

Need of Information and Utilization of Information Sources by Progressive and Non-Progressive Farmers

Deepa Singh & Shipra Mathur

Abstract

There is a lot of innovation in the subject of sustainable agriculture in the present day. You never stop using key technologies to improve important farming operations no matter how old a farmer is. Qualitative research was carried out in order to have a better understanding of the informational needs of progressive and non-progressive farmers. A mix of progressive and non-progressive farmers filled out semi-structured questionnaires, which were then analysed. There is a need for an increase in understanding how progressive farmers go about gaining new skills, knowledge, or promoting change to meet the demands that are placed on the farm. The purpose of this study was to explore and describe the learning resources used by individual progressive farmers who have been involved in this continues learning process. Farmers of the Progressive generation were found to be more likely to turn to new media for information on gaining access to technology and forming marketing partnerships. Meanwhile, the non-progressives were known to be mainly dependent on social and traditional sources. Progressive and non-progressive farmers are based on the agricultural tactics such as hybrid seeds, sophisticated irrigation, growing methods, and yield production. The study revealed that there is a high adoption of new media among progressive farmers (96.00%) while very low adoption of new media among non-progressive farmers (4.00%). There is significant relation in age, education, and cultivated and in the adoption of new media among progressive and non-progressive farmers.

Keywords: Adaption; Information need; Information Resources; New Media; Progressive Farmers; Traditional Media.

Introduction

In this world of constant change, some of the most significant changes essential to the survival of mankind have taken place in the area of agriculture. Farming methods, equipment's, and plant varieties have become obsolete at an accelerated pace as new and better alternatives have been developed to increase production and preserve the precious resources available leading to resulting in sustainable development. Rapid changes in farming practices due to new research and innovations have important practical implications for farmers. Because of the many changes that affect them, learning is a continuous process among farmers. Farmers' capacity to gather, organise, store and retrieve knowledge on how to grow food in this information era is also evolving. Many sources of information are available to farmers.

To ensure that the data they're receiving is relevant, accurate, and helpful, they must review it frequently. There is so much information out there those farmers have to be judicious about what they think necessary and worthwhile. For farmers, it has become nearly difficult to absorb all the knowledge accessible to them in the field of farming, and it may be costly to the farmer in terms of time and money.

Traditionally farmers were dependent on fellow farmers but due to advancement in information technology and education among farmers have resulted in use of various new media platforms in agriculture innovation and agriculture related practices.

In this study we have tried to compare the information resources and their applications in farming by progressive and non-progressive farmer in Jai-pur rural. The objectives of the study are

1. To understand the need of information source and which is most relevant to the progressive farmer's needs.
2. The sources mostly used by progressive and non-progressive farmers to obtain information about new innovations or methods.

Review of Literature

The important parts of information seeking behaviour include who needs what information and why; how information is accessed, analysed, and used; and how their requirements might be found or met (Kumar, 1990).

Information-seeking behaviour includes requesting for information for personal reasons, the type of information sought, and the method used to obtain essential information. Wilson (1997). There are numerous methods for fulfilling and satisfying a user's perceived demand for information, including the usage of a variety of official and informal sources, as well as services (Boadi and Letsolo 2004).

The majority of Zambian farmers obtain their knowledge not from NGOs but rather from their own personal experiences and via informal social networks (such as their families and close friends) (Kaniki, 2001). Farmers get their knowledge both through informal networks and from mainstream media like as radio and television, as stated by Momodu (2002) Meitei and Devi (2009) respectively. According to studies conducted in the past, the vast majority of people in developing nations who are interested in acquiring information prefer to do it through informal sources as opposed to official sources (Lwoga 2010,).

Farmers that want to become more progressive must use agricultural tactics such as hybrid seeds, sophisticated irrigation, and growing methods. Knowledge of agricultural practises and markets is necessary, but so is knowledge of technology. Non-Progressive farmers frequently rely on farmer networks and agricultural extension agents from the Department of Agriculture. Face-to-face communication or private phone talks, rather than online forums or social media groups, connect these two categories.

Progressive farmers use mobile phones to enable face-to-face communication for a variety of reasons, including: (a) this method is more discussion-oriented than current social media trends. To encourage enhanced openness in information sharing, (b) there is a sense of proximity, and (c) the urgency of participation is successfully handled. Most informants noted that when it comes to cultivation tactics, interpersonal talks are usually followed by visits or direct learning activities, especially because the approaches are simpler to understand when learnt in person. Another advantage of the farmers' research is that this fresh knowledge was not previously available in online conversations. One-on-one interaction is strongly preferred here. Furthermore, the baby boomer generation prefers to converse by phone and email. In interpersonal relationships, body language and nonverbal cues play an essential role.

