

The Effect of Asymmetric Cash Flows on the Relationship between Political Relations and Liquidity Fluctuations

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Abstract

Cash is an important and vital resource in every profit-making unit, and creating a balance between available cash and cash needs is considered the most important factor in the health of every business unit. Given this importance, several factors can affect the liquidity of the company. Therefore, this study seeks to investigate the effect of asymmetric cash flows on the relationship between political relations and liquidity fluctuations. In this study, 145 companies listed on the Tehran Stock Exchange were studied during the period 2013-2022. A panel regression model was used to test the hypotheses. The research findings show that political relations have a significant negative effect on liquidity fluctuations and asymmetric cash flows also have a significant negative effect on the relationship between political relations and liquidity fluctuations.

Keywords: Asymmetric Cash Flows, Political Relations, Liquidity Fluctuations

Introduction

Managers in organizations with business units may have a strong desire to establish close ties with the government, because in this way they are protected by the government. These ties will bring many benefits such as tax breaks and easier access to financial credits. Therefore, it can be said that in economic systems based on relationships, political connections are an important source of "value" for companies with ties. Companies with political ties more easily access capital resources and other benefits through their connections. In this regard, some company managers seek to establish and maintain ties between the company and the government with the aim of removing financial constraints at the lowest cost. Political ties determine the company's results to some extent, because they affect macroeconomic decisions at the company level. In this regard, companies with political ties may share the benefits obtained from these ties with politicians. This type of economic fabric at the level of a society is called a "relationship-based" economy. In economic systems based on political relations, an important and valuable resource for companies is "relationship" (Li and Wang, 2016). Also, companies that have extensive political relations with the government will enable them to have large cash reserves through cheap financing and paying less taxes, and their managers will use more bold tax policies (Kim and Zhang, 2016). Political connection provides valuable resources to the company through easy access to external resources and relationship-based contracts and affects investment decisions (Claussens et al., 2008; Houston et al., 2014). On the other hand, political connections can help reduce problems caused by financial constraints and provide the necessary capital for the company's investment activities. Considering the above discussions and the role that

political relations can have on liquidity fluctuations. This study will continue to state the problem, research background, hypotheses, findings, and finally conclusions and research suggestions.

Statement of the problem and research background

According to political theories, the influence and political support of the government can be examined from two aspects: advantages and disadvantages. From the advantages aspect, the political support of the government may lead to the creation of value for the company. For example, the same as paying lower taxes, greater market share, obtaining bank facilities more easily, and facilitating the public offering of shares. From the disadvantages aspect, we can mention investing in projects without added value, which ultimately provides negative performance for the company (Guidelines of Rudpeshti and Mohseni, 2019). Accordingly, political connections may be accompanied by severe government intervention and deviation from the company's ultimate goals. Therefore, to achieve social or political goals that the government is interested in, senior managers of companies are forced to invest in unprofitable projects; projects that are politically desirable but cause investment inefficiency and poor company performance (Pan and Tian, 2017). Accordingly, with this argument, companies with political connections will have low performance due to ignoring the value of the company (Deng et al., 2017). However, Huang et al. (2023) provide evidence that firms with political aversion suffer from severe financial constraints during periods of high policy uncertainty. Liquidity management is crucial for such firms. They may increase cash holdings as a means to mitigate the negative effects of uncertainty on investments and innovations (e.g., Demir and Ersan, 2017; Phan et al., 2019; Hassan et al., 2022). Although firms try to diversify political aversion through lobbying on specific political issues, only large firms can actively maintain political aversion (Hasan et al., 2019). Previous studies have shown that firms' willingness to save cash from cash flows depends on various factors, including financial position, investment needs, future income volatility, type of cash flow, firm transparency, and corporate governance. Almeida et al. (2004) show that the willingness to save through cash flow is only evident in financially constrained firms because their limited access to external financing increases their use of internal funds for investment. Riddick and Whited (2009) argue that firms with positive cash flows may use more cash for investment, leading to a reduced willingness to save cash flows. James and Leary (2021) find that increased firm transparency and corporate governance reduce the costs of external financing and managerial opportunistic use of cash, and reduce the need for cash flow savings. Based on previous research, we argue that the lack of political ties at the firm level affects firms' savings from cash flows and is likely to lead to an increase in them.

