

IMPACT OF AGRICULTURAL SUPPORT SCHEMES ON SOCIO-ECONOMIC EMPOWERMENT OF FARMERS

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ABSTRACT

The division of the nation made the shortage of food in the country even more severe. This resulted in a decrease in agricultural productivity, which exacerbated existing challenges for both food grains and commercial crops. The expansion of agricultural production is a necessary pre-condition for the expansion of the economy as a whole. The agricultural sector may be a significant driver of economic expansion if it is modernized. It does this by supplying the required capital, labor, raw materials, wage products, and foreign currency, all of which are essential to the growth of other parts of the economy, both at the beginning and during its course. Government of India took a proactive approach, and as a result, it developed a clearly defined strategy of integrated production programs with specified objectives, as well as a suitable distribution program, in addition to other steps for the general advancement of the economy of the nation. A number of distinct initiatives, including the use of innovative agricultural technologies, were launched in order to transform agriculture into a profitable and thriving industry, to increase agricultural output, and to bring additional land under cultivation. The use of innovative agricultural practices in India was more expensive than the use of conventional methods of crop production. In contrast, the inputs required for modern technology, such as high-yielding varieties of seeds, fertilizers, farm mechanization, and irrigation, were extremely expensive, and majority of Indian farmers did not have the financial means to purchase these pricey inputs.

Key words: Agriculture, Awareness, Empowerment, Fertilizers, Socio-economy

INTRODUCTION

On the eve of independence, the agricultural sector of India was in a perilous state and needed immediate attention. One may use words like "completely primitive," "deteriorative," and "turbulent" to describe it. During the time when the British Empire was in power, there were no comprehensive or systematic efforts made to improve the agricultural system. A number of distinct initiatives, including the use of innovative agricultural technologies, were launched in order to transform agriculture into a profitable and thriving industry, to increase agricultural output, and to bring additional land under cultivation. The use of innovative agricultural practices in India was more expensive than the use of conventional methods of crop production. In contrast, the inputs required for modern technology, such as high-yielding varieties of seeds, fertilizers, farm mechanization, and irrigation, were extremely expensive, and majority of Indian farmers did not have the financial means to purchase these pricey inputs. Traditional methods required fewer resources and costs lower costs than modern technologies. The food grain pricing committee, also known as the Jha Committee, recommended that the recommendations of the committee Government of India to launch a

system so as to provide subsidies to farmers for the purchase of different agricultural inputs. Government of India also implemented. In traditional Indian culture, the farmer has a significant role, and they have found that farmers' conglomerates are useful in resolving their personal and family issues. But farmers, especially those who are on the smaller side, have been a particularly victimized group in recent history. They banded together and negotiated for their basic requirements since they were subjected to inhumane treatment. They need an organization such as the farmers association to safeguard their rights and interests when the state fails to do so. Now they are calling for more government spending on farms. Indian farmers have wisely determined that their influence may be maximized if they operate as a pressure group outside the framework of established political parties. Because agriculture plays such a significant role in India's economy, this topic has not gone away from the forefront of discussions about the country's progress. All of these discussions highlight how difficult it was to achieve social, economic, and political equality within an agricultural economic system. The previous system was encouraged by the elite in order to extort excessive rent or money from farmers via a variety of anti-farmer methods. The peasants in different sections of the nation rose up in opposition to these policies once they were implemented. A decrease in the importance of peasants as a source of wealth may be traced to the rise of the merchant class. However, food and fiber production remained their first priority. The peasant class in India has historically borne the brunt of the disruptions created by the country's frequent civil turmoil and armed conflict. As a result of persistent oppression, farmers in numerous areas finally revolted.

Statement of the Problem:

Given the current circumstances, it is unclear whether or not the farmers will be able to maintain their most fundamental means of existence. The awareness level of the farmers towards the major agricultural schemes will help to understand the knowledge of farmers to source funds using these schemes. This will help the farmer to meet their financial needs with less constraints and cost associated with rising of funds. This investigative study connects various agricultural support schemes and economic packages of the Government of India as a source of livelihood for farmers in meeting the fluctuations of production and market cost fluctuations as well as their dependence on these schemes for continuance of agricultural activities. These operational challenges in agriculture which are the result of changes in output and market cost have entirely eliminated the means for survival. Produce in many parts of the nation is going to be a waste since there is a scarcity of labor, which is proving to be crucial for the operation of agricultural activities. The money from the activities and the help that the government provides for farmers is required to meet the needs of the family. The agricultural promotion schemes and their impact on the socio-economic empowerment of farmers can help to understand the role of these schemes on reducing the operational problems of farmers in the study area of Thoothukudi District.

