

INTRODUCTION

Iqra Journal of Business & Management is a peer reviewed journal initiated by the Business Administration Department, Iqra National University, Peshawar, Pakistan in year 2017. The aim of the journal is to publish latest research related to the field of management, business administration, marketing, finance, entrepreneurship and so on. The main contributors of the journal are academics, researchers, practitioners, consultants, and undergraduate and postgraduate students. The journal has a diverse advisory board consist of experts from developed countries as well as well-known universities at national level. The journal provides a platform for sharing diverse research work in the field and aims to reduce the gap between the industry and academia. The journal is abstracted and indexed in high ranking abstracting and indexing agencies. The journal does not charge any fee to authors and is freely available to the readers through its web site.

AIMS AND SCOPE

The Iqra Journal of Business & Management provides an excellent outlet for research and scholarship on management-related themes and topics. The journal contributions comes from all over the country as well as from abroad, and include empirical and methodological articles across the full range of business and management disciplines including;

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- Corporate Social Responsibility
- Public Sector Management
- Organizational Behavior
- Business Ethics
- Research methods

CHIEF EDITOR MESSAGE

Pakistan is going through a transitional period having long lasting impact on its economy, politics, culture, and social structure of the society. Key drivers of the transition include CPEC project, changing International and national political dynamics, globalization, climate change, and new public management. The transitional period is also putting greater pressure on organizations across the diverse range of industries/sectors to adopt according to the changing needs of the environment. In this dynamic environment, there is urgent need for research and development of indigenous new methods, techniques, and tools for the growth of businesses and industry in Pakistan. It is a matter of great pride, enthusiasm, and anticipation that Iqra National University is launching its management science journal named 'Iqra Journal of Business & Management'. The journal aims to provide a platform to the researchers belongs to the management and administration discipline. The journal will disseminate the latest research to the research community, academics, industry, government and social sector. The aim of the journal is to provide industry and businesses within Pakistan the latest research and bridge the gap between the industry and academia. In current era, best scholarship requires the qualitative as well as quantitative methodology so the journal will publish research articles on both type of research along with insightful commentary, field reports on contemporary management practice, all of which will make the journal highly beneficial for its readers.

The development of journal required a lot of hard work and I appreciate the work of managing editor, co-managing editor and associate editors. On behalf of Iqra Journal of Business & Management, I am thankful to the university administration for its support of this effort. I am thankful to the Chancellor, INU Obaid ur Rehman, and all the academic and administrative staff in supporting this research endeavour.

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LETTER FROM THE EDITORS

Warmly Welcome to Iqra Journal of Business & Management (IJBM) Volume 1, Issue 1, 2018, the official journal of the Iqra National University Management Science Department. This University providing Management Science, Engineerin, Allied Health Sciences, Fashion & Design & Mass Media Communication Discipline Bachelors, Masters & Ph.D degrees. A non- profit association of scholars whose ambitious to come up with challenging and encouragement ideas to support and transfer of knowledge throughout the world.

The editorial mission of the IJBM is to publish pragmatic and hypothetical research articles which improve and introduce the core values of Information System and Management Science. All research articles are double blind referred. The manuscript in this issue have a good enough acceptance rate, which is keeping with our editorial mission. Versatility of thoughts will always be welcomed.

Please explore the Iqra National University website at <https://www.inu.edu.pk/iqra-journal-of-business-management/> for on-going information about the university and Journal, and about Management Sciences academics and our collective conferences. Submission suggestion instructions and guidelines for publication are also provided on the provided website.

Prof. Dr. Shahjehan
Vice Chancellor
Iqra National University, Peshawar

IMPACT OF CORPORATE GOVERNANCE OF ISLAMIC BANKS ON FINANCIAL PERFORMANCE: A STUDY OF PAKISTAN, INDIA AND BANGLADESH ISLAMIC BANKING SYSTEM

Mushtaq Younas

MBA, Research Scholar. NUML University Peshawar.

Email: mushtaqyounas9@gmail.com

Umair Ahmed

Assistant Professor. Qurtuba University of Science & IT, Peshawar.

Email: uahmed011@gmail.com

Naveed

Assistant Professor. Qurtuba University of Science & IT, Peshawar.

Qurat Ul Ain Shahbaz

Scholar Iqra National University, Peshawar

ABSTRACT

The aim of this study was to evaluate impact of corporate governance on the financial performance of Islamic banks in Pakistan, India and Bangladesh. Data was collected from the Islamic banks of respective country's stock exchange and annual reports of selected Islamic banks. Four (4) banks were selected from each country on purposive sampling technique so the total sample size was twelve (12) Islamic banks from three countries. Panel data was used for 5 years from 2014 to 2018. Regression analysis was used for every country's econometric model. The result found that overall Corporate Governance affects the financial performance positively in Islamic banking sector of Pakistan, India and Bangladesh. Therefore it is suggested that Islamic banks should exercise such practice as a long term benefit. All the hypotheses developed for this study has been achieved through the analysis of this research study.

Key words: Corporate Governance, Organization Performance, Islamic Banks

INTRODUCTION

Corporate governance is an emerging field and playing a vital role in the overall performance of a corporation. It can be simply define as an association between shareholders, top management, board of directors which has the alignment towards the organizational success (Wheelen & Hunger, 2011). Corporate governance can also explain the relationship among the objective of board of directors and shareholders. Stakeholders has also an influence due to corporate governance because it is in their interest i.e. customers, employees, creditors,

debtors, government agencies, banks, financial institutions and society at large. The major players are management, shareholders and board of directors. Mulili and Wong (2011) stated that corporate governance as a group of people getting together as one united body with task and responsibility to direct, control and rule with authority.

Globalization encourages the emergence of competition to be getting tougher. Therefore, firms are continuously working to improve performance that reflected in their values. The values are significant for the firm, as the main goals of the firms are to increase their own value. High value is the desire of every firm's owner to indicate the overall prosperity of the shareholders (Yilmaz & Buyuklu, 2016).

According to Bhagat and Bolton (2008) in financial management, estimating capital requirement and its procurement is necessary. As to properly evaluate potential investment, firms must know how much their capital requirements. It is the role of every financial manager to form the Capital Structure (CS), Dividend Policy (DP) and Corporate Governance (CG). It is important for maximizing shareholders wealth for raising the value of the firm. It is also important for rising long term benefit to finance a company that can result in three types of securities i.e., equity shares, preference share and debenture. A CS is the combination of both shares and debenture. The shares are referred as owned funds whereas; the debenture can be defined as borrowed funds or debt funds. A CS can also be defined as the combination of equity, debt as well as short term financing. The CS is defined as how a firm can finance its overall actions and development by utilizing diverse source of funds. In the view of above background, money makes the business in the running position. However, money earn from diverse resources such as, equity and debt. For instance; equity can be classified as common stock, Preferred Stock (PS) or Retained Earnings (RE) (Sudana & Arlindania, 2011). On other hand, debt achieves in the form of issuing bonds or payable long term notes.

In addition, dividend decision is also a major part of the financial management along with financing and investment decision (Sudana & Arlindania, 2011). Essentially, dividend is the profit from business getting after tax that is distributed among owners. On other side, Retained Earnings (RE's) are the profit after tax that is retained in the business. The REs are not shared among owners but will remain in the business. In result, there are two choices of profit after tax, either distributed among the owners or retained in the business. Therefore, the question arises about the importance and understanding of dividend which is an important task for the corporation of financial policy. Another important aspect of dividend payout policy decision is,

Whether cash flow will be paid to investors or will be retained for reinvested by the firm. Therefore, the amount of the dividend depends on the dividend policy of each firm. The proportion of net profit after tax is distributed as dividends are usually presented in Dividend Payout Ratio (DPR). In case the dividend is paid well, the value of the firm become high with the corresponding increase in stock price. Conversely, if the dividend paid is small then the firm's share price is also low. Consequently, the ability of dividend payment is closely related to the profit achieved by the firms. For instance, if the firm makes a large profit, the ability to pay dividends is also high (Brav et al., 2008).

Shareholders are the real owners of a limited liability firm (Aebi, Sabato & Schmid, 2012). They buy shares because they want to get a financial return. In most cases, shareholders will elect directors, and the directors are responsible for the appointment of managers in order to run the company on daily basis. The managers are considered to work on the behalf of shareholders but they are bounded with the policies of the respected company. These policies can improve the value of shareholders (Brown & Caylor, 2009).

The aim of effectual corporate oversight mechanisms is to attain managers' act in the best interests of the shareholders. It has been a leading pertain in the field of corporate governance and finance (Ghazali, 2010). The corporate governance is a control mechanism. It regulates and manages the company's profile in order to increase the prosperity. Subsequently, it aims to create the value of shareholder (Macey & O'Hara, 2003). It is also concerned about the views of investors regarding the benefits provided by the company's manager. The company's manager should be confident, and will not darken or to invest in projects that do not benefit associated with the funds that have been invested by the investor. On other hand, corporate governance is associated to investors that control managers (Peni & Vahamaa, 2012).

In order to find the effect of CS and CG on DP and firms value, Hartano et al. (2018), collected data for seven annual banking financial statements identified in Indonesia stock exchange (IDX) from 2008-2012 employing partial least square analysis. It was concluded that CS has positive significant effect on DP, while CG has negative non-significant effect on DP.

Statement of Problem

Now a day's corporate governance is an emerging field in the global corporate market. The study aims to evaluate the influence of corporate governance on the firm financial performance in Islamic banks in three Asian countries i.e. Pakistan, India and Bangladesh.

Islamic banking Sector has a very vast scope in Muslim as well as non-Muslim nations it is very influential to evaluate the influence of corporate governance on the Islamic banks financial effectiveness.

Objective of the Study

The aim of this study is to investigate the influence of corporate governance of Islamic banks on their financial performance in Pakistan, India and Bangladesh.

Significance of the Study

This study will provide more awareness and detailed reflection on significance of various factors effecting corporate governance. Corporate governance is playing a vital role in the financial and overall performance of a company and firms are getting more yield with it. The study will be helpful for the policy makers and top management while making corporate policies so they must consider the elements which used in this study.

