

From Resistance to Readiness: Healthcare Workforce Adaptation in AI- Driven Digital Transformation

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Abstract

Artificial Intelligence (AI) has been identified as one of the key change drivers in the evolution of health care facilities across the globe. However, the implementation of AI-based digital technology is not only the advancement of technology but also the workforce's alignment with it. Though AI- based digital technology is increasingly becoming popular in health care facilities across the globe, workforce resistance to its implementation remains a major issue in its sustainability. This study aims to identify the perceptions of employees in Bengaluru on the prospects and limitations of AI- based digital technology in health care facilities and the major factors contributing to workforce resistance. The study employed a qualitative methodology. Fifteen employees from various departments of a health care facility were interviewed through in-depth interviews, including doctors, nurses, technicians, administrative staff, and IT employees. The findings revealed seven major factors contributing to workforce resistance: dependency on digital technology, reliability of digital technology, data security apprehensions, training perceptions, emotional attachment to traditional methods, alignment of technology with tasks, and uncertainty regarding performance outcomes.

Employees are aware of the operational efficiency of AI technologies, particularly in improving workflow efficiency. However, resistance escalates when technology reliability is low, organizational support is limited, and change is not communicated in a structured manner. Perceived usefulness alone was not adequate to prepare the workforce. The research contributes to the human capital discourse in the broader AI adoption movement by offering a framework on management strategies involved in the transition from resistance to readiness.

Keywords: Digital Adoption, Artificial Intelligence (AI), Healthcare Technology, Behavioral Resistance, HIS, PACS, Employee Perspectives, Thematic Analysis, Change Management.

Introduction

The use of digital technologies and Artificial Intelligence (AI), in particular, has been changing healthcare delivery in a dramatic manner. Yet, the use of this technology is not uniform across different healthcare departments. While some departments are enthusiastic about using AI technology in their day-to-day activities, others are reluctant and even resistive towards the use of this new technology (Kateb et al., 2022; Hameed et al., 2023). Employee behavioral resistance, which refers to active and passive resistance towards new technology systems, has been identified as a major factor hindering the benefits of AI technology in healthcare delivery. This not only

slows down the benefits of technology but also impacts performance and morale. (Bagrationi & Thurner, 2023).

The results of the technology acceptance models indicate that the two main factors leading to the intention to use new technologies are the perceived usefulness and ease of use of the new technologies (Davis, 1989), but the new studies in the field of AI-related healthcare indicate that the intention of the medical staff is dependent on both factors (Hameed et al., 2023). Trust, especially in the functioning of the AI and the data used, is a completely different, multidimensional construct that is located upstream, often indirectly influencing the perceived usefulness (Choung, David, & Ross, 2022; Hernández-Ortega, 2011). More specifically, concerns over data privacy, the accuracy of the algorithm, and the cultural competence of AI systems cause the trust issue to become even more problematic in this environment; thus, they raise the likelihood of resistance occurrence.

Personal feelings don't stop there; they are also affected by the organization's factors. Institutional trust, structured training programs, and leadership styles such as task-oriented leadership or high-performance work systems contribute to reducing resistance and encouraging AI adoption. (Ejdys, 2018; Li et al., 2023) On the other hand, an improper or improper implementation strategy may strengthen resistance by affecting professional identity and established routines. (Kateb et al., 2022).

In spite of considerable scientific literature available regarding AI adoption models, there is limited qualitative literature available regarding how workforce-level perception turns into behavioral resistance in healthcare organizations of emerging digital environments like Bengaluru. Keeping this knowledge gap in view, this study attempts to examine the views of employees of healthcare organizations regarding digital adoption and AI integration with respect to drivers of behavioral resistance and its enabling strategies. The objectives of the research will be to examine the following: What is the nature of healthcare employees' perception and behavioral response to the organization's attempts to adopt digital technologies and integrate AI, and what is the role of perceived usefulness, organizational support, and trust/security issues in influencing behavioral resistance? The research will help to develop strategies for the institution to improve workforce readiness through the development of trust, training, and effective change management.

Review of Literature

In recent years, digital transformation and integration of Artificial Intelligence (AI) technologies in healthcare services have witnessed rapid development. While these technologies are believed to bring diagnostic benefits, efficiency, and cost-effectiveness to healthcare services, it is crucial that employees accept these technologies for effective implementation. Behavioral resistance from employees of healthcare organizations has been identified as an important barrier to digital transformation and AI integration. Ten scholarly literature that helped identify how perceived usefulness and ease of use, organizational support, security and trust, and change management contribute to employees' resistance to digital transformation and AI integration are discussed below.