Importance of the Study

Farmers put in hard efforts to guarantee that there is enough food for society, and society has a responsibility to look out for them, which must be assured by policies enacted by the government at times when there are variations in production costs and market prices. The research includes a measurement of the efforts made by the government to satisfy the demands of the farmers, which will assist the society in finding solutions to their food needs. Only when farmers are facilitated through agricultural support schemes will be possible to

meet the demands of the society regarding food.

The major aims of these schemes are to promote financial stability among the farmers and make them concentrate on the agricultural activities without many financial or input problems. The outcome of the policies has to empower the farmers with socio-economic features. The proposed research assumes significance as it will analyze the role the government policies have played in the socio-economic empowerment of farmers. The analysis focuses on the steps that have been taken to address the challenges that have arisen as a result of production issues and changes in commodity prices, both of which affect the ability of the farmers to maintain a steady supply of food for the population.

Objectives of the Study

- To measure the socio-economic empowerment attained by the farmers based on the agricultural support schemes.

Research Methodology

The objectives of the study are to evaluate the role that agricultural promotion programs play in empowering farmers in the region and to investigate the challenges that farmers encounter in gaining access to the funds that are available via such schemes. The research is carried out using the primary data that are obtained from the people who are working as agricultural farmers in the region that is under investigation. The interview schedule served as the primary data collection method and it was used for the purpose of eliciting responses from the farmers. After which the information was examined using SPSS-20 and AMOS. In order to address the problems that have been brought to light by the research that is now being carried out, the appropriate data analyses have been carried out in line with the objectives and prerequisites of the study.

Sample Design

The sample size of the study is derived from the farming population working in the agricultural sector of Thoothukudi District. There are ten taluks where the agricultural activities are carried out and beneficiaries under various schemes of agricultural support schemes are working. The farming population belonging to the district forms the population frame of the study. The snow ball sampling was used to select the farmers from the population which was highly helpful in identifying the beneficiaries without much dependence on government offices. Based on the number of taluks in the Thoothukudi District, the sample size was allocated. It was decided to distribute fifty number of interview schedules in each taluks of Thoothukudi District. Based on the calculations of fifty farmers from ten taluks, the research has fixed the tentative sample size of 500. The collected data were scrutinized using various parameters which made to reject 67 interview schedules from the study. Those interview schedules were eliminated and hence 433 farmers were fixed to be the final sample size of the study. The study has given prime importance for the selection of farmers without much selection bias which might help to improve the reliability of the study.

The study's sample size was determined using the information in the table below.

Table -1
Sample Size

S. No	Taluk Name	Number of Sample	Rejected	Final Sample
1.	Thoothukudi	50	8	42
2.	Srivaikundam	50	11	39
3.	Tiruchendur	50	3	47
4.	Sattankulam	50	5	45
5.	Eral	50	15	35
6.	Kovilpatti	50	4	46
7.	Ettaiyapuram	50	1	49
8.	Vilathikulam	50	7	43
9.	Ottapidaram	50	10	40
10.	Kayathar	50	3	47
Total		500	67	433

(Source: Reserve Bank of India)

(Rejection Rate – $67/500*100 = 13.40\%$)

Review of Literature:

Kondepati, R. (2011)

This study focuses on the influence of India's free electricity policy on agriculture in the state of Andhra Pradesh (AP). A high political currency is envisaged, making it difficult to reverse this policy in the near future. A possible policy change is being considered in order to eliminate inefficiencies in the current subsidy system for groundwater extraction and consumption. It is the goal of these measures to reduce the number of people who are eligible for this subsidy depending on their income and increase the state's agricultural water production by making it easier for farmers to get water. Some examples exclude major farmers from this program, such as requiring them to adopt the System of Rice Intensification (SRI) or micro-irrigation or modifying cropping patterns in order to get free power. Groundwater extraction impacts, economic costs, equality difficulties, political feasibility, implementation issues, and other factors are all factors considered when evaluating these alternative approaches. Finally, as a short-term measure to improve the efficacy of this policy and lessen its negative impact on groundwater extraction, it is proposed that the government give free energy in exchange for the adoption of water-efficient farming methods like the SRI.

Dev, S. M. (2012)

Changes in the Earth's climate are already taking place. Climate change is a cause for concern for India. Climate-sensitive industries including agriculture, forestry, and fishing

provide the majority of the country's economic output. Drought and flooding will become more frequent and severe as a result of the changing weather patterns brought on by global warming and its accompanying decrease in rainfall. The production of wheat, for example, would be affected by an increase in temperature. More than 80% of Indian farmers fall into the category of small and marginal farmers, whose land use accounts for more than 40% of total land use in the country. The small and marginal farmers' productivity and incomes must be supported through support programs and policy adjustments. To help small and medium-sized farmers, NCEUS (2008) recommends a series of programs. Promotion of marginal-small farmer groups, facilitating easier access to institutional loans and training and capacity building, aiding non-farm enterprises and promoting gender-focused activities are only a few of the main initiatives planned under this strategy.

