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## Gender Dimensions in Rural Poverty: A Case Study

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### ABSTRACT

*The concept of poverty is multi-dimensional. It covers not only levels of income and consumption but also health, education, vulnerability and risk, marginalisation and exclusion of the poor from the mainstream of society. The majority of the rural population who constitute the poor of India, are small and marginal farmers, landless agricultural labourers, local artisans, scheduled castes, scheduled tribes and women. The rural poor in India suffer from various forms of deprivation, such as economic, social, education, health, etc., besides suffering from malnutrition and under nutrition, due to the low levels of incomes and the inequitable distribution of productive assets. Rural poverty, thus, continues to be a concern because a significant portion of the population (56 percent) continues to live in rural areas.*

*While there is a plethora of literature on the estimation of poverty and inequality among rural and urban households in India and her states, based either on secondary data available from NSS and/or conducted at the national or state level, literature based on in-depth village studies is*

*limited. Such studies can provide important insights that cannot be derived from secondary data due to lack of relevant information. In this context, the present study attempts an in-depth household survey to focus on the identification and determinants of rural poverty in selected villages in Tirupur district with special emphasis on gender dimensions of rural poverty. The study finds that poverty was quite severe in the villages in Vellakovil municipality, and the severity was more intense among the male headed households characterized by large size, low literacy levels and increased dependency.*

**Keywords:** Destitution, Female-headed households, Poverty-gap index, Marginalised households

## INTRODUCTION

Poverty amid plenty is the world's greatest challenge today. Of the world's six billion people, 2.8 billion – almost half – a fifth – live on less than US \$ 1 a day with 44 percent living in South Asia (World Development Report, 2001). The World Bank (2005) has estimated that about 1.4 billion people in 2005 in the developing world were below the international poverty line of US \$ 1 per day. This means that almost one in four persons in the developing world (24 percent) were below the poverty line. The problem of poverty, thus, continues to remain the central challenge of development at the global level. Nevertheless, the growth-poverty relationship has remained obscure even after three decades of empirical research on development – region-wise, status-wise, and for all categories of countries. The experience with the liberalized policy regime after the mid-eighties has thrown up more issues, such as whether the poor have been further marginalized, or whether they have benefited less proportionately. Developing countries in South Asia, East Asia and even in Sub-Saharan Africa have experienced higher growth rates than those by the middle-income and high-income countries, but the condition of the poor has not improved perceptibly.

Poverty is a multidimensional concept. Owing to the complexity of the problem, it is very difficult to define poverty in a way that can be used for comparison of different countries or different societies. Nevertheless, poverty may be defined as a condition of having insufficient resources or income. In its most extreme form, poverty is a lack of basic human needs, such as adequate and nutritious food, clothing, housing, clean water and health services. Extreme poverty can cause terrible sufferings and death, and even modest levels of

poverty can prevent people from realizing many of their desires. The world's poorest people – many of whom live in developing areas of Africa, Asia, Latin America and Eastern Europe – struggle daily for food, shelter and other necessities. Extreme poverty, which threatens people's health or lives, is also known as destitution, or absolute poverty.

As far as India is concerned, poverty is not a new word to Indian ears. Even after more than 60 years of independence from almost two centuries of British rule, large scale poverty remains the most shameful blot on the face of India. It is often said that, India is a rich country inherited by the poor. This means that despite the vast natural resources, we have failed to tap all the resources to the fullest extent, resulting in low production, low income levels and low standards of living leading to poverty. In other words, poverty generates poverty and sustains itself. According to a study conducted by the Planning Commission, food shortages to the tune of 60 million tonnes is going to prevail even in 2021, in spite of an assumed growth rate of five percent per annum during 1991-2021 (Davar, et al., 1999). Apparently, India's economic development has simply bypassed the multitudes of the poor, doing little to relieve their misery. Human Development Report 2005 has actually pointed out that India contains regions of intense poverty, relieved little by overall national growth.

