POLITICAL INSTABILITY AND PRIVATE INVESTMENT, TIME SERIES ANALYSIS IN CASE OF PAKISTAN

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Discipline: M.Phil Economics

PAKISTAN INSTITUTE OF DEVELOPMENT ECONOMICS

ISLAMABAD, PAKISTAN

Date of Submission: 4th Sep, 2019

Pakistan Institute of Development Economics

CERTIFICATE

This is to certify that this thesis entitled: **"Political Instability and Private Investment, Time Series Analysis in Case of Pakistan"** submitted by Mr. Jawad Ahmed Qureshi is accepted in its present form by the Department of Economics, Pakistan Institute of Development Economics (PIDE), Islamabad as satisfying the requirements for partial fulfillment of the degree of **Master of Philosophy in Economics**.

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Surah Al-Alaq
[96:1]

I am dedicated this thesis to me

Abstract

Investment is most important determinant of economic growth and political instability is major constraint in its way, both in short and long run economic periods and for both developing and developed economies. In the way, private investment serves as only key in highly indebted developing economies for physical and human formation while political stable environment acts as fundamental catalyst and process necessary to achieve this investment. Therefore, this study searches the impact of political instability on private investment (Pvt I) in Pakistan by employing annual time series data for the period 1984-2016. Econometrical proofs of Auto Regressive Distributive Lag model (ARDL) for private investment have been obtained through estimations on E-Views. Findings of the study reveals that political instability negatively drives private investment in Pakistan, both in short and long run economic periods. Empirical result in study further confirms that financial market development significantly promotes the private investment, whereas real effective exchange rate and public investment have significant negative relationship with private investment (i.e. gross domestic fixed capital formation). Furthermore, it is found that public debt and real interest rate also have a negative impact on private investment but they have insignificance in the case. Study recommends that government have to take initiatives to promote private investment in Pakistan through creating stable political settings in the country and this stability depends on the growth and development of institutions.

Keywords: Political Instability, Private Investment, ARDL, E-Views, Financial Market Development, public investment, Real Effective Exchange Rate, Real Interest Rate, Public Debt.

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List of Abbreviations

Pvt I	Private Investment
PI	Political Instability
Pub I	Public Investment
PD	Public Debt
REER	Real Effective Exchange Rate
RIR	Real Interest Rate
FMD	Financial Market Development
ECM	Error Correction Model
L&O	Law and Order
GS	Government Stability
ET	Ethnic Tensions
RT	Religious Tensions
MP	Military in Politics
MIGA	Multilateral Investment Guarantee Agency
GDP	Gross Domestic Product
DA	Democratic Accountability
ARDL	Auto-Regressive Distributive Lag
ADF	Augmented Dickey Fuller
R&D	Research and Development
ICRG	International Country Risk Guide
GFCF	Gross Fixed Capital Formation
NPCI	National per Capita Income

Chapter 1

INTRODUCTION

1.1 Background of the study

Investment is main theme in national income that governs the rate of economic growth and development in economies. Being the main component of aggregate demand, it is formation and accumulation of physical and human capital, so it enhances productivity into economy. On the other hand, political stable environment is a consistent and persistent certain domain where economic and political agents are capable to achieve their long run results, so it acts as a catalyst to enhance this investment. Therefore, political instability in the any country is a crucial determinant of investor's investment decisions (Moosa, 2002). In this regard theorists in the economic theory have paid much more attention to understand this phenomenon through investigating socio, politico-economic history of the countries and inferences investment as only key in highly indebted developing economies for a sustainable economic growth and political stable environment as a fundamental ingredient and process necessary for this investment. In the light of these academic studies this study is also studying the relationship between these two concepts by focusing on true impact of political instability on private sector economy in Pakistan.

Investment expenditures are either irreversible or delay. By irreversibility it means firm cannot disinvest because they are sunk costs to enter and exit when physical capital is committed or move from one sector to another, Rodrik (1989). By delaying it means allowing the firm to wait for the marginal information in regard to prices, costs and market condition before committing their efficient resources. All it can be say as uncertain. Under these circumstances, higher uncertainty tends to lower investment because when individual firms or investors are not certain about the future of their investments, then they cannot take interest to put their high cost capital in

chancy and insecure environment. According to Feng (2001) political instability have a negative impacts on supply and demand for investment capital, it diminishes capital from an economy, as a result saving and investing trend from the economy transformed into consumption trend. In this way political instability hampers the economic growth.). The only reason behind these initiatives is political instability, especially in the form of civil disturbances and terrorism. In the sense Aysan et al. (2007) theorizing that political unstable environment give birth and rise to unwanted conditions in the economy. This uncertain situation discourages the investment by investors and industrialists, due to which the share of investment falls in the economy. Coilno (2012) documented that it is a high uncertainty which derives the political instability in the country as a result demand for labor shrinks in the economy due to which unemployment originates and increases with an increases in political instability. Political instability always have a negative consequences for economic growth and development in the economies, Jong-A-Pin, (2009).

Multilateral Investment Guarantee Agency (MIGA) in 2011, in its report published that perceptions in regard to political risk are different for south and north-based investors. South-based investors are insecure to both type of instabilities i.e. political and macroeconomic instabilities while north-based investors have only concern to macroeconomic instability both in the short and medium term. In 2013, Political Risk Survey from MIGA-EIU in its annual report publish that one forth or twenty-five percent of firms from the world cancelled out their important investment schedules in 2012[1].

In his past, it has had a great deal of political instability i.e. political assassinations, government instability and crises, frequent changes in cabinet and heads of cabinets and military

[1]*MIGA-EIU-Political-Risk-Survey-(2013) www.miga.org/sites/default/files/archive/Documents/WIPR13.pdf*

in politics. Therefore in Pakistan governments have nothing but a disappointment for its investor because of their failure in providing a stable and reliable settings to its investors for last many decades. This insecurity and incapability damages its private sector drastically like closing and shut downing of producing unit and capital flights to other countries which resulted in fall of private sector share from the Pakistani economy e.g. private investment share to GDP was 6.8 percent from year 1980-1990 but from year 1990 to 2000 it declines to 3.8 percent and reaches to 2.1 percent in next five years from 2000-05. So it all depends on the governance system in the country, it have to provide the stable settings for sound growth in the economy. When this system unbalances it leads to crises, as Alesina et al. (1996) postulated that political stability is a must requirement for economic growth. In case of political instability investment falls in an economy because fall of government leads to fall in investment and the high number of falls of government in the country significantly falls it investment. Political and macroeconomic instability, energy crises, corruption and social disorders are a severest constraints in the way of investment in Pakistan. Firms perceive these constraints differently in different time periods. In 2002, 40.4 percent of firm's perceive political instability as a severe constraint in the way of private investment while 34.5percent perceive macro-economic instability as a major constraint. Later on, in 2007 these perceptions about political instability increases up to 46.8 percent and macro-economic instability perception reaches to 56.6 percent (Manes, 2009). Political instability give rise to unproductive activities and slow down the productive market activities, it passes the negative signal to the investors. Consequently, this instability and uncertainty leads to reduction in investment because a rational investor or firm never invests in an unstable environment Woo & Hoe, (2009).

In this regard developing economies of the world have shown more concern in the stability settings. According to David, 1965 countries from Asia and Africa had more focus on national integrity and authority rather than economic development. According to Lipset (1960) Stable country is a one which have a consistent and persistent political for twenty-five years. Furthermore, Lucian, (1971) stated that each and every state have to resolve these five issues i.e. identity crises, legitimacy crises, penetration crises, participation crises and distribution crises for political stable environment in their states.

Therefore, political stable environment is a basic catalyst necessary for enhancing investment for sustainable economic growth in any economy. In this perspective if the focus should be made on the growth and development of institutions then the desirable economic growth can achieve because institutions are crucial in reducing uncertainties around and provides opportunities to enhance supportive environment for investors (North and Weingast, 1989). For instance, protection of property rights is considered to be stable economic institutions which promotes creativity and enhance entrepreneurship on one hand and on the other hand it build the required confidence for investors to invest more. In the same way, unstable political institution such as frequently change in governments may also demotes investment opportunities in economies.

1.1.1 Investment and Importance of Investment in Economies

What is investment and why it has too much importance in the economies? The answer is that investment is human and physical formation and accumulation and it has a too much importance because it governs the rate at which economies grow and develop.

Investment, being main theme in macroeconomics is most discussing topic among main stream economists and the basic enzyme that enhances the sustainable productive capacity of the

economy. Investment spending behavior is a function of multiple economic and non-economic factors that is why it is very sensitive in nature. So, we have to be aware about its determinants for productive policy design in the economy for purpose to have the desired rate of capital accumulation and formation in the economy. That is why investment is necessary condition for the economic growth and development. Investment give strength to the economies by promoting them, it bring research and development and innovations in the economies, which raises the state prosperity through raising productive capacity of the economy. So, it is the main theme through which developing economies can be transformed into developed economies.

Now, here is another question: how can investment be financed? It is not talk about money that from where it will come, it is actually a concept of allocation of resources that use of real resources in capital stock for the promotion of real investment. So, we can say that it is the beauty of economic thought that stresses for all the times on the creative and efficient productivity through optimal utilization of resources, in this regard it is the concept that physical capital should be accumulate in the sense to achieve an efficient and creative productivity in order to generate and distribute marginal income for the society. In this regard Sir Adam in 1776 stated in his book "inquiry into nature and causes of wealth of nations", that capital as being a chief component is always have a concern with extensive division of workers for enhancing higher total output in the economy through promoting the output per labor. Further, an economy's rate of progress is proportional to its rate of investment[2].