Gale, H. F. (2013)

A developing country that has shifted from taxing to supporting agriculture is likely to be China. After being related to rising production costs, Chinese price supports and subsidies have increased at an ever-increasing rate in recent years. Even though grain growers get 7–15% of their total income in subsidy payments per acre, these payments have minimal effect on production decisions. As a result, Chinese farmers have seen a boom in agricultural imports as a result of China's policy of increasing price supports each year to boost incentives. In the period when China was increasing its assistance for agriculture, US agricultural exports to China quadrupled in value. As a whole, China's extension of assistance is not bound by WTO obligations, but the country's price-support programs might surpass WTO restrictions in the future. However, as the Chinese agricultural industry becomes more commercialized and confronts increased competitive pressure, Chinese leaders pledge to keep expanding domestic policy support for agriculture.

Narayanan, S. (2016)

In this study, state-level panel data from 1995–1996 to 2011–2012 are used to analyze the nature of the link between formal agricultural credit and agricultural GDP in India, especially the role of the former in sustaining agricultural growth. An endogeneity problem is addressed by using a control function technique in conjunction with a mediation analysis framework to trace the links between institutional loans and agricultural GDP. All of the inputs are highly sensitive to an increase in agricultural credit, according to the results of this investigation. There is a 1.7% rise in the physical amounts of fertilizers (N, P, K), a 5.1 percent increase in the tonnes of insecticides, and a 10.8% increase in the purchases of tractor. Overall, it appears that input usage is sensitive to credit flow, but agricultural GDP is unaffected by this effect. Due to the low productivity and efficiency of technology, credit seems to be an enabler rather than an enablement.

Michael, A., Tashikalma, A. K., & Maurice, D. C. (2018)

The Nigerian government started the Growth Enhancement Support Scheme (GESS) to enhance agricultural productivity by providing 'smart subsidies' on specific farm inputs to small scale farmers. It has been implemented. This report examines the Scheme's implementation across the country, highlighting both its triumphs and its shortcomings. Secondary data from government sources, such as journal papers, was consulted for the study's primary data. Small-scale farmers were able to receive discounted agricultural supplies from the Scheme with relative ease and at a reasonable cost, which resulted in an increase in farm production. However, the politicization of the program, the governments' incapacity to provide cash to agro-dealers, and the absence of support services (extension) for farmers have a significant impact on the plan. Based on these findings, it is proposed that all

government agencies participating in the plan should work together to provide appropriate funding, timely distribution of farm supplies, and adequate support services for farmers.

Guda, H., Dawande, M., Janakiraman, G., & Rajapakshe, T. (2021)

Many developing countries have implemented the guaranteed support price (GSP) scheme to help farmers and the poor, with three main objectives: to ensure high output from farmers on the supply side, to subsidize the poor's consumption on the demand side, and to maintain adequate reserves of foodgrains as a reserve stock to minimize the negative effects of yield uncertainty (food security). Analyzing a Stackelberg game between a homogeneous population of small farmers and a social planner, we provide analytically backed insights into the essential elements of this system. Modeling farmers' and consumers' strategic conduct, we compare the equilibrium outcome under the direct benefit transfer (DBT) scheme, where the social planner distributes the budget among BPL customers, to the equilibrium outcome under the direct benefit transfer (DBT) scheme. Social planners might compare their surplus against the marginal value of keeping a reserve stock (i.e., the significance of food security). If this number is large, then the GSP excess strongly outweighs the DBT surplus; otherwise, the surplus is equal to the DBT surplus. The farmers' comparison of their output is influenced by two economic factors: the BPL consumer's poverty and the unpredictability of yield. The two strategies produce the same amount of goods if poverty levels are extreme. DBT is unsuccessful in enhancing production if yield uncertainty dominates, however the GSP scheme can induce a strictly greater output by carefully picking the reserve stock.