Perceived Usefulness & Ease of Use (TAM/UTAUT as Core Predictors)

According to the TAM and UTAUT, the most important factors that influence the acceptance of technology are the perceived usefulness and the perceived ease of use of the technology. These factors remain the strongest predictors of the willingness of healthcare workers to use AI technology, according to numerous studies. Choung, David, & Ross (2022) found that trust also influences the intention to use AI, albeit indirectly, through the perception of usefulness and ease of use.

The path analyses show that the perception of usefulness plays the strongest role as a mediator of trust and behavioral intentions. This study makes a distinction between functionality trust and human-like trust, and their influence on the adoption of AI. Similarly, Hameed et al. (2023) have demonstrated that among the healthcare providers, performance expectancy (usefulness) and effort expectancy (ease of use) rank as the most influential drivers of intention to adopt AI systems. Applying a structural equation model, high effort expectancy diminishes cognitive burden and increases adoption while perceived usefulness strengthens the belief that AI contributes to clinical decision-making and patient outcomes.

Moreover, this research singles out initial trust and technological features as two aspects that significantly contribute to the promotion of perceived ease of use. Ejdys (2018) also came to the conclusion that ease of use is the main factor which leads to trust in technology in the case of institutional ICT systems. Ease of use had a greater impact than general trust or institutional trust, which means that usability takes a leading role particularly in the stages of the very first adoption. Together, these results determine that perceived usefulness and ease of use are still the key concepts that explain the healthcare workers' acclimatization to AI and digital tools. In case the technologies fail to bring obvious benefits or there are difficulties in their use, opposition will be strengthened. These constructs also have the role of mediators between organizational factors, trust, and behavioral outcomes.

Organizational Support, Training, and Leadership

The organizational milieu considerably shapes the employees' reactions to the company's digital transformation initiatives. One of the most notable support features is the leaders' communication style, training programs, institutional trust, and employees' involvement which have been identified to be the main factors that not only reduce resistance but also increase commitment. The research of Ejdys (2018) draws the focus to the main trust in technology factors namely: trust in the institution and as well perceived organizational stability. When an individual trusts the processes, it in the institutions that are going to use digital systems under responsible, and sustainability manners implemented, he or she is become more of the future user. Li et al. (2023) on the basis of a hospitality sector study also state that the resistance to change has a negative impact on AI readiness. With the task-oriented leadership, however, this relationship is indirect (mediation).

The writers also argue that the leaders make the change rationale obvious to the employees and at the same time provide them with well-structured instructions through which employees can better understand digital change and thus digital change will be interpreted in a positive way which in turn competence-building will be facilitated. The research further reveals that resistance–leadership relations are influenced by HPWS which once again means HR practices in terms of training, incentives, and supervision can help in resistance alleviation. The middle management should not be forgotten, as well, which is very important.

According to the research results of Bagrationi, K., & Thurner, (2023), focusing on a transportation company, the resistance of middle managers towards digital initiatives eventually goes down and employee becomes infected with such resistance. The research showed that managers who prefer more routine or have high values of conformity and power are more resistant; their hesitation leads to the creation of cultural frictions which shape the pattern of organizational adoptions. The main thing is that the early involvement of the audience connects transformations to values and invites participation in decision processes, which in turn resistance is reduced.

Organizational support functions not only as a contextual factor but as a strategic change lever when employees feel supported and adequately trained, resistance decreases, whereas poorly communicated initiatives may hinder adoption even of high- performing technologies.

Trust, Security, and Data Concerns

Trust consistently emerges as a decisive factor influencing technology acceptance, especially in healthcare where decisions involve sensitive patient data, ethical considerations, and clinical accuracy.

Multidimensional Trust

According to Choung et al. (2022), trust can be conceptualized to contain functionality trust (reliability, capability, and accuracy) and human-like trust (perceived integrity, character). Functionality trust has a stronger influence on adoption, which suggests that evidence of accuracy and reliability is used by users instead of anthropomorphic cues.

Lankton et al. explain that for trust constructs to hold, these have to align with the degree of anthropomorphism of a technology. In AI systems where only limited social features are available, such as systems running solely on the back-end performing diagnostic algorithms, system-like trust constructs are more appropriate than interpersonal ones, such as reliability, functionality, and helpfulness.

Conversely, misalignment may result in misleading interpretations of trust evaluation. This revelation is very pertinent to the medical sector, as AI systems vary in their degree of humanness, for instance, from simple chatbot interactions to complex diagnostic imaging algorithms.

Post-use Trust

Hernández-Ortega (2011) states that “post- use trust is the trust that is more intensely affected by the trust one has had, which then largely influences the subsequent usage.” Trust that is verified by experiences that validate correctness, security, and compatibility is heightened, but an initial adverse circumstance may generate an intense distrust that lasts for an extended period.