In this regard Ragnar Nurkse observed in 1950 that poor economies are poor because of absence of real capital in their economies. He then drawn vicious circle of poverty compose of

[2] *Adam Smith, wealth of nations (1776), ed. R. H. Cambell and A. S. Skinner (1979), vol. 1, p.343)*

supply and demand sides. Supply side in the circle reflects that it is a lack of capital in the economies which resulted into low productivity, this low productivity ends into low level of national income due to which these economies have lack of capacity to save which ends into lack of capital accumulation, therefore lack of capital accumulation is proportional to lack of capacity in to the economy, in the sense vicious circle completes. While demand side of his vicious circle reflects that a low level of investment in the economies resulted into shortage of capital due to which these poor economies have a low level of production, as a result they have insufficient national income. This low level of income is indicating the less buying power from labor force in the economy, which obviously representing that they have a low level of investments that is why they do have shortage of capital in their economies. In the sense their vicious circle completes from demand side.

Sir Lewis (1955) shed the light on the importance of investment behavior into the economies. He documented that it is investment that promotes the economic performance and achieves the development into the economies. He then give an evidence that the developed countries of the today world have a good record of acceleration in investment in their economies, which was noted in some specific time period in their history. It was industrial revolution, he called it, where investment rate at annual basis remained between five to twelve percent. In the sense he stresses on the importance of industrial revolutions for the development of economies. Meirer (1989) also stressed too much on the importance of capital formation and accumulation[3]. He argues that is obvious that capital formation is a good channel that enhances the development into the economies. But the question is from where economy can get a capital formation, he replied that formation of capital can only be obtained through economic surplus. So, for capital formation,

[3] *Gerald M. Meier (1989). Leading Issues in Economic Development, Fifth Edition Oxford University Press, and New York Oxford.*

economies have to generate economic surplus, they have to invest their investments and increase them in the sense that drive and mobilize the higher surplus in the economies which always must be above then consumption expenditures in the economy. According to Sir Meirer, capital formation in the economy is a process and its formation generally consists of following three steps

1. Rate of capital formation is proportional to rate of real savings in an economy. Higher savings will lead to higher capital formation.
2. Economic institutions have a significant impact on capital formation. Development of economic institutions can develop a productive financial mechanism system which can enhance the productive capacity in the economy.
3. Efficiency and competency of investment can itself is a channel to promote capital stock in the economy.

1.1.2 Review of Theoretical Development in Investment Theories

We are reviewing the following theories of investment to possibly discuss the theoretical development in literature of investment in the economic theory. These theories are: Classical theories of 1930, Keynesian theory of 1936, profit and liquidity theories of 1948, investment accelerator theory of 1953, and the neo classical approach of 1967, q theory, the uncertainty, irreversibility and investment theories of 1994.

Classical economists in 1930 under the supervision of Sir Fischer defined that investment function in an economy is only function of rate of interest, which they stated that can only be determined at equilibrium level. Equilibrium point is the one where rate of return from the investment is exactly equal to the rate of interest present in an economy. If the investors rate of return from given investment will follow the given rate of interest in the economy then will at the maximum net present value of the capital. So classical economists conclude that only those

investments will be desirable for the investors in which rate of return over cost will be equal or greater than the rate of interest. However theory fails to explain the large accumulation of capital in developed countries where there has been no decline in interest rates. Later on, Keynesian approach of 1936 defines marginal efficiency schedule of capital or investment demand schedule. Marginal efficiency of capital asset is rate of discount, where the present value of return expected from the capital asset is just equal to supply price i.e. the cost of acquisition of capital. The demand of capital depends on whether the present value of benefits exceeds the cost of acquisition of capital[4]. Lower the rate of interest higher the input of projects will be and also can enhance the expansion in current projects. Therefore, it exists a negative relationship between rate of interest and demand for capital. Investment will be determined at the point in economy where marginal efficiency of capital is equal to prevailing interest rate[5]. At that point the prospective yield from the marginal investment will exactly equal to its supply price. However, this theory neglects dynamics, lags, the influence of stock of capital assets and rate of production of capital assets. Thus Pratten (1990) states that Keynesian approach is weak (Pratten, 1990).

Therefore, in 1948, profit and liquidity theory give its approach regarding investment function. In this theory, Klein is claiming that optimal level of capital stock is a function of expected profits, which are in turn a function of past profits[6]. In this regard, Duesenberry (1958) develop liquidity theory on the assumption of an imperfect capital market and theorizing that it is cheaper to invest internally generated funds rather than externally borrowed funds. The logic behind investments in

[4] *P.V = ∑Tt=1 Rt / (1+)t present value method discounts the future stream of net returns and compares it with the cost of acquisition of capital goods q.*

[5] *Investment will be take place only and on P.V ≥ (greater than) q*

[6] *Klein 1948 postulates that desired level of capital stock is a function of expected profits which are derived from past profits. KT = f (pie) = f [h (pie t-1)]*

internally generated funds is that there will be more profits on lower cost of capitals. However in 1972 Junanker maintained that the profit and the liquidity theories are empirically indistinguishable from accelerator theory since profits are a function of level of output. The accelerator model of investment functions presents the close relationship between the rate of investment spending and the changes in aggregate output. Chenery and Eckaus 1953 maintains that investment increases when output accelerates. It suggests that desired amount of capital is a constant fraction of output. If firms can invest without delay in order to keep the actual level of capital stock equal to desired level, then the net investment will exactly equal to increase in capital stock that is proportional to change in output. Jorgenson (1967) presume adjustment costs and uncertainty worthless in his neo classical approach. This neo classical theory of economic growth [Lucas (1988), Romer (1990) and Solow (1956)] also emphasizes on the role of investment in the production process through physical and human capital. His model maximizes the discounted value of expected net returns and his investment equation is derived directly and explicitly from the theory of profit maximization and draws relationship of current real investment with future real outputs. This theory further states that aggregate investment function in an economy is a function of behavior of firms while capital is homogenous and allocation of optimal capital stock is only possible at point where marginal productivity of capital is exactly equal to marginal cost of capital. This Neo-classical approach focuses on the present value of capital/investment while this value is integral of discounted net receipts from the firms production activities over an infinite time horizon. Lucas (1967) and Treadway (1969), amongst others, modified the neoclassical investment theory by introducing the assumption that capital is costly to adjust. Hayashi (1982), following this literature, demonstrated the relationship between this approach and Tobin's *q* theory of investment.

Tobin (1969) argues that aggregate investment spending on additional capital assets will vary positively with *q* - the ratio of the market value of business capital assets to the replacement value of those assets. Tobin asserts that *q* can be used as a qualitative measure of the market's incentive to invest. Thus, theory postulates that desirable investment is possible on a point where 'q' will be greater than unity where firms will invest more in new capital stock and in case if 'q' will be less than unity than investment spending behavior will be discourage in an economies and firms will not prefer to invest in new capital stock. In the context, Tobin's q theory of investment (Tobin, 1969) establishes the link between investment and stock market and defines' q' as basically the market value of capital relative to replacement cost of capital[7]. The advantage of q-theory is that it reflects the expected future profitability of capital as well as the current profitability (Christiano and Fisher, 1995). Hence q theory of investment emphasizes that investment decisions depend not only on current economic policies, but also the policies expected to prevail in the future.

Based on the theoretical literature of neo-classical approach we conclude that rate of interest, real output, public investment are the prime determinants of private investment. In addition to these factors busse and hefeker 2007 argued that political instability which is associated to the quality of domestic institutions effect the investment in the developing countries. As unstable political environment creates uncertainty which makes the investment chancy and risky and erodes investors' confidence. All the negative externalities arising from the political instability leave negative effects on the on investment in the private sector. It shakes the confidence of the investors so they hesitate to invest in the private sector of the economy.

[7] *"q" is market value of capital relative to replacement cost of capital.*

1.1.2 Political Instability in Pakistan

From the very first day and up to till know, beloved Pakistan is dealing with the political instability. For the purpose he has shown more concern in stability settings rather the development. The high illiteracy, poverty and unemployment, religious and ethnic tensions, terrorism, poor law and order, civil disturbances, external conflicts, democratic accountability and coup's played the greater role for malaise political instability. The lack of education and immature institutions are the two most contributing factors in the political instability in Pakistan. Likewise, there was no vision at all in the country for establishment and development of institutions. In the scenario there is not well developed and organized institution of leadership in the country. This institution was shortsighted, is not properly structured, always from top to bottom and hereditary means charismatic of family leadership, due to which Pakistan has been face a weak political environment (Aslam, et al.). A similar argument supporting to current our discussion is Grossman (1991) analysis of revolutions in which he stated that countries with a poor institutions have a weak and poor rulers. Here there is a high probability for political instability in the form of general strikes and revolutions. This phenomenon in the country leads it public towards unproductive and uncreative activities due to which economic activities in the country stop. In the sense PI hampers the economic development in the country.

Other contributing factor in unstable Pakistan is poor organization of democratic political parties i.e. domination of feudalists or families, absence of party elections, presence of interest groups and presence of ethnic attributes in the party. Furthermore, this weak and improper organization of political parties resulted into divide governments, which in turn extracts their all energy while maintenance of this coalition setup. One supporting evidence about this argument is saying that political history of the Pakistan have the dark image of democracy. History of Pakistan

is depicting about the game which is played in a country in a sense to weak democratic culture in order to strengthen the military powers (Aziz, 2001).

