

Assessment of Role of Local FM Radio in disseminating Agriculture Technology on Sindhuli, Nepal

B. Gautam^{1*}, S. Adhikari², P. Neupane²

¹Prithu Technical college, Institute of Agriculture and Animal Science, Tribhuwan University, Nepal.

²Himalayan College of Agricultural Sciences and Technology (HICAST), Department of Science and Technology, Purbanchal University, Nepal

*Corresponding Author: gautam53.bg@gmail.com,

Available online at: www.isroset.org

Received: 25/April/2020, Accepted 05/May/2020, Online: 31/May/2020

Abstract— A study entitled Assessment of Role of Local FM Radio in disseminating Agriculture Technology on Sindhuli Nepal was conducted from January to March 2020. 60 farmers were selected randomly and interviewed using the pre-structured questionnaire. Secondary data was collected from different sources. The data collected was analysed. Results revealed that majority of the respondents were male (63.33%), belonged to the age group of 25-49 years (58.33%), 45% have with Intermediate level of Education, 56.67% with more than ten years of farming experience, average family size 4.35 and average landholding 3.54 ropani. It was observed that 41.67% of the respondents listen to agriculture programs every day. The common means for listening to the radio was a mobile phone (89%) with radio feature and 11% have radio sets on their house. 28.33% of the respondent's Drama Nature of the program followed by (18.33%) Agriculture News. Regarding the subject broadcasted, topics related to Disease and pest management were preferred by 38.33% of the farmers. Only 6.67% of the respondents reported that the information broadcasted is highly relevant while 10% of the respondents suggested the revision of the contents. About half of the respondents were found to be satisfied with the content broadcasted while only 5% was found highly satisfied. 100% of the respondents preferred Evening 5:00 PM to 7:00 PM for a listening agriculture program. 25% of the respondents reported poor signal is the major problem to access the information through the radio followed by a language barrier (16.67%).

Keywords— Radio, Agriculture

I. INTRODUCTION

Nepal is landlocked country with an area of 147,181 square km where 33 percent to the total Gross Domestic Product (GDP) is contributed by Agriculture [1] and about 65.6 percent population is engaged in agriculture [2] however, the production gap between the research station and farmer's field is the main problem rooted in the context of Nepal. Both governmental and non-governmental institutions are working to reduce this gap, but yet no significant achievements have been gained.

Radio has been a quick and reliable medium with the wider area, and population coverage. The strength of radio because the medium of communication is that it's cost-effective regarding transmission, presentation, and portability. These are common and convenient sources of agricultural knowledge to farmers and act as a reliable means to inform farmers regarding the latest technologies, development, and emergencies. [3]

In Nepal Agriculture Information and Communication Center (AICC) has been at major working for disseminating agricultural information through the mass media. AICC in collaboration with Radio Nepal has been broadcasting Agriculture programs every day from 6:40 to 6:55 pm on both National and regional languages. Agricultural programs transmitted by Radio Nepal has been very much useful and have left positive impacts on both small and large scale development in Nepal [4]. In addition to Radio Nepal recently growing Local FM radio stations are also broadcasting agriculture- related programs focusing on local communities and local languages [5]. In the case of Sindhuli District Sindhuligadhi FM, Radio Siddhababa, Radio Sahara, Radio Mahabharata, Sunkoshi FM are the local radio stations actively broadcasting the information regarding the Farming practices, Post-harvest, and marketing with an opportunity to interact among relevant authorities.

The main objective of the study was to ensure the effectiveness of the program broadcasted in conjunction with the farmer's need.

Regarding the information presented research paper organized as follows, Section I contain the introduction portion, Section II briefly explains the methodology applied to the data collection and analysis. Section III describes results obtained from analyzing data and discussion and finally, Section IV concludes the major findings of the study.

II. METHODOLOGY

60 respondent farmers were selected using the Random sampling method of Golanjor, Fikkal, and Tinpatan Rural Municipality (20 respondents form each municipality) of Sindhuli District of Bagmati Province Nepal. The primary data were collected using a pre-structured and pre-tested questionnaire while the secondary data were collected by reviewing various published and unpublished documents related to the topic of the study. Focal Group Discussion, Key Informants Interview was performed with the Participants as well as the Local level stakeholders. Data thus collected were arranged coded and then analyzed using SPSS and Microsoft Excel.