The Planning Commission has been estimating the incidence of poverty at the national and state levels for formulating growth strategies. The first attempt to measure poverty was made in 1962, when it stated that those adults who consumed food containing less than 2,250 k calories per day, equivalent to a monthly percapita expenditure of Rs.15 for rural areas at 1960-61, were below the poverty line. A number of economists, such as Dandekar and Rath (1971) and Ahluwalia (1978) estimated poverty, but their estimation was based on nutritional norms and household income. The Task Force on Projection of Minimum Needs and Effective Consumption Demand, suggested a nutritional norm of 2400 k calories per capita, for rural areas, and 2100 calories for urban areas on the basis of the 28<sup>th</sup> round (1973-74) of the National Sample Survey. The monthly expenditure required to have the necessary calorie intake according to 1979-80 prices was Rs.76 in rural areas, and Rs.88 in urban areas. The Seventh Plan had drawn the poverty line on the basis of annual income per family of four to five members. This involves a minimum annual income of per family in rural areas to be Rs.6,400 and Rs.7,300 for urban areas. The estimate of incidence of poverty at the national level is given in Table 1.

**Table 1: Planning Commission's Estimates of Poverty in India**

Year	Poverty Ratios (per cent)			Number of Poor (million)		
	Rural	Urban	All	Rural	Urban	All
1977-78	53.1	45.2	51.3	264.3	64.6	328.9
1983-84	37.3	32.4	36.0	244.0	76.3	320.3
1999-00	27.1	23.6	26.1	193.2	67.1	260.3
2007*	21.1	15.1	19.3	170.5	49.6	220.1

Source: Economy Survey 2003-04

Note: \*Poverty Projection for 2007.

The incidence of poverty has witnessed a steady decline from 51.3 percent in 1977-78 to 36 percent in 1983-84 and 26 percent in 1999-2000. It is projected to decline to 19.3 percent in 2007. In absolute numbers, the number of poor has declined from 328.9 million in 1977-78 to 260.3 million in 1999-2000 and is projected to go down further to 220.1 million in 2007. Wide disparities were seen in the poverty ratios between rural and urban areas, and poverty ratios were higher in rural areas compared to urban areas. Poverty in India remains a predominantly rural phenomenon.

New World Bank estimates place the number of poor (using the 2005 US\$ 1.25 cut-off in India) at 420.5 million in 1981, 435.5 million in 1990 and 455.8 million in 2005. These numbers are much higher than the Planning Commission's official estimate of 302 million poor in 2004-05, and show moreover that the absolute number of poor in India has been rising. Further, although these new World Bank estimates do imply that the poverty ratio has declined from 59.8 percent in 1981 to 51.3 percent in 1990 to 41.6 percent in 2005, the rate of poverty reduction by these estimates has slowed markedly from 0.94 ppa achieved during 1981-1990 to only 0.65 ppa during 1990-2005. The MDG target of achieving half the 1990 poverty ratio by 2015 will not be met, unless the rate of poverty reduction can be accelerated from this level to 1.6 percentage points per annum. Not only is India poorer by the new estimates, these confirm that the fight against poverty slackened during 1990-2005, despite higher growth and that attainment of the MDG target looks more difficult than thought earlier.

The Asian Development Bank (ADB) released its estimates on poverty in Asia (*Key Indicators for the Asia and the Pacific 2008*) a day after the World Bank release, showing even higher poverty in India. According to ADB, the number of poor in India was anywhere between 622 to 740 million in 2005, well over double the official Planning Commission estimates. The depressing result from ADB is that in 2005 India had the second highest poverty ratio (54.8

percent) among all the Asian countries studied, next only to Nepal (55.8 percent) and higher than Bangladesh (42.9 percent), Cambodia (36.9 percent), Bhutan (31.8 percent), Philippines (29.5 percent), Pakistan (24.9 percent), Indonesia (24.1 percent), Vietnam (16.0 percent), Sri Lanka (9.9 percent) and Malaysia and Thailand (0 percent). The means that India's poverty ratio must reduce at over 2 percentage points per annum (or thrice the actual pace during 1993-2005) to attain the MDG target of half the 1990 poverty ratio by 2015. And even if achieved, Indian poverty would be around 32 percent by this ADB norm in 2015, higher than what most Asian countries have already achieved in 2005.