Data Privacy and Security

Healthcare employees may experience increased concerns about data misuse, privacy violations, bias in AI algorithms, and system errors. Xu et al. (2014) extend this list by stating that active and passive users form perceptions of trust based on the reliability of the system, task demands, and user-specific expectations. Discrepancies between expectations and reality undermine trust and result in under- reliance on the system. These research works show that in order for AI systems to elicit trust from humans, transparency is a must, along with reliability and robust data protection features..

Change Management, Crisis Adoption, and Adaptability

Resistance to digital transformation is not mainly a problem of technology; the main reasons are the psychology and culture of the people. According to the change management practices, which are especially effective during the period of a rapid transformation, it is the employees who either resist or accept the change that are determined by their adaptation level.

Kateb et al. (2022) analyze social care organizations amid the COVID-19 pandemic and argue that crisis-induced digital adoption has unequal outcomes and is mainly influenced by the professional identity and internal conflicts due to the lack of a shared vision. In some instances, digital tools were embraced, whereas in others, they were resisted or considered as temporary solutions. Common vision, presence of champions, and professional identity facilitated the transition to new technologies. Bagrationi, K., & Thurner, (2023). also point out that resistance is very much connected to one’s value system and being a creature of habit. Organizations that ignore the underlying attitudes towards change may face resistance. The structured involvement,

open dialogues, and change framing help to reduce the psychological threat and increase the level of adaptability.

Similarly, according to Li et al. (2023), resistance can be alleviated by a task-oriented leadership style which would clarify roles and create stability thus aligning tasks with new technologies.

Besides that, HPWS also help to make the organization flexible. Summed up, these articles suggest that a digital transformation is basically a change management issue. It is not the case that people oppose technological innovations, however, they still push back if their identity, habits, or feeling of control are disrupted by the changes.

Behavioral Resistance as a Core Outcome

Behavioral Resistance of which is the dependent variable of this study, is a phenomenon that can be recognized through the signs of reluctance, evasion, taking a critical stance, and partial sharing of the digital systems. Resistance may also be active—direct and deliberate rejection—or passive—procrastination and minimal involvement.

This framework by Xu et al. (2014) shows how negative antecedents like complexity, unpredictability, or low reliability create resistance. Under-trust leads to disuse. Over-trust leads to misuse. Balanced trust supports appropriate use. Li et al. (2023) find that resistance decreases the organizational readiness for AI; leadership-mediated interventions are necessary to overcome behavioral resistance. Across studies, behavioral resistance is shown to arise from low perceived usefulness, insufficient ease of use, poor organizational support, low trust/security fears, identity clashes, and poor change management.

Theoretical Framework

The pace of digital transformation in the healthcare industry is increasing, characterized by the development of information systems, the application of artificial intelligence, and the integration of digital infrastructures. Behavioral, technology acceptance, and change management theories offer essential insights for understanding the employee perspective of the application of digital technologies. This study has used three main theories, and they are all related to one another. These include the Technology Acceptance Model, the Unified Theory of Acceptance and Use of Technology, and the Theory of Resistance to Change. These three theories offer insights into how employees view the usability, reliability, emotional readiness, and usefulness of the system in accepting the application of digital technologies in the workplace. It is projected that the usefulness and ease of use of technology are factors that influence how people adopt technology. In relation to healthcare facilities, it can be argued that Hospital Information Systems (HIS), Picture Archiving and Communication Systems (PACS), Third Party Administration (TPA) portals, hospital applications, and AI-based application modules are core aspects of the operational processes.

Employee opinions regarding the effectiveness, accuracy, and speed of these applications may be considered one of the significant factors that influence their adoption. Considering the variety of digital applications that exist in hospital facilities, the UTAUT model is highly applicable. More specifically, it focuses on performance expectancy, effort expectancy, social influence, and facilitating conditions, which are highly applicable in the hospital environment that is characterized by teamwork, interdependence, and support. It is highly probable that, apart from rejecting something, the change resistance will reflect the emotional and behavioral challenges that may accompany change. These may include issues of mistrust, fear of mistakes, update fatigue, and communication issues that may be perceived as challenges despite the employees being aware of the benefits of technology adoption. These are hand-in-hand with the health environment, especially when it is known that there is a high probability of error and that the operator is working under

pressure; therefore, these responses are crucial in the development of technology behavior. Thus, the unification of these constructs offers an overall understanding of interpersonal interactions. To a certain degree, the models pointed out the essential variables that will be used in the current study, i.e., perceived usefulness, perceived ease of use, performance expectancy, facilitating conditions, and behavioral resistance. The factors that were included in the analysis and the reasons that affect the hospital employees' attitude could be better explained through these variables.

Research Methodology

The research will make use of the interpretivist paradigm, which will help in the representation of the perceptions, meanings, beliefs, attitudes, and interactions of humans with the newly developed digital systems in the healthcare environment. The application of the interpretivist research paradigm will help in the comprehensive study of the subjectivity of the healthcare employees, such as the way they perceive the usability of the system, experience the performance issues of the software, and respond emotionally to the discomfort of interacting with the newly developed technologies and role-specific technologies. A qualitative research study with semi-structured interviews as the research design was the main research design of the study.