Hassan et al. (2022) find that not all firms can use domestically generated funds to avoid increasing external financing costs. Under conditions of increased political uncertainty, firms with positive cash flows may rely more on domestic capital for investment and thus save less from cash flows. In contrast, firms with negative cash flow shocks may be forced to abandon less profitable projects to recover cash. Bao et al. (2012) empirically show that cash flow sensitivity is lower for firms with positive cash flows than for firms with negative cash flows because firms with negative cash flows face a certain amount of cash flow asymmetry. Furthermore, not all low-profit projects can be terminated due to contractual obligations, the desire to avoid bad news, and managers' incentives not to abandon in order to maximize their private interests. Therefore, we argue that the impact of the lack of political relations at the company level on liquidity fluctuations in "positive cash flow sensitivity" is less than "negative cash flow sensitivity". Given that the overall economy and financial position of companies are affected by political relations, it can have detrimental effects if the economic unit does not have political relations when the country faces an economic crisis. Of course, this can vary over the life of the company. Accordingly, the lack of political relations in general can be a concern for the economic unit in the future (Brougard et al., 2020). According to the research of Hassan et al. (2019), political risk (caused by the lack of political relations) at the company level can create or affect other types of risks in liquidity management, such as credit risk and labor market risk, and covers a much broader and unique aspect of risk than different types of risk. According to the argument presented, this study seeks to examine the effect of asymmetric cash flows on the relationship between political relations and liquidity fluctuations. The following are the references related to the main title of the study:

Timbate et al. (2024) examined firm-level political uncertainty, corporate lobbying, and risk-taking. Using a recent construct and a large sample of U.S. nonfinancial firms from 2002 to 2021, they found evidence that firm-specific political uncertainty is positively associated with firm risk-taking, especially for larger firms. On average, a one-standard deviation increase in firm-level political risk leads to a 53.2% increase in risk-taking. Further analysis shows that the impact of firm-level political uncertainty on firm risk-taking is more pronounced for firms that spend more on corporate lobbying. James et al. (2023) found in a study using a large sample of US firms from 2003 to 2018 that political uncertainty reduces the sensitivity of cash flow to liquidity and that the impact of political risk is asymmetric (positive vs. negative) across cash flow types. Intensifying political uncertainty forces firms with positive/negative cash flow to reduce cash flow savings to finance investment opportunities and terminate unprofitable projects to recover cash. Li et al. (2019) studied the impact of political relations on firm performance and its mechanisms in China. Their results showed that levels of political

connections lead to increased firm performance. Levels of political connections also vary across state-owned firms. Finally, their findings suggest that constraints on financing also differ between firms with political connections and other firms. [Yunsen Chen et al. \(2018\)](#) examined the relationship between political influence and investment efficiency. Their research results showed that the birthplace or residence of political figures in a region can affect the investment efficiency of firms headquartered in that region. They also found that such political influence significantly reduces the investment efficiency of firms, and deviations from optimal investment are mainly due to overinvestment.

[Tsiu et al. \(2018\)](#) studied the effect of political ties and business groups on the level of cash accumulation in a dataset of 10,832 observations from 2015 to 2008. They found that political ties are positively related to the level of cash accumulation, while business group affiliation is negatively related to the level of cash accumulation. Finally, the relationship between the combination of political ties and business group affiliation has a significant positive relationship with the level of cash accumulation of the company. [Dechu et al. \(2012\)](#) examined the asymmetric sensitivity of cash holdings to cash flows in Chinese companies between 1972 and 2006 and concluded that the sensitivity of cash holdings to cash flows is negative, especially when a company faces a cash flow environment. [Daniel et al. \(2014\)](#) studied the effect of asymmetric cash flows on the relationship between financing constraints and conservatism. In this study, they examined conservatism from the perspective of conditional conservatism. They found that financing constraints and the sensitivity of asymmetric cash flows have a negative and significant effect on conditional conservatism ([James et al., 2023](#)). [Shan and Vassa \(2009\)](#) in a study titled *The Effect of Uncertainty on Cash Flows and Dividend Policy*, conducted a statistical sample of 5,000 companies from 7 countries during 1994-2005 to examine the factors affecting dividend policy, including uncertainty in cash flow, conflict of interest from agency, capital composition, and growth opportunities, and concluded that there is a negative and significant relationship between uncertainty in cash flow and dividend policy. This relationship is also more important than the effect of other potential factors affecting dividend policy ([Huang et al., 2023](#)). [Faccio et al. \(2007\)](#) studied the characteristics of political companies in their research. The results of the study, which was conducted based on data from 47 countries, showed that political companies have higher leverage and higher market prices than other companies. [Faulkender \(2006\)](#) studied the characteristics affecting the amount of cash in small business units. His findings indicate that, unlike large companies, in small companies, as leverage increases, the amount of cash held also increases. In addition, companies that have better reputation and companies that have better financial conditions hold less cash ([James et al., 2023](#)). [Godfrey and Jones \(1999\)](#) used the market share basis as the effects of political costs on profit smoothing. The hypothesis of this study was whether political costs have an effect on profit smoothing or not. The results obtained show that companies operating in the banking, finance, research, fundamental and municipal services sectors also incur more political costs.

