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TECHNOLOGICAL NEEDS OF WET LAND FARM WOMEN IN PADDY FARMING

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Abstract:

The involvement of women in agriculture is as old as the advent of agricultural practices in the world. Women are intensively involved in all the farm operations. However, women's involvement and participation are not always 'visible' as compared to the 'visibility' of men. Moreover, the technologies are said to be gender neutral. Few research studies have shown that most of the technologies in agriculture are not suitable to farm women. The study was taken up with the objective to study the role performance of wet land farm women in paddy farming operations. Sample size of 60 wet land farm women were selected using proportionate random sampling technique. Based on the mean score obtained, each specific technology was classified into three, categories viz., 'High level of technological need', 'Moderate level of technological need' and 'Low level of technological need' based on cumulative frequency method. The average mean score in the range of 1.683 to 2.541 indicated low level of technological needs in the areas viz., harvest (2.541), post-harvest (2.316), weed management (2.079), field preparation (2.023) and irrigation management (1.683).

Key Words: Technological Needs, Small Farm Women & Paddy Farming

Introduction:

Technological base for improving productivity and income of the rural population in the field of agriculture has broadened with the success of Green revolution that the country witnessed during mid sixties. Various technological innovations have been realized claiming spectacular yield potential at research stations. As a result of this research and transfer of technology programmes, the national production has increased over time in the decades, thus balancing the population growth and food production of our country. However, the benefits of the new production technologies have accrued mostly to male farmers while farm women have been bypassed in the development process.

There is a serious and valid criticism that the modern technologies served only farmers and not the resource poor small farm women who account for nearly 89.00 per cent of the women cultivators in India. It has now been realized that participation of all sections of farming community in particular the small farm women can be brought by developing appropriate technologies. Hence, the study entitled 'Technological Needs of Small Farm Women in Varied Farming Systems of Tamilnadu', was taken up to analyse the Technological Needs of Small Farm Women in Paddy Cultivation.

Methodology:

The study was taken-up in Nagapatinam district in Tamil Nadu which comprised of maximum area under wet land farming system. A sample size of 60 wet land farm women was taken for analysing the technological needs of farm women in paddy cultivation. Ex Post Facto research design was used in the study. The required data was collected by utilising a well structured and pre-tested interview schedule. The technological needs with reference to production and produce, mechanisation, harvest, post-harvest agro-processing, transport, storage, marketing and livestock production

technologies will be examined within the scope of what is technically feasible, economically feasible, socially acceptable, environmentally safe and sustainable were collected to adopt the technology. Based on the mean score obtained, each specific technology was classified into three, categories viz., 'High level of technological need', 'Moderate level of technological need' and 'Low level of technological need' based on cumulative frequency method.

Findings and Research:

Technological Needs of Wet Land Farm Women in Paddy Cultivation:

The information on the technological needs as perceived by wet land farm women in paddy cultivation was gathered and the results are given in Table 1.

Table 1: Technological needs of wet land farm women in paddy cultivation

(n = 60)

S.No	Technologies	Mean Score	Rank
1	Field Preparation		
	(i) Stubble collection	2.500	
	(ii) Digging the corners of field	2.000	
	(iii) Cleaning the field boundaries	1.666	
	(iv) Quantity of FYM to be applied	2.083	
	(v) Time of land preparation	1.866	
	Average mean score	2.023	IX
2.	Varieties		
	(i) Varieties recommended in the area	2.666	
	(ii) Characteristics of recommended varieties	3.333	
	Average mean score	2.999	V
3	Seeds and sowing		
	(i) Selection of good quality seeds	3.000	
	(ii) Method of seed treatment with fungicides	3.666	
	(iii) Method of seed treatment with bio-fertilizers	3.533	
	(iv) Method of sowing	2.500	
	(v) Thinning and gap filling	2.716	
	(vi) Maintenance of plant population	2.916	
	Average mean score	3.055	IV
4.	Irrigation management		
	(i) Economic use of water	1.666	
	(ii) Time of irrigation	1.700	
	Average mean score	1.683	X
5.	Weed management		
	(i) Weedicides	2.333	
	(ii) Method of application of weedicides	2.500	
	(iii) Identification of weeds	1.483	
	(iv) Time of weeding	2.000	
	Average mean score	2.079	VIII
6.	Fertilizer application		
	(i) Application of required inorganic fertilizers	3.666	
	(ii) Application of DAP	3.533	
	(iii) Nutrient deficiency in paddy	2.650	

