

CULTIVATION PROBLEMS OF COCONUT FARMERS – AN ANALYTICAL STUDY

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Abstract

India is the third-largest producer and most productive country of coconuts in the world. In 2020–21, the nation produced 21207 million nuts of the coconut, even though India is one of the countries that grows the most coconuts globally, its contribution to the foreign markets, which accounts for 34% of the worldwide production, is still negligible. Therefore, this paper examines the problems encountered by coconut farmers and the assistance provided by the coconut development board to protect the interests of coconut growers. To achieve this, a sample of 100 coconut growers who cultivate coconuts was collected using a convenient sampling method. The finding shows that the major problems faced by the coconut cultivators are the high cost of labour, tree wilt, and climate conditions. To overcome this problem, the coconut development board provides several measures, which include training programmes, schemes for replanting coconut trees, coconut palm insurance schemes, the distribution of quality planting material, and financial assistance.

Key words: Cultivation problem, Coconut growers, Coconut development board, Climate condition

1. Introduction

India is an agrarian economy. Most people directly or indirectly depend on agriculture for their livelihood, and it contributes more than 60 per cent of the GDP of our country. Coconut is one of the main cash crops helping small and marginal farmers. It provides raw material for number of industries, including coir manufacturing, copra processing, oil milling, and so on. Considering the versatile nature of the crop and the various uses of its products, coconut tree is eulogised as KALPAVRIKSHA (tree of heaven). Coconut is a source of food, beverages, medicine, natural fiber, fuel, wood, and raw materials for units producing a variety of goods. (Das, P.K, 1984) Coconut is also intertwined with the socioeconomic lives of many people. Coconut palm is grown in almost all fame house in the state. Predominantly, it is grown in tiny and marginal holdings. The coconut crop is the heart and soul of the agricultural economy of the Southern States of India, especially in Kerala State. The Southern States account for 90 percent of the country's total area of this crop (Giji Elias, 2014)

2. Review of literature

R.Vanamadevi (2016) research employed a methodical approach to investigate the cultivation and marketing issues facing coconut farmers in Thali panchayat, Udumalpet. Spot payment and an acceptable price were the primary determinants of the marketing of coconuts through direct selling. It was discovered that the primary issue the coconut growers in the research area faced was the local climate. The main factors encouraging the marketing of coconuts through

intermediaries were the lack of storage facilities and the need to minimise risk. The growers' primary issues with the marketing of coconuts were price swings and forced sales. To control the price of coconuts, the agricultural department should launch an aggressive effort to inform coconut farmers about better growing practices and farming cooperative marketing.

S.M.Yamuna and R.Ramya (2016) has demonstrated the economic benefits associated with coconut growing. According to the findings, policymakers and other stakeholders are recommended to take the required actions to enhance coconut growing practices in the research area. The government takes the appropriate actions to control the sale of coconuts and provides financial aid to create value-added goods from basic ones. It will promote the growth of coconuts.

K.Veerakumar (2019) in his paper, an effort has been made to determine the degree of difficulty a coconut farmer would face. According to the research, the market's volatile price is the biggest obstacle for farmers who grow coconuts. The study found that the government ought to set up a challenge programme for farmers connected to coconut growing.

Mathuthra, P. and Arumugaswamy (2020) has made an effective effort to address the developments and problems coconut growers in the Coimbatore district are experiencing as a result of the COVID-19 pandemic. The findings show that the coconut growers in the Coimbatore district considered a scarcity of high-quality saplings to be their most pressing problem. The other factors included lack of funding, high costs, and labour issues that coconut growers had to deal with throughout the pandemic. Therefore, the issues can be resolved by adding various features like touchless technology, packaging, discounts, and online marketing. These characteristics aid in the improvised marketing of coconuts during this pandemic. To standardize the price of coconuts, the department of agriculture must run numerous initiatives to inform coconut growers about coconut farming and cultivation.

