

Adoption of IPM Constraints Analysis

Key words : IPM, Constraints Analysis

IPM is a multidisciplinary ecological approach to pest population management which utilizes numerous control tactics in a single coordinated compatible system (Smith, 1978). The IPM programme, initially started in selected crops like, rice, cottons, and vegetables, gradually spread to other crops.

The IPM emphasizes on package of practices which on successful adoption helps farmers in maintaining the population density of pest below the economic injury level. IPM operation carried out by the farmers does not impair to any significant degree of natural control processes of potential insect pest and the health of farmers family live stock and local down stream environment. Keeping all above problems the study was taken as constraints analysis in IPM.

The study was conducted in Bhandara District of Vidharbha region of Maharashtra which was purposively selected for the study of adoption of plant IPM constraint analysis, conducted in 10 villages, selected randomly, from each village 15 trained farmers were selected comprising 150 respondents. Data were collected with the help of interview schedule by using arithmetic mean, standard deviation, frequency and percentage.

The constraints involved in adoption of plant protection practices perceived by dry paddy farmers of Vidharbha region are presented in Table 1.

1. Situational Constraints:

It was observed that majority (72.6%) of respondents fear of low rainfall during season occupies the major constraint. Non-availability of input in time (66.67%), lack of sprayers repairing facilities, (58.67%), non availability of skilled labour for plant protection operations (50.66%) were its constraints.

2. Socio Economic Constraints:

Majority (72.00%) of respondents perceived lack of credit facilities, followed by high cost of input (71.33%), higher rate of interest on credit (70.00%),

high cost of labour (68.00%), high cost of sprayer (54.67%), high cost of cultivation by following IPM (44.00%) and non-cooperation of neighbourer (28.00%), respectively.

3. Technological Constraints:

Majority (68.00%) of respondents faced lack of simple ETL followed by difficulty in implementing biological method (64.00%), difficulty in maintaining light trap (55.67%), non-availability of low cost sprayer (51.33%) and lack of simple monitoring method (46.67%), respectively.

4. Personal Constraints :

Majority (77.33%) of respondents faced constraint of limited finance, followed by difficulty to calculating doses (68.67%), difficulty in scouting method (50.67%), difficulty in remembering ETL (42.00%), lack of knowledge to identify pest diseases (36.00%) and lack of knowledge of identify biological insect (34.67%), respectively.

5. Communicational Constraints:

Lack of precise information from change agent was major communicational constraints as perceived by the IPM trained paddy farmers (35.33%), followed difficult to contact the extension agencies (31.33%).

Fear of low rainfall during season ultimately reduce the confidence in loan payment due to uncertainty in yield. Non-availability of skilled labour, lack of knowledge about operations (IPM) like sprayers, dusters, non-availability of input in time and inadequate lack of credit facilities with high interest rate, lack of knowledge about maintaining methods, difficulty in calculating doses, implementing biological methods and difficult to contact extension agencies at the time of cropping season, were the major constraints perceived by the dry paddy farmers.

The findings are in conformity with Tripathi *et al.*, (1982) Shrivastha and Singh (1990). Doijad (1991) Tantrary and Nanda (1991) and Meshram (1995).

Table 1. Constraints of Integrated Pest Management perceived by paddy trained farmers.

S.No.	Constraints	Frequency	%	Rank
I	Situational constraints:			
	Fear low rainfall during season which ultimately loose the confidence in loan payment due to uncertainty in yield	109	72.67	I
	Non availability of skilled labour in plant protection operation	76	50.66	IV
	Non availability of inputs in time	99	66.67	II
	Lack of sprayer repairing facilities	88	58.67	III
II	Socio-economic constraints:			
	High cost of input	107	71.33	II
	High cost of labour	102	68.00	IV
	Lack of credit facilities	108	72.00	I
	Higher rate of interest of credit	104	70.00	III
	High cost of cultivation by following IPM	21	14.00	VI
	Non cooperation of neighbours	42	28.00	VI
III	High cost of sprayers	82	54.67	V
	Technological constraints:			
	Lack of simple monitoring method	70	46.67	V
	Lack of simple ETL	102	68.00	I
	Difficulty in maintaining light traps	85	56.67	II
IV	Difficulty in implementing biological method	96	64.00	II
	Non availability of low cost sprayer	77	51.33	IV
	Personal constraints:			
	Lack of knowledge to identify pest and diseases	54	36.00	V
	Lack of knowledge to identify biological insect	52	34.67	VI
	Difficulty in calculating doses	103	68.67	II
V	Limited finance	116	77.33	I
	Difficulty in scouting method	76	50.67	III
	Difficulty in remembering ETL	63	42.00	V
	Communicational Constraints:			
	Lack of precise information from change agent	53	35.33	I
Difficult to contact the extension agencies at the time of need	47	31.33	II	

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Department of Extension Education
Agricultural College
Bapatla 522 101
Andhra Pradesh

D P Nagdeve
P Venkataramaiah

(Received on 12.12.2006 and revised on 18.04.2010)