Political instability is most relevant to pluralistic societies which have a sensitive issues of language, sects, ethnicities and religion (Aziz, 2001). As in case of Pakistan it have a diverse variety of pluralistic attributes which remained threatening and alarming for beloved Pakistan for all the times. In this regard there is infinite importance of institutions and development of institutions in the country. In the sense the role of institution of leadership becomes more important than any other institution in Pakistan. It is the record that only those institutions survive and work for the prosperity and development which works impartial and unbiased. But when these institutions can be effected by religious fundamentalism and sectarianism or divided into provincial or sectarian level, than it further create the problems in the country rather than resolving them. In the sense country get weaker day by day, it loses its objectivity and this turns into identity and legitimacy crises which gains momentum and turns into political instability. Pakistan, India, Srilanka, Nigeria and Russia are good examples, in this regard. The nature of the federal crises depends largely on the rate, volume as well as the context of the regional demands, when the pressure of regional demands are carried to an extreme and do not get satisfactory response from the national system, then it may transform into a demand for separation (Samuel, 1971). Furthermore, regionalism is always potential source of danger which may ultimately undermine the federal system maintenance capacity (Lucian, 1971).

This phenomenon of political instability and its negative effects on the economy, has remained the topic of interest among the economists and political scientists in the world. In the way they have shown a huge interest to study and analyze it. Alesina and Perotti (1996), Siermann (1996), Campos and Nugent (1999), Zureiqat (2005), Younis et al. (2008), Qureshi et al. (2010),

Hashmi et al. (2013), Irshad Hira (2017) documented that political instability have a long lasting negative consequences on macroeconomic variables. In our country only few studies have investigated this relationship while it is documented that we have a regional and religious fundamentalism along with a pluralistic attributes under a geographic importance due to which we are dealing to it from our very first day.

1.2 Statement of Problem

Investment in any economy is the most important determinant of economic growth. In the way, economy of Pakistan is claiming a resurgence in investment because it is only ingredient for a sustainable recovery in its highly indebted developing sectors while political instability hampers this economic growth and is major constraint in the way of investment, for both short and long run periods and in both developing and developed economies. This political instability has raise the internal and external challenges for its state and society. It give rise to unproductive activities and slow down the productive market activities which puts investor's capital at stake and risk. Political instability always have a negative consequences for economic growth and development in the economies, Jong-A-Pin, (2009), therefore political risk in the any country is a crucial determinant of investor's investment decisions (Moosa, 2002).

So, political instability is unwanted situation which arises as a result of government failure in creation of stable settings for it peoples. Therefore, it needs to critically take measures to solute this problem because it limits the scope of vision and prosperity of nations. In this context we have the following research questions:

1. What are the factors that determine political instability in Pakistan?
2. What are the most detrimental economic and political determinants influencing domestic private investment in Pakistan?

3. What is the impact of political instability on domestic private investment in Pakistan?

1.3 Objectives of the Study

Private investment serves as only key in highly indebted developing economies for physical and human formation while political instability acts as major constraint in its way. Therefore, investment is most important determinant of economic growth and political stable environment acts as fundamental catalyst and process necessary to achieve this investment. In this regard, study have objective to investigate private sector investment economy (Pvt I) in Pakistan. For this objective study is exploring possible economic and political determinants. So, therefore this study have following objectives.

1. To construct the PI index to use vast set of quantitative political variables.
2. To analyze the relationship between domestic private investment and political instability.
3. To analyze the relationship between domestic private investment and control variables.
4. How a country that suffers from political instability for such a long time can create a stable settings for his private sector investors?

1.4 Hypothesis of the Study

1. PI does not explain the variations in domestic private investment in Pakistan.
2. PI negatively derives domestic private investment in Pakistan.

1.5 Significance of the study

Pakistan is a highly indebted developing economy with a tough challenges in realms of economics and politics, its prosperity is determined by both noneconomic and economic determinants. Literature in Pakistan is mainly composed of economic determinants while there is a limited discourse on non-economic factors as a possible determinant of investment. So this study aims to fill this gap in the literature by finding the political determinants of private investment because

prosperity and heath of society and economy is not largely but wholly solely dependent on the stability of the political system of the country.

It is documented that we have a regional and religious fundamentalism along with a pluralistic attributes under a geographic importance due to which we are dealing with political unstable system. While, on other hand we strongly need a resurgence in our investment for sustainable economic growth and development. Therefore, creation of stable settings will promote the economy on the way of prosperity. So, this study have a significance that it is adding literature in Investment discourse through finding its possible political and economic determinants. If there will be more comprehensive literature, more we will be able to create stable settings to encourage our private sector economy.

1.6 Outline of the study

We have organize our study in the following five chapters. Chapter 1 includes background and introduction of the study with the theoretical link between political instability and investment. Chapter 2 deals with the critical investigation of relevant literature. Chapter 3 outlines the empirical strategy by describing the model and data. Chapter 4 will deals with results and discussions while conclusion and recommendation are present in chapter 5.

Chapter 2

LITERATURE REVIEW

2.1 Introduction

Investment is the most important component of economic growth. Political stability is a necessary and sufficient condition for it. There are number of studies present in this regard, they are documenting the relation between PI and private investment on the basis of their estimated econometrical proofs. Now, this time in this regard we are estimating the relationship between political instability and private investment through critically reviewing a relevant important literature.

2.2 Theoretical Review

Pakistan has been the victim of political instability throughout all of its seventy three years of life. Political assassinations, involuntary dismissals, repeated premier and cabinet changes, and coups play the most role for unstable Pakistan and there is no doubt that this instability did not hamper Pakistan's policy designing both in internal and external arenas (Safdar, 2009). Moreover, Noor et al. (2017) stated that during last five decades Pakistan faced political turmoil, termination of elected government, imposition of dictatorial rule and confrontation between politicians, bureaucracy, military and judiciary. These events always remain the alarming for Pakistan and threat Pakistan nearly in all of its aspects. Therefore they strongly highlighted that Pakistan should need to work on political instable aspects in the country in order to move its economy on the way of economic prosperity and development. In year 2009, Hussain also notified that Pakistan faced negative trend in mid and late seventies' in economic performance because of severe financial disturbance and human capital imbalances which is the result of political instability that originated

in the result of 1971. Hilali (2010) addressed the same issue by giving the example of soviet irruption over Afghanistan. He is theorizing that year 1979 is year of tension and unforgotten source of political instability for Pakistan. The reason behind this is Pakistan role in this time period, he was also an important player in this war, he helps and assist them which in turn created security challenges for Pakistan by creating socio-politico, economic and ecological problems. Unfortunately these infections in Pakistan were more due to the neighbor-hood relation, while it infects all the world through effecting and turning international politics.

Qureshi et al. (2010) revealed that political instability hinders the Pakistani economy in many dimensions due to the fact policy making arena in the country is short sighted. He compose his PI in to the index which consist of seven variables i.e. General Strikes, Demonstration, Riots, Government longevity, Government change, War and Regime type). He stated that frequent changes in governments mostly due to irregular type of change in the country causes PI and these development patterns in the Pakistan are highly volatile due to this political instability that spans almost over the half history of the country. Later on, Ali, Hashmi and Hassan (2013) examined a detail investigation on political instability in Pakistan. For the purpose they constructed a PI index based on 37 years annual numerical figures on regime type, governmental change, riots, general strikes, assassinations, demonstrations and government longevity. Study is documenting that in this time period in Pakistan these important indicators of PI has seriously hampered its private sector investment as a result Pakistan loses its growth of economy. Study also strongly stress on the development on institutions especially on the financial institutions to encourage the economic growth. Moreover, Tabassam et al. (2016) proxied PI to elections, regime, terrorism and strikes and take them as dummy for Pakistan. He documented that that terrorism and strikes have adverse and long lasting impacts on economic growth. The logic behind the concept is that terrorism and

strikes leads to market failure which passes a bad signal to investors that they are putting their investments at stake and risk, in the way investment activities in the country hampered, leads to capital flight and resulted into fall in real income in the country. Implications of the study recommended that it should need to take a serious note to bring the political stability for the smooth economy. Investors and financial institutions have need to do extensive homework while taking the decisions. Later on, Irshad Hira (2017) comprehensively analyze the political instability in Pakistan and constructed PI index to drive its impact on stock market returns. Index in the study is based on government longevity, general strikes, riots, assassinations, government change and demonstrations. Author after the long justified estimations come at the conclusion that this index of PI derive the strong negative impacts on stock market index.

According to Rabbia and Dawood (2017) social imbalances and general strikes have a negative impact on investment in Pakistan, due to which investors hesitate to invest. Therefore, 2014 sit in protests in Islamabad clearly created an environment of uncertainty that resulted in shying of key investments which hinders the productivity, resulted in fall of total output and discourages economic development in the economy. Asteriou & price (2001) have been defined the negative consequences of political instability upon economic growth. They revealed that on the one hand, political instability is the unstable political environment which leads to uncertainty and volatilities in the economy due to which investors losses their confidence of investment that leads to fall in production and income level in the economy. Other side is more sensitive and it have more severe negative results for an economy because this political uncertainty effects the nature of investment on the other side by discouraging the factors demand use in production process. This uncertainty also negatively effects the spending patterns in an economy. So, therefore political instability have negative impact on economic growth throughout the globe.

Likewise Asia, Africa, Europe, America and Middle East are victims of political instability. PI effects the productivity and national income in these countries and slow down the economic performances and hampers the economic growth. 17 Years for the period 1985-2002, is evidencing such impact, derive on economic growth in these regions, according to Zureiqat, (2005). His PI was proxied to Polity II democratization score while economic performance was proxied to GDP. Gul et al (2010) work on the financial markets in Pakistan by finding the impact of terrorism on them. For the purpose she divide the terrorism into four distinct dummy variables that define the terrorist activities in Pakistan while financial markets are the Karachi Stock Exchange, the FOREX market and interbank market. Her study notify that terrorism derives the significant negative impact on financial markets in Pakistan. This terrorism effects the economy and its financial institutions while financial institutions are the intermediaries that make possible the availability of credit to enhance the productive capacity in the economy. It take the surplus and covers the deficit, by increasing the income level in the economy.

