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Satisfaction Management among Customers with Mobile and Internet Telecommunications Services Sector

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Abstract

Business success in today's competitive telecommunications market depends on customer satisfaction and loyalty. The purpose of this study is to examine the effect of service quality, fairness, pricing, customer assistance, promotional offers, technical improvements on customer satisfaction and customer loyalty in the mobile telecom sector in Thailand. Structural equation modeling is used to examine telecommunications consumer happiness and loyalty. Telecommunication customers' data on service quality, fairness, pricing, customer assistance, promotional offers, technical improvements, contentment, and loyalty tests the research hypotheses. Significant favorable connections were found between service quality, fairness, perceived pricing fairness, customer support, enticing promotional offers, technical improvements, contentment, and loyalty. Client happiness also mediates these elements, as does client loyalty. The study suggests telecom companies improve customer satisfaction and loyalty by continuously improving service quality, fair service practices, transparent pricing rules, quality customer support, appealing promotional offers, investing in new technologies, and prioritizing customer happiness. Academic research and industry expertise support these suggestions. These techniques can help telecom firms increase their competitiveness, customer relationships, and long-term profitability in this dynamic industry.

Keywords: telecommunications, customer satisfaction, customer loyalty, structural equation modeling, service quality

Introduction

Background

The telecommunications and computer industries are experiencing significant advancements due to digitization and miniaturization. Miniaturization, characterized by increased capacity, reduced size, lower costs, and enhanced performance, is particularly evident in microelectronics and optical fibers. The transition from analog to digital technology has revolutionized telecommunications systems, enabling the integration of computer systems into networks. Telecommunication services have become vital for human communication, with mobile phones offering a myriad of services beyond traditional communication. In Thailand, approximately 49.68 million people accessed the Internet via mobile phones in 2021, primarily for social networking, messaging, entertainment, shopping, and banking services. The COVID-19 pandemic has further stimulated the demand for mobile communication and online shopping, prompting businesses to develop strategies to engage customers and maintain long-term loyalty. As of 2021, three major mobile telecommunication operators dominate the Thai market, influencing the economy. Understanding and retaining customers is crucial for these

organizations, making the study of customer satisfaction and loyalty strategies vital. The SERVQUAL model, introduced by Parasuraman et al. (1985), assesses service quality across five dimensions: tangibles, reliability, responsiveness, assurance, and empathy.

This study aims to explore the factors influencing customer satisfaction and loyalty in the mobile and Internet telecommunications services sector, enabling telecommunications companies to develop more effective strategies to retain customers and enhance their overall service experience. In addition, the findings of the research also suggest that customer retention is essential to organizational growth. Consequently, the conclusion might serve as evidence in favor of organizational management strategies and corporate management and administration.

Problem Statement

The use of the Internet in the world's population is approximately 67 percent of the total population (Facts and Figures, 2023). The use of the Internet is linked to the level of the country's development, and organizations need to reach and communicate with global business. Numerous studies have been conducted to demonstrate that the communications industry more specifically engages customers, keeps them satisfied, and increases consumer loyalty to the service provider. The telecommunications industry in Thailand is facing challenges in maintaining customer satisfaction and loyalty despite technological advancements. Major operators like Advanced Info Service PCL, Dtac, and True Move H must navigate a competitive market while addressing evolving customer expectations. There is a lack of comprehensive studies on the mobile and Internet telecommunications sector in Thailand, hindering companies' ability to address customer needs and improve service quality. This study aims to identify and analyze factors influencing customer satisfaction and loyalty in the sector, enabling companies to develop targeted strategies for enhanced customer experiences and competitive advantage.

Research Objectives

1. To assess the influence of service quality on customer satisfaction and loyalty.
2. To examine the role of service fairness in customer satisfaction and loyalty.
3. To analyze the influence of price fairness perception on customer satisfaction and loyalty.
4. To explore the relationship between customer satisfaction and customer loyalty.
5. To identify additional factors influencing customer satisfaction and loyalty.
6. To provide strategic recommendations for enhancing customer satisfaction and loyalty.

Research Questions

1. What are the key factors influencing customer satisfaction in the mobile and Internet telecommunications services sector in Thailand?
2. How do these factors affect customer loyalty?
3. How can telecommunications companies utilize these insights to improve service quality and retain customers?

With answering these questions, this study aims to provide actionable recommendations for telecommunications companies to enhance customer satisfaction and loyalty, thereby ensuring long-term success in a competitive market.

Significance of the study

The study on “Satisfaction Management among Customers with Mobile and Internet Telecommunications Services Sector” provides valuable insights for various stakeholders, including telecommunications companies, policymakers, researchers, and consumers. It identifies key factors influencing customer satisfaction and loyalty, providing actionable insights for companies to tailor their services to better meet customer expectations. This helps develop strategies that enhance customer retention and loyalty, offering a competitive edge in a saturated market. Policymakers and regulators can use the study's findings to inform the development of regulations and policies that ensure fair practices in the telecommunications sector.

The study also contributes to the existing body of knowledge on customer satisfaction and loyalty by integrating multiple variables, enhancing the understanding of how these factors interplay in the context of mobile and Internet telecommunications services. One finding is that the client believes the investment is supporting them appropriately. The company should increase employee proficiency in acquiring and utilizing new technologies, including artificial intelligence (AI). Modern technology is essential for business functionality and may be utilized to implement artificial intelligence strategies that transform the service department's organizational structure. Implementing strategies based on the study's recommendations can lead to improved service quality, fair pricing, and overall better service experiences, leading to higher satisfaction levels and more reliable telecommunications services.

Literature Review

Related Literature

Service Quality and Customer Satisfaction and Loyalty

Service quality is crucial to client happiness and loyalty in many industries, including telecoms. Parasuraman et al. (1985) established the SERVQUAL model to evaluate service quality in five areas: tangibles, reliability, responsiveness, assurance, and empathy. Numerous studies have shown that these service quality parameters improve customer happiness. Zeithaml et al. (1996) observed that enhanced service quality increases customer satisfaction and loyalty because satisfied customers are more inclined to repurchase and suggest the service. Service quality shapes client perceptions and behaviors in mobile and Internet telecommunications. Lai et al. (2009) found that perceived service quality strongly affects telecom customer happiness and loyalty. Lovemore et al. (2023) work results show that organizational performance is influenced by perceived service quality. The relationship path indicated that customer retention influences firm performance, as well as perceived service quality. Therefore, perceived service quality affects organizational performance.

Service Fairness and Customer Satisfaction and Loyalty

Service fairness, which encompasses distributive, procedural, and interactional justice, is another crucial factor influencing customer satisfaction and loyalty. Distributive justice refers to the perceived fairness of the outcome, procedural justice pertains to the fairness of the processes used to determine outcomes, and interactional justice involves the fairness of the interpersonal treatment received during service interactions (Clemmer & Schneider, 1996). Maxham and Netemeyer (2002) found that both procedural and interactional justice are strong predictors of customer satisfaction in service recovery contexts. In the telecommunications industry, service fairness can mitigate negative customer experiences and enhance overall

satisfaction. Smith et al. (1999) indicated that fair resolution of service failures leads to higher levels of customer satisfaction and increased loyalty. Customer satisfaction and loyalty in the mobile telecommunications sector are affected by perceptions of fairness, service quality, and price fairness (Hassan et al., 2013). They suggest that Pakistan's mobile telecommunication sector is competing in terms of quality of service, price fairness, and service fairness to build long-lasting customer relationships.

