Impact Of Digital Technology On Employees' Engagement

Dr. C. MURALIKUMARAN¹, ASLESH, S.S.²

¹Assistant Professor Department of Business Administration Annamalai University Annamalai Nagar Chidambaram. ²Research Scholar Department of Business Administration Annamalai University Annamalai Nagar Chidambaram.

ABSTRACT

The research tries to identify the impact of digital technology on BSNL employees' engagement. Data was collected from 50 BSNL employees in Kerala. The analysis discovered that digital technology has a positive effect on employees' engagement. The result demonstrates that the employees' engagement significantly influences employee job performance. The research concluded that the management of BSNL should provide continuous training in the use of technology to the employees to create better performance. Also, BSNL management should provide more sensible sessions in training programs to improve the employees' performance in their respective fields.

KEYWORDS: BSNL Employees, Digital Technology, Employees' Engagement and Employees' Job Performance.

INTRODUCTION

In recent years, digitalization has increased marked by the use of information and communication technology in every area of life. The introduction of digital technology implies a major change in the way it works and interacts with the environment. The vast amounts of digital data available for organization can be a source of new value generation with the ultimate goal of improving employee and organizational performance. The digitization of businesses can drive the development of value activities, so employees can expect to improve their performance. Ideas related to improving the performance of employees and companies,

should encourage a change of focus that facilitates the process of business digitization and value creation from digital.

This study enriches the understanding of the circumstances under which a particular use of digital technology is likely to increase or decrease employee engagement and employee job performance. Contextualizing the literature related to managerial attention to the use of digital technology in the workplace, the effect of digital technology use on employee job performance depends on employee engagement in terms of cognitive load and alertness. This study will also provide new theoretical guidance for future studies to empirically examine the impact of digital technology use on employee engagement and employee job performance, which is scarce in the existing literature.

REVIEW OF LITERATURE

Sophia Xiaoxia Duan (2023) discovered that that using digital technologies can enhance job performance through improved coordination, communication, knowledge sharing and decision-making.

Buthina Alobidyeen (2022) found that positive correlation between digitalization and employee job performance at the significance level. It also indicated a positive moral effect of digitalization on employee job performance in Greater Tafila Municipality.

Indrihastuti Sulistianingtiyas and Indi Djastuti (2022) identified that employees' engagement is mediation relationship between digitization in the workplace and employee job performance. Digitization in the workplace improves employee job performance and increases productivity, digitalization helps to improve employee self-efficacy, develop employee morale, motivate employees, improve skills, active participation, creative solutions, new challenges, constant thinking to work with dedication, integrated employees' engagement in doing job sincerely.

Some empirical studies conducted by Zhou et al., (2021); Ricci et al., (2020); Martínez-Caro et al., (2020); Truant & Broccardo (2021); Ratna & Kaur (2016); Kuusisto, (2015); Vuori et al., (2020); Okkonen et al., (2019); Tan et al., (2010) analyzed the state of digitalization and its implementation within the company, which mentioned digitalization in the workplace has a positive effect on performance.

Digitization is an upward experience used by organizations to improve business strategies, processes and structures. It has potential benefits to enhance employee and organizational performance. Furthermore, many companies have experienced positive performance effects and benefits through digitization (Truant & Broccardo, 2021).

Bejakovic & Mrnjavac (2020) have conducted a study on the importance of promoting digital literacy by examining the relationship between digital competence and employment. Participants in learning through digital literacy receive basic training to develop technical skills. Also, digital education improves learning ability and helps in their career development.

Brijesh Kishore Goswami and Yogesh Upadhyay (2019) have identified that digital transformation such as operational efficiency, customer experience, and business modelings have significant effect on employee's engagement in NCR region.

Yuvaraj and Nadheya (2018) stated that digital technology helps an organization to improve employee job performance faster and better. But since all the work is done with the help of ICT it has reduced the human interaction and affected the personal relationship between the employees. Majority of employees are willing to learn about digital technology. This makes the employees satisfied with the technology and also increases their efficiency.

Ulrike Stefanie Foerster-Metz, et al. (2018) stated that digitization helps organizations to acquire the skills they need and communicate and collaborate, improve employee job performance, and communicate from the leadership side to the employee side within the organization.

Muhammad Imran, et al. (2014) discovered that employee job performance was influenced by technological advancement. The research also identified that employee motivation and employee training was influenced by technological advancement. Furthermore, employee job performance was influenced by employee motivation.

RESEARCH GAP

There has been a lot of research done on the digital technology and employees' engagement worldwide, but very few researches has been done in the Indian context. Similarly, the digital technology and employees' engagement has not been addressed in public sector companies.

