Research Article

Indian Journal of Extension Education
Vol. 62, No. 4 (October–December), 2026, (97-102)

ISSN 0537-1996 (Print)
ISSN 2454-552X (Online)

Perception and Utilisation of *Rythu Seva Kendra* (RSK) Services among Tribal Farmers in North Coastal Andhra Pradesh

Vasanth Singisetti[1], Ashok Kumar[2]*, Peddi Naga Harsha Vardhan[3], Bikramjeet Ghose[4] and B. Pavan Kumar Naik[5]

[1]PG Scholar, [3]Assistant Professor, Department of Agricultural Extension Education, [4]Department of Agricultural Economics and Statistics, M.S. Swaminathan School of Agriculture, Centurion University of Technology and Management, Paralakhemundi-761211, Odisha, India
[2]Associate Professor, Agricultural Extension Education, SoA, SR University, Warangal-506371, Telangana, India,
[5]Assistant Professor, Department of Horticulture, Centurion School of Smart Agriculture, Centurion University of Technology and Management, Vizianagaram-535003, Andhra Pradesh, India
*Corresponding author email id: ashokakku2021@gmail.com

HIGHLIGHTS

- Canonical correlation analysis revealed a strong association between tribal farmers' characteristics and RSK perception and utilisation behaviour.
- Education, innovative proneness and extension contact were the strongest determinants of RSK service utilisation.
- The first canonical function explained 79.2% of the shared variance between farmer attributes and service behaviour.
- Improved extension communication and digital infrastructure can enhance inclusive tribal agricultural development.

ARTICLE INFO

Keywords: Canonical correlation analysis, Extension contact, Perception, Rythu Seva Kendras, Tribal farmers, Utilisation.

https://doi.org/10.48165/IJEE.2026.62413

Citation: Singisetti, V., Kumar, A., Vardhan, P. N. H., Ghose, B., & Naik, B. P. K. (2026). Perception and Utilisation of *Rythu Seva Kendra* (RSK) Services among Tribal Farmers in North Coastal Andhra Pradesh. *Indian Journal of Extension Education*, *62*(4), 97-102. https://doi.org/10.48165/IJEE.2026.62413

Reviewed by: Dr. Vinaya Kumar HM (vinayakumarhm@uahs.edu.in); Dr. Kaushal Jha (kkjhanurd@rediffmail.com); Dr. Saikat Maji (saikatm@bhu.ac.in)

ABSTRACT

The study aimed to examine the association between tribal farmers' profile characteristics and their perception and utilisation of *Rythu Seva Kendras* (a village-level agricultural service centres established by the Government of Andhra Pradesh to provide quality agricultural inputs and extension advisory services) in North Coastal Andhra Pradesh 2025–26 using Canonical Correlation Analysis for180 tribal respondents. The results of the 1st canonical function (U_1, V_1) revealed a very high canonical correlation of 0.890, square of correlation 0.792, eigenvalue 3.791, Wilks statistic 0.163 and significance 0.000*, indicating that nearly 79 per cent of the shared variance between farmers' profile characteristics and their perception -utilization behaviour was explained by the function, confirming a very strong and significant multivariate relationship. The second function (U_2, V_2) had a canonical correlation of 0.466, the squared canonical correlation of 0.217, the eigenvalue of 0.277 and Wilks' statistic of 0.783 ($p< 0.001$*), reflecting a comparatively weak and practically less meaningful relationship, given its low eigenvalue and high Wilks' lambda. The main elements affecting tribal farmers' perceptions of and use of RSK services were education, inventiveness, and extension interaction. Strengthening extension communication, digital infrastructure and digital literacy is advocated to improve the use of ICT-enabled services.

