



## Credibility of Information Sources and Channels as Perceived by Paddy Farmers in Telangana State

Ramu Yalakonda<sup>1</sup> and Karthikeyan Chandrasekaran<sup>2\*</sup>

<sup>1</sup>PG Scholar, <sup>2</sup>Professor & Head, Department of Agricultural Extension and Rural Sociology, Tamil Nadu Agricultural University, Coimbatore, Tamil Nadu, India

\*Corresponding author email id: karthikeyanextn@yahoo.com

### ARTICLE INFO

**Keywords:** Paddy, Farmers, Sources, Channels, Localite, Cosmopolite, Information, Credibility and Perception

<http://doi.org/10.48165/IJEE.2023.59137>

**Conflict of Interest:** None

### ABSTRACT

This paper investigates perceived credibility of paddy farmers' information sources and channels. The dissemination of agricultural information to farmers has been one of the crucial factors for the transmission of newer and relevant technologies. Farmers' information needs are transforming to more need-based than demand-driven. A sum of 120 respondents was selected based on proportionate random sampling from two villages selected from each of the two blocks of Khammam district. Mean per cent score was used for obtaining the degree of credibility of sources and channels. Opinion leaders in personal localite sources, agricultural scientists in personal cosmopolite sources, result demonstration in personal cosmopolite channels and television in impersonal cosmopolite channels were perceived as highly credible by paddy farmers. One-third of respondents had high level of overall credibility.

### INTRODUCTION

Paddy (*Oryza Sativa* L.) is one of the principle food crops of the residents of India. India is the second-largest country in the world with total cultivated area of 179.9 million hectares (Thangjam & Jha, 2019). In recent years, agriculture has transformed from basic subsistence farming to a remunerative sector. One of the biggest obstacles to the expansion of agriculture in developing countries like India is the ability of better agricultural technology to produce profitable output. Oladele (2011) noted that the development of agriculture in developing nations has been severely constrained by lack of agricultural information. Consequently, there are numerous ways in which agricultural information interacts and affects agricultural activity. As a result, the main objective of agricultural development in India has been to give farmers access to better farming methods for raising the output of their farms. Identifying the information needs of farmers leads to better designing strategies to transfer information to the farmers. Farmers' information requirements were shifting from being demand-driven to need-based. The development of agricultural products depends

on the generation and transmission of agricultural information (Sani et al., 2014). For farmers to remain informed about changes in their environment, it is critical to conduct regular research. Several agribusiness companies in India have begun to provide complete farm solutions to farming communities in the current decade (Sulaiman & Hall, 2004; Gollakota, 2008). A revolution in farming can be sparked by more quickly disseminating advanced farming technology (Meena, 2010). Making the proper judgments in the context of agricultural production is aided by farmers' timely and pertinent information (Acheampong et al., 2017 & Joshi, 2022). Singh et al., (2010) pointed out that to increase awareness levels of farmers and change in attitude can be bought up by through accessing of extension contact and mass media.

Credibility is defined as the trustworthiness and expertise of the sources and channels of paddy information as perceived by the paddy farmers. The extent to which, different improved agricultural methods are adopted by the farmers depends on the credibility of information sources and channels (Choudhary & Khan, 2017). Maintaining trust among the farming community requires induction

of professionally qualified personnel and their regular trainings (Slathia et al., 2012) There are many alternatives accessible for learning related to farming techniques, making it difficult to choose the most trustworthy, dependable and relevant source or channel. It is important to comprehend the choices and preferences of farmers regarding sources and platforms in their socio-economic setting (Khan et al., 2011). Considering, the facts and the need of identifying the perceived credibility of various paddy sources and channels, the present study entitled "Credibility of Information Sources and Channels as Perceived by Paddy Farmer in Telangana State", was conducted during "Yasangi season" (summer) of 2022. The objective of this study was to find the degree of credibility of information sources and channels of the paddy crop according to the farmer categories.