The act of obtaining information to fulfil one's individual needs is referred to as information-seeking behaviour (Emmanuel, 2012). This includes both purposeful and inadvertent behaviour, as well as intentional behaviour

that does not entail acquiring information, such as avoiding it. Farmers employ a variety of information sources and venues in their pursuit of better agricultural practises (Kumar, 2014). An act of information utilisation is a person's behaviour in obtaining information to suit his or her individual information demands. Information consumption is a measure of a person's information needs, which vary from person to person (Deribe, 2020). A conscious endeavour to gain information in response to a need or a gap in one's understanding is referred to as knowledge seeking.

The sources of information that are currently available to farmers may be split into two categories: "traditional" and "contemporary." Traditional sources of knowledge include other farmers, farmers in leadership roles, retailers and dealers of agricultural inputs, and government extension centres. Farmers now have access to a variety of contemporary sources of agricultural information, including electronic newspapers, relevant websites, helplines, telecenters, and agricultural programming broadcast on radio and television.

Methodology:

The Jaipur District, which is located in the state of Rajasthan, served as the focus point of the research endeavour. Only six (Amer, JamwaRamgarh, Kotputali, Shahpura, Jaipur City and Virat Nagar) of the thirteen tehsils (Bassi, Bagru, Chomu, Chaksu, Jamwaramgarh, Kotputali, Virat Nagar, Shahapura, Phagi, Amer, Mauzamabad, Jaipurcity, Sanganer) that make up district. Selected 6 tehsils of North East direction of Jaipur. Farmers who practised progressive agriculture and farmers who did not practise progressive agriculture were chosen at random from each tehsil. The first group referred to farmers who had any knowledge of digital technology, while the second group was believed to be progressive farmers who possessed digital abilities. In addition, the research was carried out in particular regions, which were chosen because they are areas in which farmers have developed and maybe adopted progressive agriculture. A total of 50 farmers were selected to represent the population, with 25 farmers considered progressive and 25 considered non-progressives. The data were obtained with the aid of the google form approach, and processed and evaluated with the assistance of the appropriate statistical tools.

Result and Discussion:

Sources of Information

Needs of Information Agricultural Machinery and Technology (Tractors, Harvesters, Transplants, Modern Irrigation)	Information Sources
	· Academician
	· Farming Company
	· Agriculture Department
	· Successful Farmers
	· Social Media
	· New Media Platforms
Quality Seed	· Agriculture Department
	· Farmer Network
Cultivation Techniques	· Farmer Network
	· Agriculture Department
Product Sale Prices /Market Information	· Farmer Network
	· Trader Network
Marketing partnership	· Online Community
	· Farmer Group

Progressive farmers, as shown in the Table above, are more in need of information on agricultural practises and the market, particularly product selling prices. Farmer's obligation, according to the informant, is to have a thorough understanding of both the potential market and the quality that may be achieved. This knowledge is just as crucial as the cultivation techniques and marketplaces.

Sample Statistics

Farmer Type	Progressive	Non-Progressive
Amer	4	3
Jamwa Ramgarh	4	4
Virat Nagar	5	4
Kotputli	5	4
Shahpura	4	5
Jaipur City	3	5
Number	25	25
Percentage (%)	50	50

Which resources do you use most?

	Progressive Farmer	Non-Progressive Farmer
Social sources	1	15
Traditional Sources	0	9
New Media Sources	24	0
None of the Above	0	1

Figure 1: Resources used by Progressive and Non-Progressive Farmers

Figure 1 shows the resource used by the progressive and non-progressive farmers for farming related information. It shows that for non-progressive farmers use social and traditional resources while the progressive farmers are using new media resources.

Which social resources do you prefer?

Farmer	Progressive	Non-Progressive
Friends/Relative/ Neighbors	1	17
Fellow farmers/Input dealers	1	8
Progressive Growers/ NGOs	23	0
Agricultural Scientists	0	0
None	0	0

Figure 2: Social Resources used by Progressive and Non-Progressive Farmers

Figure 2 shows the social resources used by progressive and non-progressive farmers for farming related information. Non-Progressive Farmer follows the general social sources such as friends, relatives, neighbours and fellow farmers while the progressive farmer follows the progressive growers.

Which Traditional resources do you prefer?

	Progressive Farmer	Non-Progressive Farmer
Radio	0	8
TV	10	14
Newspaper	3	3
Farm Publications	12	0
None	0	0

Figure 3: Traditional Resources used by Progressive and Non-Progressive Farmers

Figure 3 shows the Traditional resources followed by the progressive and non-progressive farmers for farming related information. Traditional resources such as Radio and TV are popular among non-progressive farmers while the farm publication and TV are popular between progressive farmers.

Which social Media Platforms do you prefer?

	Progressive Farmer	Non-Progressive Farmer
Social Media	1	2
Website Portal/ Blogs	2	0
Farmers App	1	0
YouTube	21	1
None	0	22

Figure 4: Social Media Platforms used by Progressive and Non-Progressive Farmers

Figure 4 shows the social media platforms for progressive and non-progressive farmers for farming related information. From the table it is clear

that non progressive farmers are not using social media platform while the progressive farmer are popularly using YouTube as a social media platform.

