

## Growth, Poverty and Openness; An Analysis in South Asian Perspective

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### Abstract

*This Paper assesses the relationship of economic growth and poverty with openness in South Asian region in the light of the basic objectives of WTO (World Trade Organization) which states that openness of trade raises the living standard along with full employment and growing volume of real income. For the purpose seven South Asian countries namely Pakistan, Bangladesh, India, Sri Lanka, Maldives, Nepal and Bhutan are selected in this study. Study period of 53 years has been divided into pre and post liberalization, i.e. 1960-1980 and 1981-2012 to compare this relationship of economic growth and poverty with openness during both periods not only in the region generally but specify the share of individual country in this relationship also. Two options of Fixed effect model are utilized for the purpose. The “slope coefficient constant and intercept varies” and “all coefficients vary across individual cross sectional units”. Results show a significantly positive impact of openness over economic growth and poverty of the region generally and specifically signifies the share of Maldives in affecting growth and of India in affecting poverty as compared to other countries of the region. Gini (income inequality) worsens average income growth and poverty situation and specifically highlights the role of Sri Lanka and Nepal in this context in the region. Unemployment lowers growth and raises poverty of the South Asian region as theory states but Pakistan and Nepal have relatively greater shares in worsening this situation of growth and poverty respectively. During both period economic growth shows a positive impact over poverty and specially during post 80 period when its share is improved in affecting poverty of the region. Here Sri Lanka has relatively more effective role than other countries of the region.*

**Key Words:** *trade openness, economic growth, poverty, unemployment, Gini (income inequality), South Asian region*

Jel Classification: C21,C22,C87, E24, F43, I32,

### 1. Introduction

Globalization is new religion of the world. Basic objectives of GATT (General Agreement on Tariffs and Trade) were reinforced in Marrakech agreement and established WTO (World Trade Organization) in 1995 with the objective “to raise the standard of living, ensure full employment and growing volume of real income” (Naqvi and Zafar, 1995). South Asian countries are also opening up their boundaries in the form of SAPTA (South Asian Preferential Trade Agreement), SAFTA (South Asian Free Trade Area) and SAARC (South Asian Association for Regional Cooperation). South Asian region is third of the world’s poor. Its internal trade is about 5% of its total trade that needs expansion to promote growth rate to follow East Asian economies.

Trade openness policy can contribute to development as it is an important part of the policy package for prosperity, growth and poverty alleviation. While taking into account the relationship of trade, growth and poverty, it is important to see different aspects of trade. For example, Ghana recorded an impressive growth in industrial output while following one set of reforms and a disappointing slow down, following further phase of liberalization. It is important to know the contents of each set of reforms before drawing a conclusion about the relationship of policy change and its impacts.

### **Objective**

World Bank (2002) emphasizes trade openness for developing economies in the context of the 2<sup>nd</sup> wave of globalization (since 1950) and 3<sup>rd</sup> wave of globalization (that began around 1980), on the basis of their technological advancement in transport and communication sectors. It classifies developing countries into more and less globalized according to their adoption of openness policies that increased their per capita growth rate specifically around 80s.

Following the classification of World Bank (2002), 3<sup>rd</sup> wave of globalization, this study divides the period of 1960-2012 into two sub periods that is 1960-1980 and 1981 to 2012. The purpose of this subdivision is to compare generally the relationship of trade, growth and poverty over the whole region and then specify the share of individual countries in this context between the two periods i.e. before and after 80 when third wave of globalisation came into effect with the start of the technological advances and transport-communication sector development in South Asian region.

Further this study divides the topic of trade, growth and poverty into two subsections i.e. trade and growth, and trade, growth and poverty to analyze the relationship of growth and poverty with openness in the South Asian region and also analyze this general relationship in the light of the specific role of separate countries of the region. Two options of Fixed Effect Model are used for this purpose as “the slope coefficient constant and intercept varies across countries” and “all coefficients vary across individual cross sectional units”.

The paper is organized as follows; second section includes literature review, section three includes methodology and estimation, while results and discussion are given in section four. Section five concludes the results and suggests recommendations.

## 2. Literature review

Elimination of trade protection measures, as well as free movement of labor across borders is called liberalization. It allows countries to export their low cost goods in exchange of their high cost production (McCulloch et.al, 2001). The most important benefit claimed by proponents of openness is its effect on economic growth. Classical theory shows that openness accelerates growth through efficient resource utilization that promotes productivity and raises real income. Endogenous growth theory highlights the long run impact of openness on growth through embodied technology, availability of inputs and reduction of networking costs etc (Berg & Krueger, 2003).

