



**MEDIATING EFFECTS OF CUSTOMER PERCEIVED VALUE ON  
RELATIONSHIP AMONG SERVICE QUALITY, CUSTOMER EXPERIENCE  
AND CUSTOMER SATISFACTION OF E-BANKING SERVICES IN  
BANGLADESH**

**By**

**MD ABDUL BASHIR**

**Thesis Submitted to the School of Graduate Studies, Universiti Putra Malaysia,  
in Fulfilment of the Requirements for the Degree of Master of Science**

**June 2022**

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## **DEDICATION**

With utmost gratitude, I would like to dedicate this effect to the souls of my late brother Abdul Mokim, to my dear Father, Mother my beloved spouse, Asma Naznin and to my lovely daughter Fatima Shehrin Bushra and my family's all members.



Abstract of thesis presented to the Senate of Universiti Putra Malaysia in fulfilment of the requirement for the degree of Master of Science

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**June 2022**

**Chairman : Mass Hareeza Ali, PhD**  
**School : Business and Economics**

The banking sector unquestionably plays a critical role in any country's economic development and social growth in terms of wealth generation, which positively affects Gross Domestic Product (GDP). Technological advances have made remote sales and administration of financial services and products possible for years. The banking structure and procedures have been modified and revised daily since its inception. It is acknowledged that the banking industry is the one that is primarily affected by the internet and developments in information communication technology (ICT). Traditional financial services providers and new entrants are exploring e-possibilities. E-banking makes accessing bank accounts online easy, quick, and safe. Information technology is cost-efficient, easy-to-maintain, fast, effective, and competitive. Previous research found that e-banking clients are more responsive to behavioural variables than internal considerations. Behavioural characteristics and e-banking technologies affect customers' online banking experiences and satisfaction. Thus, e-banking adoption directly affects customers' satisfaction with service delivery based on behavioural characteristics. This research examines how customers' perceived value affects e-banking service quality, customers' experience, and customers' satisfaction in Bangladesh. 323 E-Banking clients were surveyed using a standardised questionnaire and random selection. A five point "Likert-Type Scale" has been adopted to measure the direct and indirect effects including independent, dependent, and mediating variables. Five hypotheses were derived from the technology acceptance model (TAM's) assumptions. Descriptive Analysis, Zero Order Karl Pearson's correlation analysis and CB-SEM path analysis were utilised to derive a conclusion. The research found that service quality and customers' experience affect e-banking in Bangladesh. Perceived value mediates the links between service quality, customers' experience, and customer satisfaction. Theoretically, these research results support the assumptions of TAM. This research will help the banking authorities focus more on service quality to improve customer satisfaction by recommending methods to make e-banking smoother, more effective, and

safer. This study is purely quantitative in nature; in future research should be qualitative or mixed to get more accurate scenario regarding this issue. Out of eight divisions, only four divisions have been considered in this study, thus it is suggested to add more divisions to generalize the findings.



Abstrak tesis yang dikemukakan kepada Senat Universiti Putra Malaysia sebagai memenuhi keperluan untuk ijazah Master Sains

**KESAN PENGANTARAAN PERSEPSI NILAI PELANGGAN TERHADAP HUBUNGAN ANTARA KUALITI PERKHIDMATAN, PENGALAMAN PELANGGAN DAN KEPUASAN PELANGGAN BAGI PERKHIDMATAN E-PERBANKAN DI BANGLADESH**

Oleh

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Sektor perbankan tidak dapat dinafikan telah memainkan peranan penting dalam pembangunan ekonomi dan perkembangan sosial di mana-mana negara dari segi penjana kekayaan yang memberi kesan positif kepada Keluaran Dalam Negara Kasar (KDNK). Kemajuan teknologi telah membolehkan penjualan jauh dan pentadbiran perkhidmatan kewangan dan produk mungkin selama bertahun-tahun. Struktur dan prosedur perbankan telah diubah suai dan disemak setiap hari sejak penubuhannya. Memang diakui bahawa industri perbankan adalah yang paling dipengaruhi oleh internet dan perkembangan Teknologi Maklumat dan Komunikasi (ICT). Penyedia perkhidmatan kewangan tradisional dan pendaatang baharu sedang meneroka e-kemungkinan.

Kemajuan teknologi telah membolehkan penjualan jauh dan pentadbiran perkhidmatan kewangan dan produk mungkin selama bertahun-tahun. Penyedia perkhidmatan kewangan tradisional dan pendaatang baharu sedang meneroka e-kemungkinan. E-perbankan menjadikan akses akaun bank dalam talian mudah, cepat dan selamat. Teknologi maklumat adalah kos cecap, mudah diselenggara, cepat, berkesan dan berdaya saing. Kajian lepas mendapati bahawa pelanggan e-perbankan adalah lebih responsif kepada pembolehubah tingkah laku berbanding pertimbangan dalaman. Ciri-ciri tingkah laku dan teknologi e-perbankan mempengaruhi pengalaman dan kepuasan perbankan dalam talian pengguna. Oleh itu, penggunaan e-perbankan secara langsung mempengaruhi kepuasan pengguna terhadap khidmat penghantaran berdasarkan ciri-ciri tingkah laku. Kajian ini mengkaji bagaimana persepsi nilai pelanggan mempengaruhi kualiti perkhidmatan e-perbankan, pengalaman pelanggan dan kepuasan pelanggan di Bangladesh. 323 pelanggan E-perbankan telah ditinjau dengan menggunakan soal selidik piawai dan pemilihan rawak. Faktor bebas, bersandar dan pengantara "Skala Jenis-Likert" lima mata telah diterima pakai untuk mengukur kesan langsung dan tidak

langsung termasuk pembolehubah bebas, bersandar dan pengantara Lima hipotesis telah diperolehi daripada andaian model penerimaan teknologi (TAM). Analisis Deskriptif, Analisis Korelasi Zero Order Karl Pearson dan analisis laluan CB-SEM telah digunakan untuk mendapatkan kesimpulan. Kajian mendapati kualiti perkhidmatan dan pengalaman pelanggan mempengaruhi e-perbankan di Bangladesh. Persepsi nilai pengantara hubungan antara kualiti perkhidmatan, pengalaman pelanggan dan kepuasan pelanggan. Secara teorinya, hasil kajian ini adalah benar. Kajian ini akan membantu pihak berkuasa perbankan lebih fokus kepada kualiti perkhidmatan untuk meningkatkan kepuasan pelanggan dengan mengesyorkan kaedah untuk menjadikan e-perbankan lebih lancar, lebih berkesan dan selamat. Kajian ini adalah secara semulajadi semata-mata bersifat kuantitatif; dalam kajian masa depan sepatutnya bersifat kualitatif atau campuran untuk mendapatkan senario yang lebih tepat berkenaan isu ini. Daripada lapan bahagian, hanya empat bahagian telah dipertimbangkan dalam kajian ini, justeru dicadangkan untuk menambah lebih banyak bahagian untuk membuat generalisasi hasil.

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May Allah bless all of you!



This thesis was submitted to the Senate of the Universiti Putra Malaysia and has been accepted as fulfilment of the requirement for the degree of Master of Science. The members of the Supervisory Committee were as follows:

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## Declaration by Members of Supervisory Committee

This is to confirm that:

- the research conducted and the writing of this thesis was under our supervision;
- supervision responsibilities as stated in the Universiti Putra Malaysia (Graduate Studies) Rules 2003 (Revision 2012-2013) are adhered to.

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## LIST OF ABBREVIATIONS

GDP	Gross domestic product
ICT	Information Communication Technology
E-banking	Electronic Banking
SCBs	States-owned commercial banks
DFIs	States-owned development financial institutions
PCBs	Private Commercial Banks
FCBs	Foreign Commercial Banks
IT	Information Technology
JICA	Japan International Cooperation Agency
E-Trade	Electronic Trade
E-Commerce	Electronic Commerce
BB	Bangladesh Bank
US	United States
UK	United Kingdom
E-Features	Electronic Features
WOM	Word-of-mouth
HSBC	Hongkong and Shanghai Banking Corporation
PEOU	Perceived ease of use
PU	Perceived Usefulness
NHS	National Health Service
USA	United States of America
TAM	Technology Acceptance Model
TPB	Theory of Planned Behavior
TRA	Theory of Reasoned Action
DOI	Digital object identifier



PLCC	Plastic leaded chip carrier
CNG	Compressed natural gas
CFA	Confirmatory factor analysis
ML	Maximum likelihood
AMOS	Asset Management Operating System
GLS	Generalized least squares
SPSS	Statistical Package for the Social Sciences
SEM	Structural Equation Modeling
EM	Expected Maximization
CR	Construct Reliability
AVE	Average variance extracted
CB-SEM	Covariance-Based Structural Equation Modeling
EQS	The EQS Software
GSCA	Generalized Structured Component Analysis
NEUSREL	The NEUSREL Software
SEM-PLS	Structural Equation Modeling- Partial Least Squares
PLS	Partial Least Squares
RMC	Research Management Center
COUNTIF	The COUNTIFS function
PEU	Perceived ease of use
ASSU	Assurance
RES	Responsiveness
CUST	Customer
SAT	Satisfaction
PU	Perceived Usefulness
CPV	Customer Perceived Value
PS	Perceived Security

OIC	Quality Internet Connection
PP	Perceived Privacy
VIF	Variance Inflation Factors
ATM	Automated Teller Machine
IV	Independent Variable
DV	Dependent Variable
CS	Customer Satisfaction



# CHAPTER 1

## INTRODUCTION

### 1.1 Introduction

This insingleroductory chapter provides a brief overview of the research and explores how service quality and customer experience affect customer satisfaction. It also includes a problem statement, priorities, research questions, and the study's scope and significance. Lastly the organization of this thesis provided.

### 1.2 Background of the Study

The banking sector unquestionably plays a critical role in any country's economic development and social growth in terms of wealth generation, which positively affects Gross Domestic Product (GDP). It is regarded as a place of protection and safety as well as a facilitator of financial services. Unlike every other service industry, this sector, with the aid of science and technological innovation, interacts closely with the customers, who have become more critical than ever before. The global banking industry continues to play an essential role in the global economic situation. The banking structure and procedures have been modified and revised daily since its inception. The banking sector is regarded to be the one most impacted by the internet and advancements in information and communication technology (ICT) (Rudra et al., 2021). Due to this expansion, e-banking services now have a practical and adaptable payment mechanism (Ahmad et al, 2021).

This quick and modern banking system provides higher services, better pricing, and more excellent protection to customers from all walks of life. The baking industry is the most common and a sign of protection, despite some challenges and risks. Bangladesh does not lag behind in the race against time and the modern world. In the year 1971, the banking sector began its journey with a new dream and a new assurance of equity, social honesty, and growth and development. This sector has now developed itself as a major contributor to the national economy. A variety of banks in different categories make up the market. State-owned commercial banks (SCBs), state-owned development financial institutions (DFIs), private commercial banks (PCBs), and international commercial banks (FCBs) are the four main classifications based on ownership (Bangladesh Bank, 2021 & 2020).

