The Relationship between Risk Management and Board Structure of Accepted Firms in Tehran Stock Exchange

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Abstract

This research investigates the relation between risk management and management executive board of the firms accepted in Tehran stock exchange. The research statistical population include managers and management board of the firms accepted in Tehran stock exchange which 216 persons were chosen as Cochran formula as statistical sample. Data gathered with verified questionnaire. Data was analyzed with SPSS18, LISREL8.7 two descriptive and deductive levels by means of Pierson correlation coefficient. Questionnaire validity was calculated with α-Cronbach (0.921& 0.924, respectively for both management board and risk management). The entire hypothesis was affirmed by 0.05 confidences. The result show there is significant relationship between risk management (coefficient 0.94) and management board. Among the determined aspects, legal aspects, (coefficient 0.94) had the highest effect on management board.

Key words: Risk Management, Board Structure, Accepted Firms, Tehran Stock Exchange

Introduction

According to definition of Hasas Yeganeh and Baghumin(Hasas Yeganeh, 1385): “Corporate governance, is including of rules and regulations, structures, processes, cultures and systems that causes achieving to the objectives of responsiveness(Accountability), transparency, justice and the rights of stakeholders. “The basic fundamental emphasis of corporate governance is focused on the corporates strategies issue and rights of stakeholders and thereafter with newer perspectives, trends toward serious attention to the rights of all stakeholders and society. In corporate governance, its goal, having of an effective and efficient board of director and achieving to this goal, requires to evaluate of the board of director characteristics (Particularly desirable).In this state, this question is put forward that whether to be different of the board of director characteristics of companies can be effective in the report properties of the independent auditors? By achieving to answer this question can to improve the company performance, implements the appropriate measures and to guide the stakeholders towards to the selection of the desirable board of director.

Research Problem

The facts indicate that in the companies, managers are more seeking of their self-interested rather than the beneficiaries’ interests. For solve of this problem, there is two solution: First solution is to encourage managers towards of the expected behavior performance, to be considered rewards for them, second solution, the empowerment of the board is so that can to have the merit control over the managers performance. The increase in awareness and knowledge gives to the board the possibility of decision-making and creates positive impact the supervisory (Governance) structures and the company’s control environment. It is probable that auditors respect to the managers boards that participate actively in risk management. Instead, it reduces this similarity that the uncontrolled trade risks leads to unexpected losses, validity (Credit) damages and or strategic withdrawals. In addition, the companies take apart in risk management activities, not only have the ability to identify and prevent of fraud, but also makes to promote of their financial report quality. The activities and researches that have been conducted recently, implies to this that the auditing committee is fully aware of the increasing involvement of the risk management, but there is guess and assumption about powerful challenges which the auditing committees can provide for profitability of risk management. Therefore, the following discussion supports of the risk management role to help with strengthen to internal control system of a company. The board’s directors that establish a self-sufficient committee that merely focus on their risk management performance, are seeking to prove its commitment to promote reform of their companies cooperative control structures. On this basis, the most manifest issue in the present research is to evaluate of the relationship between the risk management and board of directors structures in the accepted companies of Tehran Stock Exchange.
The importance and necessity of research

In general, the previous studies confirm that lack of dependency and freedom of the board from the management, among other things, provides most effective control for company activities. The risk management has been paid attention of the boards committees. The risk management committee, financial management or the board of auditing are considered on the whole, the risk management. This study deals with a general attitude in along with risk management and research works related to cooperative, Participation control. This study is not only in effort to achieving to the factors relevance to organizing parameters of a risk management committee, but also it deals with to present viewpoints in relation to the organizational environment that where the companies requires to the formation of an auditing committee and acceptance announcement of internal control. In the end, while the companies are required to the formation and establishment of an auditing committee, in relation to stabilization of the other board committee, such as risk management committee that do not declare any similar requirement.

