DISSEMINATION OF SCIENTIFIC KNOWLEDGE AND THE ROLE OF CO-OPERATIVE SOCIETIES

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Introduction

Rubber is a perennial crop which benefitted much from the scientific research that was carried out during the last tifty years. The catalyst that accelerated the development in rubber plantation industry has been the timely availability of scientific knowledge to the rubber growers. This knowledge is being continuously updated by the research institutions and unless there is an uninterrupted flow of scientific knowledge from the laboratory to the rubber grower in an appropriate manner, the progress of rubber plantation industry will be impeded. By virtue of the number, coverage of area and contribution to production, the small rubber growers occupy an important position in the industry. Fortunately the small rubber growers had the good fortune of acquiring higher literacy level in India compared to other groups of agriculturists. As a result. their ability to absorb scientific knowledge on the cultivation and processing of rubber could be updated without much difficulty. The co-operative societies are found to be an important channel in the flow of scientific knowledge. The present study was initiated with a view to assessing the extent of involvement of co-operative societies in the dissemination of scientific knowledge.

movement in rubber plantation industry.

The Plantation Enquiry Commission examined the scope for introducing co-operative societies in rubber plantation industry in 1956 and recommended that co-operative supply and banking societies should be established. In 1958 the Government of India adopted the recommendation of the commission. For implementing the recommendation an officer of the cooperative department was takan on deputation by the Rubber Board in 1960. This led to the process or enrolling more and more rubber growers in the existing cooperative societies and forming new ones. A study conducted in 1974 found that 28 percent of rubber growers were members of 23 co-operative marketing societies in 1971-72. Since 1976 the Rubber Board has been executing a World Bank aided scheme for the improvement of processing and marketing of rubber. The launching of the scheme further accelerated the growth of co-operative societies.

Materials & Method

For collecting the data for the study a draft questionnaire covering all aspects of dissemination of scientific knowledge on rubber was prepared and the same was sent to 240 co-operative societies associated with the activities of the Rubber Board. Completed questionnaires were received from 110 societies. A staff member also visited some societies to seek clarification and collect completed quest-ionnaires. The study was confined to the State of Kerala and the societies belonged to twelve districts of that State. Except one society, all the societies had rubber growers as members. The societies which replied include service co-operative Banks, Co-operative rubber marketing societies, Farmers co-operative societies The majority of the etc. societies were service co-operative Banks. Table 1 shows the details.

Table 1
Details of Societies
Type of society
Service co-operative Bar

Service co-operative Bank 76
Rubber Marketing Cooperative Society 20
Farmers' Co-operative

Service Bank 7
Service Co-operative Society 2
Regional Service Cooperative Bank 2

Ex-Servicemen Joint
Farming Service
Co-operative Society
Urban Service Co-operative

Bank Joint Farming Co-operative Society

Total

110

1

Nos

Results And Dissussion

From the data thus collected the societies were classified according to the year of starting. Out of the 110 societies, 67 were started 30 years before and 32 societies were started between 21 to 30 years. Table II shows the details of membership of the societies. The table shows that there were 39 societies with membership exceeding 5000. The largest society had 17700 members.

Table II

Size of membership in the societies

Upto 1000 mem	bers 9 s	ocieties
1001 to 2000	15	
2001 to 3000	13	
3001 to 4000	13	100
4001 to 5000	21	
Above 5000	39	
Total	110	

Table III

Percentage of rubber growers among the members

among	the members
Nil	1 Society
up to 10%	12 Societies
11 to 20%	6 "
21 to 30%	9 "
31 to 40%	8 "
41 to 50%	12 "
51 to 60%	15 "
61 to 70%	10 "
71 to 80%	11 "
81 to 90%	11 "
91 to 100%	
Total	110

The study showed that 52 percent of members of the societies were rubber cultivators, while the percentage of rubber cultivators among the office bearers was 80. This is a clear indication that the rubber growers are giving the leadership to the co-operative movement at least in the

sphere of agricultural development in Kerala. Table IV shows the details.

