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Foreign Direct Investment Impact, Remittances and Foreign Debt on Economic Growth (GDP) Of Pakistan

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ABSTRACT

The present study analyzes the impact of FDI, Remittances, and foreign debt on the GDP of Pakistan. The study has used data of these variables from World Development Indicators and Pakistan Bureau of Statistics from the year 1981 to 2019, by taking Gross Domestic Product as the dependent variable while FDI, Remittances, and Foreign Debt are taken as independent variables. Results show that FDI indicates a positive trend of investment, which means an increase in the country's GDP and growth, whereas remittances have a negative influence on GDP because they diminish beneficiaries' labor supply and participation rate in the labor force. On the other hand, debt has a detrimental impact on the economy. Overall, the results show that FDI plays important role in Pakistan's economy and has a strong contribution in determining the economic growth of Pakistan.
Key Word: Foreign Direct Investment, Remittances, Foreign Debt, GDP.

1 | INTRODUCTION

Now a day's globalization is happening, and the world is becoming a global village. To compete and survive in the global world a country should be economically strong to meet its needs. There are many economic indicators through which we come to that a country is going towards the positive side or negative side. In my study, I want to get a connection between economic growth, FDI, foreign settlements, and external debt. To create a relationship among these variables, initially, we need to have a basic idea about all these variables mentioned above. Developing countries are consumption-based economies and have imports dominating economies because they have to rely on developed countries to meet their necessities.

Foreign Direct Investment is the survival line for developing countries like Pakistan because they import more goods and services than their exports (Qadir & Majeed, 2018; Yeo & Deng, 2019). Another core and common problem of developing countries are that their budget always shows a deficit that they generate less revenue and have many expenditures (Ali & Naeem, 2017: Li, 2016). Foreign Direct Investment has a very important and positive role in economic growth. According to a report on world investment 2008 foreign direct investment raises economy as well as it improves the skill level, job creation, opportunities improvement in technology, productivity goes to the higher side and more importantly it gives positive effect in long run (Epaphra & Mwakalasya, 2017; Noor et al., 2016). Foreign direct investment also helps in better infrastructure (Osano & Koine, 2016).

To get the idea about the next variable, which is external debt, everyone knows that debt means a burden on you or the loan you have taken from anybody, and you have to return that loan with interest. Underdeveloped country's economies always show that there is huge external debt. External debt is a loan taken by any economy to survive or to meet its surplus imports (Chinaka, 2017: Akinwunmi & Adekoya, 2018). This external debt or loan is obtained from developed countries and many international financial institutes that provide a loan. The main negative point of external debt is that you have to follow certain rules and conditions given by the debtor and you have to implement them in your country. Some other negative points or impact of external debts that to fulfill or recover the debt amount government imposes many taxes and cutout subsides which results in less savings and investment rate declines.

The third and last variable of my study is remittances. A Remittanceis one of the main and reliable Foreign Aid actors of recipient countries (Azam, 2016; DiLorenzo, 2018). The main motive behind including this variable in my study is how remittances are affecting positively or negatively economic growth. By remittances, the foreign exchange reserve also increases and developing countries can meet their trade bills. Another main point is that joblessness reduces, and the skillful labors get jobs.

1.1 | Objective of Study

The fundamental goal of this study is that:

1. Through this relationship, an integrated model should be created to determine the association between GDP (Gross Domestic Product) Economic Growth and Foreign Direct Investment, Remittances, and Foreign Aid.
2. After getting the relationship and model policies and suggestions for a government that if there are problems how to overcome these problems, constraints and how we get improvements to increase our growth.

We need to see long-run and short-run relationships along with the Foreign Aid actors.

1.2 | Significance of Study

Pakistan is an underdeveloped country facing a budget deficit and also a current account deficit. Most developing countries are facing a budget deficit, to get rid of that budget deficit many sources of financing are used. Foreign Direct Investment, Foreign aid, and remittances are used as foreign exchange reserves and sour sources of financing. This study makes us understand whether these variables are positively affecting the economic growth of Pakistan or negatively. This study is in addition to previous studies.