Literature review

Kalibaf and Rezaei (1386) are examined the impact of board composition over the accepted companies performance in Tehran Stock Exchange. The sampling study results includes of 72 companies during of 1382 to 1384 years, it was indicate that there is not the significant relationship between the board irresponsible members and the company performance. ASadeghpooor and et al (2006) have done a research entitled of "The evaluation factors and the new standards of boards of directors ". In this paper, based on extensive and accurate researches, deal with description of 12 new standards for boards of directors. Thus, we have attempted to consider these standards, so that they are adaptable with the board situation inside of country. Then according to these standards, to measure of the boards' performance, the questions have been raised in the different groups that their response will show the set of performance assessment scores. The board of directors by using of this assessment model can to measure of their future and past performance. This set of standards, can be the basis path of development and progress of the board committees in future. Lasfer (2006) paid to study of the interrelationships between managerial property and the board composition. The sampling study results, includes of 1583 British firms during the period of 1996 to 1997, was indicate of the corporate governance mechanisms, such as the separation of general manager role and chief of board of directors, the percentage of board irresponsible members, have the significant relationship and strong negative with the managerial property. Yon and al (2007) have tested the effective factors on the boards composition of American companies, by using of general three hypotheses, include of the operation hypotheses, control hypotheses and dialog hypotheses. The sampling study results includes of 1599 companies during of 1988 to 1992 years, it was indicate that generally, the expansion of company and variation in trade departments has the significant and positive impact on the size and independence of the board directors. Lee and et al (2009) have examined to study and determine of the size and the board composition of American companies. The sampling study results includes of 81 company during the years of 1995 to 2000, it was indicate that the company size and the growth opportunities, describe the major changes in size and the board composition, moreover the results showed that the merger of the firms and geographical development of company is considered as the important and effective variables in the size determinant. Patan and Eskoli (2010) have examined to study of internal structure of the American banks board of directors. The sampling study results includes of 1534 observation from 212 bank during the years of 1997 to 2004, it was indicate that bigger and varied of the banks activities, leads to increase the size of the board role, in irresponsible members and combinations role of the chief of the board and the general manager.

Research Purposes

Main Purpose

- To identify relationship between Board Structure and Risk Management

Minor Purposes

- To investigate relationship between Reputation Risk and Board Structure
- To investigate relationship between Credit Risk and Board Structure
- To investigate relationship between Strategic Risk and Board Structure
- To identify relationship between Liquidity Risk and Board Structure
- To identify relationship between Legal Risk and Board Structure
- To identify relationship between Market Risk and Board Structure
The Relationship between

Research Hypotheses

Main Hypothesis

- There is significant relationship between Board Structure and Risk Management accepted Firms in Tehran Stock Exchange.

Minor Hypotheses

- There is significant relationship between Reputation Risk and Board Structure
- There is significant relationship between Credit Risk and Board Structure
- There is significant relationship between Strategic Risk and Board Structure
- There is significant relationship between Liquidity Risk and Board Structure
- There is significant relationship between Legal Risk and Board Structure
- There is significant relationship between Market Risk and Board Structure

Research Conceptual Model

The concepts related to risk management and its various dimensions is influenced in organizations over the board structure. The forming logic of this framework based on concept of risk management influenced on the board structure is regarded as one of their effectiveness criterion on the board structure.

Figure 1: Research Conceptual model

Source: Yateam (2001) and Fartook zadeh (1388)

Subject Domain

In general, the subject domain of this research is about of investigation the relationship between risk management and board structure of Accepted Firms in Tehran Stock Exchange.

Time Domain

The time domain of this study is included of the second six months of year 1392 and the first six months of year 1393.

Research Methodology

The Research Method of this research based on in terms of objective is applied and in terms of descriptive research data gathering is based on correlation. In this research in terms of matrix analysis is based on correlation or covariance in which it has been used of structural equation modeling method.

In fulfillment of this research has been used of the field method and also in the research required data gathering has been used of referring to the available information in Tehran Stock Exchange organization site, the published DVD by Tehran Stock Exchange organization, as well as the available information in auditing organization, review of documents, financial statements and notes with for companies. For the information analysis and hypothesis test has used of regression analysis, and for the data analysis has been used of SPSS software.

Statistical Population

The statistical population in this research constitutes of the managers and the boards members of accepted companies in Tehran Stock Exchange,
That the number of 423 people are considered as the statistical population that using of Cocharan formula, about 201 people have been selected as the managers and the board’s members as the statistical sample.

**Sampling method and Sample approximate size**

In this study is used of the simple random sampling method. Since that the statistical population of this research, is the limited population, therefore is used of Cocharan formula (The limited population for sampling):

\[
n = \frac{N \times Z^2 \times P \times (1 - P)}{d^2 \times (N - 1) + Z^2 \times P \times (1 - P)}
\]

**Research Findings**

**Result of Research Hypotheses**

**Main Hypothesis**

- There is significant relationship between Board Structure and Risk Management of accepted Firms in Tehran Stock Exchange
- There is not significant relationship between Board Structure and Risk Management

H0: \( \rho = 0 \)

There is significant relationship between Board Structure and Risk Management

H1: \( \rho \neq 0 \)

Results of testing are shown in the following table 1.

