Empirical Research on the Effects of Firm-Bank Relationship on Firm's Performance in Pakistan

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Abstract
In this competitive world of business, every commercial organization is in search of better performance with the help reduction in costs and establishing good market relationships. Bank relationships is one of such policies in order to achieve better performance. This paper has discussed a new aspect of these relationships and its impact on client firm's performance. The research has collected a data of non-financial firms listed in Pakistan Stock Exchange for a period of 2006-2015 and investigated the impact of Islamic Bank relationships in comparison to the Conventional bank relationships with respect to contribution in client firm performance. The results show that performance of client firm is associated with Islamic banking relationship, positively and significantly. ROA, ROE, ROS and Tobin's Q are used as the proxies for firm performance and a ratio is calculated between numbers of bank relationship of Islamic bank to conventional bank. In the light of our findings, we suggest that the firms in Pakistan may get more benefits by establishing bank relationships with Islamic banks.
Keywords: Firm-bank relationship, Islamic bank, bank relationship, firm performance.

1. Introduction

With an emergence of interest-free Islamic banks, the banking industry and system has evolve different scenarios for financial decision makers in many countries generally and in Islamic countries specifically. The choice of Islamic against conventional banks as intermediaries or finance providers is difficult and ambiguous without an in depth knowledge of their operations and characteristics. In past, many researchers have attempted to indicate the difference between Islamic and Conventional banking system with respect to their product offering, management approach and quality of operations since 1970s (Hasan & Dridi, 2010b; Shaban, Duygun, Anwar, & Akbar, 2014). Unexpectedly, this relatively new form of banking system has shown a double-digit growth for recent years which indicates the importance of research to be conducted in this area. The researches have enlighten the different characteristics of this contrasting banking system with respect to following:

1. asset growth (Hasan & Dridi, 2010a),
2. business orientation (Shaban et al., 2014),
3. corporate social responsibility (Mallin, Farag, & Ow-Yong, 2014),
4. credit risk (Baele, Farooq, & Ongena, 2014),
5. efficiency (Al-Jarrah & Molyneux, 2006),
6. insolvency risk (Čihák & Hesse, 2010),
7. and market power (Weill, 2011).

Above mentioned differences stimulate the research to investigate further that how these difference can affect the economy in a broader prospective and industry in shorter prospective. This research is aimed to investigate the relationship between such dual-banking system and client firm's performance. Targeted market for said research is Pakistani non-financial firms as Pakistan may be one of the few countries where both well-developed conventional and Islamic banks have co-existed for a considerable period of time. This heterogeneity of banking industry helps us to investigate and find the answer to the proposed question of our research.

The data for our research is collected from the published reports of the banking industry as well as the listed firms in Pakistan Stock Exchange for a period of 2006-15. The data is analyzed with the help of STATA by regressing the model of our research. Later portion of the paper will explain the related literature, methodology, analysis results and findings of the research with some recommendation to the stakeholders and future avenues of research in the same area.

2. Empirical Research

Like interest based commercial banks, Islamic banks are also the guardian of people's money but with a disparity, that Islamic bank is sharing profit and loss with customer while conventional banks not. This superiority makes Islamic banking unique from conventional banking and give some ownership rights to customers. Islamic banking and conventional banking are very much dissimilar from each other, as conventional banking have interest based ideology. While Islamic banking has interest free system and principles and distribution their profit and loss with customer and sometimes share their services with business intermediaries (Ariff, 1988). According to (Henry & Wilson, 2004) and (Z. Iqbal & Mirakhor, 2011), Islamic banks execute the same financial activities as performed by other conventional banks, except that the transactions of Islamic banks are according to the Shariah rules and principles. (Hussein, 2010) said that conventional banks are evolving and operated over several centuries, whereas Islamic banks are purposely developed to operate within Shariah rules and regulation over the last 30 years (Ainley, Mashayekhi, Hicks, Rahman, & Ravalia, 2007; Chong & Liu, 2009; M. Iqbal & Molyneux, 2016; Safieddine, 2009; Sole, 2007).