Bangladesh currently has 61 scheduled banks operating throughout the country. Six state-owned commercial banks (SCBs), three specialized banks (SDBS), forty three private commercial banks (PCBs), and nine foreign commercial banks (FCBs) make up the banking sector (Banglades Bank, 2022). Both traditional and modern banks work to maintain and enhance customer retention in addition to pursuing new business. The financial services sector's future growth, notably in the banking business, is now seen as being critically dependent on the exponential advancements in information technology

(Sina et al., 2021). Bangladesh has been making steady progress despite the fact that the banking industry is rapidly adopting technology in many other nations.

Nevertheless, in mid -the 1990s, with the emergence of the private banks in the country, the overall scenario started changing radically. The reason behind this change is the banks' evolving with a solid IT base. The most important aspect of a bank's marketing strategy is utilizing technology by creating channels where clients may manage their accounts and communicate with their bank (Begum et al., 2022; Hughes, 2003). Due to the technological development occurring for several years, helps financial services/products be operated and controlled by distant distribution stations. Traditional financial service providers and newcomers are both looking into the potential that isn't being used yet (Begum et al., 2022). E-Banking services, on the other hand, have been around since 2001 in Bangladesh (Khan et al., 2021; Rahman et al., 2017). Electronic Banking received incredible attention and significance from both the banking sector and its customers. In developed Asian countries like Hong Kong, Japan, Singapore, South Korea, and Taiwan, there has been a substantial increase of penetration of e-banking from 58 percent in 2011 to 92 percent in 2021.

**Table 1.1 : E-banking User**

<b>Year</b>	<b>Internet Users (Million)</b>	<b>Internet Banking Users (Million)</b>	<b>Percentage of Internet Banking Users</b>
2019	92.06	2.05	2.23
2020	99.98	2.61	2.61
2021	112.72	3.38	2.99

(Source: Business Standard, 2022)

Now, total internet users are 112.72 million and total e-banking customers is 3.38 million. Now, the percentage of internet banking users in Bangladesh is 2.99% (Business Standard, 2022). From the above Table 1.1 E-banking is still in the initial stage in Bangladesh, despite extensive practice in advanced countries such as the US, UK, and European countries (Business Standard, 2022). However, very few of the users/clients take the services from the e-banking processes in Bangladesh due to different factors such as fearing personal account security, complications of online sites of banks, poor website response, etc (Khan et al., 2021). Therefore, the country's growth prospect to adopt the e-banking services makes the transaction smoother and easier for the clients for greater individual and collected economic transactional sustainability.

### **1.3 Statement of the research problem and research gap**

The researchers look into the impact of Bangladesh's e-banking commercial banks on customer service, satisfaction, and profitability. Over the year, many studies have been performed – both in the past and in the present. Not only have that but significant hypotheses and models been established to assess the effect and satisfaction of E-banking. This is because customers are thought to be the lifeblood of every industry especially banking industry. To make banking easier for clients and employees, an online embedded platform was created using cutting-edge technology and the Internet of

Things. E-banking allows consumers to safely and easily access their bank accounts. Information technology has been an advantage in terms of cost-efficiency, flexible maintenance, promptness, efficacy, and dramatically increased productivity. Customers can securely and instantly access and monitor their finances in an online environment, regardless of their location or time. Furthermore, Internet banking allows users to verify their current balance from a remote location through the internet. E-banking enables customers to manage their accounts from anywhere and at any time, regardless of whether it is a holiday, evening, or night. In e-banking, the customer's opinion is critical in determining the quality of the services offered. Certain consumers value the quality and responsiveness of service providers above all else, while others value privacy and protection above all else. Some customers also value the website's design and ease of use, demonstrating that different customers have different needs and expectations from e-banking service providers. Nevertheless, some common circumstances can be found in the customer's intentions, which are legitimate expectations that ensure the study's interest. Furthermore, prior research demonstrated that, when it comes to providing customer support via e-banking, clients were particularly sensitive to behavioral aspects in comparison to internal characteristics (Khan et al., 2021). As a result, there appears to be a clear link between behavioral and e-banking technologies in terms of consumer engagement and satisfaction with e-banking. As a result, the extent of e-banking adoption would directly impact how satisfied consumers are with service delivery in terms of behavioral factors (Khan et al., 2021).

In the context of E-banking services, previous research has revealed (dis)advantages related to client attitudes and documented reasons why customers detest utilizing E-banking services. Most of the research on why people use digital banking services (Khan et al., 2021; Patel & Patel, 2018) and how to keep them happy is about E-banking services (Ghali, 2021). A multitude of factors or constraints could be to blame for the limited adoption of electronic banking services. Because of network issues with local phone services, a lack of trust in the security of the service (Islam, 2019), a lack of reading skills and awareness (Rahman et al., 2017), the mentality associated with traditional banking services, and other factors, some customers choose not to use e-banking services (Farhi & Tirole, 2021 and Kavitha, 2015). Financial inclusion, trustworthiness, technology use and culture, gender inequality, and religion were all explored in the previous study on the acceptability of mobile banking (Raza et al., 2019). Most previous research has focused on technological adoption models and behavioural theories. Customers' complaints and misgivings, on the other hand, have largely gone ignored in the literature. Furthermore, the lack of complete client safety, security, and quick access to electronic banking is becoming a growing source of worry (Raji et al., 2021; Hossain et al., 2021). The primary cause was a lack of proper IT infrastructure and security mechanisms on the part of banks (Chaimaa et al., 2021; Hossain, 2021; Naeem & Ozuem, 2021). Finally, there are issues with service quality, customer experience, perceived value, safety, and security. The majority of Bangladesh's e-banking issues stem from a lack of infrastructure. However, in order to find out the research gap, the recent works in relation to E-banking in Bangladesh has been shown in a Table.

**Table 1.2 : Research gap of E-banking in Bangladesh**

Authors	Variable		Gaps
	IV	DV	
Li et al., 2021	Service quality, web design and content, security and privacy, convenience and speed	Customer satisfaction	Indirect effect
Alam et al., 2021	Review paper		Direct and Indirect effect
Hossain et al., 2021	E-banking services	Financial performance	Indirect effect
Karim et al., 2019	Conceptual paper	Conceptual paper	Direct and Indirect effect
Munir & Bishwas, 2021			Indirect effect
Munir & Rahman, 2015	Security and loyalty	E-Banking Practices	(mediating and moderating variable)

To the best of the researcher's knowledge, there is no well-established study in Bangladesh that deals with the customer experience and satisfaction with e-banking. As a result, this study aims to close the research gap by achieving the study's goals. The majority of the research conducted on the conventional banking system in Bangladesh is definitively based on the reviewing literature. After a critical evaluation of this Table 1.2, it was found that all authors have focused on only direct effects of E-banking services on outcome variables, but in Bangladesh, no researcher has emphasised on finding out the indirect effect. Thus, this study attempts to find out the indirect effects using mediating. Besides, it has been identified that none of the researchers used an important term "Customer Experience" as a separate independent variable in their models. This study aims to fill that gap by determining the relationship between customer experience and customer satisfaction in Bangladesh's e-banking market. As a result, in this study, we built a theoretical model to investigate Bangladesh's e-banking system and determine the relationship between customer experience and customer satisfaction.

#### 1.4 Research objectives

The fundamental objective of this study is to test the mediating effect of customer perceived value on the relationship among service quality, customer experience and customer satisfaction of e-banking services in Bangladesh. In order to do that the researcher has set the following specific objectives.

1. To investigate the effects of service quality on customers' satisfactions of e-banking service delivery in Bangladesh.
2. To evaluate the effects of customer experience on customers' satisfactions of e-banking service delivery in Bangladesh.
3. To evaluate the effects of customer perceived value on customers' satisfactions of e-banking service delivery in Bangladesh.



4. To measure the mediating effects of customers' perceived value on the relationship between service quality and customers' satisfaction of e- banking service delivery in Bangladesh.
5. To measure the mediating effects of customers' perceived value on the relationship between customer experience and customers' satisfaction of e-banking service delivery in Bangladesh.

### **1.5 Research questions**

1. To what extent service quality influence the customer satisfaction of e- banking service delivery in Bangladesh?
2. To what extent customer experiences influence the customer satisfaction of e-banking service delivery in Bangladesh?
3. To what extent customer perceived value effect the customer satisfaction of e-banking service delivery in Bangladesh?
4. To what extent perceived value mediate the relationship between service quality and customer satisfaction of e- banking service delivery in Bangladesh?
5. To what extent perceived value mediate the relationship between customer experience and customer satisfaction of e- banking service delivery in Bangladesh?

### **1.6 Research Scope**

The current study, however, was designed with a quantitative research with five hypotheses based on TAM model. Dhaka, Rajshahi, Chittagong and Sylhet divisions from Bangladesh are taken as the study's location. Service quality, customer experience are taken as independent variables, customer perceived value is considered as mediating variable while customer satisfaction is taken as dependent variable. The customers who use the E-banking services are taken as the respondents for this study.

### **1.7 Research Contributions**

Several contributions would be made if the five research objectives identified in this study (mentioned in section 1.4) were met. Using a variety of approaches, the present research adds to the literature on service quality and customer experience. In terms of these measurements, previous research has solely concentrated on service quality and customer experience assessment. The importance of the customer experience had been overlooked. As a result, this study proposed a new perspective that looked at service quality and customer experience simultaneously. A tried and true model will be presented, detailing the dimensions and structures of e-banking customer satisfaction in Bangladesh. In reality, such a result is important because the dimensional framework of customer satisfaction has not been compromised. Furthermore, the current study models the relationships between different constructs such as service quality, customer

experience, customers' perceived value, and customer loyalty all at the same time. The vast majority of customer satisfaction surveys were conducted in all Bangladeshi banks. The findings will lead to a new interpretation of the contributions mentioned above. From a practical standpoint, this research benefits the banking industry in a number of ways. To begin, this study aids Bangladeshi banks in formulating policy and making decisions on the dimension of service quality and the customer experience in relation to E-banking and its effect on customer satisfaction. Second, this research demonstrates various e-banking products, easier handling of e-features, and e-security based on modern communication technologies, all of which improve customer service delivery and satisfaction. For e-banking customers, clarity of the dimensions of service quality and the customer experience in all banks is important. By gaining a better understanding of both topics, bank employees would be able to develop more effective strategies for retaining existing e-banking customers and attracting new e-banking customers. This analysis can be researched as a set of scientific questions, and all of the variables in it can be measured and calculated using scientific procedures. Furthermore, this analysis is feasible since it could be conducted in a reasonable manner, subjects could be assigned, and theoretical structure constructs could be calculated. As a result, the findings of this study will assist bank policymakers in formulating and implementing a strategy for all banks to deal with Bangladesh's intense rivalry in the banking industry.

