CONSTRAINTS FACED BY THE FARMERS AND SUGGESTIONS GIVEN BY THEM TO OVERCOME CONSTRAINTS FOR ADOPTION OF TISSUE CULTURE TECHNOLOGY IN BANANA

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ABSTRACT

The study was conducted on a random sample of 100 farmers from Anand and Borsad Taluka of Anand district of Gujarat state to know the constraints faced by them for adopting tissue culture technology in banana crop and also to seek the suggestions given by them to overcome the constraints. The data were collected by personal contact. It came to know that major constraints faced by banana growers for adopting tissue culture technology were irregular supply of electric power followed by lack of finance, fluctuating market price of banana, high price of tissue culture plants , lack of incentives from the government and the suggestions given by farmers to overcome the constraints were timely and sufficient electric power should be provided, efforts should be made to minimize cost of tissue culture raised banana plants, there should be provision of subsidies.

Keywords : *tissue culture technology, constraints, adoption*

INTRODUCTION

Banana is an important fruit crop of the world which is cultivated over an area of more than four million hectares and its annual production is more than seventy million tons. Bananas are now grown pan tropically in one hundred and thirty countries which is more than any other fruit. Most of the bananas are used as fresh fruits. Bananas are also used in many other forms including banana puree, ice cream, baked desserts and can also be made into beer and wine. The recent advances in banana production technology like tissue culture have demonstrated that scientific management has great potential for increasing the banana production. However due to some reasons the farmers still hesitate to adopt this technology. This demands careful analysis of the constraints faced by the farmers which hinder the adoption of new technology.

OBJECTIVES

(1) To study the constraints faced by the farmers to adopt tissue culture technology for banana crop

(2) To seek the suggestions by the farmers to overcome the constraints

METHODOLOGY

The study was conducted on a random sample of 100 farmers from Anand and Borsad Taluka of Anand district and the data were collected by personal contacts. The responses were collected through pre tested, well structured, Gujarati version, personal interview schedule. The respondents were contacted at their home or at their field. For measuring the constrains in the adoption of tissue culture technology in banana crop, the respondents were asked to state the items of difficulties faced by them in three categories such as most important, important and less important and score was assigned 3, 2 and 1, respectively. Total score and mean score were computed for each item and rank order was then given. Further they were asked to give their valuable suggestions to overcome the constraints. The suggestions offered were ranked on the basis of total score and mean score of respondents who reported respective suggestions.

RESULTS AND DISCUSSION

Constraints

Constraints in adoption of new technology never end. However they can be minimized if known to policy makers and planners. The data in this regard are presented in Table: 1.

Table 1: Distribution of tissue culture raised banana growers according to limitations faced by them

n=100

Sr. No.	Limitations	Total Score	Mean Score	Rank
1	Irregular supply of electric power	179	1.79	1
2	High price of tissue culture plants	125	1.25	4
3	Lack of finance	154	1.54	2
4	Lack of transport facility	102	1.02	8
5	Natural calamities	111	1.11	6
6	Lack of technical guidance	98	0.98	9
7	Fluctuating market price of banana	148	1.48	3
8	Non availability of tissue culture banana plants in time	95	0.95	11
9	Lack if incentives from the government	123	1.23	5
10	High cost of fertilizers	97	0.97	10
11	Lack of market facilities	103	1.03	7

It can be seen that major constraints faced by farmers to adopt the tissue culture technology were: irregular supply of electric power (1.79) rank first followed by lack of finance (1.54), fluctuating market price of banana (1.48), high price of tissue culture plants (1.25), lack of incentives from the government (1.23), Natural calamities (1.11), Lack of market facilities (1.03), Lack of transport facility (1.02), Lack of technical guidance (0.98), High cost of fertilizers (0.97), Non availability of tissue culture banana plants in time (0.95).

In nutshell, irregular supply of electric power (1.79) rank first followed by lack of finance (1.54), fluctuating market price of banana (1.48), high price of tissue culture plants (1.25), lack of incentives from the government (1.23) were the major limitations of tissue culture raised banana growers.

Suggestions

An attempt was also made to ascertain suggestions from farmers to overcome limitations faced by them in tissue culture raised banana cultivation. Suggestions given by the farmers were collected, summarized and presented in Table-2.

Table 2: Distribution of tissue culture raised banana growers according to suggestions to overcome the limitations faced by them

n=100

Sr. No.	Suggestions	Total Score	Mean Score	Rank
1	Efforts should be made to minimize cost of tissue culture raised banana plants	173	1.73	2
2	Training on new cultivation technology should be imparted	148	1.48	5
3	Timely and sufficient electric power should be provided	189	1.89	1
4	Market facility should be provided nearby place	135	1.35	7
5	There should be provision of subsidies	169	1.69	3
6	Rate of agricultural produce should be regulated	146	1.46	6
7	Sufficient credit at reasonable interest rate should be provided	158	1.58	4

The result presented in Table 16 indicates that major suggestions given by the farmers were: Timely and sufficient electric power should be provided (1.89), Efforts should be made to minimize cost of tissue culture raised banana plants (1.73), There should be provision of subsidies (1.69), Sufficient credit at reasonable interest rate should be provided (1.58), Training on new cultivation technology should be imparted (1.48), Rate of agricultural produce should be regulated (1.46), Market facility should be provided nearby place (1.35).

To epitomized the findings it can be said that majority of the farmers gave suggestions to overcome the limitation were Timely and sufficient electric power should be provided, Efforts should be made to minimize cost of tissue culture raised banana plants, There should be provision of subsidies.

CONCLUSION

From the above discussion it can be concluded that major constraints faced by banana growers for adopting tissue culture technology were irregular supply of electric power followed by lack of finance, fluctuating market price of banana, high price of tissue culture plants , lack of incentives from the government and the suggestions given by farmers to overcome the constraints were timely and sufficient electric power should be provided, efforts should be made to minimize cost of tissue culture raised banana plants, there should be provision of subsidies.

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