Trade Openness and Poverty: Evidence from a Panel of Developing Countries

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PAPER INFO	ABSTRACT
Published: June, 2022 Volume 3 Issue 1 **Keywords:** Trade Openness, GMM, Pro-Poor Growth, Human Development, Financial Development **Corresponding Author's email:** farzanamunir@bzu.edu.pk	*Trade openness supposes a key component of the strategy for growth. The study consists of 45 developing nations of Asia and Africa. And data ranges from 1995-2020, collected from The World Bank. Theoretically the impact of trade openness on poverty and income inequality is ambiguous. GMM methodology uses to an estimate the result. Findings explore that trade has no direct effect on poverty but inequality associated with trade openness. Economic growth found pro-poor which favors the poor on one side and on trade openness on other side. To get the positive effect of trade on poverty and inequality it does not matter that trade is more open or less open. The fruit depends on the policies regarding trade. Financial development support trade openness along with taxes.*

1.   Introduction

Trade increase growth and growth reduce poverty Bhagwati and Srinivasan (2002) it is generally argued that trade also increase the per capita income and high per capita income increase the economic growth, which not only reduce poverty but also reduce the gap in distribution of income Krueger (2012) showed that import substitution policy had not work. Bhagwati and Srinivasan (2002) explain inequality is a matter for society point of view. Mishel and Bernstein (2007) discussed that the inequality is bad for poor higher inequality produce macroeconomic problems at higher level such as education or heath. The middle class need to borrow and as a result demand for cheap credit increase. Now we come to the point of issue that is trade, poverty, and income distribution. There are various channels which can affect poverty and inequality real income increase due to gain from specialization or exchange. Trade increases the level of innovation in the industrial sector at firm level Berry (2008), and firms able to achieve the economies of scaleViegelahn, Wang, Soete, and Delautre (2017). The static connection between trade openness approach and pay sharing that works by means of rapid to lengthy term adjustments in relation expenses and pay instead of on the dynamic, indirect connection from alternate to development, income disparity, and poor the most important implications of this analysis that either poverty reduce or increase to what extent there are winner or loser due to trade openness. Another aspect of the whole issue is pro-poor growth simply pro-poor growth is benefit of poor from economic growth. There are two concept of pro-poor growth Kraay (2006) first is absolute concept which means head count index reduce the other one is relative concept of pro-poor growth Lopez (2004) which decreasing the inequality Kakwani and Pernia (2000). In all income group

consumer price index used to measure pro-poor growth. Freer trade increases the size of informal sector. Economic difference within the developing countries has become a significant concern of national leaders and development economists in recent years. They need been notably involved with however way the pursuit of economic process has affected the distribution of financial gain adversely within the past or is probably going to try to do in the future. At the same time as maximum economists agree that, in the long run, open Economies honest better in aggregate than do closed ones, many Worry that trade may be detrimental to the poor. Africa stays the poorest continent of the world. The eradication of absolute poverty in the developing world has become a primary coverage goal to most governments and international companies Viegelahn et al. (2017) due to its significance to the general nicely-being of society. Macroeconomic instability is normally terrible for the poor given that it can decrease financial development and destructively affect the dispersion of earnings and create disparities. The contribution and novelty of the study is evident by considering the regression analysis of 45 developing nations of Asia and Africa with the data set that ranges from 1995-2020.

2.   Review of Literature

Bensidoun, Jean, and Sztulman (2011) examined link between income distribution and trade. According to study level of inequality depends on the contents of factor which can change trade. Inequality measured through Gini index. It was found that any change in factor change the trade pattern which had positive or negative effect on inequality of distribution of income. Such as in rich countries increase in capital formation not only effect trade pattern but also redistribute income.

