

A Survey on Transaction Costs: Some Evidence from Iranian OTC Market

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Abstract: Transaction costs play a significant role in the development of the investments, quality, contestability and growth of the financial markets. In addition, because of the structure of the OTC markets, these costs take a momentous role and become more important. In current survey, we have examined the viewpoints of the institutional investors and OTC brokers a census by making use of a questionnaire and Minitab and SPSS software. The results show that the statistical population believes that the implicit costs are low and formal as well legal costs of the OTC market are plausible. Overall, Transaction costs in Tehran's OTC Market are plausible and there is no significant difference between institutional investors and brokers visions on the examined variables.

Key words: Capital market • OTC market • Transaction costs • Implicit costs • Explicit costs

INTRODUCTION

Transaction costs are one of the most important factors which absorb the investors and determining the decision making process; because the investors need to be compensated for the risk and transaction costs which are imposed to them in the buying and selling process. Lowness of the transaction costs is one of the characteristics of the efficient financial markets and affects the level of market development. This means that, other things being equal, the investors' preference is to invest in markets which have the least transaction costs; because they are seeking for low costs to maximize their profits.

Transaction costs include all the costs associated with a transaction. These costs are divided into explicit and implicit costs. Transaction costs are one of the important factors in the probing of stock price (on the opening) and deciding on the enrollment of the companies and are considered as a fundamental characteristic of the matured stock markets. In addition, they are considered as one of the dimensions of the market quality, which play an important role in the determination of the level of competitiveness between different markets.

Therefore, nowadays markets (especially financial markets) have focused on the reduction of transaction costs to induce and improve bilateral cooperation's and

increasing the volume of trade and market efficiency. Reduction in transaction costs would result in the reduction of expected return of the investors, reduction of capital costs and would impel investment and start up of new businesses. Moreover, reducing transaction costs would encourage the investors to do more transactions to get short term profits and would cause to increment of buying and selling of stock.

In developed countries, OTC market is one of the new phenomena which take a complementary role in the context of stock markets. Surveys suggest that trading in OTC markets include costs which are explicit and high for small investors. High costs of these markets are caused by seeking costs and lack of transparency. It could be said that seeking costs are used to describe the dispersion of price in OTC markets and implicit costs of financial services. Investors who intend to work in these markets have to pay these charges, opportunity cost and other associated costs to make a transaction.

Therefore, regarding the effects of transaction costs in the development of the investments, volume of trade, quality improvements and market's competitive contest especially in Iranian newly established OTC market, this survey would focus on the transaction costs in this market.

Research's Questions and Hypotheses: Considering the fact that transaction costs play a significant role in the development of the investments, volume of trade, efficiency and quality improvements, market's competitive contest and the development of financial markets and noting that these costs (especially in OTC markets) include various explicit and implicit aspects, the answer of the main question of the survey conducted through two peripheral questions. Moreover, the differences in the beliefs of the statistical population considered as a hypothesis and were statistically tested.

The Main Question: Are the transaction costs of Tehran's OTC market plausible or not?

The Sub-Questions: Are the implicit costs of the Tehran's OTC market less or not (in respect to explicit costs)?

Are the formal and legal costs of the Tehran's OTC market plausible or not?

Therefore, with respect to the above questions, the following hypotheses would be tested:

The Main Hypothesis: There is a significant difference between the viewpoints of the institutional stockholders and brokers in respect to the plausibility of the transaction costs in Tehran's OTC market.

Sub-Hypotheses: There is a significant difference between the viewpoints of the institutional stock holders and brokers in respect to the lower of the implicit costs in Tehran's OTC market (in respect to explicit costs).

There is a significant difference between the viewpoints of the institutional stockholders and brokers in respect to the plausibility of the formal and legal costs in Tehran's OTC market.

Research Methodology: The statistical population of the current study covers e all of the institutional stockholders and dealers of Tehran's OTC Market which is inducted derived from the website of Iran OTC market. Therefore by using a census, the questionnaires were distributed among all the dealers of Tehran's OTC Market (which constitute 66 members) and institutional stockholders (24 members which have bought the stock of 4 listed companies). Hence 90 questionnaires were distributed of which 84 came back to the researchers. Then these questionnaires were analyzed with Minitab for Wilcoxon one sample test and examined with SPSS software for Man-Whitney test as well. The characteristics of the statistical population are provided in Table 1.

The questionnaire was closed ended and was designed with respect to Likert's five scale and the measures were derived from the previous studies.

In order to examine the first sub-question, measures of "seeking costs, the cost of the risk of performing commitments, capital expenses, investment expenses of small investors, opportunity and price probing costs" were examined and the measures of "fees and dealer charges, tax expenses, market fee, clearance charge and transaction fee and monitoring and agency charges" were used to test the second peripheral question.