#### SOME EMPIRICAL EVIDENCE

There has been a plethora of literature on the estimation of poverty and inequality for both the rural and urban people in India and her states. Interestingly, in the literature most of the studies have used the income-based measure of poverty (Sen, 1996, Suryanarayana, 2000; Tendulkar and Jain, 1995, etc.) while there are few studies, which have used calorie – based measure of poverty (Meenakshi and Vishwanathan, 2003; Jones and Sen, 2001; etc.). However, there is no consensus regarding the true incidence of rural poverty. There are a few studies that have estimated poverty using both NSSO and National Accounts Statistics (NAS) data (Datt, 1999), and also on the basis of the methodology of the expert group of the Planning Commission. The estimates of poverty as is discernible in the literature, reveals that although a few researchers have found a declining trend in the rural poverty ratio at the national and inter-state level during the mid 70's and 80's (Sen, 1996), there is controversy regarding whether the rural poverty has really declined after the initiation of SAP (Sen, 1996, Datt, 1999; Tendulkar and Jain, 1995). Further, controversies persist in the literature when a comparison of the incidence of rural poverty estimated by calorie based and income based method is made (Jones and Sen, 2001). While some have found the incidence of poverty to rise substantially when calorie based measure is adopted, and the same to decline when it is measured by income based methods, Jones and Sen (2001) have found a large divergence between calorie-based poverty measures and the official poverty line.

Surprisingly, a limited attempt has been made to identify quantitatively the crucial explanatory factors responsible for the chronic persistence of the incidence of abject rural poverty at the micro level. The motivation behind the present study stems from this. In fact, the existing literature on poverty focuses on government expenditure on different rural development and poverty alleviation programmes, agricultural growth, and some price variables for explaining the incidence of poverty. But, the quantitative estimates of the role

of the socio-economic factors on poverty and gender dimensions in poverty at the micro level, are very scarce in the literature. Such studies can provide insights that cannot be derived from secondary data due to lack of relevant information. In this context, the present study attempts an in-depth household level survey to focus on the identification and determinants of gender based rural poverty in a selected village in Tirupur district in Tamil Nadu.

### **OBJECTIVES**

The specific objectives of the study are:

1. To examine the socio-economic profile of the sample households.
2. To identify the determinants of consumption expenditure among the sample households.
3. To estimate the incidence of poverty among the sample households.
4. To determine the factors that distinguishes male headed households from those of female headed households.

### **HYPOTHESIS**

In the course of the study, the following hypotheses were tested:

- (i) The incidence of poverty is relatively high in female headed households.
- (ii) Male households are characterized by larger family size, low literacy and high dependency ratio.

### **METHODOLOGY**

The study area was limited to households residing in the villages located in 21 wards of the Vellakovil municipality in Tirupur district in Tamil Nadu. From this universe, 200 households were selected by adopting the purposive sampling method in order to give equal representation to male headed and female headed households. To the selected households, a pre-tested interview schedule was administered to collect the needed information. Data collection was carried out during February – March, 2009. Data so collected was analysed by using FGT index, Gini coefficient, and discriminant analysis.

### **EMPIRICAL RESULTS**

Since the focus of the study is to determine the gender dimensions in poverty, the respondents were classified on the basis of the sex of the decision-maker into two groups, namely, (i) male-headed households, and (ii) female headed

households. The socio-economic characteristics of the two groups of households are presented in Table 2.