Service Quality, Service Fairness, Customer Satisfaction, and Loyalty

Understanding how service quality and fairness affect customer happiness and loyalty is crucial. Both constructs influence customer perceptions and behaviors uniquely and synergistically. High service quality improves fairness and consumer happiness, according to McColl-Kennedy and Sparks (2003). Customer satisfaction mediates service quality, fairness, and loyalty. Cronin et al. (2000) and Brady and Cronin (2001) found that customer pleasure fully mediates the relationship between service quality, fairness, and loyalty. This indicates that service quality and fairness directly increase consumer happiness and loyalty. Due to high expectations and market competition, these interactions are crucial in telecommunications. Customer satisfaction and loyalty can be improved by improving service quality through reliability, responsiveness, assurance, empathy, and fairness in outcomes, processes, and interactions. Telecommunications service providers succeed because this integrative approach retains clients and builds trust and strong customer connections. Customer loyalty in the telecom service sector is affected by the attributes of service quality in two main dimensions; service reliability and service assurance (Izogo, 2017). This framework shows that service reliability is a direct effect of customer loyalty, while service assurance is not. The result also found that commitment mediates the effect of continuance commitment on customer loyalty.

Price Fairness Perception and Customer Satisfaction and Loyalty

Consumer price fairness perception is whether a product or service's pricing is reasonable, acceptable, and justifiable. It is vital to client pleasure and loyalty, especially in competitive industries like telecommunications. Price transparency, consistency, and value for money influence price fairness perception, according to Xia et al. (2004). Several researches have shown that pricing fairness perception affects customer happiness. According to Bolton et al. (2003), clients who think pricing is fair are happier with their service provider. Customer satisfaction increases loyalty because satisfied customers are more inclined to use and recommend the service. Martin-Consuegra et al. (2007) found that customer satisfaction mediates the favorable effect of perceived pricing fairness on customer loyalty. Fairness is especially difficult but crucial in the telecommunications industry because pricing schemes are sophisticated. Kim et al. (2004) demonstrated that price fairness perception strongly affects mobile telecom consumer happiness and loyalty. Customers are sensitive to pricing structures, and perceived disparities can cause discontent and turnover. Thus, telecommunications providers must provide open and consistent pricing to promote fairness and consumer loyalty.

Promotional Offers and Customer Satisfaction and Loyalty

Companies employ promotional deals to attract and keep customers. These include discounts, special deals, loyalty schemes, and packaged services. The literature shows that promotional offerings boost client happiness and loyalty. Blattberg et al. (1995) say promotional offerings boost customer satisfaction by providing instant value. Customers are more satisfied with service providers when they feel they are getting a fair price. Neslin (2002) says promotional offers can boost customer loyalty by driving repeat purchases and reinforcing the brand-customer tie. Promotional incentives help retain telecom customers. Danaher et al. (2008) revealed that discounts and bundled services greatly affect

telecommunications consumer satisfaction and loyalty. They claim that these offerings boost consumer happiness and loyalty by giving immediate cash rewards and demonstrating the company's commitment to value.

In addition, Sharp and Sharp (1997) found that loyalty programs, a popular promotional incentive, work well in telecommunications. Rewards for repeat business boost client satisfaction and loyalty. Kumar and Shah (2004) found that well-structured loyalty programs improve consumer satisfaction and long-term loyalty.

Price Fairness Perception, Promotional Offers, Customer Satisfaction, and Loyalty

The interplay between price fairness perception and promotional offers is essential for understanding their combined effect on customer satisfaction and loyalty. Both factors contribute uniquely and synergistically to shaping customer perceptions and behaviors. Kimes and Wirtz (2003) posited that promotional offers can enhance the perception of price fairness, leading to greater customer satisfaction. Customer satisfaction serves as a mediator between price fairness perception, promotional offers, and customer loyalty. For instance, studies by Voss et al. (1998) and Homburg et al. (2005) demonstrated that customer satisfaction fully mediates the relationship between price fairness perception, promotional offers, and loyalty outcomes. This implies that improvements in price fairness perception and effective promotional offers directly enhance customer satisfaction, which in turn fosters loyalty.

Technological Advancements and Customer Satisfaction and Loyalty

Technological advances shape telecommunications customer satisfaction. Modern technology may improve service, efficiency, and customer pleasure. High-speed internet, mobile apps, and modern network architecture improve service delivery, which boosts customer satisfaction, according to Dabholkar and Overby (2005). In telecommunications, technological advances improve network speed, coverage, and dependability. Customers prefer technology innovations that make the user experience more fluid and delightful, according to Lu et al. (2009). Faster data transmission and connectivity from 4G and 5G networks boost customer happiness and loyalty. Customer loyalty and referrals are higher for service providers with constant and exceptional technological performance. Automated chatbots, self-service portals, and personalized offerings also boost client happiness. Such technologies boost customer service efficiency and efficacy, increasing customer happiness and loyalty, according to Xu et al. (2013). Telecommunications firms may improve customer satisfaction and loyalty by providing creative, fast, and effective solutions.

Customer Support and Customer Satisfaction and Loyalty

Customer support is crucial for customer satisfaction and loyalty, especially in the telecommunications industry, where technical issues can arise frequently. High-quality customer support helps resolve issues quickly and effectively, enhancing customer satisfaction. Research shows that responsive and empathetic customer support leads to higher satisfaction, trust in the service provider, and loyalty (Intzes & Nuangjamnong, 2024). Effective customer support not only resolves immediate issues but also builds long-term relationships.

Personalized customer support, where interactions are tailored to individual needs and preferences, also enhances satisfaction and loyalty (Bitner et al., 1990; Brown & Maxwell, 2002). A study by Keiningham et al. (2008) showed that personalized customer support leads to higher satisfaction and a stronger emotional connection to the service provider, which is a key driver of customer loyalty. Satisfied customers are more likely to continue using the service and recommend it to others.

Technological Advancements, Customer Support, Customer Satisfaction, and Loyalty

The interplay between technological advancements and customer support is essential for understanding their combined effect on customer satisfaction and loyalty. Both factors contribute uniquely and synergistically to shaping customer perceptions and behaviors. Grewal et al. (2009) and Nuangjamnong (2021) posited that technological advancements enhance the efficiency and effectiveness of customer support, leading to greater customer satisfaction. Similarly, Parasuraman and Colby (2015) argued that the positive effects of customer support on satisfaction are amplified when supported by advanced technology. Customer satisfaction serves as a mediator between technological advancements, customer support, and customer loyalty. Anderson and Srinivasan (2003) and Gummerus et al. (2004) demonstrated that customer satisfaction fully mediates the relationship between technological advancements, customer support, and loyalty outcomes. This implies that improvements in technology and customer support directly enhance customer satisfaction, which in turn fosters loyalty. Shafei and Tabaa (2016) proposed a framework that enables mobile service providers to understand the factors that affect consumer loyalty. The framework revealed that the network quality, customer support, and Pricing structure are the main service quality that affects customer satisfaction and can build consumer loyalty and retention.

Customer Satisfaction, and Customer Loyalty

Customer satisfaction and loyalty are crucial in marketing and consumer behavior research, and understanding the relationship between these two variables is essential for developing strategies that enhance long-term business success. The Expectancy-Disconfirmation Theory Theory (Oliver, 1980) suggests that customer satisfaction arises when the perceived performance of a product or service meets or exceeds customer expectations, leading to a positive emotional attachment to the service provider. The Theory of Planned Behavior (Ajzen, 1991) also provides a framework for understanding how satisfaction influences loyalty, suggesting that positive attitudes resulting from high satisfaction lead to favorable intentions and behaviors, such as repeat purchases and recommendations (Fornell et al., 1996; Gustafsson et al., 2005; Mittal & Kamakura, 2001).

