A review of customer satisfaction levels with the physical motor vehicle license renewal system in KwaZulu-Natal

By

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A dissertation submitted in fulfilment of the requirements for the degree of Masters of Commerce (MCom)

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DECLARATION

I declare that this dissertation, brought to UKZN, is my original work and that, to the best of my knowledge, it comprises no material previously published by another person, no material which has been accepted for the honour of any other degree at this or any other University, except where due acknowledgement has been made in the text.

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ACKNOWLEDGEMENTS

- My sincere indebtedness and appreciation to those who assisted me to make this research project a reality. Special thanks to my supervisor, Dr Devika Pillay, for her support and guidance. Without her endurance and passion for research, the study would not have been completed. Thank you, Dr Pillay,
- Thanks to Dr Gill, the statistician, for data analysis used for this research project, and Richard Steele for editing this research project. Both of your contributions to the success of this project is much appreciated.
- Special thanks to my whole family, especially Sbonga Mdlalose, my partner and my sons, Wabelokuhle, Asande and Sthabiso Simamane, for their encouragement and understanding. Thank you. You are the source of my inspiration.
- Special thanks to Martin Coetzee Regional General Manager operations KwaZulu-Natal (South African Post Office) for giving me permission to conduct the study within the South African Post Office. Special thanks to Winnie Simamane and Henry Edwards, senior managers operations, for the support during the study journey. Thanks to all study participants who took their time to complete my long questionnaire. Thank you.

DEDICATION

I modestly bestow this work to my family: Sbonga Mdlalose my lovely partner, and my kids Wabelokuhle, Asande, and Sthabiso Simamane, for the sacrifices they made while I was working on this research project.

ABSTRACT

Motor vehicle licence renewal has been a practice that is performed by motor vehicle owners for many years. It is a compulsory process whereby all automobile owners must register their automobile with an appropriate government agency to be able to drive on the public roads. This process entails the automobile owner paying a set amount determined by the capacity of the engine, the type, and the use of vehicle. This license must be renewed annually. This service is owned and managed by the Department of Transport who expanded accessibility to the service by appointing the South African Post Office (SA Post Office) and local municipalities as licensing agents. Considering the number of vehicles that must be renewed annually, this poses challenges due to the overcrowding experienced within the physical spaces of the licensing authorities. Non-receipt of renewal notifications and time spent waiting in queues impacts customer satisfaction with regards to in- person licence renewal system.

With the introduction of an online motor vehicle license renewal system in 2022, the licensing authorities were still experiencing longer queues which resulted in overcrowding at the physical outlets. There is a disconnect between the marketing communications promoting the existence of online motor vehicle licence renewals and customer awareness for the online license-service adoption. The limited internet coverage in rural areas to support the access of e- services, impacts service accessibility. Also, the digital divide attributed to lack of basic digital literacy, insufficient information communication technology (ICT) skills and devices especially in communities from remote areas, which further hindered the access to e- services (Aruleba and Jere, 2022). The unavailability of onsite and offsite portals which would potentially serve as customer alternatives, to access the service, especially in remote areas, would contribute to the online service adoption process.

This study aimed at reviewing the customer satisfaction level with regards to the in-person license renewal system in KwaZulu -Natal. The study further explored customer awareness and customer readiness for the adoption of an online licence renewal system, where the service is accessed through the internet. This study used a quantitative research technique and utilised the SA Post Office as a location of choice for a case study. The case study approach was used to scrutinise relationships among variables as per the stated research questions. The study population consisted of 5 000 motor vehicle owners that renewed their motor licence at various Post Office branches in KwaZulu-Natal. The study employed a stratified probability sampling

method due to the study's quantitative nature. Six post offices in various locations in KwaZulu-Natal were selected as research sites. A disproportionate stratified sampling method was used to show the representativeness of each region. The sample size as per the sampling table (Sekaran, 2000) was 357 for a population of 5 000. The actual study respondents were 282.

The study results showed that participants were generally satisfied with the in-person licence renewal system. The study results further revealed that participants were inclined towards the adoption of an online motor vehicle licence renewal system. This was affirmed by the confirmation to have access to the facilities and the relevant equipment to perform online licence renewal. Additionally, members of their social circles were already renewing their motor vehicle licenses online. This study recommended continuous improvements in the operations process, and for increased attention to customer satisfaction and communication with regards to the motor vehicle licence renewal system.

Moreover, it was recommended that the Department of Transport and its agents conduct aggressive marketing campaigns to bring awareness of the existence of the online licencing system, to ease congestion in physical outlets and increase motor vehicle licence renewal alternatives for customers.

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LIST OF ABREVIATIONS

SA Post Office - South African Post Office

E-Natis – Online National Administration Traffic Information System

ICT – Information Communication Technology

KZN – KwaZulu Natal

UTAUT – Unified Theory of Acceptance

SERVQUAL – Service quality

ALV – Application for Motor Vehicle Licensing

SMS – Short Messaging Service

RPA – Robotic Process Automation

IS – Information System

IT – Information Technology

PU – Perceived Usefulness

SI – Social Influence

PEOU – Perceived Ease of Use

PE- Performance Expectancy

FC- Facilitating Condition

TAM – Technology Acceptance Model

TRA – Theory of Reasoning Action

MM – Motivational Theory

SCT – Social Cognitive Theory

MPCU – Model of Computer Utilisation

SARS – Receiver of Revenue Services

IEC- Independent Electoral Commission

CHAPTER 1: INTRODUCTION

1.1 INTRODUCTION

The motor vehicle administration process is a complex practice that entails the control and management of motor vehicle licencing. Licencing a vehicle involves payment of a fee that is paid by the vehicle owner (Miracle, 2023). Many of the studies conducted in other countries talk about computerisation of the manual process in relation to the motor vehicle licencing process (Miracle, 2023). However, very few studies have been conducted on full-service automation of motor vehicle licence renewals, where people do not have to physically visit the licencing agencies to renew their licences. Such automation includes virtual channels which are able to simulate the service environment so that there is no need for physical interaction (Chen, & Li, 2010). (Oloyede, Oladele, Abdulrahaman, Sanni, Oyekola, Olabemiwo, Muhammad and Awwal, 2024).

This research study focused on the motor vehicle licencing sector in KwaZulu-Natal and it focused on two main areas:

1. The current renewal system that is done in-person.

2. The readiness to adopt the online renewal process for licenses.

Additionally, in looking at the current renewal system, the extent of customer satisfaction with this system was explored. This study focused on primarily the in-person license renewal system and hence, it was also deemed important to consider the readiness of such consumers to adopt the online system of renewal.

1.2 BACKGROUND OF THE PROBLEM

Motor vehicle licence renewal is a compulsory process where all automobile owners must register their automobile and renew their licences annually (Ogochukwu and Chimaobi, 2018). Considering the number of vehicles that must be renewed annually, this poses challenges where there is overcrowding within the physical spaces of the licencing authorities, non-receipt of renewal notifications and time spent waiting in queues which impacts customer satisfaction with regards to the in- person licence renewal system (Kempen 2023; Senokwane,2015)

The evolution of service provision from traditional brick-and mortar systems to advanced technology applications highlighted the transformative journey of electronic government (e-Government) which has progressed from basic websites to sophisticated web browsers and mobile applications (Tiika et al, 2024). The e-Government is expected to accrue benefits for both customers and the government's itself (Tiika, et al, 2024). This tool is expected to improve workflow efficiency and decrease costs to government agencies. It's further envisioned to assist citizens to submit applications, obtain licenses, pay bills, file taxes, and provide documentation for various purposes. (Helil et al, 2020). This would therefore be relevant in the context of South Africa, generally, and to the online motor vehicle licensing, specifically.

According to Kempen (2023), the progression in the evolution of e- Government, resulted in the introduction of an online motor vehicle licence renewal system called Online National Administration Traffic Information System (Enatis) in 2022. The system offers the following online services; online booking for driving licence renewal, booking for learner's licence test, booking for driving licence test, online motor vehicle licence renewal and online reporting of vehicle accidents (Kempen 2023).

1.2.1 Problem statement

However, despite the introduction of an online motor vehicle license renewal system in 2022, the licensing authorities are still experiencing longer queues, which has created overcrowding at the physical outlets. There is a disconnect between the marketing communications promoting the existence of online motor vehicle licence renewals and customer awareness for the online license-service adoption (Apleni and Smuts, 2020) There is also limited internet coverage in rural areas to support the access of online services, which inadvertently, impacts service accessibility. Also, this digital divide has attributed to a lack of basic digital literacy, insufficient information communication technology (ICT) skills and access to devices, especially in communities from remote areas, which further hindered the access to e- services (Aruleba and Jere, 2022).

The availability of onsite and offsite portals which would potentially serve as customer alternatives, to access the service, especially in remote areas and would contribute to the online service adoption process. Hence, the study aimed at reviewing the customer satisfaction level with regards to the in-person (physical) motor vehicle licence renewal system. The study further explored customer awareness and customer readiness with regards to the adoption of the online licence renewal system.

1.3 CONTRIBUTIONS OF THE STUDY

The study contribution can be categorised according to its academic, organisational and community and societal impact, which is discussed next.

1.3.1 Academic contribution

The study contributed in addressing a gap in the academic literature concerning challenges to customer satisfaction in the motor vehicle licencing sector. Additionally, the study contributed to the academic body of knowledge with regards to consideration for the improved uptake of the adoption process for online motor vehicle licence renewal.

1.3.2 Organisational contribution (motor vehicle licensing department in KZN)

The study enabled the identification of areas of excellence in the motor vehicle licencing sector and the impact of continuous improvement in operations, which could result in improved customer satisfaction. Also, operational benefits could be seen in terms of the management and staff of the motor vehicle licencing sector, in general, through implementation of the study recommendations where necessary.

1.3.3 Community and Societal contributions

The study also impacted in the creation of awareness surrounding the accessibility of the online motor vehicle licence renewal system. Furthermore, there was the possibility of a future reduction of queues at physical licencing sites by offering relevant knowledge about the alternatives to motor vehicle licence renewal.

1.4 STUDY PURPOSE

The study aimed at reviewing customer satisfaction levels with regards to the in-person motor vehicle licence renewal system. The study further explored customer awareness and customer readiness for the adoption of the online licence renewal system. These have been enunciated in the questions and objectives below.

1.5 RESEARCH QUESTIONS

1. What is the current customer satisfaction level with regards to an in-person motor vehicle licence renewal system in KwaZulu-Natal?
2. What is the level of customer awareness of the online renewal system?

3. What is the level of customer readiness to adopt the online renewal system?
4. How would the adoption of the online license renewal system impact service convenience?

1.6 RESEARCH OBJECTIVES

1. To determine customer satisfaction level with regards to in- person license renewal system in KwaZulu Natal.

2. To ascertain the extent of customer awareness on the existence of an online license renewal system.

3. To ascertain the extent of customer readiness on the adoption of an online motor vehicle licence renewal system.

4. To determine whether the adoption of an online license renewal system impacts service convenience.

1.7 RESEARCH METHODOLOGY

A quantitative research design method was utilised to conduct this research project. (Lazard & McAvoy (2020) explained that this kind of research method remains a proper, methodical procedure in which statistical data is employed to acquire information. These authors further elaborated that this data contains precise responses which are coded, categorised and reduced to numbers, for statistical use and analysis.

1.8 STRUCTURE OF THE THESIS

CHAPTER 1: INTRODUCTION

Chapter 1 presented a summary of the background of the research problem, research objectives, study contribution, the research design, research methodology, and thesis structure.

CHAPTER 2: LITERATURE REVIEW

Chapter 2 concentrated on the review of the pertinent and latest literature regarding motor vehicle licensing sector, customer satisfaction, and the adoption process of a new approach to motor vehicle licence renewal, namely, online via the internet. It further elaborates on service automation where motor licensing is automated and accessed through the internet. The main intention for this

research project was to review the customer satisfaction level with regards to physical license renewal in KwaZulu Natal.

The study further explored customer's awareness and customer readiness for the adoption of an online motor vehicle license renewal system. The service quality model (SERVQUAL), the unified theory of acceptance model (UTAUT) and Kurt Lewin's Change Management theory was adopted as theoretical frameworks to underpin the study. The study objectives were also used as guiding principle in collecting the literature that was applicable to the study. It played an important part in creating statements that were used in the measuring tool.

CHAPTER 3: RESEARCH METHODOLOGY

Chapter 3 presented the research methodology employed which is the quantitative research design method. A questionnaire was employed as a measuring instrument to obtain data from the study participants. The study employed closed-ended Likert scale type of questions. The measuring tool was sectioned according to the study objectives, and the questions were informed by the theoretical and conceptual frameworks of the SERVQUAL and UTAUT models. The relevant literature also formed an integral part in formulating questions used in the study.

The pilot study pre-testing was conducted on 15 participants who were customers at a SA Post Office renewing their motor vehicle licence. The intention of conducting the pretesting were to advance the measuring instrument's internal validity and finding possible challenges in adhering to the research process.

The sampling method included a probability, disproportionate stratified method, to provide for analysis of each branch and its performance in terms of participation, since the post office sites selected, differed in size and locations.

The delimitations and scope of the study concentrated on the motor vehicle licensing sector to review customer satisfaction levels with regards to physical motor vehicle license renewal in KwaZulu Natal. The study further explored customer awareness and customer readiness in the adoption of the online motor vehicle license renewal system. The study was geographically limited to the motor vehicle licencing sector in the province of KwaZulu-Natal. The SA Post Office was utilised as a case study. The study had 282 participants who owned motor vehicles and renewed licenses at the Post Office.