Table 2: Socio-economic Profile of the Respondents (in percentages)

S. No.	Particulars	Male Headed Households	Female Headed Households	All
1.	Religion :			
	Hindus	59.0	51.0	55.0
	Muslims	14.0	16.0	15.0
	Christians	27.0	33.0	30.0
2.	Caste :			
	Scheduled caste	40.0	41.0	40.5
	Backward castes	32.0	20.0	26.0
	Most backward castes	21.0	39.0	30.0
	Others	7.0	0.0	3.5
3.	Type of family :			
	Nuclear family	100.0	100.0	100.0
	Joint family	0.0	0.0	0.0
4.	Marital status :			
	Unmarried	1.0	6.0	3.5
	Married	83.0	0.0	41.5
	Widow	0.0	54.0	27.0
	Divorce / separated	16.0	40.0	28.0
5.	Average size of the family (in numbers)	3.42	2.03	2.73
6.	Age composition of the members (in years) :			
	0 - 14	20.90	19.02	20.18
	15 - 59	69.86	62.44	67.04
	60 and above	9.25	18.54	12.78
7.	Education :			
	Illiterate	38.0	48.0	43.0
	Primary	49.0	29.0	39.0
	Secondary	13.0	18.0	15.5
	Higher secondary	0.0	5.0	2.5
8.	Occupation :			
	Agricultural labour	22.0	29.0	25.5
	Allied activities	10.0	11.0	10.5
	Non-farm activities	68.0	60.0	64.0
9.	Family income (in Rs.) :			
	Less than 2000	25.0	65.0	45.0
	2001 and above	75.0	35.0	55.0

Source: Field Survey, 2009.

More than 58 percent of male and female households were Hindus and only 14 percent of the male and 16 percent of the female households were Muslims. Likewise, the largest single group was scheduled caste in both male (40 percent) and female (41 percent) headed households. Irrespective of the gender, all the surveyed households belonged to a nuclear family, and were practicing small family norms. About 83 percent of the respondents in the male headed households were married and 16 percent were either separated/divorced, while in female headed households 54 percent were widows and 40 percent were either separated/divorced. The single largest group of family members in the male headed (70 percent) and female headed (62 percent) were in the active age group of 15-59 years, and the dependency ratio was significantly higher for female headed households (0.60) than for male headed households (0.43).

Though the incidence of illiteracy was higher in the female headed households (48 percent) than male headed households (38 percent), the educational attainment of the female members was marginally better than the male members with 5 percent of the female members completing higher secondary education. Only 40 percent of the women, and 32 percent of the male head of the family, were engaged in agricultural activities, while the remaining members had diversified into non-farm activities like power-loom industries, construction activities etc. About 25 percent of the male headed households and 2/3<sup>rd</sup> of the female headed households had a monthly income of less than Rs.2, 000 per month, indicating significant gender differentials in the total household income.

#### DETERMINANTS OF CONSUMPTION EXPENDITURE

Since Engle's classic work in 1857, the relationship between income and expenditure has attracted considerable attention. Besides income, explicit inclusion of household size in the specification of Engle's curve has been emphasized by Paris and Houthekkar (1955), on the grounds that household's total expenditure and family size are positively correlated, and the exclusion of the latter may bias the results. Hence, to identify the determinants of consumption expenditure, the following double log function was fitted

$$\text{Log } E_i = \alpha + \beta \log Y_i + \eta \log N_i + U_i$$

where  $E_i$  represents consumption expenditure of the  $i^{\text{th}}$  households,  $Y_i$  is the total income of the  $i^{\text{th}}$  households,  $N_i$  is the family size of the  $i^{\text{th}}$  household ;  $\beta$  and  $\eta$  are the elasticity coefficients and  $U_i$  random term. The estimated results are shown in Table 3.

**Table 3: Estimated Regression Coefficients and Levels of Significance**

Variables	Regression Coefficient for		
	Male Headed Households	Female Headed Households	All
Constant	1.433* (5.593)	1.755* (9.544)	1.655* (11.925)
Income	0.391* (5.026)	0.284* (4.681)	0.317* (7.032)
Family size	0.401* (5.211)	0.322* (4.010)	0.345* (6.933)
R <sup>2</sup>	0.867	0.787	0.794
$\bar{R}^2$	0.854	0.754	0.765
F ratio	19.662*	12.651*	29.753*

Source: Estimation based on field survey.

Note: \* Significant at one percent level.

Figures within parentheses indicate t ratios.

