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Perception of Farmers towards Effectiveness of Extension Services of KVK

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ABSTRACT

The present investigation was carried out to determine the perception of the contact farmers towards extension service extended through Krishi Vigyan Kendra (KVK) working in the Amravati division of Maharashtra state. The total sample comprised 240 contact farmers who were selected by using simple random sampling; and data were gathered by personally interviewing to elicit the requisite information. The results indicated that majority of the contact farmers were in the middle age group, educated up to college to university level, further it was observed that these respondents were engaged in diversified occupations with semi-medium land holding having moderate farming experience, extension contacts with adequate scientific orientation and innovativeness. Perception of the farmers towards the extension service was measured on the basis of three dimensions viz. Knowledge disseminated, Field & diagnostic visits, and Mass media & group discussion utilized by the Subject Matter Specialists for the dissemination of the generated technology towards its end users. The findings indicated that a larger proportion (57.50%) and nearly one third (30.83%) of the respondents perceived that extension service of KVK was 'useful' and 'more useful' for them, respectively. Further, the relational analysis revealed that extension contact, training received, scientific orientation and innovativeness had positive and highly significant, whereas age, education, and farming experience were established a positive and significant relationship with the perception of farmers towards extension service of KVK.

Keywords: Extension service, Krishi Vigyan Kendra, Perception

INTRODUCTION

India is an agrarian country as agriculture is the primary source of livelihood for the majority of the Indian population. Still, there is a large section of the farming community that is still unaware of technological developments and recent advances in the agriculture field. Awareness about improved agricultural technology is one of the key inputs for the farming community. In the era of globalization, effective, reliable, and quick transfer of improved technologies towards the end-users is advantageous in improving agricultural productivity. Krishi Vigyan Kendra (KVK) is one of the most vibrant projects initiated by the Indian Council of Agricultural Research (ICAR) for the transfer of technology. The project is intended to create a dedicated and energetic human resource for the agricultural development of the country (Chauhan, 2011).

Subject Matter Specialists (SMSs) are the crucial human resource persons working for the fulfilment of the mandate framed for the KVK. The generated

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technology is disseminated to its end users by the SMSs using different extension programmes such as FLD's, OFT's, Trainings, Krishi Mela, Farmers advisory services, etc. The technology will be useful only when it is adopted by the farming community, therefore farmer's satisfaction with the extension service implemented by Krishi Vigyan Kendra has significant importance as the adoption of technology leads towards farming returns and overall production. The gap between technology generated and transfer of technology create ambiguity, therefore it was felt necessary to analyze farmers perception with the specific objectives to study the perception of the farmers towards extension service of Krishi Vigyan Kendra as well as to study the relationship between selected characteristics of the respondents with their perception towards extension service of KVK.

METHODOLOGY

The study was conducted in the Western Vidarbha Zone of Maharashtra State. Eight Krishi Vigyan Kendra from the zone were selected purposively for the study. A KVK has six Subject Matter Specialists representing different disciplines working for technology dissemination. In order to give equal representation to each and every discipline, five contact farmers against each SMSs, who was in regular contact with these SMSs were selected randomly. Each KVK had six posts of SMS's, hence from each KVK 30 contact farmers were selected randomly; thus from 8 KVK's, a total of 240 farmers constituted the study sample. The data were collected from all the contact farmers with the help of a pre-tested questionnaire.

Perception was operationally defined as the awareness, opinion, and conception of the individual farmers towards the extension service of Krishi Vigyan Kendra's. The perceived usefulness of the extension services of KVKs as expressed by the respondents was worked out with the help of scale developed by Chavda (2006) with slight modification as per the objectives of the present study. The responses of the respondents were measured on a five-point continuum i.e. Strongly Agree, Agree, Undecided, Disagree, and Strongly disagree with a score of 5, 4, 3, 2, and 1. The scale had 30 statements and responses were measured against each statement. On the basis of obtained score the perception index was worked out with the help of formula given as

$$\text{Perception index} = \frac{\text{Actual obtained perception score of respondent}}{\text{Maximum obtainable perception score}} \times 100$$

The contact farmers were grouped into three categories viz. less useful, useful, and more useful as per their observed perception towards extension service of KVK.

RESULTS AND DISCUSSION

The Krishi Vigyan Kendra implemented different extension programmes keeping in view the needs of the farming community. Hence, the farmers are an important link in the process of technology dissemination, keeping in view the personal, socio-economic and psychological characteristics of the respondents have been studied and furnished in Table 1.

