Int. J. Nonlinear Anal. Appl. 14 (2023) 1, 1547–1555
ISSN: 2008-6822 (electronic)
http://dx.doi.org/10.22075/ijnaa.2022.26792.3412

Provide a favorable model of corporate governance system to prevent companies from falling into the trap of money laundering and affect the decisions of respondents (people and their legal representatives)

Mojtaba Rezaei[a], Fardin Mansouri[b,*], Mehdi Faghani[b]

[a]Department of Accounting, Zahedan Branch, Islamic Azad University, Zahedan, Iran

[b]Department of Accounting, University of Sistan and Baluchestan, Zahedan, Iran

(Communicated by Mohammad Bagher Ghaemi)

Abstract

The purpose of this study is to provide a favorable model of a corporate governance system to prevent companies from falling into the trap of money laundering and effective on the decisions of respondents (people and their legal representatives). The research method is exploratory development. The statistical population of this study is Tehran capital market companies. The research period is from 2016 to 2016. From the statistical population of the research, 120 companies were selected as the sample size by the elimination method. In-house and extra-organizational mechanisms were used to lead the company. In this research, correlation tests and regression analysis, and Eviews software have been used to test the research hypotheses and determine whether they are significant or not. Findings showed that the results of testing the hypotheses indicate that the management system with good, average and poor performance has a significant effect on preventing companies from falling into the trap of money laundering and it can be concluded that corporate governance systems avoid companies from Getting caught in the trap of money laundering is effective and the main research hypothesis that states that corporate governance systems are effective in avoiding companies from getting caught in the trap of money laundering (money laundering) is confirmed.

Keywords: Corporate Governance, Money Making, Capital Markets, Respondent Decisions
2020 MSC: 00A71, 91B54

1 Introduction

In many companies, the company is managed by people other than its owners and shareholders. Separation of ownership from management causes problems in many companies [25]. Usually, the shareholders do not run the company themselves, but leave the control to professional managers who do the work on their behalf. The board of directors acts as a representative of the shareholders. Therefore, shareholders do not play an active role in the day-to-day management of the company. Managers, on the other hand, typically own less than 1 percent of a company's

*Corresponding author
Email addresses: mojtabarezaei60@yahoo.com (Mojtaba Rezaei), f.mansouri@acc.usb.ac.ir (Fardin Mansouri), faghani@acc.usb.ac.ir (Mehdi Faghani)

Received: February 2022 *Accepted:* April 2022

stock. Due to the separation of ownership from the management of companies, there is usually the possibility of a dispute between managers and shareholders. For this reason, the concept of corporate governance was coined in order to solve the problems arising from the separation of company ownership from its management.

Corporate governance is also called "business unit management" or "organizational management system". Corporate governance can be considered as a coherent structure of relationships that are established between shareholders, managers, stakeholders, and supervisors to ensure the interests of all owners and stakeholders. This concept is also effective in achieving a proper culture of accountability, and transparency in providing appropriate information and reporting. Corporate governance is one of the most common concepts in global trade terms and has been used since the 1990s in the advanced industrial countries of the world such as the United Kingdom, Australia, and some European countries. The concept goes back to a famous report called Kadbari, published in 1992, which placed great emphasis on establishing an internal control system and appointing an internal audit committee. Subsequently, financial scandals at companies such as Enron, Worldcom, and Ajib led to stricter procedures for monitoring the performance of organizations and companies, first in the United States with the passage of the Sarbinzaxel Act in 2002 and then in other countries with similar laws. Get started. In Iran, this issue was raised in 1982 and measures have been taken by the Tehran Stock Exchange to strengthen the principles of corporate governance [10].

Ponzi trades are trades in which the share of investors' profits is paid not through the acquisition and distribution of real profits but through the attraction of new capital. Iran's housing and manufacturing market has been in a complete slump for several years, and many borrowers are unable to repay the principal and interest of their loans [6], but banks continue to attract deposits with interest rates above 20%. they give. Now the question is, if housing and production are in recession, how can banks pay these interest rates? In this regard, the purpose of this study is to provide a favorable model of a corporate governance system on financial variables to prevent companies from falling into the trap of money laundering and affect the decisions of respondents (people and their legal representatives).