Kumar, D., & Phougat, S. (2022)

Agriculture is the backbone of the Indian economy. In India, the majority of the people relies on agriculture and its ancillary businesses for their economic survival. The PM-Kisan Samman Nidhi plan is one of several attempts by the Indian government to enhance the agriculture industry. To help farmers earn two times as much as they do now, the federal government has launched this program. Agricultural productivity may be increased by using high-yielding varieties of crops and contemporary agricultural technology that are more stable in farmers' incomes. The PM-Kisan Samman Nidhi program in India is examined in this paper. Data from several Indian government papers and the PM-Kisan dashboard were utilized for this. Tables and charts were employed as descriptive statistical tools in the investigation. This ambitious plan is capable of achieving big outcomes, according to the conclusions of the study. The Indian government has made a significant move to enhance the lives of farmers. In contrast, the PM-Kisan program fails to adequately compensate farmers. It is recommended that the sum be enough to maintain a reasonable level of living.

Analysis and Interpretation

Demographic Profile

The farmers' demographic profile is analysed to understand the impact created by the demographics on the awareness level towards the agricultural promotion schemes and empowerment of the farmers. The diverse variables involved in the analysis of socio-economic status is analysed based on the percentage analysis. The results of the analysis is presented below.

Table - 2
Demographic Profile

Demographics	Category	Frequency	Percent
Gender	Male	306	70.70
	Female	127	29.30

	Total	433	100.00
Age Group	Below 25 Years	71	16.40
	26 Years – 40 Years	232	53.60
	41 Years – 55 Years	82	18.90
	Above 56 Years	48	11.10
	Total	433	100.00
Literacy Level	SSLC/HSC	260	60.00
	Under-Graduation	74	17.10
	Post- Graduation	68	15.70
	Technical Education	31	7.20
	Total	433	100.00
Income Level	Below Rs.15,000	203	46.90
	Rs. 25,000 – Rs. 35,000	32	7.40
	Rs. 35,000 – Rs. 45,000	198	45.70
	Above 45001	---	---
	Total	385	100.00
Area of Residence	Rural	359	82.90
	Semi-Urban	52	12.00
	Urban	22	5.10
	Total	433	100.00
Marital Status	Married	309	71.40
	Unmarried	124	28.60
	Total	433	100.00
Type of Family	Joint Family	357	82.40
	Nuclear Family	76	17.60
	Total	433	100.00
Family Size	Below 3 Members	80	18.50
	4-6 Members	249	64.40
	Above 7 Members	74	17.10
	Total	433	100.00
Number of Earners in the Family	1 Member	356	82.20
	2 Member	49	11.30
	3 Member	28	6.50
	Total	433	100.00

(Source: Primary Data)

Gender

The gender of the farmers explains that 70.70 percent of the farmers belong to male category and 29.30 percent of the farmers given their responses belong to the female category.

Age Group

The age group classification of the farmers reveals that 53.60 percent of the responses carers to the age category of 26 years – 40 years followed by 18.90 percent of responses in the category of 41 years - 55 years, 16.40 percent of responses below 25 years category and 11.10 percent of responses are in above 56 years category.

Literacy Level

The literacy level of the farmers explains that 60 percent of the farmers belong to SSLC/HSC category followed by 17.10 percent of responses in the under-graduation category, 15.70 percent of responses in the post graduation category and 7.20 percent of responses in the category technical education.

Income Level

The income level classification elucidates that 46.90 percent of responses are in Below Rs.15, 000 income category followed by 45.70 percent of responses in Rs. 35,000- Rs. 45,000 income category and 7.40 percent of responses in Rs. 25,000 - Rs. 35,000 category.

Area of Residence

The area of residence reveals that the rural areas has significant representation in the study which has 82.90 percent of responses followed by 12 percent of responses in the semi-urban area and 5.10 percent of responses in the urban area.

Marital Status

The marital status of the farmers examines that majority of the farmers are married (71.40 percent) and 28.60 percent of responses are of unmarried category.

Types of Family

The types of family reveals that the majority of the farmers belong to the joint family system (82.40 percent) and nuclear family has got 17.60 percent of responses in the study area.

Family Size

The size of the family reveals that majority of the responses are in 4 –6 Members category which has 64.40 percent responses followed by 18.50 percent of responses in below 3 members category and 17.10 percent of responses in the above 7 members category.

Number of Earners in the Family

The number of earners in the family explains that one member category has got 82.20 percent of responses followed by 11.30 percent of responses in the 2 member category and 6.50 percent of responses in the 3 member category.

Socio-Economic Empowerment of Farmers based on the Agricultural Support Schemes

The socio-economic empowerment of the farmers based on the agricultural support schemes is assessed based on the variables that aim to differentiate the development of farmers. The empowerment of the farmers is dependent on the income raised from the agricultural activities and those income generations will improve the life standards of the farmers. The agricultural support schemes help to promote the expansion of the agricultural activities and increase the income. The following explains the opinions of the farmers towards empowerment of schemes based on the working of agricultural support schemes.