2 | LITERATURE REVIEW

Given the conflicting data in the literature regarding the impact of foreign direct investment on a country's economy, Pakistan was chosen as a case study to evaluate the association for this country. The data collected for this study covers the years 1981 to 2010. Other factors such as debt, trade, inflation, and domestic investment, in addition to FDI, have been included in the study to regress on the GDP of this country. The least-square method was used to determine the influence of the variables on the economy of Pakistan. The co-integration of the variables was determined using the Augmented Dickey-Fuller Test and was shown to be stable over time. Their

findings show that foreign investment has a negative impact on Pakistan's economic performance, while domestic investment has a positive impact. Furthermore, the country's debt, trade, and inflation have all been demonstrated to have a negative impact on GDP (Saqib, Masnoon, and Rafique, 2013)

Sohail, Sarwat, and Saima Shahzad Mirza (2017) examined the impact of foreign direct investment on Pakistan's economic growth. This paper examined the effect of independent variables (FDI, exports, domestic capital, human capital index, and several terrorist attacks) on the dependent variable GDP using data from 1996 to 2015. Statistical techniques such as correlation matrix and regression analysis were used to examine the effect of independent variables (FDI, exports, domestic capital, index of human capital, and several terrorist attacks) on the dependent variable GDP. The findings reveal that foreign direct investment and the country's gross domestic product have a substantial link.

Tahir (2018) investigated the Effect of Foreign Direct Investment and Foreign Remittances on Economic Growth in Pakistan (1990-2018). The purpose of the research was to determine the impact of international remittances and foreign direct investment (FDI) on Pakistan's economic growth. Data from the World Development Indicator Data Bank is used to create a time series that spans 1990 to 2018. GDP is the dependent variable, whereas foreign remittance and foreign direct investment (FDI) are the independent variables in the ARDL bound test. According to the Auto Regressive Distribution Lag (ARDL) model, there is a long-term relationship between FDI, foreign remittances, and Pakistan's economic growth.

Tahir (2019) studied the influence of selected foreign inflows (assistance, trade, FDI, debt, and remittances) on the economic growth of the South Asian Association for Regional Cooperation (SAARC) countries is examined and highlighted in this paper. Because of the shorter periods of accessible data, nations like Afghanistan, Bhutan, and the Maldives have largely been disregarded in the existing literature. Foreign aid and foreign direct investment have been demonstrated to have a positive impact on economic growth. Foreign debt and trade flows have been shown to have a negative impact on economic growth. There is no link found between the flow of remittances and these countries' economic growth.

Sohail and Mirza (2020) examined the impact of foreign direct investment on Pakistan's economic growth. Statistical techniques such as correlation matrix and regression analysis were used. The findings reveal that foreign direct investment and the country's gross domestic product have a substantial link. Other independent variables such as exports, domestic capital, human capital index, and the number of terrorist attacks have an impact on the country's economic development.

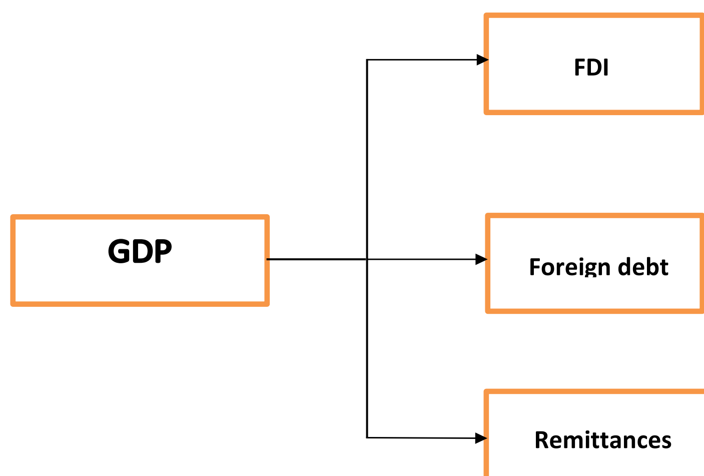
According to Zeb et al. (2013), in developing nations like Pakistan, foreign direct investment (FDI) is frequently viewed as a critical component of economic development. The author studied the impact of FDI on Pakistan's economic growth from 1972 to 2012. Aside from FDI, there are three other factors to consider: trade openness, political instability, and terrorist activity. In this investigation, attacks are also used. The least-square method was used to examine the impact of these variables on the outcome. Pakistan's Gross Domestic Product. The findings suggest that FDI has a strong positive impact on Pakistan's economic growth.

