Journal of Academia and Industrial Research (JAIR)
Volume 2, Issue 6 November 2013

ISSN: 2278-5213

RESEARCH ARTICLE

Problems Faced by Farmers' Groups under Agricultural Technology Management Agency in Jorhat district of Assam

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Abstract

The research study was conducted with an objective to identify the problems faced by the members of the farmers' groups organized under Agricultural Technology Management Agency (ATMA) in Jorhat district of Assam. A total of 168 respondents were selected by following proportionate cum random sampling technique from 24 nos. of farmers' groups of three sub-divisions of Jorhat district, Assam. Data pertaining to the problems were collected by administering a structured schedule and analysis was done with appropriate statistical tools. The findings revealed that the major problems faced by the group members include non-availability of various irrigation facilities, lack of special market for organic produce, lack of need based training, lack of electricity, non-availability of seed in the village at proper time, non-availability of own vehicle, unavailability of raw materials needed for storage construction, high cost of infrastructure, unavailability of organic manures and high cost of pump sets and other equipments required for irrigation.

Keywords: Jorhat, random sampling technique, irrigation facilities, raw materials, organic manures.

Introduction

Rapid agricultural growth is the key to poverty alleviation and overall economic development of the farming community. The changing scenario of agriculture with the introduction of the reforms process warrants a remarkable demand on the extension system to revise their own approaches and methodology to carry the appropriate technologies to the farming communities. The existing extension system was largely based on agricultural activities and it was top to down in nature, whereas, ATMA activities are based on farming system approach with bottom-up planning. The primary objective of organizing the farmers into groups is that most of the farmers are small and marginal farmers in our country. Secondly, most of them have faced some problems which are not possible to solve alone. Apart from this, they have small holding with average size less than 1 ha for cultivation and their production level was also not up to the satisfactory level.

In a study conducted by Gain and Satish (1995) entitled 'A micro study on group dynamics and group functioning' revealed that most of the SHGs members were illiterate and the group member who was educated and employed as a village school teacher could not give adequate time to group activities. Purkyastha (2004) reported in his study in Assam that irregular contributions, dominance of some members who use SHG for personal benefit, delay in getting subsidy cum loan, lack of co-operation from banks due to shortage of staff were some major constrains found in his study.

Considering the initiative taken under ATMA for formation of farmers' groups particularly for small and marginal farmers, the present study is planned with following specific objective to identify the problems and difficulties faced by the members of farmers' Groups to sustain their group activities.

Materials and methods

Study area and sample size: The present study was conducted in Jorhat, Titabar and Majuli sub-divisions of Jorhat district of Assam. Two development blocks from each sub-division were selected purposively and from each selected development block, two villages were selected purposively where ATMA programme was performed well. Form each village, two farmers' groups and from each group 7 group members including president and secretary were selected randomly. Thus, total numbers of respondents for the study were 168.

Data collection: The data was collected by the investigator through personal interview technique with the help of structured schedule.

Experimental design and statistical analysis: A set of common problems faced by the group members of farmers' groups were prepared after studying and consulting available literature, discussion with experts and focused group discussion with farmers' groups in a non-sampling area.

The problems were found out and classified into thirteen classes enlisted as follows:

1. Personal problems
2. Social problems
3. Land utilization problems
4. Irrigation problems
5. Marketing problems
6. Transportation problems
7. Institutional problems
8. Problems related to natural calamities
9. Problems related to post-harvest technology
10. Problems related to seed
11. Problems related to fertilizer
12. Problems related to pesticides
13. Problems related to organic farming.

The respondents were asked to give their response against each problem by choosing a given option i.e. very serious, serious and not so serious. The respondents were asked to describe any other problem(s) faced by them in addition to the above mentioned problems. The responses thus, received were categorized on a three point continuum as given in Table 1. Weighted Mean Score (WMS) was used to find out the intensity of each problem. The total rank scored for each problem was obtained by multiplying the frequency of problems with the respective weightage and adding them up. Then, the mean score of each of the problems were found out along with their respective rank.

Table 1. Response categories with scores assigned.

Responses	Score assigned
Very serious	3
Serious	2
Not so serious	1

Results and discussion

A number of problems were faced by the group members of farmers' groups to sustain their group activities. There were thirteen (13) major problems which are again having fifty (50) sub-problems. In a study conducted by Suriakanth (2000) entitled 'Literacy essential for SHGs' revealed that SHGs were faced with the problem of maintenance of records and accounts as most members were illiterate.

Table 2. Rank wise distribution of personal problems faced by the respondents.