INTRODUCTION

Agriculture remains a major livelihood source in India, particularly in rural areas (Owolabi et al., 2026). A substantial proportion of farmers remain inadequately aware of technological advancement in agriculture (Sarnaik et al., 2020). Information dissemination facilitates agricultural development and technology adoption. In order to improve crop production, extension services must give farmers the necessary knowledge and assist them in optimising the use of limited resources (Jat et al., 2021). The global

Received 30-05-2026; Accepted 04-08-2026

agricultural industry has transformed over the last couple of decades and the extension mechanism must keep pace and provide the farmers with improved management and decision-making capabilities (Singh et al., 2020). Non-governmental organisations facilitate agricultural development (Padhy et al., 2026).

In October 2019, the Agri Mission meeting discussed and recommended the establishment of an Agri Input Shop and a Village Knowledge Centre at the village level near village Secretariats, in addition to offering various government services, training for farmers, and capacity building on modern agricultural technology. Only pre-tested quality inputs of seeds, fertilisers and fungicides with a quality seal from the government shall be supplied at village level (Reddy, 2020). Farmers' knowledge & skills are derived from training, extension services and the use of technologies (Jaiswal et al., 2021). The Andhra Pradesh state has started facilitation centres (Rythu Seva Kendras, formally Rythu Bharosa Kendralu) within each village secretariat to supply the latest production technologies and quality inputs directly to farmers in their village. This provides easy and timely access to agro-inputs and farmer services for farmers through the Rythu Seva Kendras (RSKs)-kiosk and mobile application (Haritha et al., 2023). Rythu Seva Kendras (RSKs) have operated across Andhra Pradesh since kharif 2020 to improve agricultural services delivery (Saifuddin et al., 2023). To improve community and convergence, Agri Input Shop and Knowledge Centre were merged and renamed Dr YSR Rythu Bharosa Kendram now Rythu Seva Kendras (RSKs). With significant management and concerted efforts, 10,641 RSK (RBKs) were established by the government. As a one-stop shop for tested, high- quality agricultural inputs (such as seeds, pesticides and fungicides) and inputs for the confederated sector similar to feed and fodder, these centres facilitate dissemination of agricultural technologies among farming communities (Chowdary et al., 2022). RSKs would help the farmers at every stage, from purchasing seed to selling their crops (Babu et al., 2023; Anuhya et al., 2022). The Agriculture Department has employed 6758 villagers in accordance with this. They were put in RSKs and farmed by Agriculture Assistants (Babu et al., 2021).

Tribal farmers in North Coastal Andhra Pradesh are characterized by geographical remoteness, lower educational attainment, poor digital connectivity and limited access to institutional extension services. These constraints may influence their awareness, perception and utilisation of RSK services differently from the general farming population. Despite being an important target group for agricultural development programmes, empirical evidence on RSK service utilisation among tribal farmers remains limited. Therefore, understanding the factors associated with perception and utilisation of RSK services in tribal communities is essential for designing more inclusive and effective extension strategies. The majority of RBK/RSK studies (Chowdary et al., 2022; Haritha et al., 2023; Babu et al., 2023) have employed descriptive or bivariate analysis in the general farming population. Very few studies have been conducted on tribal farmers and no study has attempted to analyse the relationship between the profile characteristics of the tribal farmers and perception and utilization of RSK services using Canonical Correlation Analysis technique. This research gap in North Coastal region of Andhra Pradesh is filled up by this study.