Table – 3

Socio-Economic Empowerment of Farmers based on the Agricultural Support Schemes

(SA- Strongly Agree; A- Agree; N- Neutral; DA- Disagree; SDA- Strongly Disagree)

Statements	SA	%	A	%	N	%	DA	%	SDA	%
Enhanced income	418	96.50	8	1.80	7	1.60	---	---	---	---

from the modernized agriculture											
Enables to reduce the cost of production	310	71.60	115	26.60	8	1.80	---	---	---	---	---
Improved access to credits and funds from the banking institutions	173	43.20	129	29.80	100	23.10	17	3.90	---	---	---
Promotion schemes helps to raise the standard of living	116	26.80	144	33.30	173	40.00	---	---	---	---	---
Enhanced saving habits based on raised income	37	8.50	251	58.00	12	2.80	105	24.20	28	6.50	---
Expansion of agricultural activities	26	6.00	246	56.80	11	2.50	21	4.80	129	29.80	---
Improved social status in the society	278	64.20	77	17.80	8	1.80	53	12.20	17	3.90	---
Assets structure of the family has improved	316	73.00	109	25.20	8	1.80	---	---	---	---	---
Enables to make purchase of electrical appliances	237	54.70	52	12.00	118	27.30	10	2.30	16	3.70	---
Improved financial status for purchase of agricultural equipments	138	31.90	26	6.00	211	48.70	58	13.40	---	---	---
Less dependence on money lenders for raising credits	26	6.00	262	60.50	12	2.80	118	27.30	15	3.50	---
Reduced interest rates from the banks and NBFCs	23	5.30	245	56.60	15	3.50	18	4.20	132	30.50	---
Subsidies helps to raise additional income from the agricultural purchases	212	49.00	148	34.20	73	16.90	---	---	---	---	---
Ability to meet emergency medical expenses	285	65.80	44	10.20	104	24.00	---	---	---	---	---
Enabled to create own marketing structure	297	68.60	29	6.70	63	14.50	44	10.20	---	---	---
Increased procurement due to	301	69.50	55	12.70	17	3.90	60	13.80	52	12.00	---

sustainable farming activities adds to the income										
Ability to meet input expenses without credits	292	67.40	13	3.00	48	11.10	80	18.50	20	4.60
Enables to transform the land	8	1.80	213	49.20	204	47.10	8	1.80	---	---
Formed Regionalised Association for farmers	234	54.00	199	46.00	---	---	---	---	---	---
Enables to meet food and nutrient requirements of the family	249	57.50	102	23.60	82	18.90	---	---	---	---
Diversification of risks	233	53.80	52	12.00	88	20.30	8	1.80	52	12.00
Increased sector linkages for output transformation	55	12.70	119	27.50	155	35.80	82	18.90	22	5.40
Ability to improve the sanitation facilities	50	11.50	254	58.70	101	23.30	28	6.40	--	---

(Source: Primary Data)

The socio-economic empowerment based on the agricultural support schemes are felt by majority of the farmers in the areas of Enhanced income from the modernized agriculture (96.50 percent), Enables to reduce the cost of production (71.60 percent), Improved access to credits and funds from the banking institutions (43.20 percent), Enhanced saving habits based on raised income (58.00 percent), Expansion of agricultural activities (56.80 percent), Improved social status in the society (64.20 percent), Assets structure of the family has improved (73.00 percent), Enables to make purchase of electrical appliances (54.70 percent), Less dependence on money lenders for raising credits (60.50 percent), Reduced interest rates from the banks and NBFCs (56.60 percent), Subsidies helps to raise additional income from the agricultural purchases (49.00 percent), Ability to meet emergency medical expenses (65.80 percent), Enabled to create own marketing structure (68.60 percent), Increased procurement due to sustainable farming activities adds to the income (69.50 percent), Ability to meet input expenses without credits (67.40 percent), Enables to transform the land (49.20 percent), Formed Regionalised Association for farmers (54.00 percent), Enables to meet food and nutrient requirements of the family (57.50 percent), Diversification of risks (53.80 percent) and Ability to improve the sanitation facilities (58.70 percent).

The socio-economic empowerment is not felt in the areas of Support schemes helps to raise the standard of living (40.00 percent), improved financial status for purchase of agricultural equipments (48.70 percent) and increased sector linkages for output transformation (35.80 percent).

Relationship among the Socio-Economic Empowerment based on the Agricultural Support Schemes

The socio-economic empowerment of the farmers is examined based on usage of variables that are given in the likert five point scale. The opinions of the farmers were collected and their inter-relationship is tested for analyzing the relationship among the variables. The following table explains the inter-links among the variables in measuring the socio-economic empowerment of farmers.