Purposeful sampling was used to select fifteen individuals to ensure representation of the population in the study, specifically in the functional departments of the organization.

The study was conducted to explore the internal process of digital adoption, both from the clinical and non-clinical perspective. The interview design consisted of open-ended questions related to the use of the digital system, the internal workflow system (ARCOS), the usability of the system, and the attitude toward Artificial Intelligence tools. The primary responses were recorded and verified. The data underwent thematic analysis which involved familiarization, coding, theme generation, reviewing, and consolidation. A codebook was in place and was created based on the conceptual variables of the study and the participants' information. The full thematic codebook utilized for this analysis is available in Appendix A.

We created a thematic matrix and a heatmap to show the comparative pattern and the influence of the theme on different job roles. Ethical issues were managed through informed consents being obtained, confidentiality of the information being maintained, and individual references being disguised.

Data Analysis/Results

The interview data were interpreted by employing Braun and Clarke's thematic analysis approach. The stages of work were closely connected with the scripts reading and the coding of the scripts segments. The coding sought to highlight units in the text that touched upon employees' experiences with the use of digital systems and AI-enabled tools. The preliminary codes were, in the next step, consolidated into broader categories that were further refined through the comparison of participants to check the uniformity and conceptual clarity.

Microsoft Excel was used to organize codes, cluster similar themes, and facilitate cross-case comparison.

In addition, a keyword frequency check supported by a predefined dictionary was conducted to identify prominent patterns across roles, which formed the basis of the thematic matrix development. A heatmap was then produced to illustrate the location and the degree of the themes throughout the fifteen participants. The well-defined process helped to determine precisely the shared and role-specific experiences with digital adoption.

As a result of this research, seven themes representing the operational, emotional, and technical aspects of employees' interactions with digital systems were identified. The themes are:

1. Dependency & Workflow Impact,
2. Performance & Reliability,
3. Trust, Accuracy & Data Concerns,
4. Training, Support & Change Management,
5. Behavioral Resistance & Emotional Response,
6. Role-Specific Needs & Use-Cases, and
7. Perceived Benefits.

The chapters include an in-depth account of each theme plus the quotes of the participants that support the view. The full thematic codebook is in Appendix A, the thematic frequency matrix in Appendix B, and the heatmap representation in Appendix C.

Findings

The chapter will illustrate the joint thematic analysis through the fifteen different semi-structured interviews of employees from various professions in the hospital. The thematic matrix representing the theme patterns for all fifteen interviews is available in the Appendix B, and the heatmap reflecting these patterns across job roles can be seen in the Appendix C. These were individuals who were high specialists like consultants, junior doctors, nurses, radiology technicians, billing and insurance staff, customer care agents, specialty coordinators, and the head of IT. The analysis led to the seven major themes surrounding staff experiences, their perceptions, and the recognition of their challenges in the hospital environment while using digital-based systems and AI-enabled tools. Each theme would be complemented by the appropriate interviewee's utterance.

Generally, the following systems: HIS, PACS, TPA portals, and patient-oriented digital tools, are viewed as crucial in the normal operation of the hospital. The level of dependency on the systems was consistently high across the different roles. This suggests that the digital tools were an essential component of the provision of the patient experience, communication, recording, and the provision of medical care. There was an acknowledgment that the disruption of the system would lead to an instantaneous effect on the entire chain of service provision. The customer services and the personnel themselves were put in an awkward situation due to the increased loading times and disconnections from the cloud.

One senior consultant expressed: *"If the system goes slow even for ten minutes, everything stops for us—OPD, billing, procedures... everything gets held up."*

The views expressed by the nursing staff and the specialty coordinators also matched this, as they said that basic, routine things such as discharge processing, charting of medications, and uploading of consent forms are "things that are completely dependent on the system

Performance & Reliability

Concerns about performance was the main theme that was brought up very often in all the transcripts, though not at the same level of intensity for all the roles. The staff members spoke about the time taken for the screens to load, the freezing of the systems, the time taken for the systems to respond during peak hours of the day for the OPD, and the systems being mismatched without their knowledge. An OPD nurse explained: "Sometimes the screen just keeps loading and we cannot move to the next patient.

They get irritated and we also feel helpless."

Delays in the loading of images from the PACS system after a request from radiology technicians were said to have affected the emergency and routine work processes. Billing and insurance staff said TPA portals were the ones most likely to be delayed during peak hours. These statements pinpoint system performance and reliability as the most frequent challenges of operations.

Trust, Accuracy & Data Concerns

Participants have a moderate level of trust in digital systems. Even though they recognize that having a digital record helps them gain access easily, they are still worried about mistakes, incorrect upload of data, and duplicate data. As accuracy is of paramount importance in their job, they are always looking to find the same data from different sources.