METHODOLOGY

The present study was conducted in the tribal-dominant districts of North Coastal Andhra Pradesh viz. Parvathipuram Manyam, Srikakulam and Alluri Sitarama Raju in 2025-26 to gain insight into tribal farmers' perceptions and utilization of the services of Rythu Seva Kendras (RSKs). Two mandals were randomly selected from each district, for a total of six. Three RSKs and three tribal dominated villages under each RSK were identified from each selected mandal and ten tribal farmers were randomly selected from each of the villages. This resulted in a final sample of 180 tribal farmers studied under an ex-post facto research design. The study was confined to tribal farmers because they constitute a priority beneficiary group with unique socio-economic and geographical characteristics that may influence their perception and utilisation of RSK services differently from the general farming population. Primary data were collected from the respondents using a structured interview schedule. Canonical Correlation Analysis (CCA) was employed to analyse relationships between predictor and criterion variable sets using the collected data with IBM SPSS Statistics. Canonical correlation analysis is a multivariate statistical tool to analyse the relationship between two groups of variables simultaneously using a set of linear combinations called canonical variates (Keskin & Yasar, 2007; Pujitha et al., 2024). CCA was employed instead of simple correlation because it simultaneously analyses the relationship between multiple independent and multiple dependent variables, whereas simple correlation assesses only pairwise relationships. This approach enabled identification of the key profile characteristics jointly influencing tribal farmers' perception and utilisation of RSK services. This technique assists in the identification of socio-economic, communication and psychological factors affecting the effectiveness of RSK services for tribal farmers. The study included two sets of variables: 13 Independent variables (X) and 2 Dependent variables (Y). Where, x_1= Age, x_2= Education, x_3= Landholding, x_4= Annual income, x_5= Farming experience, x_6= Frequency of visit to RSK, x_7= Mass media exposure, x_8= Social participation, x_9= Achievement motivation, x_{10}= Innovative proneness, x_{11}= Scientific orientation, x_{12}= Risk orientation, x_{13}= Extension contact. Dependent variables y_1= Perception towards RSK services, y_2= Utilisation of RSK services. In the second set of analysis, we used 2 dependent variables and obtained 2 canonical correlations. (U_1, V_1) and (U_2, V_2). Before performing Canonical Correlation Analysis, the underlying assumptions were examined. Multicollinearity among the independent variables was assessed using Variance Inflation Factor (VIF) and tolerance values, and no evidence of serious multicollinearity was observed (VIF < 5; tolerance > 0.20). Canonical variates are linear combinations of the independent and dependent variables.

$$U_1=a_{1l}x_1+a_{12}x_2+\ldots+a_{1i}x_i$$
$$U_2=a_{21}x_1+a_{22}x_2+\ldots+a_{2i}x_i$$
$$U_{P=ai1.}X_1+\ldots\ldots\ldots\ldots+a_{2i}X_i$$
$$V_1=b_{11}y_1+b_{12}y_2$$
$$V_2=b_{21}y_1+b_{22}y_2$$

i refers to 13 independent variables; standardised canonical coefficients for x and y are denoted as $a_{1i,}b_{11,}b_{12\ldots}a_{2i}$ and $b_{21},b_{22.}$

Canonical correlation between (U_i, V_i) was estimated as :

The canonical correlation coefficient was estimated as:

$$r = \frac{Cov(U_i, V_i)}{\sqrt{Var(U_i)Var(V_i)}}$$

Wilks' Lambda statistics, eigenvalues, standardised canonical coefficients, canonical loadings, cross-loadings and redundancy indices were computed to assess the significance and intensity of the relationship between the two sets of variables. The variables with significant canonical loadings and cross-loadings were assumed to be the key contributors to the perception and utilisation of RSK services by the tribal farmers.

RESULTS

The canonical correlation analysis revealed (Table 1) two canonical functions between the independent variables and the perception and utilisation behaviour of tribal farmers towards RSK services. The first pair of canonical variables (U_1, V_1) had an extremely high canonical correlation ($\rho = 0.890$), demonstrating a high correlation between the two sets of variables. Squared canonical correlation (0.792) showed that 79.20 per cent of the variance was common between the independent and dependent variables. The high eigenvalue (3.791) and low Wilks' Lambda value (0.163) also indicated the high strength and significance of the first canonical function ($p < 0.001$).

The second pair of canonical variables (U_2, V_2) had a moderate correlation of 0.466 and 21.7 per cent of the variance. Although statistically significant ($p < 0.001$), the second function exhibited a low eigenvalue (0.277), indicating limited practical contribution and a high Wilks' Lambda value (0.783), which suggested less practical significance. The first canonical function accounted for the most important association between the two sets of variables overall.

The finding from Table 2, shows education and innovativeness exhibited stronger contributions to the first canonical variate based on coefficient magnitude. Among the dependent variables, perception demonstrated relatively stronger loading magnitude than utilisation, indicating greater association with the first canonical function. This indicates that education and innovative proneness were the key factors associated with perception and utilisation.

