

Original Research Article

Constraints faced by the farmers in utilizing Raitha Samparka Kendras (RSKs) –Extension services

Abstract: A survey of 210 farmers in Haveri district, Karnataka, was undertaken to investigate the constraints they encountered in utilizing the extension services provided by the Department of Agriculture during 2018-19. The constraints encountered by farmers were categorized into five major categories. The study revealed that, in terms of information services, over two-thirds (71.90%) of the farmers reported a lack of available extension workers in their offices and irregular visits to villages and fields. This indicates a significant gap in the availability and accessibility of information resources for farmers. Majority of the farmers (73.33%) reported that time constraints prevented them from participating in extension activities offered by RSKs, followed by more than half (58.57%) of the respondents who expressed that the location of extension activities was inconvenient. Regarding input services, 70.00 per cent of farmers expressed non availability of required inputs (variety, chemical). Additionally, over three-quarters of farmers expressed dissatisfaction with the distance between their villages and Rural Service Centers (RSKs), making it difficult to access diagnostic services and technical support. Regarding developmental activities, a significant number of farmers, 77.14 per cent, reported delays in the construction of Krishi-Honda (agricultural machinery). Additionally, over two-thirds of farmers expressed dissatisfaction with the lack of access to drip and sprinkler irrigation sets for all categories of farmers. These constraints hinder the adoption of modern agricultural practices and limit the potential for increased productivity and income.

Key words: Constraints, Extension services, Department of Agriculture

Introduction

Agriculture remains a cornerstone of India's economy, employing 54.6% of the total workforce in agriculture and related sectors. While this figure has decreased from 60% in 2001, agriculture continues to be a vital source of livelihood for a significant portion of the population. The decline can be attributed to factors such as urbanization, industrialization, and a growing service sector, as evidenced by the 2011 Census data. Department of Agriculture has been created mainly to provide agricultural extension services to farmers and to transfer the latest technical knowledge to the farming community. Viz; introduction of high yielding varieties, laying demonstrations, imparting training to farmers to improve skills & knowledge to boost up the agricultural Production and productivity. Despite these services farmers are facing the constraints which should be resolved for the welfare of farmers and to double their income as a result of this country's economy can also be boosted.

The history of agriculture development in Karnataka dates back to the 18th century. The Maharaja of Mysore initiated early agricultural development programs. In 1836, Mark Cubbon established the Society for Agriculture and Horticulture, laying the foundation for organized agricultural efforts in the region. In 1885 state inspector general of police was given charge of four departments which include agriculture department. Dr A. Lehman was appointed as first agricultural chemist in the year 1899 to test soil samples and to provide important recommendations. In 1913 Dr. Leslee C Coleman was appointed as first director of agriculture (Anon., 2019).

Raitha Samparka Kendras (RSKs) were established at the Hobli level as agricultural extension centers. A total of 745 RSKs were initially created under the Raitha Mitra Yojane in 2000-01 (Avinash, T.S., 2013). The Raitha Samparka Kendras (RSKs) serve as valuable resources for farmers at the grassroots level. The department's capacity is reflected in its staff strength, which consists of two primary categories: technical staff and para-technical staff. Technical staff address complex agricultural issues, while para-technical staff assist in RSK operations and provide technical information to farmers. Agriculture Officer (AO) is the head of RSK with support of two Assistant Agricultural Officers (AAO) and Agricultural Assistants (AA). There will be one Agriculture Assistant (AA) for every Gram panchayat and the number

of Agriculture Assistants increases as the number of Gram panchayat which comes under the jurisdiction of that particular RSK increases.

Materials and Methods

Haveri district, located within the jurisdiction of the University of Agricultural Sciences, Dharwad, was purposefully selected for this study during 2018-19. Haveri's prominence in agriculture, agriculture-based enterprises, and the researcher's familiarity with the region made it an ideal location for investigating the constraints faced by farmers in accessing extension services. Primarily all seven taluks of Haveri district were selected for the study. From each taluk, one Raita Samparka Kendra was selected randomly. Thus, totally seven RSKs were selected. Subsequently, two villages were randomly chosen from each selected RSK, making a total of 14 villages. Finally, 15 farmers were randomly selected from each of these 14 villages, resulting in a total sample size of 210 farmers.