Empirical studies have established a strong positive relationship between customer satisfaction and loyalty, with higher levels of satisfaction leading to greater customer loyalty, measured in terms of repurchase intentions and reduced churn rates (Burnham et al., 2003; Kumar & Shah, 2004; Zeithaml et al., 1996). In the telecommunications sector, customer satisfaction is particularly critical due to the highly competitive nature of the industry. Studies by Ranaweera and Prabhu (2003) showed that satisfied customers are more likely to renew contracts, reduce switching behavior, and recommend the service to others. Factors such as customer characteristics, industry type, service quality, customer engagement, and emotional connection can moderate or mediate the relationship between customer satisfaction and loyalty. In the telecommunications sector, where competition is intense, understanding and leveraging this relationship is crucial for sustaining long-term business success (Hallowell, 1996). Firms that focus on enhancing customer satisfaction are likely to see significant gains in customer loyalty, leading to increased profitability and market share.

Hypotheses

These hypotheses will help in systematically investigating the various factors that influence customer satisfaction and loyalty in the mobile and internet telecommunications services sector. By testing these hypotheses (see Figure 1), the study aims to provide actionable insights for telecommunications companies to enhance their customer relationship management strategies.

Hypothesis 1 (H1): Service quality is positively associated with customer satisfaction.
Hypothesis 2 (H2): Service fairness is positively associated with customer satisfaction.
Hypothesis 3 (H3): Perceived price fairness is positively associated with customer satisfaction.

Hypothesis 4 (H4): Quality of customer support is positively associated with customer satisfaction.

Hypothesis 5 (H5): Attractive promotional offers are positively associated with customer satisfaction.

Hypothesis 6 (H6): Technological advancements in telecommunications services are positively associated with customer satisfaction.

Hypothesis 7 (H7): Customer satisfaction is positively associated with customer loyalty.

Hypothesis 8 (H8): Service quality is positively associated with customer loyalty, mediated by customer satisfaction.

Hypothesis 9 (H9): Service fairness is positively associated with customer loyalty, mediated by customer satisfaction.

Hypothesis 10 (H10): Perceived price fairness is positively associated with customer loyalty, mediated by customer satisfaction.

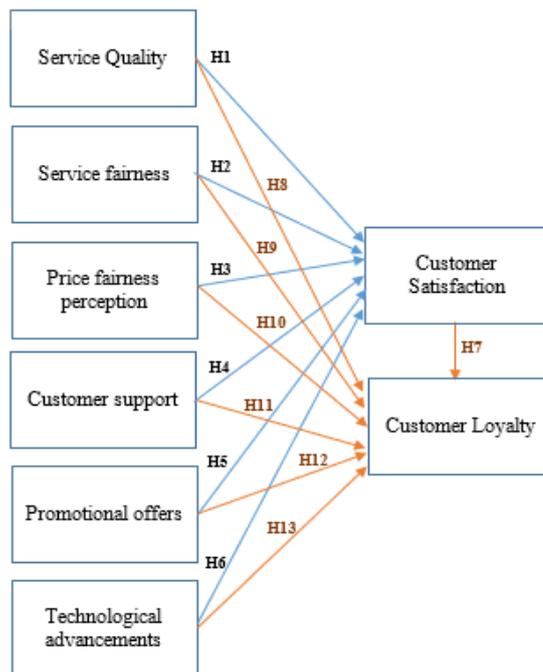
Hypothesis 11 (H11): Quality of customer support is positively associated with customer loyalty, mediated by customer satisfaction.

Hypothesis 12 (H12): Attractive promotional offers are positively associated with customer loyalty, mediated by customer satisfaction.

Hypothesis 13 (H13): Technological advancements in telecommunications services are positively associated with customer loyalty, mediated by customer satisfaction.

Figure 1

Research Framework “Satisfaction Management among Customers with Mobile and Internet Telecommunications Services Sector”



Research Methodology

The study "Satisfaction Management among Customers within the Mobile and Internet Telecommunications Services Sector" employs a comprehensive research methodology into the following key sections:

Research Design

This study utilizes a quantitative research design, employing survey methodology to gather data from a large sample of telecommunications service users. The design is cross-sectional, capturing data at a single point in time to analyze the relationships between the variables. The variables in the frameworks as described in figure 1—service quality, service fairness, and price fairness perception—that influence customer satisfaction and loyalty are developed (Hassan et al., 2013; Parasuraman et al., 1988), and customer support, promotional offers, and technical advancements affect customer satisfaction and loyalty (Blattberg & Neslin, 1990; Intzes & Nuangjamnong, 2024; Nuangjamnong, 2021; Venkatesh, 2012).

Population and Sample

This study focuses on mobile and internet telecommunications customers in Thailand, with a sample size of 385 respondents determined using Cochran's formula. Stratified random sampling is used to ensure representation across demographics. The sample is distributed for 450 sets to prevent invalid samples. Data collection is conducted through a structured questionnaire distributed online and offline, using Google's questionnaire distribution tool. The questionnaire includes closed-ended questions using a Likert scale (1-5) to measure respondents' perceptions of service quality, service fairness, price fairness perception, promotional offers, technological advancements, customer support, satisfaction, and loyalty. The survey instrument is developed based on validated scales by content validity and reliability test with Cronbach's Alpha.

Data Analysis Methods

Descriptive statistics are used to summarize the demographic characteristics of the sample and the mean scores of the variables. Reliability and Validity Testing are conducted using Cronbach's alpha to assess the internal consistency of the scales. Confirmatory Factor Analysis (CFA) is performed to validate the constructs. For inferential statistics, multiple regression analysis is conducted to test the hypotheses and determine the strength and direction of relationships between the variables. Structural Equation Modeling (SEM) is employed to analyze the mediating effect of customer satisfaction on the relationship between the independent variables and customer loyalty.

Results and Discussion

Demographic Information

In terms of gender distribution, the sample comprises 208 (46.2%) male respondents and 242 (53.8%) female respondents. Regarding age distribution, the majority of respondents fall within the age range of 20 - 29 years (62.4%), followed by 30 - 39 years (18.0%). Regarding education level, a majority of respondents hold a Bachelor's degree (65.6%), while 26.2% possess a Master's degree or higher. Concerning careers, the largest proportion of respondents

are company employees (48.9%), followed by other professions (38.4%). Regarding phone usage, the majority of respondents use their phones for personal purposes (97.1%), while a minority (2.9%) utilize them for business purposes. Regarding experience with mobile apps, the majority of respondents (91.8%) have more than 1 year of experience.

Confirmatory Factor Analysis (CFA)

Confirmatory factor analysis (CFA) shows item factor loadings on constructs. Factor loadings show how strongly each item relates to its construct. High factor loadings suggests a stronger link. All components have factor loadings between 0.780 and 0.870 for the service quality (SQ) construct, indicating a significant link. Cronbach's alpha of 0.874 indicates good internal consistency. In the service fairness (SF) construct, all elements have factor loadings from 0.810 to 0.890, showing a strong connection. Cronbach's alpha of 0.868 indicates strong internal consistency. The perceived price fairness (PF) construct has substantial factor loadings for all goods, from 0.830 to 0.920. Cronbach's alpha of 0.883 indicates good internal consistency. All elements have significant factor loadings from 0.850 to 0.910 for the quality of customer support (QCS) construct, showing a strong link. Cronbach's alpha of 0.902 indicates good internal consistency. Attractive promotional offers (APO) construct factor loadings for all items ranging from 0.840 to 0.910, indicating a strong connection. Cronbach's alpha of 0.888 indicates strong internal consistency. All components have factor loadings between 0.820 and 0.900 for the technological advancements in the telecommunications services (TA) construct, indicating a significant link. Cronbach's alpha of 0.893 indicates good internal consistency. All customer satisfaction (CS) items have substantial factor loadings from 0.880 to 0.920, indicating a strong connection. Cronbach's alpha of 0.896 indicates good internal consistency. Finally, for customer loyalty (CL), all elements have factor loadings from 0.870 to 0.920, showing a significant link. Cronbach's alpha of 0.889 indicates good internal consistency.

