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Media Exposure of Apple Growers about Recommended Apple Production Technology

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ABSTRACT

Kashmir apple has lived up to its reputation for being one of the choicest fruits, and Kashmir has for long been considered as the home of apples. Kashmir valley is endowed with congenial agro-climatic conditions for a wide range of horticultural crops. The area and production has increased, but the productivity of apple fruit is not up to the mark despite of the fact that the climate in the region is conducive for apple cultivation. There could be various reasons for the low productivity of apple fruit and one of them is low level of media exposure of apple growers. The present study was conducted to study different aspects of media exposure of apple growers about recommended technologies of apple production. The study was conducted in three districts of Kashmir division selected purposively, having maximum area under apple cultivation. A multistage sampling procedure was adopted for the study. The data was collected during 2019. It was observed that majority of the apple growers in Shopian (54.46 %) and Baramula(53 %) were having medium level of media exposure and low level of media exposure was found in district Budgam (50 %).

Keywords: Apple, Exposure, Growers, Media, Technology

INTRODUCTION

Apple is commercially the most important temperate fruit and occupies the fourth (4th) position in the world in terms of production (2.87 million tons) after banana, orange and grapes. China, USA and Poland are the top three countries in the world as far as apple production is concerned, followed by Turkey, India and Iran. According to USDA, China is the top-most producer of apple, producing 44 million tonnes annually, followed by United States (4.6 million tons), Poland, (3.6 million tonnes) in the year 2016-17. Turkey produces one of the finest apples in the world and it produced 2.92 million tonnes of apples, which are being exported throughout the world (Sheth, 2018).

India has emerged as one of the major producer of horticultural crops in the world. The area and production of horticultural crops has been estimated to be 24925,000 hectares and 295164,000 MT respectively with productivity of 11.84 MT/ha during the year 2016-17, while as the area and production of fruit crops has been estimated to be 6480,000 hectares and 92846,000 MT respectively with productivity of 14.33 MT/ha. Among the fruit crops, apple is considered as one of the most important horticultural produce and is renowned worldwide for its taste and health benefits. The area and production of apple in India was 277300 hectares and 2241700 MT respectively with productivity of 08.10 MT/ha during 2016-17, (Anonymous, 2017). India annually exports apple worth of Rs 400 million (Nearly US $ 10

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million), out of which Rs 200 million comes from the apples of Jammu and Kashmir state which provides job opportunity to 1.2 million people directly or indirectly. The area under apple cultivation in Jammu and Kashmir is estimated to be the second largest in the world and second largest producer in Asia, thereby making it the largest contributor to the state GDP. J&K has the highest average yield and accounts 67 per cent of total apple production and 50 percent of its export in the country, hence a substantial foreign exchange earner and important for economic growth (Parrey and Hakeem, 2015). Almost 89 per cent of the horticulture land in Kashmir is under apple cultivation. With more than Rs. 9000 crore turnover, the apple cart is the main mover and shaker of Kashmir's economy (Ashraf, 2018). There is considerable increase in the area of apple cultivation in the state but the productivity is not up to mark. This low productivity of apple is probably due to lack of information about different aspects of apple cultivation. As innovative techniques and technologies which can boost the apple productivity in the state are being developed at different research stations, however the innovative technology is not being disseminated properly and apple growers do not utilize it judiciously. Media exposure have the capacity to enhance the adoption of innovative techniques but the apple growers mostly do not have much exposure to different mass media channels such as Newspaper, Extension Pamphlets, Radio, Television and its degree of utilization is very low. Since scanty studies have been undertaken so far, related to the media exposure of apple growers, the importance and need to examine the media exposure of apple growers clamoured to take up the issue.

METHODOLOGY

The present study was conducted in the state of Jammu and Kashmir-the northern most state of India. It extends from 32°-17' to 37°-05' N latitude and 72°-20' to 80°-30' E longitude. The altitude ranges from 215-7012 meters above mean sea level.

Three districts from Kashmir valley namely district Shopian from Southern region, district Budgam from Central region, and district Baramulla from Northern region were selected purposively for the study. A multistage sampling procedure was adopted for the selection of districts, horticultural zones, villages and sample apple growers. From the selected districts, three horticultural zones from each district having maximum area under apple cultivation were selected purposively. From each horticultural zone, one village was selected having maximum area under apple cultivation. A list of apple growers (orchardists) of selected villages was obtained from concerned Horticultural Development Offices and a sample of different apple growers (orchardists) having marginal, small, medium and large land holdings, were selected proportionately from selected villages. Thus, a total of 300 apple growers (orchardists) were selected purposively from nine (9) selected villages as shown in Table 1.