A billing staff member noted:

“I trust the system maybe 7 or 8 out of 10, but I always cross-check because one wrong upload can mess up the billing or insurance approval.”

The specialty coordinators reported incidents in which the mismatching of information led to confusion in scheduling and documentation. These problems suggest that although the electronic system is used in general, the level of trust in the correctness of the information is not very high.

Training, Support & Change Management

The issue of training was also raised by most participants during the interviews. Most employees also pointed out to the interviewer that the training sessions were very short or fewer and thus had to find things out themselves or seek the help of another employee. The employees also mentioned to the interviewer that the updates to the systems had happened very quickly without any prior notice and thus the employees were confused while engaged in clinical work.

A customer care executive mentioned: *“Most of our learning happens on the floor. When an update suddenly comes, we struggle because nobody informs us beforehand.”*

Also, several participants pointed out the need to receive more training on the roles and to communicate in time in case of new features or changed workflows.

Behavioral Resistance & Emotional Response

Stress, fear, and hesitation were less mentioned issues, but they were apparent in several transcripts. These issues were mostly related to the changes in the system that occurred suddenly, the interface was too difficult, and the workload during patient hours of peak flow. A specialty coordinator shared:

“When the update suddenly came, I felt stressed. Patients were waiting and I didn’t know where the new buttons were.”

These findings suggest that emotional factors influence technology adoption, particularly when changes occur without adequate preparation time.

Role-Specific Needs & Use-Cases

Workers have also pointed out that the usage of technology was very varied from department to department. Different modules and functionalities would be required for the radiology department, billing, insurance, nursing, and specialties, respectively. A radiology technician highlighted the importance of system speed:

“If PACS hangs or the scan doesn’t upload, everything gets delayed and doctors start calling us.”

This kind of record also points to a requirement for the electronic systems to be flexible so they can accommodate the work procedures of each role, as opposed to merely accommodating a uniform deployment of the technology.

Perceived Benefits

Despite the difficulties that were mentioned, the participants have to be continuously commended for recognizing the bright side of the digital transformation, such as quicker access to reports, less

writing work, better information flow, and fewer mistakes in documentation.

A junior doctor commented:

“Reports come faster now and we don’t lose information like before. It has improved the flow overall.”

These different views demonstrate very clearly that the public is willing to accept that digital tools will bring about a positive change in the operations’ efficiency and increase the quality of patients’ care in the long run. The proportion of these issues, as represented in the thematic matrix (Appendix B) and heatmap (Appendix C), indicates these trends not only at the level of the total workforce but also within various employee groups.

Discussion

In the final chapter, I dissect the evidence that has been laid out and argue the changes that they entail from a healthcare perspective. Through the lens of a broad digital transformation perspective, the themes are confronted with the hospital wards and personnel reality to have the hospital going digital means the whole hospital is being digitized.

Digital Dependency and Operational Vulnerability

The shared dependence on digital networks and systems of these people shows that digital procedures have become functions in regular hospital routines. However, the over- reliance on technology means that if the technology slows down or rooms become unavailable, the smooth operation of the staff will be impaired. These consequences reveal the level of maturity of the organization in the use of technology, which, though high, remains very dependent on the effective management of the technology used.

System Performance and Human Interaction

The problems with the staff’s performance, such as lag, delay in loading, and freezing of the screen, have also been brought up by the staff in the respective environments. The problem is even more critical in such environments as OPD nurses, customer care, and radiology technicians. The findings suggest that the reliability of the systems plays an important role in the overall perception of the IT environment and the acceptance of IT innovation

Trust and Accuracy Issues that Reflect Data Sensitivity

In the case of the new digital healthcare system, the respondents have demonstrated only an average level of trust, which has been reflected as misgivings of the system, such as the presence of wrong uploads, duplication, and unmatched data. This, therefore, shows the need to have a system of validations as well as the need to have coordination among the departments. The findings have shown that the issue of trust is not only system- conscious but has shown the need to have the users be confident in the accuracy of the data input by various units.

Training and Change Management Gaps Affect Adoption

The obstacles to training and issues outlined in the needs assessment that accompany the examples of a collective systemic-deficit presence. Inadequate formal instruction and sudden changes in the computer system may lead to time, money, and effort being wasted because most employees react with a certain degree of uncertainty and doubt. The result indicates the need for a well-coordinated new employee program, existing personnel being notified of updates in advance, and staff- relevant ongoing support afterwards.

Emotional Responses Reflect Adjustment Pressure

Deep anxiety and the dread of mistakes often accompany the rapid change of digital tools. These can be understood as adjustment- related responses to stressful situations, particularly due to emerging problems in dealing with the new technologies. The results indicate that a sense of emotional ease in operating digital systems emerges gradually and depends on constant communication, reassurance, and providing hands-on practice opportunities.