Kurita and Kurosaki (2011) analyzed dynamics of growth, poverty, and inequality. Study empirically investigated the link among variables of Thailand and Philippines. Study was analyzed through household expenditure micro data. Analysis shows consumption changes over time to time that effect poverty and distribution. Results were obtained through GMM suggesting per capita income produce variation in poverty and inequality. Variable used where per capita income, inequality, and poverty. It was founded the relationship depends on province level data for both countries. The data was ranged from 1985-2003. The provinces with higher income inequality had declining trend of inequality in future. So, the province where initial inequality as high now they face lower inequality.

Mahesh (2016) explored the effect of trade openness on income inequality. To analyze the results variables were used Gini, trade, imports, trade volume, import volume, export volume real exchange rate, education, terms of trade and GDP per capita. GMM was used to estimate the results. The relationship between education level and inequality found to be insignificant. Increases in per capita income reduce income inequality. Terms of trade has negative but insignificant relationship with economic growth, trade openness and income inequality have negative relationship. Finally, it was founded trade openness is not a harmful policy for developing nations.

Mitra (2016) examined the link between trade, poverty and inequality in China and India in 1980; s. according to study trade reform always started slowly. The data was taken from World Bank. Regression including instrumental variables were used for estimation the results. According to results there are difference between wage gap and income inequality. It was founded more concentration should be given to the policies in order to get the maximum of trade reforms. Infrastructure and trade reforms can reduce poverty. More investment in infrastructure will be more effective to achieve development.

Tsaurai (2017) examined link between trade openness and human capital. Panel data was used from 1994-2014. For estimating panel cointegration technique was used. The variables were used in analysis were GDP, human development, and trade openness. The study found that in long run human development and GDP increase trade openness. Study also found human development has no direct link with economic growth, while trade openness has direct link with human capital.

Grossman and Helpman (2018) examined the growth and income distribution, according to analysis innovation drive growth and innovation depends on research and development. According to result countries having difference in research productivities, some of them absorb international spillover and getting higher wages. So, the real problem is not hidden in trade openness because free trade is balanced at any time. It was also found capital is mobile those people getting higher wages who adopt this new technology. So, their knowledge makes difference in wages and inequality increase or decrease. So, knowledge rather than trade wider the inequality gap or reduces.

Huchet-Bourdon, Le Mouël, and Vijil (2018) examined the relationship between trade openness and economic growth. The primary objective of the study was to explain that trade openness is a multidimensional concept, and the framework of the efficiency of trade openness is endogenous growth theory through innovation incentives. The data was taken in the averaged form of four years from 1988 to 2014 for unbalance panel of 169 economies. For generalized estimation method of moments GMM was used. The variables used were the ratio to GDP to population, education, life expectancy, the inverse of GDP and export GDP ratio. GDP population ratio was dependent variable while all other variables used for independent variables in order to prove the endogeneity bias due to an omitted variable. Two models were specified including two interaction terms, in the first model interaction of openness interacted with quality while in second model openness interacted with variety. Results show that quality and variety both matters, trade has a negative impact when nations produce low-quality products, the variety of exports have better for economic growth. Other macroeconomic variables as aid for trade also required for the benefits of openness for growth I developing nations, so a higher variety of goods and higher quality of good are needed to get more benefits of openness. Developing nations lack of quality and variety of goods and services to be exported so has less benefit of openness as compared to nations having more quality and variety of goods and services in their trade basket. In conclusion, the literature discussed so far refers to the literature gap in terms of the region of the study which this study is initiated on.