The structured interview schedule was prepared which include relevant questions for seeking information about different aspects of media exposure of apple growers. The interview schedule was pretested prior to its finalization by the researcher in the non-sampled area for its practicability and relevancy. It was pretested by interviewing fifteen (15) apple growers from different areas which were not included in the sampling unit in order to know whether the apple growers furnish the required information. The data was collected by administering the pretested interview schedule to the apple growers. The apple growers were personally interviewed by the investigator which enabled him to get first-hand information and an opportunity to observe the apple growers response. It was made sure that the questions which were not correctly understood to the apple growers were repeated whenever necessary. The researcher attempted to contact the apple growers at home as well as at their farms (apple orchards) during their convenient time in order to get the information. The qualitative data was converted into quantitative data by giving scores. The scores obtained by each apple grower in respect of a particular characteristic under the study was worked out. The apple growers were thus, classified logically into different categories on the basis of scores obtained by them.

RESULTS AND DISCUSSION

The data presented in the Table 2 revealed that in district Shopian, a majority (54.46%) of the apple growers

Table 1: Sampling Plan

Region	District	HorticulturalZone	Village	Number of orchardists	Orchardists to be studied
South	Shopian	Shopian	Wathoo	234	21
		Imam Sahab	D K Pora	412	37
		Zaina pora	Chitragam	488	43
Total (A)				**1134**	**101**
Central	Budgam	Khag	Ichahama	162	14
		Kanir	Sursyar	541	48
		Beerwah	Lalpora	269	24
Total (B)				**972**	**86**
North	Baramulla	Wagoora	Nowpora Jagir	639	57
		Baramulla	Singpora	73	06
		Sopore	Nowpora	562	50
Total (C)				**1274**	**113**
Grand Total (A+B+C)				**3380**	**300**

were having medium level of media exposure, followed by 35.64 percent of the apple growers having high level of media exposure and 09.90 per cent of the apple growers had low level of media exposure. In district Budgam, 50 per cent of the apple growers were having low level of media exposure, followed by 43.02 per cent of the apple growers having medium level of media exposure and only 08.14 per cent of the apple growers had high level of media exposure. While, in case of district Baramulla, 59.29 per cent of the apple growers were having medium level of media exposure, followed by 24.78 percent of the apple growers having high level of media exposure and only 15.93 per cent of the apple growers had low level of media exposure. As such most of the apple growers were having medium level of media exposure in district Shopian and district Baramulla, while majority of the apple growers had low level of media exposure in district Budgam. However, in case of overall media exposure of apple growers from all the three districts, it was observed, that more than 50 per cent of the apple growers had medium level of media exposure, followed by 23.66 per cent of the apple growers having high level of media exposure and only 23.64 per cent of the apple growers had low level of media exposure. The results indicate that in district Baramulla and district Shopian, electronic media like television, radio and print media such as newspaper and extension pamphlets were frequently utilized by a majority of the apple growers. It might be due to more educational level, economic status and standard of living of apple growers in these areas. Low level of media exposure of majority of the apple growers in district Budgam might be due to the fact of low economic status, lower educational level and lack of interest in reading newspaper and extension pamphlets.

Further perusal of data from the Table 3 reveals that in case of district Shopian, more than fifty percent (56.43%) of apple growers read horticultural news and other information on apple cultivation through newspapers, which reflects the growers had medium level of exposure about newspapers, followed by 30.69 per cent of apple growers having high level of exposure regarding newspaper and only 12.87 per cent of apple growers had low level of exposure regarding newspapers. In case of district Budgam, fifty percent (50.00%) of apple growers had low level of exposure about newspapers, followed by 44.19 per cent of apple growers having medium level of exposure about newspaper and only 05.81 per cent of apple growers were having high level of newspaper exposure. While as, in case of district Baramulla, 56.64 per cent of apple growers had medium level of exposure regarding newspapers containing information about apple cultivation, followed by 23.01 per cent of apple growers having high level of newspaper exposure and 20.35 per

Table 2: Distribution of apple growers according to the media exposure

Media Exposure	District			Overall
	Shopian (n_1=101)	Budgam (n_2=86)	Baramulla (n_3=113)	(N=300)
Low	10(09.90)	43(50.00)	18(15.93)	71 (23.64)
Medium	55(54.46)	37(43.02)	67(59.29)	159(53.00)
High	36(35.64)	07(08.14)	28(24.78)	71 (23.66)
Mean ± S.D	14.05 ± 8.71	8.01±6.58	12.49±6.66	11.51±7.31
Observed range	0-32	0-32	0-32	0-32

Figures within parenthesis indicate respective percentage.