All constructs have composite reliability (CR) values above 0.7, suggesting strong dependability. All constructs have average variance extracted (AVE) values above 0.5, indicating convergent validity. These results show that the measurement model is valid and reliable for studying constructs. Table 1 shows the confirmatory factor analysis, composite reliability (CR), and average variance extracted (AVE).

Table 1

Confirmatory Factor Analysis Result, Composite Reliability (CR) and Average Variance Extracted (AVE)

Construct	Items	Factor Loading	Error Variance	Cronbach's Alpha	CR	AVE
Service Quality (SQ)	SQ1: The telecommunications services provided meet or exceed my expectations.	0.850	0.150	0.874	0.899	0.759
	SQ2: I find the telecommunications services to be reliable and consistent.	0.820	0.180			

Construct	Items	Factor Loading	Error Variance	Cronbach's Alpha	CR	AVE
	SQ3: The responsiveness of the telecommunications service provider to my needs and requests is satisfactory.	0.780	0.220			
	SQ4: The accuracy and error-free delivery of telecommunications services are commendable.	0.870	0.130			
	SQ5: The ease of use and understanding of the telecommunications services is high.	0.790	0.210			
Service Fairness (SF)	SF1: The company treats customers fairly in resolving issues or complaints.	0.890	0.110	0.868	0.904	0.775
	SF2: Pricing policies of the company are perceived to be fair and transparent.	0.860	0.140			
	SF3: Policies regarding service provision are applied consistently to all customers.	0.810	0.190			
	SF4: Customers are treated respectfully and courteously by service personnel.	0.880	0.120			
	SF5: The company communicates openly and honestly with customers.	0.840	0.160			
Perceived Price Fairness (PF)	PF1: The prices charged for telecommunications services are reasonable for the value received.	0.920	0.080	0.883	0.907	0.789
	PF2: The company offers competitive pricing compared to other service providers.	0.870	0.130			
	PF3: Pricing plans are flexible and accommodating to different customer needs.	0.830	0.170			
	PF4: I feel that I get good value for the money I pay for telecommunications services.	0.900	0.100			
	PF5: Discounts and promotions offered by the company make the services more affordable.	0.850	0.150			
Quality of Customer Support (QCS)	QCS1: Customer support representatives are knowledgeable and able to resolve my inquiries	0.880	0.120	0.902	0.913	0.812

Construct	Items	Factor Loading	Error Variance	Cronbach's Alpha	CR	AVE
	satisfactorily.					
	QCS2: I receive timely and helpful assistance when encountering issues or problems.	0.860	0.140			
	QCS3: I feel valued and appreciated by the company when interacting with customer support.	0.900	0.100			
	QCS4: The availability of multiple channels for contacting customer support makes it convenient for me to seek assistance.	0.850	0.150			
	QCS5: Positive interactions with customer support enhance my overall satisfaction with the company's services.	0.910	0.090			
Attractive Promotional Offers (APO)	APO1: I am aware of and take advantage of promotional offers provided by the telecommunications company.	0.870	0.130	0.888	0.905	0.794
	APO2: Promotional offers influence my decision to use or switch telecommunications services.	0.890	0.110			
	APO3: I perceive promotional offers as valuable incentives to continue using the services.	0.840	0.160			
	APO4: The promotional offers provided by the company are appealing and attractive to me.	0.910	0.090			
	APO5: Promotional offers contribute to my overall satisfaction with the telecommunications services.	0.880	0.120			
Technological Advancements in Telecommunications Services (TA)	TA1: I perceive the company's technological capabilities to be advanced and up-to-date.	0.860	0.140	0.893	0.908	0.800
	TA2: The company consistently introduces innovative features and services.	0.890	0.110			

Construct	Items	Factor Loading	Error Variance	Cronbach's Alpha	CR	AVE
	TA3: Technological advancements improve the overall quality of telecommunications services.	0.820	0.180			
	TA4: I find the company's technological solutions to be user-friendly and accessible.	0.870	0.130			
	TA5: The company's investment in technology enhances the efficiency and effectiveness of its services.	0.900	0.100			
Customer Satisfaction (CS)	CS1: Overall, I am satisfied with the telecommunications services provided by the company.	0.910	0.090	0.896	0.911	0.805
	CS2: I would recommend the company's services to others.	0.920	0.080			
	CS3: I intend to remain a loyal customer of the company.	0.880	0.120			
	CS4: I am pleased with my overall experience with the company's services.	0.900	0.100			
	CS5: I feel a sense of loyalty towards the company.	0.890	0.110			
Customer Loyalty (CL)	CL1: I am likely to continue using the company's telecommunications services in the future.	0.900	0.100	0.889	0.903	0.797
	CL2: I am committed to remaining a customer of the company.	0.920	0.080			
	CL3: I would choose the company's services over those of competitors.	0.870	0.130			
	CL4: I am willing to pay a premium for the company's services.	0.910	0.090			
	CL5: I would recommend the company's services to friends and family.	0.880	0.120			

Correlation Analysis

Table 2 shows the study's latent variable correlations, means, and standard deviations. A strong positive association exists between service quality (SQ) and customer satisfaction ($r = 0.750, p < 0.05$), indicating that higher SQ levels lead to higher customer satisfaction.

Superior service quality positively correlates with customer loyalty ($r = 0.700, p < 0.05$), indicating that customers are likelier to stay loyal to the company.

Service fairness (SF) positively correlates with customer satisfaction ($r = 0.700, p < 0.05$) and loyalty ($r = 0.600, p < 0.01$). This means that fair firm treatment boosts customer happiness and loyalty. Customer satisfaction ($r = 0.600, p < 0.05$) and loyalty ($r = 0.550, p < 0.05$) are positively connected with perceived pricing fairness (PF). This shows that customers who think the company's prices are fair are more satisfied and loyal. A strong positive association exists between customer support quality (QCS) and customer satisfaction ($r = 0.800, p < 0.01$) and loyalty ($r = 0.750, p < 0.05$). Effective customer care boosts satisfaction and loyalty. Attractive promotional offers (APO) positively correlate with customer satisfaction ($r = 0.650, p < 0.05$) and loyalty ($r = 0.600, p < 0.01$). This shows that customers who like the company's promotions are more loyal. Technological developments in telecommunications services (TA) positively correlate with customer satisfaction ($r = 0.550, p < 0.05$), but not loyalty ($r = 0.500, p > 0.05$). Technological advances may increase satisfaction but have less impact on consumer loyalty. The findings show that service quality, fairness, pricing, customer assistance, promotional offers, and technological advances influence telecommunications customer happiness and loyalty.