### METHODOLOGY

The study was conducted in the Khammam district of the Telangana state. Out of 46 blocks, two blocks namely Kusumanchi and Nelakondapally and in each block, two villages were selected considering the maximum number of paddy operational land holdings in the district. In the Kusumanchi block, Kusumanchi and Jujlraopeta villages and in the Nelakondapalli block, Nacheipalli and Cherumadaram villages were selected for the purpose of study. From each village, thirty respondents were selected using proportionate random sampling which comprised 120 respondents as the sample.

The degree of credibility perceived by the respondents was measured using four-point continuum scale *viz.*, high credibility (3), medium credibility (2), low credibility (1) and no credibility (0). The statistical tool used for finding the degree of credibility

was Mean per cent score (MPS). MPS was carried out by multiplying each respondent's score under each source or channel by hundred and divided it by the maximum score obtained under each category of credibility. There were two types of sources and two types of channels *viz.*, personal localite sources, personal cosmopolite sources, personal cosmopolite channels and impersonal cosmopolite channels. The data was collected through well-structured interview schedule.

### RESULTS AND DISCUSSION

#### Perceived credibility

The data furnished in Table 1 explains that opinion leaders (91.11), progressive farmers (88.61) and neighbours & fellow farmers (83.61) were perceived highly credible personal localite sources by paddy farmers. The individual opinion leadership technical competence, social accessibility and conformity to the system's norms earn and maintain opinion leadership. Progressive farmers who are labelled as self-help extension workers may take an active role in their community, have control over their own community, participate in society's welfare activities and be more involved in agricultural development and had high capacity for empowering fellow farmers (Haryanto et al., 2021). After, opinion leaders and progressive farmers, neighbours & fellow farmers were the major personal localite sources in terms of credibility. Verma et al., (2019) in his study of perceived credibility of rural women proven that friends were also one of the important credible sources of information. The least credible personal localite sources were panchayat members (48.89), followed by private money lenders (47.50) and religious heads (41.48) in that order. In personal

**Table 1.** Distribution of sources and channels according to the perceived credibility of paddy farmers

S.No.	Personal localite sources	Personal cosmopolite sources	Personal cosmopolite channels	Impersonal cosmopolite channels
1.	Opinion leaders (91.11)	Agricultural scientists (85.00)	Result demonstration (91.67)	Television (88.89)
2.	Progressive farmers (88.61)	Agricultural department (84.52)	Method demonstration (89.16)	YouTube (80.56)
3.	Neighbours & fellow farmers (83.61)	Co-operatives (80.56)	Training (82.00)	Film shows (78.89)
4.	Friends & relatives (82.77)	Kisan call centre (74.52)	Educational tour (78.33)	ICTs (78.05)
5.	Farmer clubs & associations (80.56)	Agricultural supervisors (75.00)	Farmers fair (Kisan mela) (71.94)	Newspaper/articles (75.83)
6.	Local agri graduates (70.00)	NGO officials (69.72)	Agricultural exhibition (71.94)	Farm journals/ magazines (74.72)
7.	Family members (69.72)	Salesmen & dealers (64.16)	Group meeting (68.89)	PJTSAU website (68.61)
8.	FPO/FPC members (69.16)	Plant clinic (63.05)	Field visit/field day (63.33)	Radio (67.50)
9.	Panchayat members (48.89)	Bank officials (62.77)	Workshop (62.22)	Posters/folders (66.94)
10.	Private money lenders (47.50)	Panchayat officers (52.22)	Agricultural campaign (54.16)	Traditional media (41.11)
11.	Religious heads (41.38)	Commission agents (46.67)	-	-
	Average MPS	70.33	68.96	73.36 72.11

localite sources, religious heads were the least credible sources. It could be due to the modernization and improvement in the technologies which provided updated information regularly and outdated information from religious heads may be perceived as low credible compared to other personal localite sources.