The R<sup>2</sup> value, measure of goodness of fit, was 0.867, 0.787 and 0.794 for male, female and all households implying that 79 to 87 percent of the variations in total expenditure were explained by family income and family size. The F ratio was significant at one percent for all models, implying that the models showed a good fit. The regression coefficient was positive and significant in all the three models, implying that a unit increase in income would cause the consumption expenditure to increase by 0.39 for males, 0.28 for females and 0.32 for all households. The elasticity of income was higher for male households when compared to female households, signifying that male households enjoyed a higher propensity to consume.

The elasticity coefficient of family size was positive and significant in all models, signifying that any increase in family size would cause the expenditure to increase by 0.40, 0.32 and 0.34 for male, female and all households respectively. The elasticity coefficient of family size was much higher than income in all models implying that family size had greater impact on total consumption expenditure when compared to family income. These findings substantiate Engle's law of consumption.

#### Poverty and Consumption Expenditure

The National Sample Survey Organisation, Survey of Consumption

Expenditure Data (61<sup>st</sup> Round, 2004-05) has defined the poverty line in terms of monthly consumption expenditure of Rs.602 per capita for rural areas and Rs.1080 for urban areas in Tamil Nadu. Accordingly, the households with percapita expenditure of less than, or equal to Rs.602, were considered to be living below the poverty line in rural areas. Using the above consumption measure of poverty, poverty measures were estimated based on the popular Foster-Greer – Thorbecke class of functions written as

$$P_{\alpha} = \frac{1}{n} \sum_{j=1}^q \left[ \frac{z - y_j}{z} \right]^{\alpha}$$

where  $P_{\alpha}$  is the measure of poverty,  $y_j$  is the consumption of  $j^{\text{th}}$  household,  $z$  is the poverty line,  $n$  is the population size and  $\alpha$  is a non-negative parameter. For  $\alpha = 0$ , the measure becomes the head count ratio (i.e.) the proportion of the poor in the total population.

$$P_0 = \frac{q}{n}$$

This measure fails to capture the extent to which household's expenditure falls below the poverty line.

A second measure is the poverty gap index (PG) given by setting  $\alpha = 1$ . PG captures the acuteness of poverty since it measures the total shortfall of the poor from the poverty line. A third measure is the square of PG measure, abbreviated as SPG, obtained by setting  $\alpha = 2$  in (1).

Besides it is measure, the Gini coefficient was also estimated to find the extent of inequalities in consumption expenditure in selected households. Table 4 shows the selected poverty measures in the selected sample households.

**Table 4: Poverty Measures in Selected Sample Households**

S.No.	Poverty Measures	Male Headed Households	Female Headed Households	All
1.	Head count ratio ( $P_0$ )	0.97	0.89	0.93
2.	Poverty gap index ( $P_1$ )	0.41	0.36	0.39
3.	Square of poverty gap (SPG)	0.20	0.16	0.18
4.	Gini coefficient	0.18	0.18	0.18

Source: Estimation based on field survey.

Various measures of poverty namely head count ratio, poverty gap index and square of poverty gap indicates the acuteness of poverty was more intense in male headed households when compared to female headed households. The Gini coefficient of inequality was the same for both groups indicating that the extent of inequality within each group was the same. These findings are contrary to the findings of the existing literature which suggest that female-headed households relative to male headed household have poorer survival chances, given their lower control over land resources and their greater dependency on wage income, their higher rates of involuntary unemployment and lower levels of education (Agarwal, 1986, 1995; Kumari, 1989; Verghese, 1990; Lingam, 1994 and Panda, 1997). However, in the present study, the weaker linkages between poverty and female headship may be due to better utilization of the resources by the female heads, resulting in better welfare outcomes.

#### DISCRIMINANT ANALYSIS

To identify the factors that distinguish male headed households from female headed households, discriminant analysis was applied. The factors chosen for the analysis were monthly per capita consumption expenditure (MPCE), percentage of male literates (ML), percentage of female literates (FL), caste (C), dependency ratio (DEP), household size (HS), total family income (TFY) and days of employment (DOE). For caste, dummy variables assigned were as follows:

C = 1; if scheduled caste = 0; Otherwise.

