THE RELATIONSHIP BETWEEN SOCIO-ECONOMIC CHARACTERISTICS AND INFORMATION UTILIZATION BEHAVIOR OF FARMERS IN TIRUVANAMALAI DISTRICT

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ABSTRACT

This study investigated the relationship between farmers' socio-economic characteristics (independent variables) and information utilization (dependent variable). The study was conducted at Tiruvanamalai district of Tamil Nadu. Polur block of Tiruvanamalai district was considered as the study area and from that block five villages were selected. A total of 75 respondents was selected using the purposive random sampling technique. The data received were decoded and analyzed with the aid of Statistical Packages for Social Science (SPSS). The socio-economic characteristics of the respondents identified were; age, educational status, family type, occupational status, farming experience, farm size, annual income, farm power status, social participation, extension agency contact, participation in extension methods, innovativeness, awareness about the training centre's, perceived effectiveness of the training programme and perceived attributes. Pearson's correlation matrix results established that educational status and extension agency contact showed a significant relationship in the information utilization behavior of farmers. Further result of Pearson's linear regression analysis showed that farmers' educational status were statistically significant at 1% probability level, having effects on information utilization.

KEYWORDS: Statistical Packages for Social Science (SPSS), Socio-Economic Characteristics & Pearson's Correlation

Original Article

Received: May 29, 2019; **Accepted:** Jun 19, 2019; **Published:** Jun 12, 2019; **Paper Id.:** IJESRAUG20194

INTRODUCTION

Farmers are basically information hungry. They are always found to be in search of new information from whatever the information sources are available to them. Farmers would like to make individual decisions for a change in farming and to do this, they need farm information. Farmers may get information about new technology from various institutional and non institutional sources such as neighbors, friends, relatives, input-sellers (seeds, fertilizers and plant protection material sellers), exhibitions, radio, television, printed materials and others. In the absence of institutional sources, these non-institutional sources assume to play significant role in dissemination of farm technology. Hence, it is important to study the farmer's information source utilization behavior to know the different types of source of information for further strengthening of the extension system. With this background the present investigation was planned with specific objectives;

- Describe the socio-economic characteristics of the farmers
- Ascertain the relationship between the socio-economic characteristics of farmer and information utilization behavior of farmers.

METHODOLOGY

The study was conducted in five villages (Melsholakuppam, Veeralur, Navapalayam, Patiandal and Kandhapalayam) of the Polur block in Tiruvanamalai district of Tamil Nadu, India. The sample villages were selected using the purposive random sampling method. The respondents were selected by adopting the purposive random sampling technique. A sample of 75 respondents from five villages of Polur block was selected for this study. The data were collected using a well structured and pre-tested interview schedule. The data were analyzed by using appropriate statistical tools.

RESULTS AND DISCUSSIONS

Description of the socio-economic characteristics of the farmers

Table 1 represents the results of personal and socio-economic characteristics of the respondents.

Age: Nearly half of the respondents (40.00%) belonged to middle age category, followed by (30.66%) old and young (29.34%) age categories.

Educational Status: A little less than fifty per cent (45.33%) of the farmers were primary educated followed by illiterate (20.00%). The respondents under high school were found to be (18.66%) followed by middle school (10.66%) and only (2.66%) of the respondents have educated up to higher secondary and collegiate level.

Family Type: Majority (92.00%) of the respondents prevalent in the selected districts have led a nuclear family type.

Occupation: Cent per cent of the farmers were practicing agriculture as their main occupation.

Farming Experience: More than half (56.00 %) of the respondents had more than 10 years of experience in farming, followed by 33.33 per cent of the respondents with above 5 -10 years and 10.67 per cent of the respondents with up to five years of experience in farming.

Farm Size: While observing the farm size, it was found out that nearly half (58.66%) of the respondents were found to be small farmers followed by 21.34 per cent of big farmers and only 20.00% of the respondents belonged to marginal farmers.

Annual Income: Two third (66.66%) of the respondents had medium level of income, followed by 20.00 per cent with high level and 13.34 per cent with low level of income.

Farm Power Status: Nearly half (46.67%) of the respondents possessed medium level of farm power status.

Social Participation: Regarding social participation more than half (57.34%) of the respondents had high level of social participation followed by low (24.00 %) and medium (18.66 %) level.

Extension Agency Contact: Majority 74.66 per cent of the farmers had medium to high level of extension agency contact, followed by 25.34 per cent with low level of extension agency contact. **Participation in extension methods:** About half of the respondents (46.67%) were belonged to medium level of participation in extension methods.

Innovativeness: A little less than half (48.00%) of the project farmers belonged to the medium category followed by high (33.34%) and low (18.66%) levels.

Awareness about the Training Centre: While observing the awareness level about the training centre, it was found out that nearly half (41.34%) of the respondents were found to have medium level of awareness about the training centers.