Different cross sectional studies check this relationship of different measures of openness and growth and conclude a positive association (Haddad *et al.* 2012, Rodríguez, 2007, Fratzscher and Bussiere, 2004). While some of the studies show absence of this relationship in the short run (Muslehuddin *et al.* 2003 for Pakistan, Siddiqui, 2002 for Bangladesh, Zafar, 2004 for Gabon and Ianchovichina and Martin, 2004 for China). Some other studies as Roderick (1999 a) and Wade (1990) argue that the real reasons for growth are technological advancement and high level protectionist and interventionist industrial policies rather than openness (McCulloch *et al.* 2001).

Poverty is a multidimensional problem that include among other things, social, political and cultural issues (Khan.*et.al* 2010). Economic growth is the most important factor influences poverty. Examples include the relationship of infant mortality rates, the ratio of female to male literacy, average consumption and the incidence of income poverty with per capita income (World Bank, 2000). Modern economic development opens up the possibility for growth to improve the living standards of the poor people. Since the last two centuries, per capita incomes in the richest countries of China, Europe and in South Asia increased in real terms along with the improved indicators of education and health. Differences of the developed and developing countries reflect differences in their economic growth over the long run.

Numerous studies have tried to prove this linkage. One recent study of 80 countries covering a period of four decades, finds that on average the incomes of the bottom one fifth of the population has increased one for one with the overall growth of the economy mainly due to trade (Dollar and Kraay, 2002). Pasha and Palanivel (2003) conclude for Asia a strong positive relationship between growth, trade and poverty reduction and find it highly variable across countries and time periods. Some studies strongly disfavor them and conclude that in the process of trade openness and growth only those get the

benefit who participates in it (Lopez, 2004, and Bhatti, 2001). World Development Report (2001) suggests pro-poor growth to reduce poverty level. Kakwani and Son (2003) criticized World Bank definition of pro-poor growth and suggest a stronger definition. A country can never reduce poverty without any significant increase in exports. Empirical work shows a long run positive impact of trade liberalization policies through growth, on the living standard or incomes of the poor with the condition of complementary pro-poor-growth policies (Lopez, 2004). Otherwise most of the impact of trade results a high income inequality as shown by the study of world after 1980 in the shape of wage inequalities (Bhattarai, 2010, Khan and Rashid, 2010, Berg and Krueger, 2003). Therefore trade openness improves the economic situation of the economies if pro-poor complementary policies are adopted with it.

**3.Methodology and Estimations**

**3.1Methodology**

**Fixed Effect Model**

This paper uses time series, cross sectional data from 1960-2012, for seven South Asian countries. Fixed effect model is used for this panel data. Its estimation depends upon the assumptions regarding intercept and slope coefficients. There are several possibilities but taking two for the time being. One is to see the relationship of different factors over the whole region and the other is to see the impact of different factors of separate countries over the situation of the whole region. These are:

- i) **Slope coefficient constant and intercepts vary across individual cross sectional units as;**

$$Y_{it} = i\alpha_i + X_{it}\beta + \varepsilon_{it} \tag{1}$$

t = 1, ..., T, time period and i denotes different cross sectional units

The term Fixed indicates that the intercepts does not vary over time but vary across individual cross sections.  $\alpha_i$  is treated to be an unknown parameter to be estimated that embodies all the observable effects and specifies an estimable conditional mean. There are k regressors, in  $X_{it}$ ; i denote different cross sections while “t” denotes time series. Formulation assumes that differences across units can be captured in differences in the constant term and  $\varepsilon_{it}$  follows the classical assumption namely  $E(\varepsilon_{it}) \sim N(0, \sigma^2)$

. Due to the use of dummy variable technique it becomes as

$$Y_{it} = D\alpha_i + X_{it}\beta + \varepsilon_{it} \tag{2}$$

$D = [d_1, d_2 \dots d_n]$

Differences in intercepts of the countries show their different economic situation here. It is also called as least squares dummy variables (LSDV) technique.