The study was limited to a quantitative research method since it wanted to reach a large number of participants and to allow for statistical analysis and generalisability of the results. However, it is contended that the outcome of the study could be beneficial for other appointed licencing agents as well, and for other provincial areas.

CHAPTER 4: ANALYSIS AND INTERPRETATION OF RESULTS

This chapter presented the study analysis and interpretation of findings. These findings are presented in a numerical format with figures and tables. It was further supported with relevant references where possible to provide a better interpretation and understanding of findings.

CHAPTER 5: CONCLUSIONS AND RECOMMENDATIONS

This chapter provides a summation of the previous chapters and presents the achievements of the study objectives, study limitations. It further provided recommendations and conclusions based on the study findings and it also presented recommendation for further research study.

1.9 CONCLUSION

This chapter presented an overall introduction and study design, as well as an overview of literature review and research methodology. The study limitations and delimitations were also presented. The structure of the thesis was also presented to provide the overview of the completed project. Hence the next section of the study start with literature review in chapter 2.

CHAPTER 2: LITERATURE REVIEW

2.1 INTRODUCTION

This chapter outlined the related literature on the importance of customer satisfaction on the public sector. The chapter further presented related literature on the motor vehicle license renewal system, the current process for renewing motor vehicle licenses in the South African context, the physical (in-person) motor vehicle license renewal system, the adoption of an online motor vehicle license renewal system and service automation for effective service delivery. The chapter also presented the theoretical frameworks which are employed to underpin the study. This included the service quality (SERVQUAL) model, the unified theory of acceptance (UTAUT) model and Lewin's change management model. The objectives of the study aided as a parameter in ensuring that the latest and appropriate literature was reviewed. Hence, the next section of this thesis will start with providing the necessary contextual backdrop that framed this study.

2.2 THE IMPORTANCE OF CUSTOMER SATISFACTION IN THE PUBLIC SECTOR

Customer satisfaction is a long standing and accepted field of academic study and is considered an important instrument in the business space to increase customer loyalty, organisational performance and effectiveness (Tee et al, 2018). Martin, Van Dyke, Walton and Koo (2020) stated that customer satisfaction is basically is a measure of whether a company's products and services meet or exceed customer expectations.

This suggests that customer satisfaction is an important component to focus on, in the motor vehicle licensing sector to ensure that the service rendered to customers is of a high quality. This will in turn, lead to better customer retention. Breckenridge, Farquharson, and Hendon (2014) and Dam & Dam, (2021) contend that retaining of customers is in fact a product of customer value and loyalty. These two components are the outcomes of the degree of customer satisfaction or dissatisfaction with the service rendered. It is vital for the in-person license renewal system to be continuously assessed to determine the levels of customer's satisfaction and make improvements, where necessary.

According to Martin et al. (2020), this idea has origins in the marketing sector, where customer satisfaction has been observed as a vital instrument to direct an organisation's management and enhancement initiatives. Factors such as accurateness, politeness, timelines and knowledge ability

can impact customer satisfaction. This suggests that in the motor vehicle license renewal service, factors such accuracy, timeliness, courtesy and knowledge should be taken into account as they have a direct impact on customer satisfaction (Kempen, 2023).

Dam & Dam, (2021) observed that service quality is the main element of customer satisfaction. The author's describes quality service as the customers' general impression of the absolute superiority of the organisation and its services. Customer satisfaction is an immediate response of a customer regarding the services received from an organisation.

Service quality is the difference between expected services and offered services (Abedi & Jahed, 2020). If the obtained services exceed the expectations this results in customer gratification. Service quality creates long term positive attitudes of customers towards a business (Dam & Dam, 2021). Suttikun & Meeprom (2021) adds that providing superior service quality is crucial in achieving long-term success in the service industry. The authors' further state that service quality refers to consumers' evaluation of the excellence and superiority of the service encountered. Customers who experience positive feelings and attitudes toward the services during the service consumption process are more likely to perceive favourably toward the service provider, which subsequently leads to customer loyalty.

The motor vehicle licensing sector needs to provide quality services to customers with the intention of building long term trust and maintaining a good organisational image (Kempen, 2023, Ogochukwu and Chimaobi, 2018). If clients favour one brand over others and always buy its services, this indicates a great degree of satisfaction with regards to that brand (Suttikun & Meeprom, 2021). Businesses must recognise things that assist them to satisfy and keep their clients.

Ashraf, Ilyas, Imtiaz and Ahmad (2018), Abedi & Jahed (2020), outlined five major categories that customers use to value a company or an organisation's performance:

- Service
- Tangible product quality
- Quality of relationship between customer and supplier
- Image
- Price perception.

For a physical product, quality comprises features, compatibility or usability. For a service rendering, this could entail the different dimensions of the service being offered. Dam & Dam,

(2021) and Ashraf et al. (2018) affirmed that a client that has a positive evaluation of the services of the brand will always have a strong relationship with the brand and a negative evaluation will weaken the relationship with the brand.

Customer satisfaction is not a standalone item, and there are several determinants that must be taken into consideration before a customer is considered to be satisfied (Suttikun & Meeprom, 2021). For a service, the quality of the service plays a major part in contributing towards customer satisfaction.

The higher the quality level and durability of the service, the higher will be the added positive response of customer satisfaction. The image of the business, the interaction between the service provider and customer, and price, play a vital role in establishing whether a customer will do a repeat visitation to the service outlets or not (Suttikun & Meeprom, 2021)

Repeat purchase is an indication that a customer is satisfied with all the five categories listed above. It is essential for businesses to ensure that all five categories are well crafted and accepted by customers (Suttikun & Meeprom, 2021)

Satisfying the five categories above will yield positive results, meet and exceed customer expectations, and the result will be, satisfied customers who will become brand loyal customers, and these types of customers are profitable. Dam & Dam, (2021) affirmed that the positive evaluation of a brand correlates to loyalty to the brand. Figure 2.1 shows the elements of customer satisfaction that have been discussed thus far.

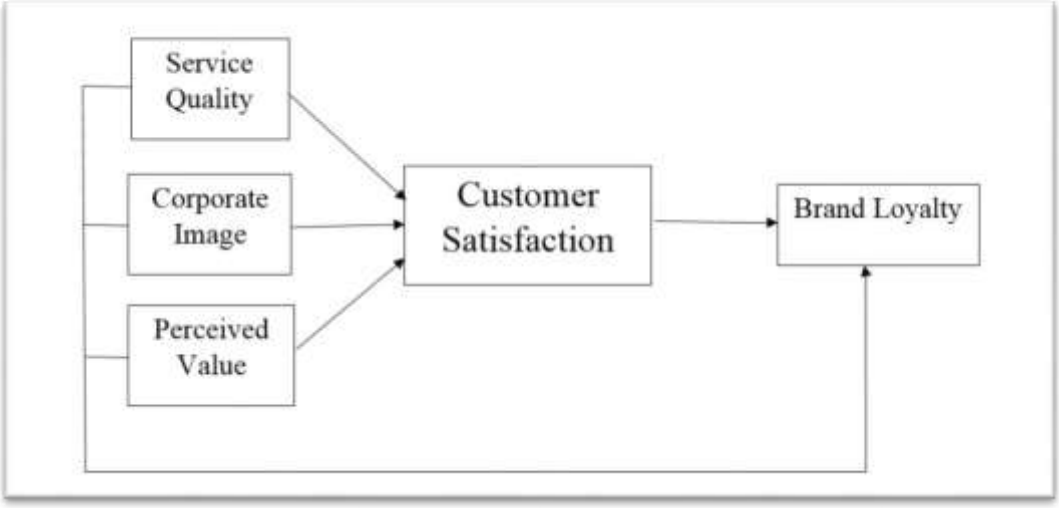

Figure 2.1: Model of Customer satisfaction diagram
Source: Dam and Dam (2021)

Turkistani, Al-Romaih, Alrayes, Al Ojan and Al-Issawi (2021) looked at customer satisfaction from a different angle. Their study focused on the lean approach as a favourable system that can be employed to deliver a high customer satisfaction level to customers. The inclusion of the lean process, focuses on waste eradication, by improving methods and focusing on the value adding activities as opposed to the less value adding activities, (Turkistani et al., 2021). The introduction of lean processes within the motor licensing sector improves services rendered and shortens the service offering process (Kempen 2023).

According Zighan and El-Qasem (2021) a service organisation's waste comprises wrong information, waiting, errors, and service delays. Sahoo (2020) add that lean thinking entails crafting and implementing a system that is able to recognise key events that contribute to delivery of a value-added services to customers. Turkistani et al. (2021) are of the opinion that before implementing lean thinking, managers need to build a culture that is amenable to it.

This means that including lean procedures, must start at the top level of a service organisations and engage the whole workforce in reformatting procedures to improve flow and decrease waste. Implementation of a lean system in any production or service process improves employee efficiency due to streamlined processes that will result in effective customer service thereby improving customer satisfaction

Leung (2020) has identified corporate image as main contributor to the customers' satisfaction with regards to product and services offered by the business. Corporate image is defined as the immediate mental picture an individual holds of the organisation which is formed based on a customer's overall consumption experiences (Leung, 2020). The author further state that corporate image is a form of competitive advantage which is hard for competitors to imitate as it can only be developed over a long period of time. Darmawan and Gatheru (2021) points out that corporate image is a combination of impacts on observers from all verbal and visual components of the company, whether planned or not or from other external influences. Therefore, maintaining a positive corporate image is critical because it significantly impacts customer repurchase decisions and willingness to provide word of mouth. (Abedi & Jahed 2020).

Darmawan and Gatheru (2021) outline that the complete information about corporate image includes the following four elements. (1) personality as a whole characteristic that is understood by the target public such as a trustworthy company, a company that has social responsibility; (2) reputation as something that has been done by the company and is believed by the target public

based on their own experience and those of other parties, such as transaction security performance; (3) values on how management cares about customers, employees who are quick to respond to customer requests and complaints; (4) corporate identity is the components that facilitate the introduction of the target public to the company such as logos, colors, and slogans.

Maintaining a high level of service quality is very crucial for building a strong corporate image. For the motor vehicle licensing sector, consistency in rendering high service quality impacts on customer satisfaction and results in positive word of mount thereby increasing number of clients that are using service (Leung, 2020). This suggest that service businesses to maintain a favourable corporate image by continuously engaging in a positive activities which tends to build a strong business image thereby impacting on the customer satisfaction.

Corporate image is significantly associated with customer loyalty in various industries like service businesses and telecommunication in multiple areas (Leung 2020). Darmawan and Gatheru (2021) debated that corporate image is a backbone for the organizations to broaden their foot print, to survive in the competition, winning new customers, expanding their market values. This suggest that for the motor vehicle licensing sector the maintaining of a good image results in customers preferring the use of that facility rather than going to another licensing authority. This creates customer loyalty as results of effective service quality obtained.

The concept of customer loyalty has happened in many discussions in the literature with different definitions. Ansari (2022) points out that customer satisfaction results in customer loyalty, the satisfied customer is more likely to come back to the facility to do the repurchase of the service. Customer loyalty has been identified as the principal factor in a business firm's success (Ansari 2022). The importance of customer loyalty is closely linked to the business's continued survival and the influence of future growth. This suggest that creating a favourable environment creates customer loyalty. For motor vehicle licensing sector, the excellent customer service, employee efficiency, effective systems, seat provided for customers creates preference and turn regular customers into loyal customers which is good for business continuity. The next section presents the current process for renewing motor vehicle licenses in South African context.

2.3 CURRENT PROCESS FOR RENEWING MOTOR VEHICLE LICENSE IN SOUTH AFRICAN CONTEXT

Senokwane (2015) and (Miracle (2023) writes that the registration of motor vehicles is regulated and is performed on the National Traffic Information System (Natis) which has been approved by the National Department of Transport.

The system was developed under the auspices of the National Road Traffic Act (NRTA) No 93 of 1996, and is the official system for registration and renewal of motor vehicle licences, driver's licences and the storage of data accidents. A car licence is renewed annually, however drivers are given a 21- day grace period to renew their licence after it has expired. After the 21 days has lapsed, penalties are introduced, and the failure to comply with stated regulations means that the vehicle owner is subjected to a traffic fine and in some cases, the impoundment of the vehicle.

A public transport vehicle has to undergo a roadworthy assessment every six months to ensure its safety and compliance to be able to use South African roads. After the vehicle has undergone a roadworthy assessment, a road worthy certificate is given for the vehicle to ensure that it has complied with road safety regulations. The next section presents the in-person motor vehicle license renewal system.

2.4 THE IN- PERSON MOTOR VEHICLE LICENSE RENEWAL SYSTEM

The National Traffic Information System (Natis) is the information backbone that supports legislation and a great variety of daily functions and transactions related to traffic at all level government. It is an online computer system, a registering authority to key in, verify and process information, in respect of vehicle registration. This system provides for various services outlined as follows, vehicle registration, licensing and roadworthiness of vehicle, drivers testing facilities, registration of authorised officers, examiners of vehicles and driving licenses, recording of road traffic offenses and professional driver registration. The main intention for this research project was to review customer satisfaction with regards to the in-person licence renewal system.

For the purposes of this study, the focus is on the motor vehicle license renewal function. The in-person license renewal system entails a customer going physically to a brick and mortar outlet to renew their motor vehicle license. This process requires the customer to complete an application for motor vehicle licensing (ALV), which is accompanied by an identity document copy, a proof of residence which is not older than three months and proof of payment. Once all the relevant documents are verified, the license disc is printed and handed to the customer.