LITERATURE REVIEW

Carter and Simkins (2003) viewed as corporate governance as dealing with mechanisms by which stakeholders of a corporate exercise control over corporate insiders and management in such a way that their interests are protected.

Islamic banks need to pursue different rules communicated in Quran Majeed and furthermore worthy by Muslim Societies, particularly the most reasonable finance methods in Islami banks (Suliman, 2000). Banking according to shariah resemble to the traditional banking system by offering diverse services and banking products to the customers and acknowledge its commitment in the monetary transactions among them. Some traditional banks are for all intents and purposes proportional for an Islamic banking system which need to do work in a similar way, so far those circumstance, conventional banking system is to seek out after the rules of Islam (Shariah) for financial activities with the goal that every one of the things promise to the customer must be in line as shown by Islamic Law. Shariah of Islamic banks shows that manipulative settlements and for that have a chance of Merger of interest for a concealed structure or out of line assertions ought to dependably be maintained a strategic distance from. Islamic Fiqah speaks to major and general Islamic decides and ensures that all activities are kept running inside the shadow of Laws of Shariah. (Siddique, 1985). According to Suleiman (2000) while investing the following are

the motivational factors and consideration must be followed:

- a) Interest or Fixation of profit is not accepted in Islamic banks
- b) Always must be avoided the trades that incorporate speculative trades (Gharar)
- c) Poor and deprive people must be compensated by Zakat to strength them
- d) Eliminate all “Haraam” (Not allowed) sources of financing

The Asian Development Bank says that corporate governance is the manner by which control is utilized in the administration of a nation's assets for improvement (Phan, 2001). Corporate governance establishes several principles, laws, control technics and laws which can help the management of a corporate for effective performance. Clarke (2004) described corporate governance as a way and sources of a company by which one can do administration of an organization (the executives) is suitable to its electorate the investors. Ruin (2001) expressed that corporate governance as a unit of individuals getting together as one joined body with undertaking and duty to direct, control and principle with power. Corporate governance can likewise be expressed as the arrangement of guidelines and systems that guarantee that supervisors do in fact utilize the standards of significant worth based administration (Alagathurai & Nimalathashan, 2013).

Bauer et al. (2004) founded the joint effect of corporate governance and value of a firm on its profitability. Many researches are founded which shows that there is no positive association among corporate governance and profitability of an organization. Some studies are still going ahead to investigate the relationship between firm performance and factor of corporate governance while the outcomes were not fully supports it (Elmagrhi et al., 2017). Aboagye and Otieku (2010) investigated the critical impact of corporate governance on firm performance. Usually different researchers defined the board composition in different manner .Here in this research the board composition is measured as the number of shareholders as non-executive directors in the board and the senior management as executive directors in the board.

As per Mahar and Anderson (2002) deficiencies, control and economic situation is concerned with the structure of corporate governance. It is generally accepted that good governance is significant towards the firm financial as well as operational performance of a firm; it also leads to the market growth.

Now a day’s Islamic banking system is rapidly growing throughout the world especially in Pakistan because it had been observed that almost all the conventional banks have separate branches as well as Islamic banking windows (Asif, Ahmed, Zahid & Khan, 2017). Due to

economic recession many developed nations suffer a lot of financial crises due to which many firms suffer the bankruptcy. In those situations many states introduced the interest free projects and in other scenario the firms using free interest products were found stable in the recessions (Ahmed, 2009).

Now a days many non-Muslim countries operating a separate windows and separate Islamic banking branches for their Muslim community. All the big financial institutions like world bank and IMF have a separate cell through which they investigate the progress and growth of Islami financial system in the world (Ahmad, 1995). Interest free banking offer advances on the basis of shariah and Modarabah, Musharika, Ijara etc. which highly influence the Islamic banks. From last two decks Islamic banking system has a continuous growth and its market share is now 7% in some years (Samad, 2004).

This examination thusly holds the more broad sight and describes corporate governance in the association of planning as the way is which structures, methodologies, procedure and execution of a bank administered so as to allow positive associations and the concentrate utilization of intensity in the organization supervising favorable linkage of benefits with the purpose of pushing up offers cost and investors' fulfillment together with improved responsibility by a direct overseeing (Ibrahim & Rehman, 2010). An enhanced and composed administration of a company is a certification of best execution of firm and will dependably reach to the objectives which it sets to accomplish as it accept its capacities as per the progressed administrative systems. Then again, measurable support can confirm the nearness of an association of an idea for corporate governance is performance of a firm is commonly inadequate (Imam & Malik, 2007).

Good Controlling implies the little appropriation of assets by investors controlling, this adds to best task of resources for increase a gainful outcome fit as a fiddle of return. As a financier and moneylenders will be moreover anxious to put resources into such firms in the business having incredible governance, in light of the fact that by this lower costs of capital will be confronted, which no uncertainty a confirmation of better governance of the firm. Distinctive accomplices, including specialists and sellers, will in like manner should be associated with and go into association in light of the fact that the associations are ideally thriving, progressively lovely, and strong contrasted with the firms less persuading governance. Recommendations for the economy as whole are in like manner undeniable. Budgetary advancement will be progressively down to earth, in light of the fact that the economy is less unprotected against a foundational chance. At the better security of speculators assets at firm dimension, the capital market will similarly be bolstered and end

up being more made, which is principal for overseen budgetary improvement, meanwhile, incredible corporate governance is huge for building up an evenhanded and debasement free society. Powerless corporate governance in tremendous Businesses can be a productive zone for individuals searching for unlawful advantages in the associations. Giving certification of advantages to the minority investors and less corruptive associations between gigantic business and political power may realize an increasingly incredible condition for little associations and progressively fair sharing of benefits (Iskander and Chamlou, 2000).

Measurement and operational definition of variables

Dependent Variable - Financial Performance Return on Assets (ROA)

The study used ROA as a proxy for financial performance. It can be measured as dividing net profit by total assets held (Hartano et al., 2018).

Independent Variables –Corporate Governance Board Size (BS)

Board size refers to the number of board members exist in a company's board of directors. It can be measured by number of persons in board (Peni & Vahamaa, 2012).

Board Independence (BI)

Usually a board of directors of a company contain two different types of directors i.e. insider directors and outsider directors. According to Brennan (2006) the board of directors can perform the duty to control the operations of management and take part in the management on the behalf of the shareholders. Outsider directors has other responsibilities related to the company.

Audit Committee

It is an operating committee which is one of the major concern of a company's board of directors which is corned with the investigation and controlling of financial reporting and true disclosure (Bauer et al., 2008).

Firm Size

It is used as a control variable and can be measured as the natural log of total assets (Bauer et al., 2008).

RESEARCH METHODOLOGY

Population and Sampling:

The study population includes all Islamic banks working in Pakistan, India and Bangladesh stock exchange. There are five (5) full-fledged Islamic banks in Pakistan, six (6) banks in Bangladesh and India have also five (5) banks. Purposive sampling technique was used to select the sample. From each country four (4) banks were selected. Total twelve 12 banks were the sample of the study. Sample detail is as follows:

Table 1: Bank Details

PAKISTAN
1. Al-Baraka Bank Limited
2. Bank Islamic Pakistan Limited
3. Dubai Islamic Bank Limited
4. Meezan Bank Limited
BANGLADESH
1. Al Arfah Islamic Bank Limited
2. First Security Islamic Bank Limited
3. Islamic Bank Bangladesh Limited
4. Shahjalal Islamic Bank Limited
INDIA
1. Atharvved Finance Corporation
2. Tameem Impex
3. Associated Industrial Credit Society Al-Siraat Investment & Banking
4. Baitun Nasr Urban Cooperative Society

Data Collection

Data was collected from the annual reports, stock exchanges and state bank web data banks.

Data was collected from 2014 to 2018 (5 Years).

Econometric Model

The econometric model is as follows:

$$ROA = \beta_0 + \beta_1 BS + \beta_2 BC + \beta_3 BI + \beta_4 AC + \beta_5 SIZE + ei$$

Where;

ROA: Return on Assets, BS: Board Size, BC: Board Composition, BI: Board

Independence, AC: Audit Committee, SIZE: Bank Size, ei = Residual, β_0 = Intercept, $(\beta_1 - \beta_5)$ = Slope

Research Hypotheses

H0: Corporate Governance has no significant impact on financial

performance H1: Corporate governance has a significant impact on financial performance H1.1: Board size has a significant impact on financial performance

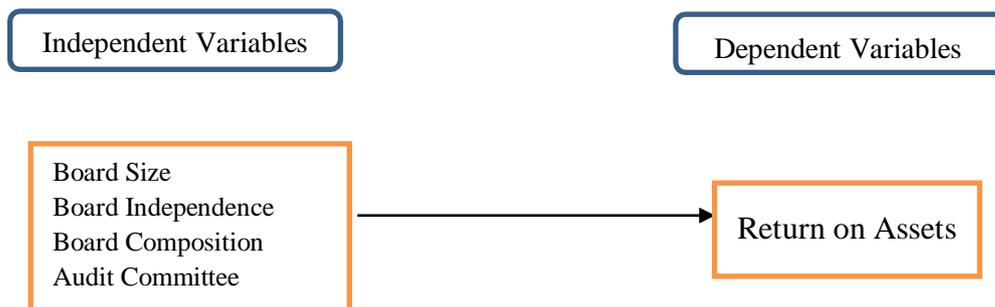
H1.2: Board Independence has a significant influence on financial performance H1.3: Board composition has a significant impact on financial performance

H1.4: Audit Committee significantly effects financial performance

H1.5: Firm size effecting financial performance

significantly

Theoretical Framework



Analysis

Table 2: Summary of Panel Diagnostic test

Pakistan			
Tests	Models	P-Value	Decision
Chow's test	Pooled regression vs Fixed Effect model	0	Fixed effect model
Breuch Pagan	Pooled regression Vs Random Effect model	0.184	Pooled regression model
Hausman test	Random Effect Vs Fixed Effect model	0.004	Fixed effect model

The above table suggested that fixed effect model is appropriate

India			
Tests	Models	P-Value	Decision
Chow's test	Pooled regression vs Fixed Effect model	0.826	Pooled effect model
Breuch Pagan	Pooled regression Vs Random Effect model	0	Random regression model
Hausman test	Random Effect Vs Fixed Effect model	0.218	Random effect model