Problems	WMS	Rank
Lack of self confidence	1.11	V
Lack of formal education	1.43	II
Lack of time due to family burden	1.52	I
Lack of prior experience	1.39	III
Lack of coordination with other members	1.23	IV

It can be seen from the Table 2 that the problem 'lack of time due to family burden' ranked first and the problem 'lack of self confidence' ranked last among the personal problems.

Though the self-confidence of farmers was not a serious problem for working as a group, they do not have much time for group activities due to some other family matters. It can be seen from Table 3 that the major social problem faced by the group members was 'Lack of support from family members' while 'Lack of appreciation from other farmers in the locality' ranked second among the social problems. So, ATMA should give emphasis on motivating the other individual farmers towards group approach through field day or success story.

Table 3. Rank wise distribution of social problems faced by the respondents.

Problems	WMS	Rank
Lack of support from family members	1.20	I
Lack of appreciation from other farmers in the locality	1.18	II

It can be seen from Table 4 that 'Unavailability of land as per requirement' ranked first, 'Lack of capital' ranked second, while the problem 'Group members do not contribute their land equally' ranked third among the land utilization problems faced by the respondents. The own cultivable land of the group members varied from one another and some of them were landless farmers. As a result the group members do not want to contribute their land equally. So, the concept of community development should be introduced in the villages by ATMA.

Table 4. Rank wise distribution of land utilization problems faced by the respondents.

Problems	WMS	Rank
Lack of capital	1.18	II
Group members do not contribute their land equally	1.12	III
Unavailability of land as per requirement	1.67	I

It can be seen from Table 5 that the different irrigation facilities i.e. availability of tank and canal, tube well, different irrigation systems in the farming areas etc. were the major irrigation problems faced by the group members. Therefore, ATMA should give more emphasis on this because water is one the major requirements for crop growth as well as for better production. Access to electricity and supply of pump sets also could help the farmers groups for better performance.

Table 5. Rank wise distribution of land irrigation problems faced by the respondents.

Problems	WMS	Rank
Lack of adequate knowledge regarding irrigation.	1.92	IV
Non-availability of different irrigation facilities	2.56	I
High cost of pump sets and other equipments	2.38	III
Lack of electricity	2.46	II

George (1984) mentioned that marketing problems appeared to be one of the most interactive problems in the process of promoting self-employment through rural industrialization. It can be seen from Table 6 that most of the farmers do not know the proper techniques of marketing. Therefore, ATMA should provide them the basic knowledge on maintenance of standard quality produce as well as the knowledge on marketing techniques through training at proper time.

Table 6. Rank wise distribution of marketing problems faced by the respondents.

Problems	WMS	Rank
Lack of marketing facilities	1.97	II
Lack of knowledge about proper techniques of marketing	1.94	III
Lack of knowledge about maintaining standard quality	2.37	I

It can be seen from Table 7 that 'High cost of hiring vehicle' ranked first, 'Non-availability of own vehicle' ranked second among the transportation problems faced by the respondents. To overcome these problems, ATMA should provide carrier vans with storage facilities to the farmers' groups.

Table 7. Rank wise distribution of transportation problems faced by the respondents.

Problems	WMS	Rank
Poor condition of road	1.58	III
Non availability of own vehicle	2.35	II
High cost of hiring vehicle	2.36	I

It can be seen from Table 8 that 'Lack of need based training' ranked first while 'Conflict between leaders and general group members' ranked last among the institutional problems faced by the respondents. So, there should be provision for need based training by the linking organization i.e. ATMA.

Table 8. Rank wise distribution of institutional problems faced by the respondents.

Problems	WMS	Rank
Lack of need based training	2.50	I
Lack of coordination among the group members	2.29	II
Conflict between leaders and the group members	1.12	V
Poor attendance of members in group meetings	1.26	IV
Lack of proper guidance from linkage institute	1.50	III

It can be seen from Table 9 that 'Flood' ranked first while 'Hailstorm' ranked last among the problems faced by the respondents related to natural calamities. The 'flood' problem was faced by all the group members of Majuli sub-division. Since, flood is a natural calamity so control over flood is very difficult. Therefore, during the flood period, ATMA should suggest farmers' groups for cultivation of upland and short duration crops.

Table 9. Rank wise distribution of problems faced by the respondents related to natural calamities.

Problems	WMS	Rank
Drought	1.86	II
Flood	2.13	I
High rainfall	1.76	III
Hailstorm	1.47	IV

It can be seen from Table 10 that 'Unavailability of raw materials needed for storage construction' ranked first while 'High cost of raw materials' ranked last among problems faced by the respondents related to post-harvest technology. So, strengthening of basic infrastructures for storage and access to supply of raw materials (may be at cheaper price) should be provided by ATMA to overcome these problems related to post-harvest technology. Provision of cold storage facilities is also necessary for better implementation of the programme.