Whilst this system has worked well thus far, it is worth noting that it can be both time-consuming and frustrating, with long waiting times and complex procedures (Miracle 2023). The distribution of renewal notices also posed a challenge whereby it did not reach customers on time, to notify them about the due date for license renewal. However, to address this issue, the renewal notices was later supported by the short messaging services (SMS), which was seen as more effective. The SMS not only served as the notification for renewal, but also contained a renewal notice number that is linked to the Natis system hence, there is no need to complete an ALV form, which speeds the process However, the SMS system still presented challenges, as not all customers would have received an SMS for various reasons or others may have lost their messages and no longer had access to them. In this occurrence the customer is asked to complete motor vehicle application form (ALV) which is not what the customer like to do. Hence the next section discusses the adoption of an online motor vehicle license renewal system in South Africa.

2.5 THE ADOPTION OF AN ONLINE MOTOR VEHICLE LICENSE RENEWAL SYSTEM IN SOUTH AFRICA

The advent of the fourth industrial revolution necessitated that government institutions moves away from the traditional paper-based systems to an electronic system (Mohale, 2024). Mafunisa (2021), observed that many countries in Africa, including South Africa have adopted the e-government system as one of the main delivery channels for municipal services and information to society. This concept of e-Government was created because of the difficulty inherent in traditional government services, which requires its modernisation through ICT as it was a much better option for government (Mensah, Zeng and Mwakapesa, 2022).

The South African government introduced the e-Natis system which is a web- based system that enables customers to perform online services such as online booking for driving licence renewal, booking for leaner's licence test, booking for driving licence test, online motor vehicle licence renewal, online reporting of vehicle crash (Kempen 2023). The author further stated that the system is said to attract more ICT literate individuals who could account for as much as fifty thousand transactions that are performed on this system monthly. The disc then gets printed and delivered anywhere in the country on a prescribed fee and it is proven to be successful system for many individuals and businesses (Mafunisa 2021).

However, despite the system being proven to be successful, not all members of the society can receive and access services digitally, due to the unavailability of the internet coverage in the rural

areas to support the access of online services (Mohale 2024). The internet broadband infrastructure is difficult to penetrate in the rural areas, which makes it challenging to maintain equal access to the online-services.

The digital divide has also contributed to low adoption of an online motor vehicle license renewal system. This is due to a lack of digital literacy in rural areas, insufficient ICT skills and smart devices to allow proper access to digital services (Samsor 2021). The concept of digital divide arises from research on the incidence of ICTs on the social structure at the end of the 90s, alluding to the inequality between countries, institutions, societies or the distinction between people who integrate technological development into their daily routine and people who are left out (González-Benito, Gutiérrez-de-Rozas and Otero-Mayer, 2022).the authors further elaborated that such particularity may be motivated by economic, geographic, cultural, generational, and educational factors, among others. However, Statistics South Africa (2020) indicates that about 36.54 million people use the internet, while 34.93 million uses the mobile network to access e-services.

The Mail and Guardian dated (2022:1) argued that due to accessibility problems, millions of people in South Africa, particularly in rural areas have been deprived of digital opportunities such as online job applications, online interviews, e-commerce and telemedicine. Since not all people have suitable access to computers and the internet, due to a lack of income, or the necessary skills, this hinders access to online services (Mayedwa and Jean 2022). This inadequate ICT infrastructure in the rural areas, impacts the adoption process of the online motor vehicle license renewal system. This forces motor vehicle owners to travel to the city centres to access the service. The delivery of the license disc poses challenges in these areas which contributes to customers choosing to remain with the in- person licence renewal system, irrespective of the challenges the system possesses. To further illustrate this, Ferrari et al., (2022) identified three barriers to digitisation and adoption of online systems in rural areas:

2.5.1 Socio cultural barriers

This entails socio cultural barriers that hinders the adoption of digitised services. Social factors such as demographics, distrust, fear, value and digital competency are all relevant in this context. The demographics relate to the age and population group who might be to reluctant to adopt the digitised services due to certain reasons. Distrust emanates from the ICT companies who may use

data in profiling the system users and use that data to sell other products or data ends up in wrong hands (Ferrari et al., 2022).

Fear is often based on real threats such as the risk of dependency from technology, the presence of hidden cost such as those related to the maintenance of installed technology and the privacy concerns related to data sharing (Ferrari et al., 2022). Adoption of online services comes at a cost, as it requires equipment, and an internet connection is required to gain access and start transacting.

Value relates to the benefits that a new system brings to individuals compared to the current system that they are using. Factors such as competency, general lack of higher education, specific knowledge of technologies, as well as practical skills to deal with technology are critical to online adoption. The lack of necessary ICT skills, distrust from service providers hinders the adoption of the online motor vehicle license renewal system especially in communities from rural areas. The barrier induces fear from the potential users that their personal information can be misused for other purposed rather than used for motor vehicle license renewal.

2.5.2 Technical barriers

This is related to four main quality aspects, which include; connectivity, dependability, usability and scalability. Connectivity relates to ICT infrastructure and internet connectivity that is integral to online transactions being processed. (Ferrari et al, 2022). Without the active internet access, customers from the rural areas are unable to perform online license renewal. Dependability is related to the present technologies being reliable particularly in rural environments such as fields and forests.

The environment also impacts on the functioning of technology and internet coverage. This is a further barrier in terms of accessing online motor vehicle renewal services. The ease of understanding, related to the usability of technology. This could lead to hindrances especially in the language used. Voice recognition systems could be of particular importance here, as it could assist in the elimination of manual entries to complete information in required fields. The use of this feature would add value and speed up the license renewal process especially for the literacy impaired individual and others that may have additional difficulties with utilising a keyboard.

2.5.3 Economic barrier

Economic barriers are mostly related to difficulties in dedicating financially sustainable investment in technological solutions. The cost of technology and lack of funding are barriers in

the adoption of the online services, since the individuals and the business must purchase equipment's suitable to be used in executing the online transactions

According to Mafunisa (2021) multipurpose community centres should be built strategically in the rural areas and used to help digitally illiterate citizens acquire the ICT skills required for participation, and accessibility to e-services. This will help in increasing the adoption of an online motor vehicle license renewal in the same space as the urban areas. This suggest that government and private business to invest in the communication information technology infrastructure and builds up facilities that will in turn train and educate the individual on how to use this technology to transact and access online services. This will benefits governments, businesses and the individuals and also improves on the access on the online services.

The author further stated that the deployment of service portals as a gateway to internet usage at strategic points, such as, municipalities, community centres and local businesses, expands the online-service accessibility. This allows for service portals to be used as an alternative channel, to access the online motor vehicle license renewal. This can also be useful for customers that prefer self-service or may have difficulty accessing their own internet service. The services portals should be connected through the local Wi-Fi for the expansion on the internet accessibility at no cost to the customer.

2.6 SERVICE AUTOMATION FOR EFFECTIVE SERVICE DELIVERY

Albukhitan, (2020), explain that automation is a crucial phase in managing cost containment in the present economic climate across all sectors counting financial services, manufacturing industry and public sector. Automation is an exercise at an industry level that enables users to advance, regulate and access services through the use of self-service.

Hollebeek, Clark, and Macky (2020) points out that automation does not only transfer employee roles to machinery and internet webs, but comprises a profound reorganisation of work, with a redefinition of the roles of employees and machinery. According to Sampson (2021) and Mbuvi, Namusonge and Arani (2016), automation involves a variety of applications that use computer technology (software), for example, database applications, spreadsheets, word processing, and record management software that is specifically written. This suggests that many processes that have been performed by humans can be automated and geared for self-service systems enabling customers to serve themselves through the web based -self-service system.

This creates greater flexibility for customers who are more comfortable interacting with machines rather than with human beings. This suggest that the automation of motor vehicle licensing renewal system into an online system provides customer flexibility and expands on the customer choice in terms of motor vehicle license renewal.

However, automation presents many challenges, as any transition from a manual system to an automated system requires tremendous support for customers until the business is satisfied that customers are able to serve themselves without any assistance from employees that are deployed to assist on the new system. It is pivotal for service portals to be introduced at any licensing authority to expand the service accessibility. Personnel can be deployed to assist customers that are struggling to use service portals.

Sampson (2021) points out that system mechanisation provides enhancements that are measurable in terms of usefulness and efficiency, and requires constant improvement. The author emphasises that mechanisation is capable of presenting massive efficiencies to business processes that can result in revenue growth. Thus, service automation not only saves costs in the operations processes because customers serve themselves, but can make a positive contribution to profits.

Wongsansukcharoen (2022) found that customers that prefer self-services perceive this to be cost and time saving, and perceive that they have greater control within the context of the service process. The author found that in an offline setting self-service customers favour self-service rather than inter-personal interaction believing that they can serve themselves more proficiently than depending on a person to serve them.

Some customers that have been exposed to an online self-service environment find it difficult to transact in an offline setting since they are not comfortable interacting with human beings. It is pivotal for the business to cater for these clients and ensure that they receive efficient service and instant support when needed (Valgaeren, 2019).

Prettner and Strulik (2020) point to the importance and the benefits of automated self-service technologies in business operations. The self-service option not only reduces service providers' workload, but also enables clients to take control of a service process. This suggests that online motor vehicle licencing renewal automation would reduce the workload post office service providers and at the same time give control and flexibility to the services users.

This is not only benefit customers, but the business as well, since there is a shift of work that used to be performed by employees to customers doing the transactions for themselves. The related

cost savings that can come from this shift, is now allocated to improving the overall business processes to encourage more customers as users. The introduction of service portals at the South African post office and other licensing authorities would greatly expand the services accessibility and customer's choice.

Musa (2020) points out that during service failure in the self-service setting, clients take responsibility to notify the service provider of the technical error or the service failure. This suggests that in self-service, both customers and service provider, have a role to play. Hence, the customer alerting the service provider of the service failure and the service provider swiftly deploy technicians to attend to a problem, results in reduced system down-time, since direct alerts are made to service providers, to attend to technical problems.

(Mohale, 2024) noted that developed countries like the United States of America (USA), adopted online licence renewal systems a long time ago, whereas some African countries are still trailing behind when it comes to the adoption of a fully automated online licence renewal system.

Prettner and Strulik (2020) and Marciniak (2017) explains that basic automation is the writing of script in a software environment, and Robotic Process Automation (RPA) is a tool that automates repetitive activities such as information extraction and cleaning through the current user interface. The author further stated that automation is a developing set of innovative technologies that puts together ultimate process redesign with RPA and system learning. This procedure imitates human tasks, learns it and performs it even better.

It is pivotal for management to understand the RPA processes and what the system can do. The system is equipped with a multitude of functions that it can perform. This provides the opportunity to assess the processes and decide which tasks can be automated by choosing a relevant RPA process that can be applied. With the online motor vehicle license renewal all manual processes are eliminated, there is no longer a need to complete any physical forms everything is digitised. The customers are only required to upload documents into a system.

Furthermore, delivery of goods and services usually poses challenges in these areas. Partnering with other businesses such as local supermarkets, stores and automated parcel lockers, is crucial for effective delivery of licenses. This expands service accessibility and also increase the service popularity within the rural communities and other communities in general.

Prettner, & Strulik, (2020) and Deutsch and Golany (2018) describe automated parcel locker systems, as automatic systems that allow the collection and shipment of goods and documents

every day, including holidays. In South Africa companies like Ricoh smart lockers, Pudo lockers by Courier Guy and DSV lockers has already adopted these digital lockers for effective delivery of goods and services. The parcel lockers like this have limited dimensions and digital locks with adjustable codes for opening so that they can be utilised by different customers when convenient to them.

This suggests that automation is an integral part of e-commerce, as it makes it easier to enable other business processes, thereby creating convenience and easy access for customers to receive their parcels, documents and other goods, on time. The introduction of automated parcel lockers that are placed strategically, would create convenience for motor vehicle license renewal customers and improve on delivery of licenses especially in rural areas, where street delivery is a challenge. The next section presents theoretical frameworks that underpin the study.

2.7 THEORETICAL FRAMEWORKS

Solomon (2020) defined a theoretical framework as a structure that guides research by depending on a formal theory; that is, the framework is constructed by using an established, logical explanation of certain occurrences and relationships. The author further stated that in essence, a theoretical framework is the anchor that supports the research questions and the problem statement. It also serves as a theoretical lens through which this study's findings are analysed and discussed.

The current study was underpinned by the following theoretical frameworks, the Service Quality Model (SERVQUAL) developed by Parasuraman, Zeithaml and Berry in 1988, Unified Theory of Acceptance Model (UTAUT) by Venkatesh, Morris, Davis and Davis in (2003) and the Lewin's Change Management theory which was developed by Lewin in 1940. The researcher found these theoretical frameworks suitable to underpin this study since the main objective of this study was to review the customer satisfaction level with regards to in-person or physical license renewal system. The study intended to further explore the customer awareness and customer awareness on the adoption of online license renewal system.

The SERVQUAL model was considered relevant and it was adopted in the current study to ascertain the customer satisfaction level with regards to in- person license renewal system. The study further adopted the UTAUT model to specifically, describe the behavioural intention of motor vehicle license renewal customers towards the adoption and use of technology to renew their motor vehicle license.

The study also adopted Lewin's 1940 change management model to highlight how the South African e-Government system has evolved from the traditional paper based system to an electronic one. This was intended to showcase how the new approach improved service delivery to motor vehicle license renewal customers. Each of these conceptual frameworks will be discussed in further detail in the next sections.

2.7.1 Conceptual framework 1: The Service Quality Model (SERVQUAL)

This service quality model was developed by Parasuraman, Zeithaml and Berry in 1988. Alalwan, (2020) described SERVQUAL as a multidimensional research instrument designed to measure consumer expectations and perceptions of service quality, it helps to identify areas where service quality can be improved.