Table – 4
One Sample t-test – Socio-Economic Empowerment based on the Agricultural Support Schemes

	Mean	Std. Deviation	Std. Error Mean	t	Sig (2 tailed)
Enhanced income from the modernized agriculture	4.915	0.461	0.022	86.405	<0.001**
Enables to reduce the cost of production	4.697	0.499	0.024	70.852	<0.001**
Improved access to credits and funds from to banking institutions	4.122	0.898	0.043	26.003	<0.001**
Promotion schemes help to raise the standard of living	3.868	0.807	0.039	22.385	<0.001**
Enhanced saving habits based on raised income	3.379	1.132	0.054	6.960	<0.001**
Expansion of agricultural activities	3.044	1.432	0.069	0.638	0.524
Improved social status in the society	4.261	1.199	0.058	21.876	<0.001**
Assets structure of the family has improved	4.711	0.493	0.024	72.260	0.001**
Enables to make purchase of electrical appliances	4.118	1.111	0.053	20.940	<0.001**
Improved financial status for purchase of agricultural equipments	3.564	1.074	0.052	10.916	<0.001**
Less dependence on money lenders for raising credits	3.383	1.054	0.051	7.565	<0.001**
Reduced interest rates from the banks and NBFCs	3.021	1.430	0.069	0.303	0.762
Subsidies helps to raise additional income from the agricultural purchases	4.321	0.746	0.036	36.851	<0.001**

Ability to meet emergency medical expenses	4.095	1.438	0.069	15.842	<0.001**
Enabled to create own marketing structure	4.300	1.140	0.055	23.743	<0.001**
Increased procurement due to sustainable farming activities adds to the income	4.259	1.351	0.065	19.380	<0.001**
Ability to meet input expenses without credits	4.148	1.318	0.063	18.120	<0.001**
Enables to transform the land	3.510	0.570	0.027	18.643	<0.001**
Formed Regionalised Association for farmers	4.540	0.499	0.024	64.244	<0.001**
Enables to meet food and nutrient requirements of the family	4.386	0.786	0.038	36.705	<0.001**
Diversification of risks	3.938	1.377	0.066	14.168	<0.001**
Increased sector linkages for output transformation	3.238	1.059	0.051	4.674	<0.001**
Ability to improve the sanitation facilities	3.734	0.794	0.038	19.243	<0.001**

(** - implies relationship validity @ 1 % level & * - implies relationship validity @ 5 % level)

The inter-relationship among the variables of socio-economic empowerment are statistically significant in the areas of Enhanced income from the modernized agriculture (<0.001**), Enables to reduce the cost of production (<0.001**), Improved access to credits and funds from the banking institutions (<0.001**), Support schemes help to raise the standard of living (<0.001**), Enhanced saving habits based on raised income (<0.001**), Improved social status in the society (<0.001**), Assets structure of the family has improved (<0.001**), Enables to make purchase of electrical appliances (<0.001**), Improved financial status for purchase of agricultural equipments (<0.001**), Less dependence on money lenders for raising credits (<0.001**), Subsidies helps to raise additional income from the agricultural purchases (<0.001**), Ability to meet emergency medical expenses (<0.001**), Enabled to create own marketing structure (<0.001**), Increased procurement due to sustainable farming activities adds to the income (<0.001**), Ability to meet input expenses without credits (<0.001**), Enables to transform the land (<0.001**), Formed Regionalised Association for farmers (<0.001**), Enables to meet food and nutrient requirements of the family (<0.001**), Diversification of risks (<0.001**), Increased sector linkages for output transformation (<0.001**) and Ability to improve the sanitation facilities (<0.001**). The inter-relationship is not significant among the variables of Expansion of agricultural activities (0.524) and reduced interest rates from the banks and NBFCs (0.762).

Relationship between Farmers' Experience in Agricultural Activities and Socio-economic empowerment based on the agricultural support schemes

The experience of the farmers is has a significant role in developing their socio-economic status based on the income generated from the agricultural activities. The agricultural support schemes help to meet the operational expenses to a larger extent and reduce the input costs. This will directly enhance the socio economic empowerment of farmers which has induced to test the relationship among the variables and tested results are given below

Table –5
ANOVA- Farmers’ Experience in Agricultural Activities and Socio-economic empowerment based on the agricultural support schemes