Research Method

The present study is considered an applied research in terms of its purpose. The purpose of applied research is to develop applied knowledge in a specific field. In other words, applied research is directed towards the practical application of knowledge. Also, in terms of the method of data collection, this research is descriptive (because it leads to a greater understanding of existing conditions and helps in the decision-making process) and correlational. Because it examines the degree of dependence of the dependent variable and the independent variable on each other. The research method is inductive in which the theoretical foundations and research background are collected through the library, articles and the Internet, and inductive reasoning is used to generalize the results in rejecting or proving the research hypothesis by using appropriate statistical methods. In this study, data will be used in the form of year-company to test the hypothesis.

Research Statistical population

The statistical population of the study includes all companies listed on the Tehran Stock Exchange and the OTC market, for which the following adjustments have been made for its selection. 1- The companies' fiscal year ends at the end of March; 2- During the time frame of the research, they have not stopped their activities and have not changed their fiscal period; 3- Due to information limitations, they are not part of the over-the-counter primary market companies; 4- They are not part of investment (holding) and financial intermediation (leasing and banking) and insurance companies; 5- During the time frame of the research, there has been no trading break of more than six months and their information is available for at least one year. After applying the above adjustments, 145 companies were included in the statistical population of this research. The time frame of the research is 10 fiscal periods (from 2013 to 2022) and 1450 company years. It should be noted that the data was collected using the new Rahavard software and the information published by the companies on the KODAL network and the Stock Exchange Organization's transaction archive.

Research Hypotheses

Based on the theoretical foundations mentioned, the research hypotheses are as follows:

Hypothesis (1): Political relations affect liquidity fluctuations.

Hypothesis (2): Asymmetric cash flows affect the relationship between political relations and liquidity fluctuations.

Research variables and their operational definitions

Given that this research examines the effect of asymmetric cash flows on the relationship between political relations and liquidity fluctuations, the method of measuring independent, dependent, moderating, and finally control variables based on the research of [James et al. \(2023\)](#) is considered as follows, which can be seen in statistical models:

Hypothesis test model (1):

$$CS_{it} = \beta_0 + \beta_1 PR_{it} + \beta_2 SIZE_{it} + \beta_3 LEV_{it} + \beta_4 Q. Tobin_{it} + \beta_5 AGE_{it} + \beta_6 LOSS_{it} + \beta_7 KZ_{it} + e_{it}$$

Hypothesis test model (2):

$$CS_{it} = \beta_0 + \beta_1 PR_{it} + \beta_2 ACF_{it} + \beta_3 PR*ACF_{it} + \beta_4 SIZE_{it} + \beta_5 LEV_{it} + \beta_6 Q. Tobin_{it} + \beta_7 AGE_{it} + \beta_8 LOSS_{it} + \beta_9 KZ_{it} + e_i$$

Table 1. Symbols of research variables

Variable name	symbol	Variable name	symbol
Political relations	PR	Tobin Q Index	Q.Tobin
Liquidity fluctuations	CS	Firm Age	AGE
Asymmetric cash flow	ACF	Lossiness	LOSS
Company size	SIZE	Financing Constraints	KZ
Financial leverage	LEV	Error Amount	e_{it}

