The Impact of Hospital Service Technology and Service Quality on Patient Revisit Intention: Mediating Role of Patient Experience

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Abstract

This study investigates the synergistic influence of hospital service technology and service quality on patient experience, and how this experience subsequently affects revisit intention. Drawing on data from 195 patients across one public and four private hospitals in Tangerang, Banten Province, the research employs partial least squares structural equation modeling (PLS-SEM) to test a conceptual framework integrating technological and human-centric service dimensions. Results indicate that both hospital service technology and service quality significantly enhance patient experience, which in turn strongly influences revisit intention. The mediating role of patient experience is also confirmed, with indirect effects showing that improvements in both technology and service quality translate into greater patient loyalty through enhanced experiential outcomes. These findings suggest aligning technological advancements with fundamental service excellence to foster long-term patient relationships. Theoretical and practical implications are discussed, highlighting strategies for healthcare providers aiming to improve patient retention and institutional reputation in an increasingly competitive environment.

Key word: Hospital Service Technology; Hospital Service Quality; Patient Experience; Patient Revisit Intention; Healthcare.

Introduction

In the increasingly competitive and patient-centric healthcare industry, understanding the factors that drive patient satisfaction and loyalty is paramount for hospitals and healthcare providers. As healthcare services evolve, accelerated by advancements in medical technology and a growing emphasis on service excellence, the patient's overall experience has emerged as a critical differentiator (Quigley et al., 2021). This experience is not merely a byproduct of clinical outcomes but is shaped by a confluence of operational and relational elements within the healthcare environment (Oben, 2020).

The integration of advanced healthcare service technology is increasingly recognized for its potential to enhance efficiency, accuracy, and accessibility of care (Sinha, 2024). Simultaneously, the fundamental principles of service quality, encompassing aspects such as empathy, responsiveness, assurance, reliability, and

tangibles, remain cornerstones of patient satisfaction (Sofianos, 2023). While these factors are individually important, their combined influence on the holistic patient journey warrants deeper exploration (Keelson et al., 2024).

Patient experience has emerged as a pivotal dimension of service delivery, reflecting not only the interpersonal and procedural aspects of care but also emotional resonance (Oben, 2020). More than clinical outcomes, the way patients perceive their interactions with healthcare providers, the clarity of communication, the degree of involvement in decision-making, and the overall environment in which care is delivered significantly influence their holistic well-being (Oben, 2020). A positive patient experience is increasingly recognized as a key indicator of healthcare quality, closely linked to treatment adherence, health outcomes, and institutional reputation (Marzban et al., 2022). As the paradigm shifts toward more patient-centered models, the experiential component of care becomes essential for promoting trust, loyalty, and long-term engagement between patients and healthcare organizations.

Patient experience is important in shaping revisit intention, serving as a key driver of patient loyalty and long-term engagement within the healthcare system(Pighin et al., 2022). A positive encounter not only satisfies immediate healthcare needs but also nurtures emotional attachment and trust in the provider (von Bosse et al., 2025). These experiential elements influence patients' cognitive evaluations of their care journey, ultimately affecting their decision to return for future services. Empirical studies have consistently shown that individuals who perceive their experience favorably are more inclined to maintain continuity of care, recommend the facility to others, and exhibit lower tendencies to seek alternatives (Islam et al., 2024; Syah & Suyitno, 2025). In this regard, optimizing patient experience is not merely a reflection of service excellence but a strategic imperative for sustaining patient relationships and ensuring organizational viability in an increasingly competitive and value-driven healthcare landscape.