The SERVQUAL conceptual framework consist of five dimensions which are tangibility, reliability, responsiveness, assurance and empathy. The model is used to measure the customer satisfaction level with the regards to the service rendered or product offered to the customer. This model is widely used across industries to measure the quality of the services and the level of customer satisfaction. For the purpose of this study, this theoretical model was adopted to assess the customer satisfaction level with regards to in- person motor vehicle license renewal system. The dimensions are discussed in details below.

2.7.1.1 The Tangibility Dimension

This dimension refers to everything tangible and affects the quality of service to customers, this includes, physical appearance of service place, clean and tidy waiting rooms, physical staff, room ambiance, decorations, interior etc. The tangible dimension is the part of the increasing condition of the employees to act on time in accordance with wishes of customers. The better the tangibles provided by the organisation the better the service provided customers. Kalantarzadeh Tezerjany, 2024). Etis (2017) added that tangibility is the extent to which physical resources, equipment and appearance of staff or personnel are presented in adequate manner for better service provision to customers. Alalwan, (2020) points out that when consumers have positive experiences with the five service quality dimensions just described, they are likely to become loyal and satisfied customers and generate referrals and repeat business, which can, in turn, lead to increased market share, business expansion, and greater profitability. The location of the licensing outlets, seating provided for customers while waiting to be served and the efficiency employees who assist with

license renewal serves as tangibility dimensions, that is aimed at improving the quality of services rendered to customers.

2.7.1.2 The Reliability Dimension

The reliability dimension is the ability and the commitment possessed by the employees to provide services. The decision taken is the desire to adjust performance to customer expectations, which means the timeliness and the same services is offered to all customers. Alalwan, (2020) added that reliability is a core aspect of service quality, built upon factors like accountability and the overall quality of the service provided. To assess the reliability of the services rendered to the in-person motor vehicle license renewal customers, factors such as the system being online would be important. Any downtime of the systems means that there is no service for that particular time which impact on the reliability.

2.7.1.3 The Responsiveness Dimension

This dimension refers to the company's action in responding to customers promptly. For the current study, this is related to the company's ability to notify customers on time about the renewal date of motor vehicle license and the message is communicated either using a renewal notice document or short messaging services (SMS). Effective queuing management and employee efficiency in the motor vehicle licensing outlets contributes to quicker response to customers in accessing the service thereby contributing to the improvement of quality of the service.

2.7.1.4 The Assurance Dimension

Sarsale and Caday (2020) stated that, assurance is "*the employee's knowledge and courtesy and their ability to inspire trust and confidence"*. The authors further explained that assurance can be defined as the extent to which the staff's knowledge and capabilities create trust and confidence, which then influences customer satisfaction.

Mardifin (2019) points out that this element refers to the company's ability to foster trust in the customer's eyes through the friendliness and knowledge of the staff in service. For the current study the employee knowledge and friendliness at the motor vehicle licensing outlets, provides assurance to customers, which contribute positively towards customer satisfaction. The employee professionalism provides assurance to customers, which impact on the level of the service given a customer.

2.7.1.5 The Empathy Dimension

Empathy refers to the attention a company pays to its customers. The practice of corporates understanding customers, can be realized by, listening to customers, helping customers find solutions, by understanding what becomes anxieties of customers, creating solidarity with customers, and not leaving customers alone, (Mardifin, 2019). Paul and Mittal (2016) point out that empathy is one of the factors of service quality which has the ability to deal with client's attention separately.

The empathy element is considered to relate to the emotions portrayed by the service provider or the organisation towards the service receiver. Someone can be considered as having empathy if they show sympathy and compassion towards a customer need. (Sarsale and Caday 2020). Going an extra mile and providing alternatives to customers' needs portrays empathy, which tend to impact on the customer satisfaction.

2.7.2 Conceptual framework 2: The (UTAUT) Model

The unified theory of acceptance model (UTAUT) was created by Venkatesh, Morris, Davis and Davis in (2003). The UTAUT model states that there are four vital constructs to comprehend user technology acceptance, namely, facilitating conditions, performance expectancy, social influence and effort expectancy." (Venkatesh et al., 2003).

According to Alkhowaiter, (2022) this model provides a broader picture and clearer comprehension of the acceptance process, than any other model. This model was proposed and authenticated with the intention of providing an integrated theoretical basis for research on an information system (IS) and information technology (IT), and on acceptance and diffusion. Alkhowaiter, (2022) further states that UTAUT further seeks to clarify user intentions to make use of an information technology system and the individual usage behaviour. This model incorporates concepts and theories from various other models, which are utilised to clarify and predict the user acceptance of technological innovations.

For this study the UTAUT model was employed as the underlying theoretical basis. Since various other models have contributed to the development of it, the model is therefore, based on four primary constructs. These are perceived ease of use (PEOU), perceived usefulness (PU), social influence (SI), and facilitating conditions (FC) (Razzak and Jassem, 2021). These constructs were used to assess customer awareness and customer readiness to adopt the online motor vehicle

licence renewal systems. These theories can be utilised to predict the possibility of accepting an innovative technology (Venkatesh et al., 2003). The four UTAUT construct are discussed in detail below.

2.7.2.1 Performance expectancy

Performance expectancy (PE) is the extent to which one trusts that using a system will assist in achieving some benefits in one's job (Ogourtsova, Archambault, & Lamontagne, 2019). The authors further refer to (PE) as the extent to which one trusts that the usage of technology will result in performance improvement. Similarly, Alkhowaiter, (2022) noted that (PE) is a unification of perceived usefulness, extrinsic motivation, job-fit, relative advantage and resultant expectations.

Sewandono, Thoyib, Hadiwidjodjo and Rofig (2023), pointed out that members of society and government institutions will use a system of information and communication technology, if the system can help to improve their performance to deliver service to the society at large. Jakoet – Salie (2020) postulates that currently, more and more people rely on technology to access information and government services that help them enjoy a better quality of life. Therefore, information technology is increasingly present in the public sector today.

The performance expectancy theory indicates that people or government departments are motivated to adapt to a new system of technology, if the system yielded better results and simplified their performance, when engaged with societal and government services. This suggests that customers that are currently using the in- person license renewal system will adopt the online motor vehicle license renewal system if the system is perceived to yield benefits and improve their lives.

2.7.2.2 Effort expectancy

Effort expectancy (EE) is the ease experienced when using any technology (Ogourtsova et al., 2019). The authors further noted that key influencers of technology adoption are related to the perceived usability of a technology. Venkatesh *et al.* (2003) are of the view that (EE) is more relevant for persons with lesser knowledge. This suggests that motor vehicle licence renewal customers need to perceive the system as easy to use before they will adopt such a system. The efforts expectancy relates to this study because it emphasizes that if people cannot perceive the ease of use and access to technology, they will be discouraged from accepting and embracing the new technology system.

2.7.2.3 Social influence

Social influence (SI) is the degree to which one believes that significant others, that they trust, use the technology (Ogourtsova et al., 2019). The most influential factor in this regard is that their family and friends approve of, and accept the technology. Baishya and Samalia, (2020) noted that social influence has substantial effect on the aim to use simulated learning environments in developed countries such as the USA and the UK. Similarly, Jakoet –Salie (2020) established that social influence has a substantial effect on the acceptance of technology in developed countries.

Rahman, Alam and Taghizadeh (2020) points out that government and members of society depend on the opinion of others and their social environment to consider adopting and using technology. In 'this regard, the UTAUT model, postulates, that people, business and government are more influenced by others in adapting to the new system of technology. For the current study, this suggests that customers are influenced by family and friends on how they do business. This means that if the online motor vehicle license renewal system is already adopted within the social environment, it will be easier for others to accept and utilise the system. Therefore, this theory of social influence is in line with the study, because its states that people's motivation depends on others successes, given the results achieved by the individuals that are already using the technology.

2.7.2.4 Facilitating conditions

Ogourtsova, Archambault & Lamontagne (2019) define facilitating conditions as being the extent to which organisational and technical infrastructure exists for backing up the use of any technology. The authors further observed, that, the businesses' current resources must support acceptance of a new technology. Lehmann, Blumschien and Seel (2022) pointed out that people believe that the availability of ICT infrastructure to enable access to online services will motivate them to accept the use of technology.

The facilitating conditions for the current study were the availability of all facilities that are required to perform the online licence renewal. This includes elements such as, equipment, internet connectivity and so on, without which, the availability of the facilitating conditions creates a barrier in the adoption of a new motor vehicle license renewal system. This theory of facilitating conditions, is outlined as an enabler towards the adoption of new technology systems.

In support of the UTAUT model, the individual model was found to be more relevant to the study and are discussed in further detail.

2.7.2.4.1 Technology acceptance model (TAM)

This model was advanced by Fred Davis in 1986, from reworking of the TRA. This model proposes two main elements that impact a user's choice in adoption and use of new technologies. These are: perceived ease of-use (PEOU) and perceived usefulness (PU) (Davis et al., 1989). This model is useful because at the online motor vehicle license renewal system new customers are undergoing the adoption process. Davis et al. (1989) and Gromadka, (2020) add that PU is a point where an individual considers that utilisation of a certain information technology system will enhance their job performance. Perceived PEOU is the phase where an employee trusts that using a certain technology system will be easy and uncomplicated. Figure 2.2 presents the TAM.

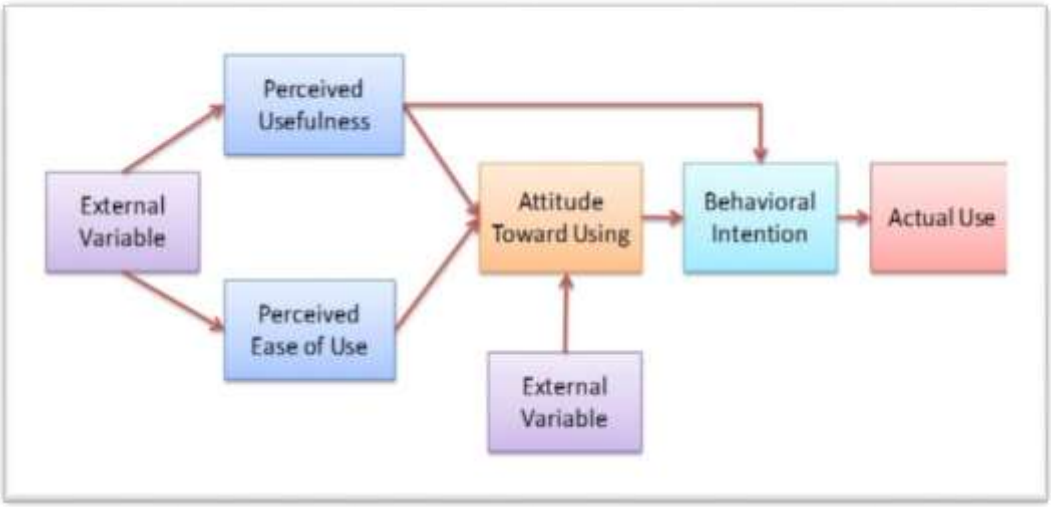

Figure 2.2: Technology acceptance model (TAM)
Source: Davis et al. (1989)

TAM is broadly utilised for reinforcement of studies on the use of and acceptance of new technology. The model's strength lies in its simplicity and consists of only two constructs, namely, PEOU and PU, to forecast a person's level of technology acceptance (Ince-Muslu & Erduran, 2021). For the current study this model was relevant since the chosen theoretical framework to underpin the study was the unified theory of acceptance model which is the extension of TAM. The two constructs from this model, related to perceived usefulness and perceived ease of use, was used to ascertain the levels of customer readiness in the adoption of an online motor vehicle license renewal system.

Perceived usefulness is the perception by an individual that adoption of the technology is going to improve the individual's or the organisation's job performance. The PEOU is the user's

observations about how easy it will be to use the information technology system and how user friendly it is (Alkhowaiter, 2022).

In addition, TAM proposes that the usage of the technology is predicted by the intention to use it. This model suggests that for the user to fully adopt a system it has to add value or simplify job processes and be easy to operate. This will drive the users into a positive behavioural act with the intention of wanting to try or adopt the system.

A number of research studies have adopted TAM to underpin their theoretical framework and study justification. Davis, Bagozzi, & Warshaw (1989) conducted a longitudinal study to test the TAM model. The results revealed that PU was a crucial element contributing to user's behavioural intention to use the technology.

The study further revealed that PEOU has an effect on user intention in the first hour of technology introduction, with the effect becoming non-significant three weeks after system usage. The intention to adopt is influenced by the PEOU construct which motivates users to adopt the technology into their routine operations. TAM provides clarification of user adoption and utilisation behaviour of technology systems (Ince-Muslu & Erduran, 2021). The authors state that empirical research has validated TAM as a useful theoretical model within information technology systems research.

2.7.2.4.2 Theory of reasoned action (TRA)

The adoption or not of technology has turned into a vital topic in business operations especially in the domain of information technology research (Ajzen, & Fischbein, 1980). Many research studies have been carried out over time in an effort to comprehend the dynamics that determine user adoption of and use of technology (Davis, Bagozzi, & Warshaw, 1989). The TRA model was created by Ajzen and Fischbein in 1980.

It has its origin in social psychology, and was introduced with the aim of assessing the differences between attitude and behaviour. The supposition underpinning this theory is that certain behaviour is reliant on the user's aim to achieve the behaviour in question. The practitioners using the TRA model maintain that there is a fundamental connection between intention and behaviour, therefore, user action can be predicted based on the individual's attitude towards that act (Ajzen, & Fishbein, 1977).

Ajzen and Fishbein (1980) further elaborate that this model proposes that the individual's behaviour is set by her or his behavioural aim where the behavioural aim is a function of attitude towards the behaviour and subjective norms surrounding the performance of the behaviour. Figure 2.3 presents the TRA.