3.   Theoretical Framework

The developing nations think that import substitution industries can be used as a development strategy. Most of the economist think that trade openness will increase GDP of their country. But they ignore an important issue of income inequality. In traditional concept According to Hecksher-Ohlin theory suggests that abundant factor will gain more from trade due to demand of unskilled labor. Due to demand of unskilled labor the wage gap becomes wider between skilled and unskilled labor even if a country is labor abundant. Due to ambiguity of the theory how trade reduce poverty and inequality in distribution of income where labor is an abundant factor they conclude. Trade will increase the poverty especially according to region. Hypothesis and empirics are at ultimate questionable about the connection amongst transparency and development. Does alternate receptiveness make a feature for outright poverty limit previous its consequences for development? Does alternate associated improvement have any influence on poverty? Inequality becomes a very important issue now a day. This problem is very common now days in developing economies and producing ambiguity results. Hecksher-Ohlin loses the value of their theory when the economies are capital abundant. This problem of inequality is more common where out sourcing is present. After 1980's the problem of inequality becomes more common and currently every country wants to openness of trade. The result appears the worsen condition for unskilled labor where outsourcing was high. When we discuss about the poverty consequences of trade openness, we must look both at growth and inequality. Inequality is very harmful if government capacity is very low. Inequality does not have direct impact on poverty it can worse it indirectly if inequality is high Lopez (2004). Long run economic growth will be low this concept rises the issue of pro-poor growth of inclusive growth. The issue of trade and wage gap demonstrated that the demand of skilled labor to increase the wage gap. The neoclassical Hecksher Ohlin model not always explains the shape of skill. The Stolper Samuelsson theorem which derived from Hecksher –Ohlin theory explained that unskilled worker gets more benefit from trade. Hecksher-Ohlin ignored third factor which was natural resources, they

only include two sectors and two factors there is a huge tariff reduction for unskilled labor intensive and finally shift the comparative advantage across the country. It is argued that imports of a nation of a developing economy upgrade their economies through importing capital developing economies enjoy two benefits of trade first one is innovation and other one is increase of exports which increase their economic growth. Trade and economic growth are associated with each other both in short run and long run. This association reduces the poverty and income inequality. Theoretically poverty suppresses the trade openness. The poverty in every economy is the function of illiteracy, backwardness, lack of technology, poor human capital, and infrastructure. The economies facing such type of situation are basically unable to export due to two main reasons. They have no surplus production for exports and if they have, they face the market competition in the form of cost and quality. The higher head count ratio also depicts that the people are unable to purchase the imports, so the trade of economies with high head count ratio remains low. Trade openness affects the poverty through growth. All depends how far and how much it trickles down the poor. Sometime the growth is biased against the poor to increase poverty. In case of income distribution trade openness has redistributive effect, leaving winners and losers Winters, McCulloch, and McKay (2004). Therefore, the net effect is negative and unable to protect the more exposed and weaker components of society for developing economies. Receptiveness to exchange is said with increment in pay imbalance in high-salary nations, and it diminishes inequality in low-pay nations Martin (2003). It is concluded that low-wage import from making nations increment pay imbalance in created nations. A basic Heckscher-Ohlin or Stolper-Samuelson Atolia (2007) model would advocate that the overall come to skills would decline, and with it motivations for coaching, once associate experience rare making nation exposes Wood (1997) but during a third-dimensional Stolper-Samuelson model approximating reality, endogenous development with increasing comes back to R & D Grossman and Helpman (2018). While private credit likewise enters altogether positive in the relapses of fabricated imports as portion of GDP, the effect of private credit on fares is more than twice as large as the effect on imports. Finally, the result of inequality in income distribution shows the increase in inequalities in income does not has significant on international trade. It is difficult to conclude the relationship between inequality and trade because of disparity exists in returns to education and skills. If sign of trade is positive showing because growth is pro-poor and the result appears in high poverty associated with higher trade openness Kraay (2006). Then again, once development is moderate, joblessness is high and swelling is within the twofold digits Lai, Tan, Ong, and Lee (2015). GMM estimators represent negative coefficient of income inequality. In case of developing nation panel, the interaction among human capital formation and inequality seems to be interacted as the model results shows. The inequality in developing nations is more likely to be positive with growth of human development and tax (Castelló-Climent (2010)). The effect of income inequality in developing countries is very high. As income increase the effect of income inequality diminishes. Inequality on one hand effect the level of education and this interaction affects the suitable taxation policy and human development growth. This also results in higher health[1]. This argument often name as "Human Capital Accumulation" redistribution hurts the economic growth[2]. The sign of trade also has positive sign showing increase in tax will open more trade. The structure of assessments influences each the creation and size of exchange, and consequently the methodology exchange issues impact the suitable type of duties. Explanation from creating nation experience unit of estimation advice and concretize the discourse.