Table IV

Total office bearers-926

Rubber growers	-748	(80%)
Rubber growers as		No. of
percentage to total		Soci-
office bearers	1	eties

Societies without elected office bearers	6
No rubber grower among the office bearers	4

Rubber growers upto 25% of office bearers 10

"	between 26 to 50% of office bearers	3
	between 51 to 75%	1

between 76 to 100% of office bearers 51

of office bearers 36

Total 110

The activities of the societies were confined to four areas viz. banking, marketing, industry and agricultural development. The number of societies engaged in the activities is given below:-

Agricultural	development	101
Marketing		98
Banking		89
Industry		330

It may be mentioned that almost all societies were engaged in more than one activity,

As the most important objective of the study is to find-out the involvement of cooperative societies in the dissemination of scientific knowledge, the societies were asked whether they had organised seminars, training programmes and visits to the RRII. Table V shows the details of their reply.

Table V

Number of societies which organised:

(a)	Seminars	- 93
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(b)	Participation	in		
	training		-	29

(c) Visits to the RRII - 18

(d)	Tappers	training		
3:21	class		-	10

Some societies had organised seminars 4 times during their existence. The details are shown in Table VI.

Table VI

Number of societies which organised seminars:

(a)	Once	73
(b)	Twice	11
(c)	Thrice	7
(4)	Four times	2

Out of the 93 societies, 83 societies reported increase in the business of agricultural inputs after the seminars.

Some societies were organising special discussions with the Rubber Board officials with a view to eliciting the latest information. This was done by 54 societies.

Some societies published booklets dealing with scientific rubber cultivation and also gave details of the schemes of the Rubber Board in their annual reports. Sixty five societies reported such activities. Thirty one societies displayed in their premises scientific articles published in the dailies on rubber cultivation.

Agricultural development

One area of activity of the co-operative society is the promotion of scientific cultivation. Accordingly 47 societies are involved in the promotion of long term development schemes of the Rubber Board. There were 104 societies which had facilities for selling inputs to rubber growers. Of these 102 were selling fertilizers, and 90 societies were selling plant protection chemicals. Twenty two societies had own nurseries. Except two societies, all are willing to associate with the Board's activities in spreading scientific knowledge.

As the co-operative society is the nodal point in the dissemination of scientific knowledge, the societies were asked to give their preferences regarding the medium to be adopted for the dissemination. Table VII shows the societies, preferences.

Other activities

Fifty one societies deal in rubber and hold licence from the Rubber Board; seven have smoke house four, have processing factories and one has manufacturing facility. Fifty three societies organised camps for soil and leaf analysis. Fifty four societies were involved in renting out plant protection equipments and sixteen societies organised helicoptor spraying.

The study clearly shows the involvement of the majority of societies in the dissemination of scientific knowledge relat-

the other preferred medium of the societies. As such, the regularity of publications may be increased. The scope for enhancing the coverage may also be explored.

Training programmes are also favoured by the cooperative societies, The societies may be informed in advance of the programme of training proposed to be held during a year. This can be in a prochure, as is done by wellknown training institutions. It would be

Table VII
Societies preference of the medium for the dissemination of scientific knowledge

19.63			Preference				Total No.	
Medium	1	11	111	IV	V	VI	of societies	
	Seminar	50	31	21	- 5	1	2	110
	Publications Training	28	22	26	23	9	2	110
	Programmes	19	35	16	23	15	2	110
	Visit to the RRII	7	9	16	13	32	33	110
	Radio	6	10	25	34	26	9	110 .
	TV	1	3	4	15	27	60	110

Table VII shows that the first preference of the large number of societies is for holding seminars for the dissemination of scientific knowledge, followed by publications and training. Television and Radio have been relegated further down in the scale of preferences.

One hundred and two societies represented input suppliers. Of these, twenty two societies represented 6 or more companies, 11 societies 5 companies and 19 societies 4 companies. Thirty societies received some help from the input manufacturers for the dissemination of scientific knowledge. Of these, 25 societies received help for organising seminars.

ing to rubber. It shows that the rubber growers take the leading role in most societies. This augers well for the continued growth of the rubber plantation industry in India.

From the study following policy implications can be drawn up:-

- 1 The societies prefer seminar as the most useful medium and as such, attempts may be made to organise seminars in areas not covered already. In other areas, seminars may be organised on a ragular basis.
- 2 Publications particularly the 'Farm Feature page' in the daily have been

desirable if the Rubber Board represents in the annual general body meeting of the societies wherein the members can be enlightened on the various development and training programmes of the Board.

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