmmer test in research hypotheses is less than 5%, in order to estimate these models, the panel data model will be used. The complete results of this test are shown in the appendix at the end of the thesis.

#### 4-4 Test Husman

After it has been determined that there are heterogeneous sections and individual differences can be considered and the combination data method is suitable for estimating the research model, it should be determined whether the estimate is due to a change in the sections or that over time has happened. The method of taking such errors is used with two fixed effects and a random effect. In the Hausman test, its zero hypothesis is based on the randomness of estimated errors, the results of which are reflected in the table below.

**Table 3 - Hausman test for determining the static or random effects model**

Significance level	Degrees of freedom	Amount of test statistic	Test statistic	Test type
0.0378	5	5.322332	The statistics	Hausman test
0.0348	5	2.577143	The statistics	Hausman test
0.0481	5	2.687121	The statistics	Hausman test
0.0432	5	4.401188	The statistics	Hausman test

\* 5% error level

According to the results of the test (Hausman), the probability is less than 5% and therefore the fixed effect method should be used in the regression model.

**Maneuvering test:**

Significance level	The statistics	Variable name
0.0051	-4.1515	Board size
0.002	-6.6815	Gender composition on the board
0.006	1.7484	The proportion of non-executive directors in the board
0.001	-7.4613	The proportion of non-executive directors in the board
0.004	5.1623	size of the company
0.009	2.3714	Financial Leverage
0.003	8.1378	Growth opportunities
0.0006	-3.8177	Profitability

According to the above table, since the significance level of all variables is less than 0.05, the null hypothesis based on nonstationary variables is rejected for all variables and all variables studied are mana-level.

**- The first hypothesis**

H0 = The proportion of non-executive directors in the board does not affect the structure of capital in banks.

H1 = The ratio of non-executive directors to the board affects the structure of capital in banks

**Test of research hypotheses**

Significance level	Statistics t	Estimated deviation	Estimated coefficients	Variable name
0.1135	-2.518960	0.012248	-0.030853	The proportion of non-executive directors in the board
0.2406	-1.180914	0.001334	-0.001576	size of the company
0.1689	1.386328	0.009287	0.012874	Financial Leverage
0.4440	0.768619	0.020253	0.015567	Growth opportunities
0.6049	0.519182	0.019741	0.010249	Profitability
0.0079	2.713985	0.021890	0.059409	C
Significance level	F statistics	Adjusted coefficient of determination	The coefficient of determination	Dorbin - Watson
0.000714	0.673933	0.431185	0.480115	1.615857

According to the camera statistics table, Watson is 1.8, indicating that there are no correlations due to errors, which range from 1.5 to 2.5. The adjusted adjustment coefficient of this test is 0.35, which indicates that the

independent variables in the present model can predict 35% of the variation of the dependent variable. Due to the significance of F statistics at 1% error level, it can be said that the research model is statistically significant and

appropriate. The coefficient of estimating the variable of the ratio of non-executive directors in the board of directors to the capital structure is -0.030853, and because the significance level of the t-test statistic is higher than the error rate of 5%, it can be 95% confident that the relationship between the ratio of non-executive directors The director rejects the structure of capital

### Second hypothesis:

H0 = The size of the board does not affect the structure of capital in banks.  
H1 = The size of the board affects the structure of capital in banks

Significance level	Statistics t	Estimated deviation	Estimated coefficients	Variable name
-0.0062	2.801696	0.004264	-0.011947	The proportion of non-executive directors in the board
0.4579	-0.745347	0.001304	-0.000972	size of the company
0.2792	1.088322	0.009140	0.009948	Financial Leverage
0.7165	0.364184	0.020074	0.007311	Growth opportunities
0.5509	0.598625	0.019628	0.011750	Profitability
0.3062	-1.028765	0.029511	-0.030360	C
Significance level	F statistics	Adjusted coefficient of determination	The coefficient of determination	Dorbin - Watson
0.000048	1.943736	0.345495	0.393702	1.788711

According to the camera statistics table, Watson is 1.8, indicating that there are no correlations due to errors, which range from 1.5 to 2.5. The adjusted adjustment coefficient of this test is 0.39, which shows that the independent variables in the present model can predict 39% of the variation of the dependent variable. Due to the significance of F statistics at 1% error level, it can be said that the research model is statistically significant and appropriate. The coefficient of estimating the size of the board of directors on the capital structure is -0.011947, which indicates that there is a negative and inverse relationship between the size of the board of directors and

the capital structure, that is, the size of the board of directors decreases the capital structure. Because of the significance level of the independent variable t of the t-test, the error rate is 5% lower, the 95% confidence can be confirmed by the effect of the size of the board on the structure of capital.

### Third hypothesis:

H0 = The gender composition of the board does not affect the structure of capital in banks.  
H1 = The gender composition of the board affects the structure of capital in banks.