Table 10. Rank wise distribution of problems faced by the respondents related to post-harvest technology.

Problems	WMS	Rank
Lack of knowledge on post-harvest technology	2.36	III
Non availability of raw materials locally	2.23	IV
Too costly infrastructure	2.40	II
High cost of raw materials	1.94	V
Unavailability of raw materials needed for storage construction	2.52	I

It can be seen from Table 11 that majority of the farmers reported that they did not get seeds when needed. So, ATMA should give emphasis on this problem by supplying access to seed at proper time. Most of the farmers mentioned that the quality of seed provided by ATMA was good. The reason behind this may be either the farmers were not conscious about the seed quality or the quality of seed provided by ATMA was really good.

Table 11. Rank wise distribution of problems faced by the respondents related to seed.

Problems	WMS	Rank
Lack of knowledge on certified seed	2.27	III
High cost of certified seed	2.43	II
Non availability of seed in village at proper time	2.52	I
Quality of seed provided by ATMA	1.33	IV

Table 12. Rank wise distribution of problems faced by the respondents related to fertilizer.

Problems	WMS	Rank
Lack of adequate knowledge about fertilizer (dose, time of application, method etc.)	2.02	III
High cost of fertilizer	2.18	II
Quality of fertilizer provided by ATMA	1.35	IV
Storage of fertilizers	2.27	I

It can be seen from Table 12 that majority of the farmers faced the problem of storage of fertilizer. For this, ATMA should provide storage facilities to the farmers' groups or should organize some training on storage. Most of the farmers mentioned that the quality of fertilizer provided by ATMA was good. It can be seen from Table 13 that 'High cost of pesticides' ranked first while 'Quality of pesticide provided by ATMA' ranked last among the problems faced by the respondents related to pesticides. This indicates that though quality was good the amount of pesticide provided by ATMA was not sufficient as required by farmers.

Table 13. Rank wise distribution of problems faced by the respondents related to pesticides.

Problems	WMS	Rank
Lack of technical knowledge in the use of pesticides	2.23	III
High cost of pesticides	2.36	I
Non availability of desired pesticides	2.33	II
Quality of pesticide provided by ATMA	1.36	IV

It can be seen from Table 14 that 'Lack of special market for organic produce' ranked first while 'Non-remunerative price for organic produce' ranked last among problems faced by the respondents related to organic farming. It has been observed that there is very limited scope of organic products as well as organic markets in Assam. So, to overcome this problem, access to organic manure supply should be the first step in all the ATMA oriented districts of Assam. Introduction of 'vermicompost' concept is the key to popularize organic farming. So, training on vermicompost should be conducted at village level. After that, more emphasis should be given on organic markets in those areas where ATMA programme was introduced.

Table 14. Rank wise distribution of problems faced by the respondents related to organic farming.

Problems	WMS	Rank
Lack of adequate knowledge on organic farming	2.42	III
Non availability of organic manures	2.48	II
Non-remunerative price for organic produce	2.24	IV
Lack of special market for organic produce	2.60	I

Conclusion

By probing deep into the problems, it can be concluded that the major problems faced by the group members includes non-availability of different irrigation facilities, lack of special market for organic produce, lack of need based training, lack of electricity, non-availability of seed in the village at proper time, non-availability of own vehicle, unavailability of raw materials needed for storage construction, too costly infrastructure, unavailability of organic manures and high cost of pump sets and other equipments required for irrigation.

The following suggestions can be put forward for solving these problems with the help of concerned Government or Non-government agencies:

1. Make provision of different types of irrigation facilities for attaining better results by the farmers' groups.
2. More emphasis needs to be given on special organic markets in those areas/ districts where organic farming is being practiced as encouraged by ATMA.
3. Periodically, training should be imparted to the farmers based on their training needs to be able to meet the market demands of produce.
4. Make provision of extending electrical connections and providing regular electric supply to the farmers mostly living in rural areas.
5. Timely supply of seed in the villages to be ensured when needed by farmers.

Acknowledgements

Author express his heart full thank to Dr. R.K. Talukdar, Former Prof. and Head, Dept. of Extension Education, AAU, Jorhat for his meticulous guidance, indelible inspiration, ingenious suggestions, mellifluous nature and indefatigable attitude and to Dr. S. Borua, Mr. S. Barman and Mr. R. Baruah for their constructive criticisms, persistent encouragement and support.

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