

## **The Role of Religion in Economic Development**

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### **Abstract**

The discourses on economic development is mostly focussed on role of natural resources, human resources etc in predicting the growth pattern. The noneconomic factors like religion have been considered as having indirect role in determining the economic development. This paper aims to analyse the role of religion in the economic development. The analysis has been done based on GDP per capita and consumption data and on the world values survey data on religious denomination. The religious denomination is used to decide the dominant religion in the country. It is found that religion has a negative impact on the economic development of a country because the religious practices acts as a hindrances in promoting economic activity.

Keywords: Economic Development, GDP per capita, World Values Survey

### **Introduction**

The theories of economic development focus on role of natural factors, technology, learning and human resources in analysis. The noneconomic factors such as culture, religion etc. are considered as having indirect role on economic development and are usually not considered in analysis. In much of the developmental work religion has been considered as playing a marginal role Economic development of a country or region is normally considered to depend on its economic factors. However in most of the cases a noneconomic factor is necessarily present and plays an important role in the development process. The events of September 11, emergence of ISIS and the clash in different parts of the world have highlighted how significant and powerful is the linkage between religion and other aspects of life. The faith of people in different beliefs and constructs pose both as a threat and opportunity for the society.

*"For given religious beliefs, increases in church attendance tend to reduce economic development. In contrast, for given church attendance, increases in some religious beliefs -- notably heaven, hell, and an afterlife -- tend to increase economic development."*

This quote has been taken from Robert Barro and Rachel Mc Cleary's work on cross- country analysis of impact of religiosity on economic development.

The main complexity of the Hyper-modernity is Religion; means the main problem is to deal with the religious behaviour of the community/society. We are living in a transitional society where we are moving from period of industrialization to post-industrialization and from

modernization to post-modernization. This poses greater challenge to understand the cultural transition. Modern society has experienced major changes but the basic theme has not been changed. Perhaps the reason for this is that the cultural transition takes several decades to happen and we are so strongly associated with our culture that it's not easy for the change to happen.

This article focuses on the topic, perhaps which has been neglected in deciding the development paradigm: the role of religion in economic development. We wish to evaluate the different aspects of the complex relationship between religion and economic development.

### **Defining Key Concepts**

**Religion:** The practice of believing in a 'Supreme' power which is defined differently by different customs, traditions and values

**GDP:** according to the World Bank, gross domestic product is defined as the measures of the total output of goods and services for final use occurring within the domestic territory of a given country, regardless of the allocation to domestic and foreign claims.

**Waves in WVS:** These are the aggregate time period in which the world value survey has taken place. The latest one is wave6 (2010-2014).

**Consumption Expenditure:** It is the spending of households, government, and others on consumption of goods and services in a reference period.

**Dependent Variable:** The variable which is to be governed or determined in the model.

**Independent variable:** The variable/s which determine the value of dependent variable in the model.

**Dummy variable:** it is a numerical variable used in regression analysis to represent the sub-groups of the sample in the study. Normally 0 is assigned for the absence of an attribute and 1 is assigned for the presence of the attribute.

### **Review of Literature**

In a group consisting of developed, emerging and transition countries church attendance and religious belief affect the growth rates of real per capita GDP for the decade- 1965-1975, 1975-1985, and 1985-1995(Barro and McCleary). Belief in hell appears to positively contribute to economic development (Barro and McCleary, 2003, 773 and McCleary and Barro, 2006, 67). Church attendance has negative impact on Economic development. Islam and Confucianism has positive influence on growth (Sala-i-Martin, Doppelhofer, and Miller, 2004). Growth is related negatively to Jewish, Protestantism and Catholicism for the period 1970-1990 (Noland, 2005). There is a two-way relationship between religion and development (Tawney, 1926). Kapp (1963) and Mishra (1962) examined the relationship between Hinduism and Development in the context of India. They concluded that the beliefs, values and customs of Hindu tradition negatively affected the economic development for the country.