The above table suggested that Random effect model is appropriate

Bangladesh			
Tests	Models	P-Value	Decision
Chow's test	Pooled regression vs Fixed Effect model	0.0264	Fixed effect model
Breuch Pagan	Pooled regression Vs Random Effect	0.044	Random regression model
Hausman test	Random Effect Vs Fixed Effect model	0	Fixed effect model

The above table suggested that fixed effect model is appropriate

Table 3: *Regression Analysis*

Variables	PAKISTAN (Fixed Effect Model)		INDIA (Random Effect Model)		BANGLADESH (Fixed Effect Model)	
	Coefficient	P-Value	Coefficient	P-Value	Coefficient	P-Value
C	0.3002	0.0000	-0.101	0.0000	0.4996	0.0000
BS	0.4213	0.0108	0.3327	0.0000	0.0541	0.6213
BC	0.3215	0.0000	-0.6491	0.0812	0.6269	0.0000
BI	-0.2862	0.0817	0.0512	0.0411	-0.0475	0.0002
AC	0.2661	0.2146	-0.6296	0.0017	-0.0307	0.0000
SIZE	0.3601	0.0422	0.1031	0.0000	0.4229	0.0399
R-Squared	0.5453		0.4962		0.5576	
F-Stats	8.352**		6.195**		8.663**	

The above table shows that the overall model is highly significant due to highly significant P- value. R-squared of Pakistan model represents 55% variations in dependent variable due to change in regressors of corporate governance. 50% variations were found in Indian context and 56% variations were found in the Bangladesh Islamic banks. If we discuss the individual variable only Size of a bank was found significant in all three countries. However, BS, BC were also significant while the random effect model of Indian Islamic banks showed that BS, BI and AC were found significant while only BC was found insignificant. In Bangladesh context only BS was found insignificant while BC, BI, AC were found significant. All the above results shows that all the individual variables has an impact on bank performance. In country context in India and Bangladesh corporate governance has more significant impact on bank performance as compare to Pakistan. The study accept the alternative hypothesis which suggests that corporate governance has a significant relationship with Islamic banks financial performance.

CONCLUSION

The study found overall significant impact of corporate structure on the firm performance in Islamic banks of Pakistan, India and Bangladesh. Board size has a positive impact on firm performance in Pakistan and India while no effects were shown in Bangladesh. Board composition were only insignificant in Indian context while Board independence and Audit committee was found insignificant in Pakistan. Size of bank was found significant in all context. An organism of corporate governance may dire for the maintance of association among the payment to economic advisor (individuals as well as institutions), corporate vision and administration, several associate as the do it for corporate sustainability.

Recommendations

Corporate governance is an important element for the emerging world and aid the corporate in great way through transferring top management training, skills, controlling and financial management can strengthen the regulations, monitoring and evaluation. It can boost the reputation of the corporate and also helpful for employees and management of the corporate because set rules and procedures can protect employee as well as employer.

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DOES SYSTEMATIC RISK MATTER FOR INVESTORS IN CAPITAL MARKET OF PAKISTAN?

Dr. Syed Hamid Ali Shah

Lecturer at Quaid-e-Azam College of Commerce, University of Peshawar, Pakistan.

Email: hamidqcc@uop.edu.pk

Faisal Khan

Lecturer at Quaid-e-Azam College of Commerce, University of Peshawar, Pakistan.

Email: faisalkhan@uop.edu.pk

ABSTRACT

Risk and returns relationship is not similar in emerging and developed stock markets. Moreover, due to reasons such as family ownership, lesser trading volume, and smaller capital market, investors in Pakistan are not sufficiently diversified. Therefore, it is argued that both idiosyncratic and market risks are relevant, and hence beta (measure of market risk) under- estimates the risk premium. More specifically, we use measures of risk such as beta, systematic risk, unsystematic risk, and total risk as independent variables to investigate if unsystematic and total risk will explain variation in stock prices in stock market of Pakistan? Data of 194 non- financial firms listed on KSE (now PSX) for a period of time from January 5, 2004 to October 13, 2008 is analyzed. It is concluded that assets' pricing decisions in Pakistan stock market are based on factors other than these measures of risks. To make right decisions, we suggest that investors in Pakistan must use alternate asset pricing models and shall not rely solely on CAPM.

Keywords: CAPM, Risk and returns, Rolling regression, Time series regression

INTRODUCTION

Pakistani stock market is one of the emerging markets of the world. Extant literature proposes that the risk and return relationship in emerging equity markets varies from that in the developed equity markets. Fayyad and Daly (2010) argue that there is high variation in share

prices, expected returns and serial autocorrelation and also document existence of skewness, kurtosis, and volatility clustering in emerging equity markets. Investment in equity market in Pakistan is not highly diversified because of family ownership, group ownership, narrow market and low trading volume of stocks (Hussain & Uppal, 1998). Hence these reasons allow us to consider both diversifiable (unsystematic) and un-diversifiable (systematic) risk instead of only considering the systematic risk in determining stock prices. The motivation of this study is to examine the degree of responsiveness of variation in share prices of Pakistani listed firms towards market determinants (systematic risk) and firm or sector specific determinants. This study is expected to benefit academicians, practitioner, investors, institutional investors, and financial analysts etc. In this study we estimate traditional capital asset pricing model (*CAPM*) originally developed by Sharpe (1965) and Lintner (1966). We use multiple approaches to determine how well *CAPM* can explain variation in stock prices. The study is organized as, the first chapter consists of introduction, second chapter presents literature review, third chapter presents the methodology and fourth chapter discusses the results and conclusion respectively.

LITERATURE REVIEW

It is explained that through diversification i.e., by pooling different assets with lesser covariance an investor can maximize expected rate of return against specific risk level; on other hand one can minimize the portfolio risk for a given level of portfolio returns (Markowitz, 1952). The theory suggests investing in portfolios on so called Markowitz efficient frontier line. The groups of securities on efficient frontier line are considered the optimal investment in the context of trade-off between risk and returns. One of the important assumptions of this theory is that investors evaluate risk as a whole rather than considering the risk associated with an individual security. Empirical evidences show that influence of diversification can be quickly attained e.g., by investing in up to ten securities (Evans & Archer, 1968). Literature reveals that investors have various degrees of risk preferences and that individuals would allocate funds to cash or risk free assets subject to the degree of their risk propensity (Tobin, 1958). Further, Tobin added that investors prefer to invest in market portfolio which can give high expected returns with minimum risk in comparison to all those portfolios on the efficient frontier line with low return or high risk.

Although Tobin did simplify the process of portfolio selection but Markovitz model was still not fully utilized. Soon after, Sharpe (1964), Mossin (1966), and Litner (1965) made their historic contributions that produced the capital asset pricing model (*CAPM*). The

mathematical form of the model is given below:

$$R_i = R_f + \beta_i (R_m - R_f) \dots\dots\dots(1)$$

In Equation (1) above, R_i symbolizes return on stock i ; R_f represents risk free rate; R_m is return on market portfolio; and β_i stands for systematic risk of stock i . Note that $(R_m - R_f)$ is market risk premium.

The model shows relationship between security/portfolios' returns and market premium. As this model is the extension to Markowitz portfolio model and therefore indicates that required rate of return of a given stock/portfolio is free of unsystematic risk. Moreover, investments are assumed to consist of risk free assets and a group of risky securities on efficient frontier line, presented as security market line (SML). Consequently, it shows that only market risk is of consideration towards the security/portfolio required rate of returns. This model assumes that investors avoid high risk, capital market is efficient, assets are divisible, no transaction cost, no tax, symmetric information; investors can lend and borrow money at constant rate. King (1966) analyzed data of sample of 63 firms for the time period from 1927 to 1960 from six different sectors and concluded that stock prices highly co-vary with the return on market.

Later on various empirical evidences challenged the validity of CAPM because of its idealistic assumptions and this allowed the researchers to relax the assumption of CAPM. For instance, Brennan (1970) tested the existence of tax; Black (1972) considered the assumption of the availability of risk free borrowing which resulted in the reformed version of CAPM. Similarly, Roll and Ross (1980) and Chen, Roll and Ross (1986) examined the co-movement of share returns with factors other than the market factor. The traditional CAPM is also found inefficient to explain the relationship between required rate of return and risk in dynamic state of capital markets, which resulted in intertemporal CAPM of Merton (1973). According to intertemporal CAPM the investors do not hold a single constant portfolio because if interest rates are expected to change in future it will influence the need for portfolio re-formulation. The concrete upshot of these studies currently is that investors look for a pool of versions of risk free, risky securities and market risk to determine their required returns. Hawawini and Michel (1982) conducted a study in Brussels' equity market and concluded that security returns are explained by the market risk. Hawawini, Michel, and Viallet (1983) conducted a study in France's equity market and reported that security returns are explained by the market risk but these returns are negatively related to systematic risk because of worst performance of the equity market.

