



Customer Experience Management, Value, and Satisfaction of Customer through
government service's application program



Dr. Thanaphon Ratchatakulpat

Miss.Sirikarn Tirasuwanvasee

Mr.Holger Kieckbusch

Asst. Prof. Dr.Rattनावalee Maisak

Full-time faculty

Researcher is responsible for 25% each in this research

Faculty of business administration

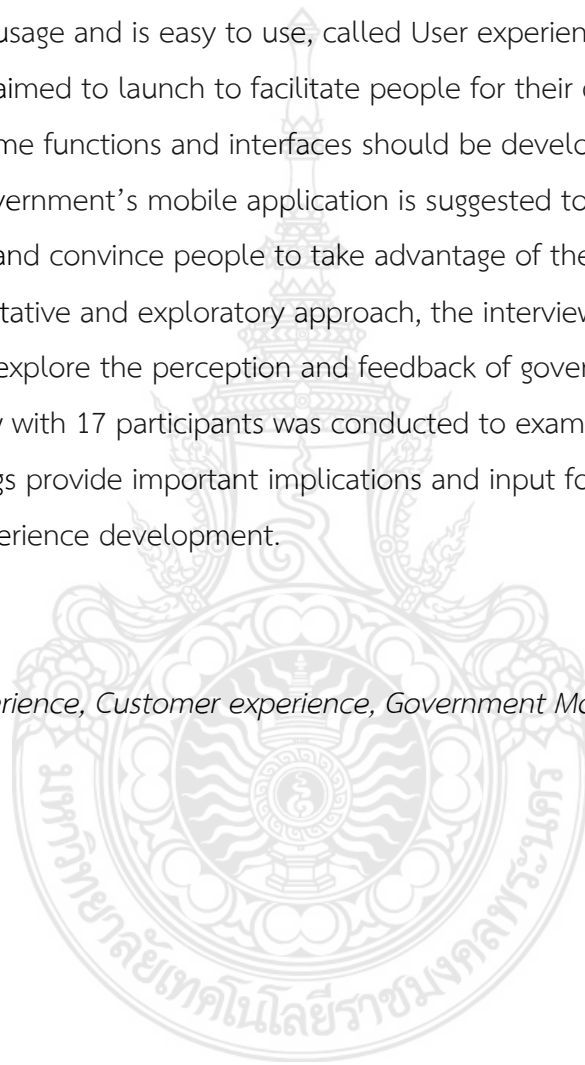
Rajamangala University of Technology Phra Nakhon

Abstract

The programmer designed the mobile application with a friendly version. Its application is planned for effortless usage and is easy to use, called User experience (UX). The mobile government application aimed to launch to facilitate people for their daily consumption and transaction. However, some functions and interfaces should be developed and customized to the specific user. The government's mobile application is suggested to explore the Customer experience (CX) to ease and convince people to take advantage of the government mobile application. Using a qualitative and exploratory approach, the interview was conducted with the customer experience to explore the perception and feedback of government applications. A semi-structured interview with 17 participants was conducted to examine the customer experience. These findings provide important implications and input for the government mobile application and user experience development.

Keyword

User interface, User experience, Customer experience, Government Mobile application, Touchpoint





ไม่มีเนื้อหาจากต้นฉบับ

Table of Content

Chapter 1: Introduction Main Issue	4
Research question	5
Chapter 2: Literature review	
Customer Journey	7
Customer experience	9
Customer experience in mobile	11
Customer Satisfaction	12
Customer satisfaction in Retail stores	14
User experience	15
Customer experience in Government mobile application	16
Chapter 3: Research Method	
Participants	19
Interview questions	20
Data collection	21
Data analysis	21
Chapter 4: Data Analysis	
Table 1:Touch point theme across customer experience	23
Awareness and perception	24
Experience	25
Benefit	26
Feedback and Development	27
Chapter 5: Discussion and Conclusion	
Discussion	29
Refevence	32

Chapter 1: Introduction

Main issue

Since the Thai government initiated a mobile government application through the government's bank in 2018 to facilitate the Thai people's life, Pao Tang mobile application (Krungthai bank, n.d.). The Thai government has driven its function to mobile payment, digital wallets, soft loans, and lottery ticket selling. However, numerous negative feedback of its unfriendly and unorganized interface and application crash have been reported (*Pao Tang App Crashes as Millions Try to Register for 2nd Phase of Subsidy Scheme*, n.d.), including the continuance intention of mobile payment service (Kaewkitipong et al., 2022). This caused problems for the Thai government to lead Thailand to a cashless society.

Among the mobile application in the Google play store (Android mobile) and App store (iPhone), the User Interface (UI) design is one of the factors that customer estimate before trying to use the mobile application service. User experience (UX), its application, is designed to be simple to use and effortless (Hassenzahl & Tractinsky, 2006). While creating the mobile application for the government mobile application, programmers used a pleasant design. They

knew that one designed application would not be a "one size fits all" for every user (S. L. T.

Hui & See, 2015). The user interface design process required research hours and customer

feedback to continuously develop the application to meet customer expectations.



Chapter 2: Literature review

Chapter 2 of the research is constructed based on the concepts and principles of marketing theories and social psychology in the mobile industry. The primary aim of this study is to investigate and analyze the consumer experience of Mobile during the pandemic in a retail setting. This research is essential because it addresses a significant gap in the current mobile research, particularly in exploring the consumer experience in this retail setting.