### **Aim of the Study**

The aim of the study is to find out the effect of Religion on Economic development

### **Hypothesis**

Ho: There is no relationship between Religion and Economic Development

H<sub>1</sub>: There is relationship between Religion and Economic Development

### **Data**

The analysis is done on secondary data of World Values Survey and World Bank. The data whether the country is religious or not is collected from the Wave 6 (2010-2014) of the World Values Survey. The data of 'Religious Denomination' is used for the purpose of deciding the Religion of the country. In the raw format the data is available for different countries and the percentage of population following a specific religion. For the purpose of analysis if more than 50% of the population of that country follows a specific religion that religion is considered to be the religion of the country. The countries are listed based on several religions like Roman Catholic, Protestant, Orthodox, Hinduism, Buddhism, and Muslim etc. For the purpose of analysis the religion is divided into four subcategories of 'Not Specific', Roman Catholic, Muslim, Orthodox and Others. These are labelled as '0', '1', '2', '3' and '4' respectively. The 'Not Specific' category includes the countries in which no specific religion is followed by the majority population and 'Others' category includes the religion which are followed in one or two countries only and has not been separately categorized.

The data for GDP per capita and Consumption per capita is collected from World Bank. The data for the two variables is used for the period from 2010- 2014 and the average of the five years is used for the analysis.

### **Methodology**

The relationship between Religion and Economic Development is analysed with the help of secondary data. The following modelling has been done:

### **Modelling**

$$\ln \text{GDP}_{\text{PCAVG}} = \beta_0 + \beta_1 \ln \text{Consumption}_{\text{PCAVG}} + \beta_2 D_1 + \beta_3 D_2 + \beta_4 D_3 + \beta_5 D_4 + \mu$$

where,

$\ln \text{GDP}_{\text{PCAVG}}$  = Natural log of Average of Per Capita Gross Domestic Product for the period 2010- 2014

$\ln \text{Consumption}_{\text{PCAVG}}$  = Natural log of Average of the Per Capita Consumption Expenditure for the period 2010- 2014

$D_1 = 1$  if the religion of the country is Roman Catholic  
= 0 otherwise (country has other religion)

$D_2 = 1$  if the religion of the country is Muslim

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= 0 otherwise (country has other religion)

$D_3=1$  if the religion of the country is Orthodox

= 0 otherwise (country has other religion)

$D_4=1$  if the religion of the country is Others

= 0 otherwise (country has other religion)

$\mu$ = Error Term

## Result and Analysis

Test of Normality:

The figure (figure 1) below shows that the data is bell-shaped and hence we can conclude that the data is Normally distributed.