	(iv) Method of application	3.366	
	Average mean score	3.303	II
7	Plant protection		
	(i) Identification of pests	3.333	
	(ii) Identification of diseases	3.150	
	(iii) ETL for various pests and diseases	2.733	
	(iv) Recommended pesticides and fungicides	3.750	
	(v) Preparation of spray fluid	2.866	
	Average mean score	3.166	III
8.	Harvest		
	(i) Time of harvest	2.666	
	(ii) Method of harvest	2.416	
	Average mean score	2.541	VI
9.	Post-harvest		
	(i) Method of threshing	3.000	
	(ii) Method of drying	1.300	
	(iii) Seed treatment with chemicals	3.666	
	(iv) Grading the seeds	1.750	
	(v) Method of storage	1.866	
	Average mean score	2.316	VII
10.	Farm implements		
	(i) Labour saving implements	3.600	
	(ii) Method of using implements	3.316	
	(iii) Maintenance of farm implements	3.616	
	Average mean score	3.510	I
	Overall mean score	2.667	

From the data in Table 36, it could be observed that the farm women of wet land in paddy farming expressed high level of technological needs in the major subject matter areas of farm implements (3.510), fertilizer application (3.303), plant protection (3.166), seeds and sowing (3.055) and varieties (2.999) which ranked from I to V. This is evident from their respective average mean scores which were found to be above the overall mean score of 2.667.

The average mean score in the range of 1.683 to 2.541 indicated low level of technological needs in the areas viz., harvest (2.541), post-harvest (2.316), weed management (2.079), field preparation (2.023) and irrigation management (1.683).

It is quite interesting to know the results from Table 1 that out of thirty eight specific subject matter areas studied for assessing the technological needs of farm women in paddy farming a high level of technological need was observed in fourteen technologies with their mean score ranging from 2.934 to 3.750. The specific technologies identified with high level of technological needs were viz., recommended pesticides and fungicides (3.750), method of seed treatment with chemicals (3.666), application of required inorganic fertilizers (3.666), seed treatment with chemicals after harvest (3.666), maintenance of farm implements (3.616), labour saving implements (3.600), method of seed treatment with bio-fertilizers (3.533), application of DAP(3.533), method of fertilizer application (3.366), characteristics of recommended varieties (3.333), identification of pests (3.333), method of using implements (3.310), identification of diseases (3.150), method of threshing (3.000) and selection of good

quality seeds (3.000). The outcome is in accordance with that of Arul raj(2013) who reported that majority of the farm women were in need of early maturing varieties.

However, some of the technologies like maintenance of plant population (2.916), preparation of spray fluid (2.866), ETL for various pests and diseases (2.733), time of thinning and gap filling (2.716), varieties recommended in the area (2.666), nutrient deficiency in paddy (2.650), time of harvest (2.666), method of harvest (2.416), method of sowing (2.500), stubble collection (2.500), method of application of weedicides (2.500) and weedicides (2.333) belonged to medium level of technological need category with the mean score value ranging from 2.117 to 2.933.

For the rest of the technologies, low level of technological needs was observed with the mean score value ranging from 0.816 to 2.116. The technological mean score in the table revealed that the farm women expressed low level of technological need in the specific subject matter areas viz., quantity of FYM to be applied (2.083), time of weeding (2.000), digging the corners of field (2.000), method of storage (1.866), time of land preparation (1.866), grading the seeds (1.750), time of irrigation (1.700), cleaning the field boundaries (1.666), economic use of water (1.666) identification of weeds (1.483) and method of drying (1.300). Most of these technologies were traditionally followed practices by the farm women. Further, farm women had adequate knowledge and skill on these technologies. This finding is in line with the findings of Vengatesan and Santha Govind (2009).

Conclusion:

No matter how technically feasible recommendations may be, they cannot increase productivity unless women are involved. Certain technologies may be less easily adopted by females than male farmers because technological needs of farm women in this study have been amply analysed and the results showed that female farmers differed in their performance under varied conditions. Labour and energy saving technologies are women farmers' greatest need. In addition, they require production technologies for their commodities, constraints and objectives.

References:

1. Arul raj, A.2013. Technological Needs of Banana Growers of Cuddalore District, Unpublished M.Sc Thesis (Agricultural Extension Thesis, Annamalai university Annamalai nagar)
2. Barker, C., 1997, Selecting appropriate content and methods in programme delivery. In: Swanson, B.E., Bentz, R., Pand, A.J. and Sofranko (Eds.), Agricultural Extension: A Reference Manual, Rome: FAO, P. 67-68.
3. Vengatesan and Santha Govind 2009. "Role performance of Wet Land Farm Women in Paddy Farming System" International journal of Extension Education, 5: 56-60.