## **1.8 Definition of Terms**

### **Customer satisfaction**

Customer satisfaction is a psychological concept that involves the sensation of well-being and delights those consequences from acquiring what one hopes for and expects from an attractive product and/or service. Customer satisfaction leads to growth in customer loyalty who is receiving the service from the company, (Jahan & Shahria, 2021).

### **Customer perceived value**

Customer perceived value is defined as a judgment or a valuation by the customer of the contrast between the benefits or utility acquired from a product, service or relationship, and the perceived sacrifices or costs, (Paul et al., 2022).

### **Service quality**

The service quality can also be expressed from the perspective of physical quality, interactive quality and corporate quality. In this study, under the service quality, there were five reliability, responsiveness, assurance, empathy, and tangibles (Ademola, & Kazeem, 2022).



## **Customer experience**

Customer experience is the measurement of interaction between service provider and a customer for a long period of time. In this study, under the service quality, there were five Perceived ease of use, Quality Internet Connection, Perceived Privacy, Perceived Usefulness, Perceived Security, (Mosa, 2022).

## **E-banking**

Electronic banking includes several transaction services like banking through telephone, credit & debit cards usage, Automated Teller Machines (ATMs). It also engaged in activity like electronic funds transfer (EFT) which is simply transfer funds directly from one account to another. However, E- banking refers as a banking system where all the transactions are done by the internet, (Carranza et al., 2021).

### **1.9 Organization of the thesis**

This thesis is organized into five chapters.

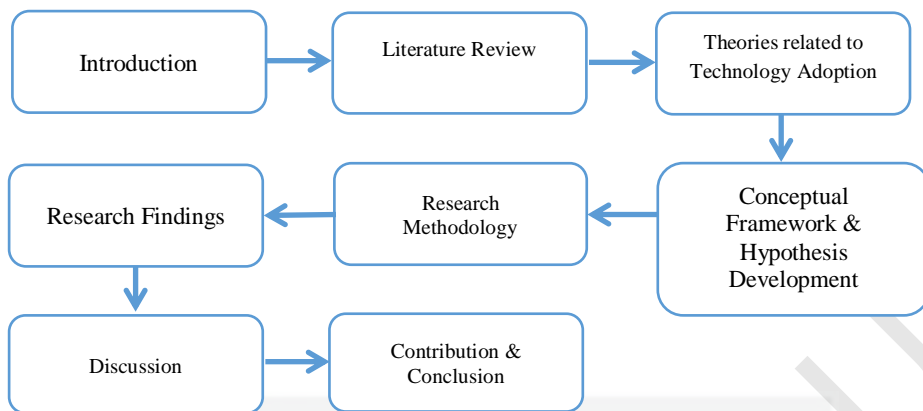
In this first chapter, an overview of the study is given here. At the beginning, this chapter discusses the background of the study followed by problems faced by the security and safety. Then, the research questions highlight the potential issues of the study. The objective and scope of the study are also discussed in this chapter and finally the organization of the thesis will be presented to make the research process clearer.

This second chapter presents the review of previous studies related to relationship quality. It covers the topics related to relationship quality such as, service quality and customers' satisfaction, customers' experience and customers' satisfaction and service quality and customers' perceived value. At the end of this chapter, further discussion on the selected dimension of relationship and hypothesis development is shown.

The third chapter focuses on the methodology used for data collection. This chapter covers research instruments, sampling design, questionnaire design, data collection methods and analyses used to test the study variables.

The fourth chapter explains the findings and result of collected data. This chapter also discussion on the result and relates to the objective of the study.

The fifth chapter discusses the summary of the research, conclusion, and the implication of the research and limitations of study. The purpose of the study is to examine the relationship between service quality and customer experience with customer satisfaction. In addition, the roles of customer perceived value as mediators. Chapter five also comprises the contribution of the study and how the research gap is being filled by the current research.



**Figure 1.1 : Study Flowchart**

## REFERENCES

- Abdulhadi, R. A., & Ahmad, S. (2021). Internet Banking in Saudi Arabia. *PalArch's Journal of Archaeology of Egypt/Egyptology*, 18(13), 673-684.
- Abdulquadri, A., & Dixon-Ogbechi, B. (2022). Effects of e-marketing on customers patronage of commercial banks (a study of guaranty trust bank plc, lagos). *Economía & Negocios*, 4(2), 17-08.
- Abdurrahaman, D. T., Sharubutu, M. S., Sabiu, T. T., Adam, S. B., Ibrahim, M. G., & Udu, A. A. (2021). Examining the Determinants of eBanking Adoption: Evidence from Nigeria. *Technium Soc. Sci. J.*, 22,(2021), 463-482.
- Ademola, A., & Kazeem, B. (2022). Does Electronic Banking Service Quality affect Customers Satisfaction in Nigeria?. *Revue Finance & marchés*, 9(2), 01-15.
- Ahmad, I., Iqbal, S., Jamil, S., & Kamran, M. (2021). A Systematic Literature Review of E-Banking Frauds: Current Scenario and Security Techniques. *Linguistica Antverpiensia*, 2(2), 3509-3517.
- Ahmad, S., Hussain, F. Z., Naheed, K., & Shahid, M. S. (2021). An Empirical Investigation of E-banking Service Quality Customer Trust and Customer Loyalty of Pakistani Banks. *Sustainable Business and Society in Emerging Economies*, 3(3), 319-326.
- Ajzen, I. (1991). The theory of planned behavior. *Organizational Behavior and Human Decision Processes*, 50(2), 179-211.
- Akdere, M., Top, M., & Tekingündüz, S. (2020). Examining patient perceptions of service quality in Turkish hospitals: The SERVPERF model. *Total quality management & business excellence*, 31(3-4), 342-352.
- Akhter, A., Karim, M. M., Jannat, S., & Islam, K. A. (2022). Determining factors of intention to adopt internet banking services: A study on commercial bank users in Bangladesh. *Banks and Bank Systems*, 17(1), 125-136.
- Alalwan, A. A., Baabdullah, A. M., Rana, N. P., Tamilmani, K., & Dwivedi, Y. K. (2018). Examining adoption of mobile internet in Saudi Arabia: Extending TAM with perceived enjoyment, innovativeness and trust. *Technology in Society*, 55, 100-110.
- Alam, Md. J., Jesmin, J., Faruk, M., Nur-Al-Ahad, Md. (2021). Development of E-banking in Bangladesh: A Survey Study. *Financial Markets, Institutions and Risks*, 5(2), 42- 51.
- Alam, Md. J., Jesmin, J., Faruk, M., Nur-Al-Ahad, Md. (2021). Development of E-banking in Bangladesh: A Survey Study. *Financial Markets, Institutions and Risks*, 5(2), 42- 51.

- Aldas- Manzano, J., Navarre-Lassala, C., Mafe-Ruiz, C., & Blas-Sanz, S. (2009). Key drivers of Internet banking services use. *Online Information Review*, 33 (4), 672- 695.
- Ali Usman, R. Q. D. (2010). Leadership spirituality in banking professionals and its impact on organizational commitment. *International Journal of Business and Management*, 5(3), 185-193.
- Ali, M., Ibrahim, A. B. M. A., Rejal, A., & Abou, E. A. E. E. (2021). The mediating role of technology perception in the relationship between customer experience and the adoption of e-payment cards during the COVID-19 pandemic. *Uncertain Supply Chain Management*, 9(4), 1047-1060.
- Alnuaimi, M. O. E. O., Ismail, N., & binti Packeer, S. S. B. (2021). Service quality factors, satisfaction and perceived welfare among customers of public services in the UAE. *International Journal of Entrepreneurship*, 25, (2021), 1-15.
- Al-Rfou, A.N. (2013). The usage of internet banking evidence from Jordan. *Asian Economic and Financial Review*, 3(5), 614-623.
- Alwan, H. A., & Al-zu, A. I. (2016). Determinants of internet banking adoption among customers of commercial banks : An empirical study in the Jordanian banking sector determinants of internet banking adoption among customers of commercial banks : an empirical study in the Jordanian banking. *International Journal of Business and Management*, 11(3), 95–104.
- Ameme, B. K. (2015). The impact of customer demographic variables on the adoption and use of internet banking in developing economies. *The Journal of Internet Banking and Commerce*, 20(2).1-31.
- Amin, H., Abdul Rahman, A. R., Abdul Razak, D., & Rizal, H. (2017). Consumer attitude and preference in the Islamic mortgage sector: a study of Malaysian consumers. *Management Research Review*, 40(1), 95-115.
- Amin, M., Isa, Z., & Fontaine, R. (2013). Islamic banks: contrasting the drivers of customer satisfaction on image, trust, and loyalty of Muslim and non-Muslim customers in Malaysia. *International Journal of Bank Marketing*, 31(2), 79-97.
- Amin, S. and Tarun, M.T. (2021), "Effect of consumption values on customers' green purchase intention: a mediating role of green trust", *Social Responsibility Journal*, 17 (8), 1320-1336.
- Ananth, A., Ramesh, R. and Prabakaran, B. (2011). "Service quality gap analysis in private sector banks a customer perspective", *internationally Indexed Journal*, 2(1), 245-252.
- Anderson, E. W., Fornell, C., & Lehmann, D. R. (1994). Customer satisfaction, market share, and profitability: Findings from Sweden. *Journal of marketing*, 58(3), 53-66.
- Anderson, R. E., & Srinivasan, S. S. (2003). E-satisfaction and e-loyalty: A contingency framework. *Psychology & marketing*, 20(2), 123-138.

- Andotra, N., & Lal, T. (2016). Investigating occupation-wise perception of customers towards access to cooperative banking services. *International Journal on Customer Relations*, 4(1), 5-11.
- Andotra, Neetu; Lal, T. (2016). Measuring age wise perception of different beneficiaries regarding access to financial services through cooperative banks. *Journal of Commerce & Accounting Research*, 5(2), 23-32.
- Annamalah, Sanmugam and Tan, Khai Ying, An Analysis of Customer Satisfaction Towards Technical Services in Malaysian Automotive Industries (September 4, 2016). Available at SSRN:
- Arif, M. N. R. (2014). Spin-off and its impact on the third party funds of Indonesian Islamic banking industry. *Economic Journal of Emerging Markets*. 6(1), 50-55.
- Ashrafpour, N., Niky Esfahlan, H., Aali, S. and Taghizadeh, H. (2022), "The prerequisites and consequences of customers' online experience regarding the moderating role of brand congruity: evidence from an Iranian bank", *Journal of Islamic Marketing*, 13(10), 2144-2172.
- Awan, H. M., Bukhari, K. S., & Iqbal, A. (2011). Service quality and customer satisfaction in the banking sector: a comparative study of conventional and Islamic banks in Pakistan. *Journal of Islamic Marketing*, 2(3), 203-224.
- Aziz, N. A., & Yasin, N. M. (2010). Analyzing the brand equity and resonance of banking services: Malaysian consumer perspective. *International Journal of Marketing Studies*, 2(2), 180-189.
- Backhaus, K., Erichson, B., Plinke, W., & Weiber, R. (2003). *Multivariate analysemethoden: eine anwendungsorientierte einf'uhung* (10th ed.). Berlin: Springer.
- Bamutire, A. (2021). *Customer Satisfaction and Brand Loyalty of Shell Automotive Lubricants Customers* (Doctoral dissertation, Makerere University Business School).
- Bangladesh Bank (2022), <https://www.bb.org.bd/en/index.php/financialactivity/bankfi>, Retrieved at: 22-03-2022
- Bangladesh Bank (2022), <https://www.bb.org.bd/en/index.php/financialactivity/bankfi>, Retrieved at: 22-03-2022
- Bangladesh Bank. (2020). [https://www.bb.org.bd/index.php/pub/externalpages/home\\_press.php](https://www.bb.org.bd/index.php/pub/externalpages/home_press.php) . Date: 19/11/2020. Time: 4.28PM.
- Bangladesh Bank. (2021). [https://www.bb.org.bd/index.php/pub/externalpages/home\\_press.php](https://www.bb.org.bd/index.php/pub/externalpages/home_press.php) .Date: 19/12/2021. Time: 5.26PM.