The purpose of this study is to establish the status of FDI in Pakistan and the impact of inward FDI on the country's overall economic growth. This research is based on time series data from three decades (1976 to 2005) obtained from the World Development Indicators 2007. They used a linear regression model to see if there is a

link between inward foreign direct investment and Pakistan's Gross Domestic Product. E-Views, a dependable software, is used to measure the relationship between the dependent and independent variables.

2.1|Theoretical Framework

A theoretical framework is a structure that can hold or support a research study theory. The theoretical framework defines and introduces the theory that explains why the research problem under consideration exists. The GDP is a dependent variable while FDI, Foreign debt, and remittances are independent variables.



3 | RESEARCH METHODOLOGY

The data gathered for this study is time-series in nature covering the period from 1981 to 2018. The data of the selected variables are secondary and are taken from the World Bank Data Base, the World Development Indicators, and the Pakistan Bearue of Statistics. There are 38 numbers of observations taken in this study. This study will focus on the impact of foreign debt, FDI, and remittances on the economy of Pakistan.

3.1|Variables Description

GDP is the study's dependent variable. External debt, FDI, and remittances are the independent variables.

Dependent Variable

1. GDP: Gross domestic product (GDP) refers to the total monetary or market worth of all finished products and services produced within a country's borders over a given period. It serves as a comprehensive scorecard of a country's economic health because it is a wide measure of entire domestic production. Though GDP is usually estimated on an annual basis, it is also calculated quarterly on occasion.

Independent Variables

FDI: Foreign direct investment (FDI) is the net movement of funds to buy and create physical capital in a foreign country, such as factories and machines. For example, Nissan, a Japanese company, is building a car factory in the United Kingdom.

External Debt: This refers to funds borrowed from outside the country. External debt must be repaid in the same currency that it was borrowed in.

Remittances: A remittance is a money sent or transferred from one party to another. The word remit comes from the word remitter, which means to send anything back. Wire transfers, electronic payment systems, mail, draughts, and checks are all options for remittances.

3.2 | Research Model Developed

From the definitions and explanations of both the dependent and independent variables, as well as the effects of external debt, FDI, and remittances on Pakistan's GDP, the correlation between these two variables is the initial analysis in this study, and it identifies the significant association. The empirical inquiry is then analyzed and evaluated using a regression model as a statistical tool. The following is a simple regression model that may be defined using the equation:

lnGDP= β. + β1 (external debt) +β2 (FDI) +β3 (lnRemittances) +μ

Whereas,

β.= the intercept of the equation.
β1 (external debt) = the changing coefficient of GDP.
β2 (FDI) = the changing coefficient of GDP.
β3 (lnRemittances) = the changing coefficient of GDP.
μ = the error term

The study developed the following estimation based on the model described above and utilized it to create the model. As a result, all the relevant data has been entered into EViews for statistical analysis.

4 | RESULTS AND DISCUSSION

Table 1: Unit Root Test

Variables	ADF Statistics	Critical value (5%)	Probability value	Stationary level
Lngdp	-5.922593	-2.943427	0.0000	L(1)
lnrem	-5.289534	-2.943427	0.0001	L(1)
FDI	-4.049484	-2.943427	0.0033	L(1)
debt	-3.562496	-2.943427	0.0000	L(0)

The Augmented dickey-fuller test is used to evaluate the stationarity of the variables before estimating the model. Only debt is stationary at zero with a trend and an intercept, whereas the other variables are stationary at the first difference. Because of the state of the variables, we may use the ADRL test to see if there is a relationship between them.

