IOSR Journal of Economics and Finance (IOSR-JEF)
e-ISSN: 2321-5933, p-ISSN: 2321-5925.Volume 8, Issue 1 Ver. III (Jan-Feb. 2017), PP 109-114
www.iosrjournals.org

Factors Affecting Financial Flexibility of Firms Listed in Tehran Stock Exchange

Amir Mohammad Hooshyar[1,2],Mir FarhadSadigh Mohammadi[3*],
Adel Shah Valizadeh[1,2]

Accounting, Science and Research Branch, Islamic Azad University, Ardabil, Iran[1] Department of
[2]Department ofAccounting, Ardabil Branch, Islamic Azad University, Ardabil, Iran
[3]Department of Management and Accounting, Khalkhal Branch, Islamic Azad University, Khalkhal, Iran

Abstract: *Financial flexibility is a degree of firm's capacity that can mobilize financial resources towards reactive activities to maximize the value of firm. The aim of this study is to investigate factors affecting financial flexibility based on panel data in firms listed in Tehran Stock Exchange. For this reason firms listed on Tehran Stock Exchange during the years 2009 to 2014 with systematic deletion method and by considering inherent limitations in this field have been screened, andthe number of remaining firms to test research hypotheses were 106 firms in terms of 630 observation. Estimation results showed that, financial leverage and the current ratio variablesin listed firms of Tehran Stock Exchange don't have significant impact on financial flexibility and firm size variable has a negative and significant impact on financial flexibility and profitability variable has a positive and significant impact on financial flexibility.*

Keywords: *financial flexibility, financial leverage, firm size, profitability*

I. Introduction

Financial flexibility is a degree of firm's capacity that can mobilize financial resources towards reactive activities to maximize the value of firm. Financial flexibility enables business units to take advantage of the unexpected opportunities and they can continue their activity and survive during the time that cash flows from operations are low and possibly negativeand the reason can be unexpected decrease in demand for manufactured products. Financial flexibility is the abilityof firms to supply the financial resources to respond appropriately to opportunities and unexpected events, and to maximize the value of firms (Bion, 2008). In theoretical concepts of auditing standards, financial flexibility is defined as the firm's ability based on effective actions to change the amount and timing of cash flows, therefore, business unit would be able to react in confronting with unexpected events and opportunities (KhodaeiValezaghrod et al, 2010, 158).

Business units with financial flexibility are able to resist in front of financial pressures, in addition, in the case of profitable opportunities, they can provide funds for investment with minimum cost. On the other hand, investors always on the basis of contained information in the financial statements and based on market conditions, consider degree of risk to their investment and due to this risk they form the respective return. If a company achieves lower return than the expected return by investors, naturally it will be faced with difficulties to attract its necessary capital.On the other hand, if the company acquires higher levels of return (abnormal return), investors will be willing to invest more in the company (Bashiri, 2013, 36).All companies, have some amount of hidden flexibility in principles and accounting procedures that can be used to divert the reported profits. Barton and Skinner (2002) argued that, financial reporting based on accepted accounting principles, limits management level of incremental benefit; because management of incremental benefit leads to more exponential of profit and as a result more exponential of assets on the balance sheet and these effects are retained accumulatively on the balance sheet. Barton and Eskimos used the proportion of operational assets to selling, to measure past profit management. And they claimed that if manager frequently, distorts the reported profit; this ratio will experience a growth trend. In this regard, Yang (2011) argued that, since the ratio of operational assets to selling, is considered a criteria for efficiency and productivity of company; changes in firm performance will cause disturbances in this criteria. In order to solve this problem, Yang (2011), has used the ratio of working capital of operational assets to selling. The ratio of working capital of operational assets to selling, shows the level of imposed profit management in recent years. Higher amounts, reflects the limited flexibility of accounting for the use of profit management; thus, the entire relationship is multiplied by (-1), and the respective values reflect the level of flexibility in firm for each year. This equation separates the assets of company to two components of current and non-current. The evidence suggests that, components in accruals compared with total accruals, have more ability to determine the level of profit management. Separation of operational assets into their components is based on following the evidence, in this regard, Ouyang (2011) showed that, power of statistical tests after the separation of these accruals has increased (Dadbeh et al, 2013).Flexibility means that, firms can reach finance to a certain extent by debt.If firms reach finance through debt more than the normal, the ratio of debt and financial risk of the firm will be increased.