- Baron, R. M., & Kenny, D. A. (1986). The moderator–mediator variable distinction in social psychological research: Conceptual, strategic, and statistical considerations. *Journal of personality and social psychology*, 51(6), 1173.
- Bartlett, J. E., Kotrlik, J. W., & Higgins, C. C. (2001). Organizational research: Determining appropriate sample size in survey research. *Information Technology, Learning, and Performance Journal*, 19(1), 43-50.
- Begum, S., Baten, M. A., & Ali, R. (2022). Evaluation of Information Technology Impact on State-owned Commercial Banks' Efficiency: The Case of Bangladesh. *Asian Journal of Business Environment*, 12(1), 1-9.
- Berraies, S., & Hamouda, M. (2018). Customer empowerment and firms' performance: The mediating effects of innovation and customer satisfaction. *International Journal of Bank Marketing*, 36(2), 336-356.
- Bitkina, O. V., Park, J., & Kim, H. K. (2022). Measuring User-Perceived Characteristics for Banking Services: Proposing a Methodology. *International Journal of Environmental Research and Public Health*, 19(4), 2358.
- Bolton, R. N., & Drew, J. H. (1991). A multistage model of customers' assessments of service quality and value. *Journal of consumer research*, 17(4), 375-384.
- Bourque, L. B., & Fielder, E. P. (1995). Overview of self-administered questionnaires. How to conduct self-administered and mail surveys, 1e22.
- Brooks, R. D., & Shoung, L. C. (2006). The impact of capital controls on Malaysian banking industry betas. *Applied Financial Economics Letters*, 2(4), 247-249.
- Burns, A. and Bush, R. (2003), *Market Research*, 5th ed., Pearson Education Ltd, Upper Saddle River, NJ.
- Butt, S. (2021). Impact of E-Banking Service Quality on Customers' Behavior Intentions Mediating Role of Trust. *GMJACS*, 11(2), 21-21
- Buzzell, R., Gale, B. (1987). *The PIMS Principles: Linking Strategy to Performance*. Free Press, New York.
- Carranza, R., Díaz, E., Sánchez-Camacho, C., & Martín-Consuegra, D. (2021). e-Banking adoption: an opportunity for customer value co-creation. *Frontiers in psychology*, 11, 621248.
- Caruana, A., Money, A. H., & Berthon, P. R. (2000). Service quality and satisfaction—the moderating role of value. *European Journal of Marketing*, 34(11/12), 1338-1353.
- Chahal, H. & Dutta, K. Decision (2015). Measurement and impact of customer experience in banking sector. *Springer Link*, 42(1), 57–70.
- Chaimaa, B., Najib, E., & Rachid, H. (2021). E-banking Overview: Concepts, Challenges and Solutions. *Wireless Personal Communications*, 117(2), 1059-1078.



- Chaimaa, B., Najib, E., & Rachid, H. (2021). E-banking Overview: Concepts, Challenges and Solutions. *Wireless Personal Communications*, 117(2), 1059-1078.
- Chaveesuk, S., Wutthirong, P., & Chaiyasoonthorn, W. (2018). The Model of Mobile Payment System Acceptance on Social Networks in Thailand: A Conceptual Framework. In *Proceedings of the 2018 10th International Conference on Information Management and Engineering* (pp. 35-39).
- Chayomchai, A., & Chanarpas, M. (2021). The service quality management of the fitness center: The relationship among 5 aspects of service quality. *International Journal of Current Science Research and Review*, 4(06), 514-521.
- Chen, C. F., & Chen, F. S. (2010). Experience quality, perceived value, satisfaction and behavioral intentions for heritage tourists. *Tourism Management*, 31(1), 29-35.
- Chen, N., & Yang, Y. (2021). The impact of customer experience on consumer purchase intention in cross-border E-commerce—Taking network structural embeddedness as mediator variable. *Journal of Retailing and Consumer Services*, 59, 102344.
- Chen, S. C., & Lin, C. P. (2015). The impact of customer experience and perceived value on sustainable social relationship in blogs: An empirical study. *Technological Forecasting and Social Change*, 96, 40-50.
- Chen, Y.Y., Hui-Ling, H., Yin-Chien, H., Hsing-Chau, T., & Lee, Y.C. (2010). Confirmation of expectations and satisfaction with the internet shopping: The role of internet self-efficacy. *Computer and Information Science*, 3(3), 14-22.
- Cheng, B. L., Gaur, S. S., & Rahim, R. A. (2020). Factors leading to customer retention in the high volume-low volume service context: Evidence from the mobile service industry. *Asian Journal of Business Research*, 10(1), 68-103.
- Chin W. (1998). Issues and opinion on structural equation modeling. *MIS Quarterly*, 22(1): 7–16.
- Chin, J. P., Diehl, V. A., & Norman, K. L. (1988, May). Development of an instrument measuring user satisfaction of the human-computer interface. In *Proceedings of the SIGCHI conference on Human factors in computing systems* (pp. 213-218). ACM.
- Chin, W. W., (2010). How to Write up and Report PLS Analyses. In V. Esposito Vinzi, W. W. Chin, J. Henseler, & H. Wang (Eds.), *Handbook of Partial Least Squares* (pp. 655-685). Berlin, Heidelberg: Springer Berlin Heidelberg.
- Chin, W. W., Marcolin, B. L., & Newsted, P. R. (2003). A partial least squares latent variable modeling approach for measuring interaction effects: Results from a Monte Carlo simulation study and an electronic-mail emotion/adoption study. *Information systems research*, 14(2), 189-217.

- Chong, S. C., Teoh, W. M. Y., & Qi, Y. (2015). Comparing customer satisfaction with China mobile and China telecom services: An empirical study. *The Journal of Developing Areas*, 49(6), 247-262.
- Church, A. H. (1993). Estimating the effect of incentives on mail survey response rates: A meta-analysis. *Public opinion quarterly*, 57(1), 62-79.
- Chuttur M.Y. (2009). "Overview of the Technology Acceptance Model: Origins, Developments and Future Directions," Indiana University, USA. *Sprouts: Working Papers on Information Systems*, 9(37). <http://sprouts.aisnet.org/9-37>
- Clarke, A., & Dawson, R. (1999). *Evaluation research: An introduction to principles, methods and practice*. Sage.
- Cooper, D. R. & Schindler, P.S. (2006). *Business Research Methods*. 9th Edition. New York: McGraw-Hill.
- Cronin Jr, J. J., & Taylor, S. A. (1992). Measuring service quality: a reexamination and extension. *The Journal of Marketing*, 56(3), 55-68.
- Cronin, J.J., Brady, M.K., and 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.
- Cui, X., & Xu, J. (2022). Understanding the E-Banking Channel Selection Behavior of Elderly Customers: A Small-World Network Perspective. *Journal of Organizational and End User Computing (JOEUC)*, 34(6), 1-21.
- Curran, P. J., West, S. G., & Finch, J. F. (1996). The robustness of test statistics to nonnormality and specification error in confirmatory factor analysis. *Psychological Methods*, 1(1), 16-29.
- Da Silva, E. C. (2021). Customer experience project: a framework to create and deliver value to customers. *International Journal of Marketing Studies*, 13(3), 1-21.
- Das, S. A., & Ravi, N. (2021). A study on the impact of e-banking service quality on customer satisfaction. *Asian Journal of Economics, Finance and Management*, 5(1), 48-56.
- Dauda, S. Y. & Lee, J. (2016). Quality of service and customer satisfaction: a conjoint analysis for the Nigerian bank customers. *International Journal of Bank Marketing*, 34(6), 841-867.
- Dauda, Y., Santhapparaj, A. S., Asirvatham, D., & Raman, R. (2007). The impact of e-commerce security, and national environment on consumer adoption of internet banking in Malaysia and Singapore. *Journal of Internet Banking and Commerce*, 12(2), 1-20.
- Davis, F.D. (1989). Perceived usefulness, perceived ease of use, and user acceptance of information technology, *MIS Quarterly*, 13 (3), 319-339.



- Davis, M. M., & Heineke, J. (1998). How disconfirmation, perception and actual waiting times impact customer satisfaction. *International Journal of Service Industry Management*, 9(1), 64-73.
- Deng, W. J., Yeh, M. L., & Sung, M. L. (2013). A customer satisfaction index model for international tourist hotels: Integrating consumption emotions into the American Customer Satisfaction Index. *International Journal of Hospitality Management*, 35, 133-140.
- Dhanya, B. K., & Velmurugan, D. V. (2021). Influence Of Demographic Variables on Customer Satisfaction on E-banking In Public Sector Banks. *Elementary Education online*, 20(5), 1774-1781.
- Dhanya, B. K., & Velmurugan, D. V. (2021). Influence Of Demographic Variables on Customer Satisfaction on E-banking In Public Sector Banks. *Elementary Education online*, 20(5), 1774-1781.
- Dillman, D. A. (2011). Mail and Internet surveys: The tailored design method--2007 Update with new Internet, visual, and mixed-mode guide. John Wiley & Sons.
- Dixit, N. & Datta, S. K. (2010). Acceptance of e-banking among adult customers: an empirical investigation in India. *Journal of Internet Banking and Commerce*, 15(2), 4-14.
- Dodds, W. B., & Monroe, K. B. (1985). The effect of brand and price information on subjective product evaluations. *ACR North American Advances*.
- Dodds, W. B., Monroe, K. B., & Grewal, D. (1991). Effects of price, brand and store information on buyers' product evaluations. *Journal of Marketing Research*, 28(3), 307-319.
- Edwin, C. T.C., David, Y.C., & Andy, Y. C.L. (2006). Adoption of internet banking: An empirical study in Hong Kong. *Decision Support Systems*, 42, 1558-1572.
- Eggert, A., & Ulaga, W. (2002). Customer perceived value: a substitute for satisfaction in business markets? *Journal of Business & industrial marketing*, 17(2/3), 107-118.
- El Saghier, N., & Nathan, D. (2013, April). Service quality dimensions and customers' satisfactions of banks in Egypt. In proceedings of 20th international business research conference 4 - 5 April 2013, Dubai, UAE, ISBN: 978-1-922069-22-1.
- Ennew, C., Waite, N., & Waite, R. (2013). Financial services marketing: An international guide to principles and practice. Routledge.
- Eriksson, E., & Hellström, A. (2021). Multi-actor resource integration: a service approach in public management. *British Journal of Management*, 32(2), 456-472.