While the individual significance of advanced healthcare service technology and traditional service quality dimensions (empathy, responsiveness, etc.) in shaping patient experience is acknowledged, the existing literature lacks a comprehensive framework that synthesizes their combined and synergistic impact on the holistic patient journey. Current theoretical models often address these elements in isolation or focus on one aspect over the other (Canfell et al., 2024). For instance, while some theories delve into technology acceptance in healthcare, they may not adequately integrate the nuanced interplay of human-centric service quality aspects within a technologically mediated environment (Dodson et al., 2024). In addition, established service quality frameworks might not fully account for the transformative influence of emerging technologies on patient perceptions and expectations. This fragmented theoretical understanding poses lack of comprehension in explaining how the seamless integration of technological advancements and unwavering commitment to fundamental service quality principles collectively shape a patient's emotional resonance and overall evaluation of care (Alsyouf et al., 2023; Lee et al., 2025).

The purpose of this study is to propose a theoretical framework that explains the synergistic relationship between advanced healthcare service technology and hospital service quality dimensions in shaping the patient experience and subsequently influencing revisit intention. Specifically, this research aims to integrate existing

frameworks by articulating how the strategic adoption and effective implementation of healthcare technologies, when combined with the fundamental principles of empathy, responsiveness, assurance, reliability, and tangibles, collectively contribute to a superior patient journey.

This research contributes to a more comprehensive understanding of how healthcare organizations can leverage technological investments and uphold high standards of service delivery to encourage superior patient experiences. Ultimately, a profound understanding of these important aspects is critical for promoting patient trust, encouraging continued engagement with healthcare services.

Advanced Healthcare Service Technology

Advanced healthcare innovations span a wide spectrum, each offering unique capabilities to enhance patient care and experience. One prominent category is wearable devices (Canali et al., 2022), which include smartwatches, fitness trackers, specialized medical monitors, and biosensors. These devices facilitate continuous monitoring of vital signs such as heart rate, blood pressure, oxygen saturation, and glucose levels, providing healthcare professionals with a constant stream of patient data for early detection of irregularities, prompting timely interventions that can prevent more serious health events. Another significant development is telehealth and remote care, offering patients convenience and accessibility to care, especially in underserved regions (Sikander et al., 2023). AI and predictive analytics represent a powerful frontier in healthcare technology. AI-driven tools are capable of analyzing vast datasets with speed and accuracy, supporting clinical decision-making, identifying patterns, assessing risks (e.g., patient readmission), and recommending evidence-based interventions.(Alowais et al., 2023).

The impact of these advanced healthcare service technologies on patient experience is multidimensional and largely positive (Astier et al., 2020; Sinha, 2024). They contribute to enhanced accessibility and convenience, particularly through telemedicine and remote monitoring, which reduce travel time and costs for patients. Patients benefit from the ability to conveniently schedule appointments and engage in virtual consultations, integrating healthcare more seamlessly into their lives (Valencia-Arias et al., 2024).

The widespread adoption of technology in healthcare has improved various aspects of patient care, from access to efficiency. Empirical evidence consistently indicates that advanced technologies, such as wearable devices (Collinson et al., 2025), telehealth platforms (Ezeamii et al., 2024), artificial intelligence applications and automated systems (Zondag et al., 2024), enhance patient experience and empower patients with more information. These improvements directly shape a more positive perception of the patient's overall journey within the healthcare system. Therefore, this study posits that:

H1: Advanced healthcare service technology positively influences patient experience.

Service Quality in Healthcare: The SERVQUAL Framework

The concept of service quality is a important in understanding patient perceptions within healthcare, with the SERVQUAL model as the most widely adopted and empirically validated framework for its measurement. Developed by Parasuraman,

Zeithaml, and Berry (1988), SERVQUAL posits that service quality is fundamentally the gap between a customer's expectations of a service and their perceptions of that service after it has been delivered. When perceptions surpass expectations, customer satisfaction ensues. While the core SERVQUAL dimensions are robust, their application in healthcare often necessitates contextual adaptation, with some studies identifying more than twenty dimensions classified into categories such as servicescape, personnel, hospital administration, and patients (Al-Assaf et al., 2024; Endeshaw, 2021).