The following section of the chapter provides a comprehensive literature review that presents an overview of the study variables related to consumer behavior research in a retail shop. The literature review critically analyzes various factors that affect consumer behavior in a retail setting, including customer journey, satisfaction, and loyalty. The study's objectives and literature review provide a comprehensive understanding of the research's scope and significance in contributing to the existing knowledge on consumer behavior in the mobile sector.

Customer Journey

In order to improve customer satisfaction and care, the mobile industry in Thailand has recently showed a greater interest in the Customer Journey idea. The customer journey describes contacts with customers, from first information searches to follow-up feedback. According to studies, a good customer experience can enhance customer outcomes and loyalty to the mobile carrier. Mobile service providers in Thailand have embraced a customer-centric philosophy of care that entails being aware of each client's particular needs and preferences. A study conducted in Bangkok discovered that the customer's trip was influenced by the level of care, interaction with mobile service providers, and the facility's physical surroundings. Customers have stated a desire for more individualized care and more say over their medical decisions. Mobile service providers in Thailand have used a number of tactics to optimize the customer journey, including online appointment booking and telemedicine services to increase client convenience and decrease wait times. In order to improve operations, mobile operators also take client feedback from surveys and online reviews. In Thailand's mobile industry, the

Customer Journey concept is essential for differentiating mobile providers and enhancing customer happiness and loyalty.

Customer Journey in the mobile sector

Customer Journey (CJ) is a crucial idea in the mobile industry that has recently attracted more attention. The CJ is the series of encounters between customers and mobile service providers, starting with the initial information search and ending with the follow-up on customer feedback. The CJ is essential in the mobile industry for determining customer outcomes and boosting provider loyalty (Ketwarakul & Chieochan, 2019). The mobile industry in Thailand has been adopting a customer-centric approach to care, which includes understanding each customer's unique needs and preferences. The customer journey is influenced by several factors, such as quality of care, communication with mobile providers, and the physical environment of the mobile facility.

One study in Bangkok found that customers expressed a desire for more personalized care and greater involvement in their treatment decisions. This highlights the importance of understanding each customer's unique needs and preferences to improve the CJ and enhance

customer satisfaction and loyalty. Overall, the CJ has become increasingly important in the mobile sector in Thailand as providers aim to differentiate themselves in a competitive market and improve customer outcomes. By continuously improving the CJ and understanding each customer's unique needs and preferences, mobile providers in Thailand can enhance customer satisfaction and loyalty, ultimately improving the overall quality of care (Ketwarakul & Chieochan, 2019).

Customer experience

Customer experience refers to all of a consumer's interactions with a company or brand (CX). CX has become an essential part of company strategy as companies strive to differentiate themselves from competitors by offering customers better experiences.

One of the most often referenced articles in the topic of CX is The Experience Economy, written by Pine and Gilmore in 1998. It argues that businesses should put more effort into creating memorable client experiences than simply selling products and services. The authors contend that companies can accomplish this by developing personal relationships with their clients and stirring up their emotions.

Bernd Schmitt's paper Customer Experience Management: A Revolutionary Approach to Connecting with Your Customers is another one that has earned numerous citations.(2003). Five stages—sense, feel, think, act, and relate—make up Schmitt's framework for managing CX. He contends that in order to foster brand loyalty and realize long-term success, firms must produce favorable client emotional experiences.

In the mobile sector, a highly cited paper is "The Customer Experience: Evidence-based Guidelines for Improving Communication, Safety, and Satisfaction" by Boudreau and colleagues (2011). The authors provide evidence-based guidelines for improving the customer experience, including improving communication, safety, and customer satisfaction.

The effects of perceived usability, perceived usefulness, and perceived enjoyment on behavioral intentions in a shopping website context by Liu and colleagues has been studied in the e-commerce sector. (2009) is a highly cited paper. The authors propose a model for understanding the relationship between user experience and behavioral intentions in e-commerce, including factors such as perceived usability, usefulness, and enjoyment.

Overall, the literature on customer experience emphasizes the importance of creating positive emotional connections with customers and providing excellent service throughout all interactions with a company or brand.

Customer experience in mobile

Liu and colleagues' study "The Effects of Perceived Usability, Perceived Usefulness, and Perceived Enjoyment on Behavioral Intentions in a Shopping Website Context" in the e-commerce sector (Beckman & Frankel, 2003; Epstein & Street Jr, 2011). Customer-centered care involves understanding each customer's unique needs and preferences, involving customers in their care, and providing support and resources to help customers manage their health.

Another critical aspect of customer experience is communication. Effective communication between mobile providers and customers is essential for building trust, managing expectations, and ensuring customers have the information they need to make informed decisions about their care (Street Jr, 2013). The effects of perceived usability, perceived usefulness, and perceived enjoyment on behavioral intentions in a shopping website

context by Liu and colleagues has been studied in the e-commerce sector. (Stewart et al., 2000).

The physical surroundings of mobile facilities have a big impact on how customers feel. Customers and their families can experience less tension and worry by being welcomed and comfortable, which will improve their overall experience.(Ulrich et al., 2004).