Bringing Focus to the Use of Digital Design in Diverse Roles

The implementation of digital systems in different departments shows that a single digital solution may not work functionally for different types of operations. This can be seen in the opposite requirements of the departments: the performance of PACS is very important for radiology, on the other hand, coordinators of the specialties are very much dependent on scheduling tools and systems for accession number annotation. General support for digital systems is obvious from the benefits most often mentioned, such as safer and faster access to reports, less documentation errors, and better coordination. In fact, the participants were positive about the digitalization progress although they experienced some transition times. Their opinion is in line with the staff members being indifferent to the generational factor of digitalization and are ready to support any system as long as the workflow is not disrupted.

The results reveal that successful digital implementation cannot be the same in all departments because of different needs and usage patterns of the departments. These differences across roles are reflected in the obvious from the benefits most often mentioned, such as faster and safer access to reports, less documentation errors, and better coordination

The Big Picture of the Survey

Across themes, employees acknowledge the necessity of digital systems in their daily work; however, they continue to face operational, training-related, and emotional challenges. The discoveries made hint at the fact that going digital in a hospital setting will be successful only when the systems are reliable, support is enough, communication is clear, and the design takes into account the specific characteristics of each role.

Limitations

This research has some challenges that need to be specified. For one, the study took place in a limited setting of the city of Bengaluru, India. While the participants were chosen from hospitals in the same city, they represented only one urban metropolitan area. Being a metro hub with a digitally savvy healthcare community, the perceptions of Bengaluru could be different if the same research is carried out in remote locations or in areas with differing degrees of digitalization. In addition, the study included fifteen individuals from various departments of the organization. Though the results may be suitable for theory-based research, they might not reflect the full spectrum of employee experiences in the healthcare sector. Consequently, this qualitative interpretivist study concentrates on subjective meanings rather than generalizable statistical relationships. As a result, the findings are the views of the participants interviewed about their experiences with digital systems and not a theoretical derivation from the facts. Moreover, the interview data's self-reporting default may cause the individuals' bias, selective retrospective memory of the participant, or social desirability effects. Despite the fact that confidentiality was maintained, the employees would have responded differently depending on the structure in which they worked or the guidelines provided.

Implications

Despite the limitations, the study provides important insights into practice and theory. From the study, the importance of stability in the system, training, and communication in the process of digital transformation is clear, and this provides directions to the managers of the hospitals, the IT department, and others on how to achieve the transformation. From the practical side, the study shows that the procedures of adopting digital technology in the healthcare sector should be person- oriented because employees relate to the various parts of the system differently. The use of digital tools and support systems which are in perfect harmony with the requirements of the department can, on the one hand, increase the productivity and, on the other hand, lessen the inconsistencies. From the managerial perspective, the change management process has emerged as an important factor, especially in the case of updates being introduced without sufficient briefing to the employees, thus making the work process inefficient and the employees overstressed. The quality of the adoption process can also be significantly influenced by the extent of the planning process, digital empowerment, and the level of coordination at the departmental level. The study also lends support to the management theories by revealing that the behavior of the employees towards the digital systems is the outcome of the combined effect of the perceived usefulness and the stability of the performance, emotional factors, and the hospital settings.

Future Research Direction

One such research avenue which can be taken up for further research is the confirmation of the research outcomes using an alternate method of research. Comparative studies can be conducted across various hospitals in different cities or states in India to examine the effect of digital maturity, resource affordability, and regional differences on worker attitudes. Quantitative as well as mixed-method studies can be initiated for further research to establish the relationship between variables such as user perception of relevance, expectations of utility, training level, and behavioral resistance. Apart from being a qualitative study and a confirmation of the research outcomes, such studies can also be an ideal complement to the existing research.

Furthermore, the extension of my research can also be achieved by recognizing the in- depth information provided on the digital transformation of the patients, administrators, or senior management level and examining the concept of the digital journey from a multi-stakeholder perspective. Time-series studies can be conducted to monitor the effect of the system along with a change in employee perception over time. It can be very useful in identifying the points when it is just before and after major system updates or AI projects. Lastly, there have been investigations into the use of AI-enabled tools such as predictive analytics, automated diagnosis, decision support systems, etc., Which could be extended to the effect of the level of automation on the development of trust, work, and decision-making processes. The extra materials that have been acknowledge through this study are available in the following appendices (Appendix A-C)