How frequently do you use Resources for information on farming?

	Progressive Farmer	Non-Progressive Farmer
Daily	9	0
Weekly	6	4
Fortnightly	6	5
Monthly	4	10
Six months	0	6
Yearly	0	0

Figure 5: Frequency of Resources used by Progressive and Non-Progressive Farmers

Figure 5 shows that frequencies of resources used by progressive and non-progressive farmers for farming related information. Progressive farmers are using source of information more frequently than the non-progressive farmers.

Which resources is more convenient for information related to farm practices?

	Progressive Farmer	Non-Progressive Farmer
Social sourcezs	0	11
Traditional Sources	0	14
New Media Sources	25	0
None of the Above	0	0

Figure 6: Convenient Source of Information Resources used by Progressive and Non-Progressive Farmers

Figure 6 shows the convenient source of information for progressive and non-progressive farmers. Non-progressive farmers are dependent on the social and traditional sources while progressive farmers are dependent on new media sources.

which resources provide sufficient content about farming?

	Progressive Farmer	Non-Progressive Farmer
Social sources	0	14
Traditional Sources	0	11
New Media Sources	25	0
None of the Above	0	0

Figure 7: Sufficient Resources used by Progressive and Non-Progressive Farmers

Figure 7 shows the information of sufficient content used by progressive and non-progressive farmers. According to non-progressive farmers social and traditional sources provide sufficient information of farm related information while progressive farmers think that new media provide sufficient information for farming.

Which resources do you TRUST most for information on farm practices?

	Progressive Farmer	Non-Progressive Farmer
Social sources	0	10
Traditional Sources	0	14
New Media Sources	25	1
None of the Above	0	0

Figure 8: Trusted Resources used by Progressive and Non-Progressive Farmers

Figure 8 shows the source of trusted information related to farming. Traditional and social source are more trustable as per non-progressive farmers while the progressive farmers thinks that new media sources are more trustable.

Table 1: New media resources used by progressive and Non-Progressive Farmers

Information Need and utilisation

Variable	Sub variable	Progressive Farmer			Non-Progressive Farmer			Test Statistics	
		NMS	OS	T	NMS	OS	T		
Gender	Male	F	18	0	18	1	15	16	CC=.214; P=.350
		%	72	0	72	4	60	64	
	Female	F	6	1	7	0	9	9	
		%	24	4	28	0	36	36	
Age	20-40	F	8	0	8	1	4	5	CC=.311; P=.000
		%	32	0	32	4	16	20	
	40-60	F	16	0	16	0	14	14	
		%	64	0	64	0	56	56	
	60+	F	0	1	1	0	4	4	
		%	0	4	4	0	16	16	
Education	Illiterate	F	0	0	0	0	5	5	CC=.153; P=.047
		%	0	0	0	0	20	20	
	School	F	2	1	3	0	16	16	
		%	8	4	12	0	64	64	
	College	F	22	0	22	1	3	4	
		%	88	0	88	4	12	16	

In- come	Upper	F	9	0	9	0	2	2	CC=.322; P=.138	
		%	36	0	36	0	8	8		
	Middle	F	15	0	15	1	15	16		
		%	60	0	60	4	60	64		
Lower	F	0	1	1	0	7	7			
	%	0	4	4	0	28	28			
Culti- vated land	Up to 2 Acre	F	4	1	5	0	5	5		CC=.236; P=.001
		%	16	4	20	0	20	20		
	2 to 10 Acre	F	15	0	15	1	18	19		
		%	60	0	60	4	72	76		
	More than 10 Acre	F	6	0	6	0	1	1		
		%	24	0	24	0	4	4		
	Total	F	24	1	25	1	24	25	$\chi^2=0.380$; P=.597	
		%	96%	4%	100%	4%	96%	100%		

NMS=New Media Source, OS other source, T= Total, * Significant at 0.05 level

The new media emphasize on the need and utilisation of information sources. The majority of progressive farmers (96%) has utilisation of new media sources while majority of non-progressive farmers have the utilisation of other than new media sources. There is a significant association between age (CC=0.31, P=.000), education (CC=0.153, P=0.047) and cultivated land (CC=0.236, P=0.001) groups about the utilisation of the new media sources.

Conclusion

Progressive and non-progressive farmers have distinct farming aims and characteristics, which explains the differences. Farmers who are not progressive, on the other hand, are more concerned with increasing agricultural efficiency and profit margins. A rising demand exists to learn more about technology and marketing through traditional and social media channels. For progressive farmers seeking fresh knowledge on cultivation practises and market pricing, as well as new technology and insights into agricultural product quality, sustainable farming is a top goal. Farmer network growth and agricultural extension in the field are also essential components of progressive farmers' use of social and new media plat-

forms. As a result, farmers must have access to the information they require through proper channels and media in order to sustain farming and expedite the transition to agriculture.

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