According to Beck, Demirgüç-Kunt and Levine, 2007 financial development have a large impacts on poverty reduction and income generation in the economy. 40percent of his objective is regarding poverty alleviation and remaining 60 percent of its objective of economic growth. Rajan and Zingales, (1998; 2003) considers financial market development a sound source of governing entrepreneurs and companies for getting high return on investment. A well-developed financial system provides a developed settings for high return through efficient information system by identifying and creating an investment opportunities in the economy. This development of physical and human capital have a long lasting significant positive impacts on economic growth (Creane, et al. 2004). According to Akkina and Celebi (1992), financial markets provide essential credits to investors, if unavailable will negatively affect the environment for PVT Investment.

F. Azeng & Thierry U. Yogo (2013) investigate the determinants of PI and obtain a significant econometrical proof that youth unemployment causes political instability in different five regions of the world from the period 1980-2010. Study found this significant association in 24 developing countries. Paper revealed that increasing rate of youth unemployment in the country increases the risk of political instability in the countries which leads the country towards the armed conflicts. It actually happens due to the association of other factors associated with youth unemployment like inequalities and national security issues. Paper recommended that creating employment opportunities for youth can bring the political stable environment in the country, and through these stable settings economic health of the country significantly improves and it moves on the way of growth and development. Alisena, Ozler, Roubini & Swgel (1992) declares uncertainty hazardous for economy and it sectors. Political instability creates this uncertainty in the economy due to which government policies become uncertain. When government becomes uncertain then it passes the negative signal to the investors of putting their investment at stake and risk, in the moment they flight their capital to certain environments. Later on, in the year 1996 Alesina and Perotti socio-economic inequalities result into political instability and they found that more unequal states are more political unstable. Brunetti & Weder (1997) revealed that political variables like lack of rule of law and high corruption are the most influencing political variables that influence the private investment and on the economic side it is real exchange rate distortions which influence the investment most. In the recommendation section, studies recommended that these are the institutions and their quality that provides a stable economic environment, so economy can only work on sustainable way if the uncertainty from institutions can be reduced. Later on, Barro (2013) also stresses on development of political institutions for stable political culture. According to this study the stable culture is the outcome of persistent and consistent

democracy and this democracy achieves the prosperity for the country. So in this regard this study also have the serious implications for the establishment of institutions for economic prosperity of state and its general audience. In the way Aisen and Veiga, (2013) did their empirically study for 5-year periods from 1960 to 2004 for 169 countries. The facts and figures in these samples are defining the negative and significant impact of unstable political environment on health of economy. Interestingly GDP is find as a determinant of PI in this paper, as paper finds that PI originates due to less per capita income or GDP, this short productivity results into smaller real capital formation. Study also derives the positive impact of freedom and ethnic homogeneity on the economic activities in the economy.

Different aggregate investments in different countries and different regions are differentiate by political variables, Kisunko and Weder (1997). Corruption, reliability on the judiciary and government instability are very important and they have an influences on these differences.

2.3 Empirical Literature

Economists have long believed that political instability badly affects the level of investment thus reducing productivity, rising inflation and increasing the level of unemployment to unprecedented levels. All of this results in slowed down economic activity. A data of 25 developing economies for 21 years was analyzed by Le (2004) where he identified political and economic determinants of private investment. The study found that peaceful demonstrations have a positive impact on investment while the aggressive one's have negative impact. The socio-political instability is caused by illegitimate change in government which discourages investors to invest in private sector. Campos and Nugent (2003) investigated the relation between aggregate investment and political instability by using Granger Causality technique in 94 developing countries over the

period of 1960 to 1995. Results indicated that there is a causal relation going from political instability to investment but interestingly the relation found by the study is positive in low income countries. Hadhek and Karim (2012) aimed to investigate the relation between PI and private investment by exploring eleven countries. Their empirical tests are defining the negative consequences due to PI on private investors.

Munnell (1992) defined that capital invested by public in an economy have a significant role on its development. According to him, public investment on capital creates the opportunities for private sector, as a result private capital establishes in to the economy, which significantly contributes to income as a result more investment opportunities emerge. Oshikoya (1994) revealed that public investment and real GDP growth has a direct relationship with private domestic investment in both income categories. He further added that debt ratio and finance availability have also a positive impact on private investment. Later on, Looney and Frederiken (1995) concluded that government investment in non-manufacturing activities can crowding while government investment in infrastructure can have a crowding in impact on private investment. But Aizenman and Marion (1996) have shown that in cases where high uncertainty leads to a decline in private investment, public investment often increases in compensation Furthermore, Looney et al (1997) revealed that infrastructural investment by government encourages the investment and growth of large scale manufacturing sector in Pakistan. Moreover Naqvi (2003) found positive while Ghani and Din (2006) found negative, though insignificant, impact on output in the economy. Political instability is the chief factor that determine the private sector investment in Pakistan. Actually PI and political uncertainty derives the negative impact on economic health of Pakistan through discouraging investment or capital accumulation in the economy, Bhatti et al. (2008) while Tariq and Saniya (2008) research the macro-economic determinants for private

investment for the period 1970-2006. Bank credit positive impact and interest rate negative impact was found on private investment in Pakistan.

Instabilities originates as a result of inequalities. It effects the health of economy which results in fall of investment, Alesina and Perotti (1996). Later on, Brunetti & Welder (1997) investigated the 21 uncertainty variables to draw the inferences about their impact on investment. Study actually deals with the sixty developing economies of the world, for a period 1974-1989 by considering most frequently used institutional uncertainty measures that affect the investment rates in developing countries. Their empirical evidences shows a negative relationship between most of the aspects of institutional uncertainty and investment. Finally, they concluded that lack of rule of law, high corruption and volatility in real exchange rate distortions are the most detrimental for investment.

Rani and Batool (2016) constructed ARDL model for short and long run analysis in Pakistan for the period 1980 to 2013. The reason behind this modeling is to estimate the following research questions. Firstly to determine the relationship between PI and economic development and second is the determination of relationship between FDI and economic development. After regressing the above model it is concluded that political instability does not explain the variation in economic growth in short run while it significantly explain the negative variations in economic growth in long run . On the other hand FDI was found significant in both periods. They stresses that Pakistan should improve its institutional quality to get the good governance in order to handle the multidimensional political situations in the country. Economic growth is the strongest driver of PI and FDI. So political instability in the country can encounter through economic growth in the country, creation of economic activities to enhance the productivity can increase the output per worker which will move the country towards stability. Economic growth determines PI in both

short and long period of times and is an appropriate way to control and diminish it. While less income or output can mobilize it, so therefore, economic growth positively effects the health of the country, justified by Nazeer and Mansoor (2017) by getting the 30 years facts from Malaysia.

Similarly, Noor & Awan, (2017) in their panel study analyzed through SPSS software, contributing a political instability literature. They use Multiple Regression, ANOVA and Correlation techniques for analysis of data. For this purpose, they selected three variables such as political instability, inflation rate and public debt to measure their impact on Gross Domestic Product (GDP), their results are indicating that public debt on the shoulders of an economy negatively behaves with economic performance in the country. Similarly, same is about PI and Public debt. Furthermore, (Monadjemi and Huh, 1998) found the crowding out impact of public investment in United States, Australia and England. Dimitraki. O, (2011) testify the following hypothesis that to what extent do political regimes and their stability effects economic performance with reference to 20 western European countries. Growth rate of GDP is observe as a dependent variable of the model while political instability as a violent and non-violent scenario's. Fifty four years data for period 1950-2004 shows the trend of negative on national per capita income (NPCI) in 20 European countries, played by democratic regimes. Section of implications rely on the measures that should be taken to overcome the uncertainty from the economic and political market for the improvement and development of economic health. It is also notify in the paper that government have to reduce its consumption expenditures, for the same purpose. Serven (1996), determines the determinants of instability. So in this regard, study investigated AFRICA. African countries have a clear evidences of significant negative associations between investment and terms of trade variability, black market premium variability, real exchange rate variability, and restrictions on civil liberties. Haussmann and Gavin (1996) present similar results for Latin

American countries. For their sample, they report a negative association between index of macroeconomic volatility composed of real GDP volatility and the variability of the real exchange rate and the aggregate investment rate. Serven (1997) also found the significant positive correlation between civil liberties and private investment by using Gastil index of civil liberties.

2.4 Role and Importance of Institutions

Adam Smith proposed an idea of importance of institutions in the prosperity of labors and nations, therefore in 1776 he laid the foundation by accepting the role and importance of institutions in the economic growth and development, for the prosperity of it workers. According to him difference between different countries in due to institutional factors. Later on, North get inspired by this approach and vision and starting contributing in this discourse. In 1992 he describe the importance of institutions and called them source of presenting the characteristics of economic change and remedy for the efficiency and development of the economies. According to North, these are the institutions which suggest some clues due to which it become possible for the countries to transform their ailing and poor economies into successful economies. It means that importance of institutions can un-avoidable because they have a significant impact on economic growth.

