Motivational Profile of Agricultural Scientists

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ABSTRACT

Motivation denotes willingness of an individual to make efforts and exhibit desired pattern of work behaviour for achieving high level of performance and commitment to work. One of the challenges faced by research and extension management, system is to motivate scientist to become productive and achieve excellence in performance. Thus an attempt was made in the present investigation to explore into the motivational level of agricultural scientists working under ICAR and SAUs systems. The motives studied were personal achievement, social achievement and influence. The farm scientists of both ICAR and SAUs systems were found to be very low on personal Achievement, Social Achievement and Influence motivations. This is a deplorable situation which is sure to make the system sick. It is, therefore, highly desirable that motivational awareness and consciousness are created in them through appropriately designed programmes and activities. The motivational awakening created in the Agril. Scientists through motivational training, was found to stagnate over a period of 5 to 6 years. This is because of the work situation in their organisations which keeps them involved in routine activities without opportunity to become creative and exercise reasonable amount of autonomy with responsibility and accountability. Due attention is required to be paid to the work climate created by beauriocratic procedures and goallessness prevailing in the organisations/ institutions. It was found beyond any shadow of doubt that motivational levels of scientists are heightened through exposing them to well designed motivation training course and the motivational consciousness so created also lasts long, but exposure to one such training programme is not enough to set them on the path of achievement and effectiveness. The trainees need to further study literatures on motive, find or create opportunity to score a large number of fantasies and should include motivation in their teaching and research activities in a variety of way. Unless they practice and involve themselves in their work with clarity of goal and desire of excellence, they may not be able to internalise motives which is needed for continuous flow of energy to scale heights possibly in all walks of life.

Key words: Motivation; Work behaviour; Personal achievement; Social achievement; Influence;

Motivation is a term which denotes the willingness of employees to expand efforts and exhibit desired pattern of work behaviour in terms of levels of performance and commitment to the work (*Molonder and Winterton, 1994*). Various theories of motivation such as content and process theories of motivation point out the importance of motivation in enhancing the productivity of scientists. This also has been investigated through a number of studies, which have conclusively shown that one of the distinguished characteristics of a successful scientist is his / her high motivation to achieve and influence. *Crane (1965)* found that at any stage of career cycle, university scientists with high motivation level were more likely to be productive and win recognition than the scientists who were low in motivation level. Also *Atkinson et. al., (1975)* found that motivated person would engage in an activity more rigorously and more efficiently than an unmotivated one. According to *Mehta (1994)* motivation for social achievement forms the basis for public action that shows a concern for the lives of others. Such motivation also triggers off collective action for enhancing understanding and awareness of the need for social development on the one hand and for stimulating vigorous state action in the pursuit of public goals on the other.

In view of the importance of motivation for

agricultural scientists an attempt was made in the present investigation to make an exploration into the existing levels of personal achievement, social achievement and influence motivation of farm scientists working under ICAR & SAU systems.

METHODOLOGY

For this study, data were collected from 116 respondents. Out of them 55 were those who underwent motivation and entrepreneurship development training courses organised by Centre of Advance Studies in Agricultural Extension at Indian Agricultural Research Institute, New Delhi 5-6 years ago. The remaining 61 respondents were those who were undergoing various training courses organised at the Division of Agricultural Extension, Indian Agricultural Research Institute at the time of data collection. The data collected from them were analysed and the findings reported under various sub-heads as under. The respondents' motives were measured by subjecting them to a Thematic Apperception Test instrument. In case of the respondents undergoing training courses the TAT instrument with four pictorial cues were administered and fantasies produced by them were scored for the three motives under study. In case of the respondents who had already undergone motivational training courses at IARI, the data were collected through a questionnaire send to them through mail. In their case they were asked to write a fantasy on their own imagination which was scored for the three motives under study. The three motives were conceptualized as under:

Personal Achievement Motivation: An urge to excel, a desire for success in relation to some standard of excellence in one's life and work. This is important for personal as well as institutional / organisational growth and development.