Customer experience is greatly influenced by the physical surroundings of mobile facilities. Customers and their families can feel less anxious and stressed and have a better overall experience in a warm and friendly setting.(Lyles et al., 2018).

Overall, the literature on customer experience emphasizes the importance of understanding and addressing customers' needs, preferences, and expectations to provide high-quality, customer-centered care.

Customer Satisfaction

Customer satisfaction, which refers to the degree of happiness or contentment that customers experience with their mobile, is a crucial component of mobile quality. It is a crucial

indicator of how well mobile services work and has a big impact on customers' experiences and loyalty to mobile service providers.

Customer satisfaction is influenced by a number of variables, including the standard of treatment, interactions with mobile providers, service accessibility and convenience, and the setting of the mobile facility. Customers are more likely to report higher satisfaction levels and improved health outcomes when they feel heard, respected, and cared for by their mobile service providers.

Customer happiness is positively correlated with mobile quality, safety, and overall customer experience, according to research. Increased treatment plan adherence, better health outcomes, and lower mobile expenses have all been connected to high customer satisfaction levels.

By putting into practice tactics like enhancing communication, cutting wait times, offering individualized care, and integrating patients in their care decisions, mobile providers can increase customer satisfaction. Further boosting client happiness, providers can discover areas for development by asking for and incorporating user feedback into mobile operations.

Customer loyalty to mobile providers and customer results are both directly impacted by customer satisfaction, which is a critical component of mobile quality. Mobile service providers can boost customer happiness and raise overall mobile quality by putting a strong emphasis on client-centered care and ongoing service enhancement.

Customer satisfaction in Retail stores

A crucial component of mobile is customer happiness, which influences the client's whole experience and results. Building and maintaining the store's reputation in aesthetically pleasing stores depends heavily on customer happiness. Customers' loyalty and word-of-mouth recommendations are more likely to increase for mobile that promote customer pleasure.

According to studies, a number of elements, including as the level of care provided, interactions with mobile service providers, and the store's physical environment, affect customers' satisfaction in aesthetic stores. Customers also want to be involved in their treatment decisions and receive individualized care.

Mobile service providers can use tactics including providing clear and concise communication, establishing a cozy and welcoming setting, and employing technology to

increase customer convenience and interaction to raise customer happiness in attractive businesses.

Additionally, mobile service providers have access to feedback tools like surveys and online reviews that allow them to regularly evaluate consumer happiness. Mobile may make wise decisions that enhance customer happiness and outcomes by incorporating consumer input into their operations.

User experience

Based on the interaction between human and computer called “HCI:human-computer interaction,” (Millard et al., 1999; Tractinsky & Zmiri, 2006). It is explained by the person experience with the computer or mobile device. However, This is not limited to the hardware and software. Whiteside and Wixon (1987) primary stated that it was a primary feeling and emotion at the moment experienced as well as Carroll and Thomas (1988) explained the moment experience from psychological perspective as fun. Alternatively, Green and Jordan (2002)explained customer feedback toward product from the pleasure and Alben (1996) inferred the criteria of experience with the interaction between customer and quality.

In this study, the term UX and CX will be explained interchangeably. Researchers apply the definition of “User experience (UX)” from Hassenzahl and Tractinsky (2006) and “the moment of truth” from Hui et al. (2013) and Moran et al.(2014) during the period of interaction between humans and technology to explain the customer experience from the marketing perspective.

Customer experience in Government mobile application

With digital technology adaptation and the popularity of mobile applications in customer life, the Thai government drives its country to be cashless and innovative (Thailand Board of Investment, 2016; The Siam Commercial Bank Public Company Limited, n.d.). However, using digital transformation to improve the public sector is a process that takes time. It required time, people engagement, and publicity to motivate people to transform into the digital era. Launching the Government's mobile application is an internal information technology improvement in Thailand. It reduced the distance between the public and other actors (locals, civil society, private sector, and other government agencies)(Matos et al., 2021).Although the

mobile application developers intended to design a user-friendly mobile application, it still needs feedback to develop the application to match the client's needs continuously.

Davis(1989), and Davis et al.(1989) suggested that usefulness and ease-of-use perceptions are the willingness of the customer to accept the technology; in this research, it refers to the government mobile application's function. Customers have experiences anytime, they have "touchpoint" any component of a product, service, software, brand, or organization across different channels and at various times(Pantano & Viassone, 2015).

Meyer and Schwager (2007) stated that the touchpoint exists at pre- and post-purchase at various setting e.g., retail, movie steaming, website, mobile application. Additionally, customers can experience the touch point at all stages or decision-making; information searching, evaluation, service encounter, purchase, and after-sales service(Verhoef et al., 2009). For example, the customer may download the mobile application based on the user interface or the review rating on the app store or google play store.

The qualitative research was applied to explore customer perception based on Ponsignon et al.(2017),focusing on the perception of mobile government users' perspective. The

main goal was to understand how mobile government applications facilitate people's life and to indicate which component of the experience reports of the user interface needed to be more friendly and organized, as well as the frequent application crashing. The customer experience touch point is explainable through the subjective customer perception (Lemke et al., 2011).