2 Corporate governance system

One of the important issues that have been considered by researchers due to widespread financial scandals in recent decades and have been raised as one of the important issues for investors is the issue of corporate governance system that examines the need to monitor the management and separation of economic units from ownership and ultimately protect investors' rights. And pays the beneficiaries. The corporate governance system is a set of relationships between shareholders, managers, and auditors of the company that ensures the establishment of a control system in order to respect the rights of shareholders and the proper implementation of general assembly resolutions and prevent possible abuses [7]. This law, which is based on the system of accountability and social responsibility, is a set of duties and responsibilities that must be performed by the company to ensure accountability and transparency. The ultimate goal of the corporate governance system is to achieve the following four: 1- Accountability 2- Transparency 3- Justice 4- Respect for the rights of stakeholders. A corporate governance system is a supervisory system to protect the rights of stakeholders, this system takes steps in this direction through transparency and correct implementation of corporate financial statements [11]. The corporate governance mechanism can ensure the following:

1) Efficient and effective use of resources in the company, 2) Observance of all laws and regulations, especially the rules that govern the company's affairs and financial reporting process, 3) Continuous improvement of company performance through planning for optimal management of education and consumption of resources, 4) Proper accountability of the board of directors and managers and effective fulfillment of their responsibilities in achieving the goal of creating value for shareholders and 5) building the necessary trust in the company's activities by establishing fair communication between the company, shareholders and the community on a large scale [18].

These days, as the national currency depreciates, people are looking for a way to make up for lost capital. On the other hand, swindlers are looking to catch fish from this muddy water and seize the opportunity. Therefore, one should be vigilant and identify their techniques before falling into the trap of such scams [19]. Today, there are numerous investment and revenue-generating schemes in the community, some of which end in fraud, and one of these schemes is the Ponzi or Panzi scheme [15]. The Panzi or Ponzi scheme is a fraudulent investment operation that pays its own investors returns on the same money invested or the money paid by subsequent investors, rather than the return on any real profits made by the person or organization carrying out the operation. Can pay. Like fixed and fixed monthly profits or doubling capital or multi-level investment attraction systems, like most hype sites that promise astronomical profits, they are part of Panzi plans and nothing but losses [22].

3 Corporate governance, financing and Ponzi scheme

The Panzi scheme is a scam. The Ponzi scheme is a fraudulent investment. In this trick, the profits returned to investors are abnormally higher than conventional interest rates [27, 28, 30, 32]. In other words, these companies pay interest from older people to newer ones to build trust among their investors [33], and this process will continue as long as a new member invests in the company [3]. So often, Panzi fans are not lying, and they may actually make even more profit on their investment. Unfortunately, fraudsters ultimately want to pursue their own interests, and because they have not really invested investor money, they will stop paying dividends and a large segment of investors will lose [34]. So in the end, the possibility of losing the investor, especially if a long time has passed since the establishment and operation of Panzi Company, is very high [4].

The Panzi Trick is a fraudulent investment operation that pays its investors back the same amount of money invested or the money paid by subsequent investors, instead of paying back any real profit made by the person or organization running the operation [5]. The Panzi Trick usually entices new investors by offering returns that other investments can no longer guarantee. These revenues are abnormally high returns in the short term or abnormally fixed and durable [9]. The perpetuation of the profits that a Panzi trick promotes and pays for requires an ever-increasing cash flow from investors to keep the system running. The destiny of this system is to collapse [12]. Because its real profits (if there is no profit at all) are less than the amount paid to investors. This system is usually disrupted by legal authorities before it crashes because such a system is suspected or its promoter sells unregistered credit documents. As more investors become involved, they are more likely to get the attention of legal authorities [14].

In the American and European countries, such companies are identified by law enforcement agents before their collapse and their agents are arrested, and the more investors there are, the more they are exposed to the agents [13]. The largest Ponzi scheme is by Bernard Medvedev. This person used both groups of investors and investment firms in the design [26]. The amount of capital lost by Medvedev in this project is estimated at $21 billion. If we add the promised profit to the amount invested, this amount reaches 64.8 billion dollars. But the New York court waived that profit and conducted the trial on the basis of $21 billion alone [29].