3. Statement of the problem

The cultivation problem is the most significant issue facing the coconut industry in Kerala. It includes labour problems; lack of quality saplings; lack of adequate financing, the high cost of labor, a lack of water, the trees' wilt climate condition, etc.(R.Vanamadevi 2016) Out of the fourteen districts in Kerala, Kozhikode is one of the richest coconut producing districts. Hence, the researcher made an analytical study to analyses the cultivation problems of coconut growers in Kozhikode. This study raises the following research question for investigation:

1. What are the main factors affecting coconut cultivation in Kozhikode district?
2. Role of the coconut development board to safeguard coconut growers' interests?

4. Significance of the Study

This study becomes significant as it pertains to analyses of the cultivation methods and techniques embraced by the coconut farmers objectively in the research field. As a result, it would assist coconut farmers in achieving maximum productivity with minimal expenditure and in providing quality nuts on the market for the benefit of the general public. Moreover, this study would be of immense help to policymakers, especially the government, in evolving suitable strategies and policies to help the coconut growers improve their production methods, with a special focus on increasing their production on the one hand and achieving a lower cost of production on the other. Therefore, it is the earnest belief of the researcher that the suggestions would not only address the major problems relating to cultivation but also the grief and distress of the coconut farming

community of the region.

5. Objectives of the study

1. To evaluate the difficulties encountered by the coconut growers.
2. To study the support given by the coconut development board to protect the interests of coconut growers.

6. Hypotheses of the study

Ho: There is no association between experience of coconut growers and cultivation problem

Ho: There is no association between training given by coconut development board and cultivation problem

7. Research methodology

7.1 Sample

A sample is a limited subset of a population that is chosen with the intention of examining its characteristics. In this study a sample of coconut growers who cultivate coconut was taken from Kozhikode District.

7.2 Sample Design

In a sampling design, the sample frame, sample size, sample selection, and estimation techniques are all explicitly stated. In order to gather data for this study, convenience sampling was used to obtain 100 samples from all coconut growers.

7.3 Method of data collection

Data was collected from the respondents irrespective of the size, nature and location by using structured questionnaire

7.4 Source of data

Both primary and secondary source of information are collected for this study

8. Data analysis and interpretation

To determine the research's conclusion, the data were correctly analysed and interpreted. Chi square and simple percentage statistical procedures were used to achieve this goal.

Table 8.1
Experience in coconut cultivation

Experience	Frequency	Percent
Less than 5	20	20%
5-10	35	35%
10-20	17	17%
20-30	10	10%

Above 30	18	18%
Total	100	100%

The aforementioned table shows that, out of 100 respondents, 35 percent of the respondents had 5-10 years' experience in coconut cultivation, 20 percent of the respondents had less than 5 years' experience in coconut cultivation, 17 percent of the respondents had 10-20 years' experience in coconut cultivation, 10 percent of the respondents had 20-30 years' experience in coconut cultivation, and 18 percent of the respondents were above 30 years' experience in coconut cultivation.

Table 8.2

Problem in cultivation of coconut

Sl no	Variables	Frequency	Rank
1	Labour problem	24	4
2	Lack of healthy saplings	15	7
3	Lack of sufficient finance	18	6
4	High labour cost	44	3
5	Lack of water	20	5
6	Trees wilt	51	1
7	Climate condition	50	2

From the above analysis, it is inferred that tree wilt was the main difficulties faced by the cultivators of coconuts with the highest rank, followed by problems due to climate conditions. High labour costs, a lack of water, insufficient funding, and a scarcity of quality saplings

Table 8.3

Support given by coconut development board

Sl no	Variables	Frequency	Rank
1.	Distribution of quality planting material	18	4
2	Training programme	51	1
3	Scheme for replanting of coconut tree	21	3
4	Coconut palm insurance scheme	34	2
5	Financial assistance	17	5

Based on the analysis above, it is inferred that the training programme was the main support given by the coconut development board with the highest rank, followed by the coconut palm insurance scheme, scheme for replanting of coconut trees, distribution of quality planting material, and financial assistance.