- Ernst & Young (2012). Global Consumer Banking Survey 2012. The customer takes control. Retrieved from [http://www.ey.com/Publication/vwLUAssets/Global\\_Consumer\\_Banking\\_Survey\\_2012\\_The\\_customer\\_takes\\_control/\\$FILE/Global\\_Consumer\\_Banking\\_Survey\\_2012.pdf](http://www.ey.com/Publication/vwLUAssets/Global_Consumer_Banking_Survey_2012_The_customer_takes_control/$FILE/Global_Consumer_Banking_Survey_2012.pdf)
- Farhi, E., & Tirole, J. (2021). Shadow banking and the four pillars of traditional financial intermediation. *The Review of Economic Studies*, 88(6), 2622-2653.
- Faryabi, M., Sadeghzadeh, K., & Saed, M. (2012). The effect of price discounts and store image on consumer's purchase intention in online shopping context case study: Nokia and HTC. *Journal of business studies quarterly*, 4(1), 197-205.
- Farzianpour, F., Pishdar, M., Shakib, M. D., & Toloun, M. R. S. H. (2014). Consumers' perceived risk and its effect on adoption of online banking services. *American Journal of Applied Sciences*, 11(1), 47-56.
- Field, A. P. (2006). The behavioral inhibition system and the verbal information pathway to children's fears. *Journal of Abnormal Psychology*, 115(4), 742-752.
- Fishbein, M., Ajzen, I. (1975). Belief, attitudes, intention, and behavior. An introduction to theory and research. Massachusetts: Addison- Wesley.
- Garg, M. C., & Kumar, P. (2022). Gap between expectation and perception of customers about e-banking services for each service quality dimensions in selected public and private sector banks in India. *International Journal of Services and Operations Management*, 42(4), 525-538.
- Garland, R. (1991). The mid-point on a rating scale: Is it desirable? *Marketing Bulletin*, 2, 66-70.
- Gayathri, S. & Rekhapriyadharshini (2022). The mediating effect of customer satisfaction on the relationship between service quality and customer loyalty in Digital Banking. *Journal of Contemporary Issues in Business and Government Vol*, 28(01), 20-31.
- George, A., & Kumar, G. G. (2014). Impact of service quality dimensions in internet banking on customer satisfaction. *Decision*, 41(1), 73-85.
- Ghali, Z. (2021). Motives of customers' e-loyalty towards e-banking services: a study in Saudi Arabia. *Journal of Decision Systems*, 30(2-3), 172-193.
- Ghorbani, A., & Yarimoglu, E. K. (2014). E-service marketing. In *Marketing in the cyber era: Strategies and emerging trends* (pp. 1-8). IGI Global.
- Gommans, M., Krishnan, K., & Scheffold, K. (2001). Development of two-dimensional apparel CAD system. *Journal of Clothing and Technology Research*, 3(1), 43-58.
- Grace, D., & O'Cass, A. (2004). Examining service experiences and post-consumption evaluations. *Journal of Services Marketing*, 18(6), 450-461.

- Grönroos, C. (1984). A service quality model and its marketing implications. *European Journal of marketing*, 18(4), 36-44.
- Gunasinghe, A., & Nanayakkara, S. (2021). Role of technology anxiety within UTAUT in understanding non-user adoption intentions to virtual learning environments: the state university lecturers' perspective. *International Journal of Technology Enhanced Learning*, 13(3), 284-308.
- Gupta, M. C. N. L. (2014). Examining the attributes of customer experience and assessing the impact of customer experience on customer satisfaction: an empirical study of banking industry. *Int. J. of Services Sciences*, 5(2), 154–167.
- Gupta, M. P., & Dubey, A. (2016). E-commerce-study of privacy, trust and security from consumer's perspective. *International Journal of Computer Science and Mobile Computing transactions*, 5 (6), 224-232.
- Gupta, P., Prashar, S., Vijay, T. S., & Parsad, C. (2021). Examining the influence of antecedents of continuous intention to use an informational app: the role of perceived usefulness and perceived ease of use. *International Journal of Business Information Systems*, 36(2), 270-287.
- Haag, S. & Cummings, M. (2010). *Management Information Systems for the Information Age* (8thed.). New York: McGraw-Hill/Irwin.
- Hafez, M., & Akther, N. (2017). Determinants of customer loyalty in mobile telecommunication industry in Bangladesh. *Global Journal of Management and Business Research*. 17(1), 141–148.
- Hair Jr, J. F., Hult, G. T. M., Ringle, C., & Sarstedt, M. (2016). *A primer on partial least squares structural equation modeling (PLS-SEM)*. Sage publications.
- Hair, J. F., Black, W. C., Babin, B. J., Anderson, R. E., & Tatham, R. L. (2006). *Multivariate data analysis* (Vol. 6): Pearson Prentice Hall Upper Saddle River, NJ.
- Hair, J. F., Hult, G. T.M., Ringle, C.M., & Sarstedt, M. (2017). *A primer on partial least squares structural equation modeling (PLS-SEM)* (2nd ed.). Thousand Oaks, CA: Sage.
- Hair, J. F., Money, A. H., Samouel, P., & Page, M. (2007). *Research methods for business*. Education+ Training.
- Hair, J. F., Ringle, C. M., & Sarstedt, M. (2013). Partial least squares structural equation modeling: Rigorous applications, better results and higher acceptance. *Long range planning*, 46(1-2), 1-12.
- Hair, J.F. Jr, Walfinbarger, M.F., Ortinau, D.J., and Bush R.P. (2008) *Essentials of Marketing Research*, McGraw Hill

- Hair, P.S., Gronemus, J.Q., Crawford, K.B., Salvi, V.P., Cunnion, K.M., Thielens, N.M., Arlaud, G.J., Rawal, N., Krishna, N.K., (2010). Human astrovirus coat protein binds C1q and MBL and inhibits the classical and lectin pathways of complement activation. *Mol. Immunol.* 47, 792–798.
- Hammouri, Q., Majali, T., Almajali, D., Aloqool, A., & AlGasawneh, J. A. (2021). Explore the Relationship between Security Mechanisms and Trust in E-Banking: A Systematic Review. *Annals of the Romanian Society for Cell Biology*, 25(6), 17083-17093.
- Hapsari, R., Clemes, M., & Dean, D. (2016). The mediating role of perceived value on the relationship between service quality and customer satisfaction: evidence from Indonesian airline passengers. *Procardia Economics and Finance*, 35, 388-395.
- Harasis, A. A., & Rasli, A. (2016). A Review of Theories Relevant to E-banking Usage Continuance. *International Review of Management and Marketing*, 6(4S), 277-283.
- Hassan, A., & Salma Binti Abdul Latiff, H. (2009). Corporate social responsibility of Islamic financial institutions and businesses: Optimizing charity value. *Humanomics*, 25(3), 177-188.
- Hellier, P. K., Geursen, G. M., Carr, R. A., & Rickard, J. A. (2003). Customer repurchase intention: A general structural equation model. *European journal of marketing*, 37(11/12), 1762-1800.
- Herington, C., & Weaven, S. (2009). Implementing the marketing concept in travel organizations: The important moderating influence of perceived organizational support. *Journal of Hospitality Marketing & Management*, 18(7), 692-717.
- Holbrook, M.B. (1994). The nature of customer's value: An axiology of service in consumption experience. In R. T. Rust, & R. L. Oliver (Eds.), *Service quality: New directions in theory and practice* (pp. 21–71). Thousand Oaks, CA: Sage Publications.
- Holmes-Smith, C. E. & Coote, L. (2006). Structural equation modelling: from the fundamentals to advanced topics, School Research, Evaluation and Measurement Services, Education & Statistics Consultancy, Statsline.
- Hossain, M. I. (2021). Effects of e-banking adoption on the financial performance of state-owned commercial banks in Bangladesh. *Information Resources Management Journal (IRMJ)*, 34(4), 1-20.
- Howat, G., & Assaker, G. (2013). The hierarchical effects of perceived quality on perceived value, satisfaction, and loyalty: empirical results from public, outdoor aquatic centers in Australia. *Sport Management Review*, 16(3), 268-284.
- Hsieh, YH. Chen, IH. & Yuan, ST. *Soft Comput* (2013). FCM based customer expectation driven service dispatch system. *Soft Computing*, 18(2), 359–378.

- Huat, T. C., Chin, T. A., Rasli, A., Yusoff, R. M., & Tat, H. H. (2012). The effects of service quality, customer satisfaction on re-patronage intentions of a hotel's existing customers. *International Journal of Management and Administrative Sciences*, 1(8), 1.
- Hughes, T. (2003). Marketing challenges in e-banking: standalone or integrated? *Journal of Marketing Management*, 19(9-10), 1067-1085.
- Indrasari, A., Nadjmie, N., & Endri, E. (2022). Determinants of satisfaction and loyalty of e-banking users during the COVID-19 pandemic. *International Journal of Data and Network Science*, 6(2), 497-508.
- Islam, F., & Rahman, M. (2015). Service marketing mix and their impact on bank marketing performance: A case study on Janata Bank Limited, Bangladesh. *Journal for World Wide Holistic Sustainable Development*, 1(1), 16-32.
- Islam, K., & Salma, U. (2014). Customer Satisfaction of Internet Banking in Bangladesh: A Case Study on Citibank N.A. *Asian Journal of Applied Science and Engineering*, 3(1), 53-64.
- Islam, M. M., Rashid, H., & Alam, M. G. R. (2015). Secure Electronic Payment: Proposed method for the growth of E-commerce in Bangladesh. *Asian Business Review*, 5(2), 89-96.
- Islam, S., & Mahfuz, A. S. M. (2014). Adoption of E-banking in Bangladesh : Evolution, status and prospects. *16th Int'l Conf. Computer and Information Technology*, 255–260. 16th Int'l Conf. Computer and Information Technology, 8-10 March 2014, Khulna, Bangladesh.
- Jahan, N., & Shahria, G. (2021). Factors effecting customer satisfaction of mobile banking in Bangladesh: a study on young users' perspective. *South Asian Journal of Marketing*. 3(1),60-76.
- Jawahitha, S. (2002). Banking confidentiality-a comparative analysis of Malaysian banking statutes. *Arab Law Quarterly*, 17(3), 255-264.
- Jayawardhena, C. (2004). Measurement of service quality in internet banking: the development of an instrument. *Journal of Marketing Management*, 20(1-2), 185-207.
- Johnson, M. D., Gustafsson, A., Andreassen, T. W., Lervik, L., & Cha, J. (2001). The evolution and future of national customer satisfaction index models. *Journal of economic Psychology*, 22(2), 217-245.
- Kabir, M. A. Al, & Poddar, S. C. (2015). E-banking and customer satisfaction in Bangladesh. *European Journal of Business and Management*, 7(8), 47–55.
- Kano, N., Seraku, N., Takahashi, F. and Tsuji, S. (1984). Attractive Quality and Must-Be Quality. *The Journal of the Japanese Society for Quality Control*, 14, 39-48.