Significance level	Statistics t	Estimated deviation	Estimated coefficients	Variable name
0.8519	-0.187252	0.005301	-0.000993	The proportion of non-executive directors in the board
0.4603	-0.741421	0.001361	-0.001009	size of the company
0.2972	1.048201	0.009860	0.010335	Financial Leverage
0.5746	0.563326	0.021397	0.012053	Growth opportunities
0.7570	0.310374	0.020399	0.006331	Profitability
0.0993	1.664485	0.019839	0.033021	C
Significance level	F statistics	Adjusted coefficient of determination	The coefficient of determination	Dorbin - Watson
0.000085	0.352166	0.333826	0.418388	1.605577



The estimated coefficient of gender composition of the board of directors on the capital structure is -0.000993, and because of the significance level of the t independent variable of the research, the level of the error is 5% lower, it can be confident that 95% of the effect of the gender composition of the board on the structure of capital Rejected.

**Fourth hypothesis:**

H0 = Financial expertise The members of the board of directors do not affect the structure of capital in banks.

H1 = Financial expertise The members of the board of directors have an impact on the capital structure of banks.

Significance level	Statistics t	Estimated deviation	Estimated coefficients	Variable name
0.0278	0.090860	0.001239	0.000113	The proportion of non-executive directors in the board
0.3061	-1.029441	0.001410	-0.001452	size of the company
0.1472	1.462615	0.010891	0.015930	Financial Leverage
0.4220	0.806849	0.021656	0.017473	Growth opportunities
0.5267	0.635595	0.022214	0.014119	Profitability
0.1166	1.584945	0.021937	0.034770	C
Significance level	F statistics	Adjusted coefficient of determination	The coefficient of determination	Dorbin - Watson
0.004623	0.686897	0.317311	0.337978	1.553937

According to the camera statistics table, Watson is 1.5, indicating that there are no correlations to the errors because they range from 1.5 to 2.5. The adjusted test coefficient of this test is 0.33, which indicates that the independent variables in the present model can predict 33% of the variation of the dependent variable. Due to the significance of F statistics at 1% error level, we can say that the research model is statistically significant and appropriate.

The coefficient of estimation of the financial expertise of the members of the board of directors on the structure of capital is 0.000113, which shows that there is a positive and relevant relationship between the financial expertise of the members of the board of directors on the structure of capital, that is, the financial structure of the capital increases with increasing financial expertise of the members of the board of directors. . Due to the fact that the t-test statistic t of the independent variable of the research is lower than the error level of 5%, it can be verified with 95% confidence that the financial expertise of the members of the board of directors affects the structure of capital.

**Comparing the results of this study with other research**

The result of the test of the first hypothesis of the research: The ratio of non-executive directors to the board of directors affects the structure of capital in banks. However, according to Van and colleagues 2002, Berger et al., 1997 and April 2007, and the role of non-executive directors as independent individuals in reducing agency issues, There was a significant relationship between the percentage of unauthorized members of the board of directors and the structure of capital. Possible reasons for this can be

internal and external variables such as industry type, company life cycle, different countries, different perceptions in research and conflicting views on the involvement of the board of directors in decision making. Another reason for boogers is the lack of independence of non-executive directors to exercise their supervisory role.

Test result The second hypothesis of the research: The size of the board affects the structure of capital in banks.

The analysis of the coefficients of the regression model showed that there is a negative and significant relationship between the size of the board and the structure of the capital. The existence of a negative relationship shows that companies with fewer members of the board of directors, due to the weaker structure of management, should use more debt to deal with agency issues. In this regard, the results of the present study are consistent with the findings of Berger et al. 1997 and contradict the findings of Van et al., 2002 and April 2007.

Test result The third hypothesis of the research: The gender composition of the board affects the structure of capital in banks. With the findings of the research, Khodadadi and colleagues, 2012 are consistent.

Test result The fourth hypothesis of the research: The financial expertise of the members of the board of directors affects the structure of capital in banks is consistent with the findings of Khadadadi et al., 2012.

**Suggestions based on research results**

- Emphasis on the importance of some of the board's features such as the size of the board of directors and the dichotomy of the CEO's role as factors affecting the capital structure of companies by the Stock Exchange and investors

- Establishing the necessary grounds for the presence of unauthorized members in the board of directors of the banks independently and efficiently.
- Companies are encouraged to disclose the scientific and empirical evidence of company directors through the bank's website so that beneficiaries can use this information and the stock exchange can play an important role in this regard.

**Suggestions for future research**

- It is suggested to examine the effect of the composition and structure of the board of directors and its characteristics on the structure of capital in bourse and counterpart companies.
- Check other features of the board.
- It is suggested that the industry's moderating variable should be considered for this relationship