

Factors Influencing on Stock Market in Pakistan

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Abstract

The stock market is an economic institution that promotes the growth and development of the economy of a nation. This paper investigated the impact of inflation on stock market performance. The aim of this research to find out factors which have great impact on stock market performance of any country. This study discusses the main variable like interest rate and inflation rate and their effect on stock market performance. This study investigated that interest and inflation rate has significant negative relation with stock market performance, while in regression analysis it has been observed that the value of $R^2 = 0.62$ means model is fit and can predict outcome. This study provides valuable knowledge to the government, economist and shareholders to jug the position of stock market for investment purpose.

Keywords: Stock Market Performance, Inflation Rate, Interest Rate

Introduction

Inflation is the rate at which the general level of prices for goods and services is rising, and, subsequently, purchasing power is falling. Central banks attempt to stop severe inflation, along with severe deflation, in an attempt to keep the excessive growth of prices to a minimum. Interest rate is the amount charged, expressed as a percentage of principal, by a lender to a borrower for the use of assets. Interest rates are typically noted on an annual basis, known as the annual percentage rate (APR). The assets borrowed could include, cash, consumer goods, large assets, such as a vehicle or building.

This study is very important for Pakistan economy because recently our country suffering his dangerous economic period. Pakistan economy face lot of threat due to wrong inflation rate and interest rate activity. Stock market is also show economic position of any country. Stock market has important part of any stable country. Stock market perceived through economic health, confidence of domestic and global investors. Stock market activity can effect through inflation rate and interest rate. Interest rate is variable directly related to economic growth and effect stock market position and its activity. Interest rate has significant negative relation on share price. If bank offer high rate interest then investor switch to from share market for bank sector and demand of share is decrease.

So stock market activity is disturbed and share price will be low. Another variable is inflation that Change the negatively affects stock prices. When inflation and nominal interest rates increase, firms' borrowing costs will increase. The increase in cost of borrowing will reduce net income and stock prices. Naceuret all.(2004) highlighted the significance of verge level of inflation in the relationship between inflation and financial sector presentation. Day (1984) concludes "that a negative correlation between inflation and real stock returns is consistent with equilibrium in a market with rational investors." Farsio&Fazel (2008) provided empirical evidence in support of a positive relationship between inflation and stock prices. S.U.R

According to Aliyu (2007) instability today leads to the increasing review of future predictable instability and risk premium which further leads to discounting of future predictable cash flows at an greater than before rate which results in lower stock prices or negative returns today. Stock return instability, therefore, refers to variations in stock price changes during a period of time. This more often is perceived by investors and other agents as calculate of risk. On their part, policymakers and rational investors use market guess of unsteadiness as an instrument to calculate the weak point of the stock market.

Elshareif studied the relation between nominal stock returns and inflation using time series method to approximation both predictable and unpredicted inflation. He showed that a negative relationship between nominal stock returns and both predictable and unanticipated inflation has prevailed over the time. Bordo et al (2009) Bull and bear markets that suppose that the market is forever in one or the other state, our move toward enables us to focus on periods of great actions in real stock prices. If most comments in fact fit in to a center or usual group, then models that force explanation to put down inside moreover a bull or bear state will of necessity effect in estimates that fail to reproduce fully the differences between the intense states. Investment in the stock market is durable in character; any expansion that could influence the constancy of the polity or financial system frequently has serious crash on the act of the stock market.

Ramady (2009) discuss the effect of economic transparency of central banks on alleviating poverty and have argued that increasing central bank transparency contributes to the convergence of inflation expectation and inflation target. Caputo, R(2005) demonstrates that an inflation targeting government with burly interest rate response to inflation must direct to lower stock market instability. Ghazouani(2004) highlighted the significance of doorsill stage of inflation in the association flanked by inflation and financial sector presentation. The negative

outcome of inflation on financial sector efficiency becomes effectual once the rate of inflation exceeds a number of thresholds. Established evidence of a strong

Aliyu (2009) said that time unreliable instability for stock market returns in together markets, on the collision of inflation on provisional stock market instability; the investigator found that the rate of inflation is one of the fundamental determinants of provisional market instability in Turkey, which has advanced inflation rate than Canada. Elsharei operational a vector Auto regressive moving average (VARMA) to be familiar with and observe at the same time the fundamental association in the middle of stock returns, real activity, the money supply and inflation. He argues that AVARMA model gives a neutral examination of causality and also can notice criticism relatives flanked by sequence being analyze. Instead of using short-term or long-term interest rates. Alam et al (2009) analyzed the association flanked by the spread and stock market returns. He said that the same variables that have been use to forecast surplus returns in the term arrangement also predict surplus stock returns, less than a concurrent examination of the returns on bills, bonds and stock should be useful. His outcomes support the efficiency of the term configuration of interest rates in predicts surplus returns on the stock market.