Chapter 3: Research Method

This study aimed to explore the customer experience of the government mobile application. An in-depth interview was conducted in this study. Firstly, the study reviews the literature on User interface (UI), User experience (UX), Customer experience (CX), and Mobile application. The interview structure and interview questions were developed through a literature review. Additionally, researchers followed the case study from three countries; Moosavi et al.(2021), Ruhode, (2016), Tretiakov & Hunter (2021) to explore how the feedback from the user affects the improvement of government mobile application. Then in-depth interviews with the government mobile application user or customer were interviewed. Finally, the interview data were transcribed and used thematic analysis.

Participants

This purposeful sampling technique was used to analyze the perception of mobile applications' customer experience or online (Hair et al., 2009). This study adopted the sampling technique and how to recruit the participant from Clarke et al. (1998), Homburg et al. (2017) and Khrais et al. (2021).

Regarding to Spencer et al. (2004), the sample size adequacy evaluated the data from participants on quality and trustworthiness to validate and generalize for data analysis. The researchers follow Ritchie et al. (2003) to manage the data complexity and terminated the number of participants when no new information(Lincoln & Guba, 1985).

The participants were recruited from different professionals for appropriateness, and they best represent or have knowledge of the research topic(Elo et al., 2014). Seventeen participants comprised university students, public servants, government officers, entrepreneurs, and employees from the private sector. The participants use the government's mobile application for at least one year for daily consumption, mobile payment, digital wallets, soft loans, and lottery ticket purchasing.

Interview questions

The interview question were designed to understand the perception of government mobile application user, thought, feeling and perspective(Hammond & Wellington, 2012). The semi-structured interview was applied to this study. The interview questions were constructed from the literature review and the case studies from other countries. The questions were four

dimensions; 1. awareness and perception, 2. experience, 3. Benefit, and 4. Feedback and Development.

Data collection

Researchers approached the participants for an online interview during the pandemic to keep the social distancing. It was a time efficiency for both researchers and participants. The interview was conducted online via Zoom program with audio record permission for 20-30 minutes per person from September 1-31,2022. Faculty of Business administration, Rajamangala University of Technology Phra Nakhon, Bangkok, Thailand, provided research funding for this study.

Data analysis

The interview record was transcribed. The interview data were analyzed using thematic analysis by NVivo qualitative data analysis software version 20. Researchers sought to comprehend and understand the phenomenon's existence using data from the marketing literature and supporting evidence from the government mobile user experience.

According to Braun and Clarke (2006), the transcribed data indicated text patterns and word meanings that responded to the interview questions. Three researchers analyzed the data set from the inductive logic procedure suggested by Huberman et al. (1994), and Gioia et al. (2013). Then the customer experience data were read and coded to organize for the thematic category. Researchers had chosen thematic analysis to identify and interpret the user experience to report participants' experiences, meanings, and reality to construct user experience using the government application (Vaismoradi et al., 2013, 2016).

Developing themes required multiple reviews of the evidence and a constant back-and-forth between raw data and coded data to establish theme categories (Castleberry & Nolen, 2018). A researcher then reviewed and discussed the codes and themes of the other researcher. The researcher compared their coding and grouping, and some codes were reorganized across the category and merged to discuss the proposed theme. The themes were designated from the context and the understanding of the phenomenon. In this study, researchers look at the dominant narratives in the customer experience from digital marketing literature.

The researchers identified the themes in Table 1 and the descriptions below

Chapter 4 Analysis and Result

After the in-depth interview, researchers developed and in-depth understanding of customer experience touchpoints. Based on the thematic analysis of the semi-structured interviews, five distinct customer experience touchpoints were identified: Usage, Communicative, Innovative, App and Human interaction, and Service.

Table 1: Touch point theme across customer experience

Touch point element	Customer experience				Total
	Awareness and perception	Sensory	Benefit	Feedback and Development	
Usage	12	6	12	13	43
Communicative	13	10	6	15	44
Innovative	10	8	7	8	33

App and human interaction	10	9	8	10	37
Service	12	14	10	10	46
Total	57	47	43	56	203

Awareness and perception

Our finding showed that Usage is a distinct element of customer experience touchpoint with awareness and perception. This is consistent with the previous research that explained that the touchpoint mainly impacts the usage of mobile applications in the purchasing process (Groß & Sohn, 2021). One of the objectives of increasing its mobile government application is to facilitate the local people's lives. The result showed that the users were aware of the government's initiative mobile application project and perceived the benefit of using its mobile application. Another element from the result, benefit, could explain that people perceive a better value and gain the advantage from the government value proposition via mobile

application as the public tool to facilitate the daily life(Wan et al., 2019; Wang, 2014; Wang et al., 2020).

I know this application belongs to the government project and it should be good for people.

(Participant #2)

There is so many banking mobile application. This is one of them, but it is better for my daily purchase of the lottery, and I will not lose my lottery ticket. (Participant #6)

The government financially supports the money; this is the application. I love it, and I can use the money in this app. (Participant #11)

Experience

This study suggests that government mobile apps offer a user-friendly mobile app to improve customer experience. The interface should deliver benefits and demonstrate mobile app efficiency. This is line with Hamouda (2021) that explains why the application should contain detailed information about the service and how mobile applications can facilitate people's lives. Additionally, the result shows the number of clicks per transaction time and efficiency, government application; could be a timely click ordering.