II. Research objectives

The main purpose:
1. Studying the effects of financial ratios on financial flexibility of listed firms on Tehran Stock Exchange.
Secondary objectives
1. Studying the effect of financial leverage on financial flexibility of listed firms in Tehran Stock Exchange.
2. Studying the effect of current ratio on financial flexibility of listed firms in Tehran Stock Exchange.
3. Studying the effect of profitability on financial flexibility of listed firms in Tehran Stock Exchange.
4. Studying the effect of firm sizeon financial flexibility of listed firms in Tehran Stock Exchange.

Financial flexibility

Firms with financial flexibility, keep storage based on the amount of borrowing authority to use more conservative policies and investment in future years. According to the above mentioned, the financial flexibility has a direct relationship with capital expenditure and has an important impact on it. Also flexible firms can use their own funds to finance projects more easily after a period of low leverage policy and their ability for investment should be less dependent on external funds. As a result, we should expect a negative relationship between investment and variable of cash flows existence.

The definition of financial flexibility

Financial flexibility is the ability of business unit to provide cash in a short distance after receiving information about unexpected financial needs or finding a perfect opportunity for investment.

What is financial flexibility’s life cycle?Financial flexibility based on stages of life cycle for a firm includes birth, growth and maturity stages. To determine the stages of birth, growth and maturity we used the interpretations of firm size, monetary assets, retained profits, operational cash flows and payable dividends. So, financial flexibility is a degree of firm’s capacity that can mobilize their financial resources towards reactive activities to maximize the value of firm.In fact, smart choice of type of financing not only fixes financial problems of the firm but also it improves the position of firm among its competitors.Firms at birth stage, don’t have adequate funds for their activities, they have to meet their financial needs externally. Firms in the growth stage have more financial flexibility than their birth-stag. Considering that in this step firmsare less impressed to access money markets, also, they need a lot of cash for their operations, therefore, firms prefer to provide their financial needs through debt.

But firms in the stage of maturity have more financial flexibility, in order to meet their financial needs they use internal financing. With proper financing management, production costs or services of firms will be reduced and it makes them closer to greater profitability.

In general, financial flexibility is considered as a degree of capacity in a firm that can mobilize their financial resources for reactive activities to maximize the value of firm.

How theoretical concepts of auditing standards are expressed in Iran regarding financial flexibility?

Theoretical concepts of accounting standards regarding financial flexibility are as follows: the firm’s ability based on effective actions to change the amount and timing of cash flows, therefore, an entity would be able to react in confronting with unexpected events and opportunities.

AICPA (1993), defined financial flexibility as follows:"The ability of takingsteps to eliminate the needed cash surplus and expected cash payments in the expected resources". In addition, financial flexibility can be defined as the firm's ability to carry out effective actions to change the timing of cash flows to respond against unexpected events and opportunities. Therefore, proper and enough information of current and future cash flows, is a key factor in determining the financial flexibility of firms.

Financial flexibility is posed in two general forms, and some countries try to maintain financial flexibility by the use of policies related to maintenance of cash flows. And others with a conservative debt policy and based on having excess debt capacity, adopt this policy.

After expressing overall form of financial flexibility, measurement methods were offered for financial flexibility. Based on the view of (Daniel et al., 2008) two methods of measurement for financial flexibility is as follows:

(1) The leverage ratio   Leverage ratio = assets / debt
(2) Liquidity ratio   Liquidity ratio = cash / assets

Flexibility in financial statements

Assessing financial flexibility of an enterprise (firm) how is possible from the balance sheet?

Accounting concepts

Financial Statements are produced withgeneral purposes to provide useful information and desirable images about financial situation, the entity's financial performance and financial flexibility of enterprise for decisionmaking by users.

Balance sheet of financial situation on a certain date

Profit and loss statements and comprehensive profit and loss for financial performance in a period.

Cash flow statement and the financial statements of financial flexibilityin a period.

