

# THE STUDY ON EXPLORING THE RELATIONSHIP BETWEEN EDUCATION LEVEL AND POVERTY IN RURAL SECTOR IN PUTTALAM DISTRICT

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## Abstract

Diverse literature at local and international level has indicated considerable relationship between education and poverty. The study mainly focuses on exploring the ability of rural youth in knocking down the poverty where matured households are less educated. Survey has conducted based on four divisional secretariats in Puttalam District (Karuwalagaswewa, Chilaw, Kuliypitiya and Dankotuwa) from January to December in 2010. Generally Puttalam district has recognized as the one of the poorest districts in Sri Lanka. Three hundred households were randomly selected for the sample and survey strategy being utilized with interviews to serve triangulation in data collection. The study attempts to develop a model giving special emphasis on the fixed assets ownership, years of primary / secondary education and the monthly income level. The findings of the study indicates that level of education among the selected rural sector matured households make positive impact on the income generated by the youth concerned. However in positive perspective it is recognized that substantial increase in level of schooling and participation in educational activities among youth. In addition to that fixed asset ownership and extent of the assets ownership of has deteriorated over the years and which is rapidly accelerated in recent past.

Key words: Poverty, Education level, urban and Rural

## 1. INTRODUCTION

With the influence of British monarch Sri Lanka administratively structured into 25 districts which are thereafter organized in to 9 provinces. Report indicates that over the years Human Development Index (HDI) assume to be much advanced in Sri Lanka compared to other nations in the region and the countries with similar per capita income level. In addition to that education and public health has recorded giant progression where Sri Lanka is placed as 93 among hundred and seventy two countries with the value of 0.658 (UNDP, 2010). Such achievements are configured by adult literacy of 94.2, life expectancy at birth 75.3 (Total Population) infant motility (as per the 2011 estimates) plotted at 9.7

for 1000 live births. However it is recognized that the intensity of the social and infrastructural progression over the island is varied among such districts and the provinces which has escort differentiation in consistent development throughout the country. Puttalam<sup>1</sup> district is one of the districts located in western coast of Sri Lanka with a reputation of significantly low level of infrastructure and developments. Total population of 709,677 spread over 2882 km<sup>2</sup> with

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<sup>1</sup> The second-level administrative divisions, and are included in a province. There are 25 districts organized into 9 provinces. Each district is administered under a District Secretary, who is appointed by the central government

an average population density of 246/km<sup>2</sup> in Puttalam district. Household income and expenditure survey of 2006/07 indicates that Rs. 15612 per household average income where Colombo is recorded Rs.24711. 49% of the population of the district (0.334 million people) represent 18-50 of the labor force with poverty head count index of 31 which leads to 0.232 million of population to be placed below the poverty level. 0.081 Million has been granted with the Samadhi benefit; which is characterized by 36% of educated population engagement in agricultural sector ([www.statistics.govt.lk](http://www.statistics.govt.lk)).

The notion of poverty recognized by various scholars' as the household who is experiencing subordinate standards than that of, minimum anticipated level of living in the given time period and the specified location. Therefore the measurement of poverty at world level as well as the local level has become more complex and which potentially initiated based on the poverty level estimates. In such context households experiencing poverty stand below the poverty line while other households positioned above the poverty line. According to scholarly literature it is clearly indicated that there are several personal and family based factors that are influencing the poverty transition process in a society (Kimenyi, 1995). Such personal factors are recognized as lower wages, unemployment, on-the-job injury, rejection, exploitation and old age imperfection and dependency where familial factors includes death of wage earner, family dissolution, drop in net wealth and growth of family size. In many similar researches has organized based on the micro indicator known as resource deprivation, which is generally focusing on the income and consumption. Poverty is measured by various institutions based on relevant and absolute perspectives. Department of Census and

Statistics (DCS) of Sri Lanka constitute there poverty calculations based on the absolute poverty line approach. In such scrutiny household assets analysis focuses on human capital which is denoted by the extent of education gained by the head of the family and the social/ physical capital; tangible stock of wealth of the household. As per the Lerman (2001), education can be renowned as one of the main signifier in generation regular income and accessibility to official credit schemes.