References

1. Choung, H., David, P., & Ross, A. (2022). 997.[https://doi.org/10.1108/IJoEM-07-Trust in AI and its role in the acceptance of 2017-0234 AI technologies. International Journal of Human-Computer Interaction, 39\(9\), 1727–1739. https://doi.org/10.1080/10447318.2022.2050543](https://doi.org/10.1108/IJoEM-07-Trust in AI and its role in the acceptance of 2017-0234 AI technologies. International Journal of Human-Computer Interaction, 39(9), 1727–1739. https://doi.org/10.1080/10447318.2022.2050543)
2. Lankton, N. K., McKnight, D. H., & Tripp, J. (2015). Technology, Humanness, and Trust: Rethinking trust in technology. In E. Davidson (Ed.), *Journal of the Association for Information (Vols. 16–16, Issue 10, pp.880–918)*. [https://core.ac.uk/download/pdf/301380588. pdf](https://core.ac.uk/download/pdf/301380588.pdf)
3. Ejdy, J. (2018). Building technology trust in ICT application at a university. *International Journal of Emerging Markets*, 13(5), 980

4. Hernández-Ortega, B. (2011). The role of post-use trust in the acceptance of a technology: Drivers and consequences. *Technovation*, 31(9), 523–538. <https://doi.org/10.1016/j.technovation.2011.07.001>
5. Bagrationi, K., & Thurner, (2023). Middle management's resistance to digital change. *Foresight and STI Governance*, (2), 49–60. <https://doi.org/10.17323/2500-2597.2023.2.49.60>
6. Li, C., Ashraf, S. F., Amin, S., & Safdar, M. N. (2023). Consequence of resistance to change on AI readiness: Mediating– Moderating role of Task-oriented Leadership and High-Performance Work system in the hospitality sector. *SAGE Open*, 13(4). <https://doi.org/10.1177/21582440231217731>
7. Kateb, S., Ruehle, R. C., Kroon, D. P., van Burg, E., & Huber, M. (2022). Innovating under pressure: Adopting digital technologies in social care organizations during the COVID-19 crisis. *Technovation*, 115, Article 102536. <https://doi.org/10.1016/j.technovation.2022.102536>
8. Hameed, B. Z., Naik, N., Ibrahim, S., Tatkar, N. S., Shah, M. J., Prasad, D., Hegde, P., Chlosta, P., Rai, B. P., & Somani, B. K. (2023). Breaking Barriers: Unveiling factors influencing the adoption of artificial intelligence by healthcare providers. *Big Data and Cognitive Computing*, 7(2), 105. <https://doi.org/10.3390/bdcc7020105>
9. Xu, J., Le, K., Deitermann, A., & Montague, E. (2014). How different types of users develop trust in technology: A qualitative analysis of the antecedents of active and passive user trust in a shared technology. *Applied Ergonomics*, 45, 1495–1503. <https://doi.org/10.1016/j.apergo.2014.04.012>

Appendices

Appendix A: Codebook of 15 Transcripts

Codebook of the 15 Transcripts			
Theme	Definition	Defining extracts	Example quotes (from transcripts)
Dependency & Workflow Impact	Systems are central to daily operations; outages or failures cause workflow disruptions.	Mentions of IT/PACS apps controlling work, interruptions, queues, delayed diagnoses.	"If the system goes down even for ten minutes, everything stops for us — (P2) taking procedures... the whole flow gets disrupted!" — Specialist Coordinator (Cancer)
Performance & Reliability	Problems related to speed, crashes, network/lag, rendering or synchronization.	Mentions of lag, server issues, partial loads, slow access, misinterpreted reports.	"Sometimes during peak (P2) the PACS just keeps freezing and we can't move in the next patient. They get irritated and we also feel helpless." — P2/Staff Nurse
Trust, Accuracy & Data Concerns	Concerns about data accuracy, duplicate records, privacy and data security.	Issues about wrong uploads, duplicate profiles, privacy worries, trust ratings.	"I trust the system maybe 7 or 8 out of 10, but I will never check everything because if something is uploaded under the wrong number, it becomes a big issue!" — Billing & Insurance Executive
Training Support & Change Management	Support mechanisms, training quality, communication and rollout practices.	Outstanding initiatives, IT support issues, plus testing timing of updates.	"They do give training, but honestly most of the training happens on the floor. When a new update comes, we struggle because nobody informs us beforehand!" — Customer Care Executive
Behavioral Resistance & Emotional Response	Emotional reactions and resistance due to complexity, fear, or time pressure.	Perplexity, confusion, stress, fear of mistakes, complaints about complexity.	"When the update rollout came, I felt nervous. Patients were waiting and I didn't even know where the new feature was!" — Specialist Coordinator (Oncology)
Role-Specific Needs & Use Cases	Unique requirements and workflows of specific roles (radiology, billing, nursing).	Role-specific mentions such as PACS needs, P2A panels, OT scheduling, communication workflows.	"As radiology, spend on everything. If (P2) it lags in the scan, then's upload, doctor/keep calling us and emergency cases get delayed!" — Radiology Technician
Perceived Benefits	Perceived advantages attributed to digital adoption.	Efficiency gains, cost/time reduction in handwriting errors, faster report access.	"Digital systems have definitely improved efficiency. Reports come faster, we don't have like the earlier, and patient flow is smoother!" — Junior Doctor (Orthopedics)