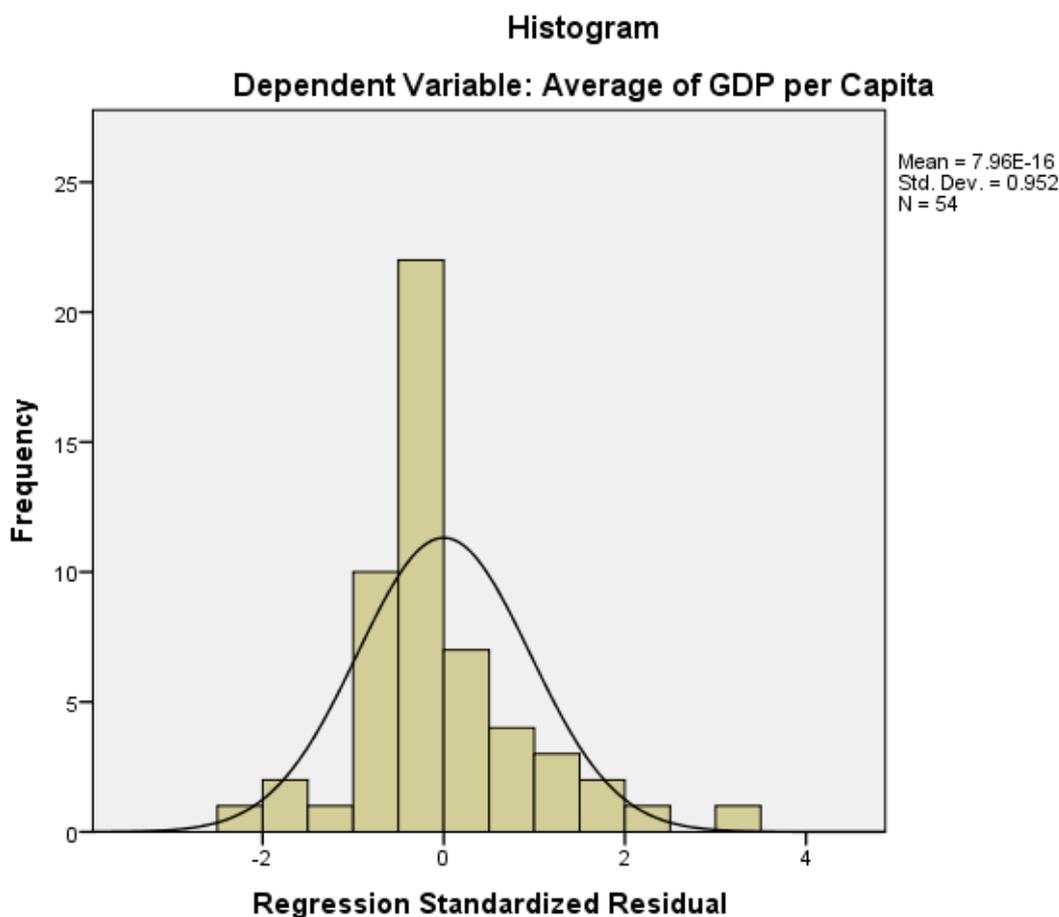


Figure 1.

**Test of Autocorrelation:**

The value of Durbin-Watson test is used to detect the Autocorrelation. As we can see from the below table (Table 1) that the value of Durbin-Watson is very close to 2 we can say that there is no problem of Autocorrelation.

**Model Summary<sup>b</sup>**

Model	R	R Square	Adjusted Square	R	Std. Error of the Estimate	Durbin-Watson
1	.649 <sup>a</sup>	.421	.360		.99490	1.953

a. Predictors: (Constant), Others Dominant Country, lnCon, Orthodox Dominant Country, Religious Catholic Dominant Country, Muslim Dominant Country

b. Dependent Variable: lnGDP

**Table 1**

Test of Multicollinearity:

The test of multicollinearity is done by taking one of the independent variables and doing the collinearity statistics with the other independent variables. The same is done for each independent variable. The result of the collinearity statistics is show below in the five tables.

**Coefficients<sup>a</sup>**

Model		Collinearity Statistics	
		Tolerance	VIF
1	Muslim Dominant Country	.720	1.389
	Religious Catholic Dominant Country	.735	1.361
	Orthodox Dominant Country	.818	1.222
	Others Dominant Country	.818	1.222

a. Dependent Variable: Average of Consumption per Capita

**Table 2**

**Coefficients<sup>a</sup>**

Model		Collinearity Statistics	
		Tolerance	VIF
1	Religious Catholic Dominant Country	.908	1.101
	Orthodox Dominant Country	.926	1.080
	Others Dominant Country	.928	1.078
	Average of Consumption per Capita	.976	1.025

a. Dependent Variable: Muslim Dominant Country

**Table 3.**

**Coefficients<sup>a</sup>**

Model		Collinearity Statistics	
		Tolerance	VIF
1	Orthodox Dominant Country	.906	1.103
	Others Dominant Country	.909	1.100
	Average of Consumption per Capita	.935	1.070
	Muslim Dominant Country	.852	1.173

a. Dependent Variable: Religious Catholic Dominant Country

**Table 4.**

**Coefficients<sup>a</sup>**

Model		Collinearity Statistics	
		Tolerance	VIF
1	Others Dominant Country	.862	1.159
	Average of Consumption per Capita	.927	1.079
	Muslim Dominant Country	.774	1.292
	Religious Catholic Dominant Country	.807	1.239

a. Dependent Variable: Orthodox Dominant Country

**Table 5**

**Coefficients<sup>a</sup>**

Model		Collinearity Statistics	
		Tolerance	VIF
1	Average of Consumption per Capita	.923	1.084
	Muslim Dominant Country	.772	1.295
	Religious Catholic Dominant Country	.806	1.241
	Orthodox Dominant Country	.859	1.165

a. Dependent Variable: Others Dominant Country

**Table 6**

From the above tables (Table 2, Table 3, Table 4, Table 5 and Table 6) we can see that the Variance Inflation Factor is very small. The predictor variables or independent variables are said to be correlated if the Variance Inflation Factor is more than 10. The tolerance is reciprocal of Variance Inflation Factor. So, any of the two values can be used for the detection of multicollinearity. As the value of Variance Inflation Factor is small in all the cases there is no problem of multicollinearity.

**Test of Heteroscedasticity:**

The scatter plot of the data showed that the data was heteroscedastic. To remove the problem of heteroscedasticity we took the natural log of the Average of Per Capita Gross Domestic Product

for the period 2010- 2014 ( $\ln GDP_{PCAVG}$ ) and Natural log of Average of the Per Capita Consumption Expenditure for the period 2010- 2014 ( $\ln Consumption_{PCAVG}$ )

**Regression Analysis:**

The result of the regression analysis is depicted in the table below (Table 7). The R square value is .421 which can be considered as a small. The adjusted R square value is .360 which shows that the model is mis-specified. There may have the problem of misspecification in the units of variable taken or we can also say that this behavioural aspect cannot be fully captured. Instead we can give theoretical explanation for such phenomenon on the basis of our observation and the results obtained from the model.