The following is the method of measuring each of the research variables:

Company's political relations

In general, according to the research of [Facio \(2006\)](#), [Niko Maram et al. \(2013\)](#), and [Rahnemay Roudpeshti and Mohseni \(2010\)](#), the method of measuring political relations is defined as follows: Political relations means that at least one of the major shareholders (shareholders that hold at least 20 percent of the company's voting shares according to Accounting Standard No. 20) of the company is, directly or indirectly, "the government and government institutions" or that "one of the senior officials (the company's CEO, deputy, chairman and vice chairman of the board of directors) holds a political or government position currently or in previous periods". If any of the aforementioned conditions are met for each year-company, the dummy variable is considered to be one (have political relations) and otherwise, the dummy variable is considered to be zero (do not have political relations).

Liquidity Fluctuations

To measure this variable, according to the research of [James et al. \(2023\)](#), the following ratio is used.

$$\text{Liquidity Sensitivity} = \left(\frac{\text{Current Year Liquidity} - \text{Past Year Liquidity}}{\text{Total Asset Book Value}} \right)$$

Asymmetric Cash Flows

The independent variable in this study is asymmetric cash flows. In general, companies that have negative cash flows face asymmetric cash flows. Because the sensitivity of cash flows in negative cash flows is greater than positive cash flows. In this study, following the models and theoretical framework presented in the research of [Dicha et al. \(2012\)](#), [Madhani \(2008\)](#), [Haghighat and Heydari \(2013\)](#), and [Sepasi and Yabloui-Khamsaloui \(2013\)](#), the aforementioned variable is calculated as follows:

$$ACF_{i,t} = CF * Neg$$

Where:

$CF_{i,t}$ = is equal to the cash flow ratio, which is calculated as follows:

$$\text{Cash Flow Ratio} = \left(\frac{\text{Operating Cash Flows}}{\text{Total Assets Book Value}} \right)$$

Neg = It is equal to the artificial variable of negative cash flows, which is equal to 1 (one) if the company has negative cash flows in the year under review and equal to 0 (zero) otherwise. It should be noted that in the hypothesis testing model, the aforementioned variable does not become a dummy variable.

Control variables

The control variables according to [James et al. \(2023\)](#) are as follows.

Company size: This variable is calculated through the natural logarithm of total assets at the end of the financial period.

Financial leverage: Which is calculated through the ratio of total liabilities to total assets at the end of the period.

Tobin's Q index: In measuring this variable, the book value of assets is first calculated minus the book value of equity plus the market value of equity, and then divided by the book value of assets.

Loss-making: Loss-making of company *i* in year *t*

Company age: The logarithm of the age of company *i* in year *t*: The age of the company is calculated through the natural logarithm of the number of years elapsed from the date of establishment of the company to the year in question.

Restrictions on financing: Restrictions that prevent the provision of all funds required for investment (Kanaani Amiri 2007). Companies are said to have financial constraints that have low and costly access to external financing sources. In this study, the *kz* index was used to calculate the financing constraints. Dagmi (2006) expanded the study of Kaplan and Zingalas (1977) on the criteria of financing constraints and presented an index based on which companies with financing constraints can be identified. Based on this index, companies with the highest values of this index are evaluated as having the highest financing constraints. The calculation of this index is as follows:

$$KZ = -1.002 * CF + 0.383 * Q \text{ Tobin} + 3.139 * LEV - 39.368 * DIV - 1.315 * C$$

Where:

KZ: Index of constraints on financing

CF: Cash flows divided by assets

Q: Tobin's Q index

LEV: Debt-to-asset ratio

DIV: Dividends divided by assets

C: Cash balance

However, given that the aforementioned model is based on the American economic environment, the present model must be adjusted, so in this study we use the adjusted model that [Tehrani and Hesarzadeh \(2012\)](#) used.

$$KZ = 17.330 - 37.486 * C - 15.216 * DIV + 3.394 * LEV - 1.402 * Q \text{ Tobin}$$

It is worth mentioning that the above model is fitted based on the economic environment of Iran. In the following, after calculating the above model for each year, the company is taken from the KZ of the statistical sample in quintiles, and after that year, the companies that are in the fourth and fifth quintiles are companies with constraints on financing. The [table 2](#) presents the above content more clearly. Regarding the analysis of the division of companies using quintiles, it can be said that this division is a result of the results of research by [Tehrani and Hesarzadeh \(2012\)](#), and in this study they found that companies in quintiles 4 and 5 have limitations in financing. Of course, it is worth mentioning that in this study, in order to arrive at the model of companies with limitations in financing and without limitations in financing, it was specified.