## ii) All coefficients vary across individual cross sections

If we extend our least squares dummy variables (LSDV) Model i.e. multiply each of the country's dummy by each of the X variables, the Model will be as follows:

$$Y_{it} = D\alpha_i + X_{it}\beta_i + \varepsilon_{it} \quad (3)$$

Here the intercepts and the slope coefficients are assumed to be different for all cross sections.  $\beta_i$ 's are the differential slope coefficients, just as  $\alpha_i$ 's are the differential intercepts (Gujarati, 2003).

## 3.2 Estimations

### a. Filling the Gaps

Time series, cross sectional data is used in this study from 1960-2012, for South Asian countries namely Pakistan, Bangladesh, India, Sri Lanka, Nepal, Bhutan and Maldives. The selected variables are, poverty head count index (\$2 per day), trade openness, economic growth, unemployment and income inequality (Gini). The original data is with gaps, following the suggestions of Povcal net and Sutcliffe (2004) interpolation is used to fill the gaps, then linear trends are calculated from known data points (in SPSS). Then this panel data was used to study the dynamics of changes. For estimation and analysis E-views 9 econometric software has been used. On the basis of theory we expect in this study that openness will raise incomes growth and lowers poverty while gini (income inequality) and unemployment will lower growth and raise poverty in the region. It is also expected that per capita income growth will lower poverty of the region. Further in the pre 80 period these results are expected to show a weak and in the post 80 period a strong impact over the whole South Asian region. Variables and data sources are given at the end of paper.

### b. Division of Time Period

Following World Bank (2001) the panel data is divided into pre and post 1980 periods i.e. 1960-80 and 1981-2012 to compare the relationship of openness with growth and poverty between the two periods for South Asian countries.

### c. Division of the topic

To analyze the relationship, following Dollar and Kraay (2004) the topic of trade, growth and poverty has been divided into two subsections i.e. “trade and growth”, and “trade, growth and poverty”. Using the above methodology the estimations are as:

**Fixed Effect Model (FEM)**

Using Fixed Effect Model, with the option as;

- i) Slope co-efficient constant, but the intercepts vary across individual cross sectional (country units);**

**Growth Equation**

Using equation (2) to see the impact of openness along with other factors on growth, we have;

$$YPG = d_{(PK)} + d_{(IND)} + d_{(BD)} + d_{(SRL)} + d_{(MLD)} + d_{(NP)} + d_{(BTN)} + \beta(Openness)_t + \beta(Gini)_t + \beta(Unemployment)_t + \varepsilon_{it} \quad (2.1)$$

Where  $i = 1 \dots 7$ , and  $t = 1, \dots, 53$

$d_i$ = dummies, PK = Pakistan, BD = Bangladesh, Ind = India, Srl = Sri Lanka, Np= Nepal, Btn = Bhutan, Mld = Maldives. YPG = Growth of real Per Capita income. Gini = Gini index (income inequality). UN = unemployed persons as percentage of total labor force.  $\Sigma$  = Error term-captures the effect of omitted variables.

**Poverty Equation**

To see the impact of openness, growth and other factors on poverty, again using equation (2) we have:

$$POV = d_{(PK)} + d_{(IND)} + d_{(BD)} + d_{(SRL)} + d_{(MLD)} + d_{(NP)} + d_{(BTN)} + \beta(Openness)_t + \beta(Gini)_t + \beta(YPG)_t + \beta(Unemployment)_t + \varepsilon_{it} \quad (2.2)$$

Where “Pov” is Poverty head count index, as absolute poverty at 2\$ per day.

- ii) All co-efficients vary across individual cross sectional units.**

### Growth Equation

Using equation (3) for growth equation as follows:

$$YPG = d_{(PK)} + d_{(IND)} + d_{(BD)} + d_{(SRL)} + d_{(MLD)} + d_{(NP)} + d_{(BTN)} + \beta_i(Openness)_{it} + \beta_i(Gini)_{it} + \beta_i(Unemployment)_{it} + \varepsilon_{it} \quad (3.1)$$

$\beta_i X_{is}$  show different countries' variables and coefficients. For example:

$$\beta_1(OP) \text{ of Pak, } \beta_2(OP) \text{ of BD, } \beta_3(OP) \text{ of India, } \beta_4(OP) \text{ of SrL, } \beta_5(OP) \text{ of Nepal, } \beta_6(OP) \text{ of Bhutan and } \beta_7(OP) \text{ of Maldives}$$

### Poverty Equation

For poverty equation again using equation (3) we have:

$$POV = \alpha + d_{(PK)} + d_{(IND)} + d_{(BD)} + d_{(SRL)} + d_{(MLD)} + d_{(NP)} + d_{(BTN)} + \beta_i(Openness)_{it} + \beta_i(Gini)_{it} + \beta_i(YPG)_{it} + \beta_i(Unemployment)_{it} + \varepsilon_{it} \quad (3.2)$$

## 4. Results and Discussion

53 years' time is divided into two parts, Pre and post 1980 period. Table I shows the results of growth and poverty relationship with openness of the whole South Asian region. Table 2 shows different countries' share of this openness in the economic growth and poverty situation of the whole region.