Achievement motivation exhibited the largest contribution (0.630) to the second canonical function, followed by farming experience (–0.491), social participation (–0.480), annual income (–0.363), and frequency of visits to RSK (–0.329). The signs of the standardized canonical coefficients should not be interpreted as indicating positive or inverse relationships because the orientation of canonical variates is arbitrary in Canonical Correlation Analysis. Instead, the magnitude of the coefficients reflects the relative contribution of variables to the canonical function. The canonical loadings and cross-loadings (Table 3) provide the appropriate basis for interpreting the direction and strength of the relationships. Among the dependent variables, perception showed a relatively stronger contribution than utilisation in the second canonical function.

Table 2. Standardised and unstandardized canonical coefficients of independent and dependent variables

Independent variable	Standardised Canonical Coefficient		Unstandardized Canonical Coefficient	
	U1	U2	V1	V2
Age	0.020	0.201	0.035	0.353
Education	-0.621	-0.126	-0.477	-0.097
Landholding	0.081	-0.030	0.134	-0.049
Annual Income	-0.038	-0.363	-0.058	-0.560
Farming experience	-0.111	-0.491	-0.206	-0.908
Frequency visit of RSK	-0.064	-0.329	-0.087	-0.448
Mass Media	-0.087	0.141	-0.063	0.102
Social Participation	-0.037	-0.480	-0.035	-0.454
Achievement Motivation	0.051	0.630	0.035	0.430
Innovative proneness	-0.277	0.289	-0.292	0.306
Scientific Orientation	-0.042	0.041	-0.039	0.038
Risk Orientation	-0.139	-0.255	-0.090	-0.165
Extension contacts	-0.131	-0.192	-0.074	-0.108
Dependent variable	U1	U2	V1	V2
Perception	-0.217	-0.469	-0.541	-1.167
Utilization	-0.117	0.238	-0.567	1.154

Table 3. Correlation between original variables and canonical variables

Independent variable	Set 1 canonical Loading		Set 2 Canonical cross Loadings	
	U1	U2	V1	V2
Age	0.294	-0.179	0.261	-0.083
Education	-0.948	0.106	-0.844	0.049
Landholding	-0.027	-0.058	-0.024	-0.027
Annual Income	-0.076	-0.288	-0.067	-0.134
Farming experience	-0.325	-0.425	-0.290	-0.198
Frequency visit of RSK	-0.105	-0.382	-0.093	-0.178
Mass Media	-0.098	0.100	-0.087	0.047
Social Participation	-0.127	-0.507	-0.113	-0.236
Achievement Motivation	-0.523	0.440	-0.465	0.205
Innovative proneness	-0.896	0.169	-0.797	0.079
Scientific Orientation	-0.445	0.093	-0.396	0.043
Risk	0.009	-0.143	0.008	-0.067
Extension contact	-0.838	0.078	-0.746	0.036
Dependent variable	U1	U2	V1	V2
Perception	-0.897	-0.441	-0.798	-0.206
Utilization	-0.907	0.420	-0.807	0.196

Table 1. Canonical correlation analysis of the profile characteristics and perception- utilisation behaviour towards RSK services.

Pair of canonical variates	Canonical correlation (ρ_i)	Square of correlation	Eigenvalue	Wilks statistics	Significance
U_1, V_1	0.890	0.792	3.791	0.163	0.000**
U_2, V_2	0.466	0.217	0.277	0.783	< 0.001**

The unstandardized coefficients also indicated perception, along with utilisation, to be the primary dependent variables for both canonical functions. Education and innovative proneness were the strongest contributors to the first canonical relationship, whereas achievement motivation, farming experience, social participation and annual income were the most important contributors to the second canonical relationship.