Table 2. Table of companies classified by probability of financing constraints

Titles	Quintet 5	Quintet 4	Quintet 3	Quintet 2	Quintet 1
Possible financing constraints	%80 to %100	%60 to %80	%40 to %60	%20 to %40	0 to %20
Companies with financing constraints	*	*			

Research Findings

In general, the research findings are divided into two parts: descriptive and inferential statistics, which are presented as follows.

Descriptive statistics of research variables: A summary of the descriptive statistics of the research variables after screening and removing outliers is as follows:

Table 3. Descriptive statistics of the research variables model in the total sample

Variable	Mean	Median	Max.	Min.	STD	Skewness	kurtosis
(CS)	0.020	0.005	0.680	-0.541	0.085	0.829	3.186
(SIZE)	14.797	14.643	21.124	10.532	1.564	0.706	4.331
(LEV)	0.546	0.550	1.567	0.031	0.208	0.091	3.108
(Q.Tobin)	3.007	1.966	21.719	0.674	3.109	3.796	20.219

Variable	Mean	Median	Max.	Min.	STD	Skewness	kurtosis
(AGE)	3.038	3.044	4.025	1.609	0.394	0.097	3.259
(ACF)	Year - Companies without asymmetric cash flow: 1268 Year - Companies with asymmetric cash flow: 182						
(PR)	Year - Companies without corporate political ties: 875 Year - Companies with corporate political ties: 575						
(LOSS)	Year - Profitable companies: 1327 Year - Loss-making companies: 123						
(KZ)	Year - Companies without financing constraints: 870 Year - Companies with financing constraints: 580						

According to Table 3, the number of observations per year - company based on balanced composite data was 1450 observations, equal to 145 companies in 10 years. According to descriptive statistics, the above indicators can be divided into central, dispersion and other indicators, where the central indicators are the mean and median index, dispersion indicators are the standard deviation index and other indicators are the maximum, minimum, skewness and elongation index. In short, the average financial leverage of companies shows that the average ratio of total debt to assets of the sample companies during the research period is 54.6 percent. This confirms that the companies have a favorable situation in terms of credit rating and have used debt more to secure their capital structure. This is probably because in the Iranian economic environment, the use of debt has been less binding for the sample companies or that investors prefer to make investments other than stocks. Also, the descriptive statistics of the asymmetric cash flow variable show that 1268 observations do not have asymmetric cash flow and 182 observations have asymmetric cash flow. Also, the qualitative variable of political relations shows that 875 observations do not have political relations of the company and 575 observations have political relations of the company. Regarding the negative skewness coefficient of some variables, it can also be said that this indicates the existence of a skew to the right and the tendency of these variables to smaller values. Also, the positiveness of the skewness coefficients indicates that they are higher than the normal distribution and the data are concentrated around the mean.

Normality test of the distribution of the dependent variables of the research: In this study, the Kolmogorov-Smirnov (K-S) test is used to check the normality of the research variables.

Table 4. Results of the normality test of the distribution of the dependent variable

Variable	K-S test results					
	Mean	Std.	Positive	Negative	K-S	Sig.
(CS)	0.020	0.085	0.680	-0.541	1.187	0.087

According to Table 4, after the normality test, the significance level of the Z statistic of the KS test for the dependent variable (liquidity fluctuations) increased to above 0.05. Therefore, the hypothesis H0 that the distribution of the dependent variable is normal is accepted, indicating that the dependent variable of the study has a normal distribution. Therefore, parametric statistical methods are used to test the hypotheses.