<table>
<thead>
<tr>
<th>Board Structure</th>
<th>Pearson's correlation</th>
<th>Significance level</th>
<th>Number</th>
</tr>
</thead>
<tbody>
<tr>
<td>Risk Management</td>
<td>0.739</td>
<td>0.000</td>
<td>216</td>
</tr>
</tbody>
</table>

\( p < *0.01 \)

According to the above table results, since that the significance level is less than 0.01 and its result is that the hypothesis of H0 is rejected and the hypothesis of H1 is accepted. As it is observed, there is the direct and significant relationship between Board Structure and Risk Management at level of 99 percent and its correlation coefficient is equal to 0.739.

**Minor Hypotheses**

**First Minor Hypothesis**

- There is significant relationship between Reputation Risk and Board Structure
- There is not significant relationship between Reputation Risk and Board Structure

H0: \( \rho = 0 \)

There is significant relationship between Board Structure and Reputation Risk

H1: \( \rho \neq 0 \)

Results of testing are shown in the following table 2.
Table 2: Results of testing the Pearson’s correlation coefficient between Board Structure and Reputation Risk

<table>
<thead>
<tr>
<th>Board Structure</th>
<th>Reputation Risk</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pearson’s correlation</td>
<td>0.511</td>
</tr>
<tr>
<td>Significance level</td>
<td>0.000</td>
</tr>
<tr>
<td>Number</td>
<td>216</td>
</tr>
</tbody>
</table>

According to the above table results, since that the significance level is less than 0.01 and its result is that the hypothesis of $H_0$ is rejected and the hypothesis of $H_1$ is accepted. As it is observed, there is the direct and significant relationship between Board Structure and Reputation Risk at level of 99 percent and its correlation coefficient is equal to 0.511

Second Minor Hypothesis:

- There is significant relationship between Credit Risk and Board Structure
- There is not significant relationship between Credit Risk and Board Structure

$H_0: \rho = 0$
$H_1: \rho \neq 0$

Results of testing are shown in the following table 3.

Table 3: Results of testing the Pearson’s correlation coefficient between Board Structure and Credit Risk

<table>
<thead>
<tr>
<th>Board Structure</th>
<th>Credit Risk</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pearson’s correlation</td>
<td>0.574</td>
</tr>
<tr>
<td>Significance level</td>
<td>0.000</td>
</tr>
<tr>
<td>Number</td>
<td>216</td>
</tr>
</tbody>
</table>

According to the above table results, since that the significance level is less than 0.01 and its result is that the hypothesis of $H_0$ is rejected and the hypothesis of $H_1$ is accepted. As it is observed, there is the direct and significant relationship between Board Structure and Credit Risk at level of 99 percent and its correlation coefficient is equal to 0.574

Third Minor Hypothesis:

- There is significant relationship between Strategic Risk and Board Structure
- There is not significant relationship between Board Structure and Strategic Risk

$H_0: \rho = 0$
$H_1: \rho \neq 0$

Results of testing are shown in the following table 4.
Table 4: Results of testing the Pearson’s correlation coefficient between Board Structure and Strategic Risk

<table>
<thead>
<tr>
<th>Board Structure</th>
<th>Strategic Risk</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pearson’s correlation</td>
<td>0.660</td>
</tr>
<tr>
<td>Significance level</td>
<td>0.000</td>
</tr>
<tr>
<td>Number</td>
<td>216</td>
</tr>
</tbody>
</table>

According to the above table results, since that the significance level is less than 0.01 and its result is that the hypothesis of $H_0$ is rejected and the hypothesis of $H_1$ is accepted. As it is observed, there is the direct and significant relationship between Board Structure and Strategic Risk at level of 99 percent and its correlation coefficient is equal to 0.660

Fourth Minor Hypothesis:

- There is significant relationship between Liquidity Risk and Board Structure
- There is not significant relationship between Liquidity Risk and Board Structure

$H_0: \rho = 0$
$H_1: \rho \neq 0$

There is significant relationship between Board Structure and Liquidity Risk

Results of testing are shown in the following table 5.