III. RESULTS AND DISCUSSION

3.1. Demographic:

It was observed that the average age of respondents was 28.3 years with minimum of 21 years and maximum of 62 years. The majority (58.33%) of the respondents were from the 25-49 age group followed by <25 years (21.67%) and >50 years (20%). 63.33% of the respondents were male and 36.67% were female. Regarding the education level of respondents, 45% have attended the Intermediate level of Education while 40% have completed Secondary. 6.67% of the respondents have attended informal education and 8.33% have attended the University level of Education. 56% of the respondent have farming experience of 5-10 years while 30% have less <5 Years of experience and 13.33% have more than 10 Years of experience. (Table-1)

Table 1: Demographic Measures of Respondents.

Variables		Fikkal	Kamalamai	Tinpatan	Total	Percentage
Age of Respondents	<25	4	5	4	13	21.67%
	25-49	11	11	13	35	58.33%
	>50	5	4	3	12	20.00%
Sex of Respondents	Male	14	12	12	38	63.33%
	Female	6	8	8	22	36.67%
Education of Respondents	Informal	3	0	1	4	6.67%
	Secondary	7	7	10	24	40.00%
	Intermediate	7	11	9	27	45.00%
	University	3	2	0	5	8.33%
Farming Experience of Respondents	<5 Years	8	4	6	18	30.00%
	5-10 Years	10	13	11	34	56.67%
	>10 Years	2	3	3	8	13.33%

It was observed that the average family size of respondents was 4.35 with a minimum of 2 members and a maximum of 7 members. Similarly, the average landholding of respondents was 3.54 ropani (1 ropani-500 square meters) with a minimum of 0.8 ropani and a maximum of 7 ropani.

3.2. Accessibility and Frequency:

It was observed that 100% of the respondents have access to the radio. The common means for listening to the radio was a mobile phone (89%) with radio feature and 11% have radio sets on their house. Regarding the frequency of listening agriculture programs, 41.67% of respondents listen every day. 26.67% of the respondents listen to the agriculture program twice a week followed by 16.67% listen once a week. 6.67% of the respondents reported listening once a month. (Table-2)

Table 2: Frequency of Listening Agriculture Program by Respondents.

Frequency of listening agriculture Program					
	Everyday	Once on week	Twice on week	Once on Month	Rarely
Fikkal	8	4	5	2	1

Kalamalai	10	3	4	0	3
Tinpatan	7	3	7	2	1
Total	25	10	16	4	5
Percentage	41.67%	16.67%	26.67%	6.67%	8.33%

3.3. Preference of Nature of program:

It was revealed that most (28.33%) of the respondent's Drama Nature of program. 18.33% of the respondents preferred Agriculture News followed by technology information (16.67%), discussion nature 6.67% of respondents. 15% of the respondents preferred Interview with Experts and 15% loved to hear success stores (Table 3)

Table 3: Nature of Agriculture Program preferred by Respondents.

Nature of Program Preferred						
	Drama	Agriculture News	Interview	Success Story	Discussion	Technology Information
Fikkal	4	3	3	3	1	6
Kalamalai	5	5	4	3	2	1
Tinpatan	8	3	2	3	1	3
Total	17	11	9	9	4	10
Percentage	28.33%	18.33%	15.00%	15.00%	6.67%	16.67%

3.4. Preference of Subject Broadcasted:

Regarding the subject broadcasted, topics related to the Disease and pest management were preferred by 38.33% the farmers followed by the topic of varieties and seed (25%), Sales and Marketing (18.33%). It was observed that the daily market price of the vegetables broadcasted helped farmers to access market information. 15% of the farmers like to listen to the post-harvest technologies and value addition of the products. Only 3.33% of the farmers like topics regarding the Policies and subsidies (Table 4)

Table 4: Preference of Subject broadcasted by Respondents.

