

Impact of Extension Interventions on Capacity Building of Tribal Backyard Poultry Owners in Kandhamal District of Odisha

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ABSTRACT

The study investigates the impact of extension interventions on capacity building of tribal backyard poultry owners in randomly selected six villages of G. Udayagiri and K. Nuagoan blocks of Kandhamal district of Odisha by Random proportionate sampling (RPS) method. Data were collected through a structured interview schedule from 60 respondent's (30 from each block) tribal poultry owners by personal interview method and they were analysed using percentage frequency and chi-square. Suitable extension interventions like group discussion, awareness cum animal health treatment camps, exposure visits, training programmers were applied in the study areas. The capacity building of poultry owners were measured on the basis of improvement in knowledge and change in attitude towards scientific poultry farming practices. The chi-square test was applied 'before' and 'after' interventions of various extension strategies. The study showed a significant improvement in the knowledge and attitude of tribal poultry owners after extension interventions. It concluded that the capacity building of poultry owners were increased on the basis of improvement in knowledge and scientific farming practices.

Keywords: Backyard, capacity building, extension, tribal.

INTRODUCTION

Poultry farming is possible in widely different agro-climatic environment as the fowl possesses marked physiological adaptability. Requirement of small space, low capital investment, quick return from outlay and well distributed turn over throughout the year make poultry farming remunerative in both rural and urban areas. The rearing of poultry provides an excellent opportunity for gainful employment to idle or unemployed members of rural communities. The adoption of backyard poultry farming as an entrepreneurial activity among resource poor tribal women Traditionally, the village poultry in tribal areas is based on non-descript varieties of poultry stock and their productivity is also very low as compared to improved backyard poultry. Rural poultry farming with improved birds provide a solution to food security to the needy villagers paving a way for sustainable agriculture in rural areas of India. Several studies show that these poor tribal people have not been enriched by the knowledge emanating from the research institutions or extension centre. Because of this the tribal people are not able to exploit the potential of their birds and sometimes

suffer from the loss of their flocks, leading to poverty, that the famers with large flock size were having more knowledge than the small flock size holders. Training and development leads to improved profitability and more positive attitudes towards profit orientation .

The use of appropriate information by poor livestock owners will help them to improve knowledge enabling them to obtain more output from their animals, thereby helping them to move out from the poverty. With all the aforementioned, the study examined the impact of extension interventions on capacity building of tribal backyard poultry owners in Kandhamal district of Odisha to develop extension strategies for improvement of backyard poultry farming and to study the impact of backyard poultry farming on empowerment of tribal poultry owner.

METHODOLOGY

The present study was conducted in G. Udayagiri and K. Nuagoan blocks of Kandhamal district of Odisha. Three villages were selected randomly from each block (*i.e.* G. Udayagiri and Rakia) for the study. Data were

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collected through a structured interview schedule from 60 respondent's tribal poultry owners in Kandhamal district. On the basis of existing status and constraints perceived by tribal poultry owners suitable extension strategies was developed in active consultation with the Chief District Veterinary Officer and scientists of KVK on Animal Nutrition, Veterinary Medicine and Livestock Production Management to improve the backyard poultry farming practices in Kandhamal district. The various extension interventions like group discussion, awareness cum animal health treatment camps, exposure visits, training programmers were applied in the study areas

Knowledge about poultry farming practices

The knowledge about poultry farming was measured through interview schedule containing thirty statements prepared for the purpose of the study. To measure the level of knowledge for each statement score 1 (yes) was given while the score 0 (no) was assigned for each poultry rearing practices. The summation of scores over the statements constituted the knowledge score of the respondent. The respondents were categorized into three equal groups on the basis of minimum and maximum knowledge scores as low, medium and high. Low:(<10 scores) Medium:(10-20 scores) High: (>20 scores) Attitude towards poultry farming practices

The scale developed by was used to measure the attitude of respondents towards poultry farming practices. The statements were rated into three point continuum. The assigned scores for positive statements were 3, 2, and 1 for agree, undecided and disagree, respectively and for the negative statements, the reverse order of scoring was used. Thus the maximum achievable score was 45 and minimum was 15. The respondents were categorized into three equal groups on the basis of minimum and maximum attitude scores as low, medium and high. Low:(<15 scores)Medium:(15-30 scores)High:(> 30 scores)

RESULTS AND DISCUSSION

Extension strategies for improvement of backyard poultry farming practices

The following extension strategies were adopted in all the selected villages of the study areas.