Table 1: Descriptive Statistics of the Statistical Population

Variable	Description	Frequency	Percentage
Activity Field	Only OTC Market	16	19%
	OTC and Stock Market	68	81%
Background of the study	Accountancy	22	26.2%
	Financial Management	49	58.3%
	Economics	6	7.2%
	Others	7	8.3%
University Degree	Bachelor	36	42.9%
	Masters Degree	37	44%
	PHD	8	9.5%
	Others	3	3%

Table 2: The Conversion of Ordinal Measure to Interval

Completely Agree	Agree	Neutral	Disagree	Completely Disagree
5	4	3	2	1

Table 3: The Results of Kolmogorof- Smirnof for Normal Distribution of Data

Variable	D.f	Statistics Value	Significance Level
First sub-question: implicit transaction costs	83	0.187	0.001
Second sub-question: formal and legal costs	83	0.188	0.001

In order to test the justifiability of the questionnaire, 8 questionnaires were distributed among masters and pundits and their feedbacks verified the justifiability of the content and design of the questionnaire. In addition, in order to test the validity, 19 questionnaires were distributed among statistical population. Analyzing the results of these questionnaires revealed that the Cronbach's alpha coefficient was 0.87 and therefore the questionnaire was valid. In addition, in order to quantifying the ordinal measure to the interval measure the below Table 2 is used:

Hypotheses Testing: In order to testing the hypotheses, at first we checked the responses for the normality which was to guide us to use parametric or non-parametric methods depending on normality/ abnormality of the responses. The results are provided in Table 3.

As it's evident from Table 3, regarding that the level of observed significance for data of each sub-question is smaller than 0.05 ($\text{sig} < 0.05$) so, the normality distribution of data is rejected. Therefore we would use the one sample Wilcoxon non-parametric method to test the answers.

Therefore the null and alternative hypotheses could be regarded as:

$$\begin{cases} H_0 : \mu \leq 3 \\ H_1 : \mu > 3 \end{cases}$$

The results of test are shown in Table 4 as follows:

Table 4: The Results of One Sample Wilcoxon for sub-questions

Variable	Statistics Value	Mean	Number of Observations	Significance Level
Implicit transaction costs	2201	3.24	83	0.003
formal and legal costs	2583	3.58	83	0.001

Table 5: The Results of Mann- Whitney test

Variable	Statistics Value	Order Mean	Number of Observations	Groups	Significance Level
Implicit transaction costs	602	45.14	22	Institutional investors	0.470
		40.87	62	Dealers	
Formal and legal costs	590	45.68	22	Institutional investors	0.391
		40.67	62	Dealers	

The results of the Table 4 shows that the significance level for the Wilcoxon degree test for the hypothesis H_0 for the question one (implicit transaction costs) stood at 0.003 and for question 2 (formal and legal costs) was 0.001. Hence both the significance levels are less than 0.05 and therefore null hypothesis is rejected and alternative hypothesis is accepted. This means that the answers to the both questions are positive. In other words, statistical population believes that the implicit costs in Tehran's OTC Market are less (with respect to explicit costs) and formal and legal costs are plausible.

Because of the positive views of the participants about the sub-questions, in order to separately testing the thoughts of the participants, the difference of their views was tested. Because data is not normally distributed, for measuring the difference between views of statistical population (institutional investors and dealers), the Mann- Whitney non -parametric method is employed.

To examine this difference, the below hypotheses are tested:

$$\begin{cases} H_0 : \mu (\text{institutional investors}) = \mu (\text{dealers}) \\ H_1 : \mu (\text{institutional investors}) \neq \mu (\text{dealers}) \end{cases}$$

The results of tests are provided in Table 5.

The results of the table show that the significance level associated with Mann- Whitney test for hypothesis H_0 about difference of viewpoints in statistical sample for the first question (implicit transaction costs)

is 0.470 while it is 0.391 for the latter (formal and legal costs) and both are more than 0.05. Therefore, null hypotheses are accepted and alternative ones are rejected which means that the difference between the viewpoints of these groups is not accepted and there is no significance difference in the viewpoints of institutional investors and dealers in respect to the lowness of implicit transaction costs and plausibility of formal and legal costs of Tehran's OTC Market.

CONCLUSION

Transaction costs are one of the most important factors which affect the investments, efficiency of market, quality and contestability of financial markets and take a great role in the development of capital markets and OTC markets (due to their structures). Therefore OTC markets have focused on decreasing transaction costs in order to increase the volume of trade, market efficiency and bilateral communications. Hence, this survey examined the thoughts of investors and dealers of Tehran's OTC Market in respect to transaction costs. The findings of the study shows that in institutional investors' and dealers viewpoints, implicit transaction costs of Tehran's OTC Market are less (in respect to explicit transaction costs) and formal and legal costs are plausible. In addition, there is no significant difference between their viewpoints on the examined variables. Overall, while there is no significant difference between viewpoints institutional investors and dealers, both believe that the transaction costs of Tehran's OTC Market are plausible.

Our findings have significant differences with other researches. Babus [1], believes that OTC markets are markets which have high implicit transaction costs (especially for small investors). On other hand, Hail and Leutz [2], Huang and Stoll [3] argue that transaction costs are higher in OTC markets but our research shows that there is a low implicit transaction in Tehran's OTC Market and investors (even small ones) do their transaction on a plausible and justifiable transaction cost. This is because seeking costs, risk of performing commitments and intermediary expenses in Tehran's OTC market are low and at the minimum level. Moreover, fees and dealer charges, tax expenses, market fee and other taken and legal charges are plausible and justifiable.

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