“*Ex-post-facto*” research design was employed in the investigation as the phenomenon has already occurred and this design was considered appropriate. A structured schedule was prepared with the help of judges in the field of Agricultural Extension and tentatively prepared schedule was pre-tested in a non-sample area against ambiguity if any, in the questions included therein and then necessary corrections were made in the final schedule.

The data was collected from respondents through personal interview method in an informal atmosphere by establishing a good rapport, convincing the purpose and importance of study. The collected data were scored, tabulated and analyzed by using frequency, percentage, mean, standard deviation, correlation and regression.

Results and Discussion

As shown in Table 1, the top most constraint among farmers was the lack of available extension workers (71.90%), followed by irregular visits from these workers (71.90%). This can be attributed to several factors, including inadequate staffing levels at Raitha Samparka Kendras (RSKs) and the heavy workload of extension staff. These workers are often required to attend numerous meetings each week, including video conferences, zero-budget natural farming meetings, progress report meetings, KVK meetings, review meetings, ADA meetings, and bimonthly meetings. Additionally, agriculture officers are tasked with quality control inspections, which involve drawing and testing samples from input dealers. This multifaceted workload can limit their ability to provide timely and effective extension services to farmers. The Other constraints included a lack of timely information (68.57%) and the absence of required information (61.42%). These issues can be attributed to the limited availability of Raitha Samparka Kendras (RSKs) within taluks. With only 2-3 RSKs per taluk, many villages are located at a significant distance from these extension centers, hindering the effective flow of information services. Additionally, less than one-third of farmers (30.47%) expressed dissatisfaction with the technical competence of extension workers. This may be due to a lack of knowledge about extension activities among farmers, as well as a perceived lack of knowledge and confidence in extension workers (Technology Promoters/Facilitators) to address a wide range of farmer problems. It's important to note that these facilitators are typically educated up to the Secondary School Leaving Certificate (SSLC) or Pre-University Certificate (PUC) level, rather than holding university degrees.

It is clear from Table 2 that nearly three fourth (73.33 %) of the farmers expressed lack of time to participate in extension activities, the reason because of heavy work load in the farm and less knowledge about the importance of these extension activities. Followed by, place of extension activity is not accessible (58.57 %) the probable reason may be because farmers must spend money and time on transportation, followed by lack of information about extension activities (57.14 %) the possible reason may be because of less awareness, less advertisement about the extension activities and poor interest of farmers in extension activities. Followed by, lack of interest in participation (29.04 %) is the other important constraint expressed by farmers in availing extension activities facilitated by RSK. The reason might be farmers expect the

benefits (cash/free inputs) from extension services, hence usually farmers have ignorance about these extension activities and busy schedule of farmers may be also a potential reason to express this constraint.

As shown in Table 3, a significant number of farmers (70%) reported a lack of access to necessary inputs. This shortage can be attributed to several factors, including limited supply and early depletion of inputs due to demand from other farmers. Additionally, the variety of inputs demanded by farmers often exceeds the available supply, as the government faces challenges in distributing inputs evenly across the state. These factors contribute to the difficulty farmers experience in obtaining the resources they need for their agricultural activities. Followed by, no transparency in input supply (60.95 %) because most of the farmers say that they were unaware about the happenings in RSKs with respect to stock of inputs in RSK and various other aspects. Furthermore, 49.52 per cent of farmers expressed dissatisfaction with the quality of inputs, while 37.14 per cent cited a lack of timely availability as a significant constraint. These issues can be attributed to factors such as unpredictable weather conditions, fluctuating demand from farmers, and delays in the supply of inputs to RSKs, resulting in insufficient stock levels.