The study revealed that slightly less than half (47.08%) of the contact farmers observed in the middle age group category, whereas nearly one-third (30.84%) represented the young age group while 22.08 per cent of the contact farmers were observed from the old age category. Education helps to access the information quickly, it is an important parameter for the adoption of technology. Keeping this in view, the education of the contact farmers was studied as a crucial variable. The findings with regard to the educational status of the respondents revealed that a larger proportion of the respondents i.e. 45.42 per cent possessed College-University level education followed by one-fourth of the respondents (25.00%) attained higher secondary schooling, while 21.67 per cent of the contact farmers were completed their secondary schooling, whereas the meagre number (6.67%) of the respondents had observed under middle school (6.67%) and primary school (1.24%). It was important to point out that none of the contact farmers were observed in the illiterate category. Farmer's occupation may reveal the time spent by the individual in the farming activities. The findings with regard to the distribution of contacts farmers on

Table 1: Distribution of contact farmers as per their characteristics (N= 240)

Categories	Frequency	Percentage
Age		
Young	74	30.84
Middle	113	47.08
Old	53	22.08
Education		
Illiterate	0	0.00
Primary school	3	1.24
Middle school	16	6.67
Secondary school	52	21.67
Higher secondary school	60	25.00
College-University	109	45.42
Occupation		
Farming	82	34.17
Farming + Labourer	25	10.42
Farming + sub. occupation	87	36.25
Farming + business	29	12.08
Farming + service	17	7.08
Land holding		
Marginal	23	9.59
Small	68	28.33
Semi medium	70	29.17
Medium	62	25.83
Large	17	7.08
Farming experience		
Low	101	42.08
Medium	107	44.58
High	32	13.34
Extension contact		
Low	63	26.25
Medium	146	60.83
High	31	12.92
Training received		
No training received	26	10.83
One day	55	22.92
Two day	44	18.33
Up to one week	115	47.92
Scientific orientation		
Low	54	22.50
Medium	136	56.67
High	50	20.83
Innovativeness		
Low	29	12.08
Medium	125	52.08
High	86	35.84

basis of their occupation revealed that slightly more than one third i.e. 36.25 per cent of the contact farmers were engaged in farming along with subsidiary occupation while and 34.17 per cent solely depended upon farming for their livelihood, whereas around one tenth (12.08%) of the respondents were observed with farming along with business, labour work or service. The sufficient land holding provides an opportunity to the farmers to test new technology, improved varieties of crops, etc. Keeping this in view, land holding of the farmers were analyzed, and the findings revealed that slightly above one-fourth of the respondents were having semi medium (29.17%), small (28.33%) and medium (25.83%) type of land holding respectively whereas nearly one-tenth i.e. 9.59 per cent and only 7.08 per cent of the respondents were observed under marginal and large landholding category respectively. Experience is an involvement of an individual in certain enterprise or practice. Farming experience may initiate the action of the respondents to try out new crop cultivation practices or an enterprise. Keeping this in view the information about the farming experience was gathered, and the findings revealed that nearly equal proportion of the contact farmers had medium (44.58%) and low (42.08%) level of farming experience whereas 13.34 per cent of the contact farmers were observed with high farming experience. The study found that 60.83 per cent of the contact farmers had observed with medium extension contact, while one fourth (26.25%) and 12.92 per cent of the contact farmers had observed under low and high level of extension contact, respectively.

The study depicted that nearly half (47.92%) of the contact farmers had undergone training about agriculture and allied activities for a period up to one week while 10.83 percent of the contact farmers they never attended any training programme pertaining to agriculture or allied enterprise. Scientific orientation is the degree of an individual respondent to utilize scientific methods in the farming operation, and the findings revealed that more than half, i.e. 56.67 per cent of the respondents possessed moderate scientific orientation. Innovativeness is the degree that helps an individual in the adoption of innovative technologies earlier than fellow community

members. The findings in Table 1 revealed that slightly above half (52.08%) contact farmers observed with a medium level of innovativeness while more than one third (35.84%) of the respondents reported a high category of innovativeness whereas nearly one-tenth (12.08%) represented low-level category of innovativeness. Similar findings were also reported by Ranjan *et al.* (2017); Murugan and Karthikeyan (2017); Verma *et al.* (2016) and Gupta *et al.* (2019).

Perception is closely related to the attitudes of an individual and attitude has a crucial role in decision making. The positive attitude boosts the chances for the adoption of improved technology. Keeping this in view, the research endeavour was initiated with an objective to ascertain the perception of the respondents towards the extension service of the Krishi Vigyan Kendra. The obtained findings are presented in Table 2.

It is observed from Table 2 that majority of the contact farmers (57.50%) had perceived that the extension service of KVK's was useful for them whereas 30.83 percent of the contact farmers rated that extension service of KVK's were more useful for them while 11.67 per cent graded extension service of Krishi Vigyan Kendra as less useful for the farming community. Overall, 88.33 per cent of the contact farmers perceived the extension service was useful for them to know about the recent advances in the technological field and allied science. This findings are in the conformity with the findings of Singh and Singh (2014); Ranjan *et al.* (2017) and Mishra *et al.* (2020).