4.   Data and Methodology

It is general method of calculating the statistical model in econometrics for panel data. The moments conditions that the parameter having true value with zero expectations. It is in fact a method used for

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[1](Perotti, 1996, Galor and Moav, 2004). Galor and Zeira (1993, 1998)

[2](Okun, 1975).

dynamic model. One of the advantages of GMM is that that it can handle the multidimensional data Roodman (2009). In this method multidimensional countries can be analyzed simultaneously. It is necessary that data must be dimensional finally regression is run on theses dimension. It is a panel methodology of estimation. This methodology can control for endogeneity of lagged dependent variable which means error term and explanatory variables are correlated with each other. GMM control omitted variable bias unobserved panel heterogeneity and measurement error MILEVA (2007).

Panel consists of 45 developing nations of Asia and Africa and data ranged from 1995-2020 collected from World Bank Berg and Krueger (2003). Three dependent variables are trade, poverty, and income inequality. The dependent variables along control variables along their measure are following the data have been taken from WDI the shape of developing countries comprises of two continents Asian and African Countries.

Hypothesis: trade openness has significant effect on poverty and income inequality in developing nations for whole panel including both income and region.

5.   Data Findings and Analysis

5.1   *Panel unit root test*

Before estimating GMM it is necessary to check the reliability of included variables cause the problem of spurious regression. So, first study employs panel unit root test and reliability of variable which study done for this section. Result of table indicate education and credit to private sector making a steady lasting difference Brown (2009),

The results of unit root test are as following

Table 5.1

Panel Unit Root Test

Variable	Levin-Lin chu		Im, Pesaran and Shin W-Stat		ADF-Fisher Chi-Square		Result
	Static	Prob	Static	Prob	Static	Prob	
Trade	-4.815	0.000	137.48	0.000	147.70	0.000	I(0)
Poverty	-3.571	0.000	126.63	0.006	181.56	0.000	I(0)
Gini-Index	-0.227	0.409	126.87	.006	198.79	0.000	I(0)
GDP	-8.031	0.000	176.39	0.000	299.396	0.000	I(0)
Education	56.75	1.000	74.748	0.876	95.512	0.315	I(1)
Credit to private Sector	2.118	0.983	81.250	0.733	71.84	0.920	I(1)
Inflation	-42.295	0.000	277.78	0.000	452.497	0.000	I(0)

The above results show most of variables are steady, Education and credit to private sector makes steady by taking their lasting difference. The main advantage to use Panel cointegration is that this test can be employed even at the time if the sample size is small and have short period of time. The Hypothesis for cointegration is

H_0: ρ =1

H_1: ρ< 1

Null hypothesis shows that there is no cointegration among variables, the study used following tests to find the cointegration among variables. The most often used tests are Panel PP-Static, Panel ADF Static, Group PP-Static and Group ADF- Static. We can accept or reject the hypothesis based on majority of results. The results are given in the following table.

5.2   Panel Cointegration

Table 5.2

Panel cointegration

Test	Test static Value	Probability
Panel PP-Static	-6.5243	0.0000*
Panel ADF Static	-4.4221	0.0000*
Group PP-Static	-5.5031	0.0000*
Group ADF- Static	-3.5553	0.0002*

* Indicates significance at 1%

The results indicate the cointegration among variables showing long run relationship among variables. In next section study differentiate short run and long run analysis of estimations in order to analyze the partial results of variables.

1-   GMM Estimation

For estimation present study employs GMM which has several advantages as given below

It can use different time and different cross section, it gives broader source of variations, the outsource more information, estimate the coefficients with dynamic behavior Arellano and Bond (1991), control heterogeneity, forecast space and time so we can avoid variable bias, best of the available information, test those hypothesis that predict changes.