There is a logical assumption behind the research that has been done in the field of the corporate governance system in the field of accounting, and that is that a significant share of return on investment according to accounting methods has originated from the improvement in the corporate governance system. In fact, according to this assumption, with an effective governance system, the proper functioning of the securities market is facilitated and the flow of the efficiency of scarce financial and human capital towards investment opportunities is facilitated. This reflects the value that the management system has for companies, which is sometimes considered management values. Designing a system that leads to an increase in leadership values for companies addresses issues such as choosing between the reliability feature or the relevance of reportable accounting information [22].

Today's competitive world has put companies in a position where in order to survive in the competitive arena, they have to attract more investors in financial markets, to make more profit in various ways, including reducing costs, increasing quality, and then increasing sales. And ... turn around. Meanwhile, a number of companies try to show a favorable image of the company by providing misleading and unrealistic information and maintaining themselves at the level of competition to attract investors [23].

Evidence in the research of Wadizadeh [31] showed that companies that have active institutional owners and high independence in the audit committee, more than other companies have used strategic management accounting techniques. The results of Wadizadeh [31] showed that there is a significant relationship between the company's involvement in Ponzi traps and its performance. The financial cost of companies caught in the Ponzi scheme is higher than other companies. Trapping in the Ponzi scheme also has the power to explain financial distress and the inclusion of Article 141 of the Commercial Code. Based on the results of Mohammadi and Noroush [21], the analysis of the relationships between variables showed that there was an inverse relationship between the size and independence of the board of directors as measures of the internal dimension of corporate governance and the level of cash holdings. Beshkooh et al. [2] during their research briefly examined the effect of five hypotheses in the form of corporate governance and three hypotheses in the form of ownership on profit management, the results show a significant relationship between the variables of the presence of the audit committee, board independence, The auditors of the auditing and stock organization have been at the disposal of independent managers with earnings management. De Gloria and Mantovani [8] suggested that in privately-owned companies, there is no significant relationship between corporate governance mechanisms and firm performance, but in large companies, there is a strong and significant relationship between the two.

4 Research methodology

The present research is based on the purpose of exploratory research that has been done inductively. The statistical population of this study is Tehran capital market companies. The research period is from 2016 to 2016. From the statistical population of the research, 120 companies have been selected from all companies present in the capital market by elimination method (screening) and considering the time period of the research, the total number of data is 600 companies per year. The model of this research is expressed as follows:

$$P_{it} = \beta_0 + \beta_1 CL_{it} + \beta_2 SIZE_{it} + \beta_3 AGE_{it} + \varepsilon_{it}$$

where in; P: ponzi (money transfer); CL: Corporate Leadership; $SIZE$: Company size; AGE: Company life cycle; b intensity of independent variable changes; §0: width of origin; e: except error.

5 Research Findings

Table 1 contains descriptive statistics of research variables. For example, the average of the numbers of each variable in the table above shows, for example, what the variable of board size is among the companies studied. This value is equal to 5.984 for the studied companies. In other words, the average number of board members in companies is more than 5 people. Also, the average ratio of non-executive members of the Board of Directors is 0.437, which shows that the number of non-executive members is more than the executive members in the companies under study. Other findings can also be seen in the table.

Table 1: Descriptive analysis of research variables

Persian	**Variable**	**Average**	**Middle**	**Standard deviation**	**chogeli**	**Elongation**	**Minimum**	**Maximum**
ponezi (Money)	P	0.653		0.348	0.757	0.785	0	1
The size of the board	BSize	5.984	0.435	0.784	0.875	0.657	0.285	0.873
Ratio Non executive members of the Board of Directors	PNEXEC	0.437	0.368	0.346	0.567	1.234	0.053	0.528
Owned by a major shareholder	INS	0.415	0.638	0.0.279	−0.063	3.563	0.342	0.598
Percentage of free float	Free Float	0.368	–	1.468	1.326	1.974	0	1
Company type	KCOR	0.084		0.077	0.852	0.473	0	1
Statement of the auditor	Auditor	1.952	2	0.564	0.084	1.491	1	3
Disclosure of information	Disclosure	1.940	–	1.426	1.674	1.243	1	3
size of the company	Size	13.745	11.785	1.784	1.153	5.674	1.405	13.887
Company life cycle	AgeT	0.685		0.223	0.921	1.732	0	1

Parametric statistics are used to test the hypothesis of normality of the dependent variable (in case of normal distribution of data, Kolmogorov-Smirnov K-S statistics, Jarkobra test or the mean and mean value are used) [24]. Accordingly, the comparison between the median and mean of the variables indicates that the variables are normal. This issue was mentioned in the analysis of the results of descriptive statistics. The proximity of these mean and median digits can be inferred that this variable is normal. As the table above shows, the significance level of the variable is above 5%, which can be inferred that the null hypothesis, i.e. the normality of the error components, is not rejected; As a result, the error components of the dependent variable have a normal distribution.