Results of Table 1 show that trade openness raises growth of the economies of the whole region during both periods. During pre-80 periods the share of openness is less that has been improved in the post 80 period along with its significance. On the other hand, openness of South Asian countries reduces poverty in the region during both periods significantly. Again this relationship is weak in the pre liberalisation period as compared to the post 80 period result. Although the relationship of openness is not strong enough with growth and poverty of the region but it will be interesting to know that how much individual South Asian countries have share in it. Results of table 2 show that Pakistan in the pre80 period and Maldives in the post 80 period has higher share in the region as compared to other countries. In case of Bangladesh, India and Maldives the situation of openness policies have been improved while such policies of Pakistan, Sri Lanka, Bhutan and Nepal are unable to support the growing needs of the economies of the region. In case of poverty reduction, openness of Pakistan has greater role than other countries in the pre-80 periods but in the post 80 period openness of India has a

much greater share in the region. Whereas the impact of openness of all South Asian countries has been improved in the post 80 period to reduce poverty.

**Table I**  
**Fixed Effect Model**

		Growth Equations		Poverty Equations	
Independent Variables		Pre Liberalization Period (1960-1980)	Post liberalization Period (1981-2012)	Pre Liberalization Period (1960-1980)	Post liberalization Period (1981-2012)
Trade openness		0.004(.7)	0.02(2.8)*	-0.02(5)*	-0.05(6)*
Gini		-0.2(12)*	-0.1(3.1)*	0.6(47)*	0.3(11)*
Unemployment		-0.4(2.1)**	-0.1(1.2)		-0.08(2)**
Economic Gro				-0.01(0.4)	-0.1(2)**
<b>Specific Intercepts</b>	Pakistan	4.2	7.2	66.7	36.5
	Bangladesh	-0.01	7.1	67.7	52.2
	Sri Lanka	11.3	10.1	34.9	-8.6
	Bhutan	2.9	11.3	13.0	-1.3
	India	2.4	8.9	69.2	43.1
	Maldives	-3.2	11.3	18.1	29.2
	Nepal	3.1	6.7	68.3	45.6
R <sup>2</sup>		0.7	0.3	0.9	0.9
No of obs.		147 (bal)	224 (bal)	140(bal)	224(bal)
D.W. Stat.		2.1	1.7	1.6	1.6
SE of Regression		2.8	2.5	1.5	2.7

\*, \*\*, \*\*\*, mean significant at 1%, 5%, and 10% respectively. Values in parentheses are “t” values.

It all concludes that trade openness alone is not sufficient to raise economic growth and reduces poverty of the region until it is supported by the pro-poor growth policies.

Table 1 show that income inequality (Gini) reduces income growth and raises poverty in the region during both periods. A good symptom is that this impact of inequality has been reduced in the post 80 period both for growth as well as poverty. Results of table 2 show that Indian inequality has a greater share in worsening economic growth of the region in the pre-80 periods which has been shifted to Sri Lankan economy in the post 80 time. It shows the improvement of Indian development policies to support the economy. On the other hand, inequality of all the countries show a stronger impact to worsen poverty of the region in the post 80 period as compared to the pre80 period. In this context inequality of Nepal raises poverty of the region more than other countries. It again signifies the adoption of complementary policies along with openness policies otherwise benefits of openness will be captured by only specific groups that will further worsen growth and poverty situation in the region.