6.1   Model Specification

The variables used are trade, poverty, Gini-coefficient, financial development, tax as % of GDP, GDP, inflation, population, and human development.

TRADE = f (POV, GINI, FDEV, TAX, GDP, INF, POP) ………………………………..1

POV = f (TRADE, GINI, FDEV, TAX, GDP, INF, POP) …………………...……………2

GINI = f (TRADE, POV, HDEV, TAX, INF, POP) …………………………….…………3

GMM estimations are preferred especially based on two reasons. Firstly, from theoretical point of view, it is assumed that individual factor cannot be included in X_i due to different geographical endowment and GMM methodology controls this problem. Secondly some variables cannot be simultaneously determined with each other and GMM can solve this problem too. GMM includes the lagged of dependent variable Roodman (2009) as independent variable which makes it dynamic Roodman (2009). The cross section along with time series Tóth (2013) gives more information about the results. Collinearly reduce among the independent variables which not only increase degree of freedom and give more efficient results.

Because GMM estimators can fix this problem by taking continuous variables. The main advantage of using GMM is that it provides the interaction Bergh and Nilsson (2010) between trade openness, income inequality and poverty. At every step and main indicator of issue as dependent variable and the independent variable are explanatory and controlling variables. So, the interaction between variables can be found from equation 4, 5 and 6 as follows.

$$TRADE_{i,t} = \alpha_0 + \alpha_1 TRADE_{i,t-1} + \alpha_2 POV_{i,t-1} + \alpha_3 GINI_{i,t-1} + \alpha_4 FDEV_{i,t-1} +$$

$$\alpha_5 TAX_{i,t-1} + \alpha_6 GDP_{i,t-1} + \alpha_7 INF_{i,t-1} + \alpha_8 POP_{i,t-1} + r_i + \vartheta_{i,t} \ldots \ldots \ldots \ldots \ldots \ldots 4$$

$$POV_{i,t} = \beta_0 + \beta_1 POV_{i,t-1} + \beta_2 TRADE_{i,t-1} + \beta_3 GINI_{i,t-1} + \beta_4 FDEV_{i,t-1} + \beta_5 TAX_{i,t-1} +$$

$$\beta_6 GDP_{i,t-1} + \beta_7 INF_{i,t-1} + \beta_8 POP_{i,t-1} + r_i + \vartheta_{i,t} \ldots \ldots \ldots \ldots \ldots \ldots \ldots 5$$

$$GINI_{i,t} = \gamma_0 + \gamma_1 GINI_{i,t-1} + \gamma_2 TRADE_{i,t-1} + \gamma_3 POV_{i,t-1} + \gamma_4 HDEV_{i,t-1} +$$

$$\gamma_5 TAX_{i,t-1} + \gamma_7 INF_{i,t-1} + \gamma_6 POP_{i,t-1} + \vartheta_{i,t} \ldots \ldots \ldots \ldots \ldots \ldots 6$$

6.1.1 Sub-Sahara Africa & Asia

The results of short run and long run along with diagnostic tests of GMM are given below

Dynamic panel model can be written as

$$y_{it} = \alpha y_{i,t-1} + x/\beta + n_i + v_{it}$$

Where two components last have no serial correlation

GMM specifications are as following

- N>t
- Use instrumental variables
- Instruments must be exogenous
- Number of instruments less than or equal to number of groups.
- In difference GMM endogeneity can be remove by differencing regressor while in system GMM problems solve through instruments.

6.1.2 Classification of regressors in GMM

GMM classify regressors into following categories

- The regressors correlated with past error but not with current and future error
- The regressors correlate with past but possibility with present error
- The regressors not correlated with any period.