		Sum of Squares	df	Mean Square	F	Sig.
Enhanced income from the modernized agriculture	Between Groups	.273	3	.091	.427	0.734
	Within Groups	91.565	429	.213		
	Total	91.838	432			
Enables to reduce the cost of production	Between Groups	2.484	3	.828	3.387	0.018*
	Within Groups	104.883	429	.244		
	Total	107.367	432			
Improved access to credits and funds from banking institutions	Between Groups	.744	3	.248	.306	0.821
	Within Groups	347.768	429	.811		
	Total	348.513	432			
Promotion schemes helps to raise the standard of living	Between Groups	26.465	3	8.822	14.840	<0.001**
	Within Groups	255.031	429	.594		
	Total	281.497	432			
Enhanced saving habits based on raised income	Between Groups	17.789	3	5.930	4.745	0.003**
	Within Groups	536.095	429	1.250		
	Total	553.885	432			
Expansion of agricultural activities	Between Groups	46.495	3	15.498	7.918	<0.001**
	Within Groups	839.672	429	1.957		
	Total	886.166	432			
Improved social status in the society	Between Groups	32.735	3	10.912	7.951	<0.001**
	Within Groups	588.775	429	1.372		
	Total	621.510	432			
Assets structure of the family have improved	Between Groups	3.105	3	1.035	4.361	0.005**
	Within Groups	101.810	429	.237		
	Total	104.915	432			
Enables to make purchases of electrical appliances	Between Groups	19.176	3	6.392	5.337	0.001**
	Within Groups	513.817	429	1.198		
	Total	532.993	432			
Improved financial status for purchase of agricultural equipments	Between Groups	7.898	3	2.633	2.302	0.077
	Within Groups	490.606	429	1.144		
	Total	498.503	432			
Less dependence on money lenders for raising credits	Between Groups	15.730	3	5.243	4.841	0.003**
	Within Groups	464.630	429	1.083		
	Total	480.360	432			

Reduced interest rates from the banking and NBFCs	Between Groups	41.304	3	13.768	7.019	<0.001**
	Within Groups	841.509	429	1.962		
	Total	882.813	432			
Subsidies helps to raise additional income from the agricultural purchases	Between Groups	6.443	3	2.148	3.938	0.009**
	Within Groups	233.936	429	.545		
	Total	240.379	432			
Ability to meet emergency medical expenses	Between Groups	45.753	3	15.251	7.721	<0.001**
	Within Groups	847.365	429	1.975		
	Total	893.118	432			
Enabled to create own marketing structure	Between Groups	21.467	3	7.156	5.690	0.001**
	Within Groups	539.503	429	1.258		
	Total	560.970	432			
Increased procurement due to sustainable farming activities adds to the income	Between Groups	21.562	3	7.187	4.018	0.008**
	Within Groups	767.468	429	1.789		
	Total	789.030	432			
Ability to meet input expenses without credits	Between Groups	8.650	3	2.883	1.667	0.173
	Within Groups	741.891	429	1.729		
	Total	750.540	432			
Enables to transform the land	Between Groups	1.617	3	.539	1.669	0.173
	Within Groups	138.586	429	.323		
	Total	140.203	432			
Forming Regionalised Association for farmers	Between Groups	7.013	3	2.338	9.976	<0.001**
	Within Groups	100.530	429	.234		
	Total	107.543	432			
Enables to meet food and nutrient requirements of the family	Between Groups	3.217	3	1.072	1.747	0.157
	Within Groups	263.374	429	.614		
	Total	266.591	432			
Diversification of risks	Between Groups	43.637	3	14.546	8.045	<0.001**
	Within Groups	775.679	429	1.808		
	Total	819.316	432			
Increased sector linkages for output transformation	Between Groups	11.645	3	3.882	3.522	0.015*
	Within Groups	472.854	429	1.102		
	Total	484.499	432			
Ability to improve the sanitation facilities	Between Groups	7.517	3	2.506	4.057	0.007**
	Within Groups	264.940	429	.618		
	Total	272.457	432			

(** - implies relationship validity @ 1 % level & * - implies relationship validity @ 5 % level)

The varied categories of experience of farmers impact the socio-economic empowerment of farmers in the areas of Enables to reduce the cost of production (0.018*), Support schemes helps to raise the standard of living (<0.001**), Enhanced saving habits based on raised income (0.003**), Expansion of agricultural activities (<0.001**), Improved social status in the society (<0.001**), Assets structure of the family have improved (0.005**), Enables to make purchases of electrical appliances (0.001**), Less dependence on money lenders for raising credits (0.003**), Reduced interest rates from the banking and