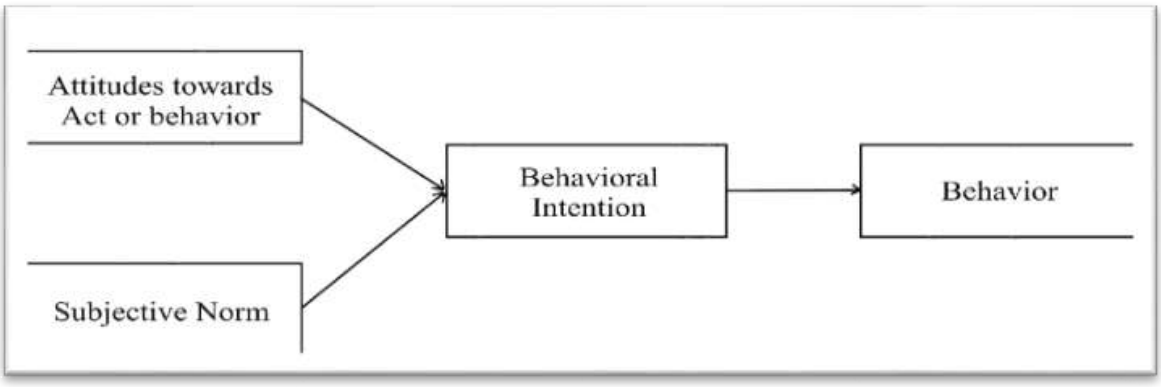

Figure 2.3: Theory of reasoned action
Source: Davis et al. (1989)

TRA is commonly and broadly used in different research studies, and has proven to contain dynamic behaviour-predictive validity (Davis et al., 1989). However, this theory has been criticised for not including spontaneous actions.

This theory is applied to predicting user behaviour based on previously held beliefs in a given context. This model was essential for this study since it assist in predicting behaviour and the aim of the user towards the adoption and the acceptance of information technology. It was pivotal to ascertain attitude and the aim of participants on the adoption on an online motor vehicle licence renewal system.

2.7.2.4.3 Motivational model (MM)

This model was advanced by Davis Bagozzi and Warshaw in 1992. The MM model consists of constructs that are related to intrinsic and extrinsic motivation (Davis et al., 1992). Kojima & Ohno, 2022) define intrinsic motivation as the degree to which utilisation of a technology can be experienced as enjoyable.

Extrinsic motivation is described as the degree to which a person believes that a technology will improve their work and job situation. Shin & Hur, (2020) added that MM explains the external and internal powers that result in the commencement, intensity, direction, and persistence of

behaviour. This model focuses on breaking down the user acceptance of information technologies using the motivational elements, namely, extrinsic and intrinsic motivations (Shin & Hur, 2020).

This model focuses on the motivation of the users for example the study participants inclination towards the adoption of an online motor vehicle licence renewal. They perceived it as a system that saves them time, money and created convenient access, hence, this was a motivational factor for the adoption process.

2.7.2.4.4 Social cognitive theory (SCT)

The SCT is a psychosomatic model of behaviour articulated by Albert Bandura in 1989. This model proposes that learning takes place in a social context in which people observe others thereby acquiring knowledge, skills, strategies, attitude and beliefs (Baishya and Samalia, 2020).

Dearing and Cox (2018) and Baishya and Samalia, (2020) added that this model takes into consideration environmental aspects such as social pressures as well as personal factors that influence a person to accept a technology. Baishya and Samalia, (2020) further explains that according to this model, observing other people practicing a behaviour, for example using a computer, influences their views of their own ability to engage in that behaviour.

The SCT is commonly used for research in a variety of fields including, computer utilisation (Mellita and Elpanso 2020). The advantage of this model compared to other information technology acceptance theories is that it puts together two levels of analysis, namely, individual and organisational (Baishya and Samalia, 2020). Social influence circles play a major role in the adoption process. For the current study, people within different communities were already renewing their motor vehicle licence online. This created the awareness of the existence of the online system. This motivated study participants in wanting to adopt the online system.

2.7.2.4.5 Model of personal computer utilisation (MPCU)

The MPCU seeks to explain what the factors are that influence an individual to start using a computer voluntarily. Factors include social factors, the user's feelings about using a computer, and social factors such as societal norms associated with computer usage (Mellita and Elpanso 2020) (Figure 2.4). Provision of training for users of the PC is one of the facilitating conditions that can encourages system usage (Alkhowaiter, 2022). Figure 2.4 presents model of personal computer utilisation

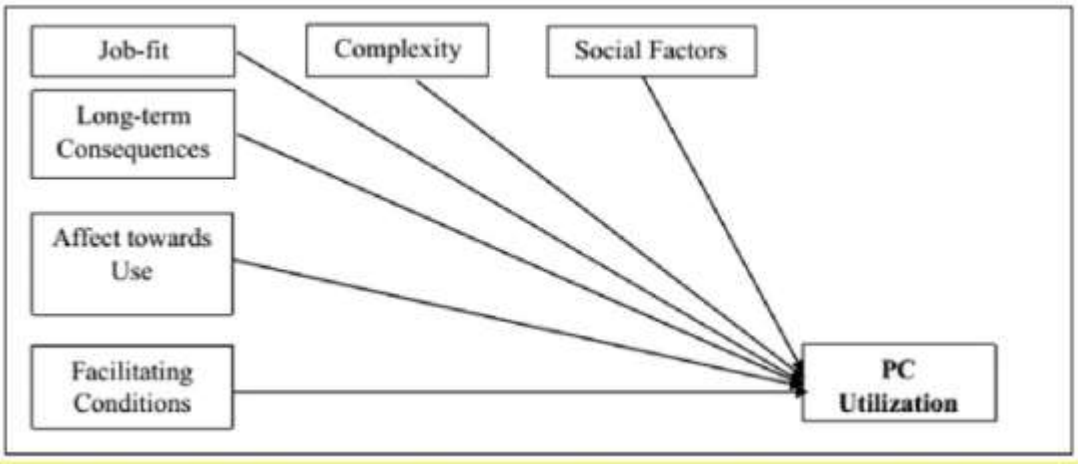

Figure 2.4: Constructs of the model of personal computer utilisation
Source: Mellita and Elpanso (2020)

This framework allows a researcher to predict a person's adoption, comprehension and usage of different information technologies (Alkhowaiter, 2022). The usage of information technologies, like lap tops, personal computers, smart phones, and information technology portals are vital for the use and the adoption of an online motor vehicle licence renewal, since the transacting took place on these devices.

2.7.2.4.6 Theory of planned behaviour (TPB)

Ajzen, developed the TPB in 1988 with the aim of including the perceived behavioural control construct in the process of forecasting behaviour (Mellita and Elpanso 2020) the aim was to upgrade the TRA so as to better estimate user behaviour as suggested by Ajzen (Ajzen, 1985, 1991). The plan (intention) to do the behaviour is regarded as central, and as being based on an individual's perceptions and what they believe they can control (Ince-Muslu & Erduran, 2021). This model suggests three theoretically autonomous factors of intention: attitude, perceived behavioural control, and subjective norms (Ince-Muslu & Erduran, 2021). Attitude refers to the assessment of risk, and their assessment of their ability to execute the behaviour under consideration (Ince-Muslu & Erduran, 2021). According to Ajzen (1991) subjective norms refer to thoughts held by others that are significant in an individual's life such as family members, about the behaviour, and the degree to which the individual seeks to comply with the existing norms in a particular condition.

Perceived behavioural control relates to the presence of factors that enable performance of behaviour (Ince-Muslu & Erduran, 2021). The behavioural control factors that may enable

performance of behaviour include abilities, availability of reliable information, opportunities, self-confidence, support from significant others, and emotional independence (Alkhowaiter, 2022).

This model suggests that a combination of attitudes, perceptions of control, and subjective norms, in the presence of actual control, impacts the performance of behaviours (Mellita and Elpanso 2020). Most studies have utilised this model to forecast and understand human's intention to accept and embrace information technology (Alkhowaiter, 2022).

This Model relate to the current study since it is used as model to understand the individuals intention to adopt the new technology. For the adoption of an online motor vehicle license renewal system, the individual should intent to adopt the system because of the benefits that the system intend to bring and changing the way of doing business.

2.7.2.4.7 Diffusion of innovation theory (DOI)

This model explains how new information technology gains acceptance and spreads, leading to general acceptance (Mellita and Elpanso 2020). Alkhowaiter, (2022) suggest that the DOI framework can be utilised to predict technology acceptance at the organisational level and individual levels of analysis.

According to Alkhowaiter, (2022). There are four significant factors that help with the advancement of a new ideology: the innovation itself, time, social systems and communication.

The DOI proposes that prior to adopting a new technology users first need to inform themselves then decide whether to adopt the technology or not, based on factors such as such as comparative advantage, trialability, complexity, observability and compatibility (Alkhowaiter, 2022). Comparative advantage is a subjective perception that one innovation will be superior compared to other similar products or procedures. Which are perceived to be better will be adopted more quickly.

This model relates to the current study since it place emphases on the innovation. The online motor vehicle licence renewal system is the innovative system which is an upgrade the counter base system into a web base system.The customers will adopt this innovative system if they Percieved it as a superior system which is better than other alternatives that are available on the market.

2.7.2.4.8 Combination of technology acceptance model (TAM) and theory of planned behaviour (TPB) model

The CTAM-TPB was advanced by Taylor and Todd in 1995. This theory emerged because of the analysis that the TAM does not contain control and social dynamics in its variables (Ince-Muslu & Erduran, 2021). A study conducted by Alkhowaiter, (2022) to explore the network behaviours of Web 2.0 users using the TPB, TAM and CTAM-TPB model and the relationship amongst variables analysed the data using structural equation models. The study outcome revealed that the explanatory power of TPB was greater than the TAM and C-TAM-TPB; the reason for that was that TPB emphasises behaviours.

The relevancy of this model in the current study is that it places great emphases on the individual behavior which serves an indicator in the adoption process of a new technology. The individual positive behavior is inclined towards the adoption of an online motor vehicle license renewal system. The next section presents the change management theory.

2.7.3 Conceptual framework 3: Change Management theory

This model consists of three distinct stages of change which was developed by (Lewin 1947), which are, "*Unfreezing, Change and refreezing theory"*. This theory has been adopted in studies such as (Role of e- government in promoting service delivery in the municipality (Mohale, 2024). The study aimed at assessing the adoption of e- governments in delivering services to the society at large. Mellita and Elpanso (2020) point out that this theory describes the stages in carrying out the planned change process in helping the government system achieve long-term improvement for public service delivery through technology. The three theory stages of the change management model is discussed in detail below.

2.7.3.1 Unfreezing Theory

According to Lewin (1947), the first step in the process of change is to identify the need for change. This includes finding new ways that will make society or the government give up an old system, which was obsolete and counterproductive (Mahmud, Baharun, Asykur, and Rochmatin, 2022). Kaminski (2011) added that the aim was to move from traditional paper-based document systems to electronic systems, where paper trails are considered outdated.

The South African government recognised the need for change and the need for a comprehensive program approach, involving common visions and strategies to guide the initiatives of electronic

government, adopted, to revolutionise South Africa into a completely digital space where all members of the society can benefit from the system of technology (Jakoet-Salie, 2020).

The use of online services can reduce the need for face-to-face public service while making government work processes, more transparent and efficient Mahmud, Baharun, Asykur and Rochmatin 2022). The upgrade of the Natis to e-Natis system, provided an opportunity to motor vehicle license customers to access this service online, which eliminated face to face interaction and moved customers from a traditional paper –based document, process towards an electronic system. The unfreezing theory, related to this study, since it encourages the transition from the tradition system into an adoption of the new online system which lessens physical interactions and reduces cost of travelling and administrations cost.

2.7.3.2 Change

Government has developed a national e- Government strategy and the road map for the digitisation of government services to optimise the provision of services, providing universal access to government information and services in South Africa (Blom and Uwizeyimana, 2020). For the empowerment and capacitating of public servants, the South African government introduced basic ICT Skills which was set to provide basic digital literacy to public servants using ICT in the workplace, to address the challenge of ICT skills shortage. (Ngcamu 2019). With regards to the current study, change is vital since the government had to make changes on the policy framework, to cater for rolling out services on to the online platform. For smooth adoption of new online motor vehicle license renewal system, training and simulations had to be conducted to ensure that individuals are able to use a new system.

2.7.3.3 Refreezing Theory

This is a final stage of Lewin's theory which involves stabilising the new change into a new and set, standard. Thus, in the absence of steps implemented to sustain and reinforce the enacted system, the previously dominant system tends to reaffirm itself (Mahmud, Baharun, Asykur and Rochmatin 2022). In relation to this study, there are notable successes of e- Government initiatives that benefited the citizens and have now been adopted as the standard procedure for facilitating government services to the community.

This includes the e- Natis system which provides online services, the SARS e-filing system for filling SARS returns, the IEC system for administering the tenders online. The refreezing theory is in line with the current study as it outlines, that for every new change system adopted, for

efficiency and service delivery, the set standard and procedure must be put into practice for the benefits of public administration.

2.8 JUSTIFICATION FOR USE OF THEORETICAL FRAMEWORKS CHOSEN TO UNDERPIN THE STUDY

Three conceptual/theoretical frameworks were chosen to underpin this study. This includes the Service Quality (SERVQUAL) model, the Unified Theory of Acceptance (UTAUT), and Lewin's Change Management model. The SERVQUAL theoretical framework was chosen to underpin customer satisfaction section with regards to the in- person licence renewal system. This theoretical framework was chosen due to its strong capabilities to underpin service quality and customer satisfaction studies. This model served as backbone of the customer satisfaction section and also contributed to the formulation of research questions and attainment of study objectives.