The data provided in Table 1 explains that major credible personal cosmopolite sources were agricultural scientists (85.00), agricultural department (84.52) and co-operatives (80.56). The major reason for agricultural scientists and agricultural departments as the highest credible personal cosmopolite sources was due to their sound knowledge in agriculture field. Despite having smaller audience, formal information sources have a nearly two-fold greater influence on net returns than informal sources, potentially because of qualitative variations in information and delivery methods (Rajan et al., 2015). The least perceived personal cosmopolite sources were bank officials (62.77), panchayat officers (52.22) and commission agents (46.67). It could be due to the reason that commission agents along with pesticide dealers promote the higher cost of fertilizers and pesticides in the research area. Bank officials and panchayat officers not involved directly in farming activities, respondents perceived that the information provided by them was less credible. These results were consistent with the reporting of Sharma et al., (2008); Kumar et al., (2018); Nain et al., (2015); Borah et al., (2019) & Panda et al., (2019).

The major credible personal cosmopolite channels were result demonstration (91.67), followed by method demonstration (89.16) and training (82.00). Under both types of demonstrations, respondents were able to observe the working process and techniques of using machines and being compared latest results with older technologies. In training, farmers were able to get hands on experience of the process and sometimes respondents can directly operate new machines as part of the learning process during the training sessions. The least perceived personal cosmopolite channels by the respondents were field visit/field day (63.33), workshop (62.22) and agricultural campaign (54.16). It could be due to most of the respondents were not aware of both these channels. Important credibility of impersonal cosmopolite channels were television (88.89), YouTube (80.56) and film shows (78.89). In YouTube and film shows, some additional content along with telecasted information on television was available to the farmers and more benefits compared to other sources and channels in terms of accessibility and affordability. The impersonal cosmopolite channels with the least credibility were radio (67.50), posters/folders (66.94) and traditional media (41.11). According to the respondents, there was no coverage of radio frequency up to their native places and farmlands. The content which was furnished in posters was only to bring awareness of programmes or new technologies in agricultural sector. Traditional media were perceived as low credible because most of the respondents were very familiar with newer forms of communication like ICTs and social media.

#### Overall degree of credibility of different sources and channels

According to Table 2, it is observed that more than two-fifth of the respondents perceived very low to low credibility levels. It could be due to some of respondents who had less literacy levels were not able to perceive most of the sources and channels

**Table 2.** Overall degree of credibility of different sources and channels

S.No.	Categories	Percentage
1.	Very low (44-81)	19.17
2.	Low (82-89)	23.33
3.	Medium (90-92)	15.83
4.	High (93-100)	32.50
5.	Very high (100-112)	9.17
	Total	100.00

which provide reliable information. Forty-one per cent of the respondents perceived high to very high credibility levels. The respondents with higher literacy levels, more social participation, more innovativeness and high extension agency contact were able to perceive sources and channels as high credible. It was due to the respondents with these characters were more likely to absorb the reliable information provided by various sources and channels.

#### CONCLUSION

Opinion leaders (personal localite source), agricultural scientists (personal cosmopolite source), result demonstration (personal cosmopolite channel) and television (impersonal cosmopolite channel) were perceived as highly credible by paddy farmers. So, extension agents and government officials should pay attention to respective sources and channels for effortless diffusion and adoption of technologies, which leads to increase in productivity and standard of living of the paddy farmers. Religious heads, commission agents, agricultural campaign and traditional media were the least perceived sources and channels by the paddy farmers. Extension officers must enhance the dissemination process through personal cosmopolite channels as they were more perceived as credible by paddy farmers than any other source/channels of information.