NBFCs ($<0.001^{**}$), Subsidies helps to raise additional income from the agricultural purchases (0.009^{**}), Ability to meet emergency medical expenses ($<0.001^{**}$), Enabled to create own marketing structure (0.001^{**}), Increased procurement due to sustainable farming activities adds to the income (0.008^{**}), Forming Regionalised Association for farmers, Diversification of risks ($<0.001^{**}$), Increased sector linkages for output transformation (0.015^{*}) and Ability to improve the sanitation facilities (0.007^{**}). The categories of experience is not having relationship among the variables of socio-economic empowerment of farmers in the areas of Enhanced income from the modernized agriculture (0.821), Improved access to credits and funds from banking institutions (0.734), Improved financial status for purchase of agricultural equipments (0.77), Ability to meet input expenses without credits (0.173), Enables to transform the land (0.173) and Enables to meet food and nutrient requirements of the family (0.157).

FINDINGS

- The socio-economic status of the farmers are having vital impact on the reception of the agricultural promotion schemes and eligibility criteria differ based on the demographics of farmers involved in the study. The various groups of the farmers are categorized based on their opinions and it will help to generalize the findings. The demographic profile helps to understand the opinions of the farmers based on their socio economic position.
- The gender oriented classification explains that male category has significant presence in the study which has 70.70 percent of responses followed by 29.30 percent of responses belong to the female category.
- The age group of the farmers reveals that majority of them belong to the middle age group which ranges from 26 years to 40 years category which has got 53.60 percent of responses.
- The literacy level of the farmers explains that majority of them have completed SSLC/HSC which has got 60 percent of responses.
- The income level of the farmers elucidates that majority of them are belonging to the lower income group of Below Rs. 15,000 (46.90 percent) and equivalent responses were found in higher income group of Rs. 35,000 – Rs. 45,000 (45.70 percent).
- As to the area of residence of the farmers majority of them belong to the rural area which is composed of 82.90 percent of responses.
- The marital status of the farmers reveals that 71.40 percent of them are married while 28.60 percent of the farmers involved in the study are unmarried.
- The types of family classification explains that majority of the farmers (82.40 percent) are living in joint family system while 17.60 percent of farmers are living in nuclear family.
- The family size of the respondents reveals that majority of farmers have given their opinion in the 4-6 members category which has got 64.40 percent of responses.
- The number of earners in the family classification elucidates that majority of the farmers are having another earning member in their family which is supported by 82.20 percent of responses.
- The socio-economic empowerment based on the agricultural promotion schemes are felt by majority of the farmers in the areas of Enhanced income from the modernized agriculture (96.50 percent), Enables to reduce the cost of production (71.60 percent),

Improved access to credits and funds from banking institutions (43.20 percent), Enhanced saving habits based on raised income (58.00 percent), Expansion of agricultural activities (56.80 percent), Improved social status in the society (64.20 percent), Assets structure of the family have improved (73.00 percent), Enables to make purchases of electrical appliances (54.70 percent), Less dependence on money lenders for raising credits (60.50 percent), Reduced interest rates from the banking and NBFCs (56.60 percent), Subsidies helps to raise additional income from the agricultural purchases (49.00 percent), Ability to meet emergency medical expenses (65.80 percent), Enabled to create own marketing structure (68.60percent), Increased procurement due to sustainable farming activities adds to the income (69.50 percent), Ability to meet input expenses without credits (67.40 percent), Enables to transform the land (49.20 percent), Forming Regionalized Association for farmers (54.00 percent), Enables to meet food and nutrient requirements of the family (57.50 percent), Diversification of risks (53.80 percent) and Ability to improve the sanitation facilities (58.70 percent). The socio-economic empowerment is not felt in the areas of Promotion schemes helps to raise the standard of living (40.00 percent), improved financial status for purchase of agricultural equipments (48.70 percent) and increased sector linkages for output transformation (35.80 percent).

Conclusion

The adoption of new agricultural technology is encouraged by the government as a means of increasing agricultural output and thereby achieving the higher growth rate in the agricultural sector. The implementation of innovative agricultural technology calls for extensive usage of inputs as well as a comprehensive set of practices. This encourages public and private investment in agriculture and results in a significant rise in the demand for financing for production and investment. The farming population's ability to make a living has become much more challenging as a result of a decline in agricultural output, a rise in the cost of production, distortions in the market, and inadequate infrastructure. A poor growth rate in agriculture, low productivity, failed harvests, unemployment, and insufficient command over resources owing to a low income level, low adoption of agricultural technology, no access to credit, and even inequitable access to credit are the causes of widespread rural poverty. Expanding agricultural production is the silver bullet for reducing poverty in rural areas. The adoption of new agricultural technology is encouraged by the government as a means of increasing agricultural output and thereby achieving the higher growth rate in the agricultural sector.

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