- Kant, R., & Jaiswal, D. (2017). The impact of perceived service quality dimensions on customer satisfaction: an empirical study on public sector banks in India. *International Journal of Bank Marketing*, 35(3), 411-430.
- Karim, R., & Chowdhury, A. T. (2014). Customer satisfaction on service quality in private commercial banking sector in Bangladesh. *British Journal of Marketing Studies*, 2(2), 1-11.
- Kaur, K., & Rai, A. K. (2014). A comparative analysis: Grid, cluster and cloud computing. *International Journal of Advanced Research in Computer and Communication Engineering*, 3(3), 5730-5734.
- Kaura, V., Durga Prasad, C.S. and Sharma, S. (2015). "Service quality, service convenience, price and fairness, customer loyalty, and the mediating role of customer satisfaction", *International Journal of Bank Marketing*, 33 (4), 404-422.
- Keil, M., Tan, B. C., Wei, K. K., Saarinen, T., Tuunainen, V., & Wassenaar, A. (2000). A cross-cultural study on escalation of commitment behavior in software projects. *MIS quarterly*, 299-325.
- Keith, N. K., & Simmers, C. S. (2013). Measuring hotel service quality perceptions: the disparity between comment cards and lodgserv. *Academy of Marketing Studies Journal*, 17(2).119-132.
- Kent, E., Katri, K., & Daniel, N. (2005). Customer acceptance of internet banking in Estonia. *International Journal of Bank Marketing*, 23(2), 200-216.
- Kesharwani, A., & Singh Bisht, S. (2012). The impact of trust and perceived risk on internet banking adoption in India: An extension of technology acceptance model. *International Journal of Bank Marketing*, 30(4), 303-322.
- Khafafa, A. J., & Shafii, Z. (2013). Measuring the perceived service quality and customer satisfaction in Islamic Bank windows in Libya based on Structural Equation Modelling (SEM). *Afro Eurasian Studies*, 2(1-2), 56-71.
- Khan, A. G., Lima, R. P., & Mahmud, M. S. (2021). Understanding the service quality and customer satisfaction of mobile banking in Bangladesh: Using a structural equation model. *Global Business Review*, 22(1), 85-100.
- Khan, M. M. & Fasih, M. (2014). Impact of service quality on customer satisfaction and customer loyalty: Evidence from banking sector. *Pakistan Journal of Commerce and Social Sciences*, 8(2), 331- 354.
- Khan, M. R., Rana, S., & Hosen, M. I. (2021). Impact of trustworthiness on the usage of m-banking apps: A study on Bangladeshi consumers. *Business Perspectives and Research*, 1-17
- Khan, N., & Kadir, S. L. S. A. (2011). The impact of perceived value dimension on satisfaction and behavior intention: Young-adult consumers in banking industry. *African Journal of Business Management*, 5(16), 7055-7067.

- Khoa, B. T., Ha, N. M., & Ngoc, B. H. (2021, January). The accommodation services booking intention through the mobile applications of generation Y: an empirical evidence based on TAM2 model. In *International Econometric Conference of Vietnam* (pp. 559-574). Springer, Cham.
- Khrais, L. T. (2012). The adoption of online banking: A Jordanian perspective. *European Journal of Business and management*, 4(16), 163-171.
- Klaus, Prof. Dr. Phil, D. B. N. (2013). Exploring the role of the online customer experience in the firms' multi-channel strategy – An empirical analysis of the retail banking services sector. *Journal of Strategic Marketing*, 21(5), 429–442.
- Koesharijadi, K. (2016). Factors affecting loyalty customer services banking industry in east java. *International Journal of Business and Management*, 11(6), 168-182.
- Kundu, S., & Datta, S. K. (2015). Impact of trust on the relationship of e-service quality and customer satisfaction. *Euro Med Journal of Business*, 10(1), 21-46.
- Kuo, Y. F., & Feng, L. H. (2013). Relationships among community interaction characteristics, perceived benefits, community commitment, and oppositional brand loyalty in online brand communities. *International Journal of Information Management*, 33(6), 948–962.
- Kyoon Yoo, D., & Ah Park, J. (2007). Perceived service quality: Analyzing relationships among employees, customers, and financial performance. *International Journal of Quality & Reliability Management*, 24(9), 908-926.
- Lakshmishree, P., & Raja, P. (2017). A study on service quality gap in banking sector, with special reference to State bank of India in Salem city. *IJAR*, 3(3), 887-891.
- Lau, M. M., Cheung, R., Lam, A. Y., & Chu, Y. T. (2013). Measuring service quality in the banking industry: a Hong Kong based study. *Contemporary Management Research*, 9(3), 263-282.
- Lee, G. G., & Lin, H. F. (2005). Customer perceptions of e-service quality in online shopping. *International Journal of Retail & Distribution Management*, 33(2), 161-176.
- Lee, M. C. (2009). Factors influencing the adoption of internet banking: An integration of TAM and TPB with perceived risk and perceived benefit. *Electronic Commerce Research and Applications*, 8(3), 130–141.
- Lee, S. P., & Moghavvemi, S. (2015). The dimension of service quality and its impact on customer satisfaction, trust, and loyalty: a case of Malaysian. *Asian Journal of Gusiness and Accounting*, 8 (2), 91-121.
- Lemon, K.N., Rust, R.T., & Zeithaml, V.A. (2001). What drives customer equity? *Marketing Management*, 10(1), 20-25.

- Leong, L. Y., Hew, T. S., Ooi, K. B., & Lin, B. (2012). The determinants of customer loyalty in Malaysian mobile telecommunication services: a structural analysis. *International Journal of Services, Economics and Management*, 4(3), 209-235.
- Loiacono, E. T., Watson, R. T., & Goodhue, D. L. (2002). WebQual: A measure of website quality. *Marketing theory and applications*, 13(3), 432-438.
- Makanyeza, C., Macheyo, R. and du Toit, F. (2015). Perceived product necessity, perceived value, customer satisfaction and affective attitude: an integrative model. *Journal of African Business*, 17(1), 69-86.
- Malaquias, R. F., and Hwang, Y. (2019). Mobile banking use: a comparative study with Brazilian and U.S. participants. *Int. J. Inf. Manag.* 44, 132–140.
- Malik, S. U. (2012). Customer satisfaction, perceived service quality and mediating role of perceived value. *International Journal of Marketing Studies*, 4(1), 68-76.
- Malnaad, P., bin S Senathirajah, A. R., Connie, G., Osman, Z., & Haque, R. (2022). An Examination On E-Banking Service Quality And Its Significance On E-Satisfaction And E-Loyalty: An Asian Study. *Journal of Positive School Psychology*, 8169-8185.
- Mamat, M., Haron, M. S., & Razak, N. S. A. (2014). Personal interaction encounter, customer involvement, familiarity and customer service experience in Malaysian public universities. *Procedia-Social and Behavioral Sciences*, 130, 293-298.
- Mandal, P. C. (2015). Post-service recovery customer satisfaction in Indian retail banking: a qualitative perspective. *International Journal of Financial Services Management*, 8(1), 1–17.
- Mansour, J. Ben, Naji, A., & Leclerc, A. (2017). The Relationship between Training Satisfaction and the Readiness to Transfer Learning : The Mediating Role of Normative Commitment. *Sustainability*, 9(5), 1–14.
- Mansyur, M. (2021). Marketing opportunities for bank syariah mandiri e-Banking services as a payment method. *Research Horizon*, 1(2), 71-80.
- Mbama, C. I., & Ezepue, P. O. (2018). Digital banking, customer experience and bank financial performance: UK customers' perceptions. *International Journal of Bank Marketing*, 36(2), 230-255.
- McCelland, S. (1994). Training needs assessment data-gathering methods: Part 4, survey questionnaire. *Journal of European Industrial Training*, 18(5), 22-26.
- Md, A. I., Ghosh, P., Md, R. I., & Sarker, M. (2013). Customers' satisfaction about services quality & services provided by basic Bank Ltd.: A Study on Khulna. *Science Journal of Business and Management*, 1(4), 58-73.
- Meyer, C., & Schwager, A. (2007). Customer experience. *Harvard business review*, 85(2), 116-126.



- Miguel, I., Coelho, A., & Bairrada, C. M. (2020). Modelling attitude towards consumption of vegan products. *Sustainability*, 13(1), 1=17.
- Mohammad, N., & Kamal, S. (2016). Social impact and sustainability of corporate social responsibility in the banking sectors: Bangladesh perspective. *Asian Business Review*, 6(1), 39-46.
- Montazemi, A. R., & Saremi, H. Q. (2013, January). Factors affecting Internet banking pre-usage expectation formation. In *System Sciences (HICSS), 2013 46th Hawaii International Conference on* (pp. 4666-4675). IEEE.
- Moody, J. (2002), "Traditional banks gain edge with electronic banking", available at: [www.cendant.com/ media/ trends information/ trends information .cgi / Financial +Services/59](http://www.cendant.com/media/trends/information/trends_information.cgi/Financial+Services/59) (accessed June 2002).
- Munir, M. M. M., & Bishwas, P. C. (2021). Security: Challenge of E-banking Service Practice in Bangladesh. *The Jahangirnagar Journal of Business Studies*, 8(1), 185-196.
- Munir, M.M.M., & Rahman, M. (2015). E-banking service quality and customer satisfaction of a state owned schedule bank of Bangladesh. *Journal of Internet Banking and Commerce*, 2 (9), 1-5.
- Munusamy, J., Chelliah, S., & Mun, H. W. (2010). Service quality delivery and its impact on customer satisfaction in the banking sector in Malaysia. *International Journal of Innovation, Management and Technology*, 1(4), 398.
- Naing, L., Winn, T., & Rusli, B. N. (2006). Practical issues in calculating the sample size for prevalence studies. *Archives of Orofacial Sciences*, 1, 9-14.
- Narteh, B., & Kuada, J. (2014). Customer satisfaction with retail banking services in Ghana. *Thunderbird International Business Review*, 56(4), 353 - 371.
- Navaratnaseel, J., & Periyathampy, E. (2014). Impact of Service Quality on Customer Satisfaction: A Study on Customers of Commercial Bank of Ceylon PLC Trincomalee District. *Reshaping Management and Economic Thinking through Integrating Eco-Friendly and Ethical Practices Proceedings of the 3<sup>rd</sup> International Conference on Management and Economics 26-27 February 2014. Faculty of Management and Finance, University of Ruhuna, Sri Lanka.*
- Navaratnaseelan, J.J. and Elangkumaran, P. (2014), "Impact of service quality on customer satisfaction: a study on customers of commercial bank of Ceylon PLC Trincomalee district", Proceedings of the 3rd International Conference on Management and Economics. Oral Presentations, February, pp. 359-364.
- Naveen Kumar & V.K. Gangal (2011). A study on customer satisfaction in new generation banks. *International Refereed Research Journal*, 2 (4), 177 - 186.
- Ndikubwimana, P., & Berndt, A. (2016). Service quality and customer satisfaction among bank clients in Rwanda. *British Journal of Economics, Management & Trade*, 13(4), 1-11.