Table 5 summarises the group descriptive statistics and test of equality for the variables.

In profiling the two groups, excepting for caste, monthly per capita consumption expenditure and days of employment, all the remaining variables had the largest differences in group means. The Wilks' lambda and univariate ANOVA used to assess the significance between means of the independent variables for the two groups, indicate that the percentage of male literacy, percentage of female literacy, dependency ratio, household size and family income were the variables which showed significant univariate differences between the group.

To identify which of these variables, plus any of the others, best discriminate between the groups, the discriminant function was estimated by using the step-wise procedure. This procedure begins with all the variables excluded from the model and then selects the variables that shows statistically

**Table 5: Group Means and Tests of Equality**

<i>Variables</i> <i>Group</i>	<i>Caste</i> <i>(C)</i>	<i>Male</i> <i>Literate</i> <i>(ML)</i>	<i>Female</i> <i>Literate</i> <i>(FL)</i>	<i>Depende</i> <i>ncy</i> <i>Ratio</i> <i>(DEP)</i>	<i>Household</i> <i>Size (HS)</i>	<i>Family</i> <i>Income</i> <i>(TFY)</i>	<i>MPCE</i>	<i>DOE</i>
Male headed household	0.42 (0.50)	28.62 (23.03)	21.75 (20.23)	39.27 (23.81)	3.32 (0.99)	2724 (765.51)	384.68 (765.51)	25.7 (1.94)
Female headed household	0.34 (0.49)	10.92 (19.44)	36.82 (36.53)	29.06 (28.42)	1.99 (0.83)	1958.59 (1012.90)	407.88 (124.11)	25.48 (0.81)
All	0.40 (0.49)	19.81 (23.05)	29.25 (30.37)	34.19 (26.64)	2.66 (1.13)	2343.22 (973.26)	396.22 (114.12)	25.59 (1.49)
Wilks' lambda	0.999	0.852	0.938	0.963	0.652	0.845	0.99	0.994
F-ratio	0.268	34.284*	12.988*	7.551*	105.243*	36.247*	2.067	1.136

Source: Estimation based on field survey.

Notes: \* Significant at one percent level.

Figures within parentheses indicate standard deviations.

significant differences across the group, and provides the largest Mahalanobis distance ( $D^2$ ) between the groups. The findings are summarized in Table 6.

The first variable to enter the model in the stepwise procedure was household size. In step 2, dependency ratio (DEP) was the next variable to enter the model which improved the discrimination between the groups, as evidenced by the decrease in Wilks' lambda from 0.963 to 0.652 and a highest Mahalanobis  $D^2$  (2.115).

The next variable to enter the model in stage III was the percentage of male literacy which caused a further fall in Wilks' lambda to 0.576 from 0.652 and had a maximum  $D^2$  value of 2.914. In stage IV, the last variable to enter was the percentage of female literacy which further improved discrimination, as evidenced by the decrease in Wilks' lambda value (from 0.576 to 0.541) and had a maximum  $D^2$  value of 3.36. None of the remaining variables pass the entry criterion for statistical significance of 0.05. Thus, the estimation procedure stops with four variables viz., household size, dependency ratio, percentage of male literacy and percentage of female literacy.

**Table 6: Wilks' Lambda and Mahalanobis D<sup>2</sup> Statistics**

Step	Variable	Tolerance	To Remove	Wilks' Lambda	Minimum D <sup>2</sup>	Between groups
I	HS	1.00	105.243	–	–	–
II	HS	0.504	131.687	0.963	0.152	1 and 2
		0.504	25.771	0.652	2.115	1 and 2
III	HS	0.500	102.768	0.825	0.837	1 and 2
	DEP	0.502	21.286	0.600	2.645	1 and 2
	ML	0.991	12.805	0.576	2.914	1 and 2
IV	HS	0.497	91.47	0.771	1.174	1 and 2
	DEP	0.502	20.123	0.579	2.885	1 and 2
	ML	0.980	14.250	0.563	3.078	1 and 2
	FL	0.984	6.070	0.541	3.366	1 and 2

Source: Estimation based on field survey.