Sometimes the app is slow when I want to pay my money, and it was complicated when I used it the first time because there was no one to show me how to use. (Participant #3)

The overall experience was good. It is easy to click when I want to pay, but sometimes it crashes. (Participant #8)

It is fast to pay, and the color is nice, like the KTB bank application. It is very familiar for me to use. (Participant #12)

Benefit

From the benefit perspective, the customer revealed that the mobile application service could provide convenience for the cashless society, and the application provides government promotion, e.g., Co-Public-People payment program (Half-half), Travel promotion(Second tire province), Government subsidy during the pandemic period. This consists of the result of Molinillo et al. (2020) that this benefit from the promotion codes comes with the usage of mobile application at the physical store, and customers perceived the better benefit from using the physical coupon.

I use this app when the government has a traveling campaign. I was confused the first time, but it was ok. (Participant #1)

Government promotion, the Half-Half program, made me use this application. I was happy and enjoyed using it for my grocery shopping. (Participant #7)

The coupon was on the mobile app. I can see how much I can use for the next purchase (Participant #17)

Feedback and Development

Users reveal that the participation in government mobile applications called e-participation (Al-Dalou & Abu-Shanab, 2013; Macintosh, 2004) could have been better if the users were part of developing the mobile government application. There were numerous false in the government application, for example, Wording, the native language (Thai) that questioning to understand, the slow speed of transactions while searching for the promotion coupon and store location, the too many privacies on the application such as being unable to do the screenshot, tons of rule and regulation, too many steps for the verification process. It is consistent with the previous study of government mobile application that needs to have

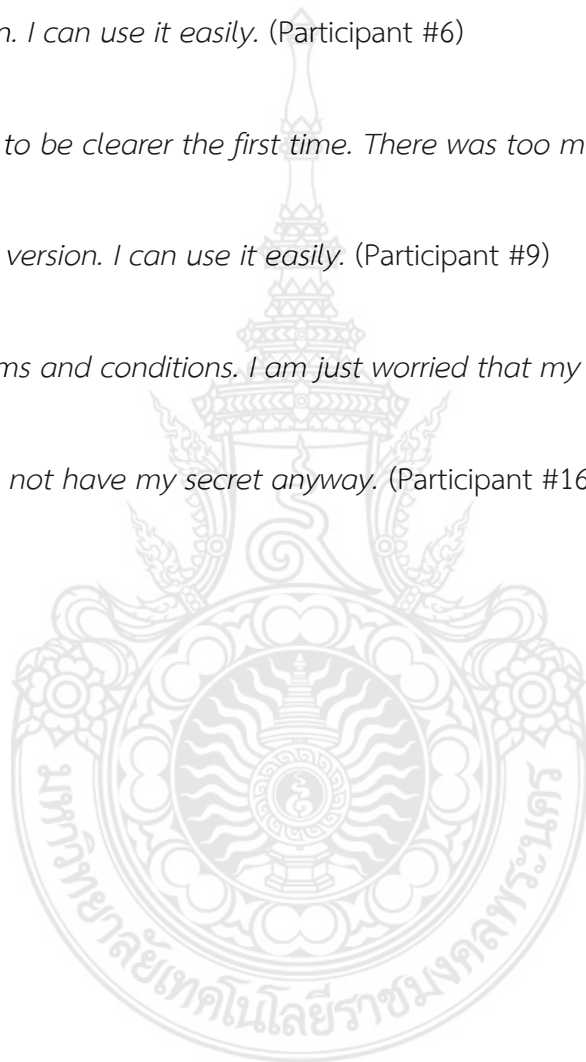
citizen-oriented and communication between the people and mobile application

developer(Mainka et al., 2015).

This mobile app was confused at the first time, there was too many advertising. After it was updated to better version. I can use it easily. (Participant #6)

This mobile app needed to be clearer the first time. There was too much advertising. After it was updated to a better version. I can use it easily. (Participant #9)

I accepted too many terms and conditions. I am just worried that my data will be a leak to the government. But I do not have my secret anyway. (Participant #16)



Chapter 5 discussion

This study aimed to explore the customer experience using the Government mobile application qualitatively. In particular, this study indicated that citizen input was required along with contact between the general public and developers of mobile applications. Also, using a mobile application in a physical store brings the benefit of promotion codes, and local people saw a more significant benefit from using paper coupons. This explains why the application ought to offer thorough information on the service and how mobile applications can make people's lives easier. This initiative project could be the foundation for the following government mobile application projects: The Universal Coverage scheme (30-baht scheme), online/onsite medical consultation appointments, real-time mass public transport information, and Street food location information.