Social Achievement Motivation: A desire for success in relation to some standard of excellence in community life and / or group work performance. This is important for team building and integration of self goal with that of others and the work organisation. It develops a sense of ownership and in turn concern for the growth and development of the organisation and institution.

Influence Motivation: A desire to influence on going situation, to take actor roles and become proactive in influencing colleagues, on going situation and system for achieving organisational goals.

RESULTS AND DISCUSSION

Motivational Orientation of the Respondents: The motives of the respondents as revealed by the fantasies written by them are reported in Table 1.

Table 1. Motivational Orientation of the respondents

Motives	Motivational Orientation of the respondents (in frequency)				
	Already Trained (N=31)		Undergoing training (N=53)		Total
1. Personal Achievement motivation (PAI)					
(a) Only PAI	6	(19.35)*	28	(52.830	24
(b) PAI cum SAI	2	(6.450	8	(15.09)	10
(c) PAI cum Influence	3	(9.67)	6	(11.320	9
Total	11	(35.48)	4	2(79.24)	53
2. Social Achievement motivation (SAI)					
(a) Only SAI	8	(25.88)	10	(18.860	18
(b) SAI cum PAI	2	(6.45)	8	(15.09)	10
(c) SAI cum Influence	-	8(15.09)	8		
Total	10	(31.25)	26	(49.05)	36
3. Influence motivation					
(a) Only Influence	-	293.770	2		
(b) Influence cum PAI	3	(9.67)	6	(11.320	9
(c) Influence cum SAI	-		8	(15.09)	8
Total	3	(9.67)	16	(30.18)	19

* Data under parentheses are percentages.

The data reported in Table 1 throw enough light on the motivational profile of the respondents as discussed below.

Personal Achievement Motivation: About 36% of the respondents who received training 5-6 years ago and about 79% of the respondents undergoing training at the time of data collection could verbalise personal achievement motivation. Since in case of the former category of the respondents the scoring is based on single fantasy and in case of the other category of the respondents scoring is based on four pictorial cues, the difference in percentage might have occurred due to greater opportunity of expression provided to the later group. For all practical purposes they may be treated at par. In other words, the two groups of the respondents do not seem to significantly differ form each-other so far their orientation toward personal achievement motivation is concerned.

Social Achievement Motivation: About 31% of the respondents in category one and 49% of respondents in category two verbalised social achievement motivation. Again number of fantasies seem to have played its role otherwise the respondents in category one appear to have more consciousness towards social well being. The picture however would be more clear when their relatives motive strengths would be discussed later on.

Influence Motivation: So far influence motivation is concerned the percentage of respondents who verbalised this in both the groups was substantially reduced. In case of category one only about 10% of the respondent verbalised this motive whereas in group two about 30% of them verbalised it. The number of respondents in both the groups who could verbalise influence motivation were too small to make any comparative analysis.

Motives in Combination: As reported in Table 1, a good number of respondents had given expression to only one of the three motives in their fantasies. But there are some stories, which contained concerns for more than one motive. There are at least 10 respondents who verbalised both PAI and SAI, 9 verbalised PAI and Influence and 8 verbalised SAI and influence in the same story. The data thus indicate that 9 respondents had influence oriented personal achievement motivation whereas 8 respondents has influence oriented social achievement motivation. It is possible that in real life situation these respondents would make use of their ability to influence the ongoing situation to achieve their personal and social goals. Those respondents who could verbalise personal as well as social achievement motivations in same stories might have integrated their personal goals with the goals of a society or the organisation, they work for. At least to some extent, such respondents were found in both the groups but in view of their number being very small, inter-group variation in this respect is being ignored right now.

Motivational Status of the Respondents: For measuring motivational status of the respondents the stories written by them were scored for the three motives and their eight components. The score obtained by a respondent for a particular motive indicated his/ her motivational status. The motivational statuses of the two groups of respondents are reported as under.