Table 2. Estimation of ARDL Model

Variables	Coefficient	Std. error	t-statistics	Prob.
LNGDP (-1)	0.551059	0.164687	3.346103	0.0031
LNREM (-2)	0.116209	0.042832	2.713140	0.0130
FDI (-3)	-0.058646	0.023351	-2.511548	0.0203
DEBT	-0.004099	0.001997	-2.052520	0.0528
C	1.771352	0.738474	2.398664	0.0258
R-squared	0.997810		F-statistic	683.5133
Adjusted R-squared	0.996350		Durbin-Watson stat	2.144835

So, equation for the model is defined as: LnGDP=0.55+0.11LnREM-0.04DEBT-0.054FDI+$\in t$

According to the above equation, if other thing held constant when their FDI increases by 1 unit on average then GDP decrease by 5.8 percent. Other thing held constant when remittances increase by 1 percent on average GDP increase 11 percent. Other things held constant when debt increased by I unit on average than GDP decreased 0.4 percent. This result shows that foreign direct investment has a decreasing and significant influence on GDP.

Foreign direct investment shows a negative relationship with GDP in case the of Pakistan. It shows significant results because the t value is greater than 2 according to the rule of thumb. The null hypothesis should also be rejected because the t-stat is larger than 2. As a result, these factors are significantly associated with one another, indicating a long-term association.

The Durbin Watson statistic is 2.14, indicating that there is no autocorrelation in the modal. The R square value is 0.99, indicating that independent factors account for 99 percent of GDP variation.

The Durbin Watson statistic is 2.3, indicating that there is no autocorrelation in the modal. The R. square score is 0.99, indicating that independent factors account for 99 percent of GDP variation.

4.1 | ARDL Method

ARDL Bounds Test

The value of the F statistic, which is 4.986246, is more than the value of the 5% upper bound significance value, which is 4.35, the bound test suggests that there is a long-term link between the dependent and independent variables.

Table 3. Bound Test

Test Statistics	**Value**	**K**
F-Statistics	4.986246	3
Critical Value Bounds		
Significance	10 Bounds	11 Bounds
10%	2.72	3.77
5%	3.23	4.35
2.5%	3.69	4.89
1%	4.29	5.61

Table 4. Error Correction Method

Variables	Co-efficient	Standard Errors	T- Stats	Probability
D(LNGDP (-1))	-0.393323	0.162573	-2.419359	0.0247
D(LNREM (-1))	-0.116209	0.042832	-2.713140	0.0130
D(FDI)	0.050010	0.023351	2.511548	0.0203
D(DEBT)	-0.004099	0.001997	-2.052520	0.0528
CointEq(-1)	-0.055618	0.025960	-2.142440	0.0440

5 | CONCLUSION

The main goal of this study is to look at the relationship between GDP and other variables such as remittances, FDI, and foreign debt over the long and short term from 1981 to 2019. In the long run, FDI has a beneficial impact on GDP. The presence of FDI in the economy indicates that there is a positive trend of investment, which leads to an increase in the country's GDP and growth. Remittances have a negative influence on GDP because they diminish beneficiaries' labour supply and participation rate in the labour force. Debt has a

detrimental impact on the economy because we pay interest on debt and are unable to set our financial policies, we must adhere to the lender's policies and are unable to employ borrowed funds at our discretion.

5.1 | Suggestions

Our major problem is political instability which results in the failure of making long-term policies. First, we should bring political stability in our country that a policy opted by a government could run to at least a complete tenure of that government. We should focus on the improvement of our industrial sector which will increase our exports and we can balance our current account. We should focus on the security of our country to attract foreign investors as foreign direct investment increases GDP and rely less on foreign debt.

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