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A STUDY OF THE KNOWLEDGE AND ATTITUDE OF FARMERS TOWARDS SELECTED PEST CONTROL MEASURES FOR COCONUT*

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Coconut palm embogised as the tree of heaven is of great economic importance in Kerala which has 70 per cent of total area in the country (Thampan 1976). One of the main problems in the cultivation of coconut is the incidence of *Rhinoceros* beetle, red palm weevil, leaf eating caterpillar and root feeding cockchafer. Although control methods are known the knowledge and attitude of farmers towards the same has not been studied.

Materials and Methods

"The survey was conducted in Perinad Village of Quilon District of Kerala. Seventy out of 2050 families were selected as sampla". An interview schedule was designed to study the knowledge and attitude of farmers regarding pest control measures and also to know their problems. Attitude was studied with respect to 10 statements seperately using a 3 point rating on continum of agree - undecided - disagree. The weighted mean scores obtained for each statement by respondents were used to determine the favourable or unfavourable attitude criteria being 0-1, unfavourable, 1-2, undecided, 2-3 favourable.

Results and Discussion

Rhinoceros beetle and red palm weevil were known fo ai! respondents. Leaf eating caterpillar and cockchafpr were recognised as pests by 35 and 13 respondents respectively. It therefore appears that the more serious pests of area are the former two. Only 65.7 . cent were aware of the recommendations for pest control recommended by the Government. The rest of the respondents did not know cf such control measures. They depended entirely of gram sevak or other agencies of the locality for control of pests.

Analysis cf the opinion of the effectiveness of control methods (Table 1) showed that mechanical control was held as very effective against rhinoceros beetle only by 2 respondents; and 24 respondents considered it as effective and another 24 did not consider it so. One respondent believed chemical control

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Table 1

Opinion of farmers regarding effectiveness of control measures adopted.

Sl. No.	Pests	Control measures	Opinion		
			Very effective	Effective	Not effective
1	Rhinoceros beetle	Mechanical	2	24	24
		Chemical	1	6	
2	Red Palm weevil	Mechanical			
		Chemical	28	17	—
3	Cockchafer	Mechanical		1	
		Chemical	—	2	—
4	Leaf eating caterpillar	Mechanical	!	2	
		Chemical		1	

with BMC was very effective and six deemed it effective. For red palm weevil 28 respondents had faith in curative chemical control with BHC/Pyrocone. Seventeen respondents believed it to be effective.

Attitude of farmers towards the ten statements were favourable (Table 2) However, the intensity of attitude varied from statement to statement.

As seen from the weighted mean of 2.9 of the following statements "It is possible to increase the number of nuts if control measures are adopted" "Pest control is the only remedy for better yield of coconut". Respondents were more favourable to these statements where as the weighted mean of 2.01 of the statement. "The use of insecticides repeatedly upset balance of life in nature" shows that respondents were less favourable to . statement.

Bottlenecks in using pest control methods appears to be: (1) difficulty in getting pesticides in time, (2) ignorance of using control measures, (3) lack of knowledge to identify the pest attack. The farmers are to be first educated in identification of the pest problem and pest control method. Even among the farmers who are aware of the recommendations there seerns to exist lack of conviction. The implementation of recommendations would be possible if only a campaign on extension can successfully achieve the objects of convincingly mass educating the farmers on the need for pest control and technical details of the method and their effectiveness. Once this is achieved the implementation is possible by providing the pesticides and appliances in time and adopting effective means to make available to the farmers the funds required for pest control operations.

Table 2

Attitude of farmers towards selected pest control measures.

SI. No.	Attitude	Attitude score	Weighted mean	Rating
1.	It is possible to increase the number of nuts if control measures are adopted.	209	2 9	Favourable
2.	The cost is prohibitive in case of pesticidal control of pests	166	2.4	Favourable
3.	Every farmer must control pests for getting higher yield of coconut	208	2.9	Favourable
4.	Indigenous method of pest control are more effective than pesticidal method of control	162	2.3	Favourable
5.	Controlling rhinoceros beetle by spraying of cowdung pits reduces nutrient value of cowdung.	152		Favourable
6.	There is no difference in yield between pest controlled and other palms.	196	2.8	Favourable
7.	Pest control is the only remedy for better yield of coconut.	207	2.9	Favourable
8.	The cost of control of pests (using insecticides) commonsurate with the increase in yield.	184	2.6	Favourable
9.	The use of insecticides repeatedly upset balance of life in nature.	141	2.01	Favourable
10.	You can implement the latest recommendation givon by the Dept. of Agriculture for control of pests without financial aid and technical know—how ftom the Dept. of Agriculture.	151	2.2	Favourable

Summary

Rhinoceros beetle and red palm weevil were known to all respondents. Only 65,7 per cent were aware of the recommendations for pest control made fay the Government,

Attitude of the farmers towards the ten statements were favourable. However, the intensity of the attitude varied from statement to statement. Attitude towards some statements like "It is possible to increase the number of nuts if control measures are adopted", "Every farmer must control pests for getting higher yield of coconut", was more favourable whereas statement like "The use of insecticides repeatedly upset balance of life in nature" was less favoured.

സംഗ്രഹം

അഭിമുഖീകരിക്കപ്പെട്ട എല്ലാകർഷകരും കൊമ്പൻചെല്ലിയെപ്പറ്റിയും ചെമ്പൻചെല്ലി യെപ്പറ്റിയും ബോധവാന്മാരായിരുന്നു. കൃഷിഡിപ്പാർട്ടുമെന്റു് ശുപാർശ ചെയ്തിട്ടുള്ള കീടനി യന്ത്രണമാർഗ്ഗങ്ങളും 65.7 ശതമാനം കർഷകർ മാത്രമേ അറിഞ്ഞിരുന്നുള്ളു. കർഷകരുടെ അനു കൂലപ്രതികൂല മനോഭാവം അറിയുന്നതിനുപയോഗിച്ച പത്തു പ്രസ്ഥാവനകളിൽ അനുകൂലമനോ ഭാവമാണു കൂടുതലും കണ്ടതു്. ഈ അനുകൂലമനോഭാവം തന്നെ കർഷകരുടെ ഇടയിൽ വ്യത്യ സ്ഥങ്ങളായിട്ടാണു് അനുഭവപ്പെട്ടതു്. "ഉല്പാദനം വർദ്ധിപ്പിക്കാൻ ശരിയായ നിയന്ത്രണമാർ ഗ്ഗങ്ങളുപയോഗിച്ചാൽ മതിയാകും". എന്നും "ഓരോ കൃഷിക്കാരനും കീടങ്ങളെ നശിപ്പിച്ചാൽ കേരോല്പാദനം മെച്ചമാക്കാം" എന്നും ഉള്ള പ്രസ്ഥാവനകളോടു് കൂടുതൽ അനുകൂലമനോഭാവവും "കീടനാശിനികളുപയോഗിക്കുന്നതുകൊണ്ടു് പ്രകൃതിയിൽ ജീവജാലങ്ങളുടെ സന്തുലിതാ വസ്ഥക്കു മാറ്റം വരും" എന്നുള്ള പ്രസ്ഥാവനയോടു കൂടുതൽ അനുകൂലമനോഭാവവുമാണു് പ്രക ടമായി കണ്ടതു്.

REFERENCE

Thampan, P. K. 1976. Coconut Development in India - in retrospect - Souvenir, Diamond Jubilee of Coconut Research in India. 48—50.

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