Results of inferential statistics for testing research hypotheses

Given that the first hypothesis of the research is tested using linear regression, the results of inferential statistics for testing this hypothesis are as follows:

Table 5. Results of inferential statistics for testing hypotheses

Statistic Title	hypothesis First		Second hypothesis	
	Statistical value	significance level	Statistical value	significance level
Results of the statistics of F-limer	Prob. 0.000	5.292	Prob. 0.000	5.593
Results of the statistics of H-hausman	Prob. 0.000	46.933	Prob. 0.000	50.340
Results of the statistics of F. White	Prob. 0.143	1.271	Prob. 0.571	0.950
Results of the statistics of Godfrey	Prob. 0.254	1.295	Prob. 0.157	2.106

According to Table 5, the significance level of the F-limer statistic is less than the acceptable error level (5 percent), so the panel data method is preferable to the pooled data method. Also, since the significance level of the H-hausman statistic is less than the acceptable error level (5 percent), the fixed effects regression method is preferable to the random effects regression method. In addition, the significance level of the White statistic is greater than the acceptable error level, so we do not face the problem of variance heterogeneity. Finally, since the significance level of the Godfrey statistic is greater than the acceptable error level, the regression does not have the problem of serial autocorrelation.

Results of the first hypothesis test

The results of the first hypothesis test are as shown in Table 6.

Table 6. Model estimation results for the first research hypothesis

Variable name and symbol	Regression coefficient	t statistic	Sig.	VIF statistic
(PR)	-0.044	-9.809	0.000	1.020
(SIZE)	0.011	7.017	0.000	1.031
(LEV)	0.017	1.366	0.172	1.329
(Q.Tobin)	0.000	-0.621	0.534	1.209
(AGE)	-0.007	-1.372	0.170	1.046
(LOSS)	-0.013	-2.055	0.031	1.142
(KZ)	-0.026	-5.517	0.000	1.474
Constant	0.064	2.221	0.026	-
F statistic	23.340	Durbin-Watson statistic		2.096
(Sig.)	0.000			
(Coefficient of determination)	0.229	Jarque-Bera statistic		11.145
		(Sig.)		0.084

Based on the results of the first hypothesis test (in Table 6), given that the F statistic (0.000) has a significance level below (5 percent), therefore the regression has explanatory power. The coefficient of determination of the model also indicates that 22.9 percent of the changes in the liquidity fluctuations variable are explained by the variables entered in the model. Also, in examining the assumptions of classical regression, the results of the Jacobra test indicate that the residuals obtained from the model estimation have a normal distribution at a confidence level of 95%, so that the significance level related to this test is greater than 0.05 (0.084). Also, given that the value of the model's Durbin Watson statistic is between 1.5 and 2.5 (2.096), it can be said that the model does not have a problem of autocorrelation of the residuals. Finally, considering the significance level of the political relations variable (independent variable) which is below 0.05 (0.000), political relations have a negative and significant effect on liquidity fluctuations. Also, among the control variables, company size has a significant positive effect on liquidity fluctuations, and being unprofitable and having limitations in financing have a significant negative effect on liquidity fluctuations. Finally, with the collinearity test between the research variables, the VIF (variance inflation factor) statistic value for all variables is smaller than 5, indicating that there is no severe collinearity problem between the research variables.

Results of the second hypothesis test

The results of the second hypothesis test are as follows in Table 7.

Table 7. Model estimation results for the second hypothesis of the research

Variable name and symbol	Regression coefficient	t statistic	Sig.	VIF statistic
(PR)	-0.039	-8.797	0.000	1.077
(ACF)	0.056	4.402	0.161	1.278
(PR*ACF)	-0.454	-3.182	0.001	1.291
(SIZE)	0.011	7.138	0.000	1.041
(LEV)	0.017	1.395	0.163	1.333
(Q.Tobin)	-0.000	-0.595	0.551	1.238
(AGE)	-0.006	-1.352	0.176	1.047
(LOSS)	-0.014	-2.113	0.028	1.143
(KZ)	-0.025	-5.534	0.000	1.475
Constant	0.076	2.627	0.008	-
F statistic	23.630	Durbin-Watson statistic		2.058
(Sig.)	0.000			
(Coefficient of determination)	0.246	Jarque-Bera statistic		11.145
		(Sig.)		0.084