Asiedu et al (2013) said that issue together share and bond are corresponding. These imply that economic agent bring into play together debt and equity in their economic actions. Then stock market is supposed to add to the increase. This will happen as together expenditure of debt and equity increase as additional and additional of both economic instruments are consumed by household, firm and the state. If debt and equity are substitute, they will have an unhelpful association. The appropriate warning for the achievable opposite relations among stock markets and the increase, but is that present wants to be a dangerous accumulation of firms listed on the stock exchange.

Jamaliet al (2010) oversized that above the ground incidence data to distinguish the outcome of surprise on instability. Yet if attractive and helpful in a lot of compliments, the use of far above the ground incidence information merely consider the belongings of shocks on indirect instability in a very thin time. Our paper finds that the replies of instability are strong live and quarrel that such a respond is more educational from a trade and rule making viewpoint. Pointon(2001) optional present exist a structural association flanked by the price rises rate and stock returns arise from the real balance result pertaining only to a time of change quite than to a long-run balance. Alam et al(2009) showed so as to there are a number of share price dependencies other than too little to gainfully browbeaten and concluded that JSE is "operationally efficient" that means only a little group of investors are clever to break the market.

Zeisberger (2011) showed that if there are few constraints on small advertising, prices fall below basic value. Basically purposed of this study is juggled the effect of interest and inflation rate changing on stock market. Pakistan economy faces threat due to interest and inflation rate changing. Stock market stability shows the economic condition of any country. Our purpose of this study to create understanding for policies maker that set the inflation and interested rate policies and what are the different aspects of interest and inflation rate activity and how they affect stock market position. This study has practically important for the people who are interested for doing investment in stock market and want to get knowledge about how inflation and interest rate effect on stock market. It provides valuable knowledge for the government, economist and shareholders to jug the position of stock market for investment purpose. Policies maker also get benefits from this study for doing right policies of interest and inflation rate.

Literature Review:

In our study we work on three variables. One is dependent variable that is stock market and two are independent variables that are inflation and interest rate. Inflation and interest rate both effect the position of stock market. Stock market activity and performance effected through inflation rate and interest rate movement's. Interest rate is dominated variable directly related to economic growth and stock market activity. Interest rate movement has great influence on stock market position. Interest rate can cause of increase output of stock market. When interest rate increase investors attract to invest his investment in stock market rather than bank and enjoy benefits in form of dividend. Demand of share also increases in interest rate will increase. Aurangzeb (2012) examined the consequence of some macroeconomic variables on stock market returns. They obtain short and long term interest rates; predictable and unpredicted inflation, industrial production and the increase among high and low grade bonds.

According to the point of view of Ikechukwu (2011) confirmed this by saying that the channeling of savings into financial assets and the motivation of persons to incur financial liabilities is strongly influenced by interest rates on those financial assets and liabilities. Which are frequently proxies by the short-term interest rate? On the other hand, the pressure of the long-term interest rate on stock prices stems in a straight line from the their value model from side to side the persuade of the long-term interest rate on the discount rate. International effect theory states that foreign exchanges with comparatively high interest rate will shift in the direction of lower prices for the reason that high nominal interest rate reveals predictable inflation rate (Saeidi & Valian 2011).

HSING (2011) said that stock market index is negatively associated with the exchange rate and positively affected by the DAX in the long run. In adding together the stock market index also affects the exchange

rate. According to the Fischbacher, Hens and Zeisberger (2011) interest rate is bearing bond. As a result, subjects have to make a decision how to tear their capital between the stock and the bond market. Interest policy changes occasion costs, thus perhaps distressing prices. We move up the interest rate in action groups using an endogenous interest rate policy algorithm when we watch bubbles. Control groups face a fixed interest rate. Maddaloni and Peydró (2010) observed that riskless assets less attractive and may make possible a search-for-yield by financial disinterested party.