In all over the world, Islamic Banking is growing very fast and particularly in Pakistan while on other hand conventional banking is declining in even those economies who were considering the base of capitalism and roots of interest based banking. Due to the economic crises these financial organizations are trying to lower their interest rates to get customers from market but they are not succeeded in getting desired the results. Dozens of strong financial institutions are trapped in savior condition. (Memon, 2007).

A firm can maintain a bank relationship in different ways such as deposits, credits and banking services (Thanh & Ha, 2013). A firm may seek some benefits by developing good banking relations which can be categorized as follows:

- To Enrich business standing and lessen leakage of information to rivals (Campbell, 1979).
- Shrinkage the damaging impact of distorted information (Bolton & Freixas, 2000)
- Remedy against hold-up problem (Bolton & Scharfstein, 1996): holdup problems is due to the information acquired by the bank that gives her a sort of monopoly power and allows to charge higher interest rate from its client firms. This holdup problem may lead to multiple lending as a remedy.
- To moderate agency clashes linked to financial intermediation (Deloof & Vermoesen, 2010): inclusion of covenants that allow for controlling potential conflict of interest.
- To increase accessibility to loans and to reduce the interest cost (Bhaumik & Piesse, 2008; Clarke, Cull, & Peria, 2002; Houston & James, 1996): flexibility and discretion in contracts.
- To provide monitoring for firms (Bharadwaj & Shivdasani, 2003; Kang & Shivdasani, 1997; Kaplan, 1994; Kaplan & Minton, 1994): The relationship invests in obtaining customer information (via screening and monitoring) and evaluates the profitability of investment.

The above-mentioned benefits will allow firms to decrease dependence on liquidity of cash flow within the firms and effortlessly invest in fixed assets with lower cost of capital that will further lead to optimize cash reserve and better profitability (Fazzari, Hubbard, Petersen, Blinder, & Poterba, 1988; Hoshi, Kashyap, & Scharfstein, 1991; Ramirez, 1995; Thanh & Ha, 2013). Same is argued by Shen and Wang (2005) which exemplifies that how much beneficial is the good bank relationship for the firms. Furthermore, Kutsuna, Smith, and Smith (2007) posit that firms having good relationships with banks have better credibility and access to capital markets. This argument suggests that a firm in good relationship with its bank(s) has better chance to win new credit lines and has better access to a capital market which in return assures a better liquidity position as well as guarantees future cash flows.

Bank monitoring may constrain the ability of its client firms to capitalize new opportunities which are riskier in nature but more profitable. As researcher reports that banks some time plays a supervisory role and they discourage managers to invest in high-risk projects that do not permit firms to realize profit breakthrough (Massa & Dass, 2006). This aspect of the firm-bank relationship is supplementing the argument that the commercial companies (banks) which provide financial intermediation to their client firms are also bound to their own objective of profit maximization.

The stated phenomena of firm-bank relationship expands the view of such relationship and their effectiveness for client firms. Researches on the difference of Islamic and Conventional banks have reported the unlike characteristics of this heterogeneous banking environment which may also affect the fate of firm-bank relationship with respect to client firm's performance (Abedifar, Molyneux, & Tarazi, 2013; Shaban et al., 2014). This is evident that Islamic banks are different from Conventional banks in many aspects including their growth rate of assets, business orientation, credit risk and interest rate risks so, the question arises about the impact of firm-bank relationship on client firm's performance while establishing relationship with different banks (Islamic or Conventional) and brings us to our hypothesis as follows:

H1*: There is a significant relationship between financing from Islamic banks and client firm's performance.*

3. Empirical Test

In the following section we will try to explain our data source, sample and control variables. Then, we will design our regression model.

3.1 Data source

As most of the researches focuses on developed markets, for this research we have taken Pakistan as our area of interest being the emerging market and developing country. Total number of listed firms on Pakistan stock exchange (PSE) are 581. 75 firms are from financial and equity investment sector. This reduced the number of firms to 506 in which 24 listed firms are commercial banks. 32 firms are from insurance sector which reduced our sample of interest to 450 listed companies. We have taken data of 404 nonfinancial firms (for which data is available) listed on Pakistan stock exchange (PSE) from 2006 to 2015 and total number of observations is 1855. The data of the listed companies in Pakistan Stock exchange is obtained from their published financial reports. We have gathered a data from the official websites of the listed companies for a period from 2006-2015.