FRAMEWORK OF THE RESEARCH

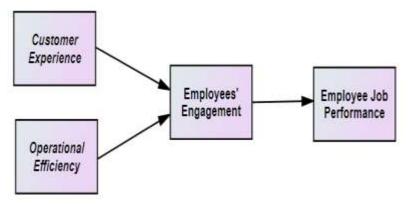


Figure 1: Framework of the Research

NEED FOR THE STUDY

The findings of this study will help BSNL management and policy makers. This study will help identify the impact of digital technology on BSNL employees' engagement. Findings from this study can help policy makers increase employees' engagement, increase their job performance.

STATEMENT OF THE PROBLEM

Employees working in a private company adopt digital technology easily. Employees working in private companies are adopting and learning digital technology for job security. But some employees working in public sector face many problems in adopting and learning digital technology. Also, digital technology has an excessive impact on the employee's work environment. This has positive or negative effects on the employee's performance, behavior and their interpersonal relationships. Hence, the BSNL is facing major problems in achieving the positive engagement of employees by adopting digital technology. Hence, the research tries to identify the impact of digital technology on BSNL employees' engagement in Kerala.

OBJECTIVES

- > To identify the influence of digital technology on BSNL employees' engagement.
- > To find out the influence of BSNL employees' engagement on job performance.

HYPOTHESES

> There is no the influence of digital technology on BSNL employees' engagement.

There is no influence of BSNL employees' engagement on job performance.

MATERIALS AND METHODS

In order to explore the impact of digital technology on BSNL influence of BSNL employees' engagement and job performance a descriptive research design is employed by the researcher. Data is collected employees' from BSNL in Kerala through a standardized questionnaire. This descriptive research design is employed to explore the relationship between digital technology, BSNL employees' engagement and employee job performance.

QUESTIONNAIRE DESIGN

Data is collected from BSNL employees in Kerala through a well-designed questionnaire. The questionnaire construction for this study is divided into four parts. The first part of the questionnaire is arranged in such a way to know the demographics profile of the BSNL employees', the second part is digital technology, the third part is employees' engagement and the fourth part is employee job performance. Except first part, all the four sections are constructed with multiple choice questions. The first part is set up as a category and the other three as a measuring scaling technique.

Table 1: Questionnaire Construction

S.No.	Variable	Items	Author	
ı	Digital Technology	8		
	Customer Experience 4		Self Design	
	Operational Efficiency 4			
П	Employees' Engagement	32	Calf Davies	
III	Employee job performance	8	Self Design	

RELIABILITY

Pilot study was done to confirm that the results of this study questionnaire are reliable. The questionnaires are verified by involving 50 BSNL employees in Kerala. Based on the BSNL employees' opinion, some changes are made in the questionnaire as suggested by the BSNL employees. Cronbach's alpha tool is employed to test the reliability of the research variables. All the variables of this questionnaire are above 0.70 which shows that it is reliable. This means that the set of questionnaire has a high

reliability value. Based on this result, it is statistically recommended that the questionnaire set can be implemented for final analysis.

Table 2: Reliability of the research

S.No.	Variable	Items	Reliability	
ı	Digital Technology	8	0.85	
	Customer Experience	4	0.86	
	Operational Efficiency	4	0.88	
11	Employees' engagement	32	0.92	
Ш	Employee job performance	8	0.90	

SAMPLING TECHNIQUE

In this study, random sampling technique has been applied to collect the primary data from BSNL employees in Kerala. In this way 50 BSNL employees are approached to collect the primary data in Kerala.

STATISTICAL TOOLS

Path analysis is used to estimate model by probing the relationship between digital technology, BSNL employees' engagement and employee job performance. The researcher has employed the path analysis for impact of digital technology on BSNL employees' engagement.

RESULTS AND DISCUSSION

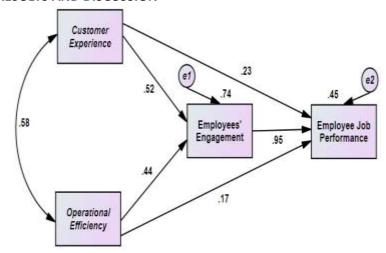


Figure 2: Impact of Digital Technology on BSNL Employees' Engagement

ISSN: 2197-5523 (online)