The UTAUT model and Lewin's change management model were both chosen to underpin the current study awareness and customer readiness to adopt the online motor vehicle licence renewal system. These theories were chosen due to their theoretical capabilities to underpin most information technology adoption studies. Compared to other information technology acceptance models, the UTAUT framework is able to explain most of the variations in intention to use new technology it also, considers the role of numerous individual characteristics such as age, gender, experience and voluntariness of use as regulating elements in technology acceptance and use. The UTAUT model is constructed based on four main constructs which is effort expectancy, performance expectancy, facilitating conditions, and social influence. This model greatly contributed in guiding and formulation of the research questions with regards to information technology adoption with the intention of ascertaining customer readiness to adopt the online motor licence renewal system.

The Lewin's change management model describes the stages in carrying out the planned change process in helping the government system achieve long-term improvement for public service delivery through technology. The motor vehicle license renewal is the one of government service offered through the use of the internet. The study further assesses the customer satisfaction level with regards to the in- person license renewal system.

2.9 CONCLUSION

The literature review highlighted the importance of customer satisfaction to provide a clear understanding and the importance of customer satisfaction in the public sector, the current process

of renewing motor vehicle license in the South African context. It further elaborated on the physical -person license renewal system where customers go physically to licensing outlets to renew motor vehicle license. The adoption of an online license renewal system and service automation were also presented. The theoretical frameworks together with the eight individual unified theory of acceptance models were also presented to underpin the study. The next chapter present the study's research methodology.

CHAPTER 3: RESEARCH METHODOLOGY

3.1 INTRODUCTION

The previous chapter presented a literature review where secondary sources were reviewed. This chapter presented the research methodology which was employed to conduct the research study. The study population, selection techniques, data collection criteria, and data analysis methods, are elucidated in accordance with the study objectives. The ethical issues were presented. The relevance of the conceptual and theoretical frameworks is also explained in this chapter, together with the study's significance and limitations. The next section presents the research design.

3.2 RESEARCH DESIGN

Lazard & McAvoy (2020) describe research design as the science and art of preparing measures for carrying out studies, so as to obtain the most suitable research findings. A research design is a comprehensive framework of how the study will explore the matter at hand. There are three kinds of research designs, namely; quantitative, qualitative and mixed- methods. Creswell and Creswell (2022) defines qualitative research as unstructured and based on a small sample sizes with the aim of gaining rich information about the research topic.

On the other hand, quantitative research uses objective measurements for the purpose of numerical analysis of data, to produce statistics. Mixed methods research uses a combination of both qualitative and quantitative research (Creswell and Creswell, 2022). The postulation of the mixed-method design, is that merging the strengths of both research approaches develops a deeper comprehension of the problem under study, with each method overcoming the weaknesses associated with the other method (Salim and Górecki, 2019). However, the case study on the other hand is an in-depth investigation of a case for exploratory, descriptive or explanatory research purposes or a combination (Creswell and Creswell, 2022). This research design involves choosing the organisation or the department where the investigation is conducted, and the data is collected from the members of the organisation regarding the case that is being investigated.

The study research problems is outlined as follows: the licensing authorities are still experiencing longer queues which tends to creates overcrowding, lack of continuous marketing communications to create customer awareness about the existence of the online motor vehicle

licence renewal system, lack of internet coverage in rural areas to support the access of online services, lack of basic digital literacy, insufficient information communication technology (ICT) skills and devices, the unavailability of onsite and offsite portals to serve as an alternative to access the service and unavailability of the service rating system to ascertain the customer satisfaction level.

The current study employed a quantitative research design and methodology. This method was chosen with the intention of obtaining a good understanding of the research problem and the quantification of data by using statistical analyses. This kind of research method provided a comprehensive and precise image of the characteristics and behaviours of a certain population or subject (Malhotra, 2010). It is easy to manage a descriptive research design and it saves time and costs (Lazard & McAvoy, 2020).

Due to the nature of the study the qualitative research design was not chosen due to its inability to provide statistical analysis of results interpretation. Quantitative research can take the form of longitudinal or cross-sectional design. Creswell and Creswell (2022) defines a longitudinal design as a stable sample of a population group that is measured repetitively over a period of time and more than once, while a cross-sectional design entails a once-off data gathering from a sample

Lazard & McAvoy, (2020) outlined that a case study is a research approach that is used to generate an in-depth, multi-faceted understanding of complex issue in its real life. The current study employed a cross-sectional design, since once-off data was gathered from motor vehicle owners that were renewing licences at branches of the South African Post Office.

3.2.1 Study population

A target population is a pool of all possible respondents which a researcher would like to research (Creswell and Creswell 2022). The current study population consisted of 5 000 motor vehicle owners that renewed their motor licence at the South African post office in KwaZulu-Natal. Information was acquired from the South African post office data base that is kept by the commercial department. According to Sekaran (2000), for a population of 5 000 a suitable sample size is 357. The sample size justification is presented in Table 3.2 in section 3.2.3. A gatekeeper permission letter was obtained from the South African post office management to grant access and authorisation to contact the target population.

This target group was selected, because motor licence renewals is a compulsory government regulation. Since the South African post office was selected as the research site, only those

customers who came to renew their motor vehicle license were included as part of the population. The customers who visited other licensing authorities were excluded from the study, as this study related only to the South African post office, as a case.

3.3 RESEARCH SITE

The South African post office is a state-owned enterprise and has a broad representation across the country. The retail business unit is the primary channel which customers use to access the products and services. The KwaZulu-Natal region consist of 137 branches, of which 29 of these. branches offer motor vehicle license renewals. These branches are strategically located across KwaZulu-Natal to cater for all customers within the province. These branches include Durban, Margate, Newcastle Mtubatuba, Msunduzi and Westville. The study target population was customers that renew their motor licences at these stated offices. The reasoning behind the selection of the post office was that they trade from 08:00 – 17:00 whereas the Department of Transport operates from 08:00 – 14:00. The post office provides greater flexibility and accessibility in terms of the location of retail outlets. The few selected post office branches are trading on Sunday as well as public holidays especial the ones that are located in the shopping malls for the compliance of the shopping mall trading hours.

3.3.1 Sampling technique

Sampling is the system of choosing a precise number of participants from the population to represent the entire population group Salim and Górecki (2019). Gill (2020) pointed out that the fundamental goal of sampling is to obtain a representative sample, which consists of a limited number of examples or units selected from a much larger group or population. The author further elaborated that there are two kinds of sampling methods, namely, non-probability and probability sampling. Lazard & McAvoy (2020) described probability sampling as a sampling method which provides everybody from the target group an equal opportunity of being chosen, whereas non-probability does not (Lazard & McAvoy, 2020). This study employed a probability sampling technique. There are five probability sampling which are presented discussed in Table 3.

Simple random sampling	Everyone has the equal opportunity to be selected and form part of sample
Systematic random sampling	Participants are chosen using a unsystematic initial point and following a stable episodic interval
Stratified random sampling	The target group is separated into groups and the unsystematic or random sampling applied to each stratum.
Cluster sampling	The target group is separated into clusters thereafter the stratified is used to select the sample size.
Multistage sampling	The target group is separated into clusters and they are chosen unsystematically.

Table 3.1: Probability sampling techniques
Source: Lazard & McAvoy, (2020)

This study employed a stratified random sampling technique where branch offices were strategically selected and the participants were randomly chosen to be the part of the sample. For proper geographical representation of the population group, and coverage of KwaZulu- Natal, the following branch offices were selected; Margate, Mtubatuba, Durban, Newcastle, Westville and the Msunduzi branch which is in Pietermaritzburg. This sampling method was chosen due to its capability to separate target population into groups based on their location and size for the better analysis and interpretation of results which differed from a simple random technique which proposes that everyone on the target population stands an equal chance to the included in the sample. Salim and Górecki (2019) identified two kinds of stratified sampling techniques, namely, proportionate stratified sampling and disproportionate stratified sampling.

Creswell and Creswell (2022) states that proportionate sampling is where the population is divided into strata according to the proportion of the subgroups in the population. The disproportionate stratified sampling method is applied when the subgroups themselves are of different sizes. Creswell and Creswell (2022) further explained that disproportionate sampling allows analysis and interpretation of certain strata members or to upsurge general accuracy of the sample estimations. The disproportionate stratified sampling method was utilised to provide analysis for each branch and its performance bearing in mind that they differed in terms of location (urban and rural) and size.

3.3.2 Sample size

A sample is a small group of individuals who exemplify the chosen population (Salim and Górecki, 2019). The sample size for this study was obtained from Sekaran's (2000) sample size calculation table (Table 3.2) which shows that a population size of 5 000 necessitates a sample size of 357 participants to ensure a full representation of the population. The population size was

obtained from the post office commercial business unit data base. This group consisted of all individuals and businesses that renewed their motor vehicle licence at the post office.

N	S	N	S	N	S	N	S	N	S
10	10	100	80	280	162	800	260	2,800	338
15	14	110	86	290	165	850	265	3,000	341
20	19	120	92	300	169	900	269	3,500	346
25	24	130	97	320	175	950	274	4,000	351
30	28	140	103	340	181	1,000	278	4,500	354
35	32	150	108	360	186	1,100	285	5,000	357
40	36	160	113	380	191	1,200	291	6,000	361
45	40	170	118	400	196	1,300	297	7,000	364
50	44	180	123	420	201	1,400	302	8,000	367
55	48	190	127	440	205	1,500	306	9,000	368
60	52	200	132	460	210	1,600	310	10,000	370
65	56	210	136	480	214	1,700	313	15,000	375
70	59	220	140	500	217	1,800	317	20,000	377
75	63	230	144	550	226	1,900	320	30,000	379
80	66	240	148	600	234	2,000	322	40,000	380
85	70	250	152	650	242	2,200	327	50,000	381
90	73	260	155	700	248	2,400	331	75,000	382
95	76	270	159	750	254	2,600	335	1,000,000	384

Table 3.2: Sekaran sample size calculation table
Source: Sekaran (2000)

The Table 3.3 below presents the motor vehicle licence branches' distribution, response rate frequency, and response rate per participating branch.

Branches	Frequency	percentage
Durban	45	16%
Margate	50	17%
Mtubatuba	50	17%
Msunduzi	50	17%
Westville	51	16%
Newcastle	41	14%
Total	**287**	**100%**

Table 3.3: Motor vehicle licencing branches' distribution response proportions

The final total of study respondents was 287 which equates to an 85% overall study response rate. The questionnaire was distributed equally to all six branches in batches of 50. The proportions of responses within the sample as a whole was as follows: Westville 18%; Margate, Mtubatuba and Msunduzi all at 17%; Durban 16 %; and Newcastle 14%. Most of the questionnaires that were unusable or had errors, came from the Durban and Newcastle branches. Some respondents felt

that the measuring tool was cumbersome and only completed a portion of it. The thirteen questionnaires were spoiled and unusable due to error

3.3.3 Recruitment process and data collection technique

Creswell and Creswell (2022) describes data gathering as the methodical collection of information for specific reason from different sources, comprising observation, interviews, questionnaires, electronic devices and records. This study utilised a questionnaire as a tool for data collection from study participants. The data was collected from the study participants during on May – June 2023. The researcher physically handed a hard copy questionnaire to respondents for completion. The questionnaire was designed in such a way that the respondent completes it in five minutes and it was only written in English. The closed-ended questions were developed utilising the Likert scale as the measurement scale.

The questionnaire used in this study was constructed utilising the 3 theoretical frameworks identified in the literature review chapter. Additionally, the questionnaire, was subdivided into four categories, namely, demographic information, customer satisfaction level, online motor vehicle licencing and service automation which is parented on appendix A The second part of the questionnaire related to the customer satisfaction section, directly linked to the service quality model. The constructs of this model were used in the formulation of the questionnaires in the instrument. Hence, the questionnaire included the five, service quality dimension of tangibility, reliability, responsiveness, assurance and empathy. These elements were iterated in the previous literature review chapter.

The UTUAT theoretical framework was also used to construct questions in the research instrument and these questions centred on performance expectancy, effort expectancy, and social influence and facilitating conditions. The intention was to gauge customer awareness and customer readiness to adopt the online motor vehicle licence renewal system. Lewin's change management model which complement the UTAUT was also used to construct questions in the questionnaire. This is also included in the appendix A.

For the recruitment of participants, the researcher approached potential participants that were queuing at the post office branches to renew their motor vehicle licences. The researcher explained the intentions of the study and asked the potential participants whether they would be interested to partake in the study. The reason for doing this is that the selection of participants cannot be pre-empted and ultimately changes on a daily basis. Hence, participants were selected over a period

of two months. The Durban branch was visited on the month of May 2023 for five days when the Post Office was open. Westville was also visited on the month and Msunduzi branch was also visited for a period of five days. For the Month of May the researcher collected data from the above stated offices first because he resides in Durban. The researcher opted to do local offices first before travelling to other offices.

The Newcastle branch was visited on the month of June 2023, Mtubatuba branch was also visited on the same month of June and lastly Margate Post Office was visited on the month of June 2023. The research did the above stated branches in the month of June. These branches were done last because of its geographic location. The researcher had to budget for travelling and accommodation to collect data from these office since they are far apart from each other.

The participants were assured of confidentiality and that no harm of any kind would result from them participating in the study. If the potential participant agreed to partake in the study, the researcher handed them a detailed consent letter seeking the participant's signed approval for partaking in the study. The consent letter was accompanied by the questionnaire for completion by the participant. Since the researcher used self-administered questionnaire he assisted participants that had any difficulties by interpreting what they seemed not to understand in a questionnaire. The researcher collected all completed questionnaires.