3.2 Dependent Variables

As the research is aimed to investigate the impact of different types of financing relationship with respect to Islamic and Conventional bank relationship on client firm's performance, we consider the most appropriate and commonly used performance indicators such as ROA, ROE, ROS and TQ for our research.

Return on Asset is a financial ratio that indicates the firm's performance as it depicts the firm's ability to use its assets efficiently to gain returns.

Return on Sales is also an important indicator of the firm's performance as it explains return generation through the effective use of efficient sales.

Return on Equity is another famous and frequently used measure of firm's performance. This measure explains the efficiency and effectiveness of the firm's management with respect to its equity employed.

Market Value / Tobin's Q helps to explain the market performance of the firm that how firm's market value behaves.

3.3 Independent Variable

The variable of interest in this research is calculated as the ratio of Islamic firm-bank relationships to Conventional firm-bank relationships. For this purpose, we have collected the information of all established bank relationship with a single firm at time *t.* We expect a significant relationship between change in the above mentioned ratio and client firm's performance.

3.4 Other Variables

Firm performance is dependent on different characteristics of the firm itself therefore, we have include some widely accepted firm level indicators in our model that includes firm size, growth, age, leverage, tangibility and liquidity as control variables.

Firm Age (FAGE) is the numeric value of the age of the firm, calculated as the difference of the year of observation and the year of commencement of its business. This factor is important to include as the firms with different ages differ in their growth rate, financial efficiency and demand for financing.

Firm's Liquidity is a financial indicator for the availability of liquid assets for investment, growth and profitability. Therefore, the firms with different liquidity may differ in financial performance and the requirement of firm-bank relationships.

Firm's Tangibility designates the financial position of the firm in terms of their tangible assets.

By inclusion of all said variables we conclude our research model for analysis as follows:

$$\boldsymbol{ROA}it = \beta 0 + \beta 1\frac{\mathrm{IB}}{\mathrm{CB}} + \beta 2\, FTANGit + \beta 3\, FLEVit + \beta 4\, FLIQit + \beta 5 FGRit + \beta 6\, FSIZEit + \beta 7\, FAGEit + \varepsilon it \tag{1}$$

$$\boldsymbol{ROE}it = \beta 0 + \beta 1\frac{\mathrm{IB}}{\mathrm{CB}} + \beta 2\, FTANGit + \beta 3\, FLEVit + \beta 4\, FLIQit + \beta 5 FGRit + \beta 6\, FSIZEit + \beta 7\, FAGEit + \varepsilon it \tag{2}$$

$$\boldsymbol{ROS}it = \beta 0 + \beta 1\frac{\mathrm{IB}}{\mathrm{CB}} + \beta 2\, FTANGit + \beta 3\, FLEVit + \beta 4\, FLIQit + \beta 5 FGRit + \beta 6\, FSIZEit + \beta 7\, FAGEit + \varepsilon it \tag{3}$$

$$\boldsymbol{TQ}it = \beta 0 + \beta 1\frac{\mathrm{IB}}{\mathrm{CB}} + \beta 2\, FTANGit + \beta 3\, FLEVit + \beta 4\, FLIQit + \beta 5 FGRit + \beta 6\, FSIZEit + \beta 7\, FAGEit + \varepsilon it \tag{4}$$

In this research, we are following the quantitative approach for analyzing the relationship of studied variables. The research is focusing mainly on mixed method approach as we use qualitative study for analyzing the existent literature on the subject matter and then we pursue our following research with quantitative techniques for investigating the data gathered from past published annual reports of the firms listed in Pakistan Stock Exchange.

We have considered all the listed firms on Pakistan Stock Exchange (PSE) during the period from 2006-2015. The listed firms in PSE are registered under different categories having a grand total of 550. The firms are taken from all the industries in order to generalize the results of the study but we have excluded the firms which are newly registered and the data for which are electronically unavailable for analysis.