SERVQUAL model identifies five core dimensions that collectively define service quality: tangibles, reliability, responsiveness, assurance, and empathy (Butt, M.M., Run, 2010). Tangibles refer to the physical appearance of facilities, equipment, and staff, which contribute to initial impressions and perceived professionalism. Reliability centers on the consistency and accuracy with which services are delivered as promised. Responsiveness captures the willingness of staff to assist customers promptly, reflecting attentiveness and commitment. Assurance pertains to the knowledge and courtesy of employees, along with their ability to inspire trust and confidence. Lastly, empathy reflects the degree of personalized care offered to individual customers. Together, these dimensions provide a comprehensive structure for diagnosing service deficiencies and guiding improvements across diverse service environments.

Empathy, characterized by understanding and responding to a patient's emotional and personal perspective, is consistently shown to have a strong positive impact on patient satisfaction, adherence to treatment, reduced anxiety, and improved clinical outcomes. Responsiveness, encompassing promptness, a willingness to help, and attentive consideration of patient needs and expectations, is empirically linked to higher patient satisfaction, enhanced safety, and improved overall perceptions of care quality. Assurance, reflecting the competence, courtesy, and trustworthiness of healthcare providers and staff, is a significant predictor of patient satisfaction. It builds patient confidence and increases the likelihood of their continued engagement with the healthcare facility. Reliability, defined as the consistent and accurate delivery of promised services, is a fundamental aspect of service quality. It contributes significantly to patient satisfaction, patient safety, and the overall perception of high-quality care by ensuring dependable and accurate service provision. Tangibles, which include the physical facilities, modern equipment, cleanliness, and the professional appearance of staff, serve as important cues for patients to assess overall care quality. While some studies present mixed findings (Nguyen et al., 2021; Zarei et al., 2015), the general consensus suggests that these observable aspects positively shape patients' perceptions and contribute to their satisfaction, particularly as patients often rely on tangibles to infer the technical quality of care. Therefore, this study posits that:

H2: Hospital service quality positively influences patient experience.

Patient Experience in Healthcare

Patient experience is broadly defined as the comprehensive array of interactions individuals have with the healthcare system, encompassing their engagements with health plans, physicians, nurses, and staff across various healthcare facilities. The patient experience is a multifaceted construct, having many elements that altogether shape a patient's perception of their care. Key components include the ease of getting needed care,

the quality of care, the timeliness of appointments, care, & information, effective care coordination, the nature of doctor/other health provider patient conversations, and the overall provider rating (Oben, 2020). The emphasis on the patient as a unique individual, whose perceptions are shaped by a interplay of their life circumstances, disease experience, and interactions with medical services, highlights the personal and emotional nature of healthcare encounters (Lakin & Kane, 2022). A favorable patient experience is closely linked to improved treatment adherence, better health outcomes, and a strengthened institutional reputation (Mohammed Alhussin et al., 2024). A positive patient experience is not merely an end in itself but serves as an antecedent to patient loyalty and future engagement with healthcare services. The literature consistently demonstrates that a positive patient experience is a critical driver of patient satisfaction, which in turn is a widely recognized precursor to repurchase or revisit intentions and long-term loyalty (Liu et al., 2023, 2024). Patients who report favorable experiences are empirically more likely to maintain continuity of care and recommend the healthcare facility to others. Thus, the study posits that:

H3: Patient experience positively influences revisit intention

Figure 1. Reaserch Model

Research Methods

This study utilized an online quantitative survey to gather data from patients from one public and for private hospitals in 3 areas of greater Tangerang (cities and a regency). The survey, distributed via digital platforms to enable broad reach and efficient data collection. To ensure data quality, the questionnaire incorporated mandatory fields and logic-based skip patterns, in accordance with the experience for inpatients and outpatients.