Based on the results of the second hypothesis test (in [Table 7](#)), given that the F statistic (0.000) has a significance level below (5 percent), therefore the regression has explanatory power. The coefficient of determination of the model also indicates that 24.6 percent of the changes in the liquidity fluctuations variable are explained by the variables entered in the model. Also, in examining the assumptions of classical regression, the results of the Jarcoobra test indicate that the residuals obtained from the model estimation have a normal distribution at a confidence level of 95%, so that the significance level related to this test is greater than 0.05 (0.084). Also, given that the value of the Durbin Watson statistic of the model is between 1.5 and 2.5 (2.058), it can be said that the problem of autocorrelation of the residuals does not exist in the model. Finally, considering the significance level of the interactive variable of asymmetric cash flows and political relations (independent variable) which is below 0.05 (0.001), asymmetric cash flows have a negative and significant effect on the relationship between political relations and liquidity fluctuations. Also, among the control variables, company size has a significant positive effect on liquidity fluctuations, and being unprofitable and having limitations in financing have a significant negative effect on liquidity fluctuations. Finally, with the collinearity test between the research variables, the VIF (variance inflation factor) statistic value for all variables is smaller than 5, indicating that there is no severe collinearity problem between the research variables.

Conclusion and Suggestions

Cash is an important and vital resource in every profit-making unit, and creating a balance between available cash and cash needs is considered the most important factor in the health of every business unit. Considering this, several factors can affect the liquidity of the company. Therefore, this study seeks to examine the effect of asymmetric cash flows on the relationship between political relations and liquidity fluctuations. The findings of the study indicate that political relations have a significant negative effect on liquidity fluctuations, and asymmetric cash flows also have a significant negative effect on the relationship between political relations and liquidity fluctuations. The results and findings of the first hypothesis are consistent with the theoretical framework and results presented in the studies of [Timbate et al. \(2024\)](#) and [James et al. \(2023\)](#). Regarding the interpretation of the results, it can be said that according to political theories, when companies have significant political relations, due to government support, these companies use favorable financial credits in the banking system. Because these companies participate in some investments related to the government's national development programs. In some cases, these companies even pay less tax. Accordingly, these companies often have significant liquidity accumulation and face fewer financial constraints. All these factors can lead to a reduction in business risks, including liquidity fluctuations. The results and findings of the second hypothesis are consistent with the theoretical framework and results presented in the research of [James et al. \(2023\)](#), [Riddick and Whited \(2009\)](#), and [Almeida \(2004\)](#). As mentioned in the previous hypothesis, companies with political ties also work to advance the government's goals in national development programs. Accordingly, companies with this characteristic, when faced with asymmetric cash flows, cannot immediately stop all their projects. In this regard, given the political support they receive, they are forced to continue at least some of their projects. On the other hand, managers in conditions of asymmetric cash flows try to continue even their profitable projects, in order to prevent the spread of bad news to the market resulting from the suspension of unprofitable projects and, by doing so, to keep time in their favor. The following are the research suggestions: According to the results of the research hypotheses, it is suggested that users of information on listed companies, especially potential shareholders, in evaluating the stocks of companies in the desired industry, while trusting and relying on the financial information of the companies, consider the level of liquidity fluctuations and political relations of the companies in their decisions to buy, hold and sell the stocks of such companies. It is suggested that capital market analysts, in addition to considering other criteria in evaluating the financial performance of companies, pay attention to the variables of liquidity fluctuations and asymmetric cash flows and the impact of the company's political relations on the aforementioned variables, and even use other models and calculation methods in line with these variables. Given that asymmetry in a company's cash flows has information content and behaves differently (in terms of the intensity of the relationship) with the level of cash holdings of companies, it is suggested to managers to pay attention to the different sign and impact of asymmetric cash flows of the company in assessing liquidity sensitivity. Finally, it is suggested to policymakers and supervisory institutions, including the Tehran Stock Exchange, to use the results obtained and known from this study to examine the fluctuations in returns and trading volumes of such companies that have political relations and liquidity fluctuations, because, as mentioned earlier, this can have information content for the capital market and, in the case of significant liquidity fluctuations, to use legal tools to force companies to prevent excessive fluctuations.

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