Financial flexibility will be identified by linking the contained information in the cash flow statement and the provided information in the financial statements. Because it is expressed on the basis of a financial period and not based on balance sheet.

So, virtually balance sheet doesn't have the ability of offering financial flexibility. It shows just financial condition and is used as raw data for financial flexibility.

According to theoretical concepts we will have:

1. Financial flexibility can be defined as the firm's ability to carry out effective actions to change the timing of cash flows to respond unexpected events and opportunities. Set of financial statements reflect the information that are useful to evaluate the entity's flexibility. Financial flexibility enables business units to take advantage of the unexpected investment opportunities and they can survive during the time that cash flows from operations are low and possibly negative and the reason can be unexpected decrease in demand for manufactured products.
2. Complementary explanations in connection with financial position, financial performance and financial flexibility are offered in explanatory notesand they are considered an integral part of the financial statements.
3. Financial flexibility usually involves the loss of some benefits in exchange for gaining privilege. For example, maintenance of assets that are readily tradable on the market is the sign of financial flexibility, but it also maybe dependent on output rate and it should be sufficient which is much less than the rate that can be achieved from investment in assets with lower liquidity. Financial flexibility can reduce risks related to operations, for example, by reducing the risk of bankruptcy during declines of cash flows from operations. In general, in each level of operational risk, an entity that has high levels of financial flexibility, in comparison with commercial units with a low financial flexibility, confronts with lower total risks.
4. Basic financial statements usually offer some information that are useful to assess financial flexibility. For ample, cash flow statement will provide these information through the reports of cash flows from operations and disclosure of their relationship with income. This information may be useful in predicting future cash flows. Generally if the amount of net cash flow resulting from future operations being high, an entity's ability to deal with adverse changes in operating conditions will be more.

Statements of financial performance can provide information to assess entity's ability to reduce costs during decline of income. Balance sheet offers some information for these resources to evaluate financial flexibility by identifying the nature of existing resources, their time and expense.

In the next part we will discuss regarding the researches that have been conducted about financial flexibility in Iran and abroad:Arsalan and Florakis (2009) in their study showed that, firms in order to maintain financial flexibility in the first stage, should consider conservative policies of debt and rarely they try to reach financial flexibility through maintenance of high cash flows (According to their findings, debt is the most important component of financial flexibility). The results show that, firms with financial flexibility compared with firms with less flexibility had better performance.

Haghighat and Bashiri (2009) in their study showed that, the more companies approach from birth stage to maturity, the ratio of their debt and the degree of flexibility will be reduced.

The results of this study implicitly refers to the effort of firms to maintain their empty capacity of debts and prudent use of debt in financing process.

Firms like humans born one day, then they pass growth and maturity stages and finally they reach an old age and will die. Companies in every stage, have specific characteristics and requirements.

Financial flexibility regarding the stages of a firm's life cycle includes birth, growth and maturity. To clarify birth, growth and maturity stages, we usedinterpretations relating to firmsize, monetary assets, retained profits, operational cash flows and payable dividends.So financial flexibility is a degree of firm's capacity that can mobilize their financial resources towards reactive activities to maximize the value of firm.

In fact, smart choice of type of financing not only fixes financial problems of firm but also it improves the position of firm among its competitors. Companies at birth stage, don't have adequate funds for their activities, and they have to meet their financial needs externally. Firms in the growth stage have more financial flexibility than their birth-stag. Considering that in this step firms are less impressed to access money markets, also, they need a lot of cash for theiroperations, therefore, firms prefer to provide their financial needs through debt.

But firms in the stage of maturity have more financial flexibility, in order to meet their financial needs they use internal financing. With proper financing management, production costs or services of firms will be reduced and it makes them closer to greater profitability.

In general, financial flexibility is considered as a degree of capacityin a firm that can mobilize their financial resources for reactive activities to maximize the value of firm.