Fama and MacBeth (1973) conducted a study in US equity market for the time period of 1935 to 1968 and revealed that there is positive relationship between stock returns and risk. Further this study supports the CAPM and shows that stock returns are more explained by market risk. Schwert (1983) reported that stock returns are significantly explained by market risk but was found insignificant in sub- periods. Some empirical studies in US equity markets also found that when market is going upward than beta is positively and significantly associated to stock returns but when market is going downward then beta is negatively and significantly related to stock returns (Pettengill, Sundaram, & Mathur, 1995). Isakov (1999) conducted a study in Swiss equity market and examined the conditional context of positive (negative) market returns and concluded that required rate of returns are significantly related to systematic risk. Tang and Shum (2004) confirmed this conditional relation between stock returns and risk in Singapore's equity market for the time period of 1986 -1998. Further this study also found that firm specific risk (diversifiable risk) has its own significance towards the stock returns. Thus in case of optimally diversified portfolios an investor may ignore unsystematic; however, all investors are not so diversified. Therefore, when pricing stocks investors should consider both systematic and unsystematic risks particularly when they are not well diversified. Other empirical studies challenge the efficiency of CAPM. For example, Reinganum (1981) observed that returns of portfolios with high beta values are not significantly high as compared to returns of portfolio with lower beta. Similarly, Haugen and Baker (1991) analyzed stock returns data of 1000 largest US firms for time span of 1972 to 1989 and found that lower risky firms outperform high risky firms. Other studies have found various anomalies regarding the risk and returns relationship, for instance monthly or daily effect. It is found that in the month of January the risk premium of stocks are higher than other month and in result it gives high return (Tinic & West, 1984). Literature today criticize CAPM that beta is not the only factor to predict required rate of returns but there are other firms' specific factors which contribute towards the required rate of returns of individual security or portfolio. These other factors include price/earnings ratio, book-to-market equity ratio, size, leverage and momentum effect (Basu, 1977, Stattman, 1980, Reingaum 1981, Banz, 1981, Bhandari, 1988, Jagadeesh & Titman, 1993) respectively. From this discussion it could be inferred that CAPM and hence beta cannot capture the real linkage between stocks' required rate of returns and risk. Literature support positive, negative and even some time no relationship among unsystematic risk and expected returns. Ang. et al., (2009) conducted a study using monthly data of developed countries, and reported existence of negative relationship between lagged

volatility of unsystematic risk and expected returns. Peterson and Smedema (2011) also supported the negative relationship between lagged unsystematic risk and expected returns except for the month of January in US market. Guo and Savickas (2010) while controlling for the size factor, reported that firms with low unsystematic risk outperformed firms with high unsystematic risk.

Tanga and Shuma (2004) conducted a study in Singapore stock market by considering different types of risks. They found that systematic risk, total risk, and unsystematic risk were positively and significantly associated with stock returns; however, it was observed that relative to explanatory power of market risk, explanatory power of both total and unsystematic risks was higher. Guo and Whitelaw (2006) examined risk and return relationship in the context of time series data instead of portfolio or cross-sectional data. The reason for not considering the cross-sectional data for CAPM is the aggregate inclusion of risk hedging component. Further, if volatility is the basic source of adjusted price than the market risk (beta) is useful proxy for explaining the expected stock returns in cross-sectional form. Otherwise time series is better to explain the expected returns. Malkiel and Xu (2004) used Fama and MacBeth (1973) procedure for the formation of portfolio constructions and documented positive relationship between expected stock returns and lagged unsystematic risk. Fu (2009), Huang et al. (2010), Vozlyublenniaia (2012) and Eiling (2013) documented positive relationship between unsystematic risk and expected returns by using multiple methodologies and different proxies.

We conclude from the above literature review that in the absence of any other valid and reliable model, CAPM or APT in its simple or modified forms will continue to be used by investors to determine risk and return relationship. Moreover, the literature also suggests that total risk of a financial asset is the sum of diversifiable and non-diversifiable risk components; the later component is believed to be priced by investors in stock markets. However findings of number of empirical studies discussed do not support this tall claim. Theoretically, non-diversifiable risk explains covariance of securities' returns with the market returns and diversifiable risk describes relative volatility of stocks. Moreover, under the premise that investors in Pakistani stock markets are not diversified or under-diversified, theory of CAPM suggests that total risk i.e., sum of the two components of risks shall be relatively more directly associated with securities' returns. This current study is therefore conducted to determine if total risk and risk component other than systematic risk can explain variation in stock prices in Pakistan. To achieve this purpose, we use the following methodology.

METHODOLOGY

Sample and Data Sources

Weekly Data of KSE 100 index and stock prices for the period from January 05, 2004 to October 13, 2008 (244 weeks) of 194 non-financial firms listed on KSE (PSX) is downloaded from the website of KSE.

The Model

To investigate the risk and return relationship, this study uses several alternate estimation techniques and models. First, we use Fama and MacBeth (1973) cross-sectional regression technique followed by rolling regression (RRG) estimation procedure and then time series regression method is used. The following section explains these models.

Cross-sectional Regression

We first divide the sample period into two sub-periods of 72 weeks (January 5, 2004 to May 30, 2005) and 172 weeks (June 6, 2005 to October 13, 2008). In the first 72 weeks period, individual securities' betas, and three different measures of risk total risk (TR), systematic risk (SR), and unsystematic risk (UR) are calculated as explained. *TR* of a security and market is calculated with the help of the following formula:

$$\sigma_i^2 = \Sigma (\Pi_{i,t} - \Pi_i)^2 / n-1 \dots\dots\dots (2)$$

In equation (1) above, σ_i^2 stands for the variance of *i*th stock (market index) $\Pi_{i,t}$ is the rate of return of *i*th stock (market index) at time *t*. Π_i is the average rate of return of *i*th stock (market index). *SR* is computed by multiplying total security risk with coefficient of determination (R^2); alternatively, *SR* could also be computed by multiplying beta square with total market risk. Both beta and R^2 is obtained by estimating market model of Sharp (1964) that predicts a security required rate of return as a linear function of risk-free rate of return and expected return on market factor. The model is:

$$\Pi_{i,t} = \alpha + \beta \Pi_{m,t} + \epsilon_{i,t} \dots\dots\dots (3)$$

In equation (2) above, $\Pi_{i,t}$ is the *i*th stock rate of return at time *t*; α is rate of return of a security when Π_m is zero; β represents relative systematic risk of *i*th stock; $\Pi_{m,t}$ the market rate of return at time *t* and $\epsilon_{i,t}$ the regression error term at time *t* and it represents the component of risk attributable to a firm's or an industry's unique characteristics. The coefficient of determination (R^2) in equation (2) shows percentage variation in $\Pi_{i,t}$ due to variation in $\Pi_{m,t}$. This is used to measure the percentage of total risk accounted for by systematic risk. Following James and Philip (1978) *UR* is computed as *TR* minus *SR*.

For calculation of the individual stock return and market return following formula is used: $\Pi_{i,t} = \ln(\Psi_t / \Psi_{t-1}) \dots\dots\dots (4)$

Here Ψ_t and Ψ_{t-1} are the current and previous period prices of a stock/ market index.

Then in the second period from June 6, 2005 to October 13, 2008 returns for individual securities and market index are calculated. To predict individual stock returns, we use *beta*, *TR*, and *SR*, as explanatory variables and estimate 171 sets of cross-sectional regressions. At the end we calculate average values slopes (coefficients) of *beta*, *TR*, and *SR*, and apply t-test to determine their statistical significance.

Rolling Regression

The proponents of CAPM argue that in an environment of changing economic conditions, it is unfair to assume that estimated parameters of CAPM remain constant. Therefore, they emphasize that rolling regression is relatively more appropriate method as it accounts for time varying nature of beta. This method is suitable for time series data and linear association among variables. Using OLS estimation technique, multiple coefficients are estimated by rolling the initial fixed regression period forward such that first observation of the period is dropped and a new observation at the end of the period is added.

More specifically, the first week of earlier regression is replaced by adding new week at the end of the earlier regression period. In this way total 171 regressions are run till the end of the entire sample period. Average values of 171 estimated coefficients are shown in Table 2- Panel A.

In addition to the above we also form portfolios and apply the rolling regression method. The entire sample period is divided in three sub-periods of time. For the sub-period from Jan 5, 2004 to May 30, 2005, step 1 discussed earlier in the case of cross-sectional regression is repeated. We stake stocks in descending order on the basis of values of their betas to form thirty-nine equally weighted five stocks portfolios. As such portfolio with the largest betas is positioned on top portfolio with the smallest betas is placed at the bottom of the series. We calculate returns of these portfolios and regress them against market returns. Then for the period from Jan 6, 2005 to April 16, 2007 (week 73 to 168), slopes and other risk measures i.e., *SR*, *UR*, and *TR* are computed. Finally, we match portfolio returns with betas and *SR* calculated during the estimation period. Rolling regression procedure is used to complete this process for the testing period from April 23, 2007 to Oct 13, 2008. Single set of slope coefficients for parameters is estimated where weekly returns of the portfolios are used as dependent variable and their corresponding estimated risk coefficients are used as independent variables.

Time Series Regression

The entire length of sample period is split into approximately three equal sub-periods. The four different measures of risk β , *SR*, *UR*, and *TR* are estimated in the first sub-period. Then 39 equal weighted portfolios of five stocks each are formed by arranging securities in descending order and returns of these portfolios are computed. Portfolio returns and their respective time varying β , *SR*, *UR*, and *TR* are matched. Finally, stacked cross-sectional regression is run to determine association of the portfolio returns with the different measures

of risk. The investors would be pricing these risk components if coefficients of these measures of risk turn to be statistically significant.

RESULTS AND DISCUSSION

In the following text results of the three different methods are discussed. In this section results of concurrent regression estimation i.e., securities' returns are regressed against the estimated values of β of the same period (January 5, 2004 to May 30, 2005) are also discussed.

From the left, in Table 1, first column shows equation of the models estimated through cross-sectional regression method. Average values of the estimated parameters, standard errors and t-statistics are reported in the column 2 to 4. The results show that none of the coefficients of independent variables is statistically significant. Hence, against the claim of CAPM, it is concluded that variation in stock prices in Pakistan is attributable to factors other than the measures of risk considered in these analysis. In fact, these results are not unique, moreover, insignificant negative β are reported in previous studies as well (see e.g., Hawawini et al., 1983 in French stock market; Fama and MacBeth, 1973 insignificant β in sub-periods). Some research studies in different stock markets around the globe suggest that β can not fit well and therefore alternate factors shall be identified to more efficiently explain variation in stock prices (see e.g. Chan, Hamao & Lakonishok, 1991; Fama & French, 1992, 1996a). But the still other proponents of CAPM argue that β becomes insignificant and/or negative because of the overall condition of a stock market. They argue that when a stock market is up (down) β will be positive (negative) (see for detail Pettengill et al., 1995). In Table 1 from insignificant coefficient of TR it is inferred that investors in Pakistan consider some other factors when they price securities.

Table 1: Results of Cross-Sectional Regressions

Equation	Coeff. (α_1)	Std. Errors	t-Stat	Remarks
$\Pi_i = \alpha_0 + \alpha_1\beta + \epsilon_i$	-0.0010	0.0101	-0.1001	Insignificant
$\Pi_i = \alpha_0 + \alpha_1SR + \epsilon_i$	-0.4556	0.7502	-0.6100	Insignificant
$\Pi_i = \alpha_0 + \alpha_1TR + \epsilon_i$	-0.0089	0.0022	-0.4300	Insignificant

Note: Total 171 regressions from June 6, 2005 to October 13, 2008 are run for each of the above equations and average values of coefficients of β , SR , TR , standard errors with t-statistics are reported.