Afzal and Mirza (2010) both were agreed descriptive variables they use are market structure, in use cost, degree of risk dislike, interest rate instability, credit risk, scale effects (transaction size of loans and deposits), understood interest payments, opportunity cost of bank reserves, and managerial efficiency. They employ a single step panel weakening with fixed belongings and find significant coefficients for most of the variables. Transaction size and managerial efficiency (operating efficiency to gross income) are negatively connected to the restrictions that they value to management efficacy in obtaining low-cost deposits and extending loans at higher interest rates ensuing in senior spreads. They bring to a close that market power, operating costs, risk dislike, instability of interest rates, credit risk, and opportunity cost, and understood interest payments have a positive impact on overall interest rate spreads.

Birru and Figlewski (2010) said that there is a negative relationship between stock prices and interest rate. According to the point of view of Khrawish, Siam and Jaradat (2010) examined the relationships between stock market capitalization rate and interest rate. Garg (2008) conclude that the high tech and telecommunications sectors are the most responsive to changes in monetary policy due to their cyclical nature. However, the interest rate itself serves as an indicator to the economic business cycle and is a cyclical indicator. Vaz, Ariff and Brooks (2008) examined higher interest rates would attract more risky borrowers so that existing clientele would switch (if switching costs are trivial) to a bank that did not increase interest rates (a choice available if banking is competitive, since not all banks will change interest rates following the regulator's change). Thus banks have a constrained ability to effect changes in net interest margins due to competition. This suggests that as a consequence of operating impacts of changed interest rates, and thus their net interest margins, banks experience income variations thereby affecting stock returns. (Pearce, 2000) a rise in interest rates that adversely affects earnings reports will lead to lower stock prices.

Mujeri and Younus (2009) have attributed the existence of high IRS in developing countries to several factors, such as high operating costs, financial repression, lack of competition and market power of a few large dominant banks enabling them to manipulate industry variables including lending and deposit rates, high inflation rates, high risk premiums in formal credit markets due to widely prevailing perception relating to high risk for most borrowers, and similar other factors. Vaz, Ariff and Brooks (2008) oversized that interest rates would attract more risky borrowers so that existing clientele would switch (if switching costs are trivial) to a bank that did not increase interest rates (a choice available if banking is competitive, since not all banks will change interest rates following the regulator's change). Thus banks have a constrained ability to effect changes in net interest margins due to competition. This suggests that as a consequence of operating impacts of changed interest rates, and thus their net interest margins, banks experience income variations thereby affecting stock returns.

Kurihara (2006) showed that short- and long-term interest rates have a modest degree of forecasting power for excess stock returns. Dimitrova (2005) investigate the short-and long- run relationship between stock prices and exchange rates in eight advanced economies. Of interest to me are the results on short run effects in the U.S. and U.K. markets. They find that an increase in stock prices causes the currency to depreciate. Low interest rates make. As rise in interest rates that adversely affects earnings reports will lead to lower stock prices (Pearce, 2000). Chutang and Kumara investigated the active belongings of interest rate weighted standard interest rate on bank deposit, and exchange rate changes on ASPI stock market return. They statistics suggest long run equilibrium relationship exists among the variables. Research that there is no co-integrating relationship among variables and ECM concludes that a findings specifically point out that the interest rate and exchange rate changes affect for the stock market in the long run and there is no significant influence in the short-run.

Calcagnini, Farabullini and Giombini analyzed frequent ethical danger in a spirited credit market. They found that a long term banking association benefits the borrowers: borrowers pay higher interest rates and pledge guarantees early in the relationship, but, once their first project is successful, they are rewarded with unsecured loans and lower loan rates relationship among stock returns and real activity. Waszink said that Inflation and interest rate has great effect on stock market return. Inflation is strong variable that effect stock market matters. Stock market activity effect through inflation rate fluctuations. Inflation rate has link with stock market performance. Rise in inflation rate may cause a decline in a firm's sales and when firm sales will decrease then firm net income will also decrease so result is that stock price will be decrease. So stock market will disturbed through that movement in inflation rate and also affect the performance of stock market.