Respondents who Already Received Training: The motivational status of the respondents who had already received motivational training is reported in Table 2 in terms of the scores obtained by them. It may be mentioned here that the reported score is based on single fantasy written by them which were obtained from 31 of the 46 respondents.

Table 2. Motivational Status of the Respondents who already Received Motivational Training

Obtained Score	Personal Achievement Motivation	Social Achievement Motivation	Influence Motivation
0	20(64.52)	21(67.74)	28(90.32)
3	4(12.90)	399.680	2(6.45)
4	6(19.35)	6(19.35)	1(3.23)
5	1(3.23)	1(3.23)	0
Mean	1.32	1.22	0.32
S.D.	1.85	1.83	1.01
Range	0-5	0-5	0-4

The data reported in Table 2 are highly disappointing. The respondents whose data are reported in the table are those who are already exposed to the three motives and their components and who were asked to write an imaginary story which may give expression to maximum number of motives and their components. In spite of the above instruction, personal achievement motivation was absent in about 64% of the story, social achievement motivation in about 68% of the story and

influence motivation in hopping 90% of the story. Even the stories which contained these motivations the verbalisation of motive components was quite poor. Out of the eight motive components only three were verbalised in about 19% of the stories for personal and social achievement and only in 3% of the story for influence motivation. Four components were verbalised only in one story for personal and social achievement motivation and in the remaining stories only two components were verbalised.

The average score obtained by this group of respondents for all the three motives are measurably poor. Out of the obtainable score of nine the average obtained scores were found to be only 1.32 for personal achievement, 1.22 for social achievement and miserable 0.32 for influence motivation. The standard deviations in case of all the three motives were found to be pretty high indicating thereby that the respondents were highly heterogenous in their motivational status.

The data reported above raise a big question about effectiveness of motivation development training imparted to them. In order to find an answer to this question the motivational status of the respondents immediately after receiving motivational training was reviewed. It may be mentioned here that these respondents received their motivational training at IARI under the auspices of Advance Centre in Extension Education during 1995-96. Their motivational data were collected immediately after the training courses which are reported in Ph.D thesis entitled "Motivating and Empowering Agricultural Scientists for Facilitative and People Oriented Development Activities- An Action Research" (*Singh, 1997*). The data reported in the thesis were Personal Achievement Motivation (average 1.33), Social Achievement Motivation (average 1.25) and Influence Motivation (average 1.83) scores from 4 stories.

Since the data reported in the thesis were based on four stories written by the respondents and there was only one story written in the present investigation, the average score obtained for one story by them are also reported in the table. When the data based on single story obtained by the respondent on conclusion of training course and after 4-5 year of training were compared, an striking resemblance was observed. In case of personal achievement motivation the average data obtained then was 1.33 as against 1.32 now, in case of social achievement motivation the average data obtained then was 1.25 as against 1.22 now but there is a great difference in the data of influence motivation obtained then (1.83) and obtained now (0.32).

It is obvious from the comparison made above that there is a stagnation in the motivational status of the ICAR and SAUs scientists so far their personal and social achievement motivation are concerned and there is a distinct deterioration in their influence motivation. This state of affairs is not easy to explain, yet the work situation and motivational climate prevailing in the institution / organisation seems responsible for this. The motivational course to which they were exposed during the training programme did create some awareness in them about these motives, which could have been enhanced further, had they involved themselves in creative activity with adequate sense of personal and social achievement. But from the data it appears that during the post training period they were involved in routine   activities perhaps imposed on them and they were not able to exercise any autonomy in the work situation. Perhaps this is also the reason that their influence motivation has gone down. They were obviously not able to influence ongoing situation and submitted to the activities assigned to them and instructions offered to them from the seniors in the organisational set-up. If this logic is accepted then, mere exposition to the motivational training labs could be only necessary but not sufficient to enhance motivational status of the scientists working in ICAR and SAUs system. For the training to be effective in enhancing motivational status of the scientist and making them more creative as well as productive, there is a need to bring commensurate change in the work situation and motivational climate of the institutions/ organisations they work, so that they may avail greater autonomy and organisational support rather than control in carrying out the assigned responsibilities.