Two different sets of results are presented in Table 2. In Panel-A, results are based on returns of individual securities where Panel-B shows results based on portfolio returns. When testing reliability of β , generally it is argued that portfolio returns shall be preferred to

use as dependent variable because it has lower estimation errors and control stock specific risk. In both cases rolling regression method is used. Interestingly, similar to results reported in Table 1, results reported in the two panels of Table 2 are statistically insignificant and therefore has same repercussion as explained in the case of Table 1 above.

Table 2: Results of Rolling Regression

Equation	Coeff. (α_1)	Std. Errors	t-Stat	Remarks
Panel – A				
$\Pi_{i,t} = \alpha_0 + \alpha_1 SR_{i,t} + \epsilon_{i,t}$	-1.7246	1.1843	-1.46	Insignificant
$\Pi_{i,t} = \alpha_0 + \alpha_1 TR_{i,t} + \epsilon_{i,t}$	-0.2345	0.1532	-1.53	Insignificant
$\Pi_{i,t} = \alpha_0 + \alpha_1 \beta_{i,t} + \epsilon_{i,t}$	-0.0008	0.0028	-0.31	Insignificant
$\Pi_{i,t} = \alpha_0 + \alpha_1 SR_{i,t} + \alpha_2 UR_{i,t} + \epsilon_{i,t}$	(α_1)	(α_2)		
Coeff.	-1.4401	-0.2000		
Std. Errors	1.1601	0.1535		
t-Stat	-1.24	-1.30		Insignificant
Panel – B				
$\Pi_{p,i,t} = \alpha_0 + \alpha_1 \beta_{p,i,t} + \epsilon_{i,t}$	-0.0054	0.0037	-1.45	Insignificant
$\Pi_{p,i,t} = \alpha_0 + \alpha_1 \beta_{p,i,t} + \alpha_2 TR_{p,i,t} + \epsilon_{i,t}$	(α_1)	(α_2)		
Coeff.	-0.0056	0.0813		
Std. Errors	0.0043	1.6378		
t-Stat	-1.31	0.05		Insignificant

Note: Panel-A parents average values of coefficients of 171 regressions (rolling) estimated with stata. In panel β , using stata, average values of coefficients of beta, SR, and TR from 75 regressions are reported; here rolling regression procedure is used and portfolio returns are taken as dependent variable.

Results of time series regression are reported in Table 3 where first column from left shows equations and from second to seventh column coefficients of the explanatory variables followed by t statistics are reported respectively. In all these four cases, in line with the theory of CAPM constant terms of regressions have no significant explanatory power. From Row 1 through Row 4 coefficients of systematic risk, total risk, and unsystematic risk are statistically insignificant and inversely related to portfolio returns. Thus time series regressions also yield results similar to those of cross-sectional and rolling regressions in Table 1 and 2 respectively. Therefore, these results further support the deduction that investors in Pakistan make their investment decisions on the basis of factors other factors than these risk factors.

Table 3: Results of Time Series Regression

Equation	α_1	t-Stat	α_2	t-Stat	α_3	t-Stat
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$\Pi_{p\ i,t} = \alpha_0 + \alpha_1 SR_{p\ i,t} + \epsilon_{i,t}$	-0.0037	-0.75		
$\Pi_{p\ i,t} = \alpha_0 + \alpha_1 SR_{p\ i,t} + \alpha_2 TR_{p\ i,t} + \epsilon_{i,t}$	-0.0009	-0.04	-0.0020	-0.11
$\Pi_{p\ i,t} = \alpha_0 + \alpha_2 TR_{p\ i,t} + \epsilon_{i,t}$			-0.0026	-0.75
$\Pi_{p\ i,t} = \alpha_0 + \alpha_3 UR_{p\ i,t} + \epsilon_{i,t}$				-0.67
				0.0069

Note: Total numbers of observations are 5772. Coefficients, TR, and UR along with their respective t-statistics are reported.

Table 4 shows results of concurrent regressions. Coefficients of the regressors their respective standard errors and t-statistics are shown in second, third, and fourth columns where first column is devoted to the estimated equations. Though coefficient of the systematic risk (*SR*) is positive but it is still statically insignificant. These results further support the findings of the preceding regression analysis. These results suggest that neither of the risk measures (*SR*, *UR*, and *TR*) are priced by investors in stock market of Pakistan.

Table 4: Results of Concurrent Regression

Equation	Coeff. (α_1)	Std. Errors	t-Stat	Remarks
$\Pi_{i,t} = \alpha_0 + \alpha_1 SR_{p\ i,t} + \epsilon_{i,t}$	0.8844	2.1283	0.42	Insignificant
$\Pi_{i,t} = \alpha_0 + \alpha_1 TR_{p\ i,t} + \epsilon_{i,t}$	-0.0041	0.1446	-0.03	Insignificant

Note: Total 72 regressions from January 5, 2004 to May 30, 2005 are run for the two equations. Average values of coefficients of systematic risk (*SR*), total risk (*TR*) along with their respective standard errors and t-statistics are reported.

CONCLUSION

To examine the risk and return relationship, this study used weekly data from January 5, 2004 to October 13, 2008 of 194 non-financial firms traded on Karachi Stock Exchange (now PSX). Different measures of risk such as relative measure of risk (β), systematic risk (*SR*), unsystematic risk (*UR*), and total risk (*TR*) are used as explanatory variables to analyze their impact on variation in stock returns. Stock returns as dependent variable are used in both individual securities' returns as well as in the form of portfolio returns. Analyses of this study are carried out as per procedure developed by Fama and MacBeth (1973) and regression models are estimated through four different techniques. Irrespective of the techniques used, results are same. The conclusion drawn is that none of the above four measures of risk could explain variation in stock prices in stock market of Pakistan. The results suggest that standard capital asset pricing model (*CAPM*) has no significant utility for investors in Pakistan or Fama and MacBeth (1973) is not appropriate method in the context of capital market of Pakistan.

The results of this study are in line with the findings of other studies. For example, Ahmad and Zaman (1999) used GARCH-M model and reported volatility clustering in capital

market in Pakistan. They suggested that higher-moment conditional CAPM is relatively more valid than the standard CAPM. Similarly, Iqbal and Brook (2007) reported that risk and return relationship in equity market of Pakistan is non-linear and therefore standard CAPM will fail to explain this relationship. Iqbal, Javed, Brooks and Galagedera (2008) analyzed monthly data of 101 stocks for the period of October 1992- March 2006 to compare different capital assets models and reported that standard CAPM do not have predictive power to explain risk and return relationship and that trading volume and dividend to price ratio are more relevant variables. However, the results of their study were in favor of conditional models. Javid and Ahmad (2008) found conditional CAPM as a valid alternate of the standard CAPM. Standard CAPM was also rejected by Javid (2009). Hanif and Bhatti (2010) analyzed data of 360 stocks for the period 2003-08 but found that in few sub-periods, CAPM could explain variation in returns of just 28 stocks. Hanif (2010) analyzed both monthly and weekly data of tobacco stocks during the period from 2004 to 2007 and found that values of beta are not constant overtime. Moreover, they observed that the values of beta are lower (higher) for monthly (weekly) data Whereas the correlation between CAPM predicted and actual weekly returns was weaker than that for monthly data. More recently, presence of weak correlation is reported by Zubairi and Farooq (2011) between actual and CAPM predicted returns.

Findings of this study imply that more research work is needed to understand what factors or methodology could be used to predict changes in stock prices in Pakistan. For example, variables such as size, book to market ratio, and macroeconomic factors or methodology proposed by Pettengill et. al. (1995) might produce desired effect. Moreover, different data sets with respect to time such as daily, monthly, semi-annually, and annually shall be investigated to know if this could change the results in favor of investors. Finally, in the case of investors in Pakistani stock market, we suggest that right investment decisions could only be made if alternate and valid capital asset pricing models are used and these decisions are not driven solely by standard CAPM.

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DETERMINANTS OF CAPITAL STRUCTURE: A CASE OF NON-FINANCIAL FIRMS LISTED AT PAKISTAN STOCK EXCHANGE TEXTILE SECTOR

Naveed Khan

Assistant Professor,
Qurtuba University of Science & Information Technology, Peshawar

Muhammad Amir

Scholar, Qurtuba University of Science & Information Technology, Peshawar

Hameed Rehman

Scholar, Institute of Management Studies, University of Peshawar

Zeeshan Ali

Scholar, IQRA National University, Peshawar

ABSTRACT

The most important decision for a company to take is to choose their capital structure due to their influence on a firm's value. This paper gives details about the determinants that affect the capital structure of Pakistani firms (Textile sector) registered at Pakistan securities Exchange (PSX). The data set used in this paper is Panel Data set. The Data for the Analysis has been taken for the years of (2012-2016). For this study we have taken the data from Publication of State Bank. 50 companies were selected randomly as a sample size from the population of whole textile sector. The explanatory variables chosen for this study are Profitability, Non-Debt Tax Shield, size and Liquidity and financial leverage is chosen as Dependent variable. For analysis we used ANOVA, Descriptive statistics, and regression analysis has been to find the relationship among these variables through SPSS Software. The results conclude that our Independent Variables such as Profitability, Size and Liquidity have Significant and Negative Correlation with level of debt, While Non-Debt Tax Shield has Insignificant and Positive Correlation with level of debt.

Keywords: Capital Structure, leverage, Liquidity, size, Pakistan Textile Sector, Profitability, and Non-Debt Tax shield.

INTRODUCTION

Capital is reflected as the most important source to run a company. Company's capital can be classified into two parts i.e. Debt financing and Equity financing. Debt financing in a sense, is when a corporation owes money in order to operate its business and then make repayment of borrowed funds with interest amount. On the contrary Equity financing takes place when a company sells some of its shares in order to obtain funds to operate its business and give right of ownership to the investors in return of their investment. Various definitions have been developed about capital structure. Capital structure includes debt, shareholder's equity or combination of both allotted by the firm.