Further Lerman highlight income instability driven destitution experienced by the household mainly due to the low level of education. Still developing nations has categorically emphasized in importance of the formal education since it could generate social and economic benefits to the households. Appleton et al. (2006), stressed on three main factors in relation to the education; primarily irrespective of the country education could boost the household from poverty grave, secondarily investment in education would be amounted to lower Return on Investment (ROI). Finally the return expected from education specially the higher level expected to be generating higher level of return than that of lower level. Literature has developed strong relationship between education and poverty. Appleton et al. (2006), spotlight that education as major country's poverty reduction extent and speed determinant. Additionally, Christopher ET al. (2000), Cross and Lewis (1998), Mizell (1999), has contributed to build up the relationship determinants. Julis (2001), indicates that poverty is much more complex and important than mere income deprivation where it could causes reduction in knowledge creation, availability of opportunity for households, where by empowerment and importantly income and physical capital advancements. In spite of greater

access to the education at all levels, low income groups are always deprived to the basic education in high percentages. Even though countries like Sri Lanka implemented Free education to ensure access for poorest there are imbedded constraints such as opportunity cost and since they are engaged with the some other economic activity. Scholars in the field of education indicates that there are observed problems in poor families such as late attendance, lower level of learning, high level of replication and dropout, weaker development in numerical skills, verbal composition and cognition and disciplines (Aturupana, 1998). Theoretical as well as practical observation depicts that there is much stronger correlation between societies and individuals income with the level and extent of education. Even though various measures being adopted by various governments eradicating poverty has become substantial obstacle especially after the independence. However successes of such efforts are questioned by public, politicians and different authorities. This

study is mainly focuses on the recognizing the relationship between education level and poverty in the Puttalam district giving special emphasis on rural sector.

## 2. METHODOLOGY

In relation to the theoretical frame of the research following areas being hypothesized,

- Monthly income of the young households with respect to the assets ownership of the past generation / Adults.
- Number of years that the past generation (Adults) schooling is being considered with respect to the assets ownership and schooling of the younger generation.

The assets ownership of the both young and adult generations are categorized based on the land ownership, vehicle and house type ownership. The empirical model for the study is developed in order to recognize the correlation between considered descriptive variables of young generation's income,

$$I_i = \beta_0 + \beta_1 P_e + \beta_2 P_l + \beta_3 P_h + \beta_4 P_v + \beta_5 Q_e + \beta_6 Q_l + \beta_7 Q_h + \beta_8 Q_v$$

Where,

$I_i = 0$ ; if income < 10000

$I_i = 2$ ; if income 15000 – 20000

$I_i = 1$ ; if income 10000-15000

$I_i = 3$ ; if income > 20000

$P_e$  = Years of education of adults

$P_l$  = Ownership of land by adults

$P_e = 0$ ; < 5 years schooling, 1; > 5 years schooling

$P_h$  = House type of own by adults

$P_l = 0$ ; <3Hectare, 1; 3-5 Hectare, 2; > 5 Hectares

$P_v$  = Ownership of vehicles of adults

$P_h = 0$ ; < 3 rooms-clay, 1; > 3rooms clay/ 3 rooms cement, 2; > 3 rooms cement

$P_v = 0$ ; No vehicle, 1; Low value vehicle, 2: High value vehicle

$Q_e$  = Years of education of younger generation

$Q_l$  = Ownership of land by Younger

$Q_e = 0$ ; < 10 years schooling, 1; > 10 years schooling

$Q_l = 0$ ; <3Hectare, 1; 3-5 Hectare, 2; > 5 Hectares

$Q_h$  = House type of own by younger

$Q_h = 0$ ; < 3 rooms-clay, 1; > 3rooms clay/ 3 rooms cement, 2; > 3 rooms cement

Qv = Ownership of vehicles of younger

Qv = 0; No vehicle, 1; Low value vehicle, 2: High value vehicle

Data collection was carried out during the period of January to December 2010 giving main focus to the four divisional secretariats Karuwalagaswewa, Chilaw, Kuliapitiya and Dankotuwa. Over 500 respondents were contacted successfully for the purpose of the sample generation. The sample was divided in to three categories based on their age; 12- 19 years as teenage, 20-55 years as parents (Younger generation for the research purpose) and over 55 as elderly (considered as adult for the research). Data were collected through the questionnaire (where possible) as well as interviews conducted focusing on randomly selected members of the households where priority is given to the parents to ensure the reliability and the accuracy of the data and collected primary data triangulated through the respective secondary data available with the divisional secretariats of respective selections. Due to the involvement of the four income levels in the dependent variable ordered

logistic regression model was used for the analysis.

