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To study the adoption level of respondents regarding crop insurance in Cooch Behar District of West Bengal

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Abstract

Crop insurance is considered to be a basic instrument for ensuring stability of farm income by promoting and encouraging technology, investment and credit flow. Still it is not much popular among our farmers. Hence, the study was conducted to understand the adoption level of respondents towards crop insurance in the district of Coochbehar in West Bengal. The study was carried out in Mathabhanga-2 and Cooch Behar -2, blocks of Coochbehar district of West Bengal. The state, district and villages were selected purposively. From three villages namely Tenganmari, Khagribari, Bara Simulguri, Baghmara 100 respondents, were selected randomly. Data were collected from individual farmers with interview schedule and processed through co -relation coefficient and multiple regressions. They adopt more quickly seeing other farmers. Adoption is more thinking of risk of risks like sale of fixed assets and borrowing from neighbours. Farmers with satisfied income as well as have premium paying capacity adopted more. Government initiative of proper awareness would improve the scenario.

Keywords: Agriculture, adoption, credit, crop insurance

Introduction

The insurance is such a technique where the loss occurred for few are adjusted from the funds collected through small contribution done by many, who are susceptible to similar types of risk. Dandekar (1976) ^[2] found that the crop insurance scheme offered insurance against a chance occurrence. The chance phenomenon underlying a crop insurance scheme is the fluctuations in the output of from one year to another or from one crop season to another. Crop insurance is a scheme to protect our cultivators from financial loss that may occurred due to crop -loss arising due to natural factors beyond their control like natural fire, weather, pests, diseases and floods etc. Crop credit insurance also reduces the risk of becoming defaulter of institutional credit. The total sum insured could be the total cost of cultivation or a fold of it or a proportion of the income expected from the particular crop for which premium is being paid. Raju and Chand (2008) ^[3] reported that Crop insurance not only stabilizes the farm income but also helps the farmers to initiate production activity after a bad agricultural year.

The indemnity is the loss occurred due to the shortfall in average yield against the guaranteed yield. The claims made are payable after the loss is measured and ascertained. Every year, in one part of India or the other, food crops are affected by natural calamities, "crop yield instability is the normal condition and agriculture continues still to be, where the farmer's fortunes are exposed, practically the same as before. In fact, good years and bad years, wet weather and drought or floods and frost, low yields and bumper crops are to be expected in mixed succession. The total loss due to natural calamities (Like flood, drought and plant diseases) is estimated as high as rs. 1,000 corers every year. The man behind the plough has to be assured that he will be compensated for such loss in crops. Otherwise, he cannot be drawn into the campaign to increase productivity of land under his plough". Under such circumstances the insurance of crop against such risk can be of immense value to them. Bhende (2005) [1] the availability of formal instrument for diffusion of risk like crop insurance will facilitate farmers to adopt risky but remunerative technology and farm activities, resulting in increased income. The crop insurance scheme aims at providing social security, helps in maintaining dignity, reduce risk burden of farmers.

Government has taken up steps to provide security to this section and make them confident in their profession. Number of insurance schemes are available for the farmers but very few of our framers are aware of it. The thinking of the farmers keeps them away from it. This thinking ultimately converts to attitude. The knowledge and attitude guide the human behavior. So, it is important to know the knowledge attitude and adoption of the scheme. This study was undertaken to probe into the psychology of the farmers, particularly their attitude towards the ongoing insurance schemes. Sundar and Lalitha Ramakrishnan, (2010) [4] stated that most of the farmers were not willing to pay for crop insurance because of instable income, premium rate, no or low compensation, problems with distribution channel and lack of financial knowledge.