Table 3: Distribution of apple growers according to their exposure to various media

Media Exposure		District			Overall
		Shopia (n_1=101)	Budgam (n_2=86)	Baramulla (n_3=113)	(N=300)
News Paper	Low	13(12.87)	43(50.00)	23(20.35)	79(26.33)
	Medium	57(56.43)	38(44.19)	64(56.64)	159(53.00)
	High	31(30.69)	05(05.81)	26(23.01)	62(20.67)
	Mean ± S.D	3.30 ± 2.56	2.87±2.03	2.82±2.22	2.99±2.27
	Observed range	0-9	0-9	0-9	0-9
Extension Pamphlet	Low	18(17.82)	48(55.81)	30(26.55)	96(32.00)
	Medium	61(60.40)	32(37.21)	71(62.83)	164(54.67)
	High	22(21.78)	06(06.98)	12(10.62)	40(13.33)
	Mean ± S.D	3.29 ± 2.30	2.72±2.19	3.12±2.24	2.89±2.24
	Observed range	0-8	0-7	0-9	0-9
T.V	Low	23(22.77)	31(36.04)	27(23.89)	81(27.00)
	Medium	49(48.52)	41(47.67)	61(53.98)	151(50.34)
	High	29(28.71)	14(16.28)	25(22.12)	68(22.67)
	Mean ± S.D	4.24 ± 2.88	3.41±2.37	4.60±2.53	4.08±2.59
	Observed range	0-9	0-9	0-9	0-9
Radio	Low	15(14.85)	25(29.07)	11(09.73)	51(17.00)
	Medium	55(54.46)	43(50.00)	72(63.72)	170(56.67)
	High	31(30.69)	18(20.93)	30(26.55)	79(26.33)
	Mean ± S.D	5.23 ± 2.91	3.52±2.79	4.37±2.33	4.37±2.68
	Observed range	0-9	0-9	0-9	0-9

Figures within parenthesis indicate respective percentage.

cent of apple growers had low level of exposure regarding newspapers. The possible reason for medium level of newspaper exposure in district Shopian and district Baramulla was due to medium level of educational status, lack of interest in reading newspapers and non-availability of newspapers in rural areas. As for as district Budgam is concerned, large percentage of apple growers did not read newspapers, because majority of them were illiterate, having low economic status and lack of information about media exposure.

The data from the table also revealed, the access of the growers to different extension pamphlets (Spray Schedule, Apple Scab, and Advisory for Orchardists booklet), it was observed from the data, that in case of district Shopian, a majority (60.40%) of apple growers were having access to Extension Pamphlets containing horticultural (apple) cultivation/production related information. In case of district Budgam, a majority (55.81%) of the apple growers had low level of exposure about extension pamphlets. While as, in case of district Baramulla, a majority (62.83%) of apple growers had medium level of exposure regarding extension pamphlets. However, in case of overall exposure of apple growers from all the three districts about extension pamphlets, it was found, that more than fifty percent (54.67%) of the apple growers had medium level of exposure about extension pamphlets, followed by 32.00 per cent of the apple growers having low level of exposure and only 13.33 per cent of the apple growers had high level of exposure about extension pamphlets. These findings were due to the fact, that majority of the apple growers having medium level of educational status, were more innovative, and have good economic status. In district Budgam, majority (55.81 %) of apple growers were having low level of exposure of extension pamphlets which may be due to the fact, that majority of the apple growers having low level of educational status, were less innovative, and have low level of economic status.

In case of horticulture related information/ programmes telecasted through television (*Krishi Darshan, Butraat, Zarayi Khabarnama*), it was revealed, that in district Shopian, near about fifty percent (48.52%) of apple growers had medium level of exposure about these programmes being telecasted on television. In case of district Budgam, a majority (47.67%) of apple growers had medium level of exposure regarding these television programmes, whereas, in case of district Baramulla, a majority (53.98%) of apple growers had medium level of exposure regarding different programmes of apple cultivation telecasted through television. It is evident from the data, that majority of the apple growers from all the three districts had medium level of exposure regarding different information of apple cultivation telecasted through television. However, in case of overall exposure of apple growers from all the three districts about horticulture related information/ programmes telecasted through television, it was found that 50.34 per cent of the apple growers had medium level of exposure about television programmes.These results were because of the fact that television has become more popular for the programmes being telecasted through it. Further, in district Shopian, a majority (54.46%) of apple growers were listening different horticultural related programmes (*Kisan Vani, Kashkaran Khatre* programme and *Gami Bhayun Hindi Khatre* programme) being broadcasted through radio, had medium level of exposure regarding these programmes. In case of district Budgam, fifty percent of apple growers listening different horticultural programmes through radio were having medium level of exposure regarding these radio programmes, whereas, in case of district Baramulla, a majority (63.72%) of apple growers had medium level of exposure regarding these programmes. As such majority of the apple growers from all the three districts had medium level of exposure regarding horticulture related programmes being aired through radio. However, in case of overall exposure of apple growers from all the three districts about horticulture related information/ programmes aired through radio, it was found, that 56.67% of the apple growers had medium level of exposure about these programmes.

CONCLUSION

Majority of the apple growers from district Shopian and district Baramulla were having medium level of media exposure of apple growers in district Baramulla, followed by in district Shopian. In district Budgam, 50 per cent of the apple growers were having low level of media exposure. Further, it was also observed, that a majority of the apple growers from all the three districts were having medium level of media exposure. It could be concluded that need of the hour is that both print and electronic media should be made easily available to the apple growers at local level. More efforts are required by the extension agencies to increase as well as update the knowledge of apple growers about recommended cultivation practices of apple production and to motivate them for their proper use to obtain higher yields.

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