Salem, Zafar and Rafique (2013) discussed that a unenthusiastic association flanked by inflation and stock prices has turn out to be one of the majority usually documented sensible particulars. But with the view of Aurangzeb (2012) examined the consequence of some macroeconomic variables on stock market returns. They

obtain short and long term interest rates; predictable and unpredicted inflation, industrial production and the increase among high and low grade bonds. Khan et al (2012) declared that there is an opposite association in the middle of stock returns and predictable inflation and optimistic significant study in this background is the work of Ali (2012) established that in inflation targeting countries, inflation targeting has lowered inflation prospect also establish that, in inflation targeting countries, inflation prospect are improved anchor.

Aurangzeb (2012) concluded that medium-term trends in real interest rates are not substantially affected by the exact choice among a range of reasonable proxies for trend inflation, although the timing of turning points can differ significantly in periods where inflation is highly variable. They found that an inverse relationship existed between inflation expectations and the stock market when using the leading indicator of inflation as their data source for inflation expectations. Gul and Iqbal (2011) distinguished about inflation that it is a boost in general level of an economy's prices which modify the allocation of an economy's level of production by dropping purchasing power of individuals and other economic units with permanent money incomes.

It affect existence of production in the intelligence that it becomes a reason of a boost in the purchase of and production of those equipment whose prices raise the inflation. It decries the purchase of financial assets i.e. bonds. Inflation also decries saving levels. Furthermore inflation changes the character of production of one economy become more expansive for the person in that economy while it is obtainable in a number of other economics at low price and less expansive clearly he will shift to other economies. Rashid and Husain (2010) analyzed the belongings of monetary liberalization on inflation. He developed a monetary and endogenous development, active general balance model of a small open semi-industrialized economy, with financial intermediaries subjected to compulsory "high reserve ratio, serving as the foundation of financial oppression. According to the point of view of

Alam and Salah Uddin (2009) argued that expected inflation is negatively correlated with anticipated real activity, which in turn is positively related to returns on the stock market. Therefore, stock market returns should be negatively correlated with expected inflation. MUJERI and younas (2009) have attributed the existence of high IRS in developing countries to several factors, such as high operating costs, financial repression, lack of competition and market power of a few large dominant banks enabling them to manipulate industry variables including lending and deposit rates, high inflation rates, high risk premiums in formal credit markets due to widely prevailing perception relating to high risk for most borrowers, and similar other factors.

Akmal (2007) found evidence of positive relation between inflation and stock market returns. PENMAN (2003) argues that higher expected inflation forecasts lower real economic activity that reduces corporate earnings. But Taylor (2001) discusses the failure of liberalized policies in Argentina. He says that Argentina has failed in maintaining the liberalized policies about capital flows and a firm currency. Argentina had anti-inflation program based on freezing the exchange rate in the early 1990s. This means that the money supply within the country and the supply of credit to firms are tied directly to international reserves. So if the country gets capital inflows, the supply of money and credit increases, leading to a substantial increase in domestic prices.

Stock exchange a highly organized market facilitating the purchase and sale of securities and operated by professional stockbrokers and market makers according to fixed rules. Stock market is an economic institution that promotes the growth and development of the economy of a nation. Stock market is show economic position of any country. Stock market important part of any stable country. Performance of the stock market is very important for economy development and growth and it's also help full for investors for making investment decision in any country. Stock market will help in their decision making. Stock market perceived through economic health, confidence of domestic and global investors. More efficient stock market boosts economic growth. They make predictions about the future, and buy and sell stock as indicated by their expectations of future risk and return.

Ansar and Asghar (2013) forecasted the optimistic compassion experiential for gas and oil. And resources industries have unenthusiastic compassion or less significant for the Banking industry, Paper, Packaging, and Transport industries and this proof was hold up the copy and was confirmed that a number of manufacturing management required to aware the resultant risk. But Chadha, Turner and Zampolli (2013) said that a considerable text propose that the swelling of the stock market is completely linked to the level of financial enlargement and increase of capital. This end obviously rigging the consideration that as economies increases, equity markets be tending to get superior jointly in circumstances of the number of listed companies and market capitalization.

HSING (2011) shows that stock market index is negatively associated with the exchange rate and positively affected by the DAX in the long run. In adding together the stock market index also affects the exchange rate. AsMaddaloni and Peydró (2010) observed that riskless assets less attractive and may make possible a search-for-yield by financial disinterested party. RahmanavdSalahuddin (2010) showed a positive and significant correlation between stock market development and long run economic growth. Stock returns compassion to dissimilar types of risk can be hypothetically necessary in terms of risk dislike basically, a higher return is demanded by risk averse investors in the presence of risk factors other than those linked to the market portfolio.