Table 2: Jark-Bra test results

Variable	**lark test statistics For (JB)**	**Significant level**	**Result**
Ponzi Trap	11.56	0.159	Confirm that the error component is normal

In Aetta software, the Kalin test can be used to detect linearity. The results of the linearity test for the research regression model are described in Table 3. According to the above table, the results of the alignment test show that there is no alignment problem between the research variables in the research regression model.

Table 3: Colin test results to evaluate the significance of the model

Model	Variable	Vif statistics	Cond index statistics
The main research model	P	2	2
	BSize	2.02	3.763
	PNEXEC	2.01	3.654
	INS	2.02	3.863
	Free Float	2.04	2.952
	KCOR	2.02	4.652
	Auditor	2.02	3.763
	Disclosure	2.03	3.569

5.1 Test Model Research

This section reviews the effect of systems leadership company on avoid companies from caught at dam Ponzi (money laundering) in capital market companies through test regression paid has been. Variable independence in this model effect companies with system leadership with function optimal, companies with system leadership with function medium, and companies with system leadership with function weak and variable dependent caught companies in dam it is a Ponzi scheme. also, variables control including size company and cycle Omar company at model research at opinion taken have been.

Model regression research presented to the face under is:

$$P \;\; it - \S\, 0 + \S\, 1 \;\; CL\} \;\; it + \S\, 2 \;\; size\} \;\; it + \S\, 3 \;\; AGE\} \;\; it + +e \; it.$$

Results review and test model first research at table 4.

Table 4: Colin test results to evaluate the significance of the model

Research model		$it' \; 0 + tC_{it} + 2SIZE_{it} + 3GE_a + \;\; +^{*}t$				
Variable type	A symbol	Variable name	Estimated coefficient	standard error	Amar az	Probability of statistics z
Width of origin	b	Beta	−19.853	3.565	−6.02	0.015
Variable and dependent	P	Ponzi Trap Money (Laundering)	7.745	2.934	6.97	0.007
independent variable		Optimal leadership system	0.753	0.675	4.82	0.000
		Intermediate leadership system	0.573	0.357	3.46	0.000
		Weak leadership system	0.325	0.462	5.41	0.127
		Steering system	0.451	0.556	2.69	0.000
Control variables		size of the company	0.685	0.246	3.47	0.001
		Company life cycle	0.794	0.368	2.78	0.000
Coefficient Explanation Mac McFadenR squared -					0.3694	
Statistics Right View (Log LikeLihhod)					14.63	
Possibility Statistics True					0.000	
(Good model fit LR statistic)					13.27	

As shown in Table 4, the probability of Z statistic for the variable of catching the Ponzi trap (money laundering) at 95% confidence level and error level (p-value < 0.05) is 0.007. Since this value is less than 0.05, so the coefficient is statistically significant and the research hypothesis is not rejected.

6 Mean comparison test

This section examines the situation of two groups of companies caught in the Ponzi trap (money laundering) and companies that are not caught in this trap. To test this section, the test of comparing the means of the two groups in corporate governance variables is used.

The main hypothesis of the research is as follows:

Corporate governance systems are effective in preventing companies from getting caught in the trap of money laundering.

In order to analyze and compare the variable status of the corporate governance system between companies caught in the Ponzi trap (money laundering) and companies that are not caught in this trap and their differences, the independent t-test was used. The results of independent groups t-test or comparison of means are presented in Tables 5 and 6.