#### REFERENCES

- Acheampong, L.D., Nsiah Frimpong, B., Adu-Appiah, A., Owusu Asante, B., & Darko Asante, M. (2017). Assessing the information seeking behaviour and utilization of rice farmers in the Ejisu-Juaben municipality of Ashanti Region of Ghana. *Agriculture & Food Security*, 6(1), 1-9.
- Borah, K., Singh, Y., Sarkar, A., Upadhyay, A. D., Pal, P., & Patel, A. B. (2019). Preference and credibility of farm information sources by the fish farmers of West Tripura. *Indian Journal of Hill Farming*, 32(1), 16-21.
- Choudhary, S., & Khan, I. M. (2017). Credibility of different agriculture information sources and channels utilized by the anola growers. *International Journal of Current Microbiology and Applied Science*, 6(7), 2277-2288.
- Gollakota, K. (2008). ICT use by businesses in rural India: The case of EID Parry's Indiagriline. *International Journal of Information Management*, 28(4), 336-341.
- Haryanto, Y., Anwarudin, O., & Yuniarti, W. (2021). Progressive farmers as catalysts for regeneration in rural areas: Through farmer-to-farmer extension approach. *Plant Archives*, 21(1), 867-874.
- Joshi, K. (2022). Need based information media for farmers in hill regions of Uttarakhand: Implications for extension. *Indian Journal of Extension Education*, 58(1), 136-141.

- Khan, M., Singh, V., & Garhwal, S. (2011). Preferences of farmers to different sources and channels in Piprali Panchayat Samiti of district Sikar, Rajasthan. *Rajasthan Journal of Extension Education*, 19, 121-124.
- Kumar, R., Goyal, T. C., Punjabi, N., & Rajput, D. S. (2018). Information seeking behaviour of tribal livestock owners in Sirohi district of Rajasthan. *Indian Journal of Extension Education and Rural Development*, 26, 135-138.
- Meena, B. (2010). Communication sources credibility and utilization pattern among farmers. *Rajasthan Journal of Extension Education*, 46, 40-43.
- Nain, M. S., Singh, R., Mishra, J. R., & Sharma, J. P. (2015). Utilization and linkage with agricultural information sources: a study of Palwal district of Haryana state. *Journal of Community Mobilization and Sustainable Development*, 10(2), 152-156.
- Oladele, O. I. (2011). Effect of Information Communication Technology on agricultural information access among researchers, extension agents and farmers in South Western Nigeria. *Journal of Agriculture and Food Information*, 12(2), 167-176.
- Panda, S., Modak, S., Devi, Y. L., Das, L., Pal, P. K., & Nain, M. S. (2019). Access and usage of Information and Communication Technology (ICT) to accelerate farmers' income. *Journal of Community Mobilization and Sustainable Development*, 14(1), 200-205.
- Rajan, P., Khare, N., & Singh, S. R. K. (2015). Factors affecting the income generation of tribal farmers in Madhya Pradesh State of India. *Journal of Community Mobilization and Sustainable Development*, 10(2), 147-151.
- Sani, L., Boadi, B. Y., Oladokun, O., & Kalusopa, T. (2014). The generation and dissemination of agricultural information to farmers in Nigeria: A review. *Journal of Agriculture and Veterinary Science*, 7(2), 102-111.
- Sharma, A. K., Jha, S. K., Kumar, V., Sachan, R. C., & Kumar, A. (2008). Critical analysis of information sources and channels preferred by rapeseed-mustard farmers. *Indian Research Journal of Extension Education*, 8(3), 42-45.
- Slathia, P. S., Paul, N., Nain, M. S., Nanda, R., & Peshin, R. (2012). Credibility crisis among agriculture extension functionaries in Jammu & Kashmir. *Indian Journal of Extension Education*, 48(1&2), 68-73.
- Sulaiman, V. R., & Hall, A. (2002). Beyond technology dissemination: Reinventing agricultural extension. *Outlook on Agriculture*, 31(4), 225-233.
- Singh, D. K., Gautam, U. S., Singh, M., & Singh, R. P. (2010). Media exposure of the farmers in Sagar District of Madhya Pradesh. *Indian Journal of Extension Education*, 46(3&4), 26-30.
- Thangjam, B., & Jha, K. K. (2019). Socio-economic correlates and information sources utilization by paddy farmers in Bishnupur district, Manipur. *International Journal of Current Microbiology and Applied Sciences*, 8(10), 1652-1659.
- Verma, R. K., Wason, M., Singh, P., Sarkar, S., & Bhowmik, A. (2019). Information need, perceived credibility of information sources among rural women. *Indian Journal of Extension Education*, 55(2), 42-46.