III. Review of literature

Bion (2008), in his study examined the relationship between structure of capital and financial flexibility, and used stages of life cycle in firms as a substitute for financial flexibility. The results showed that at birth stage, for financing, firms publish stock and they maintain little leverages. Firms in the growth stage, for financing, use debt and they maintain high leverage. Firms in the maturity stage use domestic resources and they have a balanced leverage.Marchyka and Mora (2007), have researched about the relationship between financial flexibility and investment decisions and it was concluded that, there is a strong relationship between investment and financial flexibility; in other words, after a period of low leverage policy, firms with financial flexibility have ability to pay capital costs.

Aslani and colleagues (1393), in their study have investigated the relationship between financial flexibility and investment opportunities during the years 2006 to 2011. The results of this study showed that, there is a significant and positive relationship between financial flexibility and investment opportunities. This means that firms with financial flexibility use investment opportunities appropriately and hence they have high levels of profitability. In fact, there is a positive and significant relationship between financial flexibility in Marchyka's method and investment opportunities in Clark's method. But in Fama and French's method there isn't any positive and significant relationship between financial flexibility and investment opportunities, so the main hypothesis of the study is confirmed.

Darabi (1392), in his study examined the relationship between financial flexibility and capital structure decisions of listed companies in Tehran Stock Exchange during a five-year period of payment from 2006 to 2010. Sample of study consisted of 82 firms of listed companies on the Stock Exchange of Tehran. The results of this study showed that, the marginal value of cash is negative from the perspective of market. Also, there isn't a significant relationship between marginal value of financial flexibility and capital structure decisions of the firm. And firmsdon't take into account, firm's flexibility level in increase or decrease of their debts. In long term it can cause to the loss of financial flexibility and loss of profitable investment opportunities for firm.

Research questions

Main question

What impact has financial ratio on financial flexibility?

Secondary questions

1. What impact has financial leverage on financial flexibility?
2. What impact has current ratio on financial flexibility?
3. What impact has profitability on financial flexibility?
4. What impact has firm size on financial flexibility?

Conceptual Model of Research

Operational model of research

flix_{it} = Representative of financial flexibility criteria in an *i* firm at the time of *t*

Financial flexibility = operational cash flows / total of assets

Lev_{it} = Representative of current ratio criteria in an *i*firm at the time of *t*

Current ratio = current asset / current debt

Roa_{it} = Representative of profitability criteria in an *i* firm at the time of *t*

Ratio of profitability = net profit / total of assets

Size_{it} = Representative of firm size criteria in an *i* firm at the time of *t*

Firm size is obtained from the logarithm of total assets.

Ros_{it} = Representative of return in sale criteria in an *i* firm at the time of *t*

Return in sale = net sale / total sale

$\text{Growth}_{\text{it}}$ = Representative of growth opportunity criteria in an *i* firm at the time of *t*

Growth opportunity = Book value of equity – (total assets + market value) / total of assets

ε_{it} = indicator of disturbing sentence

$$\text{flix}_{\text{it}} = \beta_0 + \beta_1 \text{Lev}_{\text{it}} + \beta_1 \text{Cr}_{\text{it}} + \beta_1 \text{Roa}_{\text{it}} + \beta_1 \text{Size}_{\text{it}} + \beta_2 \text{Ros}_{\text{it}} + \beta_3 \text{Growth}_{\text{it}} + \varepsilon_{it}$$

Data analysis

Table 1. The results of financial flexibility estimation

Variable	First model of financial flexibility		
	Coefficients	Statistics of *t*	p-valu
Intercept	0.51	5.26	0.000
Financial Leverage	-0.040	-1.01	0.31
Current ratio	-0.002	-1.34	0.18
Profitability	0.538	8.45	0.000
Size	-0.06	-4.03	0.0001

Return in sale	-0.12	-4.03	0.0001
Growth opportunity	-0.005	-1.11	0.266
R^2	0.81		
R^2 Adjusted	0.77		
F Statistic (P-Value)	21.18 (0.00)2.28		
Durbin-Watson	2.28		

The table shows that, the criteria of financial flexibility (FLEX), is a function of the current ratio (CR),profitability (ROA),firm size (SIZE), financial leverage (LEV), and control variables of return on sale (ROS) and growth opportunities (Growth), which is calculated based on F statistics (21.18). The simultaneous effect of independent and control variables on dependent variable at a confidence level greater than 99% was significant and it refers to the fact that, regression model is not false.The coefficient of determination in fitted model indicates that, 81% of the financial flexibility (FLEX) in studied firms is explained throughcurrent ratio (CR), profitability (ROA), firm size (SIZE), financial leverage (LEV),and control variables of return on sale (ROS) and growth opportunities (Growth). If the Durbin-Watson statistic numbers being between 5.1 and 5.2, denoting the absence of autocorrelation between disturbing sentences of regression analysis, because Durbin-Watson statistics in this model is 2.28, which indicates to the absence of autocorrelation between disturbing sentences of regression analysis.