Table 5: Descriptive results of t-test comparison of company management system

Variable	**Groups**	**Number**	**Average**	**Deviation**
Social support	Caught in the trap of a ponzi	68	2.654	1.386
	Avoid the Ponzi Trap	52	3.963	1.260

Table 6: Descriptive results of t-test of equality of variance and Levin test

Company management system	**T - test for human equality**						**Luin test**	
	Bread distance safety 95%		There is a difference between them	Significant level	Free degree	Amara t	Significant level	Amara F
	Hadd foot	upper line						
The assumption of equality of human beings	1.342	1.975	1.465	0.033	96	3.220	0.567	0.427
The unequal assumption of human beings	1.113	1.895	1.468	0.180	95	1.136		

The result of equality of variances in the t-test shows that the value of F obtained from the Levin test is 0.427 which is not significant and indicates equality of variances. Therefore, to test the research hypothesis, we use the first row of the t-test results table with two independent samples. The results of the t-test analysis with two independent samples show that there is a significant difference between the means of the corporate governance system between the two groups of companies caught in the Ponzi trap (2.654) and companies not caught in the Ponzi trap (3.963). In other words, the statistic t is equal to 3.220 and above the criterion value of 1.96 and also the value of the significance level is equal to 0.033. Is less than the value of 0.05. Therefore, the null hypothesis and a research hypothesis cannot be rejected. Therefore, it is concluded that there is a significant difference between the level of corporate governance in companies caught in the Ponzi trap (money laundering) and companies that are not caught in this trap. The results show that companies caught in the Ponzi scheme (money laundering) have a weak governance system and companies that are not caught in this trap have a favorable governance system.

Test of the first hypothesis: "Companies with good performance management system do not fall into the trap of Ponzi (money laundering)."

The results show that the probability of Z statistic for the variable of companies with management systems with optimal performance at 95% confidence level and error level (p-value < 0.05) is equal to 0.0000. Therefore, it can be concluded that the management system with good performance has an effect on the involvement of companies in the Ponzi trap (money laundering) and the research hypothesis states that companies with a management system with good performance are not caught in the Ponzi trap (money laundering) is confirmed.

Test of the second hypothesis: "Medium-performance corporate governance companies do not fall into the trap of money laundering."

The results show that the probability of Z statistic for the variable of companies with management systems with average performance at 95% confidence level and error level (p-value < 0.05) is equal to 0.0000. Therefore, it can be concluded that the medium performance management system has an effect on the involvement of companies in the Ponzi trap (money laundering), and the research hypothesis states that companies with a moderate performance management systems are not caught in the Ponzi trap (money laundering) is confirmed.

6.1 Test the third hypothesis

"Companies with poor performance management do not fall into the trap of money laundering."

The results show that the probability of Z statistic for the variable of companies with poor performance management system at 95% confidence level and error level (p-value < 0.05) is equal to 0.127. Therefore, it can be concluded that a poor performance management system does not affect companies in the Ponzi trap (money laundering), and the research hypothesis states that companies with a poor performance management system are not caught in the Ponzi trap (money laundering) not confirmed. In other words, companies with poor performance management are caught in the trap of money laundering.

Test the main hypothesis: "Corporate governance systems are effective in preventing companies from getting caught in the trap of money (money laundering)."

The results show that the probability of Z statistic for the variable of companies with management systems with optimal performance at 95% confidence level and error level (p-value < 0.05) is equal to 0.0000. Therefore, it can be concluded that corporate governance systems are effective in preventing companies from getting caught in the Ponzi trap (money laundering), and the research hypothesis states that corporate governance systems are effective in avoiding companies from getting caught in the Ponzi trap (money laundering) is confirmed.