Appendix B: Thematic Matrix

Transcript	Thematic Matrix											
	Dependency & Workflow Impact (count)	Performance & Reliability (count)	Trust, Accuracy & Data Concerns (count)	Training, Support & Change Management (count)	Behavioral Resistance & Emotional Response (count)	Role-Specific Needs & Use-Cases (count)	Perceived Benefits (count)					
INTERNAL MEDICINE - SENIOR CONSULTANT	high	36	9	17	44	7	17	4				
GERIATRICS - SENIOR CONSULTANT	high	35	9	17	38	5	23	3				
ANESTHESIOLOGIST - CUSTOMER CARE	high	25	13	14	32	7	15	5				
BRIDING & INSURANCE EXECUTIVE - 1	high	23	14	15	33	6	21	4				
BRIDING & INSURANCE EXECUTIVE - 2	high	26	12	15	30	4	18	7				
EXECUTIVE - CUSTOMER CARE	high	25	18	13	32	8	21	5				
IT HEAD	high	35	17	13	38	14	15	3				
SUNIOR (DOCTOR) GYNECOLOGY	high	29	12	14	33	5	22	2				
SUNIOR (DOCTOR) GYNECOLOGY	high	26	12	14	29	4	28	3				
MR GASTRO - SPECIALITY COORDINATOR	high	22	14	13	38	5	22	4				
OTD - STAFF NURSE	high	25	11	15	30	5	13	3				
RECEPTION - CUSTOMER CARE	high	29	11	15	30	5	18	3				
SENIOR EXECUTIVE - CUSTOMER CARE	high	19	4	14	36	7	17	3				
STAFF NURSE - ID	high	23	13	13	33	6	14	3				
UROLOGIST - SPECIALITY COORDINATOR	high	23	18	12	33	3	25	4				

Appendix C: Thematic Heatmap of Keyword Frequency

Transcript	Thematic Heatmap of Keyword Frequency						
	Dependency & Workflow Impact (count)	Performance & Reliability (count)	Trust, Accuracy & Data Concerns (count)	Training, Support & Change Management (count)	Behavioral Resistance & Emotional Response (count)	Role-Specific Needs & Use-Cases (count)	Perceived Benefits (count)
INTERNAL MEDICINE - SENIOR CONSULTANT	36	9	17	44	7	17	4
GERIATRICS - SENIOR CONSULTANT	35	9	17	38	5	23	3
ANESTHESIOLOGIST - CUSTOMER CARE	25	13	14	32	7	15	5
BRIDING & INSURANCE EXECUTIVE - 1	24	14	15	33	6	21	4
BRIDING & INSURANCE EXECUTIVE - 2	27	12	15	30	4	18	7
EXECUTIVE - CUSTOMER CARE	25	18	13	32	8	21	5
IT HEAD	35	17	13	38	14	15	3
SUNIOR (DOCTOR) GYNECOLOGY	29	12	14	33	5	22	2
SUNIOR (DOCTOR) GYNECOLOGY	26	12	14	29	4	28	3
MR GASTRO - SPECIALITY COORDINATOR	22	14	13	38	5	22	4
OTD - STAFF NURSE	25	11	15	30	5	13	3
RECEPTION - CUSTOMER CARE	29	11	15	30	5	18	3
SENIOR EXECUTIVE - CUSTOMER CARE	19	4	14	36	7	17	3
STAFF NURSE - ID	23	13	13	33	6	14	3
UROLOGIST - SPECIALITY COORDINATOR	23	18	12	33	3	25	4

Appendix D: Keywords for Themes

1. Dependency & Workflow Impact

Used for: workflow reliance, system dependency, stoppages

Keywords: system, workflow, flow, routine, stop, queue, discharge

2. Performance & Reliability

Used for: speed issues, lag, system crashes

Keywords: lag, slow, hang, crash, server, sync, mismatch, error

3. Trust, Accuracy & Data Concerns

Used for: trust, correctness, duplicate patient files

Keywords: trust, accuracy, wrong, duplicate, privacy, security

4. Training, Support & Change Management

Used for: learning, support, updates

Keywords: training, support, update, rollout, IT (like IT team, IT support, IT department)

5. Behavioral Resistance & Emotional Response

Used for: emotional reactions to technology

Keywords: stress, resist, hesitant, fear, frustrate, panic

6. Role-Specific Needs & Use-Cases

Used for: PACS, TPA, OT, vitals, etc.

Keywords: PACS, TPA, OT, immunization, vitals, scan

7. Perceived Benefits

Used for: advantages and positive impacts

Keywords: efficiency, improve, faster, continuity, save