

IMPACT OF TRAINING ON GOVERNMENT OFFICIALS WORKING IN DRY LAND ARID AREAS

Bhagwan Singh*, Vijay Avinashilingam, N.A.** and Pratibha Tiwari***

ABSTRACT

Training of extension functionaries is one of the important activities in transfer of farm technologies. The effectiveness and productivity of training programmes are crucial for achieving the desired results. So it is necessary to see that the training which was organized to improve and enhance the skills of extension personnels created a positive impact or not. So this study aimed at investigating the impact of training with respect to participants' expectations, confidence & effectiveness of the Model Training Course. The results of investigation revealed that the above training had mostly positive impacts. Regarding the overall effectiveness of training, approximately fifty per cent (48.39%) of trainees rated the training was excellent and the rest rated mostly as very good. The training was also found to be highly relevant and useful to meet the training needs of the extension personnel as well as their programme implementation skills and work productivity. It is therefore recommended that the trainees trained under the present programme should apply the knowledge and skills gained through this training programme in real field conditions to improve the farm production in general and productivity in particular.

INTRODUCTION

Agriculture and allied activities constitute the single largest component of India's gross domestic product, contributing nearly 25 per cent of the total. Rajasthan, the largest state of India was formed on 1956 and occupies an area of 3.42 lakh sq. Kms. As per the planning commission categorisation of agro-climatic zones, the 9 districts of Rajasthan namely Jaisalmer, Bikaner, Barmer, Jodhpur, Nagaur, Jhunjunu, Churu, Jalore, & Sikar falls under the western dry region (IV). The diverse agro-ecosystem of this arid region accompanied with less precipitation during *Kharif* season provides very less opportunities for the small land holders to go for more than one crop. Even practicing a single crop with the less production and productivity per hectare can't suffice to feed the family members. In order to make the agriculture profitable with the limited rainfall it is essential to re-examine the farming system holistically and propose a system, which could conserve natural resources sustainably to the farmers of arid Rajasthan. Therefore it is always advised to the small holders to have a farming system with multi-components which yield results when agriculture fails.

Training is the process of acquiring specific skills to perform a job better (Jucious, 1963). Training of

extension functionaries is one of the important activities in transfer of farm technologies. It helps people to become qualified and proficient in doing some jobs (Dahama, 1979). In-service training, one of the other hand, is offered by the organization from time to time for the development of skills and knowledge of the incumbents (Halim and Mozahar, 1997). The training is provided to enrich the skill, knowledge, attitude and behavioural competencies of the extension worker, so that they could disseminate the learnt information efficiently and effectively. The effectiveness and productivity of training programmes are crucial for achieving the desired results. Evaluation is an in-built mechanism in extension and training system. It serves as a tool for efficient operation of training programmes by providing feedback. It provides an opportunity for the course / training coordinator to take corrective measures by identifying its strengths and weaknesses for improving the effectiveness of training programmes (Kumar *et al.* 2005). Evaluation also helps us to find out the impact of training programmes on trainees. In other words, evaluation helps answering these questions viz., How did the trainees react? What did they achieve? Was the training programme worth for time, money and resources? Should this training programme be continued or terminated?

*Principal Scientist, Division of Transfer of Technology, Training & Production Economics, ICAR-CAZRI, Jodhpur

**Senior Scientist, Division of Transfer of Technology, Training & Production Economics, ICAR-CAZRI, Jodhpur

***Head, Division of Transfer of Technology, Training & Production Economics, ICAR-CAZRI, Jodhpur

Based on the information collected above regarding the various impacts the training caused will become a yardstick to decide the future course of action for the trainings of similar nature. Keeping in view the above, the present study focuses on the impact of training with respect to participants' expectations, confidence & effectiveness of the MTC.

RESEARCH METHODOLOGY

The study was conducted with the participants, who attended the Model Training Course (MTC) at ICAR-Central Arid Zone Research Institute (CAZRI), Jodhpur during 19-26 Oct, 2010 & 10-17 Oct, 2011 on "Sustainable rainfed farming system for dry land arid areas". A total of 31 participants viz. Agriculture Supervisor, Subject Matter Specialist (SMS), Assistant Agriculture Officer (AAO), Agriculture Officer (A.O), CAO, District Horticulture Officer (DHO), Assistant Director, Senior Assistant Director, Joint Director, Deputy Director (Hort.) of state department of Agriculture, horticulture and Krishi Vigyan Kendra from seven different states including Rajasthan, Chhattisgarh, Tamil Nadu, Karnataka, Maharashtra, Manipur and Nagaland were participated. A well-structured interview schedule was prepared regarding the various aspects of training like fulfillment of expectations, level of training effectiveness, change in level of confidence among participants, learning index of trainees and opinion of trainees about the training programme. The main objective of the training was to create awareness about the existing sustainable farming systems in arid areas and to provide information on soil, water and crop management technologies for its sustainability in arid areas. The data collection was done by interviewing trainees personally. Thereafter, the collected data were analyzed, tabulated and interpreted in the light of objective of the study. The learning index was calculated by the following formula:

Learning Index =

$$= \frac{(\text{Post training score} - \text{Pre training score})}{(100 - \text{Pre training score})} \times 100$$

RESULTS AND DISCUSSION

The results of the study along with the discussion

are presented sequentially as follows:

Profile of trainees

The participants group was heterogeneous in respect of their age, sex, education and service experience. The data enfolded in Table 1 indicates that more than fifty percent (54.84%) of the participants were between 41-50 years of age, whereas 25.81 per cent were more than 50 years age and about 9.68 per cent each with below 30 years and between 31-40 years. In case of education, majority (51.61%) of the participants were found to be graduate, while 25 percent of them were post graduate followed by 6.45 per cent possessing Ph.D. With respect to service experience, it was found that nearly 41.94 per cent of the trainees had 11 – 20 years. This was followed by 32.25 per cent between 21-30 years, 22.58 per cent with less than 10 years and a single participant who gained service experience of more than 30 years.

Fulfillment of expectations

Expectations, refers to the presumption or desire of the trainees about what might happen in the future after acquiring new knowledge and skills about watershed management. The trainees were asked to elicit their responses on three point continuum viz. extremely met, fairly met and satisfactorily met with score 3, 2 and 1 respectively. The data presented in Table 2 revealed that majority (58.06 %) of the respondents felt that their expectations were extremely met by attending the training programme, followed by 32.26 per cent of the respondents who felt their expectations were fairly met. However, only 9.68 per cent of the respondents expressed that their expectations were satisfactorily met. Similar findings were reported by Koshti and Vijayaragavan (2007).

Training Effectiveness

Training effectiveness refers to the degree to which something is successful in producing a desired result or impact of a training programme. In other words, effectiveness of training conceptualized in means of gain in knowledge & understanding, increase in self-motivation & confidence level and development of positive attitude & skills. For measuring training effectiveness, the trainees were asked to give their responses on three continuum viz. highly effective, effective and less effective with

Table 1. Profile of trainees

N-31

No. Particulars	Training course 2010-11		Total	Percentage
	19-26 Oct, 2010	10-17 Oct, 2011		
1. Education				
10+2				
Graduation	11	5	16	51.61
Post graduation	6	7	13	41.94
Doctorate	1	1	2	6.45
2. Age(Years)				
Below-30	2	1	3	9.68
31-40	2	1	3	9.68
41-50	7	10	17	54.84
More than 50	7	1	8	25.81
3. Service experience (years)				
0-10	4	3	7	22.58
11-20	6	7	13	41.94
21-30	7	3	10	32.25
>30	1	0	1	3.23
4. Caste				
SC/ST	5	4	9	29.03
OBC	6	4	10	32.26
General	7	5	12	38.71
5. Designation				
Agriculture Supervisor	0	1	1	3.23
Subject Matter Specialists (SMSs)	3	3	6	19.36
Asstt. Agriculture Officer (AAOs)	4	5	9	29.04
Agriculture Officer (AOs)	1	2	3	9.68
Circle Agriculture Officer (CAOs)	0	2	2	6.45
District Horticulture Officer (DHOs)	1	1	2	6.45
Asstt. Director (Horticulture)	4	0	4	12.90
Sr. Asstt. Director (Horticulture)	2	0	2	6.45
Joint Director (Horticulture)	2	1	3	9.68
Deputy Director (Horticulture)	1	0	1	3.23

Table 2. Response of trainees under trainers training programme during 2011-12

S.No.	Particulars	Training course 2011-12		Total	Percentage
		19-26 Oct. 2010	10-17 Oct. 2011		
1.	Fulfillment of Expectations				
	a. Extremely met	11	7	18	58.06
	b. Fairly met	5	5	10	32.26
	c. Satisfactorily met	2	1	3	9.68
2.	Level of Training Effectiveness				
	b. Highly Effective	10	7	17	54.84
	b. Effective	8	6	14	45.16
	c. Less Effective	0	0.00	0	0.00
3.	Change in level of confidence among participants (%)				
	a. Before training	57.40	52.64	110.04	55.02
	b. After training	77.47	78.62	156.09	78.05
	% gain	34.96	49.35	41.85	41.85
4.	Learning Index	47.11	54.85	51.20	51.20

score 3, 2 and 1 respectively. It is evident from Table 2 that majority (54.84%) of trainees expressed that the training programme was highly effective. It was followed by 45.16 per cent respondents, who felt that the training was effective. Interestingly, none of the trainees expressed that training was less effective. The findings reflects that the importance of adoption of integrated farming system module in agriculture to reap economic benefit in arid region. Similar findings were reported by Koshti and Vijayaragavan(2007).