In 2005, Acemoglu and Johnson arrives at the conclusion that economic growth in the nations is correlated to or proportional to legal institutions in that nations. Law and order and enforcement of property rights create the stable settings which resulted in creation of productive economic opportunities. Actually these institutions have indirect relation through the channel of financial intermediation on economic growth. Previously in the year 2000, Sir Rodrik, also approved this logic by criticizing those kind of production function which have a deficiency of enforcement and efficient property rights, he declared them as irrelevant and inappropriate production functions, resulted in mis allocation of resources and poor economies. Rodrik

elaborated that there is a difference of institutional factor between poor economies and good economies, so therefore he further emphasis on the importance of institutions, label them mandatory for state welfare. Later on, Shirley in 2008 stresses to much importance on institutions and that institutional structure considers protection of property rights, enforce contracts and provide a better environment where a culture can grow in term of human capital, good education and better demarcated civilization. Acemoglu give importance to political institutions because of their role to put economic institutions under their preferences, due to which the resources in the economy from the public can shift to them. This result in consolidating power, factor price manipulation and revenue extraction. Later on, Alfonso and Jalles in 2011 in their empirical framework find the significant positive impact of institutional quality on economic growth or real GDP per capita in the economies. So, therefore political institutions can promote economic development from these three channels. Firstly, it enhances productivity in the economy, secondly it promotes capital accumulation in economy and third it works on the development of economic institutions.

Acemoglu et al in 2008 have observed the evolution of institutions in a history under the influence of colonization experience. He argues that the countries which have a weak and inconsistent institutions have a have a past of colonization, due to which they are incompetent to formulate the economic comprehensive policies. Due to the reason they do not have the approach to the technology and innovation, that is why they remain poor. For the productive economic policies, it is a necessary need of stable social and political settings, which can only be possible due to improved institutions. Institutions are the bodies which acts as a basic catalyst and enzymes in the true development and prosperity of the nations. Institutions protect the rights of the governments and their public which resulted in optimal and sufficient allocation of their resources

due to which investment opportunities in the country rises, which in result increases the productivity level which enhances the higher income level and sustainable economic growth.

Chapter 3

RESEARCH METHODOLOGY AND DATA DESCRIPTION

This chapter is dealing with methodology and data. For the purpose framework in theoretical perspectives in regard to econometric model has been carried out. In the way respective variables in the study have constructed and research strategy is given.

3.1 Theoretical Framework

Security and enforcement of private property rights determines the needed incentive structure for investment decision making (North, 1981). When private property rights are secured and enforced, more investment opportunities will be open as the confidence of investors upon the institutions have gone up. However the security and enforcement of private property is not guaranteed when the political environment is unstable. Feng, 2001 stated that freedom or protection in the country creates the investment opportunities through establishing and improving human capital while PI and political uncertainty negatively effects Pvt I.

Stable political and economic institutions are crucial in reducing uncertainties around and provides opportunities to enhance supportive environment for investors. For instance, protection of property rights is considered to be stable economic institutions which promotes creativity and enhance entrepreneurship on one hand and on the other hand it build the required confidence for investors to invest more. As, Rani and Batool (2016) stated that in any country political stability is required for development of investment and development of economies. According to Ang (2009) private investment is the major channel in the developing economies through which long term sustainable economic growth can be achieved. It is actually a special case in developing countries, because here the public sector has the limited vision, so here is the space for private sector to develop and generate the development. Secondly, literature is depicting that private

investment have more importance in the economies rather than public investment. For instance, Oshikoya 1994 and Naqvi, 2002 have shown that private investment instead of public investment has more to say in explaining income disparities in developing countries. Various other researchers for instance, (Abbas, 2003; Atukeren, 2005) have enlisted the factors that contributes to Pvt I in developing economies. On the basis of past studies Pvt I is affected by various political and economic factors. The major economic factors are domestic output, interest rate, credit facilities, level of debt, the exchange rate, interest rate and macroeconomic stability (Solimano, 1992). As far as non-economic factors are concerned, uncertainties in both economic and political markets promotes instability and reduces investment opportunities.

Private investment will be our more concerned variable and our measure for private investment is "Gross fixed capital formation in private sector" (% of GDP) in Pakistan. Since literature provides a number variables that can affect investment but in this paper our main focus will be on the explanatory power of unstable political environment that creates instability in political market. So in this regard, we will measure political instability through an index and this index will be construct through Principal component analysis. Our index will be composed of following political instability variables i.e. Government stability, Democratic accountability, Military in politics, Ethnic tensions, Religious tensions and Law and order in the country.

Again, it is not just the political environment that can affect private investment rather literature presented various other explanatory factors crucial for private investment. For instance, the role of financial market cannot be avoided because it provides the required basis for capital that have to be invested. We will measure financial market development through "Domestic Credit to Private Sector" (% of GDP). If credit facilities are easy and affordable then more avenues for

private investment will be open and increase opportunities for investors. Investment also varies across countries and depends on overall macroeconomic condition of the economy.

3.2 Specification of the Model

Study has construct time series model in order to analyze the long run relation between given defined variables. In economic theory, time series analysis often conducted in order to find the long run relationships and mean and variances of variables change and depends on time.

In the absence of constant mean and variances we will not be able to run regression analysis. There are many other techniques like Engleand Granger (1987), Johansan-Juselius (1990) test, Philips and Hansen's (1990) and maximum likelihood based Johansen to identify these relations, but these techniques have some problems, if they are apply on a small samples or on data series which is integrated on order other than I(1), so findings will be unreliable and problematic. So these techniques are low powered as compared to ARDL. As a result we are using Autoregressive Distributed Lag (ARDL) co-integration technique. It is also independent of endogeneity of the independent variables. According to Pesaran and Shin (1999) and Pesaran et al. (2001), ARDL cointegration technique can also be used on non-stationary time series and it have also good feathers of deriving long run information. Means it integrates short run dynamics with long run equilibrium and recovers information's that was lost due to differencing. So, this study will explore the long run relation and short-run dynamics of domestic private investment with political instability, financial market development, public investment, domestic real interest rate, public debt, and real exchange rate by using the ARDL model.

Therefore, our model is

$$\Delta PVT\ I_t = \alpha + \beta_i \sum_{i=1}^{p} \Delta PVT\ I_{t-i} + \gamma_i \sum_{i=0}^{p} \Delta PI_{t-i} + \delta_i \sum_{i=0}^{p} \Delta FMD_{t-i} + \theta_i \sum_{i=0}^{p} \Delta IR_{t-i} + \vartheta_i \sum_{i=0}^{p} \Delta PD_{t-i} + \pi_i \sum_{i=0}^{p} \Delta PUB\ I_{t-i} + \rho_i \sum_{i=0}^{p} \Delta RE_{t-i} + \varepsilon_t$$

In the above model to the left of the equality sign, it is our dependent variable i.e. Gross Domestic Private Investment while the right side of equality sign is dealing with independent variables. PI is political instability, it is an index composed of six political components i.e. government stability, law and order, democratic accountability, military in politics, ethnic tensions and religious tensions. Other variables are economic control variables i.e. FMD presenting Financial Market Development, R.I for domestic real interest rate, PD for public debt level and Pub I for public spending or public investment, R.E for real exchange rate and finally the error term.

3.2.1 Justification of the Technique

This study is adopting autoregressive distributed lag (ARDL) framework also known as bounds testing approach suggested by Pesaran and Shin (1995, 1999), Pesaran et al. (1996) and Pesaran (1997). The purpose of adopting this approach is to establish cointegration relationship between given mention variables. In the way direction of causation between variables because it is a good methodology to generate estimates of long run coefficients. There are several reasons to select this method.

- First, it can fulfill our objectives to find the correlation between the variables.
- Second, it can be applied irrespective of whether the underlying repressor's are I (1), I (0) or fractional integrated.
- Third, it is a more statistically significant approach for determining cointegration relationships in small samples.
- Fourth, the model takes a sufficient number of lags to capture the data generating process in general to specific modeling frameworks (Laurence son & Chai, 2003), as Pesaran and Shin (1999) demonstrate, the appropriate lags in the ARDL model are corrected for both

serial correlation and endogeneity problems. So, further advantage of using Autoregressive Distributed Lag technique is that this technique be careful for endogeneity of the independent variables.

- Fifth, the error correction model (ECM) can be derived from ARDL through a simple linear transformation, which integrates short run adjustments with long run equilibrium without losing long run information.

Lag dependency (i.e. t-i) is showing that variables are determine by previous or lag values, the reason behind this is that in economics, variables are determined by their previous values or lag variables. As the autoregressive nature of ARDL is presenting this dependency on previous period, obviously there is always a previous year effect of quantitative variables in Economics and it is also due to unavailability of full information, due to the these reasons variables depend on their lag values. This is why dependent variable in the study depends on it lag value.

3.3 Data, Variables and Sources

This study will be based on time series data in case of Pakistan for the period 1984 to 2016. Study is using dependent variable i.e. private investment which will be taken from World Development Indicators (WDI). Firstly, study have the objective to find the impact of political instability on private investment. To find the impact of political instability we are taking data on political variables from International Country Risk Guide (ICRG) published by the Political Risk Services (PRS) group. So we are using economic and political variables in our study. These variables, their time period and data sources are given in table 1. We will construct political instability index through Principal Component Analysis (PCA) and this will consist on six political indicators, these indicators along with their definitions are present in table 2. Economic variables in the model are independent control variables and we are taking them from world development indicators (WDI)

for the specified periods. These variables are present in table 3, along with their respective definitions.

Table 1 Variables, Time Period and Sources

S No	Variables	Abbreviations	Time Period	Data Source
1	Private Investment	Pvt I	1980-2016	WDI
2	Government Stability	GS	1980-2016	ICRG
3	Religious Tensions	RT	1980-2016	ICRG
4	Law and Order	L&O	1980-2016	ICRG
5	Ethnic Tensions	ET	1980-2016	ICRG
6	Democratic Accountability	DA	1980-2016	ICRG
7	Military in Politics	MP	1980-2016	ICRG
8	Financial Market Development	FMD	1980-2016	WDI
9	Public Investment	Pub I	1980-2016	WDI
10	Public Debt	PD	1980-2016	WDI
11	Real Interest Rate	IR	1980-2016	WDI
12	Real Effective Exchange Rate	REER	1980-2016	WDI

3.4 Construction of Variables

Our section of construction of variables is composed of dependent variable, independent variable and control variables.