Table 3: Model Fit Indication

S.No.	Model Fit	Calculated	Recommended		
	Indicators	Values in the Analysis	Values (Premapriya, et al. 2016)		
1	Chi-Square	3.987			
2	р	0.069	> 0.050		
3	GFI	0.999			
4	AGFI	0.939	> 0.90		
5	CFI	0.999			
6	NFI	0.999			
7	RMS	0.040	< 0.000		
8	RMSEA	0.032	< 0.080		

Source: Primary data

The table 3 presents the mode summary of impact of digital technology on BSNL employees' engagement. The path model presented, along with mode summary to verify the model fitness. The Chi-square statistic is 3.987 with p> 0.05. The table illustrates the model fit statistics such as RMSEA, RMR, NFI, CFI, AGFI and GFI. RMR and RMSEA are within than the recommended limit i.e., RMR and RMSEA is less than 0.08 (Indra, Balaji and Velaudham, 2020). NFI, CFI, AGFI and GFI are within than the recommended limit i.e., NFI, CFI, AGFI and GFI is greater than 0.90. All the model fit statistics imply a better model fit (Victor and Velaudham, 2020). H₁: Customer experience significantly influences employees' engagement.

The hypothesis was tested in path model. The finding of the analysis demonstrates that the C.R. value is 16.641; β value is 0.524 and p value is significant. Therefore, the hypothesis is accepted. Hence, the result demonstrates that the customer experience significantly influences employees' engagement. Indrihastuti Sulistianingtiyas and Indi Djastuti (2022) found that positive correlation between digitalization and employee engagement.

Table 4: Regression Weights

DV		IV	Estim ate	S. E.	C.R	Bet a	р
Employee s' Engagem ent	< -	Custome r Experien ce	0.421	0.02	16.64 1	0.524	0.00
Employee s' Engagem ent	< -	Operatio nal Efficienc y	0.481	0.03	14.09 1	0.444	0.00
Employee s' Engagem ent	\- -	Employe es' Engagem ent	1.140	0.08	12.99 1	0.953	0.00
Employee Job Performa nce	< -	Custome r Experien ce	0.218	0.05	3.788	0.226	0.00
Employee Job Performa nce	< -	Operatio nal Efficienc y	0.219	0.07	3.008	0.169	0.00

Source: primary data

H₂: Operational efficiency significantly influences employees' engagement.

The hypothesis was tested in path model. The finding of the analysis demonstrates that the C.R. value is 14.091; β value is 0.444 and p value is significant. Therefore, the hypothesis is accepted. Hence, the result demonstrates that the operational efficiency significantly influences employees' engagement. Indrihastuti Sulistianingtiyas and Indi Djastuti (2022) found that positive correlation between digitalization and employee engagement.

 H_3 : Customer experience significantly influences employee job performance.

The hypothesis was tested in path model. The finding of the analysis demonstrates that the C.R. value is 3.788; β value is 0.226 and p value is significant. Therefore, the hypothesis is accepted. Hence, the result demonstrates that the customer experience significantly influences employee job performance.

Sophia Xiaoxia Duan (2023); Buthina Alobidyeen (2022) found that positive correlation between digitalization and employee job performance.

H₃: Operational efficiency significantly influences employee job performance.

The hypothesis was tested in path model. The finding of the analysis demonstrates that the C.R. value is 3.008; β value is 0.169 and p value is significant. Therefore, the hypothesis is accepted. Hence, the result demonstrates that the operational efficiency significantly influences employee job performance. Sophia Xiaoxia Duan (2023); Buthina Alobidyeen (2022) found that positive correlation between digitalization and employee job performance.

H₅: Employees' engagement significantly influences employee job performance.

The hypothesis was tested in path model. The finding of the analysis demonstrates that the C.R. value is 12.991; β value is 0.953 and p value is significant. Therefore, the hypothesis is accepted. Hence, the result demonstrates that the employees' engagement significantly influences employee job performance. Indrihastuti Sulistianingtiyas and Indi Djastuti (2022) found similar result.

FINDINGS

The analysis discovered that digital technology has a positive effect on employees' engagement. Indrihastuti Sulistianingtiyas and Indi Djastuti (2022) found that positive correlation between digitalization and employee engagement. The result demonstrates that the employees' engagement significantly influences employee job performance. Indrihastuti Sulistianingtiyas and Indi Djastuti (2022) found similar result.

RECOMMENDATIONS

- The participation of employees in digital transformation processes can be improved by holding seminars, workshops and periodic meetings with the continuous encouragement of the owners of digital innovations.
- ➤ Align performance management strategy with digital transformation plan and design and develop employee performance metrics in light of digital transformation needs.