7 Discussion and conclusion

The present was carried out with the aim of providing a favorable model for the corporate governance system in order to avoid companies getting caught in the trap of money laundering in capital market companies. The findings of the first hypothesis test with logit regression indicate that companies with good performance management systems are not caught in the Ponzi trap (money laundering) is confirmed. The results of this hypothesis are consistent with the research results of Bannier and Neubert [1] and McKnight et al. [20] and show that companies in order to have proper financial performance should not turn to money and present their capital structure transparently because money circulation It causes financial lack of transparency and reduces trust in the company and may inevitably affect and negatively affect the financial performance of companies. (Money laundering) will not be caught and will be approved. The results of this hypothesis are consistent with the results of research by Liang [16] and Lord, Ross, and Lepper [17] and show that companies that have a good management system are less inclined to make money, and in this regard, we can say that the basis of a good management system lack of inclination to negative categories such as money laundering and can play an important role in the health of corporate capital structure and improve the overall performance of the organization. From the findings of the third hypothesis can be concluded that companies with a poor performance management system. They are caught in the trap of money laundering. The results of this hypothesis are consistent with the results of McKnight et al. [20] research that found that companies with poor management systems in terms of investment and capital structure try to combine their funding sources with money circulation and less to the category "Trust and transparency are concentrated. Therefore, such companies will suffer from the phenomenon of money laundering more than other companies that try to operate legally and transparently." The findings of the main hypothesis test can be concluded that Approved by companies to avoid getting caught in the Ponzi trap (money laundering) is effective. The results of this hypothesis are consistent with the results of research by Lord, Ross, and Lepper [17] and McKnight et al. [20] and showed that the integration of companies and the expansion of target markets are among the efforts that companies make to continue their economic life. These companies also have to use domestic and international capital markets to finance themselves, and in the meantime, the corporate governance system is a criterion that plays a key role in the decisions of investors and lenders, and this will cause these Companies to be less inclined to make money. Based on the test of hypotheses and findings of the present study, it is suggested that users of financial statements, when reading the financial statements of companies, also pay attention to corporate governance and also managers of listed companies, and People involved in the removal and installation of managers can use the results of this study to increase their awareness. It is also suggested to increase the proportion of non-executive board members and use people on the board who are not involved in the executive processes of the company. This will improve the monitoring of the company's performance; it is also suggested that listed companies pay enough attention to the transparency and effectiveness of the board of directors in order to enjoy an acceptable corporate leadership position in the capital market.

For future research, interim financial reporting is often the basis for economic decisions (Accounting Standards Committee) and provides useful information about financial conditions for investors, creditors, and other users (Accounting Committee). It is suggested that the subject of the present study be compared between two different industries; the implementation of this research in various industries listed on the Tehran Stock Exchange can bring guidance on the status and differences of the company's management system. Finally, it can be stated that the present study has some limitations that have led to the results being expressed with caution. In the following, the types of limitations of this special research are presented.

Among them, we can mention the lack of control over variables such as economic and political conditions, type of industry, type of company activity, domestic and international laws and regulations, and also limited to 2016-2016. Which can affect research variables.

References

[1] C.E. Bannier and M. Neubert, *Gender differences in financial risk taking: the role of financial literacy and risk tolerance*, Econ. Lett. **145** (2016), 130–135.

[2] M. Beshkooh, M. Niknam and M.R. Sabeghi, *The impact of corporate governance mechanisms and types of ownership on profit management in companies listed on the Tehran stock exchange*, Quart. J. New Res. Manag. Account. **4** (2017), no. 1.

[3] U. Bhattacharya, *On the possibility of Ponzi schemes in transition economies*, Kelley School of Business, Indiana University, Bloomington, 1998.

[4] A. Carvajal, H. Monroe, C. Pattillo and B. Wynter, *Ponzi schemes in the Caribbean*, International Monetary Fund, IMF Working Paper No. 09/95, (2009).

[5] G.A. Churchill, *A paradigm for developing better measures of marketing constructs*, J. Market. Res. **16** (1979), no. 1, 64–73.

[6] S. Cole, T. Sampson and B. Zia, *Prices or knowledge? What drives demand for financial services in emerging markets?*, J. Finance **66** (2011), no. 6, 1933–1967.

[7] D. Cortés, J. Santamarla and J.F. Vargas, *Economic shocks and crime: evidence from the crash of Ponzi schemes*, J. Econ. Behav. Organ. **131** (2016), 263–275.

[8] S. Di Gloria and G.M. Mantovani, *On the shareholders' composition of the company and the governance mechanisms of the firm. Can this contribute to the firm performance (including the capacity to attract capital and bank allowances)?*, Ca' Foscari University in Venice, Department of Management, EM Strasbourg, Business School, 2017.

[9] A. Driver, *US charges Stanford with massive Ponzi scheme*, Reuters, London, 2009.

[10] M. Eskandari, *Corporate governance; from word to deed, The world of economics*, https://donya-e-eqtesad.com, (2012).

[11] J. Gathergood and J. Weber, *Financial literacy: a barrier to home ownership for the young?*, J. Urban Econ. **99** (2017), 62–78.

[12] J.E. Grable, *Financial risk tolerance and additional factors that affect risk taking in everyday money matters*, J. of Bus. Psych. **14** (2000), no. 4, 625–630.