Respondents Undergoing Training: The motivational status of the respondents who were undergoing some training course at the time of data collection are reported in Table 3.

Table 3. Motivational Status of the respondents undergoing training

Obtained Score	Personal Achievement Motivation	Social Achievement Motivation	Influence Motivation
0	9 (16.980	26(49.050	38(71.69)
2 - 3	16(30.18)	10(18.86)	9(16.98)
4 - 5	12(22.64)	7(13.20)	5(9.430
6 - 8	11(20.75)	8(15.09)	1(1.880
9 and above	5(9.43)	2(3.77)	-
Mean	4.09	2.56	0.96
S.D.	2.80	3.20	1.75
Range	0-11	0-12	0-8

The data reported in Table 3 is based on the scores obtained by the respondents from four stories written by them. Hence the potentially obtainable score for any respondent is 36 out of which the mean score obtained by them for personal achievement motivation was found to be only 4.09, for social achievement motivation only 2.56 and for influence motivation mere 0.96. Obviously, the motivational status as indicated by the mean score is miserable. The data further reveal that about half of the respondents did not verbalise social achievement motivation and about 3/4th of them failed to verbalise influence motivation. On the other hand, only about 9% of the respondents could obtain 1/4th or little over the obtainable score in case of personal achievement motivation only about 4% of them could obtain 1/4th of obtainable score in case of social achievement motivation and none in case of influence motivation. The standard deviations in case of all the three motives are pretty high which indicate how heterogenous the respondents are in their motivational profile though they are quite homogenous in respect of their age, education, profession and experience.

The motivational status of the scientists as reported above is quite disappointing. This is more so since scientific community which is engaged in innovation creation is expected to be quite creative and innovative themselves but with such a miserable motivational status creativity and innovativeness are unlikely to be forthcoming. However it is of further interest to see whether this group of respondents is by any chance an isolated lot or whether they represent the agricultural scientific community in general and have commonality

with the other group of respondents who received their motivational training 4-5 ears ago. The pre-training motivational status data of this group of respondents are also reported in the Ph.D thesis of Singh, Neeraj entitled "Motivating and Empowering Agricultural Scientists for Facilitating and People Oriented Development Activities- An Action Research". The data so reported in the thesis were personal Achievement Motivation (Mean 4.37) Social Achievement Motivation (Mean 2.47) and Influence Motivation (Mean 3.95)

When we compare these data with those obtained by the respondents undergoing training they are found very close to each other in respect of personal achievement motivation (4.09 as against 4.37) and social achievement motivation (2.56 as against 2.47) however in case of influence motivation they appear quite variant (0.96 as against 3.95). On the whole, the two groups of respondents appear to be similar and the variance in case of influence motivation in particular, can be attributed to chance factor.

CONCLUSION

The farm scientists of both ICAR and SAUs systems were found to be very low on personal achievement, social achievement and influence motivations. It is, therefore, highly desirable that motivational awareness and consciousness are created in them through appropriately designed programmes and activities. The motivational awakening created in the Agricultural Scientists through motivational training, was found to stagnate over a period of 5 to 6 years. This is because of the work situation in their organisations which keeps them involved in routined activities without opportunity to become creative and exercise reasonable amount of autonomy with responsibility and accountability. Due attention is required to be paid to the work climate created by beauriocratic procedures and goallessness prevailing in the organisations/ institutions.

It was found beyond any shadow of doubt that motivational levels of scientists are heightened through exposing them to well designed motivation training course and the motivational conciousness so created also lasts long, but exposure to one such training programme is not enough to set them on the path of achievement and effectiveness. The trainees need to further study

literatures on motive, find or create opportunity to score a large number of fantasies and should include motivation in their teaching and research activities in a variety of way. Unless they practice and involve themselves in their work with clarity of goal and desire of excellence, they may not be able to internalise motives which is needed for continuous flow of energy to scale heights possibly in all walks of life.

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