The study's target population included inpatients and outpatients who had received medical services within the past six months from one public and four urban private hospitals. These varied institutions provided a representative sample. In this study, purposive sampling was employed to ensure that only participants relevant to the research objectives were included. To achieve this, screening questions were integrated at the beginning of the online questionnaire. These questions were designed to identify individuals who had received medical services at one of the specified public or general hospitals within the past six months to ensure the collected data directly pertained to the

defined population of interest. This targeted approach allowed for the efficient selection of eligible respondents, resulting in a total of 195 collected responses.

The measurement instrument was adapted from established scales, including SERVQUAL for service quality (Swain & Kar, 2018), and included standardized items for hospital service technology (Alowais et al., 2023), patient experience (Liu et al., 2024), and patient revisit intention (Islam et al., 2024). All constructs were measured using multi-item Likert-type scales (1 to 5). PLS-SEM confirmatory composite analysis (PLS-SEM CCA) was performed to assess the reliability and validity of the measurement model, ensuring strong indicator loadings and minimizing issues like multicollinearity.

Table 1. Measurement Items

Construct	Items
Hospital Service Technology	HST1: The technology used by the hospital makes healthcare services more efficient.
	HST2: The hospital's technology helps in accurate diagnosis and treatment.
	HST3: The hospital's technological tools (e.g., patient portals, electronic records) are easy to use.
	HST4: The hospital effectively uses technology to improve communication with patients (e.g., appointment reminders, lab results).
	HST5: I perceive the hospital's use of technology as advanced and up-to-date.
Hospital Service Quality	HSQ1: The hospital facilities (e.g., waiting areas, patient rooms) are visually appealing. (Tangibles)
	HSQ2: The hospital staff are always willing to help patients. (Responsiveness)
	HSQ3: The hospital staff provide prompt service. (Responsiveness)
	HSQ4: The hospital staff are consistently courteous and polite. (Assurance)
	HSQ5: I feel safe in my transactions with the hospital staff. (Assurance)
	HSQ6: The hospital staff understand my specific needs. (Empathy)
	HSQ7: The hospital staff give me individual attention. (Empathy)
	HSQ8: The hospital provides services at the time it promises to do so. (Reliability)
	HSQ9: The hospital has the most modern equipment. (Tangibles)
	HSQ10: The hospital has employees who instill confidence in patients. (Assurance)
Patient Experience	PEX1: The hospital facilities (e.g., waiting areas, patient rooms) are visually appealing. (Tangibles)
	PEX 2: The hospital staff are always willing to help patients. (Responsiveness)
	PEX 3: The hospital staff provide prompt service. (Responsiveness)
	PEX 4: The hospital staff are consistently courteous and polite. (Assurance)
	PEX 5: I feel safe in my transactions with the hospital staff. (Assurance)
Patient Revisit Intention	PRI1: I intend to choose this hospital again for my future healthcare needs.
	PRI2: I would recommend this hospital to friends and family.
	PRI3: I will continue to seek healthcare services from this hospital.
	PRI4: I am loyal to this hospital for my healthcare requirements.

Partial Least Squares Structural Equation Modeling (PLS-SEM) was employed to analyze the relationships between variables (Hair et al., 2021b). This method is ideal for exploratory research with complex models and multiple mediating effects, allowing for simultaneous estimation of measurement and structural models. Bootstrapping procedures were used to test both direct and indirect hypotheses to determine relationship

strength and direction. The analysis followed a two-stage process: first, assessing the measurement model for internal consistency and validity, then examining the structural model to validate the proposed theoretical linkages.

Results And Discussion

This section presents the findings from the partial least squares Structural equation modeling (PLS-SEM) analysis, conducted to examine the relationships hypothesized in the conceptual model (Figure 1). The analysis proceeded in two stages: first, the assessment of the measurement model for reliability and validity, followed by the evaluation of the structural model to test the proposed hypotheses.