- The research provides valuable insights for managers to understand the relationship between digital technology change and employee engagement and how these factors influence employee engagement.
- ➢ It is suggested that the management of BSNL should provide continuous training in the use of technology to the employees to create better performance. Also, BSNL management should provide more sensible sessions in training programs to improve the performance of employees in their respective fields.
- It is suggested that BSNL will create a culture that encourages employees to be innovative and creative and improve employee engagement by imparting knowledge of technology to reduce employee stress and improve employee job performance.

CONCLUSION

The research tries to identify the impact of digital technology on BSNL employees' engagement. Data was collected from 50 BSNL employees in Kerala. The analysis discovered that digital technology has a positive effect on employees' engagement. The result demonstrates that the employees' engagement significantly influences employee job performance. The research concluded that the management of BSNL should provide continuous training in the use of technology to the employees to create better performance. Also, BSNL management should provide more sensible sessions in training programs to improve the performance of employees in their respective fields.

REFERENCE

Brijesh Kishore Goswami and Yogesh Upadhyay (2019). An Empirical Study on Digital Transformation and Its impact on Employee Engagement. SSRN-Elsevier, 1022-1033.

Indra, Balaji and Velaudham (2020). Impact of Social Influence and Safety on Purchase Decision of Green Cosmetic. International Journal of Future Generation Communication and Networking, Vol. 13, No. 3, 3036–3042.

Indrihastuti Sulistianingtiyas and Indi Djastuti (2022). The Effect of Digitalization in the Workplace on Employee Performance Mediated By Employee Attachment (Study on Employees of the Center for Product Processing Research and Marine and Fisheries Biotechnology, Central Jakarta). Budapest International Research and Critics Institute-Journal, 5 (2), 15121-15136.

- Kuusisto, M. (2015). Effects of Digitalization on Organizations. International Journal of Management, 12(1), 1665–1689.
- Martínez-Caro, E., Cegarra-Navarro, J. G., & Alfonso-Ruiz, F. J. (2020).

 Digital technologies and firm performance: The role of digital organisational culture. Technological Forecasting and Social Change, 154, 119962.
- Muhammad Imran and Nadeem Maqbool and Huzaifah Shafique (2014).

 Impact of Technological Advancement on Employee
 Performance in Banking Sector. International Journal of Human
 Resource Studies, 4(1).
- Okkonen, J., Vuori, V., & Palvalin, M. (2019). Digitalization Changing Work: Employees' View on the Benefits and Hindrances. In Advances in Intelligent Systems and Computing, 918.
- Premapriya, Velaudham and Baskar (2016). Nature of Family Influenced by Consumer Buying Behavior: Multiple Group Analysis Approach. Asian Journal of Research in Social Sciences and Humanities, Vol. 6, No.9, pp. 908-915.
- Ratna, R., & Kaur, T. (2016). The impact of Information Technology on Job Related Factors lik e Health and Safety, Job Satisfaction, Performance, Productivity and Work Life Balance. Journal of Business & Financial Affairs, 05(01).
- Ricci, F., Scafarto, V., Ferri, S., & Tron, A. (2020). Value relevance of digitalization: The moderating role of corporate sustainability. An empirical study of Italian listed companies. Journal of Cleaner Production, 276, 123282.
- Tan, B. C. C., Pan, S. L., & Hackney, R. (2010). The strategic implications of web technologies: A process model of how web technologies enhance organizational performance. IEEE Transactions on Engineering Management, 57(2), 181–197.
- Truant, E., & Broccardo, L. (2021). Technological Forecasting & Social Change Digitalisation boosts company performance : an overview of Italian listed companies. 173.
- Ulrike Stefanie Foerster-Metz ,Katrin Marquardt, Nina Golowko, Andreas Kompalla and Christian Hell (2018). Digital Transformation and its Implications on Organizational Behavior. Journal of EU Research in Business, 1-14.
- Victor Charles and Velaudham (2020). The Impact Of Consumer's Perception Towards E-Tailing In Madurai. High Technology Letters, Volume 26, Issue 10, 583-593.
- Vuori, V., Helander, N., & Okkonen, J. (2020). Correction to: Digitalization in knowledge work: the dream of enhanced performance. Cognition, Technology and Work, 22(2), 427–433.
- Yuvaraj, S and Nadheya, R. (2018). A Study on the Role of Technology on Employee Behaviour and Their Performance. International Journal of Mechanical Engineering and Technology, 9 (7), 244–251.

Zhou, Y., Liu, G., Chang, X., & Wang, L. (2021). The impact of HRM digitalization on firm performance: investigating three-way interactions. Asia Pacific Journal of Human Resources, 59(1), 20–43.