The correlation Table 3 expressed the variables with the highest correlation with the independent CV (U_1) were education (–0.948), innovative proneness (–0.896) and extension contact (–0.838) and were the three most important factors for the first CV function. The two variables with the largest canonical loading were the dependent variables, –0.907 for utilisation and –0.897 for perception, where these two variables defined the dependent canonical variate the most. The canonical cross-loadings also indicated that the education (–0.844), innovative proneness (–0.797), and extension contact (–0.746) had significant relationships with the dependent variate (V_1), thus supporting its significant contribution to perception and utilization.

Social participation (–0.507), farming experience (–0.425), times of visit to RSK (–0.382), and achievement motivation (0.440) were relatively more associated with the independent canonical variate (U_2) in the second canonical function. The items for perception exhibited moderate loading on the dependent side (–0.441), whereas the items for utilization had moderate loading (0.420) on the dependent side. In general, the first canonical function had the strongest and most meaningful association, mainly in relation to perception and utilisation, and was influenced by education, innovative proneness, and extension contact. The second canonical function had weak associations.

Table 4. Redundancy analysis showing the proportion of variance explained between independent and dependent variable sets

Canonical Variable	Set 1 by self	Set 1 by set 2	Set 2 by self	Set by set 1
1	0.239	0.189	0.814	0.644
2	0.075	0.016	0.186	0.040

The first canonical function was a redundancy analysis (Table 4) and accounted for the largest proportion of common variance among the two sets of variables. For the first function, Set 1 accounted for 23.9% of the variance within itself and 18.9% of the variance in set 2, while set 2 accounted for 81.4% of the variance within itself and 64.4% of the variance in Set 1. The values indicate that the relationship between the two sets of variables is strong and meaningful, in the sense of a multivariate relationship. The second canonical function, on the other hand, explained little variance. Only 7.5% and 1.6% of the variance of Set 1 was explained by Set 2, and only 18.6% and 4.0% of the variance of Set 2 was explained by Set 1. This implies that the second canonical function was of little practical use. The first canonical function accounted for the major and most significant relationship between the two sets of variables, whereas the second function had a relatively small effect in explaining the common variance.

DISCUSSION

The first canonical function demonstrated a strong multivariate association, the redundancy analysis showed that the independent variable set explained only 18.9% of the variance in the dependent variable set. This indicates that additional factors not included in the present study, such as institutional quality, accessibility of RSK services, farmers' trust, infrastructure availability and policy implementation, may also contribute to perception and utilisation behaviour. Therefore, the findings should be interpreted as representing important, but not exhaustive, determinants of RSK service utilisation. The second function, which played a part in the multivariate relationship, was comparatively small and consequently of little practical value. The findings are consistent with previous studies, with the observations made in the aforementioned RBK studies conducted in Srikakulam district, which showed that farmers with higher levels of extension contact, communication exposure and awareness had higher perception and utilisation of RBK services like e-crop booking, crop insurance, agro-advisory and others. Similarly, the study conducted by (Rao et al., 2024) revealed that education, innovative proneness and extension contact were the key factors determining the perception and utilisation of RSK services among tribal farmers. The results of this study emphasise the need to improve extension communication, digital awareness and capacity development programs to ensure farmers' effective involvement in institutional agricultural services. The present results also showed that perception and utilisation were significantly correlated with extension contact and information services, respectively. The utilisation of RSK services was higher in the tribal farmers with greater communication, exposure and interaction with extension personnel. Similar findings were reported by Chowdary et al. (2022) as farmers were very positive about and used e-crop booking, crop insurance, quality inputs and capacity-building programme services offered by the RBKs. The findings highlight the importance of extension interaction and awareness in improving the utilisation behaviour among tribal farmers.

Connectivity limitations, literacy constraints and digital exclusion influenced effective utilisation of RSK services among tribal farmers. While a few ICT -enabled services were available from the RSKs, many tribal farmers were not effectively able to access to advanced ICT services. Similar findings were reported in earlier RBK perception studies where there was a lack of awareness and availability of services like soil testing facility, smart TV interaction system, digital advisory services, etc., by the farmers. The present study also corroborates the observations of Saifuddin et al. (2023) who noted that the farmer–scientist interaction channels, as well as several ICT-enabled and information-related services including smart TV interaction systems, loan guidance services and advisory services combined with call centres were perceived as less effective by many farmers because of limited accessibility and awareness.