Table 8.4

Training given by coconut development

Sl no	Variables	Frequency	Rank
1.	Training on Neera production	12	5
2.	Training on coconut tree climbing	36	1
3.	Training on mixed cropping	18	2
4.	Training on Drip irrigation	11	4
5.	Training on identification of coconut disease	17	3

From the above analysis, it is inferred that coconut tree climbing was the main training given by the coconut development board with the highest rank, followed by training on mixed cropping, training on identification of coconut disease, training on drip irrigation, and training on Neera production

9. Testing of hypothesis

Ho: There is no association between experience of coconut growers and cultivation problem

Table 9.1

ANOVA (Experience in Cultivation)

Experience	N	Mean	S D	F Value	P Value
Less than 5	20	3.05	.899	3.924	.042*
5-10	35	3.31	.631		
10-20	17	3.29	.759		
20-30	10	3.30	.618		
Above 30	18	3.17	.943		
Total	100	3.23	.996		

Source: Compiled by Researcher (Primary data)

*Significant at 0.05 level

The above table interprets that, since the P value is less than 0.05 the mean difference is significant at a 5 percent level. Hence, we can conclude there is a significant difference in problems faced by coconut cultivators and their experience in cultivation. The results of the analysis show that cultivators with an experience of 5-10 years are prone to the greatest number of problems than cultivators with an experience of 20-30 years.

Ho: There is no association between training given by coconut development board and cultivation problem

Table 9.2

ANOVA (Training Attended)

Training	N	Mean	S D	T Value	Df	P Value
Yes	51	4.3529	.5399	2.985	98	.003**
No	49	4.2147	.61820			
Total	100	4.236	.5432			

Source: Compiled by Researcher (Primary data)

**Significant at 0.01 level

Based on the above table, since the P value is less than 0.01 the mean differences are significant at a 1 percent level. It is understood that, on the basis of the mean scores, the problems faced by coconut cultivators significantly differ among cultivators' participation in training programmes. From the analysis, it can be interpreted that cultivators who have attended the training have less number of problems as compared with cultivators who have not attended the training.

10. Findings

1. Majority (74%) of the respondents, are male.
2. Majority (24%) of the respondents are in the age group of 36-45
3. 35 %of the respondents were 5-10 years' experience in coconut cultivation
4. Trees wilt was the main difficulties faced by the coconuts farmers
5. Training programme was the main Support given by coconut development board
6. Coconut tree climbing was the main training given by coconut development board
7. There is significant relationship between experience of coconut growers and cultivation problem
8. Cultivators with an experience of 5-10 years are prone to the greatest number of problems than cultivators with an experience of 20-30 years.
9. Cultivators who have attended the training have a smaller number of problems as compared with cultivators who have not attended the training.

11. Suggestions

The following recommendations are provided to enhance the cultivation of coconuts in the study region

1. The main issue that coconut farmers were dealing with was tree wilt. In order to identify the causes of tree wilt, the government should provide farmers in each district and taluk with the necessary training.
2. To encourage farmers to join crop insurance to protect themselves against the loss of trees due to various diseases
3. Each block or taluk should form a coconut committee to discuss production and marketing issues on a regular basis.
4. To provide guidance on the production of value-added coconut products in order to boost profits

5. In order to expedite the disposal of the purchased item, the government should establish procurement centers in each block and taluk.

12. Conclusion

Kozhikode District in Kerala plays a vital role in coconut production but it gradually retrieves in position due to several reason. Therefore, the researcher the made a systematic effort to study the cultivation problems of coconut growers in Kozhikode District in Kerala. From the study, it is found that tree wilt, climate conditions, high cost of labour, labour problems, lack of water, lack of adequate finance, and lack of quality saplings are the problems faced by the coconut growers in the study area. The coconut development board should launch a vigorous campaign to educate coconut farmers about various coconut diseases and symptoms, improved cultivation methods, crop insurance policies, and so on. Additionally, the government can promote coconut production by regulating the coconut marketing process and provide financial support to create value-added goods from core items.

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