### 3. DATA ANALYSIS AND PRESENTATION

The age of younger generation depicts the mean age of 41 years with 14.3 years standard deviation where adult generation reports 68 mean values with respect to the 9.72 standard deviation. Estimated monthly income of young and adult are recoded as Rs.14272 and Rs. 5947 respectively. In terms of schooling, adult indicate an average of 5 years where younger generation has achieved 10 years. Evidence has clearly indicates that 49% of adult had satisfactory housing facilities where 78.7% of the youth able to ensure appropriate shelter. On the other hand 87.5 % of the adult indicated that their main transportation mode was bicycle where 48.9% of the youth able to attain their own transportation through proper vehicle.

**Table 01: Descriptive statistics**

Variable	Category	Frequency	%
Adult education	<5 yrs	258	51.53
	>5 yrs.	242	48.47
Adult land ownership	<3 Ht	265	53.57
	3-5 Ht	165	33.34
	>5 Ht	65	13.09
Adult housing	Good	238	49.25
	Average	185	37.80
	Poor	77	12.95
Adult vehicle ownership	Good	435	87.5
	Average	46	9.31
	Poor	19	3.19
Youth education	<10 yrs	86	17.18
	>10 yrs	414	82.82
Youth housing	Good	393	78.7
	Average	66	13.3
	Poor	41	8
Youth vehicle	Good	244	48.9
	Average	173	34.69
	Poor	83	16.41

In terms of the developed model, it is noticed that years of schooling for adult types of housing and vehicle ownership of youth recognized as significant where other factors are found to be non significant. Coefficient for all variables

recognized as positive; in other word any variable associated in the developed model could leads to increase the income of youth. (Table 02)

**Table 02: Significance test**

Variable	Coefficient	Standard error	P
Education of adults	0.62**	0.2398	0.013
Land ownership of adults	0.02	0.1601	0.986
House type of adults	0.432**	0.1641	0.021
Vehicle ownership of adults	0.089	0.3361	0.800
Education of youth	0.662	0.3458	0.062
Land ownership of youth	0.412	0.2456	0.077
House type of youth	0.146	0.3100	0.598
Vehicles of youth	0.987**	0.2202	0.000

\*\* indicates statistical significance

Invariably, one could understand that the chances of getting less income than Rs.10000 per month are 2.273 and the probability of gaining an income between Rs.10000 – 15000 ranges upon 2.273 – 3.412. As observed 3.412 – 3.494 probability ranges is dispense for the monthly income of Rs.15000 -20000 and subsequently Rs. 20000 or above income probability is recognizable as from 4.494. The possibility of placing randomly selected person from the sample placing in the less than Rs. 10000 income categories is recognized as 45.65%. Similarly chances of reclining the selected person in to Rs.10000 -15000, Rs.15000 -20000 and Rs.20000 or more rage in 22.176%, 15.99% and 16.18% respectively.

#### 4. CONCLUSION

This study mainly examined the extent of education and poverty in Sri Lankan with special emphasis on Puttalam district's rural sector. At a glance it is observed that generation to

generation people's attention on education has significantly increased whereby no years of schooling has gradually increased. However people's ownership of land has drastically reduced mainly due to division of land among the family members. In relation to the vehicle ownership there is a faster move towards more advance automobiles among youth. In other words ordered logistic regression analysis predicts that people with the vehicle attempt to achieve much higher income than others. And direct observation during the data collection was that the people with automobile tent to earn additional income through such vehicle. The theory discussed in the economics; the vicious cycle is being taken in to consideration, in order to examine the extent of the education attained by the adults and the ability of income generation by the youth evidentially proved that the higher degree of adult education (Higher length of schooling) positively influence on the income generation uplifting of younger generation. This

indicates that the access to the education for current can be used as one of the successful strategy in demolishing the vicious cycle of poverty in generation to come. There for as the prime recommendation of the research one could put forward the point; access and the more advanced approach should be focally implemented towards rural households to enhance income generation in future to get them out of the poverty.

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**Table 03: Marginal effects**

Variable	0	1	2	3
Education of adults	-0.150	0.031	0.056	0.061
Land ownership of adults	0.0018	0.0004	0.04	0.0007
House type of adults	-0.1039	0.021	0.0008	0.05
Vehicle ownership of adults	-0.0230	0.005	0.009	0.009
Education of youth	-0.170	0.046	0.06	0.057
Land ownership of youth	-0.038	0.019	0.042	0.045
House type of youth	-0.104	0.008	0.016	0.016
Vehicles of youth	-0.2391	0.049	0.096	0.098

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