The findings also showed that educational attainment and innovativeness of tribal farmers, and their frequent contact with extension agencies were found to be associated with the effective perception and use of RSK services. However, increased access to information sources and institutional support led to more awareness

and uptake of agricultural services. The close linkage between extension contact and service uptake highlights the importance of extension workers and other actors at the frontline to facilitate technology transfer and empower farmers. Hence, expanding extension networks, upgrading the infrastructure for ICTs and expanding farmer-centric extension capacity building programs can significantly increase the access and effectiveness of RSK services, improving inclusive agriculture development in tribal areas. Thus, the findings reinforce the relevance of Diffusion of Innovations Theory in explaining variations in tribal farmers' perception and utilisation of RSK services.

CONCLUSION

The education, innovative proneness and extension contact were significantly associated with tribal farmers' perception and utilisation behaviour towards *Rythu Seva Kendra* services. The relationship between profile characteristics of tribal farmers and their perception-utilisation behaviour towards RSK services was found to be strong and significant by the use of Canonical Correlation Analysis. The farmers who were educated, innovative and more in contact with extension services had better awareness and utilization of services. Despite the availability of RSK services, limited digital literacy, poor internet connectivity and geographical isolation continue to constrain access to ICT-enabled advisory services. Therefore, improving digital infrastructure alone may not be sufficient unless accompanied by targeted digital literacy programmes and stronger village-level extension support. The results indicate that strengthening extension communication and building farmers' capacity to use digital agricultural services are particularly important for improving the effectiveness of RSK services in tribal communities.

DECLARATIONS

Ethics approval and informed consent: Throughout the study, the respondents were asked for their informed consent. The study was conducted in accordance with the ethical standards of the institutional and/or national research committee and with the 1964 Helsinki Declaration and its later amendments or comparable ethical standards. Ethical approval was waived by the Divisional Ethics Committee, Extension Division of Centurion University of Technology and Management, Paralakhemundi, Odisha, India.

Conflict of interest: The research was carried out without any financial or commercial ties that might be seen as a potential conflict of interest, according to the authors. The authors affirm that they carefully examined, amended and edited the content as necessary when preparing this work. The final content of this publication is entirely the authors' responsibility.

Data availability statement: Data is available upon reasonable request from the first author as well as corresponding author.

Publisher's note: All claims expressed in this article are solely those of the authors and do not necessarily represent those of their affiliated organisations, or those of the publisher, the editors, and the reviewers. Any product/ process or technology that may be evaluated in this article, or a claim that its manufacturer may make, is not guaranteed or endorsed by the publisher. The Indian Journal of Extension Education remains neutral with regard to jurisdictional claims.

REFERENCES

Anuhya, P., Kisku, U., & Khare, N. K. (2022). A study on correlates of profile characteristics and adoption behaviour of Rythu Bharosa Kendra (RBK) beneficiaries in Anantapur district, Andhra Pradesh. *Current Journal of Applied Science and Technology, 41*(24), 39–45. https://doi.org/10.9734/cjast/2022/v41i2431768

Babu, G. P., Jayalakshmi, M., Chaitanya, B. H., Mahadevaiah, M., & Srinivas, T. (2021). Effectiveness of season long training programme on knowledge levels in Kurnool district of Andhra Pradesh. *Indian Journal of Extension Education, 57*(4), 44–48. https://epubs.icar.org.in/index.php/IJEE/article/view/115481

Babu, N. N., Venkataramulu, M., Venu Prasad, H. D., Sarma, A. S. R., & Usha, M. (2023). Impact of Rythu Bharosa Kendra services as perceived by the farmers. *Asian Journal of Agricultural Extension, Economics and Sociology, 41*(9), 606–616. https://doi.org/10.9734/ajaees/2023/v41i92082