As seen in the above table, all the variables are based on expected signals and consistent with theoretical and experimental principles. Financial leverage variable statistically doesn’t have a significant effect on financial flexibility.This effect is rejected at a significance level of 5%; and current ratio variable statistically doesn’t have a significant effect on financial flexibility. By assuming ceterisparibus,increase in per unit of profitability index, increases the criteria of financial flexibility to 0.538 unit. However, this effect is verified even in confidence level of 5%;in other words the null hypothesis can be rejected, which refers to the ineffectiveness of profitability on financial flexibility. By assuming ceteris paribus, by increase in per unit of firm size index, financial flexibility criteria will be decreased about -0.06 unit. However, this effect is verified even in confidence level of 5%. According to the results in table about the effect of control variable over the financial flexibility it can be said that, return on sale variable has a positive and significant impact on financial flexibility, and by assuming ceteris paribus, by increase in per unit of firm size index, financial flexibility criteria will be decreased about -0.12 unit. While growth opportunity index of firm doesn’t have any impact on financial flexibility.

IV. Conclusion

According to the results obtained from testing the first hypothesis regarding the fact that financial leverage has a significant impact on financial flexibility of listed companies on Tehran Stock Exchange, it was found that the hypothesis cannot be confirmed; in other words, financial leverage doesn’t have a significant impact on financial flexibility. The concept of leverage is one of the most important financial concepts, and it has a special place and uses in the capital structure.Financial leverage shows the ratio of debt to equity in the firm's capital structure, and when the amount of debt in capital structure is greater, financial leverage will be higher.Increase in shareholder’s wealth from debt leverage, is one of the issues that should be considered by managers of a firm in financing. Finance professionals try to find the optimal combination of capital to maximizethevalue of firm and consequently shareholder’s wealth.According to the obtained results from the second hypothesis of the study, which refers to the fact that, current ratio has a significant impact on the financial flexibility of listed companies in Tehran Stock Exchange it was identified that the above hypothesis is not confirmed. So, the current ratio has no significant impact on financial flexibility. One of the goals and ideals of capital markets is optimal allocation of capital and financial resources; this means that financial resources should be considered as the most appropriate and high-yielding segment of the market. Due to this fact, as well as interest of investors to reach appropriate criteria for evaluating high-yielding shares, and investing in firms that have a better financial future;using financial ratios and particularly the use of market ratios is wide spread in capital markets of different countries. Familiarity with these ratios and amount of their correlation with the future performance of firmsand their stocks, for investors is essential.The purpose of calculation of financial ratios is the ability of judgementaboutafinancial statement; so, current ratio is a scale that provides general information about power of debt payment for a firm compared with other firms.

According to the obtained results from the third hypothesis of the study, which refers to the fact that, profitability has a significant impact on financial flexibility of listed companies in Tehran Stock Exchange it was identified that the above hypothesis is not confirmed.According to test hypothesis results, profitability has a positive and significant impact on financial flexibility. Reported profit is one of the significant financial information that is considered during decision-making by individuals.Financial analysts generally take into account reported profit as a prominent factor in their assessments and judgments. Also, investors to make decisions about their investments, are reliant on financial information contained in the financial statements, especially on the reported profit. Dividend policy, is an important aspect of financial management, based on the overall results of the firm's operations or in other words based on profit,managers in the framework of this policy, decidehow much money should be distributed among shareholders and how much should be stored in the format of annual profit in firms. Overall efficiency of the shareholders, arises from the factors of decision making related to received stocks' profit and capital gains (increase of stock price during a certain period).Thus, shareholders received dividends, is considered as an important element in firm's return on investment.