Materials and Methods

The present study was carried out with the farmers of coochbehar 2 and mathabhanga 2 block of coochbehar district in the state of West Bengal. Random sampling technique was adopted for the selection of respondents from the purposively selected villages namely, tenganmari, khagribari, bara simulguri and baghmara and 25 numbers of respondents were selected from each village. Thus, a total of 100 respondents were selected for the purpose of the study. The male or female head were chosen for interview, which was done purposely for accurate collection of information. Farmers adoption of crop insurance scale was composed of Agree, Disagree and Undecided with corresponding scores 1, -1 and 0 respectively.

Results Discussion

Table 1: Farmers adoption of crop insurance based on various purposes

Sl. No.	Purpose	Agree (2)	Disagree (1)	Undecided (0)	Score	Rank
1.	Security	57	22	21	35	I
2.	Diversify risk	54	21	25	33	III
3.	Risk mitigation	36	34	30	2	VI
4.	Copying other	46	39	15	10	V
5.	Force fully purchase	51	35	14	16	IV
6.	To get benefit only	56	22	22	34	II

The above table shows the adoption of crop insurance by respondent farmers considering different purpose like security from loss, in order to diversify the risk, as a risk mitigation tool, merely by copying other farmers, simply purchased by force and in hope of getting some benefit out of it. After simple scoring it has been found that the purposes of getting some security as well as benefit make people to adopt crop insurance more than any other purpose.

Table 2: Farmers adoption of crop insurance considering different risks

Sl. No.	Statements	Agree (1)	Disagree (-1)	Undecided (0)	Score	Rank
1.	Sale of fixed assets	40	50	10	-10	V
2.	Saving	18	69	13	-51	VIII
3.	Borrowings from neighbors	60	31	9	29	II
4.	Government subsiding	51	26	23	25	III
5.	Loan from bank and friends	61	16	23	45	I
6.	Agriculture insurance	42	23	35	19	IV
7.	Others (jewel loan)	16	65	19	-49	VII
8.	Social participation of farmers	13	28	59	-15	VI

The above table shows different risks people perceived as important while adopting crop insurance scheme. It has been seen that loan from bank and friends as well as borrowings from neighbors are the main things people think as risk while considering crop insurance as a risk mitigating measure.

Table 3: Farmers crop adoption depending on their affordability

Sl. No	Statement	Agree (2)	Disagree (1)	Undecided (0)	Score	Rank
1.	Satisfied with your income?	25	66	9	-41	V
2.	Premium paying capacity?	49	43	8	6	II
3.	Other source of income?	24	56	20	-32	IV
4.	Details about crop insurance scheme known	15	68	17	-53	VI
5.	Complex procedure /provisions of the scheme do not address practical problems	23	26	51	-3	III
6.	High premium rate	52	24	24	28	I

The above table shows the farmers adoption depending on their affordability to purchase the product. The different affordability of farmers was questioned with some questions like whether they are satisfied with their income, do they have the premium paying capacity, do they have other source of income, whether they know about crop insurance scheme details, do they feel crop insurance is a complex procedure and it does not address the practical problems and whether the premium rate to be paid is high for them. High premium rate and premium paying capacity were the two factors

respondents considered important under affordability towards crop insurance.

The above table represents the correlation coefficient between awareness of the respondents with independent variables. It has been found that the independent variable hand holding showed a negative but significant relation with the awareness of the respondents towards crop insurance. Whereas, land possession type, satisfaction level as well as purpose of adoption showed a positive and significant relation with the dependent variable awareness.

Table 4: Coefficient of correlation of adoption of the farmers towards crop insurance with independent variables.

Variables	Correlation		
Land holding	-0.318**		
Age	0.015		
Farming experience	0.058		
Awareness about crop insurance (1=yes, 0=no)	-0.035		
Gross cropped area (bi)	-0.026		
Land possession	0.396**		
Satisfaction level	0.319**		
Utilisation of information source	-0.163		
Attitude	0.044		
Purpose of adoption	0.566**		
Adoption	-0.106		
Affordability	-0.165		

Conclusion

It has been found that the purposes of getting some security as well as benefit make people to adopt crop insurance more than any other purpose.

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