**Model Summary<sup>b</sup>**

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.649 <sup>a</sup>	.421	.360	.99490

a. Predictors: (Constant), Others Dominant Country, lnCon, Orthodox Dominant Country, Religious Catholic Dominant Country, Muslim Dominant Country

b. Dependent Variable: lnGDP

**Table 7**

From the table 8 we can see that the coefficients have negative value except the lnCon value. This shows that the Consumption has positive influence on the economic development whereas the religion has negative effect on the economic development. The negative coefficients show that religion acts as a hurdle in the economic development. Further the p-value (Sig.) in the table shows that it is significant for lnCon (.001), Muslim Dominant Country (.007) and Others Dominant Country (.013) at 5% level of significance. The Religious Catholic Dominant Country becomes significant (.066) at 10% level of significance. Therefore, in all the four cases (ln Con, Muslim Dominant Country, Religious Catholic Dominant Country and Others Dominant Country) the null hypothesis that theses religions have no effect on the economic development is rejected and the alternative hypothesis that religion has effect on economic development is accepted. In the case of Orthodox Dominant Country the p-value is insignificant (.356) so no generalized predictions can be made about the orthodox dominant country.

**Coefficients<sup>a</sup>**

Model	Unstandardized Coefficients		Standardized Coefficients	T	Sig.	
	B	Std. Error	Beta			
1	(Constant)	2.140	2.158		.992	.326
	lnCon	.289	.081	.421	3.562	.001
	Muslim Dominant Country	-1.093	.386	-.389	-2.828	.007
	Religious Catholic Dominant Country	-.718	.381	-.242	-1.882	.066
	Orthodox Dominant Country	-.455	.488	-.116	-.932	.356
	Others Dominant Country	-1.256	.486	-.320	-2.582	.013

a. Dependent Variable: lnGDP

**Table 8**

## **Conclusion**

The analysis shows that religion is a factor in determining the economic development but the effect is small. The effect of religion on economic development is negative; this shows that religion acts as a hindrance on economic development. The hindrance may be in the form of social customs, taboos and other religious practices associated with religion. The restrictions imposed by religion on individuals and society hinder the individual and society to take economic activities which promote growth. The role of religious institutions and leaders have been little understood and insufficiently explored. The religion and economic development has been considered as two extremes based on preconceived ideas and misinformation. There is enough scope for dialogue between the two and a reconciliation of the two extremes. There is need to move from strict compartmentalization to a cross disciplinary approach which highlights the role of social and cultural institutions in explaining the economic development.

## **References**

1. Hargrove, B. (1988). Stable URL: <http://www.jstor.org/stable/3711142> Linked references are available on JSTOR for this article : Religion , Development , and Changing Paradigms \*. *Sociological Analysis*, 49, 33S–48S.
2. Marshall, K. (2001). Development and Religion: A Different Lens on Development Debates. *Peabody Journal of Education*, 76(3/4), 339–375.
3. Montgomery, J. (1997). Toward a Joint Theory of Religion and Economic Development : Comment Author ( s ): James Montgomery Source : Journal of Institutional and Theoretical Economics ( JITE ) / Zeitschrift für die gesamte Staatswissenschaft , Vol . 153 , No . 1 , The New Instit. *Journal of Institutional and Theoretical Economics (JITE) / Zeitschrift Für Diegesamte Staatswissenschaft*, 153(1), 72–75.
4. PALANCA, E. H. . (2017). Religion and Economic Development Author ( s ): ELLEN H . PALANCA Source : Philippine Studies , Vol . 34 , No . 2 ( Second Quarter 1986 ), pp . 162-180 Published by: Ateneo de Manila University Stable URL : <http://www.jstor.org/stable/42633590>, 34(2), 162–180.
5. Rao, M. S. . (1969). Indian Sociological Society Religion and Economic Development Author ( s ): M . S . A . Rao Published by: Indian Sociological Society Stable URL : <http://www.jstor.org/stable/23618700>. *Sociological Bulletin*, 18(1), 1–15.
6. World Bank Data
7. World Values Survey Data