3.4.1 Dependent Variable

Since Private investment is our dependent variable therefore we have selected **"**Gross fixed capital formation in private sector (% of GDP)" as our measure for private investment. GFC in private sector (% of GDP) can be defined as 'Private investment covers gross outlays by the private sector including private nonprofit agencies on additions to its fixed domestic assets', (WDI).

3.4.2 Independent Variables

Private investment is determined by both political and economic variables. Due the reason we employ political variables as our concerned variables while economic variables as control variables in the study. So for the purpose we are taking political variables and constructing them into single index to define political instability.

3.4.3 Political Instability (PI)

For Political instability as our independent variable, we will measure it through an index and this index will be construct through Principal component analysis. As, Alesina and Perotti (1996), Campos and Nugent (1999), Zureiqat (2005), Younis et al. (2008), Qureshi et al. (2010), Hashmi et al. (2013) constructed the same techniques in their paper, but their indicators are different, depends on their suitability. Our index will be composed of following political instability variables in the political instability index equation.

PI = government stability + religious tensions + law and order + ethnic tensions + democratic accountability + military in politics.

$$PI = GS + RT + L\&O + ET + DA + MP$$

These political variables are taken from the international country risk guide (ICRG) data set.

3.4.4 Control Variables

There are basically two sort of justification for the inclusion of control factors in econometric model. Primarily, control factors are a safeguard against omitted bias. If we do not include all potential factors that can contribute to private investment then the econometric problem of omitted bias will disturb our results. Secondly, for sensitivity analysis we usually control for a number of potential factors. For instance, results drawn on the basis of simple linear regression would allow us to claim that political instability affect private investment however the relation will be only sensitive when we allow to control for possible potential factors. Following are the control variables for private investment.

3.4.4.1 Financial Market Development (FMD)

Growth in private investment depends on the level of development in financial market. Financial markets provide essential credits to investors if unavailable will negatively affect the environment for private investment. For instance, Akkina and Celebi (1992) have highlighted the role played by financial market development in the growth of private investment. We will use Domestic Credits to Private Sector (% of GDP) as our measure for financial market development. We would expect a positive coefficient for Domestic Credits to Private Sector (% of GDP), Majeed and khan (2008).

3.4.4.2 Public Investment (PUB I)

Public investment have a crowding effects on Pvt I both in the developing and developed economies. This crowding effect is classify into crowd in and crowd out effects. Crowd in indicates that Pvt I in the economy can increase due the expenditures incurred by government i.e. expenditures done by government on infrastructural projects and crowd out indicates the Pvt I in

the economy decreases due the expenditures done by the government, i.e. expenditures done by the governments on non-infrastructural projects.

A good thing about the public investment is that it comprises infrastructural package that comprises technology, innovative capital, research and development and quick market access with an external economies, hence these public expenditures crowding in the Pvt I (Aschauer 1989, kneller et al.1999). An example of crowing out effect of public investment on private investment are government expenditures on its inefficient enterprises like subsidization. Similarly it is government non-productive expenditures when it spends on the salaries of its employees and it also crowd out the private investment from the economy. Expenditures on socio economic conditions, human resource development, R&D that led to new innovations and inventions increases private investment. Investment on provision of public goods also create positive externalities.

Our measure for public investment is General government final consumption expenditure (formerly general government consumption) includes all government current expenditures for purchases of goods and services (including compensation of employees). It also includes most expenditures on national defense and security, but excludes government military expenditures that are part of government capital formation. Considering McKinnon and Shaw, (1973) hypothesis we would expect either positive or negative coefficient for social infrastructure.

3.4.4.3 Public Debt

Total debt services will be our measure for public debt level. We are measuring the public debt as "Debt service on external debt, total (TDS, current US$)". In the face of higher debt payments opportunities for private investment will be low because the required capital has gone for other purposes. For instance, (Everhart and Sumlinski, 2001) have shown that higher public debt are

associated with low private investment. Therefore, we would expect a negative coefficient for total debt services in relation with private investment.

3.4.4.4 Domestic Real Interest Rate

The most needed instruments for investment is capital and the cost of that capital is usually termed as interest rate. Real interest rate can be defined as 'is the lending interest rate adjusted for inflation as measured by the GDP deflator. Pvt I is negatively affected by IR, for instance, (Mataya and Veemon, 1996) have found negative relationship between private investment and real interest rate. So in this regard economists like Mehrara and Karsalari (2011) stated that developing economies must keep their interest rate low in order to promote private investment. Therefore we would expect a negative coefficient for domestic real interest rate in relation with private investment.

3.4.4.5 Real Exchange Rate

Prices of imports depends on the value of currency thus fluctuation in the real cost of imported goods can fluctuate the profitability of private sector. We are measuring it by REER index and it effects Pvt I in this way by shaking the cost associated with imported goods. For instance, Dhaneshwar Ghura, et al (2000) have enlisted real exchange rate as have explanatory power in relation with private investment.

3.5 Research Strategy

The research strategy for this analysis is such that we will construct our main concerned independent variable i.e. political instability in relation with private investment which is our dependent variable. We will construct it through principal component analysis and this index will be composed of six political variables. Then, in specifications we will focus on the explanatory power of political instability in explaining private investment after controlling for a bunch of potential factors. So, our strategy for time series ARDL will be depend on following steps. In the

first step, the integration levels (stationary test) of variables will detect through Ducky Fuller (DF) or Augmented Ducky Fuller test (ADF) that are the most popularly used for this purpose. Than the Co-integration test will be performed using the Bounds F-Statistics test, once a long-run relationship has been established, a two-step procedure will be used in estimating the long run relationship based on the autoregressive distributed lag (ARDL) approach of (Pesaran and Shin, 1999).

Table 2 Political Instability Index

Variables	Definitions
Government Stability	A measure of both of the government's ability to carry out its declared program(s), and its ability to stay in office. The risk rating assigned is the sum of three subcomponents: Government Unity, Legislative Strength, and Popular Support. Refer to ICRG Methodology for maximum points for this variable, as well as for related formulas for calculating risk.)
Law & Order	Two measures comprising one risk component. Each sub-component equals half of the total. The "law" sub-component assesses the strength and impartiality of the legal system, and the "order" sub-component assesses popular observance of the law. (Refer to ICRG Methodology for maximum points for this variable, as well as for related formulas for calculating risk.)
Democratic accountability	A measure of, not just whether there are free and fair elections, but how responsive government is to its peoples. The less responsive it is the more likely it will fall. Even democratic elected governments can deluded themselves into the thinking that what is in interest of peoples. Regardless of clear indications to the contrary of peoples.
Military in Politics	A measure of the military's involvement in politics. Since the military is not elected, involvement, even at a peripheral level, diminishes democratic accountability. Military involvement might stem from an external or internal threat, be symptomatic of underlying difficulties, or be a full-scale military takeover. Over the long term, a system of military government will almost certainly diminish effective governmental functioning, become corrupt, and create an uneasy environment for foreign businesses. (Refer to ICRG Methodology for maximum points for this variable, as well as for related formulas for calculating risk.
Ethnic Tensions	A measure of the degree of tension attributable to racial, national, or language divisions. Lower ratings (higher risk) are given to countries where tensions are high because opposing groups are intolerant and unwilling to compromise. (Refer to ICRG Methodology for maximum points for this variable, as well as for related formulas for calculating risk.)
Religious Tensions	A measure of religious tensions arising from the domination of society and/or governance by a single religious group -- or a desire to dominate -- in a way that replaces civil law by religious law, excludes other religions from the political/social processes, suppresses religious freedom or expressions of religious identity. The risks involved range from inexperienced people imposing inappropriate policies to civil dissent or civil war. (Refer to ICRG Methodology for maximum points for this variable, as well as for related formulas for calculating risk.)

Table 3 Variables, Descriptions & Data Sources

Variables	Description	Data source
DEPENDENT VARIABLE		
Private Investment	Gross fixed capital formation, private sector (% of GDP) Private investment covers gross outlays by the private sector (including private nonprofit agencies) on additions to its fixed domestic assets).	WDI
INDEPENDENT VARIABLES		
Political Instability	Index made up of government stability, law & order, democratic accountability, military in politics, ethnic tensions and religious tensions.	ICRG
Financial-Market Development (control variable)	Domestic Credits to Private Sector (% of GDP), Available at World Bank indicators	WDI
Public investment (control variable)	General government final consumption expenditure (formerly general government consumption) includes all government current expenditures for purchases of goods and services (including compensation of employees). It also includes most expenditures on national defense and security, but excludes government military expenditures that are part of government capital formation	WDI
Public Debt (control variable)	Debt service on external debt, total (TDS, current US$)	WDI
Real exchange rate (control variable)	Real effective exchange rate index, Available at World Bank indicators	WDI
Real interest rate (control variable)	Real interest rate can be defined as 'is the lending interest rate adjusted for inflation as measured by the GDP deflator., Available at World Bank indicators	WDI

Chapter 4

RESULTS AND DISCUSSIONS

This chapter is all about empirical estimations to find the econometrical proof of the private investment model. So, it provides result and interpretation of results. In this regard it deals with descriptive statistics, principal component analysis, unit root analysis, bounds tests, autoregressive distributive lag (ARDL) estimations and diagnostic tests.

4.1 Descriptive Statistics

Descriptive statistics[8] for Pakistan for the yearly time period 1984 to 2016 are present below in table 4.