- Ngo, V. M., & Nguyen, H. H. (2016). The relationship between service quality, customer satisfaction and customer loyalty: An investigation in Vietnamese retail banking sector. *Journal of Competitiveness*, 8(2), 103-116.
- Oh, H. (1999). Service quality, customer satisfaction, and customer value: A holistic perspective. *International Journal of Hospitality Management*, 18(1), 67-82.
- Oliver, R. L. (1993). A conceptual model of service quality and service satisfaction: compatible goals, different concepts. *Advances in Services Marketing and Management*, 2, 65-85.
- Omofowa, M. S., Omofowa, S., Nwachukwu, C., & Le, V. (2021). E-Banking Service Quality and Customer Satisfaction: Evidence from Deposit Money Bank in South-South Nigeria. *Management*, 18(S), 288-302
- Ong, C. H., Salleh, S., & Yusoff, R. Z. (2015). Brand experience, trust components, and customer loyalty: sustainable Malaysian SME brands study. *Asian Social Science*, 11(26), 252–266.
- Osman, Z., Mohamad, L. and Mohamad, R.K. (2015). “An empirical study of direct relationship of service quality, customer satisfaction and bank image on customer loyalty in Malaysian commercial banking industry”. *American Journal of Economics*, 5(2), 168-176.
- Pallant, J. (2007). *SPSS Survival Manual: A Step by Step Guide to Data Analysis Using SPSS Version 12*, Maidenhead: Open University Press.
- Pambudi, A., Widayanti, R., & Edastama, P. (2021). Trust and Acceptance of E-Banking Technology Effect of Mediation on Customer Relationship Management Performance. *ADI Journal on Recent Innovation*, 3(1), 87-96.
- Pambudi, A., Widayanti, R., & Edastama, P. (2021). Trust and Acceptance of E-Banking Technology Effect of Mediation on Customer Relationship Management Performance. *ADI Journal on Recent Innovation*, 3(1), 87-96.
- Parasuraman, A., Berry, L. L., & Zeithaml, V. A. (1991). Refinement and reassessment of the SERVQUAL scale. *Journal of retailing*, 67(4), 420-450.
- 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.
- Parasuraman, A., Zeithaml, V. A., & Malhotra, A. (2005). ES-QUAL: A multiple-item scale for assessing electronic service quality. *Journal of service research*, 7(3), 213-233.
- Parasuraman, A., Zeithaml, V. and Berry, L., (1985). “A conceptual model of service quality and its implications for future research”, *Journal of Marketing*, 49 (4), 41-50.

- Park, J. W., Robertson, R., & Wu, C. L., (2006). Modelling the impact of airline service quality and marketing variables on passengers' future behavioral intentions. *Transportation Planning and Technology*, 29(5), 359-381.
- Patel, K. J., & Patel, H. J. (2018). Adoption of internet banking services in Gujarat. *International Journal of Bank Marketing*, 36(1), 147-169
- Paul, P., Giri, S., Mitra, P., & Haque, M. M. (2022). Analysing the Customer Satisfaction Index of E-banking Using Kano (1984) Model Framework. *Global Business Review*, 09721509221093892.
- Pearson, D. G. (2012). Contextual representations increase analogue traumatic intrusions: Evidence against a dual-representation account of peri-traumatic processing. *Journal of Behavior Therapy and Experimental Psychiatry*, 43(4), 1026-1031.
- Penetration of digital banking in the United States from 2013 to 2018, (2018). Retrieved from <https://www.statista.com/statistics/334079/digital-banking-penetration-usa/>. Date 19/12/2018. Time: 4.26PM.
- Peyton, R.M., Pitts, S., Kamary, R.H. (2003). Consumer satisfaction/dissatisfaction (cs/d): a review of the literature prior to the 1990s. In Allied Academies International Conference. *Academy of Organizational Culture, Communications and Conflict. Proceedings*, 8(2), 41-46.
- Popelo, O., Dubyna, M., & Kholiavko, N. (2021). World experience in the introduction of modern innovation and information technologies in the functioning of financial institutions. *Baltic Journal of Economic Studies*, 7(2), 188-199.
- Popoola, N.F. and Ibn Arshad, M.D.R. (2015). "Strategic approach to build consumers trust in adoption of internet banking in Nigeria", *Journal of Internet Banking and Commerce*, 20 (1), 1-14.
- Qalati, S. A., Vela, E. G., Li, W., Dakhan, S. A., Hong Thuy, T. T., & Merani, S. H. (2021). Effects of perceived service quality, website quality, and reputation on purchase intention: The mediating and moderating roles of trust and perceived risk in online shopping. *Cogent Business & Management*, 8(1), 1869363.
- Rahaman, M. M. M. (2022). Recent Advancement of Cyber Security: Challenges and Future Trends in Bangladesh. *Saudi J Eng Technol*, 7(6), 278-289.
- Rahman, M. (2021). The Rural Users Challenges with Mobile Financial Services (MFS) In Bangladesh. *Asian Journal of Management*, 12(4), 359-366.
- Rahman, M., Saha, N. K., Sarker, M. N. I., Sultana, A., & Prodhan, A. Z. M. S. (2017). Problems and prospects of electronic banking in Bangladesh: A case study on Dutch-Bangla bank limited. *American Journal of Operations Management and Information Systems*, 2(1), 42-53.
- Raji, A. A., Zamani, A., & Mansur, M. (2021). Effect of Electronic Banking on Customer Satisfaction in Kwara State, Nigeria. *Social Sciences*, 11(7), 1571-1585.

- Ravald, A., & Grönroos, C. (1996). The value concept and relationship marketing. *European journal of marketing*, 30(2), 19-30.
- Rawashdeh, A. (2015). Factors affecting adoption of internet banking in Jordan: Chartered accountant's perspective. *International Journal of Bank Marketing*, 33(4), 510-529.
- Rawashdeh, A. M., Elayan, M. B., Alhyasat, W., & Shamout, M. D. (2021). Electronic Human Resources Management Perceived Usefulness, Perceived Ease of Use and Continuance Usage Intention: the Mediating Role of User Satisfaction in Jordanian Hotels Sector. *International Journal for Quality Research*, 15(2), 679.
- Raza, S. A., Shah, N., & Ali, M. (2019). Acceptance of mobile banking in Islamic banks: Evidence from modified UTAUT model. *Journal of Islamic Marketing*, 10(1), 357-376.
- Rizwan, M., Umair, S. M., Bilal, H. M., Akhtar, M., & Bhatti, M. S. (2014). Determinants of customer intentions for online shopping: A Study from Pakistan. *Journal of Sociological Research*, 5(1), 248-272.
- Robinson, S. (1999). Measuring service quality: current thinking and future requirements. *Marketing Intelligence & Planning*, 17(1), 21-32.
- Rod, M., Ashill, N. J., Shao, J., & Carruthers, J. (2009). An examination of the relationship between service quality dimensions, overall internet banking service quality and customer satisfaction: A New Zealand study. *Marketing Intelligence & Planning*, 27(1), 103-126.
- Roy, S. K., Khan, M. R., & Hossain, S. M. K. (2016). Determinants of users' satisfaction regarding mobile operators in Bangladesh: An exploratory factor analysis approach on university students. *European Journal of Business and Management*, 8(26), 31-39
- Ryu, K., & Han, H. (2010). Influence of the quality of food, service, and physical environment on customer satisfaction and behavioral intention in quick-casual restaurants: Moderating role of perceived price. *Journal of Hospitality & Tourism Research*, 34(3), 310-329.
- Sabah, A. A., Roya, G., & Ben, C. (2009). An investigation into the acceptance of online banking in Saudi Arabia. *Technovation*, 29, 130-141.
- Sadek, D., Zainal, N., Taher, M. and Yahya, A., (2010). "Service Quality Perceptions between Cooperative and Islamic Banks of Britain", *American Journal of Economics and Business Administration*, 2(1), 1-5.
- Saghier, N. El, & Nathan, D. (2013). Service Quality Dimensions and Customers' Satisfactions of Banks in Egypt Introduction : A. Quality : In Service Quality Dimensions and Customers' Satisfactions of Banks in Egypt (pp. 1-13).
- Sagib, G. K., & Zapan, B. (2014). Bangladeshi mobile banking service quality and customer satisfaction and loyalty. *Management & Marketing*, 9(3), 331-346.

- Sahi, A. M., Khalid, H., Abbas, A. F., & Khatib, S. F. (2021). The evolving research of customer adoption of digital payment: Learning from content and statistical analysis of the literature. *Journal of Open Innovation: Technology, Market, and Complexity*, 7(4), 230.
- Saif, M. A., Hussin, N., Husin, M. M., Alwadain, A., & Chakraborty, A. (2022). Determinants of the Intention to Adopt Digital-Only Banks in Malaysia: The Extension of Environmental Concern. *Sustainability*, 14(17), 1-32.
- Sakhaei, F., Afshari, A., & Esmaili, E. (2014). The impact of service quality on customer satisfaction in Internet banking. *Journal of mathematics and computer science*, 9, 33-40.
- Saleh, M. A., Quazi, A., Keating, B., & Gaur, S. S. (2017). Quality and image of banking services: a comparative study of conventional and Islamic banks. *International Journal of Bank Marketing*, 35(6), 878–902.
- Salimon, M. G., Bin Yusoff, R. Z., Sanuri, S., and Mokhtar, M. (2017). The mediating role of hedonic motivation on the relationship between adoption of e-banking and its determinants. *Int. J. Bank Mark.* 35, 558–582.
- Sambasivan, N., Azad, G., Aoki, P. M., & Mitra, S. S. (2014/ 2016, June). We call it Hi-Fi: Exposing Indian households to high speed broadband wireless Internet. In *Proceeding of the Eighth International Conference on Information and Communication Technologies and Development* (p. 3). ACM.
- Samutthana and Roche, I.D. (2014). “An empirical investigation of Internet banking service quality, corporate image and the impact on customer satisfaction; with special reference to Sri Lankan banking sector”, *Journal of Internet Banking and Commerce*, 19(2), 1-18.
- Sandhu, S., & Arora, S. (2022). Customers' usage behaviour of e-banking services: Interplay of electronic banking and traditional banking. *International Journal of Finance & Economics*, 27(2), 2169-2181.
- Sanjuq, G. (2014). The impact of service quality delivery on customer satisfaction in the banking sector in Riyadh, Saudi Arabia. *International Journal of Business Administration*, 5(4), 77-84.
- Sarkar, E., & Islam, M. S. (2021). Relationship between banking service quality and customer satisfaction of commercial banks in Cumilla district, Bangladesh. *Journal of Public Value and Administrative Insight*, 4(2), 105-127.
- Sarkar, S. K., Basavaraju, T. G., & Puttamadappa, C. (2016). Ad hoc mobile wireless networks: principles, protocols, and applications. CRC Press.
- Sathiyavany, N. & Shivany, S. (2018). E-Banking Service Qualities, E-Customer Satisfaction, and e-Loyalty: A conceptual Model. *The International Journal of Social Sciences and Humanities Invention*, 5(6), 4808–4819.