**Table 2**

**Fixed Effect Model, all coefficients vary case.**

		<b>Growth Equations</b>				<b>Poverty Equations</b>			
		<b>Pre Liberalization Period (1960-1980)</b>		<b>Post liberalization Period (1981-2012)</b>		<b>Pre Liberalization Period (1960-1980)</b>		<b>Post liberalization Period (1981-2012)</b>	
<b>Var</b>	<b>Countries</b>	<b>I</b>	<b>II</b>	<b>I</b>	<b>II</b>	<b>I</b>	<b>II</b>	<b>I</b>	<b>II</b>
<b>Trade Openness</b>	Pakistan		0.5(2.5)*	0.1(1.7)		-0.1(2.8)*		-0.2(2.8)*	-0.1(2.1)*
	Bangladesh		-0.5(1.3)	0.1(1.7)		-0.1(0.7)		-0.1(1.2)	-0.2(4.4)*
	Sri Lanka		0.03(0.6)	-0.5(1.1)		-0.0(0.7)		0.2(1.4)	0.3(5.4)*
	Bhutan		0.1(4.0)*	0.03(1.4)		-0.02(0.8)		-0.01(0.4)	-0.1(2.3)*
	India		-0.1(0.3)	0.1(3.8)*		0.3(1.6)		-0.4(15)*	-0.5(18.3)*
	Maldives		.04(0.9)	0.3(4.4)*		-0.0(1.2)		-0.02(0.9)	0.01(0.4)
	Nepal		0.04(0.3)	0.02(0.4)		0.0(0.3)		0.4(3.3)*	-0.2(0.8)

<b>Gini</b>	Pakistan	0.17(0.6)		0.1(1.2)			-0.06(0.9)	-0.6(0.9)	
	Bangladesh	-0.04(0.91)		-0.2(1.3)			0.3(2.6)*	0.9(3.3)*	
	Sri Lanka	-0.57(1.5)		-0.3(2)**			-0.0(2.1)**	1.4(2.3)*	
	Bhutan	-0.15(7.3)*		-0.01(0.2)			0.6(9.1)*	0.7(7.9)*	
	India	-0.9(0.5)		0.01(0.02)			0.2(3.5)*	0.3(1.4)	
	Maldives	-0.17(12)*		-0.2(3.4)			0.0(0.2)	0.2(13.8)*	
	Nepal	0.13(0.2)		0.2(0.7)			0.0(1.4)	8.4(12.5)*	
<b>Unemployment</b>	Pakistan		2.1(1,2)		-0.4(2.2)**	4.4(12.8)*	4.4(11.1)*		-1.3(2.4)*
	Bangladesh		-2.6(0.6)		1.4(10)*	-5.6(4.4)*	-3.0(2.9)*		1.7(1.3)
	Sri Lanka		-0.7(1.3)		-0.2(3)*	3.9(9.9)*	3.9(3.9)*		2.4(23.3)*
	Bhutan		-0.5(0.6)		1.8(3.4)	-12.3(12.8)*	-4.3(6.1)*		-5.8(2.4)*

	India		5.3(0.4)		0.6(0.6)	-39.5(6.7)*	-41.3(9.5)*		0.6(0.9)
	Maldives		14.8(6)*		-0.2(1.1)	-49.5(9.9)*	-49.5(10)*		-0.5(8.9)*
	Nepal		0.9(0.6)		-0.2(0.8)	0.6(5.9)*	0.6(6.9)*		3.8(3.1)*
<b>Economic growth</b>	Pakistan					0.04(0.9)		-0.3(1.0)	
	Bangladesh					0.04(0.7)		-0.0(0.0)	
	Sri Lanka					0.0(0.5)		-2.1(2.7)*	
	Bhutan					-1.6(6.2)*		-0.3(1.2)	
	India					-0.01(0.1)		-0.1(0.5)	
	Maldives					-0.0(0.3)		-0.0(0.1)	
	Nepal					-0.0(0.9)		-0.7(1.8)***	

Specific intercepts	Pakistan	-3.1	10.4	-1.9	4.0	80.1	77.9	105.8	74.6
	Bangladesh	1.8	-22.8	9.1	-1.3	100.4	83.1	55.99	95.8
	Sri Lanka	27.7	14.3	18.8	6.7	-8.7	-8.7	23.10	-0.77
	Bhutan	14.9	0.8	3.1	1.3	85.8	21.1	13.3	68.99
	India	4.6	18.2	0.8	2.6	203.5	203.9	81.6	90.1
	Maldives	14.8	-15.7	-33.	3.6	123.8	123.8	73.6	84.4
	Nepal	-5.0	-6.7	-5.8	3.1	90.23	90.2	-225.02	72.1
R <sup>2</sup>	0.9	0.9	0.6	0.6	0.9	0.9	0.9	0.9	
Observe	147(bal)	147(bal)	224(bal)	224(bal)	147(bal)	147(bal)	224(bal)	224(bal)	
D.W.Stats	2.1	2.2	1.9	1.9	1.6	1.8	1.6	1.6	

\*, \*\*, \*\*\*, mean significant at 1%, 5%, and 10% respectively. Values in parentheses are “t” values.