Table 4 Descriptive Results

	Pvt I	PI	FMD	Pub I	PD	REER	IR
Mean	9.886233	-2.42E-08	23.56093	11.31556	2.12E+09	115.5806	8.528628
Median	9.838027	-0.52187	24.21806	11.00312	1.94E+09	109.9805	8.570833
Maximum	13.50028	2.688247	29.78608	16.78491	6.09E+09	204.5528	12.47198
Minimum	7.481148	-2.37715	15.38607	7.780805	6.95E+08	93.38561	2.139167
Std. Dev.	1.620025	1.473062	4.059276	2.194006	1.12E+09	25.78336	2.603795
Skewness	0.494328	0.420697	-0.6373	0.49456	1.538245	2.123752	-0.42939
Kurtosis	2.710582	1.990034	2.565407	2.921847	5.919949	7.328002	2.900569
Probability	0.482113	0.304835	0.287433	0.50823	0.000004	0	0.598205
Observations	33	33	33	33	33	33	33

[8] Descriptive statistics are the statistical outcomes in the form of mean and standard deviation.

Table 4 is presenting the descriptive statistics of variables in the study for the period 1984-2016. It is presenting the behavior of gross domestic private investment in Pakistan. General trend of change is presenting in the form of mean and standard deviation etc. Mean value in the table is suggesting the average behavior while standard deviation is the indication of dispersion of results from mean value. The maximum and minimum value narrates the span of change i.e. upper and lower limit. Skewness is measure of symmetry while kurtosis deals that data is whether high/light tailed relative to normal distribution. Jarque-Bera deals with test of goodness of fit that whether Skewness and kurtosis in data series is presenting the normal distribution.

Mean of private investment is 9.88 which is indicating that gross fixed capital formation remained 9.88percent at average from the 1984 to 2016 in Pakistan. Its maximum value is 13.50 which was in a year 2006 during President Musharraf's military regime while it is minimum at 7.48 which was in year 1984 again in military regime of Zia ul Haq and the standard deviation is 1.62. Column 2 in the table 4 is presenting the political instability. Which has average of Minus 2.42. It was remained maximum in 2000, showing that political instability in Pakistan has remained ta top during military regime of while its minimum value is -2.37 in the year 1990 and in this period democratic regime was governing the Pakistan.

Financial market development averagely remained at 23.56percent from 1984 to 2016 in Pakistan, it was maximum in 1986 and minimum in 2015. Similarly public investment was on average of 11.31 this time period, it remained maximum in 1989 and minimum in 2001. In the way Public debt at average is 2.12, real effective exchange rate is 109.98 and interest rate have an average of 8.57 during this period.

4.2 Principal Component Analysis

This study is employing political instability index which is developed through principal component analysis to investigate its impact on private investment. Political instability index is proxied to government stability, law and order, religious tensions, ethnic tensions, military in politics and democratic accountability.

Due to a large number of variables it is the larger probability of correlation of variables with each other, which will obviously and necessarily challenge the reliability of the model. In this way, we are using principal component analysis to generate index of these variables in order to avoid multicollinearity and simpler presentation of our data series. In this regard principal component analysis will check the variation in the data. This variation will be calculated through the Eigen values and Eigen vectors while linear combination of variables is taken. So in this regard, we are presenting herby two tables below, for the reasonable discussion on the matter. Correlation between given variables is given in table 5 while table 6 is dealing with contribution of each component into index.

Table 5 Correlation Matrix

	GS	RT	L&O	ET	DA	MP
Component 1	1.0000					
Component 2	-0.2150	1.0000				
Component 3	0.5772	-0.2235	1.0000			
Component 4	0.7156	0.0622	0.3559	1.0000		
Component 5	-0.1520	0.0758	0.3573	-0.0672	1.0000	
Component 6	-0.1437	0.0493	0.4271	-0.4112	0.6510	1.0000

Above, Table 4 is correlation matrix of dependent and independent variables. The values present in the table are correlation values and they are presenting the strength of correlation among variables in the study. The diagonal matrix values show the correlation of the variable with itself while non-diagonal values shows the relationship with each other. The association between GS and religious tensions is negative while the association between GS and L&O is positive. The results indicates L&O, E T and GS are highly correlated while MP, RT and DA negatively correlated with government stability.

Therefore we can conclude that through converting the variables into one component can replace all the variables to see the entire impact on single variable, we have avoid the multicollinearity problem and know we have more simpler presentation of our data.

Table 6: Principal Component Analysis

Component	Eigenvalue	Difference	Proportion	Cumulative
GS	2.16991	.182708	0.3617	0.3617
RT	1.9872	.92802	0.3312	0.6929
L&O	1.05918	.576887	0.1765	0.8694
ET	.482297	.279464	0.0804	0.9498
DA	.202833	.104262	0.0338	0.9836
MP	.0985709	.	0.0164	1.0000

Eigen values in the column 2 of table 5 are showing the same direction or trend from 2.16991 to .0985709 which is evidencing that PCA is accurate and justified. So, our political instability index equation is

$$PI = GS + RT + L\&O + ET + DA + MP$$

$$PI = 0.36 + 0.33 + 0.17 + 0.08 + 0.03 + 0.01$$

Where,

GS= Government Stability

RT= Religious Tensions

L&O= Law and Order

ET= Ethnic Tensions

DA= Democratic Accountability

MP= Military In Politics

On the basis of above mentioned equation political instability is calculated. From the given these results obtained from principal component analysis (PCA) it is derived proportion of each variable in the index. Government Stability have maximum share of 36% followed by Religious Tensions (i.e.33percent) and Military in Politics has lowest contribution.

4.3 Unit Root Test

Data series is stationary means mean or variance of the given series is constant and a non-stationary of series mean that variance is time variant. Unit root test enables us to select an appropriate model for analysis. A unit root is a kind of stochastic trend in time series normally called random walk drift. The presence of unit root in time series can encounter us with spurious regression that is getting a high r-squared value even the data is uncorrelated.

Stationarity of data is pre-requisite for co-integration techniques. However, for ARDL this requirement is not mandate. In the regard, ARDL have a good benefits, therefore it is a good co-integration technique. However, for the sake of ascertaining whether data series is stationary at level I(0) or at first difference I(1) or both as a requirement for ARDL modeling, the pre-testing of the order of co-integration for each variable was undertaken using the test Augmented Dickey-Fuller (ADF), as its results are shown in table 6 below.

After screening the Stationarity of given data series through ADF, it is now identified that all variables except public debt i.e. private investment, political instability, financial market development, public investment, interest rate and real effective exchange rate are co integrated at first difference I (1) while public debt is stationary at order I(0). Now, we are able to run the bounds test. Table 6 below is reporting the results of ADF for given series. The results of the ADF are showing that we have a mixture of two, so in this regard ARDL co-integration approach provided by Pesaran et al. (2001) is an appropriate methodology for estimation. Therefore, we can now check the long run co-integration.

Table 6 is showing that variables are level and difference stationary. Our data series of private investment (PVT I), political instability (PI), financial market development (FMD), real effective exchange rate (REER), public investment (PUB I) and interest rate (IR) are stationary at first difference while public debt (PD) is stationary at level. It implies the rejection of null hypotheses at first differencing in favor of the alternative hypotheses for all data series.

Table 7 ADF Unit Root Test

Variables	Level		First Difference		Decision
	T Stat	P-value	T Stat	P-value	
Pvt I	-1.9742	0.2962	-6.2406	0.000***	1 (I)
PI	-2.3654	0.1596	-4.1674	0.002***	1 (I)
FMD	-0.9231	0.7681	-4.5033	0.0012***	1 (I)
PD	-3.7613**	0.0323			1 (0)
Pub I	-1.2823	0.625	-4.575	0.001***	1 (I)
REER	-0.6387	0.210	-5.073	0.0002***	1 (I)
IR	-1.9043	0.3264	-5.073	0.0002***	1 (I)

(Note: *, **, *** represents significance level at 10%, 5% and 1% respectively)

Stationarity of data series is at first Diff0erence, since given data series is I (1), therefore, ADRL modeling is most relevant and appropriate. Other models dealing with the same data series will be irrelevant and vague. As Duasa (2007) and Narayan (2004) stated that ARDL is the best technique to deal with small sample size where data series is integrated either at I (1) or I (0) or a combination of the two.

4.4 Bound Test for Co-integration relationship

Once all the variables get stationary, then they must have a relation with each other in the long run. For the purpose we are conducting, Bound test. For determining the long run relationship between variables in our private investment model, we have to first select the relevant lags for variables. For this purpose we are following the Akaike Information Criterion (AIC) and Schwarz Bayesian Information Criterion (SBC).

In this regard, VAR test for optimal lag selection is present. So we are using it and after reviewing the VAR lag order selection criteria through E-VIEW, we concludes that we have to choose the two lags. The respective information about the decision is present in Figure 1 below, which is showing that we are choosing two lags which are based on AIC.

Table 8 VAR Test for Lag Order Selection

VAR lag order selection criteria

Endogenous Variables: PVT I PI PUB IPD FMD REER IR

Lag	LogL	LR	FPE	AIC	SC	HQ
0	-405.0209	NA	826.3461	26.58200	26.90580	26.68755
1	-227.6016	263.2674	0.226572	18.29688	20.88731*	19.14129
2	-162.0676	67.64804*	0.133081*	17.23017*	22.08722	18.81344*

Now, we have to further generate the bound results by using E-VIEWS to check co-integration among variables. In this regard ARDL Bound Test will allow us for further estimation. In figure 2, F statistics value is 3.66, significant at 5percent, which rejects null hypothesis and accepts alternative hypothesis i.e. there is long run relationship exists. Now, study is investigating the long run correlation between variables.