Preference of Subject Broadcasted					
	Varieties and Seed	Disease and Pest	Post-Harvest	Sales and Marketing	Policies and Subsidy
Fikkal	6	6	5	3	0
Kalamalai	4	6	2	6	2
Tinpatan	5	11	2	2	0
Total	15	23	9	11	2
Percentage	25.00%	38.33%	15.00%	18.33%	3.33%

3.5. Relevancy and problem-solving:

6.67% of the respondents reported that the information broadcasted is highly relevant to their existing problems and towards problem-solving while 46.67% of the respondents find it moderately relevant and 36.67% of respondents reported as somewhat relevant. 10% of the respondents suggested the revision of the contents is necessary as per the changing technology, local context, and recently growing problems.

Table 5: Relevancy towards problem solving of Agriculture program Broadcasted.

Relevancy and Problem-Solving				
	Highly Relevant	Moderately Relevant	Somewhat Relevant	Needs to Revise
Fikkal	1	9	8	2

Kamalamai	1	9	8	2
Tinpatan	2	10	6	2
Total	4	28	22	6
Percentage	6.67%	46.67%	36.67%	10.00%

3.6. Satisfaction with content Broadcasted:

48.33% of the respondents were found to be satisfied with the content broadcasted while 33.33% of the respondents reported being moderately satisfied with the content. 13.33% of the respondents were not satisfied with the content broadcasted. Only 5% of the respondents reported as highly satisfied with the content broadcasted.

Table 6: Satisfaction of the respondents towards content Broadcasted.

Satisfaction of the Content				
	Not Satisfied	Satisfactory	Moderately Satisfied	Highly Satisfied
Fikkal	3	7	8	2
Kamalamai	1	10	8	1
Tinpatan	4	12	4	0
Total	8	29	20	3
Percentage	13.33%	48.33%	33.33%	5.00%

3.7. Time of Broadcast:

100% of the respondents preferred Evening 5:00 PM to 7:00 PM as a suitable time for broadcasting the agriculture program. During the study, it was revealed farmers return from daily work and can hear with family from 5 to 7 PM.

3.8. Problems:

25% of the respondents reported poor signal is the major problem to access the information through the radio. It was observed that there was a problem with the signal due to the hilly area and scattered settlement. 16.67% of the respondents reported a language barrier, 13.33% reported cost and maintenance while 11.67% reported irregular power supply for accessing the information. 33.33% of the respondents said there was not any problem to access the information broadcasted.

Table 7: Problems faced by respondents to access the agriculture related information from Radio.

Problem					
	Language Barrier	Power Supply	Cost and Maintenance	Poor Signal	None
Fikkal	4	3	3	4	6
Kamalamai	3	3	2	3	9
Tinpatan	3	1	3	8	5
Total	10	7	8	15	20
Percentage	16.67%	11.67%	13.33%	25.00%	33.33%

IV. CONCLUSION

From the study, we can conclude that Radio was one of the major sources of disseminating agriculture information on Sindhuli Nepal. The dramatic nature of the program was preferred most (28.33%) by respondents and should be promoting to enhance the interest toward the content broadcasted. The information broadcasting recently should be more focused on the local context, and problem-solving nature to enhance the satisfaction level of the respondents. The selection of time of broadcasting was friendly to farmers. Major problems were poor signal (25%), followed by language barrier (16.67%) which can be reduced by adopting local language on content creation and broadcast.

REFERENCES

- [1] Agriculture Information and Communication Centre (AICC) "Krishi Diary", Department of Agriculture, Lalitpur, Nepal. 2018.
- [2] Central Bureau of Statistics. "Statistical year book of Nepal". National Planning Commission Secretariat, Government of Nepal. 2011.
- [3] Ani, A. O., U.C. Undiandeye and D.A. Anogie. "The role of mass media in agricultural information in Nigeria", Educational forum, volume 3, No.1, pp. 80 - 85. 1997
- [4] Sharma. N.K. Impact Study of Farm Radio Program produced by Agriculture information and Communication Centre: A case Study from the farmers of Phalebas Kannigian V.D.C. of Parvat District, Unpublished Master's Thesis, Tribhuwan University. 2008.
- [5] Piya, C.K. Investigation and analysis of present situation and future prospect of information and communication technology to develop the agriculture in Nepal. Department of information Technology. Turku University of applied sciences. 2012.