The different extension activities implemented by the Subject Matter Specialists (SMSs) are grouped under three dimensions viz. knowledge disseminated, field & diagnostic visits, and mass media and group discussion utilized for the dissemination of the generated technology towards its end users. The perception of the contact farmers towards these extension activities was evaluated with help of the different statements about the usefulness of extension service. The extension activities of SMSs were grouped under Knowledge dissemination, field & diagnostic visits, and use of mass media & group discussion heads. The perception of the respondents about the usefulness of the extension activities implemented by KVK, was worked out with the help of scale developed by Chavda (2006).

Table 2: Distribution of the farmers according their perception towards extension service of Krishi Vigyan Kendra (N=240)

Category	Frequency	Percentage
Less useful	28	11.67
Useful	138	57.50
More useful	74	30.83
Total	**240**	**100.00**

The responses of the respondents were measured on a five-point continuum i.e. strongly agree, agree, undecided, disagree, and strongly disagree. The results of the same have been-given in Table 3. The average of the selected heads was worked out to judge the overall perception of the respondent about the assigned task of dissemination of knowledge.

The prime motive of extension services of the KVK is the dissemination of knowledge to the farmers. The perception of the farmers towards knowledge disseminated about the technological advances by the SMS's was assessed with help of six statements. The obtained average score indicated that a larger proportion (65.90%) of the respondents had their strong agreement, towards the usefulness of knowledge disseminated by the SMS's of KVK while one-fifth (21.94%) of the respondents recorded their agreement towards the same, whereas, only 2.92 per cent of the respondents mentioned that knowledge disseminated by KVK's were not useful for them.

Field and diagnostic visits of the SMS's to the farmer's field are important sources to get first had solutions about the technological problems. The field and diagnostic visits are helpful for the farming community to receive the technological advice from the SMS's. The findings indicated that nearly half (47.55%) and slightly above one-third (38.80) of the respondents perceived their strong agreement and agreement, respectively towards the usefulness of the field and diagnostic visits implemented by the SMSs of KVKs.

The use of mass media and group meetings are the fastest means of technology dissemination to the farming

Table 3: Distribution of the farmers according to their response towards different statements about perception of the farmers towards extension service of KVKs

Item	SA	A	UD	DA	SDA
Knowledge dissemination	65.90	21.94	8.89	2.92	0.35
Field & Diagnostic visit	47.55	38.80	16.25	5.79	2.73
Mass media & Group discussion	32.99	37.08	19.51	7.57	2.85

SA-Strongly agree A- Agree UN- Undecided DA- Disagree SDA-Strongly disagree

community. Slightly above one-third (37.08%) of the respondents recorded their agreement about the effective use of mass media and group discussion in the dissemination of technological knowledge whereas only 7.57 per cent of the contact farmers perceived their disagreement towards effective use of these sources for the dissemination of technology.

The association of personal, communicational, and psychological characteristics of the respondents with their perception towards KVK was computed with help of coefficient of correlation and the findings are given in Table 4.

It is evident from Table 4 that coefficient of correlation between farmers' characteristics of the respondents namely extension contact, training received, scientific orientation and innovativeness had positive and highly significant with their perception towards extension service of KVK at 0.01 level of probability whereas age, education, and farming experience displayed positive and significant relationship with the perception of farmers towards extension services of KVK at 0.05 level of probability. The above findings are in consonance with the findings reported by Thangjam *et al.* (2017).

Table 4: Coefficient of correlation between selected characteristics of the farmers with their perception towards extension service of KVK

Variables	Coefficient of correlation (r)
Age	0.1413*
Education	0.1524*
Occupation	-0.1032
Land holding	-0.0942
Farming experience	0.1632*
Cropping pattern	0.0462
Extension contact	0.4767**
Training received	0.4373**
Scientific orientation	0.4612**
Innovativeness	0.3662**

** Significant at 0.01 level of probability; * significant at 0.05 level of probability

CONCLUSION

It can be concluded that the majority of the respondents under the study perceived that the extension services of Krishi Vigyan Kendra were useful for the farming community to be aware of the technological knowledge in agriculture and allied sector, whereas some respondents reported that the extension activities, implemented by Krishi Vigyan Kendra were less useful for them. The findings further indicated that 88.33 per cent of the respondents perceived that the extension services implemented by Krishi Vigyan Kendra were useful to more useful for them whereas one-tenth (11.67%) of respondents were not satisfied with the efforts of Krishi Vigyan Kendra regarding the dissemination of knowledge. With this background, the administrators and the policymakers of the extension organizations can rethink the strategies, and plan the extension activities implemented by Krishi Vigyan Kendra accordingly so that each and every farmer under the jurisdiction of respective KVK's will be benefitted by the extension service of KVK's.

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