Awareness campaigns

Table 1 revealed that there are six awareness campaigns in different selected villages of G. Udayagiri and K. Nuagoan blocks were organized to aware the tribal people regarding the housing, feeding, management, healthcare, vaccination and marketing of improved backyard poultry farming. The details of different awareness campaigns are presented in table 1.

Table 1: Awareness campaigns conducted in G. Udayagiri and K. Nuagoan block of Kandhamal District

n= 60				
District	Blocks	Villages	Total no. of poultry owners	No. of selected respondents
Kandhamal	G. Udayagiri	Gambuli	45	10
		Katadaganda	40	10
		Sudipada	25	10
		Total	110	30
	K. Nuagoan	Banduguda	40	10
		Gungigaon	35	10
		Kelamaha	30	10
		Total	105	30
		Grand Total	215	60

Exposure visits

Table 2 shows that two exposure visits was organized at College of Veterinary Science, Orissa University of Agriculture & Technology, Bhubaneswar to motivate the tribal poultry owner. The number of participants in each visit was 30. These are the details of two exposure visits.

Table 2: Exposure visits of the tribal poultry owners

Particular	Blocks	Villages	Date	No. of participants
Exposure visits	G. Udayagiri	Gambuli	19/9/2016	30
		Katadaganda		
Sudipada				
K. Nuagoan	K. Nuagoan	Banduguda	24/10/2016	30
		Gungigaon		
		Kelamaha		

Trainings

Table 3 revealed that two training programmes (2 days) to tribal poultry owner were organized at Krishi Vigyan Kendra, Kandhamal and village level to improve the knowledge and skills of the poultry owner. The details of training programmes are presented in Table 3.

Table 3: Training programmes organized to tribal poultry owner

Particular	Blocks	Villages	Date	No. of participants
Training	G. Udayagiri	Gambuli	07 th -08 th November, 2016	30
		Katadaganda		
		Sudipada		
	K. Nuagoan	K. Nuagoan	Banduguda	14 th -15 th December, 2016
Gungigaon				
Kelamaha				

Improvement in knowledge

Table 4 shows the improvement in knowledge gain among the poultry owner 'before' and 'after' extension interventions. A cursory look at Table 4 indicates that before applying the extension interventions majority (96.67 %) of the respondents had low level of knowledge whereas, after extension interventions majority of the respondents (75.00 %) had medium level of knowledge.

Table 4: Distribution of respondents according to knowledge level 'before' and 'after' extension interventions

n=60

Variable	Category	Before	After	Chi-square value
Knowledge	Low	58(96.67)	15 (25.00)	64.67**
	Medium	02 (03.33)	45 (75.00)	
	High	00	00	
Total		60	60	

Value in parentheses indicate percentage **Significant (P<0.01)

Chi-square test was applied to find out the test of significance between 'before' and 'after' knowledge of the respondents. The Table 4 shows that, the chi-square value is highly significant at 1 per cent level which is a clear indication of improvement in knowledge among poultry owner in the study areas. Similar study was reported by Kirar *et al.*

Change in attitude

The attitude change among the poultry owner 'before' and 'after' extension interventions is presented in Table 5 which indicates that before applying the extension interventions majority of the respondents (91.67 %) had low level of attitude but after the extension interventions majority of the respondents (81.67 %) had medium level of attitude. The attitude change was significantly high after the intervention of the extension personnel.

Table 5: Distribution of respondents according to attitude level 'before' and 'after' extension interventions

n=60

Variable	Category	Before	After	Chi-square value
Attitude	Low	55 (91.67)	11 (18.33)	65.19**
	Medium	05 (08.33)	49 (81.67)	
	High	00	00	
Total		60	60	

Value in parentheses indicate percentage **Significant (P<0.01)

The Chi-square value is highly significant at 1 per cent level which is an obvious sign of change in attitude of respondents towards poultry farming practices. Similar study was reported by Kirar *et al.*

CONCLUSION

From the finding the importance of extension interventions on capacity building of tribal poultry owners in Kandhamal district of Odisha has the knowledge and attitude level of poultry significantly improve with the help of different extension interventions. The extension educational efforts are very successful for promoting backyard poultry farming practices and improving livelihood of poor farmers. There is need for capacity building of poultry owners by exposing them to knowledge and extension interventions in order to enhance high productivity.

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