Chowdary, K. R., Jyotsna, M. K., Srisailam, S., & Jyothi, I. (2022). A study on perception and utilization of services of Rythu Bharosa Kendras (RBKs) by the farmers in Chittoor district of Andhra Pradesh, India. *Current Journal of Applied Science and Technology, 41*(27), 40–47. https://doi.org/10.9734/cjast/2022/v41i2731788

Haritha, M., Asokhan, M., Karthikeyan, C., Rani, A. J., & Ganapati, P. S. (2023). Examination of Rythu Bharosa Kendra services in Vizianagaram district of Andhra Pradesh with a view to improving service delivery to farmers. *Asian Journal of Agricultural Extension, Economics and Sociology, 41*(9), 869–876. https://doi.org/10.9734/ajaees/2023/v41i92114

Jaiswal, M., Singh, A., Singh, K., & Singh, B. (2021). Training: An effective tool for transfer of agricultural technologies. *Indian Journal of Extension Education, 55*(2), 1–5.

Jat, J. R., Punjabi, N. K., & Bhinda, R. (2021). Use of ICTs by tribal farmers for obtaining agricultural information in southern Rajasthan. *Indian Journal of Extension Education, 57*(3), 16–19. https://doi.org/10.48165/IJEE.2021.57304

Keskin, S., & Yasar, F. (2007). Use of canonical correlation analysis for determination of relationships among several traits in egg plant (*Solanum melongena* L.) under salt stress. *Pakistan Journal of Botany, 39*(5), 1547–1552.

Owolabi, A. O., Ayeni, M. D., Prusty, A. K., Mishra, N., Masso, W. Y. A., & Akpan, S. E. (2026). Undergraduates' perceptions and engagement in practical agriculture: A case of Landmark University, Nigeria. *Indian Journal of Extension Education, 62*(2), 183–188. https://doi.org/10.48165/IJEE.2026.622RN03

Padhy, C. P., Akhila Badavath, A. B., Atanu Deb, A. D., & Bikramjeet Ghose, B. G. (2025). Attitude of agricultural beneficiaries towards NGOs in north Coastal Andhra Pradesh. *Indian Journal of Extension Education*, *62*(1), 21-26.https://doi.org/10.48165/IJEE.2026.62104

Pujitha, A. S., Naik, A., Kumar, A., & Biswas, T. (2024). Comparative analysis of the impact of FPO on paddy farmers through canonical correlation analysis. *Indian Journal of Extension Education, 60*(3), 49–53. https://doi.org/10.48165/IJEE.2024.60311

Rao, P. V., Neelaveni, S., Chitti Babu, G., & Pradeep Kumar, P. B. (2024). Perception and utilization of Rythu Bharosa Kendras

(RBKs) services by the farmers in Srikakulam district in Andhra Pradesh, India. *Asian Journal of Agricultural Extension, Economics and Sociology, 42*(5), 187–191. https://doi.org/10.9734/ajaees/2024/v42i52426

Reddy, D. A. (2020). RBKs of Andhra Pradesh: One stop solution for the needs of farming community. *Vigyan Varta, 48*(51), 22.

Saifuddin, M., Rama Devy, M., Rao, M. S., & Suseela, K. (2023). Effectiveness of Rythu Bharosa Kendras (RBKs) services as perceived by farmers in the East Godavari district of Andhra Pradesh, India. *Asian Journal of Agricultural Extension, Economics and Sociology, 41*(4), 34–41. https://doi.org/10.9734/ajaees/2023/v41i41875

Sarnaik, S. D., Bhople, P. P., Mankar, D. M., & Tekale, V. S. (2020). Perception of farmers towards effectiveness of extension services of KVK. *Indian Journal of Extension Education, 56*(4), 43–48.

Singh, P., Singh, G., & Sodhi, G. S. (2020). On-farm participatory assessment of short and medium duration rice genotypes in south-western Punjab. *Indian Journal of Extension Education, 56*(3), 88–94. https://epubs.icar.org.in/index.php/IJEE/article/view/106990