3.4 PILOT STUDY

Creswell and Creswell, (2022) describes a pilot study as a small version of a full-scale study. It is also called pretesting or feasibility study. The author further stated that the aim of a pilot study is to improve the questions on the measuring tool to that the language is clear and understandable, and that there is no ambiguity or bias. A pilot study was conducted at Durban post office where 15 customers who came to renew their motor vehicle licence were randomly selected to participate in the pilot study. This branch was selected as pilot branch due to its central location and because it is a busy branch for motor vehicle license renewals. The people participated in the pilot study were not included in main study. The feedback was positive however some questions were rephrased for better understanding. For example, the words 'physical license renewal' had to be substituted with 'in-person license renewal' since most participants were confused and it was changed, leading to better efficiency of the questionnaire.

The pilot study assisted in improving the questionnaire's construct validity. Reliability is the capacity of a valuation tool to produce constant results (Creswell and Creswell, 2022). The pre-

testing contributed to the improvement of the measuring tool's internal consistency which was tested by means of Cronbach's coefficient alpha. All the constructs that scored below 0.70 were reviewed and refined for better understanding by the respondents. This will be discussed in greater detail in the section that follows.

3.5 RELIABILITY AND VALIDITY OF THE RESEARCH INSTRUMENT

In quantitative research, instrument validity is a quality criterion that indicates a study's correctness (Creswell and Creswell, 2022). There are different types of validity such as internal validity, external validity, statistical conclusion validity and construct validity. The pilot study played a major role in identifying construct errors and grammatical errors, which included double-barrelled statements and ambiguity of statements.

All the identified errors were corrected before the questionnaire was administered to the final sample. Instrument reliability is the dependability and trustworthiness of a research tool in measuring a variable (Creswell and Creswell, (2022). The author further describes reliability as a numerical notion that is associated with uniformity and flexibility. The tool's reliability was established via a test-retest approach; and the internal consistency and overall reliability of each construct in the measuring tool was measured using the Cronbach's alpha. The Cronbach's alpha was utilised to calculate the reliability coefficient with the intention to measure the reliability, internal consistency, and overall reliability of the constructs in the study. A value of greater than .70 is regarded as acceptable, over .80 as good and over 0.90 as excellent. Table 3.4 revealed Cronbach's coefficient alpha values for the key constructs in the current study, all of which are excellent.

Items in the Construct	Construct	Cronbach's alpha
10	Customer satisfaction	.906
6	Social Influence (SI)	.962
5	Perceived ease of use (PEOU	.957
4	Facilitating conditions (FC)	.906
6	Perceived usefulness (PU)	.965

Table 3.4: Cronbach's alpha values

3.6 ADMINISTRATION OF THE QUESTIONNAIRES

The researcher obtained an approval letter from the general manager of KwaZulu-Natal to conduct research study within the post office branches. The researcher employed a personal self-administered questionnaire to participants in the previously specified areas for sample selection. All participants received a letter of description which was also explained to them, and they signed a consent form (Appendix B). The questionnaire was designed in such a way that it did not ask the respondents to take up a large amount of their time. Additionally, the researcher's physical presence allowed for any questions or queries to be addressed and hence, contributed to an efficient data collection process.

3.7 DATA ANALYSIS AND INTERPRETATION

Data analysis is the practice of assessing data using methodical and rational thinking to establish whether the general assumptions have been supported (Zeng. Fraccaro and Peek, 2019). To measure the customer satisfaction, questions utilising a Likert scale was adopted. The scale ranged from 1 to 6, where 1 is equal to very dissatisfied and 6 is equal to very satisfied to determine the level of satisfaction from customers. This was also useful for calculating means scores across the variables. A one sample t- test was also used to measure the statistical significance of variables. A factor analysis with promax rotations was used to establish loading of individual variables.

For the objective four to determine whether the adoption of an online licence renewal impacts on service convenience (service automation). The Likert scale was used where one is equal to strongly dissatisfied six is equal to strongly satisfied. Mean analysis was conducted to determine the level of preference with regard to automated service which is online system and the in- person licence renewal system. The one sample t-test and one sample statistics was also used to measure statistical significance of the tested statements. The Anova test and Game- Howell post hoc test was also conducted for analysis of differences. The Cronbach's alpha was used to determine the statistics reliability.

The completed questionnaires were assessed to see whether participants responded to all of the questions. All completed questionnaires were coded. The results were populated on a data sheet and it was thoroughly checked by the researcher to ensure accuracy before forwarded to a statistician to start the data analysis.

The data was examined utilising Statistical Package of the Social Sciences (SPSS) version 22.0 to produce descriptive statistics such as standard deviation, mean, frequency count, survey responses

and percentages to report the demographic characteristics. The instrument presented descriptive statistics in tables, and figures. The SPSS software was selected since it is appropriate for analysing information in the social sciences and enables for easy statistical data manipulation (Creswell and Creswell 2022).

The descriptive statistics provided a controllable summation of the sample and its measures in terms of measures of central tendency (mean, median mode,), measures of frequency (percent, count), measures of position (percentile ranks, quartile ranks) and measures of dispersion or variation (standard deviation, range, variance) (Salim and Górecki, 2019).

Inferential statistical methods were applied to interpret the results, namely, t-test, one sample test, one sample statistics, and analysis of differences to provide a meaningful interpretation of the results. Inferential statistics allow the researcher to establish the associations amongst variables and to make conclusions and predictions about the population based on statistics attained from the sample data (Creswell and Creswell, 2022).

3.8 ETHICAL CONSIDERATIONS

The ethical considerations as outlined in the University of KwaZulu-Natal ethics policy were followed at all times so as to the human rights of the study participants. This included voluntary participation, which means that the respondents were not compelled to partake in the study. An ethical clearance certificate was acquired from the Humanities and Social Sciences Research Ethics Committee of the University of KwaZulu-Natal (Appendix 2) before commencing with data gathering. This ethical clearance certificate served to confirm that the researcher conformed to all the ethics requirements for the study. A consent letter was provided to participants prior to participation in the research project. Respondents were made aware of their right to withdraw at any time if they were no longer interested to contribute to the study. The research study participants were guaranteed secrecy and confidentiality of their identity. The participants were further guaranteed that participating in this research project would not cause them harm of any kind. The data collected from study participants were handed to the supervisor so it can be secured and follow the university procedure of storing and disposing of documents.

3.9 CONFIDENTIALITY AND ANONYMITY

The letter of consent contained a detailed explanation regarding anonymity and confidentiality. The researcher elucidated to participants that there was no direct link of individuals to their data. The study participants were not asked to write personal information on the questionnaire,

especially their name. The results reporting had no direct link to individual scores of participants.

3.10 SIGNIFICANCE OF THE STUDY

- The study contributed positively in determining customer satisfaction level with regards to motor vehicle license renewal with the intention to make customer satisfaction improvements.
- The research project contributed positively towards proposing and popularising the full online license renewal of motor vehicles, for wider accessibility.
- The research study contributed to the academic body of knowledge regarding customer satisfaction and digitisation of license renewal for motor vehicles.
- The study contributed in highlighting the need for improvement on the information technology infrastructure for wider accessibility of the online services.

3.11 JUSTIFICATION OF THE STUDY

The world is facing an information knowledge revolution that is changing the way in which people's activities are conducted (Mayedwa and jean, 2022). The internet presents a real chance for people and organisations to contact each other and stay connected (Aruleba and Jere, 2022). Information technology is ubiquitous in the business sector. Businesses are enabling customers to access and transact online. The introduction of an online license renewal system has changed the licensing landscape. However, the long queues were still visible at the licensing authorities which translate to preferences for the in-person license renewal system. The study also highlighted the gap in the internet coverage, information technology devices and skills required, especially at the rural areas. This impacted on the online services accessibility. Hence the study aimed at reviewing the customer satisfaction level with regards to the in-person license renewal system. The study further explored the customer awareness and customer readiness in the adoption of the online license renewal system.

3.12 LIMITATIONS OF THE STUDY

The study concentrated on South African post office branches in KwaZulu-Natal. The researcher would like to have expanded the research study to include the Department of Transport motor licencing division and post office branches outside KwaZulu-Natal, but due the cost factor, access limitation to the Department of Transport and other licensing authority. Time was also a

contributing factor. Hence the study was conducted in the SA post office only and in KwaZulu-Natal only. The study could have benefitted from a qualitative component to the design in order to delve into why people had specific opinions, but due to the study nature, the population size and the amount of data to be collected, a quantitative research design was deemed appropriate.

3.13 CONCLUSION

This chapter presented the research methodology that was utilised in the study to obtain answers to satisfy the research objectives. Which includes study population, selection technique, data collection method and data analysis and interpretation. This chapter also presented ethical considerations for ensuring that the study was ethically compliant. The study significance, study justification, and study limitation were also presented to provide a detailed procedure that was followed when the research study was conducted. The next chapter presents the analysis and the interpretation of study results.

CHAPTER 4: ANALYSIS AND INTERPRETATIONS

4.1 INTRODUCTION

The previous chapter presented research methodology and design. This chapter reports on research findings. These findings are presented in a numerical format with figures and tables. The profile and demographic of respondents were presented for better analysis and interpretation of results, the branch distribution list was also presented to demonstrate the response frequency per branch. This chapter also presented the customer satisfaction variable analysis and interpretation which included reliability statistics, mean results, the one sample t- test and one sample statistical analysis.

The chapter further presented the variable analysis conducted, using means values, reliability analysis, one sample-t test, Anova analysis and factor analysis. The Games-Howell post hoc test was also presented. The analysis on service automation were also presented. The next section presents the profile of respondents.

4.2 PROFILE OF RESPONDENTS

This section provides the summation of the demographic characteristics of the respondents (Figure 4.1). These characteristics provided comprehensive data about participants and they are an integral aspect of interpretation of the results. Since it's demonstrates the study population diversification for better interpretation of results. Figure 4.1 below presents demographic of respondents.

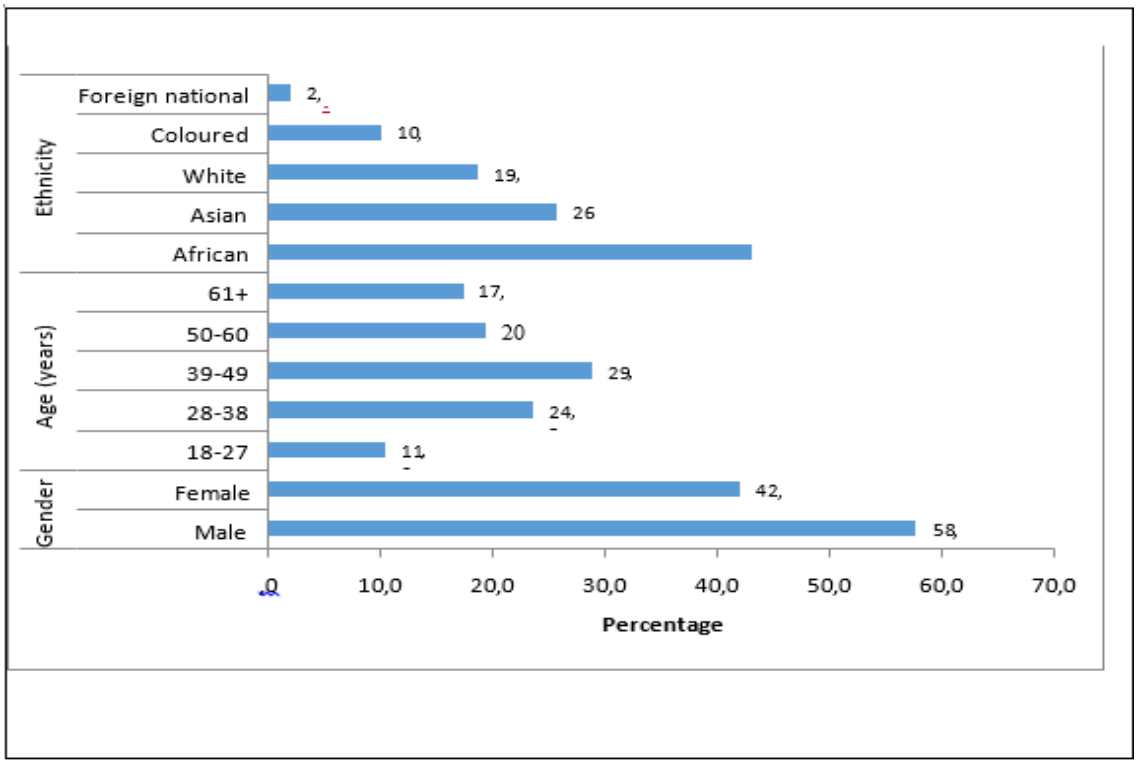

Figure 4.1: Demographics of respondents

4.2.1 Ethnic composition

Figure 4.1 shows that the largest group of respondents (43. %) was African, with Asians making the next biggest group (26. %), followed by whites (19. %) and coloureds (10. %). The smallest group of respondents at 2% was foreign nationals. These percentages are representative of the demographics of the South African population and it was instrumental in the interpretation of study results.

4.2.2 Gender distribution

Figure 4.1 shows males representation was 58. % followed by female representation at 42. %.

4.2.3 Age distribution

The age group 39-49 dominated the representation in the study at 29. % followed by the 28-38 years age group at 24. %, the 50-60 age group at 20. %, the 60+ age group at 17. %, and the 18-27 age group at 11. %. The age distribution list was very vital for the interpretation of results for the better understanding of findings. The age group between 18-27 and 28 – 38 are known for being an internet active group however the current study results reveal that there are members

within this group that still prefer the brick and mortar interactions. Table 4.1 presents South African Post Office distribution list.