It is clear from the Table 4, the most significant constraint faced by farmers in accessing diagnostic services was the distance between their villages and Raitha Samparka Kendras (RSKs), with 78.09 per cent of farmers expressing this concern. Additionally, a large number of farmers (73.80%) reported dissatisfaction with the quality of water testing services provided by RSKs. These challenges hinder farmers' ability to obtain timely and accurate information regarding soil and water health, which is crucial for effective agricultural management. The primary reason for these constraints lies in the significant distance between villages and Raitha Samparka Kendras (RSKs), due to the limited number of RSKs per taluk. Farmers often need to spend half or a whole day to reach an RSK. Additionally, water samples collected by farmers are typically sent to water testing laboratories located at Krishi Vigyan Kendras (KVKs), further adding to the time and effort required for diagnostic services. While a smaller percentage of farmers (24.76%) reported dissatisfaction with soil testing services, many have benefited from

the Soil Health Card scheme, which provides valuable information on soil health and nutrient management.

It is evident from Table 5 that, greater than three fourth (77.14 %) of the farmers expressed not constructing krishi-honda in-time, followed by lack of supply of drip & sprinkler irrigation sets to all categories of farmers (66.66 %) as the important constraints in availing services of developmental activities. Many farmers who applied for Krishi-Honda services encountered lengthy procedures and bureaucratic hurdles, resulting in delays in approval and implementation. Additionally, the distribution of drip and sprinkler irrigation sets was limited to farmers with existing irrigation sources, excluding those who lacked access to water resources.

Conclusion

Based on the findings, it is evident that increasing the number of Raitha Samparka Kendras (RSKs) per taluk is essential to improve accessibility for farmers. Additionally, recruiting sufficient technical staff to manage RSK activities, along with non-technical staff to handle input distribution and sales, is crucial for providing comprehensive and efficient services to farmers. To ensure the effectiveness of Raitha Samparka Kendras (RSKs), it is essential to supply a sufficient quantity and wide range of inputs to these centers. Additionally, raising awareness about the importance of RSK services and providing these services at convenient locations can enhance farmer participation. Policymakers should carefully consider these factors when formulating regulations to support the agricultural extension system.

Disclaimer (Artificial intelligence)

Author(s) hereby declare that NO generative AI technologies such as Large Language Models (ChatGPT, COPILOT, etc.) and text-to-image generators have been used during the writing or editing of this manuscript.

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Table 1. Constraints faced by the farmers in availing information services

n=210

Sl. No	Particulars	f	%
1.	Lack of availability of extension workers in office	151	71.90
2.	Extension worker do not visit villages regularly	151	71.90
3.	Lack of availability of information in-time	144	68.57
4.	Lack of availability of required information	129	61.42
5.	Extension workers are not technically competent	64	30.47

Table 2. Constraints faced by the farmers in availing extension activities facilitated by RSK

n=210

Sl. No	Particulars	f	%
1.	Lack of time to participate in extension activities	154	73.33
2.	Place of extension activity is not accessible	123	58.57
3.	Lack of information about extension activities	120	57.14
4.	Lack of interest in participation	61	29.04

Table 3. Constraints faced by the farmers in availing input services**n=210**

Sl. No	Particulars	f	%
1.	Lack of required inputs (variety, chemical)	147	70.00
2.	No transparency in input supply	128	60.95
3.	Poor quality of inputs	104	49.52
4.	Lack of availability of inputs in-time	78	37.14

Table 4. Constraints faced by the farmers in availing diagnostic services**n=210**

Sl. No	Particulars	f	%
1.	RSKs are located away from the village	164	78.09
2.	Poor services with regard to water testing	155	73.80
3.	Poor services with regard to soil testing	52	24.76

Table 5. Constraints faced by the farmers in availing services of developmental activities**n=210**

Sl. No	Particulars	f	%
1.	Not constructing krishi-honda in-time	162	77.14
2.	Lack of supply of drip & sprinkler irrigation sets to all category of farmers	140	66.66

UNDER PEER REVIEW