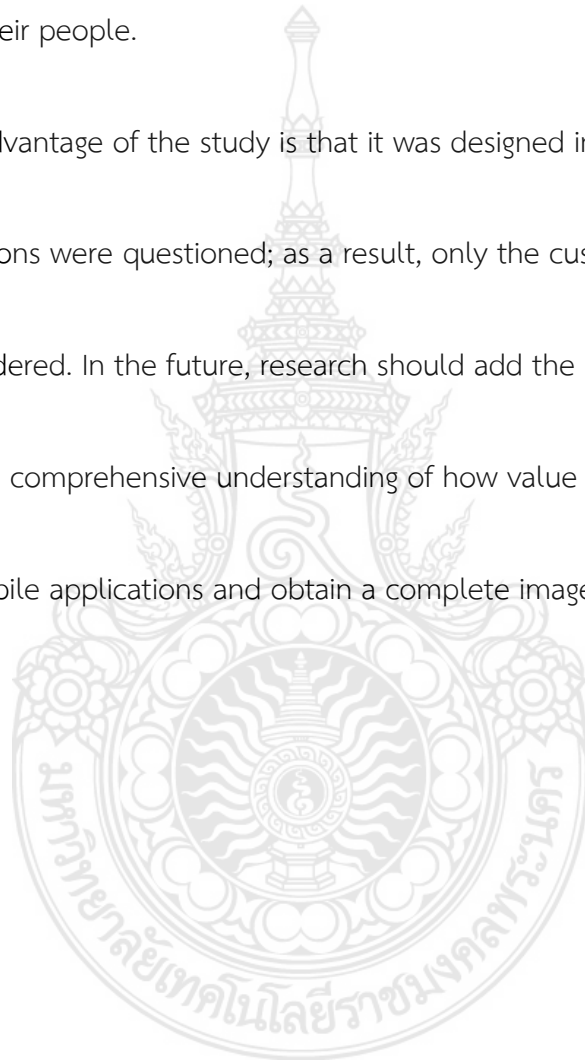
Moreover, the result displays the number of clicks per transaction, which provides information about the speed and efficiency of the government application and suggests that

timely click ordering may be possible. It should reduce the payment steps to save the user time. This is in line with Plaza et al. (2011) research that the elder is a slow learner of mobile applications and desires simple and short steps while using a mobile application. Based on WHO (2023), Thailand is one of the fastest-aging countries, and the government needs to work to reform the policy and project to respond to the challenges of the elder group. Soon, the government must redesign the application to respond to a particular group of users and include them during research and development.

In addition, the findings demonstrated that the users were aware of the initiative mobile application project that the government was working on and saw the benefits of using the government's mobile application. Secondly, individuals perceived the government value proposition from mobile application as a public tool to facilitate day-to-day life. These two results are evidence bases for the government to provide alternate marketing communication and stimulus for its people to use the mobile government application. However, this would not be successful and effective without internet access. The researchers propose the Wifi-nation for Thais. It would accelerate Thailand's society to become a digitalized and cashless society. It

would start with the particular mobile application that Thais can access, such as online education, online payment, and map/direction applications. This suggestion also aligns with the United Nations (2021) and ASEAN (2021) that encourage the countries to provide free and accessible internet for their people.

The primary disadvantage of the study is that it was designed in such a way that only users of mobile applications were questioned; as a result, only the customer's point of view and expenditures were considered. In the future, research should add the banking and saving side perspective to develop a comprehensive understanding of how value may be generated through government mobile applications and obtain a complete image of the improved standard of living.



Reference:

- Alben, L. (1996). Quality of experience: defining the criteria for effective interaction design. *Interactions*, 3(3), 11–15.
- Al-Dalou, R., & Abu-Shanab, E. (2013). E-participation levels and technologies. *The 6th International Conference on Information Technology (ICIT 2013)*, 8–10.
- ASEAN. (2021, December 1). *ASEAN Leaders' Statement on Advancing Digital Transformation in ASEAN*. <https://asean.org/asean-leaders-statement-on-advancing-digital-transformation-in-asean/>
- Arksey, H., & Knight, P. (1999). Interviewing for social scientists: An introductory resource with examples. Sage.
- Braun, V., & Clarke, V. (2006). Using thematic analysis in psychology. *Qualitative Research in Psychology*, 3(2), 77–101.
- Beckman, H. B., & Frankel, R. M. (2003). The effect of physician behavior on the collection of data. *Annals of Internal Medicine*, 139(9), 746-751.
- Bitner, M. J. (1992). Servicescapes: The impact of physical surroundings on customers and employees. *Journal of Marketing*, 56(2), 57-71.
- Boudreau, J. W., Boswell, W. R., & Judge, T. A. (2011). Effects of personality on executive career success in the United States and Europe. *Journal of Vocational Behavior*, 79(1), 3-12. <https://doi.org/10.1016/j.jvb.2010.12.004>
- Carroll, J. M., & Thomas, J. C. (1988). Fun. *ACM SIGCHI Bulletin*, 19(3), 21–24.
- Castleberry, A., & Nolen, A. (2018). Thematic analysis of qualitative research data: Is it as easy as it sounds? *Currents in Pharmacy Teaching and Learning*, 10(6), 807–815.
- Clarke, I., Kell, I., Schmidt, R., & Vignali, C. (1998). Thinking the thoughts they do: Symbolism and meaning in the consumer experience of the “British pub.” *Qualitative Market Research: An International Journal*, 1(3), 132–144.
- Davis, F. D. (1989). Perceived usefulness, perceived ease of use, and user acceptance of information technology. *MIS Quarterly*, 319–340.
- Davis, F. D., Bagozzi, R. P., & Warshaw, P. R. (1989). User acceptance of computer technology: A comparison of two theoretical models. *Management Science*, 35(8), 982–1003.