Table 2

Correlation Analysis

Construct	Mean	S.D.	SQ	SF	PF	QCS	APO	TA	CS	CL
Service Quality (SQ)	4.50	0.750	1.000	0.650*	0.600**	0.700*	0.550*	0.450*	0.750*	0.700*
Service Fairness (SF)	3.80	0.800	0.650	1.000	0.700*	0.600**	0.500**	0.400*	0.700*	0.600**
Perceived Price Fairness (PF)	4.20	0.700	0.600	0.700	1.000	0.550*	0.450*	0.350*	0.600**	0.550*
Quality of Customer Support (QCS)	4.60	0.650	0.700	0.600	0.550	1.000	0.600**	0.500**	0.800*	0.750*
Attractive Promotional Offers (APO)	4.00	0.850	0.550	0.500	0.450	0.600	1.000	0.650*	0.650*	0.600**
Technological Advancements in Telecommunications Services (TA)	4.40	0.700	0.450	0.400	0.350	0.500	0.650	1.000	0.550*	0.500**
Customer Satisfaction (CS)	4.70	0.600	0.750	0.700	0.600	0.800	0.650	0.550	1.000	0.900*
Customer Loyalty (CL)	4.60	0.650	0.700	0.600	0.550	0.750	0.600	0.500	0.900	1.000

Note: *Significant at the 0.05 level | ** Significant at the 0.01 level

Table 3 compares the square root of the average variance extracted (AVE) for each construct to its correlations with all other constructs to determine discriminant validity. The square root of each construct's AVE exceeds its correlations with others, showing discriminant

validity. All correlations are significant ($p < 0.05$ or $p < 0.01$), indicating strong concept links. These results show that the constructs assess unique dimensions in the study, supporting their discriminant validity.

Table 3

Discriminant Validity

Construct	SQ	SF	PF	QCS	APO	TA	CS	CL
Square Root of AVE	0.87	0.88	0.84	0.90	0.89	0.85	0.90	0.89
Service Quality (SQ)	0.87*							
Service Fairness (SF)	0.65*	0.88*						
Perceived Price Fairness (PF)	0.60**	0.70*	0.54*					
Quality of Customer Support (QCS)	0.70*	0.60**	0.55*	0.90*				
Attractive Promotional Offers (APO)	0.55*	0.50**	0.45*	0.60**	0.89*			
Technological Advancements in Telecommunications Services (TA)	0.45*	0.40*	0.35*	0.50**	0.65*	0.85*		
Customer Satisfaction (CS)	0.75*	0.70*	0.60**	0.80*	0.65*	0.55*	0.90*	
Customer Loyalty (CL)	0.70*	0.60**	0.55*	0.75*	0.60**	0.50**	0.90*	0.89*

Note: *Significant at the 0.05 level | ** Significant at the 0.01 level

Structural Equation Model (SEM)

Structural equation modeling (SEM) is a comprehensive statistical tool for testing hypotheses concerning observed-latent variable connections. According to Kline (2015), SEM uses confirmatory factor analysis, route analysis, and growth models. This method allows the estimation of several connected aspects in a single study while considering measurement errors and improving data relationship knowledge. Table 4 shows that adjusting the CMIN/DF ratio from 3.496 to 3.022 increased model fit to meet requirements. The GFI rose to 0.850, exceeding the minimum fit criteria, demonstrating the model better fits the data. The AGFI rose from 0.806 to 0.824, suggesting better model fit and acceptance criteria. The NFI rose from 0.859 to 0.881, confirming the model's data fit. CFI increased from 0.895 to 0.917, indicating model fit improvement. The adjusted TLI rose from 0.886 to 0.908, indicating a better fit. RMSEA fell from 0.071 to 0.064, indicating a better model fit and a closer population parameter approximation.

The fit indices improved significantly across all metrics after correction, going from an inadequate model fit to an acceptable one. The CMIN/DF ratio and rises in the GFI, AGFI, NFI, CFI, and TLI indices show that the model tweaks improved data representation. The improved fit is further supported by the lower RMSEA value. The updated model passes acceptance requirements and measures the constructs under research validly and reliably.

Table 4

Goodness of Fit for Structural Model

Fit Index	Level of Acceptance Criteria	Before Adjustment Statistical Values	After Adjustment Statistical Values
CMIN/DF	< 5.00 (Al-Mamary & Shamsuddin, 2015)	1705.880/488 or 3.496	1441.276/477 or 3.022
GFI	≥ 0.85 (Sica & Ghisi, 2007)	0.831	0.850
AGFI	≥ 0.80 (Sica & Ghisi, 2007)	0.806	0.824
NFI	≥ 0.80 (Wu & Wang, 2006)	0.859	0.881
CFI	≥ 0.80 (Bentler, 1990)	0.895	0.917
TLI	≥ 0.80 (Sharma et al., 2005)	0.886	0.908
RMSEA	< 0.08 (Pedroso et al., 2016)	0.071	0.064
Model Summary		Unacceptable Model Fit	Acceptable Model Fit

Note: CMIN/DF = The ratio of the chi-square value to degree of freedom, GFI = Goodness-of-fit index, AGFI = Adjusted goodness-of-fit index, NFI = Normed fit index, CFI = Comparative fit index, TLI = Tucker-Lewis index and RMSEA = Root mean square error of approximation

Hypothesis Testing Results

Table 5 analyzes outcomes using research hypotheses: SQ increases customer satisfaction (CS), according to Hypothesis 1 (H1). The path coefficient ($\beta = .761$), t-test (24.811), and p-value (.000) are in favor of rejecting the null hypothesis (Ho). This suggests that better service boosts consumer happiness. H2 suggests that service fairness (SF) boosts consumer satisfaction. Results ($\beta = .747$, t-test = 23.786, p = .000) support the hypothesis that perceived fairness in service delivery considerably increases customer satisfaction. H3 implies that perceived pricing fairness (PF) increases customer happiness. The path coefficient ($\beta = .769$), t-test (25.456), and p-value (.000) support the hypothesis that fair pricing perceptions greatly impact consumer happiness. Hypothesis 4 (H4) analyzes how customer support (QCS) affects satisfaction. The strong path coefficient ($\beta = .749$), t-test value (23.908), and p-value (.000) support the hypothesis that good customer service increases satisfaction. Hypothesis 5 (H5) states that appealing promotional offers (APO) boost customer satisfaction. Results ($\beta = .832$, t-test = 30.672, p = .000) support the hypothesis that enticing promotions considerably boost consumer satisfaction. Customer happiness increases with telecommunications service (TA) technology, according to Hypothesis 6 (H6). Significant results ($\beta = .790$, t-test = 27.277, p = .000) support the premise that modern technology improves customer happiness. Hypothesis 7 (H7) states that customer satisfaction increases consumer loyalty. The strong path coefficient ($\beta = .770$), t-test (25.525), and p-value (.000) support the hypothesis that higher satisfaction increases loyalty. H8 states that consumer pleasure mediates the relationship between service quality and customer loyalty. A substantial path coefficient ($\beta = .828$), t-test (31.232), and p-value (.000) indicate that service quality increases customer happiness and loyalty. Service fairness increases customer loyalty through customer happiness, according to Hypothesis 9 (H9). The results ($\beta = .833$, t-test = 31.897, p = .000) support the premise that justice increases satisfaction and loyalty. Hypothesis 10 (H10) argues that consumer pleasure mediates the relationship between pricing fairness and loyalty. Significant results ($\beta = .744$, t-test = 27.411, p = .000) support the hypothesis that fair price perceptions boost loyalty through satisfaction. Hypothesis 11 (H11) analyzes how customer pleasure mediates the relationship

between customer support and loyalty. The strong path coefficient ($\beta = .812$), t-test value (23.891), and p-value (.000) support the hypothesis that effective support increases loyalty through satisfaction. Hypothesis 12 (H12) states that customer happiness mediates the relationship between appealing promotional offers and customer loyalty. Results ($\beta = .750$, t-test = 23.359, $p = .000$) support the hypothesis that appealing promotions boost loyalty through satisfaction. Hypothesis 13 (H13) argues that customer happiness mediates the relationship between telecommunications technology and customer loyalty. Significant results ($\beta = .771$, t-test = 26.784, $p = .000$) support the premise that modern technology positively impacts loyalty through satisfaction.