Table 9 Bound Test for Cointegration Analysis

Null hypothesis: there is no long run relationship exists.

Test statistics	value	k
F statistics	3.66	4
Critical Value Bounds		
Significance	I0 Bound	I1 Bound
10%	2.2	3.09
5%	2.56	3.49
2.5%	2.88	3.87
1%	3.29	4.37

4.5 Long Run Relationship among Variables

A lot of regressions has been done by using EVIEWS from which ARDL (1, 0, 0, 1, 1) model is selecting on Akaike Information Criterion (AIC).

Table 10 Long Run ARDL Model Results

Variables	Coefficient	Std. Error	t-Statistic	p-value
PI	-0.413293*	0.204072	-2.025235	0.0551**
IR	-0.077762	0.088176	-0.881901	0.3874
Pub I	-0.509142***	0.146232	-3.481731	0.0021***
REER	-0.027800*	0.014973	-1.856692	0.0768*
PD	-1.606725	1.840346	-0.873056	0.3921
FMD	0.143318	0.077821	1.841643	0.0791*

C	31.370773	19.228734	1.631453	0.1170

** = Significant at 5% * = Significant at 10%

Table 7 has presented study results based on ARDL model. Since measure of Political instability is an index which has been derived from principal component analysis therefore it is unit-less. Political instability (PI) as it has been hypothesized has an expected negative Co-efficient of -0.41and t-statistic value is -2.02 while p-value is 0.05 significant at 5% level. Political instability (PI) is negatively and significantly impact gross domestic private investment. On the basis of this coefficient, for any given year presence of PI in the country declines private investment by 0.41 unit. Hashmi, Arshad and Suleman (2013) are saying that political instability in the Pakistan have negative significant relation with private investment. As Qureshi et al. (2010) stated that it is evident that economic growth patterns in Pakistan are highly volatile due to political instability in the economy and Takreem (2017) postulated that presence of political instability in Pakistan significantly and negatively impacts financial development in Pakistan. Hadhek and Karim (2012) PI is negatively correlated to private investment, Barro (1991), Alesina, Ozler, Roubini and Swagel (1996) also discussed the negative impact of PI on macro-economic variables. So, the results are rejecting the null hypothesis and accepting the alternative i.e. political instability derives the variations in private investment in Pakistan under the support of previous literature. Again, these results are based on Long run ARDL, therefore it can be stated that the researcher has found a long run negative impact of PI on Pvt I in Pakistan for the period 1984 to 2016.

For sensitivity analysis, researcher has included various control variables. For instance, as economic theory predicts negative relationship between IR and Pvt I, consequently the researcher has find an expected negative coefficient for interest rate which is -0.07. It implies that for every one percent increase in IR has reduced Pvt I by 0.07percent. According to Bader and Malawi

(2010) real interest rate exerts negative impacts on gross fixed capital formation. It is necessary to keep your rate of interest low as possible in order to attract the investors in Pakistan, Nadeem et al. (2016). Similarly public investment can also determine the level of private investment in the economy. This study take the public investment as government consumption expenditures like expenditures on salaries of employs, they are actually non-infrastructural packages in Pakistan and expected its crowding out impact on private investment. Resultantly, PUB I has been included in the model which has an expected negative coefficient of -0.50. Because higher public investment indicates lower PVT I. That is, for every one percent increase in PUB I has declined PVT I by 0.50percent in Pakistan for the said years and is significant at 1% level. Mamatzakis (2001) have provided the econometrical evidence that government consumption negatively correlates with PVT I. Crowd in indicates that private investment in the economy can increase due the expenditures incurred by government i.e. expenditures done by government on infrastructural projects and crowd out indicates the private investment in the economy decreases due the expenditures done by the government i.e. expenditures done by the governments on non-infrastructural projects.

Real exchange rate and public debt have been used for its obvious reasons. Both REER and PD have expected negative coefficient of -0.02 and -1.60 respectively. However, real effective exchange rate is statistically significant at 0.07 percent. According to Serven 2002 and 2006 uncertainty in the investment environment resulted to the volatility in real exchange rate which discourages the private investment. For percent increase in public debts has reduced private investment for 1.60 percent, Noor and Awan (2011) defined the same effect. And finally financial market development has coefficient an expected positive coefficient. It is the credit available to private sector for the investment. For every one unit increase in FMD has increased private

investment by 0.14% and it is significant at 10% level. Tariq and khan; Majeed and Saniya (2008) stated that Financial market development exerts positive impact in case of Pakistan. FMD creates the investment opportunities in the economy and enhances the income in the economy up to 60 percent. While remaining 40percent of its impacts is visible through poverty reduction Beck, Demirgüç-Kunt and Levine (2007).

4.6 Short Run ARDL Results

Further, in order to investigate the short run dynamics between independent variables and dependent variable, we have to conduct Error Correction Model. It is a speed of adjustment co-efficient and it absolute value shows us convergence towards long run equilibrium point after a deviation. So it must have these properties.

- Firstly, it must have a negative sign.
- Secondly, it must be less than 1.
- Thirdly it should have a probability value of less than 0.05.

For instance, results are compose in the table 11, below for the discussion.

Table 11 Short Run ARDL Model Results

Variables	Co-efficient	Standard Error	t-Stat	p-value
D(PI)	-0.118800	0.246159	-0.482616	0.6341
D(IR)	-0.009016	0.073615	-0.122472	0.9036
D(PUBI)	-0.099334	0.131226	-0.7569972	0.4571
D(REER)	0.043257	0.018749	2.307198	0.0308
D(PD)	-1.418086	1.047978	-1.353163	0.1897
D(FMD)	0.100183	0.065568	1.527918	0.1408

CoinEq(-1)	-0.664093	0.140271	-4.734355	0.0001
R-Squared	0.84	Probability F-Statistics		0.000
Adjusted R-Squared	0.77	Durbin Watson		2.12

Error Correction Model in the table is presenting the short run association between dependent and independent variables while lagged error correction term (CoinEq (-1)) values are validating the above three properties i.e. ECM should be negative, it should be less than 1 and should be significant. ECM has the negative co-efficient of (-0.66) which means that once a variable can deviate from the long run equilibrium position than it can converge back to initial position at 66.4percent of speed. The probability value 0.0001is showing high significance. According to Banerjee et al. (1998) the high significance defines the existence of cointegration between the variables. Political instability D (PI) has the coefficient of -0.11, this negative coefficient was expected. It means that in the presence of PI, private investment will falls up to the ratio of 0.11 in Pakistan.

The value of R-squared is use to present the variation in the model i.e. proportion of the variation in dependent variable explained by independent variables for a linear regression model. R-squared is 0.84. It means that independent variables in the study are 84percent explaining private investment. Durbin-Watson Statistics is 2.12 which is suggesting that there is almost no problem of autocorrelation in the study. These results accept the alternative hypothesis that political instability derives the variation in the private investment and are supporting the previous literature.

Chapter 5

CONCLUSIONS AND RECOMMENDATIONS

5.1 Conclusions

Investment in any economy is the most important determinant for its economic growth and political instability is the major constraint in its way, both in short and long run and both in developing and developed economies. Political instability in Pakistan has raise the internal and external challenges for its state and society while the resurgence in investment is only a necessary ingredient for a sustainable recovery in its developing sectors under a highly indebted developing economy.

Private Investment is very important determinant of national income, it is formation of human and physical capital in the economy, so it governs the rate of growth and development of economy. This private investment can only be possible into stable environment, the more stability will bring the more return on capital. In this regard, it is obvious that Pvt I is only way in highly debited developing economies for generating national income, through raising and creating productivity and employment, but there is a problem and that is political instability. Political instability is the unwanted situation in the country for its political and economic agents. So, here it is not a matter of finance or allocation of resources for investment but a creation of stable settings is a problem.

For the period 1984-2016, Private investment has been appointed as dependent variable and measured through Gross capital formation. For most concerned independent variable i.e. Political instability, the researcher has derived an index by employing PCA which includes Government stability, Law and order, religious tension, ethnic tension, democratic accountability and military involvement in Politics. Other explanatory variables included in the model are public investment, interest rate, exchange rate, financial market development, and public debt. Unit root

was conducted, bound test was approached and then get econometrical evidence of PI and economic control variables impact on private investment through ARDL co-integration approach was determined. It is found that PI have a negative impact on Pvt I in Pakistan, for both short and long run periods. However, only public investment, exchange rate, and financial market development are statistically significant but the rest of the two public debt and interest rate are not statistically significant. R-squared of the model is 0.84, which is showing 83percent of variation in the model by these explanatory variables, F-statistics (13.04) is showing high significance of the model and Durbin Watson (2.12) is evidencing the absence of autocorrelation.

In this regard study find the determinants of PI and Pvt I. In the way it finds its objectives, by exploring the impact of PI and control variables on Pvt I in Pakistan. It rejects the hypothesis and concluding that political instability derive the negative variations in private investment in Pakistan. So, it have a significance that private investment can promote only in stable settings, these stable setting can be achieved through recognition of all possible determinants.

5.2 Recommendations

Institutional improvement in both political and economic domains is desirable in Pakistan. These institutions are the only way for creative policy designing for multidimensional aspects of pluralistically attributed country. So, improvement of institutions will improve the political system and governing structure in the country, whose imbalances are the main reason of PI in Pakistan.

Pakistan is highly debited developing economy, it have to promote and develop private investment in the country which depends on the stable settings in the country. So, it needs to search and research, to develop the discourse on the topic to completely understand the phenomenon. For the purpose government have to take all possible initiatives.

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