For some firms it may bring good returns to some shareholders, if incase financial leverage of the increases, but it also gives rise to risk as the company might fail to pay its obligations. Then financial distress can be occurred which will lead the company to bankruptcy. A well appropriate capital structure should be placed as it is the most integral decision for every company as it doesn't only bring good returns but also can significantly affect the company's position in challenging environment.

Many financial economists have developed theories about leverage, thus in the publication of Modigliani and Miller (1958), to measure the fluctuations occurring in debt ratios of different firms. The trade-off theory identifies the relationship between taxes and cost of borrowing, and bankruptcy.

Pecking order theory is another vital theory which suggests that, first the company should use their retained earnings for the purpose to finance their assets, if the company doesn't has retained earnings then the second option is to finance their assets through debts by issuing debt instruments, if suppose the company doesn't has anyone of the above choices, then the company needs to choose equity financing to finance their assets. Steward Myers (1984).

Problem Statement

The question still remains unanswered that how firms should choose their capital structure? This study examines to know which factors determine the capital structure of the corporation. For this study we have selected Textile Industry of Pakistan.

Objectives of the Study

The objectives that are set for the study are:

- To find what are the factors that determine the capital structure of Textile Industry of Pakistan.
- To inquire how the decision of choosing capital structure is affected by the

determinants of capital structure of Textile companies.

- To see what is the relationship between financing decision and using of debt.

Hypothesis

H₁: Firm size has a significant impact on Company's Capital Structure.

H₂: Profitability has a significant impact on Company's Capital Structure.

H₃: Non-debt tax shield has a significant impact on Company's Capital Structure.

H₄: Liquidity has a significant impact on Company's Capital Structure.

Scope of the Research

The research's scope is applicable to textile industry of Pakistan. This study is applicable on secondary data of 50 randomly selected textile companies (listed at PSX).

LITERATURE REVIEW

Numerous researchers have explained the factors that determine capital structure of a corporation from different angles and in different concerns. Silva.M, Cerqueira.A and Brandao. E (2017) has done a study to examine the factors that determine capital structure of German companies. They have used panel data ranging from 2005-2014 sample included 443 non-financial German companies. The OLS model has been used to find relationship between independent variables that are risk, tangibility, profitability and non-debt tax shield and dependent variable which is financial leverage. Their results have concluded that all the explanatory variables were significant and positively correlated with dependent variable.

Omrawoo.V.T, Jaunky.C.V and Ramesh.V (2017) investigated a study to analyze the determinants of capital structure. Panel data of 10 companies of non-financial firms ranging from 2010-2015 was taken. Long term debt to total assets was taken as dependent variable, dividend payment, return on assets, earning per share, leverage ratio and tangibility were taken as independent variables. Their results indicated that Liquidity and earning per share had a positive Impact however the remaining independent variables such as leverage and tangibility, dividend payments and return on assets, have adverse impact on debt.

Singh.D (2016) carried a study to examine the determinants of capital structure of firms of non-financial sector of Oman. Panel data sample of sixty one (61) companies registered at Muscat Stock exchange ranging from 2011-2015 was taken for the analysis. Fixed effect model was used. Their results suggested that liquidity, tangibility, and profitability were negatively correlated with the leverage, while growth opportunity and firm size were positively correlated to the debt level. Non-debt tax shield did not perform to be related

significant to leverage of Omani firms.

Orman.C and Koksal.B (2015) conducted a study in which they conducted a comparison test of trading order theory and peaking order theory. From their study, it was found that trade off theory offers clear and well explanation of firm's structure of capital than peaking order theory.

In addition, when an economic environment is relatively stable, and then trade off theory acts to be more accurate to understand the financing options of big private companies in the non-manufacturing sector. On the contrary, when economy is unstable, then pecking order theory would be most advantageous once it arises to minor public-traded manufacturing firms.

Awan.G and Amin.S.A (2014) investigated a study to identify the factors affecting textile firms of Pakistan. panel data of sample of sixty eight (68) firms registered at Karachi stock Exchange ranging from 2006-2012 was taken for the analysis. The determinants in their study such as non-debt tax shield, size of the firm, earnings volatility, collateral fixed assets, liquidity of firms, commercial trades' positions and profitability of the firm affects the capital structure choice.

Daskalakis.N and Psillaki.M (2014) conducted a study in which the intention of the study was to know about the main determinants of capital structure of small and medium companies of France and Greece. Panel data was obtained from Diane and ICAP for Greece and France firms. Debt ratio was taken as dependent variable and independent variables were asset structure, company's size, growth rate and profitability of the company. Their results indicated that Profitability and assets structure had negative correlation with firm's debt level. On against, the growth rate of the firm and firm size had positive relationship to the firm's leverage.

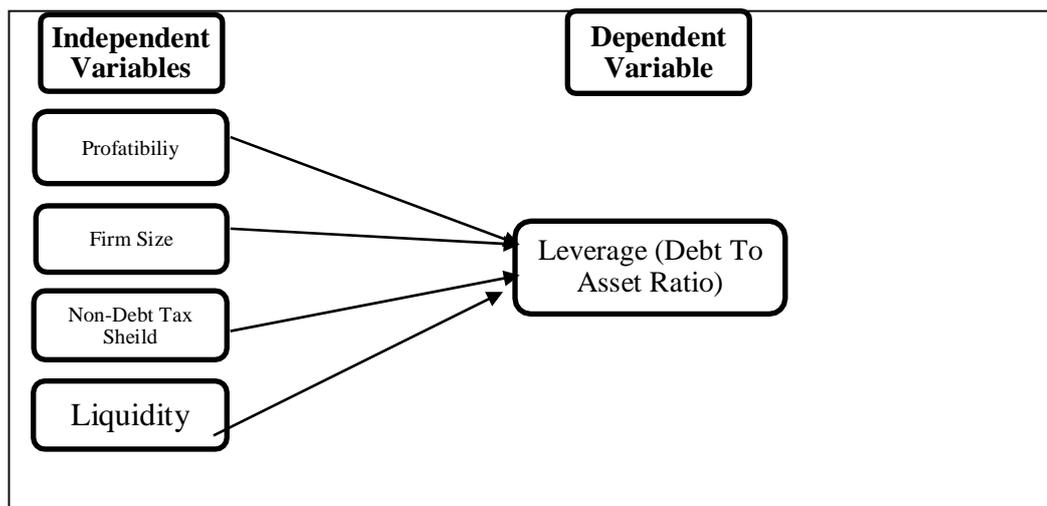


Figure 1: Theoretical Framework

METHODOLOGY

Data Collection

The data collected for the analysis is quantitative in nature. The type of data used for this paper is panel data. The data for debt to equity ratio (DER), Liquidity ratio (LR), profitability ratio (PR), firm's size and Non debt tax shield (NDTS) is gathered for 5 years (2012-2016) from FSA Non-Fin 2011-16.pdf which is a file published by State bank of Pakistan and can be took from the website of central bank of Pakistan.

Population

Whole textile sector companies listed at Pakistan Stock Exchange (PSX) is selected as a population for this research.

Sample

The total number of companies which are registered at Pakistan Stock exchange (PSX) is 572 companies, 475 companies are of non-financial sector and 97 companies are of financial sector. The textile sector (composite, weaving and spinning) includes 147 total numbers of companies. Companies were randomly selected for this research; the sample of 50 Textile firms of non-financial sector of Pakistan, ranging from 2012-2016 has been selected for this research to evaluate the determinants of capital structure of companies of non-financial registered at Pakistan stock exchange (PSX).

Model Specification

Panel regression analysis has been used. Panel data is the combination of time series & cross-sectional data.

Equation of our model is:

$$LG = \beta_0 + \beta_1 (PF) + \beta_2 (SZ) + \beta_3 (NDTS) + \beta_4 (LQ) + \varepsilon$$

Where:

LG = Leverage PF = Profitability

SZ = Firm Size (measured by Log of sales) NDTS = Non-Debt Tax Shield ε = the error term

Variables Dependent Variable

1: Leverage (Total Debt to Total Asset Ratio)

Debt to assets ratio could be defined as the ratio that indicates the financial leverage of a firm.

DAR = Total liabilities / Total assets.

Independent Variables

1: Size of firm

The speed and level of growth that is better for a specific small business refers to as firm size. We calculate firm size as natural logarithm of sale.

2: Profitability of Firm

The ability to make profits from investment can be defined as profitability of the firm. We calculate profitability as EBIT (operating Income) to total asset.

3: Non-Debt Tax Shields:

The advantage a company can have is not paying taxes on borrowed funds. We calculate non-debt tax shield as depreciation for the year to total assets.

4: Liquidity of Firm:

The ability of a business to cover its short term payments with its short term assets. We calculate liquidity of firm as total current assets to total current liabilities.

DATA ANALYSIS

Table 1: *Descriptive Statistics*

	Mean	Std. Deviation	N
Debt Ratio	.587523	.2722174	250
Profitability	.052618	.1081928	250
Size	15.038636	1.7196760	250
NDTS	.038494	.0901569	250
Liquidity	1.296544	1.1003418	250

Descriptive Statistics

The Table 1 tells us about the descriptive analysis for our data in which the value of Mean of Debt Ratio is .5875 that shows that the total debt covers 58 percent of the total assets financing. In the context of independent variables, the size of the firm shows highest value of Mean which is 15.0386, with the highest Standard Deviation with unit of value 1.7196 respectively. Contrary to this, The Non Debt Tax Shield has the lowest value of Mean which is .0384, with the lowest value of standard Deviation which is .09015 respectively.

Table 2 Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.641 ^a	.411	.402	.2105266	1.132

a. Predictors: (Constant), Liquidity, Size, NDTS, Profitability b. Dependent Variable: Debt Ratio

Table 3 : ANOVA^a

Model	Sum of Squares	DF	Mean Square	F	Sig.	
1						
	Regression	7.593	4	1.898	42.828	.000 ^b
	Residual	10.859	245	.044		
	Total	18.451	249			

a. Dependent Variable: Debt Ratio

b. Predictors: (Constant), Liquidity, Size, NDTS, Profitability

The Table 2 presents the rapid summary of our Data analysis, in which the R square value shows that there is 41 per cent variation, appears in dependent variable due to explanatory variables. In other words, 41% of variation is caused by Independent variables in Dependent variable.