- Elo, S., Kääriäinen, M., Kanste, O., Pölkki, T., Utriainen, K., & Kynğäs, H. (2014). Qualitative content analysis: A focus on trustworthiness. *SAGE Open*, 4(1), 2158244014522633.
- Eisenhardt, K. M. (1989). Building theories from case study research. *Academy of Management Review*, 14(4), 532-550.
- Epstein, R. M., & Street Jr, R. L. (2011). The values and value of customer-centered care. *Annals of Family Medicine*, 9(2), 100-103.
- Gioia, D. A., Corley, K. G., & Hamilton, A. L. (2013). Seeking qualitative rigor in inductive research: Notes on the Gioia methodology. *Organizational Research Methods*, 16(1), 15–31.
- Green, W. S., & Jordan, P. W. (2002). *Pleasure with products: Beyond usability*. CRC press.
- Groß, M., & Sohn, S. (2021). Understanding the consumer acceptance of mobile shopping: the role of consumer shopping orientations and mobile shopping touchpoints. *The International Review of Retail, Distribution and Consumer Research*, 31(1), 36–58.
- Guest, D., Conway, N., & Trenberth, L. (2006). An exploration of employee reactions to organizational change: The role of fairness and emotions. *Journal of Applied Behavioral Science*, 42(2), 182-206. <https://doi.org/10.1177/0021886305284035>
- Hair, N., Rose, S., & Clark, M. (2009). Using qualitative repertory grid techniques to explore perceptions of business-to-business online customer experience. *Journal of Customer Behaviour*, 8(1), 51–65.
- Hammond, M., & Wellington, J. (2012). *Research methods: The key concepts*. Routledge.
- Hamouda, M. (2021). Purchase intention through mobile applications: a customer experience lens. *International Journal of Retail & Distribution Management*, 49(10), 1464–1480.
- Hassenzahl, M., & Tractinsky, N. (2006). User experience - A research agenda. *Behaviour and Information Technology*, 25(2), 91–97. <https://doi.org/10.1080/01449290500330331>
- Hwang, J., & Lee, J. (2019). The effects of employee engagement on service quality and customer satisfaction in the hotel industry. *Journal of Hospitality & Tourism Research*, 43(2), 249-272. doi: 10.1177/1096348019841529
- Homburg, C., Jozić, D., & Kuehnl, C. (2017). Customer experience management: toward implementing an evolving marketing concept. *Journal of the Academy of Marketing Science*, 45, 377–401.
- Huberman, A. M., & Miles, M. B. (1994). *Data management and analysis methods*.

- Hui, S. K., Huang, Y., Suher, J., & Inman, J. J. (2013). Deconstructing the “first moment of truth”: Understanding unplanned consideration and purchase conversion using in-store video tracking. *Journal of Marketing Research*, 50(4), 445–462.
- Hui, S. L. T., & See, S. L. (2015). Enhancing User Experience Through Customisation of UI Design. *Procedia Manufacturing*, 3, 1932–1937. <https://doi.org/10.1016/J.PROMFG.2015.07.237>
- Kaewkitipong, L., Chen, C., Han, J., & Ractham, P. (2022). Human–Computer Interaction (HCI) and Trust Factors for the Continuance Intention of Mobile Payment Services. *Sustainability*, 14(21). <https://doi.org/10.3390/su142114546>
- Ketwarakul, P., & Chieochan, N. (2019). Effect of servicescape on customers’ emotional experiences and loyalty in Thai restaurants. *International Journal of Contemporary Hospitality Management*, 31(8), 3054-3074. doi: 10.1108/IJCHM-06-2018-0453
- Kim, S., Lee, Y., & Chun, J. (2017). Effects of the interior environment of a hospital oncology ward on customer anxiety and satisfaction. *HERD: Health Environments Research & Design Journal*, 10(4), 154-168. <https://doi.org/10.1177/1937586717713651>
- Khrais, L. T., & Alghamdi, A. M. (2021). The role of mobile application acceptance in shaping e-customer service. *Future Internet*, 13(3), 77.
- Krungthai bank. (n.d.). *Pao tang application*. Retrieved February 15, 2023, from <https://krungthai.com/th/content/personal/paotang>
- Lemke, F., Clark, M., & Wilson, H. (2011). Customer experience quality: an exploration in business and consumer contexts using repertory grid technique. *Journal of the Academy of Marketing Science*, 39, 846–869.
- Lincoln, Y. S., & Guba, E. G. (1985). *Naturalistic inquiry*. sage.
- Liu, Y., Li, H., Carlsson, C., & Walden, P. (2009). Measuring customer perceived value in the context of health care service delivery. *Journal of Service Management*, 20(5), 479-497. doi: 10.1108/09564230910981970
- Lyles, A. A., Bentlage, E., Shuai, Y., Koehly, L. M., & Goodman, M. S. (2018). Evaluating the effects of a mobile health intervention on HIV prevention adherence and sexual risk behavior among young Black men who have sex with men: protocol for a randomized controlled trial. *JMIR research protocols*, 7(2), e48. <https://doi.org/10.2196/resprot.9124>