- Sekaran, U. (2000). Research Methods for Business; A skill business approach. *New York: John Willey & Sons*. Services in Malaysian automotive industries. *SSRN Electronic Journal*, 10(4), 24-26.
- Sekaran, U. (2003). Towards a guide for novice research on research methodology: Review and proposed methods. *Journal of Cases of Information Technology*, 8(4), 24-35.
- Sekaran, U., & Bougie, R. (2016). Research methods for business: A skill building approach. John Wiley & Sons.
- Setiawan, B. (2014). Customer satisfaction index model on three level of socioeconomic status in Bogor case study: customer satisfaction on branded cooking oil product. *Asean Marketing Journal*, 6(1), 15-24
- Setiawan, E. B. (2021). How To Build Customer Loyalty: Through Customer Experience, Perceived Price, And Customer Satisfaction. *Turkish Journal of Computer and Mathematics Education (TURCOMAT)*, 12(4), 1546-1554.
- Shala, E., & Pira, B. (2017). The evaluation of service quality in the growing banking sector in kosovo. *International Journal of Current Engineering and Technology*, 7(1), 19-24.
- Shujat, S., Cheema, F., & Bhutto, F. (2011). Impact of work life balance on employee job satisfaction in private banking sector of Karachi. *Journal of Management and Social Sciences*, 7(2), 8-15.
- Siddiqi, K. O. (2011). Interrelations between service quality attributes, customer satisfaction and customer loyalty in the retail banking sector in Bangladesh. *International Journal of Business and Management*, 6(3), 12-25.
- Sin, L. Y., Cheung, G. W., & Lee, R. (1999). Methodology in cross-cultural consumer research: A review and critical assessment. *Journal of International Consumer Marketing*, 11(4), 75-96.
- Sina, M. A., Chowdhury, M. S. A., Shakib, M. T., Akter, S., & Arafat, A. Y. (2021). The role of information technology in improvement of quality of the financial reports prepared by the commercial banks in Bangladesh. *Indian Journal of Finance and Banking*, 5(2), 85-97
- Singh, S. (2021). Determinants of e-banking adoption from customers' perspective: an empirical study. *International Journal of Business and Globalisation*, 29(4), 470-485.
- Snelgrove, J. W., Jasudavicius, A. M., Rowe, B. W., Head, E. M., & Bauer, G. R. (2012). "Completely out-at-sea" with "two-gender medicine": A qualitative analysis of physician-side barriers to providing healthcare for transgender patients. *BMC health services research*, 12(1), 1-13.
- Stafford, T. F. (2011). Understanding motivations for Internet use in distance education. *IEEE Transactions on education*, 48(2), 301-306.

- Sureshchandar, G. S., Rajendran, C., & Anantharaman, R. N. (2002). The relationship between service quality and customer satisfaction—a factor specific approach. *Journal of services marketing*, 16(4), 363-379.
- Suryani, S., & Hendryadi, H. (2015). A developing model of relationship among service quality, consumer satisfaction, loyalty and word of mouth in Islamic Banking. *Al-Iqtishad: Jurnal Ilmu Ekonomi Syariah*, 7(1), 45-58.
- Tabachnick, B. G., & Fidell, L. S. (2007). Using multivariate statistics. Allyn & Bacon/Pearson Education.
- Tan, L. H., Hamid, S. R., & Chew, B. C. (2016). Service quality audit based on conceptual gaps model of service quality: a case study of top three largest local bank in Malaysia. *International Journal of Productivity and Quality Management*, 18(1), 99-115.
- Tiwari, P. (2022). Bank affection and customer retention: an empirical investigation of customer trust, satisfaction, loyalty. *SN Business & Economics*, 2(6), 1-27.
- Trang, N. M. (2022). The Influence of Personal Characteristics on Customers' Perception of E-Banking Service Quality and Cost Effectiveness in Vietnam. *Open Journal of Social Sciences*, 10(1), 377-391.
- Tsai, C. H., & Su, P. C. (2021). The application of multi-server authentication scheme in internet banking transaction environments. *Information Systems and e-Business Management*, 19(1), 77-105.
- Tuncer, İ., Unusan, C., & Cobanoglu, C. (2021). Service quality, perceived value and customer satisfaction on behavioral intention in restaurants: An integrated structural model. *Journal of Quality Assurance in Hospitality & Tourism*, 22(4), 447-475.
- Uddin Md. Bashir; Ahasanul Haque; Md. Mizanur Rahman; Mohammad Abdullah Al Mamun; Mohammad Morad Hossain, (2016). Electronic banking products and services of private commercial banks in Bangladesh: present status and challenges. *International Journal of Business and Management Review*. 4 (8), 44.
- Ugwuanyi, C. C., Uduji, J. I., & Oraedu, C. (2021). Customer experience with self-service technologies in the banking sector: evidence from Nigeria. *International Journal of Business and Systems Research*, 15(4), 405-425.
- Ulaga, W., & Chacour, S. (2001). Measuring customer-perceived value in business markets: a prerequisite for marketing strategy development and implementation. *Industrial marketing management*, 30(6), 525-540.
- Usman, H., Projo, N. W. K., Chairy, C., & Haque, M. G. (2021). The exploration role of Sharia compliance in technology acceptance model for e-banking (case: Islamic bank in Indonesia). *Journal of Islamic Marketing*.



- Van Iwaarden, J., Van der Wiele, T., Ball, L., & Millen, R. (2003). Applying SERVQUAL to web sites: An exploratory study. *International Journal of Quality & Reliability Management*, 20(8), 919-935.
- Van Quyet, T., Vinh, N. Q., & Chang, T. (2015). Service quality effects on customer satisfaction in banking industry. *International Journal of u-and e-Service, Science and Technology*, 8(8), 199-206.
- Venkatesh, V., & Davis, F. D. (1996). A model of the antecedents of perceived ease of use: Development and test. *Decision Sciences*, 27, 451-481.
- Vera, J., & Trujillo, A. (2013). Service quality dimensions and superior customer perceived value in retail banks: An empirical study on Mexican consumers. *Journal of Retailing and Consumer Services*, 20(6), 579-586.
- Verhoef, P. C., Langerak, F., & Donkers, B. (2007). Understanding brand and dealer retention in the new car market: The moderating role of brand tier. *Journal of retailing*, 83(1), 97-113.
- Veybitha, Y., Alfansi, L., Salim, M., & Darta, E. (2021). Critical Review: Factors Affecting Online Purchase Intention Generation Z. In *Journal of International Conference Proceedings (JICP)* (Vol. 4, (1), 354-363.
- Vijayanand, S. (2021). Analyzing the Impact of Service Quality on Satisfaction in E-Banking Services-An Empirical Study. *KINERJA*, 25(2), 270-286
- Wahab, S., Noor, N. A. M., & Ali, J. (2009). Technology trust and e-banking adoption: the mediating effect of customer relationship management performance. *The Asian Journal of Technology Management*, 2(2), 40-49.
- Wilson, N., Alvita, M., & Wibisono, J. (2021). The Effect of Perceived Ease of Use and Perceived Security Toward Satisfaction and Repurchase Intention. *Jurnal Muara Ilmu Ekonomi dan Bisnis*, 5(1), 145-159.
- Wong, K. K. K. (2016). Mediation analysis, categorical moderation analysis, and higher-order constructs modeling in Partial Least Squares Structural Equation Modeling (PLS-SEM): A B2B Example using SmartPLS. *Marketing Bulletin*, 26.
- Yadav, M. K., Rai, A. K., & Srivastava, M. (2014). Exploring the three-path mediation model: A study of customer perceived value, customer satisfaction service quality and behavioral intention relationship. *International Journal of Customer Relationship Marketing and Management (IJCRMM)*, 5(2), 1-20.
- Yamashita, T. (2022). Analyzing Likert scale surveys with Rasch models. *Research Methods in Applied Linguistics*, 1(3), 100022.
- Yee, B. Y., & Faziharudean, T. M. (2010). Factors affecting customer loyalty of using internet banking in Malaysia. *Journal of Electronic Banking Systems*, 2010 (2010), 1-21.

- Yellaturu, S., & Gagggutara, R. (2021). Mediating Role of Perceived Value Between Service Quality and Consumer Satisfaction: Evidence From Indian Online Stores. *Journal Homepage: http://ijmr. net. in*, 9(05).
- Yoo, B., & Donthu, N. (2001). Developing and validating a multidimensional consumer-based brand equity scale. *Journal of business research*, 52(1), 1-14.
- Yu, H. S., Zhang, J. J., Kim, D. H., Chen, K. K., Henderson, C., Min, S. D., & Huang, H. (2014). Service quality, perceived value, customer satisfaction, and behavioral intention among fitness center members aged 60 years and over. *Social Behavior and Personality: an international journal*, 42(5), 757-767.
- Zaid, S., & PATWAYATI, P. (2021). Impact of customer experience and customer engagement on satisfaction and loyalty: A case study in Indonesia. *The Journal of Asian Finance, Economics and Business*, 8(4), 983-992.
- Zameer, H., Tara, A., Kausar, U., & Mohsin, A. (2015). Impact of service quality, corporate image and customer satisfaction towards customers' perceived value in the banking sector in Pakistan. *International journal of bank marketing*, 33(4), 442-456.
- Zeithaml, A. (1988). Consumer perceptions of price, quality, and value: a means-end model and synthesis of evidence, *Journal of Marketing: American Marketing Association*, 52(3), 2-22.
- Zeithaml, V. A. (2011). *Services Marketing: integrating customer*. Tata Mcgraw Hill.
- Zeithaml, V. A., Parasuraman, A., Berry, L. L., & Berry, L. L. (1990). *Delivering quality service: balancing customer perceptions and expectations*. New York: The free press.
- Zeithaml, Valarie, Bitner and Gremler. (2013). *Service Marketing - Integrating Customer Focus across the Firm*, Sixth Edition. New York: McGraw Hill.
- Zolait, A.H.S. (2010). An examination of the factors influencing Yemeni Bank users' behavioral intention to use Internet banking services, *Journal of Financial Services Marketing*, 15, 76-94.