ANOVA stands for Analysis of Variance.

The ANOVA Table shows the signification of the Model and Variations among the variables. In the above model the value of F-statistic is found as 42.828 and the P-value as .000 which is less than 0.005, displays that there is strong significant variation or difference among variables. In other words, we can say that our Model is strongly significant.

Table 4 : Coefficients

Model	Unstandardized Coefficients		Standardized Coefficients	T	Sig.	Correlations		
	B	Std. Error	Beta			Zero-order	Partial	Part
(Constant)	1.118	.124		9.018	.000			
Profitability	-.966	.137	-.384	-7.049	.000	-.520	-.411	-.346
Size	-.024	.008	-.153	-2.957	.003	-.287	-.186	-.145
NDTS	.028	.153	.009	.185	.854	.153	.012	.009
Liquidity	-.090	.012	-.363	-7.189	.000	-.459	-.417	-.352

a. Dependent Variable: Debt Ratio

Table 4 shows that the Summary of correlation between dependent variable with Independent variables which is as follow:

Profitability is statistically strongly significant with the value of .000; it is negatively correlated with financial leverage with value of -.966.

Size of firm is also statistically highly significant with the value of .003; it is negatively correlated with financial leverage with the value of -.024.

Non Debt Tax Shield is statistically insignificant with the value of .854; it is positively correlated with firm's financial leverage level with the value of .028.

Liquidity is statistically strongly significant with the value of .000; it is negatively correlated with firm's financial leverage level with the value of -.090.

Discussion

The Value of Beta in Table 4 shows that per unit change in the dependent variable which is financial leverage would be because of the change in the Independent Variables which are Profitability, Size, Non-debt Tax Shield and Liquidity. More specifically, variables like Profitability, size And liquidity are having negative betas which mean that these have negative correlation with Debt level, while on the other variable such as No-Debt Tax shield is having Positive beta which means that it is positively correlated with Financial Leverage.

After evaluating the T-values of the Variables, it is concluded that size of firm, Profitability, and Liquidity have significant effects on the Debt level while the Non-Debt Tax shield has insignificant impact on the dependent variable which is financial leverage.

CONCLUSION

This study was conducted to realize what are the determinants of capital structure? Based on our results, Empirical evidence on the structure of capital decisions for Textile companies reveals that Profitability, Size and Liquidity, have significantly and negatively Correlation with the financial leverage. While on the other hand, Non-Debt Tax shield is positively but insignificantly correlated with the leverage ratio. So lastly, we can conclude that our three explanatory variables are negatively correlated with Leverage and one is positively correlated with financial leverage.

Recommendations

- Future researchers are recommended to consider other factors such as growth opportunities, free cash flows and assets efficiency and maybe be other factors that might determine capital structure of Textile sector.

- This study might help future researchers to compare textile sector with other sectors at Pakistan Stock Exchange (PSX). By doing so, researchers would know about the density of borrowed funds of different firms in different sectors.
- We have taken long term debt to total assets ratio, future researchers could also take only long term debt to assets ratio for their analysis as many researchers have taken it.

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THE EFFECTS OF TRANSACTIONAL AND TRANSFORMATIONAL LEADERSHIP STYLE ON EMPLOYEE'S CREATIVE PERFORMANCE; A CASE STUDY OF PRIVATE UNIVERSITIES FACULTY STAFF

Muhammad Tahir

Business Administration Department, Iqra National University, Peshawar, Pakistan.
Email: tahirkhanaee@gmail.com Ph: +923239256994
ORCID: <https://orcid.org/0000-0001-8195-513X>

Zakir Rahim

Business Administration Department, Iqra National University, Peshawar, Pakistan
Email: zakir.rahim@inu.edu.pk

Raza Ahmed Khan

Business Administration Department, Iqra National University, Peshawar, Pakistan
Email: raza.ahmed@inu.edu.pk

ABSTRACT

Employee creativity can play important role in the success of the higher educational sector. For employee's creativity to flourish there must be supporting work environment, right leadership style, and incentives to be offered to employees. The objective of the study was to investigate employee creativity by using the transformational and transactional leadership style framework. The study is based on a quantitative approach, cross-sectional research design, and survey-based data collection. Through sampling, we generated a usable sample of 215. We used Smart PLS for analyzing data. Our results indicate that our variables had good reliability (based on Cronbach Alpha and Composite Reliability); and good construct validity including convergent validity (established using Average Variance Extracted) and discriminant validity (established using the comparison of individual loading and squared loadings of measures). Furthermore, results for the proposed model indicate that transformational leadership positively and significantly influence employee's creative performance. While results for transactional leadership is turned out to be negative and insignificant.

Keywords: Transformational Leadership, Transactional Leadership, Employee Creativity, Universities, Pakistan.

INTRODUCTION

There are fewer studies conducted about the role of environmental factors in shaping employee creativity in the case of staff of higher educational sector in Pakistan. Mostly such studies conducted in the Western context; but the understanding of environmental factors shaping employee creativity in the higher educational sector in Pakistan is relatively less understood. In this study, we are focusing on the role of leadership style in shaping employee creativity in the higher educational sector.

Background

Initially, employee creativity was thought to be a product of an individual's personality related factors. However, work by re-known experts such as Amabile showed that environmental factors also influence an individual's creativity (Amabile, 2011). Later relevant work showed that within organizations, several factors such as HR practices and leadership style also influence staff creativity (Amabile & Kramer, 2012; Cheung & Wong, 2011; Liu, Liao, & Loi, 2012; Zhang & Zhou, 2014). Few studies also investigated the role of transformational and transactional leadership style on employee creativity (Herrmann & Felfe, 2014; Henker, Sonnentag, & Unger, 2015; Mittal & Dhar, 2015; Pieterse, Van Knippenberg, Schippers, & Stam, 2010; Wang, Tsai, & Tsai, 2014). Mostly, such studies conducted in the Western context; while, fewer studies conducted in the Pakistani context especially in the higher educational sector. This study intends to fill this literature gap by investigating the role of leadership style on employee creativity in the higher educational sector.

Problem Statement

The higher educational sector is facing challenges including high competition and greater regulatory pressure. For example, now it is becoming mandatory for higher educational institutes to register with regulatory authorities including the Higher Education Commission, Pakistan Engineering Council, and Pakistan Medical and Dental Association. Furthermore, universities also require getting their individual programs such as Bachelors or Master with concerned accreditation bodies. The universities also facing high competition and also requires greater pressure to show their performance in terms of graduate employment, skills development, and faculty development and retention. Based on the regulatory pressure and higher competition, there is a greater need for the universities to make proper use of their human resource for strategic utilization. In this regard, an important issue is employee

creativity which if fostered

properly, can provide universities a source of competitive advantage over the rivals. In this study, our focus of the investigation is the role of leadership style in fostering employee creativity in the higher educational sector.

Research Questions

The study is based on the following research questions.

Q1: What are the effects of transactional leadership style on creativity among the faculty of private sector universities?

Q2: What are the effects of transformational leadership style on creativity among the faculty of private sector universities?

Research Objectives

Objectives of the study are as under.

- To measure the effects of transactional leadership style on creativity among the faculty of private sector universities.
- To measure the effects of transformational leadership style on creativity among the faculty of private sector universities.

Significance of the Study

The theoretical significance of the study is that it fills the literature gap related to the role of leadership style on employee creativity in the higher educational sector. The practical significance of the study is that its findings will guide the private sector universities in adopting the right leadership style for fostering employee creativity. The findings will be utilized by future researchers, academics, and practitioners as well.

LITERATURE REVIEW

Employee Creativity- an Introduction

According to Zhang and Zhou (2014), creativity is about the production of useful new ideas related to the procedures, processes, services, or products. In an organizational context, employee creativity is about the development of innovative product or service or procedure (Tang & Chang, 2010). Employee creativity is a relative measure based on low to high scale or from no-creativity to higher creativity (Amabile & Kramer, 2012). Previously, creativity was thought to be the sole product of an individual's own personality related factors. However, research work during the last few decades shows that environmental factors also

influence employee creativity. In this regard, different organizational factors including management philosophy, human resource management practices, leadership style, work climate and similar factors also influence employee creativity (Amabile & Kramer, 2012; Cheung & Wong, 2011; Dul & Ceylan, 2011; Jiang, Wang, & Zhao, 2012; Liu, et al., 2012).

Leadership

Leadership is a complex, diverse, and broad phenomena and there is little agreement about what leadership is and what is not. A starting point can be a definition by Yukl (2013) who describe leadership as a process related to the influencing others to agree and understand about objectives and mechanism to achieve such objectives. The definitions suggest that leadership concept is associated with management, supervision, authority, control, power, and influence (Yukl, 2013). The difference between leadership and management is mostly confused and misunderstood. According to the Northouse (2018), management is having a focus on the present; while, leadership is about preparing the organization for future or giving future directions. In other words, management is reactive and is control oriented; while, leadership is proactive and is change oriented.

Transformational and Transactional Leadership Styles

The work by Burns (1978) and later Bass and Colleagues (Avolio & Yammarino, 2013; Bass & Avolio, 1990) set the foundation of transactional and transformational leadership style. These two leadership styles represent two sets of separate behavior adopted by the leader and used for influencing the followers such as getting the work done (Bass, Avolio, Jung, & Berson, 2003; McCleskey, 2014; Odumeru & Ogbonna, 2013). These two leadership styles have sub-dimensions based on the work of Bass. The transactional leadership dimension includes passive management by exception, contingent reward, and active management; while, the transformational leadership dimension includes individual consideration, intellectual stimulation, and idealized influence (Bass & Avolio, 1990; Odumeru & Ogbonna, 2013).

Relationship between Leadership and Employee Creativity

The transactional and transformational leadership style is used as a predictor of different employee outcomes including employee creativity. Since transactional leadership style is based on managing organization according to the pre-set rules and existing routine, so this type of leadership style is not very supportive for the employee creativity. On the other hand, transformational leadership style is based on change and thus is about supportive for employee creativity. Previous studies show that transactional leadership style is negatively

associated with employee creativity, while, transformational leadership style is found to be positively associated with employee creativity (Henker, et al., 2015; Herrmann & Felfe, 2014; Mittal & Dhar, 2015; Pieterse, et al., 2010; Wang, et al., 2014).