- Macintosh, A. (2004). Characterizing e-participation in policy-making. *37th Annual Hawaii International Conference on System Sciences, 2004. Proceedings of The*, 10-pp.
- Mainka, A., Hartmann, S., Meschede, C., & Stock, W. G. (2015). Mobile application services based upon open urban government data. *IConference 2015 Proceedings*.
- Matos, E., BB Lanza, B., & D. Lara, R. (2021). Mobile Government in States: Exploratory research on the development of mobile apps by the Brazilian subnational government. *DG. O2021: The 22nd Annual International Conference on Digital Government Research*, 351–362.
- Meyer, C., & Schwager, A. (2007). Understanding customer experience. *Harvard Business Review*, 85(2), 116.
- Millard, N., Hole, L., & Crowle, S. (1999). *Smiling through: motivation at the user interface*.
- Molinillo, S., Navarro-García, A., Anaya-Sánchez, R., & Japutra, A. (2020). The impact of affective and cognitive app experiences on loyalty towards retailers. *Journal of Retailing and Consumer Services*, 54, 101948.
- Moosavi, J., Bakhshi, J., & Martek, I. (2021). The application of industry 4.0 technologies in pandemic management: Literature review and case study. *Healthcare Analytics*, 1, 100008.
- Moran, G., Muzellec, L., & Nolan, E. (2014). Consumer moments of truth in the digital context: How “search” and “e-word of mouth” can fuel consumer decision making. *Journal of Advertising Research*, 54(2), 200–204.
- Pantano, E., & Viassone, M. (2015). Engaging consumers on new integrated multichannel retail settings: Challenges for retailers. *Journal of Retailing and Consumer Services*, 25, 106–114. <https://doi.org/https://doi.org/10.1016/j.jretconser.2015.04.003>
- Pao Tang app crashes as millions try to register for 2nd phase of subsidy scheme*. (n.d.). Retrieved February 15, 2023, from <https://www.nationthailand.com/in-focus/30399696>
- Plaza, I., Martin, L., Martin, S., & Medrano, C. (2011). Mobile applications in an aging society: Status and trends. *Journal of Systems and Software*, 84(11), 1977–1988.
- Ponsignon, F., Durrieu, F., & Bouzdine-Chameeva, T. (2017). Customer experience design: a case study in the cultural sector. *Journal of Service Management*, 28(4), 763–787.
- Ritchie, J., Lewis, J., & Elam, G. (2003). Designing and selecting samples. *Qualitative Research Methods*, 77–108.

- Ruhode, E. (2016). E-government for development: a thematic analysis of Zimbabwe's information and communication technology policy documents. *The Electronic Journal of Information Systems in Developing Countries*, 73(1), 1–15.
- Spencer, L., Ritchie, J., Lewis, J., & Dillon, L. (2004). *Quality in qualitative evaluation: a framework for assessing research evidence*.
- Schmitt, B. H. (2003). *Customer experience management: A revolutionary approach to connecting with your customers*. John Wiley & Sons.
- Stewart, D. W., Shamdasani, P. N., & Rook
- Thailand Board of Investment. (2016). *THAILAND IS ENTERING THE DIGITAL ERA*.
http://www.boi.go.th/index.php?page=Report_investment
- The Siam Commercial Bank Public Company Limited. (n.d.). *The “cashless society” marches ahead in Thailand*. Retrieved February 16, 2023, from <https://www.scb.co.th/en/personal-banking/stories/are-you-ready-with-virtual-money.html>
- Tractinsky, N., & Zmiri, D. (2006). Exploring attributes of skins as potential antecedents of emotion in HCI. *Aesthetic Computing*, 405, 422.
- Tretiakov, A., & Hunter, I. (2021). User experiences of the NZ COVID tracer app in New Zealand: Thematic analysis of interviews. *JMIR MHealth and UHealth*, 9(9), e26318.
- United Nations. (2021, December 1). *Building an open, free and secure digital future for all*.
<https://www.un.org/development/desa/un-desavoice/sdg-blog/2021/12/2934.html>
- Vaismoradi, M., Jones, J., Turunen, H., & Snelgrove, S. (2016). *Theme development in qualitative content analysis and thematic analysis*.
- Vaismoradi, M., Turunen, H., & Bondas, T. (2013). Content analysis and thematic analysis: Implications for conducting a qualitative descriptive study. *Nursing & Health Sciences*, 15(3), 398–405.
- Verhoef, P. C., Lemon, K. N., Parasuraman, A., Roggeveen, A., Tsiros, M., & Schlesinger, L. A. (2009). Customer experience creation: Determinants, dynamics and management strategies. *Journal of Retailing*, 85(1), 31–41.
- Wan, W. S., Dastane, O., Mohd Satar, N. S., & Ma'arif, M. Y. (2019). What WeChat can learn from WhatsApp? Customer value proposition development for mobile social networking (MSN) apps: A case study approach. *Journal of Theoretical and Applied Information Technology*.

Wang, C. (2014). Antecedents and consequences of perceived value in Mobile Government continuance use: An empirical research in China. *Computers in Human Behavior*, 34, 140–147.

Wang, C., Teo, T. S. H., & Liu, L. (2020). Perceived value and continuance intention in mobile government service in China. *Telematics and Informatics*, 48, 101348.

Whiteside, J., & Wixon, D. (1987). The dialectic of usability engineering. *Human–Computer Interaction–INTERACT’87*, 17–20.

World Health Organization. (2023, February 9). *Thailand’s leadership and innovations towards healthy ageing*. <https://www.who.int/southeastasia/news/feature-stories/detail/thailands-leadership-and-innovation-towards-healthy-ageing>





ไม่มีเนื้อหาจากต้นฉบับ



ไม่มีเนื้อหาจากต้นฉบับ