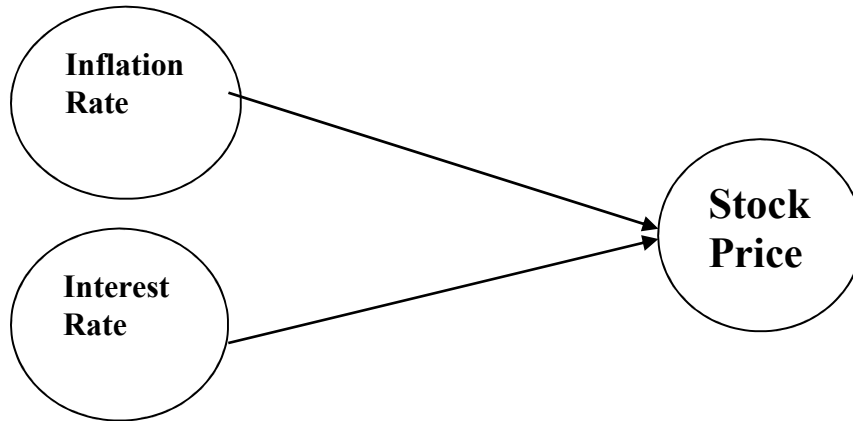
Banerjee and Adhikary (2003) concluded that there exists a bi-directional causality between stock prices and exchange rate, at least in the short run, although their co-integration analysis does not show any long-term

relationship between these variables. NISSIM and GARCIA and LIU (1999) have found that most stock market indicators are highly correlated with the financial intermediary development. Countries with well-developed stock markets tend to have well-developed financial intermediaries. Then, in addition, we intend to investigate if this positive relationship between financial intermediary development and stock market development.

H1: Interest rate has negative relationship with Stock market performance.

H2: Inflation rate has negative relationship with stock market performance.

Framework:



Analysis and Results:

Model Summary

| Model | R | R Square | Adjusted R Square | Std. Error of the Estimate |
|-------|-------------------|----------|-------------------|----------------------------|
| 1 | .782 ^a | .612 | .583 | 2.66870 |

a. Predictors: (Constant), Inflation, Interest Rate

This table tells the model summary of variables that we use in our study. Are our variables correct or not. Our R-value is 0.782 its means that there is strongly relation because it is more then 0.5. Our R-Square value is 0.612 its means it has more strongly effect by interest rate and inflation on dependent variables that is stock market.

ANOVA

| Model | | Sum of Squares | df | Mean Square | F | Sig. |
|-------|------------|----------------|----|-------------|--------|-------------------|
| 1 | Regression | 302.674 | 2 | 151.337 | 21.249 | .000 ^a |
| | Residual | 192.292 | 27 | 7.122 | | |
| | Total | 494.967 | 29 | | | |

a. Predictors: (Constant), Inflation, Interest Rate

b. Dependent Variable: Stock Price

Above table define the ANOVA about the samples based on between Regression and Residual. Inflation and Interest rate has significance responses with the significant value of 0.000 and F value = 21.249.

Correlations

| | Inflation | Interest Rate | StockPrice |
|---------------------------------|-----------|---------------|------------|
| Stock Price Pearson Correlation | .772** | -.135 | 1 |
| Sig. (2-tailed) | .000 | .478 | |
| N | 30 | 30 | 30 |

** . Correlation is significant at the 0.01 level (2-tailed).

The purpose of correlation analysis is to determine the relationship between two variables. We also find that 1- there is positive correlation, 2- there is negative correlation, 3- there is no correlation. Above table shown table includes the Correlation among different variables, which have among the variables. The value of P= 0.01 shows that there is positive significance correlation among the variables. Due to ** there is strong positive relationship among the variables.

Conclusion

Originally, this article was intended to illustrate differences variables that have effect directly to stock market performance. Research concluded some important point about the variables that play important role in stock market activity that directly affect market activity. The paper present evidence of the influence of inflation and interest

rate on measures of stock market performance. All measures show inflation has a positive relationship with stock prices and interest rate has negative relationship with stock price. This study has practically important for the people who are interested for doing investment in stock market and want to get knowledge about how inflation and interest rate effect on stock market.

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