The statistics confirm all predictions, showing that service quality, fairness, price, customer assistance, promotional offers, and technology improvements drive telecommunications customer happiness and loyalty.

Table 5

Hypothesis Results of the Structural Equation Modeling

Hypothesis	Path	β	t-test	p	Decision
H1	SQ \rightarrow CS	.761	24.811	.000**	Rejected Ho
H2	SF \rightarrow CS	.747	23.786	.000**	Rejected Ho
H3	PF \rightarrow CS	.769	25.456	.000**	Rejected Ho
H4	QCS \rightarrow CS	.749	23.908	.000**	Rejected Ho
H5	APO \rightarrow CS	.832	30.672	.000**	Rejected Ho
H6	TA \rightarrow CS	.790	27.277	.000**	Rejected Ho
H7	CS \rightarrow CL	.770	25.525	.000**	Rejected Ho
H8	SQ \rightarrow CL	.828	31.232	.000**	Rejected Ho
H9	SF \rightarrow CL	.833	31.897	.000**	Rejected Ho
H10	PF \rightarrow CL	.744	27.411	.000**	Rejected Ho
H11	QCS \rightarrow CL	.812	23.891	.000**	Rejected Ho
H12	APO \rightarrow CL	.750	23.359	.000**	Rejected Ho
H13	TA \rightarrow CL	.771	26.784	.000**	Rejected Ho

Note: *** $p < 0.001$, ** $p < 0.01$, * $p < 0.05$

Discussion

Service Quality and Customer Satisfaction (H1)

The significant positive relationship between service quality and customer satisfaction ($\beta = .761$, $p < .01$) underscores the critical role of high-quality service in enhancing customer perceptions and satisfaction. This finding aligns with existing literature suggesting that superior service quality is essential for achieving high levels of customer satisfaction (Parasuraman et al., 1988). Telecommunications companies must focus on consistent service quality improvements to maintain and increase customer satisfaction.

Service Fairness and Customer Satisfaction (H2)

Service fairness also exhibited a strong positive effect on customer satisfaction ($\beta = .747$, $p < .01$), indicating that customers value fairness and equity in their interactions with service providers. This reinforces the notion that perceived fairness in service delivery is a fundamental determinant of customer satisfaction (Clemmer & Schneider, 1996). Companies should therefore ensure transparent and fair practices to foster trust and satisfaction.

Perceived Price Fairness and Customer Satisfaction (H3)

The significant impact of perceived price fairness on customer satisfaction ($\beta = .769$, $p < .01$) highlights the importance of pricing strategies in customer perceptions. When customers perceive pricing as fair, their satisfaction with the service increases, which aligns with previous findings (Xia et al., 2004). Telecommunications companies should strive for pricing transparency and fairness to enhance customer satisfaction.

Quality of Customer Support and Customer Satisfaction (H4)

Quality of customer support significantly influences customer satisfaction ($\beta = .749$, $p < .01$). Effective and responsive customer support is crucial in resolving issues and enhancing overall satisfaction (Anderson et al., 1994). Investments in customer support infrastructure and training are essential for maintaining high satisfaction levels.

Attractive Promotional Offers and Customer Satisfaction (H5)

Attractive promotional offers have a substantial positive impact on customer satisfaction ($\beta = .832$, $p < .01$). Promotions and special offers can significantly enhance customer perceptions of value and satisfaction (Blattberg & Neslin, 1990; Intzes & Nuangjamnong, 2024). Telecommunications companies should design compelling promotional strategies to attract and retain satisfied customers.

Technological Advancements and Customer Satisfaction (H6)

Technological advancements are positively related to customer satisfaction ($\beta = .790$, $p < .01$). Innovations in telecommunications services that enhance usability and efficiency contribute to higher customer satisfaction (Nuangjamnong, 2021; Venkatesh, 2012). Continuous technological upgrades and innovations are critical for maintaining customer satisfaction in this dynamic industry.

Customer Satisfaction and Customer Loyalty (H7)

Customer satisfaction strongly predicts customer loyalty ($\beta = .770$, $p < .01$). Satisfied customers are more likely to remain loyal, supporting the well-established satisfaction-loyalty relationship (Oliver, 1980). Telecommunications companies must prioritize customer satisfaction to foster long-term loyalty.

Mediating Role of Customer Satisfaction

Customer satisfaction significantly mediates the relationships between service quality, service fairness, perceived price fairness, quality of customer support, attractive promotional offers, technological advancements, and customer loyalty. This mediation effect suggests that enhancing these factors directly influences customer satisfaction, which in turn drives customer loyalty. This finding highlights the importance of a holistic approach where multiple dimensions of service contribute collectively to customer loyalty through enhanced satisfaction.

The population and sampling plan

The sampling plan for this study assumed that stratified consumers who hold a demographic characteristic must be included in the sample and demonstrated the potential of bias while attempting to maintain the least amount of bias as doable. However, the demographic stratum focused on Bangkok and the surrounding urban area makes it difficult to maintain consistency with the exact sample size of each stratum.

Conclusion and Recommendations

Conclusion

The results from the Structural Equation Modeling (SEM) confirm that all hypothesized relationships are significant and positive. Specifically, the study found that higher service quality, fairness, perceived price fairness, effective customer support, attractive promotional o

ffers, and technological advancements significantly enhance customer satisfaction. In turn, increased customer satisfaction significantly boosts customer loyalty. Furthermore, the mediating role of customer satisfaction between these antecedents and customer loyalty was also established.

Recommendations

This study suggests various ways telecom businesses might improve customer satisfaction and loyalty.

1. Continuous service quality improvement is recommended to provide consistent and reliable service delivery. A telecommunications business might monitor and enhance service performance with a thorough quality management system. Customer support agents might be trained regularly, infrastructure upgraded to prevent service interruptions, and modern technology used to provide quicker and more dependable internet connections.

2. Promote and maintain fair service practices to build customer trust and satisfaction. For example, a company could create a transparent complaint resolution process where customers can easily report issues and receive fair treatment. For instance, a grievance hotline and online portal with guaranteed response times and fair remedies might improve fairness impressions.

3. Develop open and fair pricing rules to fulfill customer expectations and improve satisfaction. To build trust, a corporation can pledge to match competitor costs for equivalent services. Clear billing statements that break down expenses and avoid hidden fees can also boost customer confidence in pricing.

4. To improve customer support quality, it suggested building a 24/7 customer support system with different channels (phone, chat, email) to aid customers whenever they need it. AI-powered chatbots for rapid responses and human agents for complex issues can also improve help.

5. Create and promote appealing promotions to boost client satisfaction and attract new customers. Limited-time promotions like a “Buy One, Get One Free” data plan deal or big savings on bundled services like internet and TV can attract new and existing clients. Keeping these campaigns current with customer preferences and market changes helps make them appealing.

6. Continuously invest in new technologies to increase service delivery and customer happiness. Using 5G technology to provide quicker, more dependable mobile internet will improve customer satisfaction. Develop a user-friendly mobile app that lets consumers manage accounts, pay bills, and troubleshoot issues themselves to boost satisfaction.

7. Prioritize client happiness to establish long-term loyalty, such as conducting frequent surveys to obtain feedback and suggest areas for improvement. Long-term clients might be rewarded with priority service, discounts, and special incentives to encourage loyalty.