Table 7 provides the overall stepwise discriminant analysis after all the significant variables are included in the estimation of the discriminant function.

**Table 7: Summary Statistics for Two-group Discriminant Analysis**

Function	Eigen Value	Percent of Variance		Canonical Correlation	Wilks' Lambda	Chi-square	Significance
		Function	Cumulative				
1	0.908	100.0	100.0	0.690	0.524	125.963	0.00
<b>DISCRIMINANT FUNCTION</b>							
Independent Variables		Discriminant Function					
		Unstandardized		Standardized			
Percentage of male literacy		0.018		0.383			
Percentage of female literacy		–0.009		–0.255			
Dependency ratio		–0.024		–0.627			
Household size		1.272		1.163			
Constant		–2.667		–			

Source: Estimation based on field survey.

The canonical correlation associated with the function was 0.69 implying significant association between the dependent variable and the independent variables in the model. The Wilks' lambda and chi-square value indicates that the function was significant at one percent level. The variables household size and percentage of male literacy had a positive sign indicating that these variables had higher discriminating power between the groups.

To assess the contribution of the individual variables, the potency index was calculated based on the discriminant loadings and are presented in Table 8.

**Table 8: Discriminant Loading and Potency Index for the Selected Variables**

S.No.	Variables	Discriminant Loading	Eigen Value	Potency Index
1.	Household size	0.767	0.908	0.5342
2.	Male literacy	0.438	0.908	0.1742
3.	Family income <sup>@</sup>	0.416	0.908	0.1571
4.	Female literacy	-0.269	0.908	0.0657
5.	Dependency ratio	0.205	0.908	0.0382
6.	Monthly per capita consumption	-0.181	0.908	0.0297
7.	expenditure <sup>@</sup>	0.033	0.908	0.0001
8.	Caste <sup>@</sup>	0.019	0.908	0.0003
	Days of employment			

Source: Estimation based on field survey.

Note: @ - Not included in the discriminant function.

The potency index, arrived at by multiplying the square of discriminant loading by the eigen value of the function, reveals variable household size to provide the greatest discrimination between the group with index of 53.42 percent, followed by male literacy (17.42 percent), family income (15.71 percent), female literacy (6.57 percent) and dependency ratio (3.82 percent). Thus, male households were characterized by larger family size, lower educational status and higher dependency ratio.

The validity of the discriminant function was evaluated at group centroids (group means) and the results are shown in Table 9.

From this table, the classification accuracy percentage of the discriminant function was 81 percent. Thus, it can be inferred that 81 percent of the selected original group cases (estimation sample) were correctly classified.

**Table 9: Classification of Sample Cases**

<i>Actual Group</i>		<i>Predicted Group Membership</i>		<i>Total</i>
		1	2	
Original count	1	81	19	100
	2	19	81	100
Percentages	1	81	19	100
	2	19	81	100

**CONCLUSION**

From the forgoing discussion, it is evident that poverty was quite severe in the villages in Vellakovil municipality and the severity was more intense among the male headed households. Hence, any public intervention designed to assist the poor households will be more effective if they include the following recommendations:

- A larger emphasis will necessarily have to be placed on those programmes and approaches, which open the way for independent and sustainable livelihood for the poor. For this, a group approach has a better chance of success.
- To directly address the deprivation faced by the poor households, formation of SHGs around small savings and micro-credit is a must, and this process needs to be supported and helped from the top.
- People centric approach needs to be developed and adopted, as it will help to identify and address specific deprivations of the poor as an individual, and not just as a category.
- Public-private partnership, both national and international, with a human face, by networking of institutions, programs and policy frameworks with social auditing is the need of the hour, to realize rural empowerment and poverty reduction.
- In order to reduce the incidence of poverty, and to raise the level of living of the poor households through increased availability of productive assets, skill formation and gainful employment opportunities, the planning strategy for development should be a judicious mix of beneficiary oriented programmes, human resource development and infrastructural development.

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