[13] S. Greenspan, *Fooled by Ponzi: How Bernard Madoff made off with my money, or why even an expert on gullibility can get gulled*, Skeptic (Altadena, CA) **14** (2009), no. 4, 20–26.

[14] W.W. Keep and P.J. Vander Nat, *Multilevel marketing and pyramid schemes in the United States: an historical analysis*, J. Historical Res. Market. **6** (2014), no. 2.

[15] M.K. Lewis, *New dogs, old tricks. why do ponzi schemes succeed?*, Account. Forum **36** (2012), no. 4, 294–309.

[16] W.W. Liang, *Marketing fraud: an approach for differentiating multilevel marketing from pyramid schemes*, J. Public Policy Market. **21** (2018), no. 1, 139–151.

[17] C.G. Lord, L. Ross and M.R. Lepper, *Biased assimilation and attitude polarization: the effects of prior theories on subsequently considered evidence*, J. Person. Soc. Psych. 37 (1979), no. 11, 2098.

[18] A. Lusardi, *Financial literacy: an essential tool for informed consumer choice?*, National Bureau of Economic Research, (2008), no. 14084.

[19] A. Lusardi and O. Mitchell, *Financial literacy and retirement preparedness: evidence and implications for financial education*, Bus. Econ. **42** (2007), no. 1, 35–44.

[20] D.H. McKnight, L.L. Cummings and N.L. Chervany, *Initial trust formation in new organizational relationships*,

Acad. Manag. Rev. **23** (1998), no. 3, 473–490.

[21] K. Mohammadi and I. Noroush, *Evaluating the impact of internal mechanisms of corporate governance on the cash holding level in companies listed in Tehran stock exchange organization*, First Nat. Conf. Account. Manag., Natanz, Islamic Azad University, 2015.

[22] T. Moore, J. Han and R. Clayton, *The post-modern ponzi scheme: empirical analysis of high- yield investment programs*, Int. Conf. Financ. Crypt. Data Secur., Springer, Berlin, Heidelberg, 2012, pp. 41–56.

[23] M. Moradzadehfard, M. Nazemi Ardakani, R. Gholami and A. Farzani and H. Farzani, *The relationship between institutional stock ownership and earnings management in listed companies on Tehran Stock Exchange*, J. Account. Audit. Rev. **16** (2009), no. 2.

[24] F. Roodposhti Rahnomaei, *Presenting a model for measuring the impact of corporate governance mechanisms on profit management in Tehran Stock Exchange*, Islamic Azad University, Tehran Science and Research Branch, PhD Thesis, 2009.

[25] R. Tavassoli and J. Kazemi, *Management letter with internal control approach*, Tehran: Radan Publications, 2018.

[26] D. Tennant, *Why do people risk exposure to Ponzi schemes? econometric evidence from Jamaica international financial markets*, Institut. Money **21** (2011), 328–346.

[27] M.C.J. Van Rooij, A. Lusardi and R.J.M. Alessie, *Financial literacy and retirement planning in the Netherlands*, J. Econ. Psych. **32** (2011), no. 4, 593–608.

[28] M.C.J. Van Rooij, A. Lusardi and R.J.M. Alessie, *Financial literacy, retirement planning and household wealth*, Econ. J. **122** (2012), no. 560, 449–478.

[29] P.J. Vander Nat and W.W. Keep, *Marketing fraud: an approach for differentiating multilevel marketing from pyramid schemes*, J. Public Policy Market. **21** (2002), no. 1, 139–151.

[30] D. Verner, *What factors influence world literacy? Is Africa different?*, World Bank Publications, 2005.

[31] K. Wadizadeh, *The effect of Panzi livestock phenomenon on the performance of companies listed on the Tehran Stock Exchange*, Master Thesis in Accounting, University of Tehran, 2019.

[32] A.M. Wilkins, W.W. Acuff and D.R. Hermanson, *Understanding a ponzi scheme: victims' perspectives*, J. Forensic Investig. Account. **4** (2012), no. 1, 1–19.

[33] A.C. Worthington, *Predicting financial literacy in Australia*, Financ. Serv. Rev. **15** (2006), no. 1, 57–79.

[34] T. Zou, *Ponzi scheme diffusion in complex networks*, Phys. A: Statist. Mech. Appl. **1** (2017), no. 28, 34–56.