6.2 Correlation Matrix

Table 6.11

Correlation Matrix

	Trade	Pov	Gini	Fdev	Tax	GDP	Inf	Pop
Trade	1.000							
Pov	0.039	1.000						
Gini	-0.044	0.090	1.000					
Fdev	0.143	-0.337	-0.053	1.000				
Tax	0.234	0.082	-0.099	-0.099	1.000			
GDP	0.186	0.105	0.121	-0.082	-0.138	1.000		
Inf	0.037	0.013	-0.036	-0.072	-0.005	0.008	1.000	
Pop	0.029	0.490	0.246	-0.220	0.029	0.150	0.042	1.000

In above table pair wise correlation represented showing that correlation of trade as percentage of GDP is positive while with inequality it has negative sign. The sign of trade openness with poverty

is due to positive association tax and poverty is positive similarly the sign of in equality with trade and inflation is positive but having negative sign with income inequality. The most important sign of financial development with poverty and income inequality is negative.

Model#1

Table 6.12

GMM results short and long run

Dependent variable Trade Openness Short run	Coefficients	Prob value	Dependent variable Trade Openness Long run	
L.TRADE	0.316**	0.036	----	----
POV	4.465***	0.000	6.526*	0.009
GINI	0.819	0.65	----	----
FDEV	0.866**	0.09	1.266	0.126
TAX	6.715***	0.007	9.815**	0.014
GDP	1.767***	0.001	2.583**	0.012
INF	-0.14**	0.016	-1.452*	0.054
POP	-32.340*	0.095	-47.275	0.165
Constant	-176.1	0.028	----	----
AR(1)	Pr> z = 0.002			
AR(2)	Pr> z = 0.247			
Sargan test	Pr = 0.819			
Hansan test	0.394			
observations	855			
Prob F	0.000			
Number of instruments	22			
Number of Groups	19			

***indicate significant at 1 % level of significance and ** significance at 5 % and * at 10 %

Model#2

Table 6.13

GMM Results Short and Long Run

Dependent variable Poverty Short run	Coefficients	Prob value	Dependent variable Poverty Long Run	
L.POV	0.047	0.660	-----	-----
TRADE	-0.191	0.247	----	----
GINI	-1.256***	0.000	-0.317***	0.000
FDEV	-8.26***	0.000	-0.866***	0.000
TAX	-0.642	0.253	----	----
GDP	-0.072	0.740	-----	-----
INF	-0.004	0.789	-----	-----
POP	14.251***	0.000	14.954***	0.000
Constant	107.46***	0.000	----	----

AR(1)	Pr> z = 0.721
AR(2)	Pr> z = 0.520
Sargan test	0.853
Hansan test	Pr = 0.221
observations	855
Prob F	0.000
Number of instruments	22
Number of Groups	19

***indicate significant at 1 % level of significance and ** significance at 5 % and * at 10 %

Model #3

Table 6.14
GMM Results Short and Long Run

Dependent variable Income inequality Short Run	Coefficients	Prob value	Dependent variable Income inequality Long Run	
L.GINI	----	----	----	----
TRADE	0.191**	0.063	0.591	0.127
POV	-0.653	0.218	----	----
HDEV	-0.305	0.267	----	----
TAX	-1.004	0.090	-3.112	0.186
GDP	0.240	0.280	----	----
INF	-0.081*	0.088	-0.250	0.243
POP	12.018	0.139	37.277**	0.043
Constant	31.512	0.229	----	----
AR(1)	Pr> z = 0.087			
AR(2)	0.595			
Sargan test	Pr = 0.126			
Hansan test	Pr = 0.650			
observations	855			
Prob F	0.000			
Number of instruments	23			
Number of Groups	19			