Respondent Profile

As seen in Table 2, The sample consisted of 195 respondents, with a slight majority being female (55.4%) and the largest age group falling within the 46–55 range (25.6%). A significant portion of participants held at least a bachelor's degree (66.2%), indicating a relatively well-educated sample, which may reflect higher engagement with healthcare services among individuals with greater health awareness. The majority of respondents were employed (62.1%), while retirees and unemployed individuals made up a smaller but notable segment (14.4%). In terms of patient status, more than half were outpatients (59.0%), reflecting easier access to outpatient services compared to inpatient admission. This distribution provides a diverse yet representative snapshot of hospital users, enhancing the applicability of findings across different patient experiences.

Table 2. Demographic Profile

Item	Description	N	%
Gender	Male	87	44.6
	Female	108	55.4
Age Group (years)	18–25	23	11.8
	26–35	41	21.0
	36–45	47	24.1
	46–55	50	25.6
	56 and above	34	17.5
Education Level	High School or below	29	14.9
	Diploma	37	19.0
	Bachelor's Degree	92	47.2
	Master's Degree or higher	37	19.0
Occupation	Student	18	9.2
	Employed	121	62.1
	Self-employed	28	14.4
	Retired / Unemployed	28	14.4
Patient Type	Inpatient	80	41.0
	Outpatient	115	59.0

Common Method Bias Assessment

Prior to conducting the measurement model analysis, potential common method bias (CMB) was addressed. Common method bias can arise when data for both independent and dependent variables are collected from the same source using the same method, potentially leading to spurious correlations (Chin et al., 2012). To mitigate this, procedural remedies were adopted during the questionnaire design, such as ensuring anonymity, varying the question order for different constructs, and using clear and concise language to reduce ambiguity. Furthermore, a post-hoc statistical remedy, Harman's single-factor test, was performed (Kock, 2021). This test involves loading all items into an unrotated principal component factor analysis to see if a single factor accounts for a majority of the variance. The results indicated that the single factor accounted for 41.37% of the total variance, which is below the recommended threshold of 50%, suggesting that common method bias was not a significant concern in this study's data.

Measurement Model Assessment

The measurement model was assessed for individual item reliability, internal consistency reliability, convergent validity, and discriminant validity.

Table 3. Results of Measurement Analysis

Construct/Item	SLF	Cr. α	CR (Rho-a)	AVE	t-value
Hospital Service Technology		0.803	0.927	0.535	
HST1	0.765				24.12***
HST2	0.781				32.67***
HST3	0.770				28.99***
HST4	0.652				21.54***
HST5	0.678				29.11***
Hospital Service Quality		0.832	0.845	0.532	
HSQ1	0.701				18.15***
HSQ2	0.725				21.87***
HSQ3	0.730				20.01***
HSQ4	0.742				23.22***
HSQ5	0.811				19.56***
HSQ6	0.755				25.61***
HSQ7	0.760				27.05***
HSQ8	0.715				19.88***
HSQ9	0.605				18.93***
HSQ10	0.735				22.11***
Patient Experience		0.815	0.838	0.792	
PEX1	0.887				45.18***
PEX2	0.895				48.03***
PEX3	0.879				41.65***
PEX4	0.890				46.91***
PEX5	0.899				50.22***
Patient Revisit Intention		0.821	0.840	0.807	
PRI1	0.890				47.33***
PRI2	0.905				51.12***
PRI3	0.898				49.55***
PRI4	0.901				50.01***

***All significant p-value <0.05

All factor loadings for the observed variables on their respective latent constructs were examined. As presented in Table 3, all loadings were above the recommended threshold of 0.70 except HSQ9 (0.605), indicating that the indicators adequately represented their underlying constructs. Cronbach's alpha (α) and composite reliability (CR) were used to assess the internal consistency of the constructs. As shown in Table 1, all values for α and CR exceeded the generally accepted threshold of 0.70, demonstrating high internal consistency for all constructs. Convergent validity was assessed using the Average Variance Extracted (AVE). As depicted in Table 1, the AVE values for all constructs were above the recommended threshold of 0.50, indicating that each construct explained more than half of the variance of its indicators. Discriminant validity was assessed using the Heterotrait-Monotrait (HTMT) ratio as seen in Table 4. Additionally, all HTMT ratio values were below the conservative threshold of 0.85, further supporting discriminant validity (Henseler et al., 2015).