V. Suggestions

More emphasis of Audit Office and Securities and Exchange as a reference should be placed on setting of accounting standards, on disclosure of information and honest expression of accounting information. It is obvious that, determining that part of the financial information that should be disclosed properlyand emphasis on standards that are more susceptible to this issue, can help to the ultimate goal of capital market which is fair sharing through appropriate assessment. While gradually by the pass of time condition will be appropriate for capital market. In this way, disclosure of information in capital market and omission of interest information, lead to the creation of an effective and efficient market.

Economic experts in this market will try to turn better wheels of economy and proper orientation of capital and national resources towards production and employment should be considered, which finally lead to economic growth and development, encourage and support. According to the results regarding the effect of profitability, firm size, and return on sales on financial flexibilityofcompanies listed on Tehran Stock Exchange, it is suggested that investors should take into account profitability, firm size and sales returns when investing in shares of the firm.

References

[1]. Aslani, A. &Zanjirdar, M. (2014).Investigation of relationship between financial flexibility and investment opportunities, the first National Conference on Accounting, Auditing and Management, Isfahan, Jami Institute.

[2]. Bagherbeygi, M., Mohammad Reza Pour, A, Lakalayeh, & Armin, A. (2012). Examining the relationship between financial flexibility with opportunities for growth and future value of listed companies in Tehran Stock Exchange. The first National Conference of investigating the Strategies to improve issues of management, accounting and industrial engineering in organizations. Gachsaran, Islamic Azad University of Gachsaran.

[3]. Bashiri, F. &Jalali, A. (2013). Investigating the effect of maintained liquid assets and financial flexibility on abnormal stock returns at Companies listed on Tehran Stock Exchange, third year, Issue 10, 35-52.

[4]. Byoun,S, How and when do firms adjust their capital structures toward targets? Journal of Finance. December 2008, Volume 63, Issue 6, 3069-3096.

[5]. Byoun, Soku, Financial Flexibility and Capital Structure Decision (March 19, 2011). Available at SSRN: http://ssrn.com/abstract=1108850 or http://dx.doi.org/10.2139/ssrn.1108850

[6]. Byoun, soku. 2007. "Financial Flexibility. Leverage and Firm Size".January 2007, www.baylor.edu/business/finance/doc.php/231009.pdf.

[7]. Chang, X, Dasgupta, S, Target behavior and Financing: how conclusive is theevidence? Journal oF Finance 64, August 2009, Volume 64, Issue 4, PP.1767–1796.

[8]. Dadbeh, F., Sharifi, S. &Bagherabadi, M. (2012).Study of earnings management and accounting flexibility, the newspaper of DonyayeEghtesad, No. 2798, 11/09/2012, 22.

[9]. Darabi, R. (2013). The relationship between financial flexibility and capital structure decisions, financial management strategy, Volume I, Issue I, 1-31.

[10]. Financial Leverage and Market Size on Stock Returns on the Ghana Stock Acheampong, Prince.Agalega, Evans. KwabenaShibu,Albert, The Effect of Exchange: Evidence from Selected Stocks in the Manufacturing Sector, International Journal of Financial Research, Vol. 5, No. 1; 2014,125-135.

[11]. Haghighat, H. &Bashiri, V. (2012).Investigating the relationship between financial flexibility and capital structure, Journal of Accounting, third year, Issue 8, 49-71.

[12]. KhodaeiValezaghord, M. &ZareTeymouri, M. (2010). The effect of financial flexibility on investment decisions, financial engineering and management magazine, Volume 1, Issue III, 155-177.

[13]. Marchica, M, R. Mura,R.Financial Flexibility and InvestmentDecisions:Evidence From Low-Leverage Firms.2007. September 2007.

[14]. Marion R. Hutchinson " An Analysis ofthe Association Between Firms' Investment Opportunities, Board Composition, and Firm Performance" The University of Queensland- Accounting and Accountability:February 25, 2004.

[15]. Sheri Anaghiz, S. &Ghorbani, N. (2015).The relationship between financial flexibility and performance of invested companies from the perspective of market.Accounting empirical research, Issue 15, pp 165-180.