Theoretical Framework

The theoretical framework of the study is based on the transformational leadership style theory (Bass & Avolio, 1990) and employee creativity theory (Amabile, 1996). The signaling theory also supports our model (Bergh & Gibbons, 2011). According to the signaling theory, employees respond to the signals received by the organization. In our model, the leadership style is also viewed as a signal received by the employees and respond in the form of creative behavior. Based on the mentioned theories, and previous studies, we propose the following theoretical model.

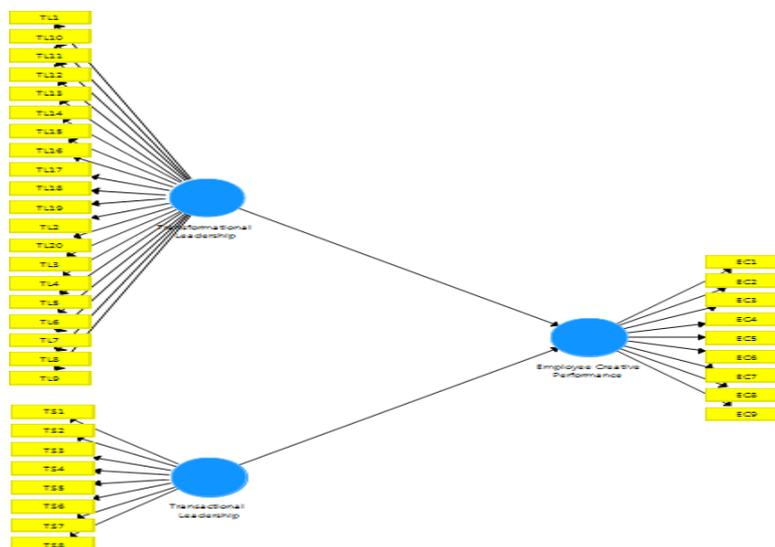


Figure 1: Proposed Theoretical Model

Research Hypothesis

Hypotheses of the study are as follows.

H0= There is insignificant effects of transactional leadership style on employee creativity.

H1= There is significant effects of transactional leadership style on employee creativity

H0= There is insignificant effects of transformational leadership style on employee creativity.

H2= There is significant effects of transformational leadership style on employee creativity.

RESEARCH METHODOLOGY

Research Design

There are different research designs such as descriptive, exploratory, and explanatory research design (Sekaran & Bougie, 2016). In our study, we intend to explain the relationship between one variable and the other, so our research design is explanatory. In terms of time frame, our research design is cross-sectional since we collect data from our participants only once.

Population of the Study

The population of the study is all faculty members belongs to the private sector universities in Pakistan. The population is large and is relatively unknown, so we used the sampling approach.

Sampling Techniques

According to Sekaran & Bougie (2016), sampling categories includes random sampling and non-random sampling. In this study, we used random sampling. Based on the table developed by Bartlett, Kotrlik, and Higgins (2001), our required sample size is 209. This sample size is based on 1% alpha level, .03 margin of error, and 99% confidence interval.

Research Tools

The questionnaire for transformational leadership style and transactional leadership style is adapted from Avolio and Bass (2001). In this measure, there are 20 items for the transformational leadership style and 8 items for transactional leadership style. Employee creativity is measured by 9 items adapted from Tierney, Farmer, & Graen (1999).

Data Collection

The primary data is collected from the six private sector universities located in the city of

Peshawar, Lahore, and Islamabad. These universities were chosen on a convenience basis. Questionnaire was physically distributed and later collected by the researcher. After data collection, data is checked for missing values and discrepancies. A total of 325 questionnaires were distributed out of which 215 questionnaires were returned making a response rate of 66.15%.

Data Analysis

Data is analyzed using SPSS version 20 for descriptive statistics. For establishing validity, reliability, and hypothesis testing, we used the Smart PLS version 3 (Ringle, Wende, & Becker, 2015).

RESULTS

Demographic Details

Demographic Details of the Survey Participants

Table 1: *Demographic Information*

		Frequency	Percentage
<i>Gender</i>	<i>18 to 25 Years</i>	44	20.5
	<i>25 to 40 Years</i>	107	49.8
	<i>40 to 60 Years</i>	58	27
	<i>Above 45 Years</i>	6	2.8
<i>Age</i>	<i>Assistant Professor</i>	54	25.1
	<i>Associate Professor</i>	15	7
<i>Qualification</i>	<i>Female</i>	32	14.9
	<i>Lecturer</i>	118	54.9
	<i>Male</i>	183	85.1
	<i>MS/MPhil</i>	120	55.9
<i>Role</i>	<i>Others</i>	82	38.1
	<i>Others</i>	18	8.4
	<i>PhD</i>	13	6
	<i>Professor</i>	10	4.7

Demographic details of the survey participants are given in the table above. It shows that in our sample, there were 183 male (85.1%) and 32 female (14.9%). In terms of age, 44 participants (20.5%) belonged to the age category of 18 to 25 years of age; 107 participants (49.8%) belonged to the age category of 25 to 40 years; 58 participants (27%) participants belonged to the age category of 40 to 60 years of age; and 6 participants (2.8%) belonged to the age category of above 45 years of age. In terms of qualification, 120 participants (55.9%) had MS/MPhil level qualification; 13 participants (6%) had Ph.D. qualification, and 82 participants (38.1%) had others level of qualification. In terms of job role, 118 participants (54.9%) were lecturers; 54 participants (25.1%) were Assistant Professors;

15 participants (7%) were Associate Professors, and 10 participants (4.7%) were professors.

Descriptive Statistics

Descriptive statistics is as under.

Table 2: *Descriptive Statistics*

	<i>Min</i>	<i>Max</i>	<i>Mean</i>	<i>SD</i>
Transformational Leadership	2.85	4.40	3.76	.41
Transactional Leadership	2.13	3.88	2.79	.33
<u>Creative Performance</u>	<u>2.89</u>	<u>4.89</u>	<u>4.15</u>	<u>.41</u>

Descriptive statistics are given in the table above. Descriptive statistics indicate that in our sample, the perceived transformational leadership was high (M=3.76, SD=.41); perceived transactional leadership was low (M=2.79, SD=.33); and perceived employee creative performance was also very high (M=4.15, SD=.41).

Reliability and Validity

Reliability for each variable was tested using the Cronbach alpha, rho_A and Composite reliability as proposed by Fornell & Larckers (Cronbach, 1951; Fornell & Larcker, 1981).

Results are given in the table below.

Table 3: *Reliability and Convergent Validity*

	Cronbach's Alpha	rho_A	Composite Reliability	Average Variance Extracted (AVE)
Employee Creative Performance	0.778	0.935	0.837	0.673
Transactional Leadership	0.732	0.835	0.893	0.873
Transformational Leadership	0.778	0.755	0.730	0.732

Results for Cronbach Alpha, rho_A and composite reliability indicate that all variables had good reliability since values were above 0.70. For validity, we used the convergent validity which refers to the extent to which the items in a scale measure the abstract or theoretical construct (Carmines & Zeller, 1979). The construct validity is established using its components of convergent validity and discriminant validity. For convergent validity, we used the Fornell and Larcker's (1981) criteria of Average Variance Extracted. In our study, all three variables had AVE of above 0.50 so it indicates good validity of the measures involved. For discriminant validity, we used the method of comparing the squared item loadings and cross-loadings which is considered as intuitive interpretation because of comparison of percentage overlap between an item and any construct (Hair, Hult, Ringle, & Sarstedt, 2014).

Table 4: Discriminant Validity

	1	2	3
Employee Creative Performance		0.673	
Transactional Leadership		0.456	0.442
Transformational Leadership		-0.411	-0.117
			0.441

In the above table, the loadings are given for each variable while values in bold are squared cross-loadings. The results show that all variables had good discriminant validity since no squared loading exceeded the loading in its individual column.

Table 5: Path Coefficients

	Coefficients
Employee Creative Performance ← Transformational Leadership	0.413***
Employee Creative Performance ← Transactional Leadership	-0.363
Rsquare	.337

The results for measurement model suggest that transformational leadership has positive and significant effects on employees creative performance ($\beta=.413$, $P<.05$); and transactional leadership has negative and insignificant effects ($\beta=-.363$, $P>.05$).

Discussion

The objective of the study was to test the effects of two leadership style including transformational and transactional leadership on employee creative performance in the context of the higher educational sector in Pakistan. We used the quantitative approach, cross-sectional survey design, and collected data from sample organizations. Our results indicate that in the higher educational sector, the transformational leadership is more influential in cultivating employee creativity; while, results for transactional leadership style turned out to be insignificant. Our results are consistent with the findings of previous studies including Herrmann & Felfe (2014); Wang, et al., (2014); Pieterse, et al., (2010); and Mittal and Dhar (2015). The results are also supported by the transformational leadership style theory (Avolio & Yammarino, 2013); Signaling theory (Bergh & Gibbons, 2011); and employee creativity theory (Amabile, 1996). Overall, our results are consistent with the findings of previous studies and relevant theories.

CONCLUSION

On the basis of the study results and relevant theories, we can conclude that employee creativity is an important concept and should not be ignored in the higher educational sector. It can also be concluded that employee creativity is not an individual own personality based trait but also influenced by environmental factors. It can also be concluded that leadership style plays important role in shaping employee's creativity. Finally, we can conclude that for employee creative performance, transformational leadership style is more suitable and may be followed in the higher educational sector.

Recommendations

On the basis of the study findings, the following recommendations are made.

- The private universities in Pakistan need to give attention to the employee creativity.
- Appropriate leadership style such as transformational leadership style can be used to improve employee creative performance.
- The leadership of the higher educational sector needs to be trained in adopting the right leadership style for cultivating employee creativity.

Limitations of the Study

The limitations of the study include cross-sectional design, the quantitative approach adopted, survey-based data collection, perceptual data rather than actual data, and use of only two leadership styles for understanding employee creativity.

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