Multicollinearity is the assumption that must be tested before applying any regression analysis as such problem existence is because of one variable is superfluous. Therefore, such variable should not be included in the regression model as an explanatory variable. In order to check the multicollinearity assumption for our regression model, we have used Pearson correlation. The said correlation is run for the dependent, independent and control variable for the determinants of firm performance and the results for Pearson correlations shows no such problem in the data.

Regression are run to study the influencing factors of firm performance by including our new variable as the ratio of number of Islamic firm-bank relationship and Conventional firm-bank relationships. STATA, a statistical package, is used to run the regression and the results are shown in the following table. For regression analysis we have taken four proxies in different models for evaluating the effect of number of Islamic vs Conventional firm-bank relationship.

The results for ROA are found to be positive and significant at 1%. The coefficient value is 0.0364 for studied variable which explains that if the value of ratio between Islamic and Conventional firm-bank relationship is increased the performance of the corresponding client firm will be increased by value of coefficient. This indicates that the Islamic bank relationship is better for the client firm performance when the measure of performance is take as ROA. Rest of the control variable has shown the results as expected and are consistent with the previous literature.

Table for Regression Analysis of Islamic vs Conventional Firm-bank relationships

	ROA	ROS	ROE	TQ
IB/CB	0.0364***	0.03546***	0.08786***	0.00058
FTANG	-5.8202***	1.5565*	-21.5303***	-0.77545***
FLEV	-1.9726***	-1.3535***	-2.2222**	-0.12936***
FLIQ	4.2245***	4.5594***	1.3665***	0.03471**
FGR	2.7224***	0.72835***	7.4701***	-0.02975*
FSIZE	0.53739***	0.83724***	1.3377***	0.04848***
FAGE	-0.04102***	-0.02098***	-0.04991**	-0.00581***
N	1547	1542	1427	1465
R2	0.5025	0.55843	0.22717	0.42105

Next two models of our results have analyzed the impact of Islamic vs Conventional firm-bank relationship on the performance measure ROS and ROE of the client firm. The results for the two proxies are not different from that of ROA with positive sign and magnitude as 0.03546 and 0.08786 respectively. These results affirm the significant relationship between firm performance and its established relationships with Islamic banks. The fourth model, however, does not appear to be significant as the relationship between performance of client firm when measure is taken as Tobin's q not found be significant.

In our model the results depict that there is a significant and positive relationship between Islamic firm-bank relationship and client firm performance as the coefficient is positive for almost all the proxies.

4. Conclusion

This paper aims to explain the contribution of Islamic financing with respect client firm's performance in

Pakistan. We have taken number of Islamic bank relationship and conventional bank relationships established by an individual firm at time (t) and calculated a ratio between these two in order to fit in our performance model for the client firm. The data of all non-financial listed firms on Pakistan Stock Exchange has been studied for this purpose and found that the client firm performance is positively related to the number of Islamic bank relationships. The results for all the proxies taken to measure the firm performance are found to be positive and significant with an exception of Tobin's Q. These results depicts that in Pakistani business environment Islamic bank relationship is more beneficial for the firms. These results are consistent with the findings that the Islamic banks are less risky and have better asset growth as the bank's health and size is quite important in deciding the fate of the firm-bank relationship (Delis, Kokas, & Ongena, 2016; Sultan, Qing, & Abid, 2016).

The world of banking is divided into two forms of banking now a days. One form is the Conventional banking which is interest-based while the other is non-interest-based and named as Islamic banking as it follows the rule of banking in Sharia. The firms are establishing bank relationship in order to get in time financing without any doubt of credit rationing so, it is worth to investigate which kind of these banking systems are more helpful for better performance of the client firms in a particular environment. The results have turned into the favor of Islamic banking relationships in Pakistani environment which helps the top management of the client firms in decision making related to financing. On the other hand, it will enhance the understanding of other stakeholders related to Islamic banking and the efforts made by Government of Pakistan and State Bank of Pakistan to introduce and enhance the capacity of IBs.

Furthermore, this research has opened a new horizon in the field of firm-bank relationship and its impact on client firm's performance with adding a new aspect of relationship. This kind of relationship may further be investigate by including different other firm-specific and bank-specific variables.

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