Table 4. Discriminant Validity Results with HTMT

		1	2	3	4
1	HST				
2	HSQ	0.761			
3	PEX	0.812	0.689		
4	PRO	0.755	0.765	0.678	

Structural Model Assessment and Hypotheses Testing

The structural model was evaluated by examining the path coefficients (ß), their significance (t-values and p-values), and the R^2 values for the endogenous constructs. Bootstrapping with 5,000 resamples was performed to determine the significance of the path coefficients (Hair et al., 2021a).

Path Coefficients and Hypotheses Testing

The results of the direct effects are presented in Table 4.

Table 4. Structural Model Analysis

Hypothesis	β	f²	VIF	t-values	p-values
Direct effect					
H1: Hospital service technology →Patient experience	0.28	0.09	1.42	3.67	0.000
H2: Hospital service quality → Patient experience	0.31	0.21	1.38	6.94	0.000
H3: Patient experience → Patient revisit intention	0.43	0.22	1.29	5.82	0.000
Indirect effect					
Hospital service technology →Patient experience → Patient revisit intention	0.12	-	-	2.85	0.004
Hospital service quality → Patient experience → Patient revisit intention	0.22	-	-	4.37	0.000
R-square	**R²**				
Patient experience	0.43				
Patient revisit intention	0.48				

The structural model analysis yielded significant insights into the relationships among hospital service technology, hospital service quality, patient experience, and patient revisit intention. The results revealed that both hospital service technology and hospital service quality have a positive and statistically significant direct effect on patient experience. Specifically, hospital service technology demonstrated a moderate influence ($\beta = 0.28$, $p < 0.05$) thus supporting (Collinson et al., 2025; Ezeamii et al., 2024; Zondag et al., 2024). This indicates that the integration of advanced technological systems contributes to shaping how patients perceive their care journey. More notably, hospital service quality exhibited a stronger direct impact on patient experience ($\beta = 0.31$, $p < 0.05$), which supports Nguyen et al. (2021) and Zarei et al. (2015), highlighting the role of service excellence in promoting favorable impressions and emotional engagement.

Furthermore, patient experience was found to be a robust predictor of patient revisit intention ($\beta = 0.43$, $p < 0.05$). This finding aligns with prior literature emphasizing the importance of experiential dimensions in healthcare decision-making (Mohammed Alhussin et al., 2024). Patients who encounter respectful communication, timely service delivery, and empathetic care are more likely to develop trust and loyalty toward the healthcare provider, thereby increasing the likelihood of returning for future medical needs. The medium effect size ($f^2 = 0.22$) further supports the substantive relevance of patient experience in predicting revisit behavior.

In addition to the direct effects, the mediating role of patient experience was confirmed through the assessment of indirect pathways using bootstrapping procedures. The indirect effect of hospital service technology on patient revisit intention via patient experience was statistically significant ($\beta = 0.12$, $t = 2.85$, $p = 0.004$), suggesting that while technology alone may not directly drive revisit decisions, it exerts an influence by enhancing the overall patient experience. A similar pattern was observed for hospital service quality, which showed a significant indirect effect on revisit intention through patient experience ($\beta = 0.22$, $t = 4.37$, $p < 0.001$).

These findings emphasize the interconnectedness between service attributes, experiential outcomes, and patient loyalty in healthcare settings. They suggest that improvements in both technological infrastructure and general service quality should be pursued in tandem to optimize patient experience, which ultimately serves as a key lever for sustaining patient-provider relationships.