Perceived Effectiveness of the Training Programme: More than half (57.34%) of the project farmers had medium level of perceived effectiveness of trainings followed by high (28.00%) and low (14.66%) levels.

Table 1: Socio Economic Characteristics of the Farmers

(n=75)			
S. No	Particulars	Number	Per cent
1	Age		
	Young	22	29.34
	Middle	30	40.00
	Old	23	30.66
2	Educational Status		
	Illiterate	15	20.00
	Primary school	34	45.33
	Middle school	8	10.66
	High school	14	18.66
	Higher secondary school	2	2.66
	Collegiate	2	2.66
3	Family Type		
	Joint	6	8.00
	Nuclear	69	92.00
4	Occupation		
	Agriculture as the primary occupation	75	100.00
	Agriculture as the secondary occupation	-	-
5	Farming Experience		
	Up to 5 years	8	10.67
	Above 5 and below 10 years	25	33.33
	Above 10 years	42	56.00
6	Farm size		
	Marginal	15	20.00
	Small	44	58.66
	Big	16	21.34
7	Annual Income		
	Low	10	13.34
	Medium	50	66.66
	High	15	20.00
8	Farm Power Status		
	Low	6	8.00
	Medium	35	46.67
	High	34	45.33
9	Social Participation		
	Low	18	24.00
	Medium	14	18.66
	High	43	57.34
10	Extension Agency Contact		
	Low	19	25.34
	Medium	35	46.66
	High	21	28.00
11	Participation in Extension Methods		
	Low	19	25.33
	Medium	35	46.67
	High	21	28.00

Table 1: Contd.,			
12	Innovativeness		
	Low	14	18.66
	Medium	36	48.00
	High	25	33.34
13	Awareness about the Training Centre		
	Low	21	28.00
	Medium	31	41.34
	High	23	30.66
14	Perceived Effectiveness of the Training Programme		
	Low	11	14.66
	Medium	43	57.34
	High	21	28.00

Table 2, indicated that the maximum used source was non-institutional sources followed by media and institutional sources. The category wise distribution of farmers according to information source utilized by them reveals that the neighbors and input dealers was the most preferred source for getting first hand information about crop technologies. Progressive farmers ranks II followed by television which was ranked III. This was followed by radio and newspaper. It means that the project farmers had used the non – institutional source and media as an important source when compared to the institutional source.

Institutional

The institutional sources, which transferred the technology in the area, were village extension workers, Assistant Agricultural Officer / District Agricultural Officer, Agricultural Officer, Assistant Directorate of Agriculture, Bank officials, KrishiVigyan Kendra scientists and the Tamil Nadu Agricultural University scientists were the different institutional sources considered for the study.

From the Table 2 it could be seen that among the institutional sources Assistant Agricultural Officers are contacted much because farmers have to visit the respective offices for gathering information. This finding is in confirmation with the findings of Chikkarangaiah (1993) who reported that most of the respondents had formal information source utilization behavior.

Non –Institutional

The non-institutional sources which transferred the technology were also studied. Farm leaders, SHG members, progressive farmers, friends and relatives, input dealers and neighbors were the important non- institutional sources contacted by the respondents to get information.

It is apparent from the Table 2 that cent per cent of the information were gathered through neighbors, input dealers and friends. Their closeness and very frequent contacts with their friends and relatives would have been the possible reason for majority of the respondents contacting these sources. The farmers contact input dealers when any plant protection measures were taken up in the field. Hence, cent per cent of the respondents had used input dealers as the important sources for getting information. This study is in line with the findings of Sheela (2000) and Suresh (2001) who reported that neighbors, family members, friends and relatives were the often utilized channels in personal-localite channels.

Posters, exhibitions, extension literature, wall paintings, radio, newspaper, journals, and library were the different media sources selected for the study. Among these, television, radio and newspaper were the most widely used media sources. This was because almost all the farm houses have television and radio. This finding further corroborates the reports of Yazidu (1973), Voh (1981) and Ajia (1992) which stressed the importance of radio as a source of agricultural information. This study also get the support from the findings of Senthilkumar (2003) who reported that friends and relatives, input dealers, newspapers and T. V channels were the important information sources for farm activities.