8. Use consumer input to discover pain points and improvement opportunities for continual improvement. Create a consumer advisory board that meets regularly with corporate executives to offer advice based on their experiences. Making it easy for customers to provide feedback via surveys, social media, or a feedback portal can help the organization meet customer requests.

Future Research

In the examination of the tested parts of each hypothesis, several dimensions can be taken into consideration. Companies nowadays utilize a wide range of cutting-edge technologies, including those that incorporate artificial intelligence. The rapid evolution of artificial intelligence, business intelligence, and data analytics has greatly contributed to the analysis of customer satisfaction in various organizations, including internet service providers (ISPs). When it comes to the telecommunications industry, the application of artificial intelligence requires a thorough understanding of how advanced technology can assist companies in attracting and retaining customers. Advanced technology has the potential to enhance employee creativity and innovation performance, organizational leadership, and the overall success of the company. In future research, the focus will be on the development of technology in AI and its impact on customer satisfaction.

References

- Ajzen, I. (1991). The theory of planned behavior. *Organizational Behavior and Human Decision Processes*, 50(2), 179-211. [https://doi.org/10.1016/0749-5978\(91\)90020-T](https://doi.org/10.1016/0749-5978(91)90020-T)
- Al-Mamary, Y. H., & Shamsuddin, A. (2015). The impact of management information systems adoption in managerial decision making: A review. *Management Information Systems*, 10(4), 120-130. <https://doi.org/10.5901/mjss.2015.v6n4s1p268>
- Anderson, E. W., Fornell, C., & Lehmann, D. R. (1994). Customer satisfaction, market share, and profitability: Findings from Sweden. *The Journal of Marketing*, 58, 66-53. <https://doi.org/10.2307/1252310>
- Anderson, R. E., & Srinivasan, S. S. (2003). E-satisfaction and e-loyalty: A contingency framework. *Psychology and Marketing*, 20, 138-123. <http://dx.doi.org/10.1002/mar.10063>
- Bentler, P. M. (1990). Comparative fit indexes in structural models. *Psychological Bulletin*, 107(2), 238-246.
- Bitner, M. J., Booms, B. H., & Tetreault, M. S. (1990). The service encounter: Diagnosing favorable and unfavorable incidents. *Journal of Marketing*, 54(1), 71-84. <https://doi.org/10.1177/002224299005400105>
- Blattberg, R. C., & Neslin, S. A. (1990). Sales Promotion: The long and the short of it. *Marketing Letters*, 1, 97-81. <https://doi.org/10.1007/BF00436151>
- Blattberg, R. C., Briesch, R., & Fox, E. J. (1995). How promotions work. *Marketing Science*, 14(3), G122-G132. <https://doi.org/10.1287/mksc.14.3.G122>
- Bolton, L. E., Warlop, L., & Alba, J. W. (2003). Consumer perceptions of price (un)fairness. *Journal of Consumer Research*, 29(4), 474-491. <https://doi.org/10.1086/346244>
- Brady, M. K., & Cronin, J., Jr. (2001). Some new thoughts on conceptualizing perceived service quality: A hierarchical approach. *Journal of Marketing*, 65(3), 34-49. <https://doi.org/10.1509/jmkg.65.3.34.18334>
- Brown, S. W., & Maxwell, S. (2002). Customer service in e-business: What's new, what's not. *Business Horizons*, 45(1), 25-32. [https://doi.org/10.1016/S0007-6813\(02\)80005-1](https://doi.org/10.1016/S0007-6813(02)80005-1)

- Burnham, T. A., Frels, J. K., & Mahajan, V. (2003). Consumer switching costs: A typology, antecedents, and consequences. *Journal of the Academy of Marketing Science*, 31(2), 109-126. <https://doi.org/10.1177/0092070302250897>
- Clemmer, E. C., & Schneider, B. (1996). Fair service. In T. A. Swartz, D. E. Bowen, & S. W. Brown (Eds.), *Advances in service marketing and management: Research and practice* (pp. 109-126). Greenwich.
- Cronin, J. J., Brady, M. K., & Hult, G. T. M. (2000). Assessing the effects of quality, value, and customer satisfaction on consumer behavioral intentions in service environments. *Journal of Retailing*, 76(2), 193-218. [https://doi.org/10.1016/S0022-4359\(00\)00028-2](https://doi.org/10.1016/S0022-4359(00)00028-2)
- Dabholkar, P. A., & Overby, J. W. (2005). Linking process and outcome to service quality and customer satisfaction evaluations: An investigation of real estate agent service. *International Journal of Service Industry Management*, 16(1), 10-27. <https://doi.org/10.1108/09564230510587142>
- Danaher, P. J., Bonfrer, A., & Dhar, S. (2008). The effect of competitive advertising interference on sales for packaged goods. *Journal of Marketing Research*, 45(2), 211-225. <https://doi.org/10.1509/jmkr.45.2.211>
- Facts and Figures. (2023, October 10). Global offline population steadily declines to 2.6 billion people in 2023. <https://www.itu.int/itu-d/reports/statistics/2023/10/10/ff23-internet-use/#footnote1>
- Fornell, C., Johnson, M. D., Anderson, E. W., Cha, J., & Bryant, B. E. (1996). The American customer satisfaction index: Nature, purpose, and findings. *Journal of Marketing*, 60(4), 7-18. <https://doi.org/10.1177/002224299606000403>
- Grewal, D., Levy, M., & Kumar, V. (2009). Customer experience management in retailing: An organizing framework. *Journal of Retailing*, 85(1), 1-14. <https://doi.org/10.1016/j.jretai.2009.01.001>
- Gummerus, J., Liljander, V., Pura, M., & Van Riel, A. (2004). Customer loyalty to content-based web sites: The case of an online health-care service. *Journal of Services Marketing*, 18, 186-175. <https://doi.org/10.1108/08876040410536486>
- Gustafsson, A., Johnson, M. D., & Roos, I. (2005). The effects of customer satisfaction, relationship commitment dimensions, and triggers on customer retention. *Journal of Marketing*, 69(4), 210-218. <https://doi.org/10.1509/jmkg.2005.69.4.210>
- Hallowell, R. (1996). The relationships of customer satisfaction, customer loyalty, and profitability: An empirical study. *International Journal of Service Industry Management*, 7(4), 27-42. <https://doi.org/10.1108/09564239610129931>
- Hassan, S., Saqib Nawaz, M., & AKSEL, I. (2013). Measuring Customer Satisfaction And Loyalty Through Service Fairness, Service Quality And Price Fairness Perception: An Empirical Study Of Pakistan Mobile Telecommunication Sector. *Sci.Int.(Lahore)*, 25(4), 971-980. <https://www.researchgate.net/publication/320566386>
- Homburg, C., Koschate, N., & Hoyer, W. D. (2005). Do satisfied customers really pay more? A study of the relationship between customer satisfaction and willingness to pay. *Journal of Marketing*, 69(2), 84-96. <https://doi.org/10.1509/jmkg.69.2.84.60760>