Unemployment during both period reduces growth and poverty as our results of table 1 show. This impact has been reduced in the post 80 period. Unemployment of Bangladesh badly affects growth of the region as compared to other countries in the pre-80 periods and in the post 80 period Pakistan has a bigger role in this impact. Employment policies of all the countries are showing lack of such support to promote growth in the region as shown by the post 80 period results that the effect of unemployment has been increased in reducing growth.

Unemployment of Pakistan in the pre-80 periods and of Nepal in the post 80 period raises poverty of the region mostly as compared to other countries. On the whole situation of unemployment has been handled to some extent by all countries to reduce its impact to raise poverty of the region. It means that if supplementary policies could not support openness, then open boundaries of the markets will raise an uncontrolled unemployment of the untrained and unskilled labour class of the region.

Economic growth reduces poverty in both periods in the region as results of table 1 show. This relationship of growth with the reduction of poverty is improved in the post 80 period. In case of individual countries, Bhutan in the pre-80 and Sri Lanka in post 80 period have important share in reducing poverty of the region significantly. On the whole the impact of growth over poverty of the region has been improved in the post 80 period but still needs effective pro-growth policies to support poor in the region along with trade openness policies.

These results confirm the existing literature that openness depends not only on its own full implementation but is also affected by the effectiveness of the other variables' impact, their relative importance and implementation in the relative countries (Ianchovichina and Martin, 2004, Dowrick and Jane, 2004, Bekaert, *et al*, 2009, Billmier and Tommaso, 2007, Rodríguez, 2007, Romalis, 2006, Musleh-ud-Din *et al*, 2003, Hertel *et al*, 2004, Kemal, *et al*, 2001, Pasha and Palanivel, 2003).

It ensures the effective implementation of pro-poor policies for lowering poverty in the region. Specific intercepts of the countries show their specific economic situations at the start of the time,  $R^2$  show good relationship of the variables and  $D.W$  statistics also shows absence of heteroscedasticity. Standard errors of regressions are also being given in table 1.

## **5. Conclusion and Recommendations**

### **Trade Openness**

Generally, openness shows a significantly positive relationship with growth and poverty and signifies the share of openness of Maldives with growth and of India with poverty in the region. Generally, its less than expected share suggests the adoption of complementary macroeconomic policies along with pro-poor openness policies in different countries according to their relative circumstances.

### **Gini (Inequality)**

On the whole Gini concludes a worsening impact over average income growth and poverty situation but specifically highlights the role of Sri Lanka and Nepal in this context in the region. It is important for policy makers, interested in poverty reduction,

to link the rate of growth and the proportion of any increment to growth captured by the poor. It satisfies the empirical literature of openness, that openness policy without complementary policies worsens income distribution that enhances poverty.

**Unemployment**

Results show that unemployment lowers growth and poverty of the South Asian region. Pakistan and Nepal have relatively greater shares in worsening this growth and poverty situation of the region. Openness is favored mostly for its increase in employment opportunities to raise incomes, the standard of living and welfare of the people. But unemployed persons are mostly affected by not following the effective policies by the concerned economies.

**Economic Growth**

During both period growth shows a good impact over poverty and specially during post 80 period when its share has also been improved in affecting poverty of the region. In this case Sri Lanka is playing its role more effectively than other countries of the region. In case of South Asian region effective pro-poor growth policies can help to eliminate poverty.

<b>Variables and Data Sources</b>		
<b>Variables</b>	<b>Discription</b>	<b>Data Sources</b>
Trade Openness	Exports and imports as ratio of real GDP, PPP at constant 2005,international \$	WDI (2013)
Economic Growth	Growth of real Per Capita GDP as dependent variable	PWT 7 version and WDI (2013)
Gini	Gini index as a measure of inequality	Povcal Net, and WDI (2013)
unemployment	Unemployed persons as a percentage of labor force	WDI (2013)
Poverty	Absolute poverty line, \$2.25 per day considered as at about \$2 per day poverty line based on purchasing power parity (PPP) in 2005 international prices	Povcal Net, and WDI (2013)

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