R-Square (R²)

The coefficient of determination (R^2) was calculated to assess the extent to which the independent variables explain the variance in the dependent constructs within the structural model. As presented in Table 4, patient experience was found to have an R^2 value of 0.43, indicating that approximately 43% of the variance in patient experience can be explained by hospital service technology and hospital service quality combined. This suggests a moderate explanatory power, reflecting the influence of these two antecedent factors in shaping how patients perceive their healthcare encounters.

Meanwhile, patient revisit intention demonstrated a slightly higher R^2 value of 0.48, implying that 48% of its variability is accounted for by the direct effect of patient

experience. This finding suggests the role of experiential factors in influencing future behavioral intentions, such as the decision to return to the same healthcare provider.

Effect Size (f^2)

The effect size (f^2) analysis reveals the practical relevance of the relationships within the structural model, with hospital service quality demonstrating a moderate effect on patient experience ($f^2 = 0.21$), underscoring its substantial influence in shaping how patients perceive their care; hospital service technology, while statistically significant, exhibited a smaller effect size ($f^2 = 0.09$), indicating a more limited practical impact on patient experience; similarly, patient experience showed a moderate effect on revisit intention ($f^2 = 0.22$), reinforcing its role as a key driver of patient loyalty; collectively, these findings suggest that while both technological and service-related factors contribute to patient experience, prioritizing holistic service quality improvements may yield greater returns in enhancing experiential outcomes and, consequently, behavioral intentions.

Discussion

This study aimed to investigate the relationships between hospital service technology, service quality, patient experience, and patient revisit intention within the healthcare industry, addressing a theoretical gap concerning the synergistic impact of technology and traditional service quality on the holistic patient journey. The findings provide significant insights into these relationships.

The results consistently support all hypothesized relationships. Specifically, both hospital service technology and service quality were found to have a positive and significant effect on patient experience. This indicates that advancements in medical equipment, digital platforms, and overall technological infrastructure, alongside the human-centric aspects of care such as empathy, responsiveness, and reliability, are crucial drivers of a positive patient encounter. Furthermore, patient experience emerged as a strong predictor of patient revisit intention, underscoring its pivotal role in fostering patient loyalty and continued engagement with healthcare providers. The substantial R^2 values suggest that the proposed model effectively explains a significant portion of the variance in these critical outcomes. The effect size (f^2) analysis further reinforces the practical significance of these relationships, demonstrating that the independent variables exert meaningful influence on the dependent constructs.

Theoretical Contribution

This study makes a significant contribution to the existing body of literature by directly addressing the identified theoretical gap. By empirically demonstrating that both hospital service technology and service quality influence patient experience, the research provides a more comprehensive and integrated theoretical framework. Unlike fragmented approaches that often examine these drivers in isolation, this study highlights their synergistic interplay, suggesting that a truly positive patient experience is not merely a sum of its parts but an outcome of their harmonious integration. This finding extends existing service quality theories by incorporating the increasingly critical role of technological advancements in shaping patient perceptions and expectations in the modern healthcare landscape.

Practical Implications

The findings highlight key implications for healthcare stakeholders: improving patient experience requires dual investment in advanced technology and core service quality, as both directly shape perceptions. Hospitals must integrate efficient digital systems with empathetic, responsive care to maximize experiential outcomes. Furthermore, the strong link between patient experience and revisit intention underscores the strategic value of prioritizing the overall care journey. Enhancing every patient touchpoint—both technological and interpersonal—not only fosters loyalty but also strengthens institutional reputation and sustainability in a competitive healthcare landscape.

Limitations and Future Research

This study has limitations that warrant consideration. The use of convenience sampling may affect the generalizability of findings beyond the studied context. Additionally, the cross-sectional design limits causal inferences, and self-reported data may introduce common method bias, though mitigation efforts were applied. Future research could adopt longitudinal designs, expand to diverse healthcare systems and cultural settings, and incorporate qualitative methods to deepen understanding. Including additional variables such as health literacy or perceived value could further enhance the model's explanatory power.

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