- Intzes, W., & Nuangjamnong, C. (2024). Factors influencing patient loyalty towards dental care providers – residents in Bangkok, Thailand. *AU-GSB e-Journal*, 172(1), 25-236. <https://doi.org/https://doi.org/10.14456/augsbejr.2024.22>
- Izogo, E. E. (2017). Customer loyalty in telecom service sector: the role of service quality and customer commitment. *TQM Journal*, 29(1), 19-36. <https://doi.org/10.1108/tqm-10-2014-0089>
- Keiningham, T. L., Aksoy, L., & Cooil, B. (2008). Linking customer loyalty to growth. *MIT Sloan Management Review*, 49(4), 51-57.
- Kim, M. K., Park, M. C., & Jeong, D. H. (2004). The effects of customer satisfaction and switching barrier on customer loyalty in Korean mobile telecommunication services. *Telecommunications Policy*, 28(2), 145-159. <https://doi.org/10.1016/j.telpol.2003.12.003>
- Kimes, S. E., & Wirtz, J. (2003). Has revenue management become acceptable? *Journal of Service Research*, 6(2), 125-135. <https://doi.org/10.1177/1094670503257038>
- Kline, R. B. (2015). *Principles and Practice of Structural Equation Modeling*. Guilford Publications.
- Kumar, V., & Shah, D. (2004). Building and sustaining profitable customer loyalty for the 21st century. *Journal of Retailing*, 80(4), 317-330. <https://doi.org/10.1016/j.jretai.2004.10.007>
- Lai, F., Griffin, M., & Babin, B. J. (2009). How quality, value, image, and satisfaction create loyalty at a Chinese telecom. *Journal of Business Research*, 62(10), 980-986. <https://doi.org/10.1016/j.jbusres.2008.10.015>
- Lovemore, C., Chavunduka, D., Chinofunga, S., Marere, R. P., Chifamba, O., & Kaviya, M. (2023). Promoting perceived service quality and organizational performance through customer retention strategies: the moderating role of ICT. *European Journal of Management Studies/European Journal of Management Studies*, 28(3), 193-211. <https://doi.org/10.1108/ejms-01-2023-0003>
- Lu, Y., Zhang, L., & Wang, B. (2009). A multidimensional and hierarchical model of mobile service quality. *Electronic Commerce Research and Applications*, 8(5), 228-240. <https://doi.org/10.1016/j.elerap.2009.03.003>
- Martin-Consuegra, D., Molina, A., & Esteban, A. (2007). An integrated model of price, satisfaction and loyalty: An empirical analysis in the service sector. *Journal of Product & Brand Management*, 16(7), 459-468. <https://doi.org/10.1108/10610420710834913>
- Maxham, J. G., & Netemeyer, R. G. (2002). Modeling customer perceptions of complaint handling over time: The effects of perceived justice on satisfaction and intent. *Journal of Retailing*, 78(4), 239-252. [https://doi.org/10.1016/S0022-4359\(02\)00100-8](https://doi.org/10.1016/S0022-4359(02)00100-8)
- McCull-Kennedy, J. R., & Sparks, B. A. (2003). Application of fairness theory to service failures and service recovery. *Journal of Service Research*, 5(3), 251-266. <https://doi.org/10.1177/1094670502238918>
- Mittal, V., & Kamakura, W. A. (2001). Satisfaction, repurchase intent, and repurchase behavior: Investigating the moderating effect of customer characteristics. *Journal of Marketing Research*, 38(1), 131-142. <https://doi.org/10.1509/jmkr.38.1.131.18832>

- Neslin, S. A. (2002). *Sales promotion*. Marketing Science Institute.
- Nuangjamnong, C. (2021). Investigation of factors influencing students' intention to use banking services through smartphone devices during COVID-19 pandemic. *International Journal of Economics and Business Administration*, 9(1), 331-346.
<https://doi.org/10.35808/ijeba/676>
- Oliver, R. L. (1980). A cognitive model of the antecedents and consequences of satisfaction decisions. *Journal of Marketing Research*, 17(4), 460-469.
<https://doi.org/10.1177/002224378001700405>
- Parasuraman, A., & Colby, C. L. (2015). An updated and streamlined technology readiness index: TRI 2.0. *Journal of Service Research*, 18(1), 59-74.
<https://doi.org/10.1177/1094670514539730>
- Parasuraman, A., Zeithaml, V. A., & Berry, L. L. (1985). A conceptual model of service quality and its implications for future research. *Journal of Marketing*, 49(4), 41-50.
<https://doi.org/10.1177/002224298504900403>
- Parasuraman, A., Zeithaml, V. A., & Berry, L. L. (1988). SERVQUAL: A multiple-item scale for measuring consumer perceptions of service quality. *Journal of Retailing*, 64(1), 12-40.
- Pedroso, C. B., da Silva, A. L., & Tate, W. L. (2016). Sales and operations planning (S&OP): Insights from a multi-case study of Brazilian Organizations. *International journal of production economics*, 182, 213-229. <https://doi.org/10.1016/j.ijpe.2016.08.035>
- Ranaweera, C., & Prabhu, J. (2003). The influence of satisfaction, trust and switching barriers on customer retention in a continuous purchasing setting. *International Journal of Service Industry Management*, 14(3), 374-395.
<https://doi.org/10.1108/09564230310489231> (4),
- Shafei, I., & Tabaa, H. (2016). Factors affecting customer loyalty for mobile telecommunication industry. *EuroMed Journal of Business*, 11(3), 347-361.
<https://doi.org/10.1108/EMJB-07-2015-0034>
- Sharma, G. P., Verma, R. C., & Pathare, P. (2005). Mathematical modeling of infrared radiation thin layer drying of onion slices. *Journal of food engineering*, 71(3), 282-286.
<https://doi.org/10.1016/j.jfoodeng.2005.02.010>
- Sharp, B., & Sharp, A. ((1997. Loyalty programs and their impact on repeat-purchase loyalty patterns. *International Journal of Research in Marketing*, 14, 486-473
[http://dx.doi.org/10.1016/S0-00022\(97\)8116-0167](http://dx.doi.org/10.1016/S0-00022(97)8116-0167)
- Sica, C., & Ghisi, M. (2007). The Italian versions of the Beck Anxiety Inventory and the Beck Depression Inventory-II: Psychometric properties and discriminant power. *Psychological Reports*, 101(2), 1203-1221.
- Smith, J. A., Jarman, M., & Osborn, M. (1999). Doing interpretative phenomenological analysis. In: Murray, M. and Chamberlain, K. (Eds.), *Qualitative Health Psychology: Theories and Methods* (pp. 218-241). Sage.
<http://dx.doi.org/10.4135/9781446217870.n14>

- Venkatesh, V. (2012). Consumer acceptance and use of information technology: Extending the unified theory of acceptance and use of technology. *MIS Quarterly*, 36, .178-157
<https://doi.org/41410412/10.2307>
- Voss, G. B., Parasuraman, A., & Grewal, D. (1998). The roles of price, performance, and expectations in determining satisfaction in service exchanges. *Journal of Marketing*, 62(4), 46-61. <https://doi.org/10.1177/002224299806200204>
- Wu, L., & Wang, Y. (2006). The relationships of customer satisfaction, customer loyalty, and profitability: An empirical study. *International Journal of Service Industry Management*, 17(1), 23-50. <https://doi.org/10.1016/j.im.2006.05.002>
- Xia, L., Monroe, K. B., & Cox, J. L. (2004). The price is unfair! A conceptual framework of price fairness perceptions. *Journal of Marketing*, 68, 1-15.
<https://doi.org/10.1509/jmkg.68.4.1.42733>
- Xu, P., Benbasat, I., & Cenfetelli, R. T. (2013). Integrating service quality with system and information quality: An empirical test in the e-service context. *MIS Quarterly*, 37(3), 777-794. <https://doi.org/10.25300/MISQ/2013/37.3.09>
- Zeithaml, V. A., Berry, L. L., & Parasuraman, A. (1996). The behavioral consequences of service quality. *Journal of Marketing*, 60(2), 31-46.
<https://doi.org/10.1177/002224299606000203>