**Table 2: Distribution of Respondents based on their Information Source Utilization Behavior
(n=75)**

S. No.	Source of Information Source Utilization Behavior	Mean	Rank
I. Institutional			
1	Village extension worker	1.00	X
2	AAO/DAO	1.20	VIII
3	AO	1.00	X
4	ADA	1.00	X
5	Bank officials	1.00	X
6	KVK scientists	1.00	X
7	TNAU scientists	1.00	X
II. Non –Institutional			
1	Farm leader	1.98	VII
2	Self help group members	1.00	X
3	Progressive farmer	2.84	II
4	Friends	3.00	I
5	Relatives	2.09	VI
6	Input dealers	3.00	I
7	Neighbors	3.00	I
III Media			
1	Posters	1.00	X
2	Exhibitions	1.00	X
3	Extension literature	1.00	X
4	Wall paintings	1.00	X
5	Radio	2.48	IV
6	Newspaper	2.14	V
7	Journals	1.08	IX
8	Library	1.00	X
9	Agricultural meeting	1.00	X
10	Demonstrations	1.00	X
11	Tours/ Field trips	1.00	X
12	Agricultural films	1.00	X
13	Television	2.81	III
14	Internet	1.00	X
15	Mobile	1.00	X

Table 3: Correlation and Multiple Regression Analysis of Independent Variables towards Information Source Utilization Behavior

(n=75)

Variable No.	Variables	'r' Value	Regression co-Efficient	Standard Error	't'
X ₁	Age	0.092 ^{NS}	0.032	0.021	1.269 ^{NS}
X ₂	Educational status	0.306**	0.424	0.166	2.633**
X ₃	Family type	0.000 ^{NS}	0.000	0.000	0.000 ^{NS}
X ₄	Occupational status	0.000 ^{NS}	0.000	0.000	0.000 ^{NS}
X ₅	Farming experience	0.124 ^{NS}	0.336	0.291	0.385 ^{NS}
X ₆	Farm size	0.075 ^{NS}	0.036	0.298	0.055 ^{NS}
X ₇	Annual income	-0.103 ^{NS}	-0.119	0.345	-0.306 ^{NS}
X ₈	Farm power status	-0.012 ^{NS}	-0.049	0.171	0.033 ^{NS}
X ₉	Social participation	-0.031 ^{NS}	-0.022	0.086	-0.693 ^{NS}
X ₁₀	Extension agency contact	-0.248*	0.123	0.284	-1.060 ^{NS}
X ₁₁	Participation in extension methods	0.278 ^{NS}	-0.116	0.092	1.193 ^{NS}
X ₁₂	Innovativeness	-0.098 ^{NS}	-0.077	0.064	1.025 ^{NS}
X ₁₃	Awareness about the training centres	0.166 ^{NS}	0.164	0.179	0.990 ^{NS}
X ₁₄	Perceived effectiveness of the training programme	-0.144 ^{NS}	-0.204	0.151	-1.351 ^{NS}

R² = 0.520

** = significant at one per cent level

F = 1.740

* = significant at five per cent level

Correlation analysis revealed that out of fourteen independent variables educational status showed a positive and significant relationship with dependent variable information source utilization behavior and extension agency contact is negatively correlated with the dependent variable with five per cent level of probability. Educational status had shown a positive and significant relationship at one per cent level. The other variables had non-significant relationship with the dependent variable.

This might be due to that educational status and extension agency contact alone sufficient for getting relevant information for any day-to-day activities. Hence, educational status and extension agency contact had significant relationship with the dependent variable.

Consequently, this study upholds that the educational status of farmers have a positive and significant relationship with utilization of extension information. This position is therefore in support of earlier works as reported by Ajia (1992).

The multiple regression analysis was performed to find out the relative contribution of each variable towards the information source utilization behavior of the respondents.

It is observed from the Table 3 that R² value is 0.520, which revealed that 52.00 per cent of variation in the information source utilization behavior. As evident from the regression co-efficient of the variable, educational status (X₂) were found to be positively significant at one per cent level of significance.

This indicated that one unit increase in educational status (X₂) would increase respondents' information source utilization by 2.633 units respectively.

The prediction equation fitted as follows

$$Y_1 = -2.789 + 1.269 (X_1) + 2.633(X_2) + 0.000 (X_3) + 0.000 (X_4) + 0.385 (X_5) + 0.055 (X_6) - 0.306 (X_7) - 0.033 (X_8) - 0.693 (X_9) - 1.060 (X_{10}) + 1.193 (X_{11}) + 1.025(X_{12}) - 0.990 (X_{13}) - 1.351(X_{14})$$

Farmers with higher level of educational status might have resulted in increased information source utilization. It would be concluded that there existed a significant contribution of educational status towards information source utilization.

CONCLUSIONS

The present study revealed that most of the respondents belonged to young aged, were literate, had farming as their sole occupation, high level of farming experience, medium farm power status, possessed small to marginal farm holdings, high level of social participation, medium to high level of extension agency contact. Other characteristics such as annual income, participation in extension methods, innovativeness and awareness about training were found to be in medium level. More than half (57.34%) of the respondents had high level of perceived effectiveness of trainings followed by medium and low levels. This study has established that a positive relationship exists between socio-economic characteristics of farmers and information utilization behavior of the farmers. It has also been established, through this study, that farmers' educational status and extension agency contact significantly correlated the information utilization behavior of the farmers.

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