Table 5: Results of testing the Pearson’s correlation coefficient between Board Structure and Liquidity Risk

<table>
<thead>
<tr>
<th>Board Structure</th>
<th>Liquidity Risk</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pearson’s correlation</td>
<td>0.658</td>
</tr>
<tr>
<td>Significance level</td>
<td>0.000</td>
</tr>
<tr>
<td>Number</td>
<td>216</td>
</tr>
</tbody>
</table>

According to the above table results, since that the significance level is less than 0.01 and its result is that the hypothesis of $H_0$ is rejected and the hypothesis of $H_1$ is accepted. As it is observed, there is the direct and significant relationship between Board Structure and Liquidity Risk at level of 99 percent and its correlation coefficient is equal to 0.658

Fifth Minor Hypothesis:

There is significant relationship between Legal Risk and Board Structure

$H_0: \rho = 0$
$H_1: \rho \neq 0$

There is significant relationship between Board Structure and Legal Risk

Results of testing are shown in the following table 6.
The Relationship between ...

Table 6: Results of testing the Pearson’s correlation coefficient between Board Structure and Legal Risk

<table>
<thead>
<tr>
<th>Board Structure</th>
<th>Legal Risk</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pearson’s correlation</td>
<td>0.732</td>
</tr>
<tr>
<td>Significance level</td>
<td>0.000</td>
</tr>
<tr>
<td>Number</td>
<td>216</td>
</tr>
</tbody>
</table>

According to the above table results, since that the significance level is less than 0.01 and its result is that the hypothesis of $H_0$ is rejected and the hypothesis of $H_1$ is accepted. As it is observed, there is the direct and significant relationship between Board Structure and Legal Risk at level of 99 percent and its correlation coefficient is equal to 0.732.

**Sixth Minor Hypothesis:**
There is significant relationship between Market Risk and Board Structure

$H_0: \rho = 0$

There is significant relationship between Board Structure and Market Risk

$H_1: \rho \neq 0$

Results of testing are shown in the following table 7.

Table 7: Results of testing the Pearson’s correlation coefficient between Board Structure and Market Risk

<table>
<thead>
<tr>
<th>Board Structure</th>
<th>Market Risk</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pearson’s correlation</td>
<td>0.596</td>
</tr>
<tr>
<td>Significance level</td>
<td>0.000</td>
</tr>
<tr>
<td>Number</td>
<td>216</td>
</tr>
</tbody>
</table>

According to the above table results, since that the significance level is less than 0.01 and its result is that the hypothesis of $H_0$ is rejected and the hypothesis of $H_1$ is accepted. As it is observed, there is the direct and significant relationship between Board Structure and Market Risk at level of 99 percent and its correlation coefficient is equal to 0.596.

**Conclusion**
All the case-study research hypotheses in this study (The primary and secondary hypotheses 1 to 6) are confirmed. Because of T path coefficient all variables are greater than 1.96, thus all the hypotheses are confirmed. It is observed that there is a significant relationship between risk management and its dimensions with the board structure. The results showed that the risk management with (0.94 ratio coefficient) has significant impact on the board structure. Among these dimensions, the legal dimension with (0.94 ratio coefficient) has the greatest impact on the board structure and liquidity dimension with (0.89 ratio coefficient) in the second rank, strategic dimension with (0.72 ratio coefficient) in the third rank, market dimension with (0.69 ratio coefficient) in the fourth rank, validation dimension with (0.54 ratio coefficient) in...
the fifth rank and at the end, reputation dimension with \(0.48\) ratio coefficient) in the sixth rank and has the lowest value impact on the board structure. As if by analysis of independent variables were determined, the legal risk with other risks, specially liquidity and strategic risk has high impact on the board structure, the issues such as the economic stability at macro level and the ability to get of international validity over these risks from one aspect leads to increase of these risks due to the economic sanction in short term. But in long term, this issue makes to apply of the local expertise people and it’s consequently, growth and dehiscence of the local talent and steps towards of self-sufficiency by these big companies.

References
6. C. Arthur Williams, Richardam Hinz, Risk management, translated by Davar Venus, Hojat allah Goudarzi, Negah Danesh publication, 1382.
12. Hasas Yeganeh, Moayeri Morteza, "Corporate governance, auditing and auditing committees, accountant publication, 1387; 200; 57-66