Change in level of confidence among participants

Confidence provides impetus for achieving objectives. Also confidence is the resultant of gain in knowledge. The trainees were asked to state the level of confidence gained after the training and their responses were recorded on the three point continuum viz., high confidence, medium confidence and low confidence with score 3, 2 and 1 respectively. The data in Table 2 depicted that level of confidence among trainees was 55.02 per cent before training. But after training, their level of confidence was raised to 78.05 per cent resulting in whopping 41.85% gain in confidence. The sharp increase in level of confidence among trainees after training was

attributed to the effectiveness of the training programme. Training imparts a perfect blend of knowledge (teaching), skill (practical exercise) and attitude to the participants who undergo this process. All these factors enhanced learning of trainees and therefore, raised their confidence, level. Similar findings were reported by Koshti and Vijayaragavan (2007).

Learning Index

The Learning Index (LI) was developed for this training and the data presented in Table-2 indicated that trainees possess the LI of 51.20 Per cent. This index distinctly shows that the trainees had a fairly good learning experience of training on rainfed farming system. This might be due to various reasons viz. subject matter delivered, experts presentation, topics of practical importance and finally the training improves the motivation and morale of the trainees.

Overall effectiveness of training

It could be inferred from Table 3 depicts that approximately fifty per cent (48.39%) of trainees rated the training was excellent followed by 45.16 per cent as very good. Only negligible percentage of participant 6.45 per cent rated as good. However,

none of the trainees expressed training programme as average. This clearly shows that the training delivered the objective for what it was designed for.

Table 3. Overall opinion of trainees towards training

No.	Opinion of trainees	Frequency	Percentage
1.	Excellent	15	48.39
2.	Very good	14	45.16
3.	Good	2	6.45
4.	Average	0	0.00

Feedback on training atmosphere and methodology

The feedback from participants were collected and presented in Table 4. The feedback clearly reflects that the majority (90.32 %) of participants were fully satisfied with the atmosphere of training, as it pave way for free exchange of ideas between the trainees and the trainers. Similarly, they are fully satisfied (90.32 %) with medium of instruction, training methods (61.29 %), use of audio visuals (67.74 %), relevance of content (70.97 %), adequacy of content (67.74%) and sequencing of content (64.52 %). Further they were satisfied fully (32.26 %) and to a limited extent (51.61%) in connection with the practical orientation of the training. Further the participants suggested to include the following topics namely processing of *aloevera*, mushroom

cultivation, bee keeping, nutritional management of arid crops, processing and value addition of horticultural crops, preparation of bio pesticides, agricultureschemes and policies of Rajasthan state, management of crops and soils in different regions of India, rabbit farming and fishery, model farming system state wise for the training programmes in future.

CONCLUSION

The present study reveals that the participants expressed about the training programme on sustainable rainfed farming system for dry land arid areas was a rich learning experience. More than fifty per cent (58.06%) of the trainees felt that their expectations were extremely met by attending the training programme, whereas about 54.84 per cent of participants perceived that training programme was highly effective. The study further depicts that about 78.05 per cent of trainees had developed high level of confidence after training and the learning index of trainees was found to be 51.20 percent. This could be clearly said that this training definitely yields significant and positive impacts on improving motivation, morale and the skills of extension personnels. Further this training programme has immensely helped the trainees in improving the knowledge and sharpens their mental skills. It is therefore recommended that the trainees trained

Table 4. Feedback on training atmosphere and methodology

S.No	Item	Degree of satisfied					
		Fully		To a limited extent		Not at all	
		f	%	f	%	f	%
1.	Atmosphere	28	90.32	3	9.68	-	-
2.	Medium of instruction	28	90.32	3	9.68	-	-
3.	Training method	19	61.29	12	38.71	-	-
4.	Use of AV aids	21	67.74	10	32.26	-	-
5.	Timely information of day to day activity	19	61.29	10	32.26	2	6.45
6.	Duration of programme	24	77.42	6	19.35	1	3.23
7.	Relevance of content	22	70.97	9	29.03	-	-
8.	Adequacy of content	21	67.74	10	32.26	-	-
9.	Sequencing of content	20	64.52	9	29.03	2	6.45
10.	Practical orientation	10	32.26	16	51.61	5	16.13

under the present programme should apply the knowledge and skills gained through this training programme in real field conditions to improve the farm production in general and productivity in particular.

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