***indicate significant at 1 % level of significance and ** significance at 5 % and * at 10 %

According to first model in short run increasing growth will increase the poverty both in short run and long run. While income inequality is insignificant in short run and long run. So, inequality does not have significant impact on trade openness. As most of literature favor financial development on trade openness and in this study the results support the empirics that financial development opens

more trade because poor and non-poor able to shift abundant factor that is from labor intensive to capital intensive which not only increase per capita income also increase macroeconomic growth as the results indicates that GDP has positive sign. Financial development significant in short run but becomes insignificant in long run. The result indicating that growth is significant both in short run and long run so in this context growth is pro-poor Kraay (2006) in which poor are getting more benefit of growth. Due to increase in growth in short run and long run we can say the result indicate growth led trade and trade openness also increase. The results also indicate that increase in financial development Jalilian and Kirkpatrick (2002) is significant for trade only for the short run means as financial development increase trade also increase but the important implication in this context is that it is not possible to provide cheap private credit to poor and non-poor over the long period of time. Because taxes are supposed to be a part of policy so both in short run and long run taxes increase the trade. This increase in taxes is due to positive economic growth in short run and long run. Negative sign with inflation indicates that it is better for the poor Kapingura Forget (2017). Population is also significant in short run and in second model dependent variable is poverty. Because poverty is high trade found to be insignificant while results show the inequality is significant and has negative sign means as economic growth increase due to decrease in inequality poverty also decrease both in short run and long run. One of the reasons to reduction in poverty is significance of financial development both in short run and long run. Taxes are insignificant and as a result poverty. Inflation is insignificant but not harmful for poor because of its negative sign. Because financial development is significant in both short run and long run population also increase trade in short run. In short run cheap credit will be available to poor who result in better education and level of skills will be high, which increase the efficiency of poor and increase the productivity. Population becomes insignificant in long run as we already discuss in the result that it is not possible to provide cheap credit to poor over a long period of time. In last model the dependent variable is income inequality. In short run trade increase the income inequality because increase trade will increase the wage gap of people. Because the panel consist on developing nation so human development neither significant in short run nor in long run because lower middle-income group does not have the ability to provide the cheap private credit to the poor neither in short run nor in long run. Because GDP found to be insignificant in short run and long run and found to be insignificant, so due to negative sign with coefficient increase inequality of income. It is found taxes decrease inequality due to its negative sign with coefficient. Taxes are significant only in short run. Inflation increases the inequality. Population found to be insignificant in short run but becomes significant in long run Lehmijoki and Palokangas (2009). All models diagnostic test indicates there is no serious problem in the model.

7.   Conclusion and Policy Recommendations

All three equations after estimation can be concluded as that the link between trade and poverty is indirect through economic growth and financial development (Mustafa, Rizov, and Kernohan (2017)). If economic growth increases the result will be reduction in poverty. So, the important link between trade and poverty in developing economies is economic growth as accelerator effect and financial development which results in decreasing inequality in income distribution in developing economies. Theoretically it is not a single channel. Trade openness may also improve the economic growth and reduces poverty e.g., according to The Hecksher-Ohlin model and Stolper Samuelson theorem supported those changes does not equally distribute among all individuals of developing economies, the question is that who takes the advantage of this reallocation. The exported goods are either produced by urban workers or rural workers, but the result will be decrease in absolute poverty. The explanation clearly describes that all people are not winner some people may face losses and if this will be weaker for poor their income distribution become worsens.

Empirical results suggest that poverty and inequality reduce to the extent of trade openness. Results shows economy either more open or less open regarding to trade is not an important issue. The real issue is policy through which trade less or more open. Finding shows the target of trade is not to

increase the income of poor. The important issue to get the better results is to make policies related to trade such as tariff, financial development, and human development. Financial development should not be a specific group of people it should distributed irrespective of poor and non-poor or lower or upper middle group.

The study recommends that;

- Government should not try to open more trade but also associated with policies linked with tax, financial development, and human development.
- In case of dynamic estimation, the consequences of trade on poverty and income distribution are not direct, domestic credit to private sector should increase, education at every stage not only increase but also the quality of education increase which increase the skills and increase human development.
- Human development not only increases the productivity but also increase the per capita of those educated people who are more skilled. For safety net of people taxes should also increases. This all-dynamic situation will increase economic growth which not only increase trade but also reduce poverty and inequality.

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