4.3 SOUTH AFRICAN POST OFFICE BRANCH DISTRIBUTION LIST

Branches	Frequency	percentage
Durban	45	16%
Margate	50	17%
Mtubatuba	50	17%
Msunduzi	50	17%
Westville	51	16%
Newcastle	41	14%
Total	**287**	**100%**

Table 4.1: SA Post Office branch distribution list

Table 4.1 presents a list of the South African Post Office branches that were included in the data collection process. The branches were strategically selected to represent all the areas and parts of KwaZulu-Natal. The table provides the frequency of respondents and the proportional response rate of each branch within the sample as a whole. There were 287 respondents which represents an 85% response rate.

Questionnaires were equally disseminated to participating branches in batches of 50 to make up the proposed sample size of 378. The proportion of response rate was as follows: Westville post office at 18. %; Margate, Mtubatuba and Msunduzi post office at 17. % each; Durban post office at 16. %; and Newcastle post office at 14. %. Most of the unused questionnaires or questionnaires with mistakes came from the Newcastle and Durban post office. Some respondents felt the survey was too long and they only completed half, so those questionnaires were not used. Some of questionnaires were marked twice for one question and they were considered unusable and placed aside as they were no longer suitable for the study.

4.4 CUSTOMER SATISFACTION

Customer satisfaction findings are presented through the analysis of means, a t-test and a reliability analysis. The following analysis is linked to the main objective which was to identify customer satisfaction levels in relation to the in-person motor vehicle licence renewal system.

4.4.1 Reliability statistics – customer satisfaction

Cronbach's alpha is a measure of internal consistency, that is, how closely correlated a set of items are as a group, and is assumed to be a measure of questionnaire reliability (Creswell and Creswell, 2022). Consistency refers to a point to which items measuring a construct combined as a set. According to Lazard & McAvoy (2020) a reliability lower than 0.60 is said to be poor, 0.60 to 0.70 acceptable, whereas 0.80 and over is considered to be excellent. The higher the value of the coefficient of Cronbach's alpha, the more the constructs are internally consistent and measure the same content. The internal consistency, reliability and validity of this section of the questionnaire are presented in Table 4.2.

Reliability statistics	
Cronbach's Alpha : = .906	N of Items : 10

Table 4.2: Reliability statistics – customer satisfaction

Table 4.2 indicates a Cronbach's Alpha score of .906 which is above 0.70. This shows that the ten items measuring customer satisfaction scored excellent in terms of internal consistency and can, consequently, be presumed to be reliable.

4.4.2 The mean results of the customer satisfaction dimension

A mean score is the arithmetic average which is counted by totalling up all the values in a set of numbers and then dividing that by the total amount of values. It is frequently utilised as a measure of central tendency, which signifies the typical or most representative value in a dataset (Creswell and Creswell, 2022). On the Likert scale of six where the lowest score (1) is very dissatisfied and the highest score (6) is very satisfied, the score of 3.5 is considered to be the central score and above average. Figure 4.2 presents the mean results for customer satisfaction constructs.

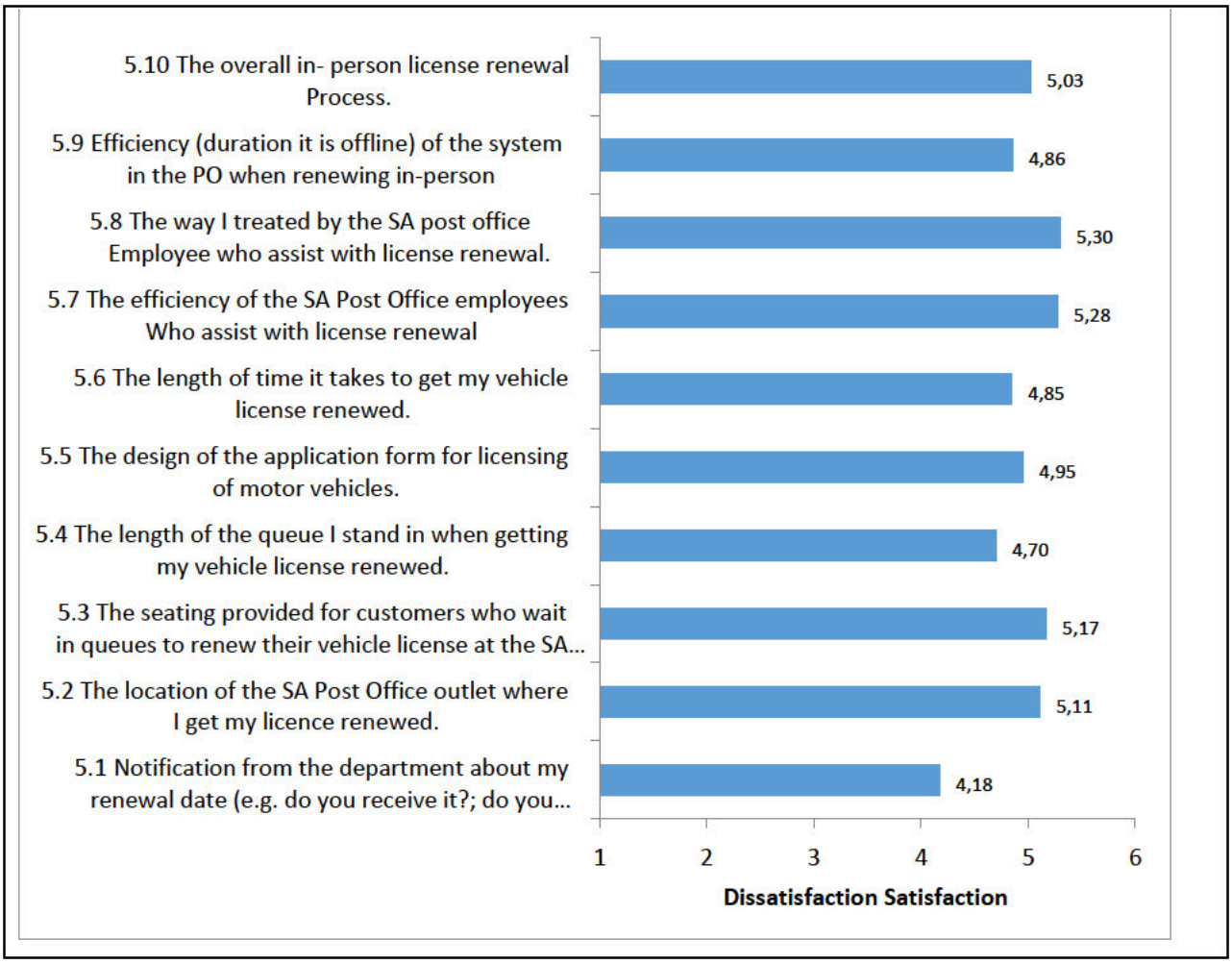

Figure 4.2: Mean results of customer satisfaction

Figure, 4.2 depicts the mean for each of the customer satisfaction variables. The figure shows that the top five mean scores were for questions "*How am I treated by the SAPO employee during the renewal process"*, (Mean = 5.30), "*the efficiency of the SA Post Office Employees who assist with license renewals"* (mean = 5.28). "*Seating provided for customer"* (mean = 5.17), "*Location of the SA Post Office"* (mean = 5.11) "*the overall in-person license renewal process"* (mean = 5.03). The level of employee efficiency, seating provided, location of the post office outlets and the overall in-person licence renewal are provided to ensure comfortability of customers which plays major determining factor in the customer satisfaction level. Thus, reflecting on service quality determinants which are tangibility, reliability, responsiveness, assurance and empathy which are important dimensions for service quality and customer satisfaction. The above stated results show that the customers were generally satisfied with the overall in- person license renewal system where the main contributor to their satisfaction were employee efficiency at the mean results of 5.30.

The Figure 4.2 shows that the bottom five mean scores were for questions "*The design of the application form"* (mean = 4.95), "*the length of time it takes to get license renewed"* (mean = 4.85), "*the efficiency (duration if its offline) of system when renewing license in- person"* (mean = 4.86), the length of the queue I stand in (mean = 4.70) "*the renewal notices from department"* (mean = 4.18). The mean scores for the bottom five appear to be low scores but, in a 6-point Likert scale, a mean score of 4.18 is regarded as being considerably above average (3.5). It is evident from Figure 4.2 that customers were satisfied with all variables tested since all scored above the average score of 3.5.

At the bottom five, the main contributor to the customer satisfaction was the design of an application form which they complete when renewing their motor license at the mean results of 4.95. This translate to that, this form is understandable and easy to complete. The next section presents the one sample t-test results.

4.4.3 Results of one sample t-test of customer satisfaction for each variable

For interpretation purposes the ten items were combined to form a single composite variable that measures satisfaction refer to appendices A. The one sample t-test compares a sample mean to a hypothesised value for the population mean to establish whether the two means are significantly different (Lazard & McAvoy 2020, Sekaran, & Bougie, 2016). Table 4.3 presents the results.

Construct	n	Mean (SD)	t	df	p value
Notification from the department about my renewal date (e.g. do you receive it? do you receive it in good time? etc.)	287	4.18 (1.968)	5.833	286	<.001*
The location of the SA Post Office outlet where I get my licence renewed.	287	5.11 (1.344)	20.316	286	<.001*
The seating provided for customers who wait in queues to renew their vehicle licence at the SA Post Office.	287	5.17 (1.192)	23.737	286	<.001*
The length of the queue I stand in when getting my vehicle licence renewed.	287	4.70 (1.407)	14.452	286	<.001*
The design of the application form for licencing of motor vehicles.	287	4.95 (1.201)	20.523	286	<.001*
The length of time it takes to get my vehicle licence renewed.	287	4.85 (1.400)	16.338	286	<.001*

The efficiency of the SA Post Office employees who assist with licence renewal	287	5.28 (1.057)	28.501	286	<.001*
The way I am treated by the SA post office employee who assist with licence renewal.	286	5.30 (.998)	30.499	285	<.001*
Efficiency (duration it is offline) of the system in the PO when renewing in-person	285	4.86 (1.365)	16.773	284	<.001*
The overall in-person licence renewal process.	287	5.03 (1.301)	19.902	286	<.001*

Note: * = significant

Table 4.3: One-sample t-test of customer satisfaction for each variable

The one-sample t-test was carried out on ten customer satisfaction variables to establish whether or not their means were dissimilar from a scalar value of 3.0, the neutral score for the scale. The t-test showed that the p-value for all of the variables was p = < .001 meaning that there was a significant difference in each instance. Compared to the scalar value of 3.0, the outcomes show that customers were satisfied with the current in-person motor vehicle licence renewal system. The next section presents the one-sample statistics for overall customer satisfaction.

4.4.4 One-sample statistics of overall customer satisfaction

Table 4.4 shows a mean value of 4.9 for overall customer satisfaction. A mean value of 4.9 for overall customer satisfaction with regards to in-person motor licence renewal can be regarded as a very positive result.

	N	Mean	Std. Deviation	Std. Error Mean
SAT	287	4.9435	.99091	.05849

Table 4.4: Mean value for overall customer satisfaction

A one-sample t-test equates the mean of a single sample to a predetermined value to establish if the sample mean is significantly bigger or lower than that a hypothesised value (Lazard & McAvoy 2020; Sekaran, & Bougie, 2016). The t-test determines whether the difference found in a sample is bigger than what one would anticipate to find by chance (Creswell and Creswell, 2022). Table 4.5 presents the one- sample- test for overall customer satisfaction.

Construct	n	Mean (SD)	t	df	p-value
The overall in-person licence renewal process.	287	5.03 (1.301)	19.902	286	<.001*

Note: * = significant

Table 4.5: One-sample t-test for overall customer satisfaction

Table 4.5 depicts that overall, there is a significant level of satisfaction with the current in-person motor vehicle license renewal system at the post office since the p-value is < .001. Table 4.5 further shows a mean value of 5.03 which indicates significant satisfaction with the overall in-person renewal process. Overall the motor vehicle licence renewal customers are satisfied with the post office as a venue to renew their license. This is evident on all the variables that were tested which all scored above the average score of 3.5 which represents the slightly satisfaction. Martin, Van Dyke, Walton and Koo (2020) affirm that in order for the customers to be satisfied their need must be met and expectations exceeded.

4.5 THE ADOPTION OF AN ONLINE MOTOR VEHICLE LICENCE RENEWAL SYSTEM

In this section, the findings of the online motor vehicle licence renewal are presented using means values, one sample t-test, reliability analysis, ANOVA analysis and factor analysis. The findings are statistically and theoretically interpreted to give a clear understanding of tested variables with regards to the online motor vehicle licensing system. With an overall intention to ascertain the customers awareness and customer readiness on the adoption of an online motor vehicle license renewal.

4.5.1 Reliability analysis for the UTAUT constructs related to online motor vehicle licence renewal

Lazard & McAvoy (2020) noted that the reliability of a measure is evaluated by testing its consistency and stability. Consistency refers to the extent to which items related to a particular construct combine together as a set. Consistency shows how consistent the answers of the participants are across the items measuring a construct. The reliability of the UTAUT constructs were verified using Cronbach's alpha and was calculated based on the average intercorrelations

of items measuring the construct (Creswell and Creswell, 2022) Table 4.6 presents the reliability analysis for the UTAUT constructs related to online motor vehicle licence renewal.

Constructs	No of Items	Cronbach's alpha
Social influence (SI)	6	.962
Perceived ease of use (PEOU)	5	.957
Facilitating conditions (FC)	4	.906
Perceived usefulness (PU)	6	.965

Table 4.6: Reliability analysis for the UTAUT constructs related to online motor vehicle licence renewal

Table 4.6 shows that all four constructs scored above 0.70. The reliability results were presented as follows, social influence at .962, perceived ease of use at .957, facilitating condition at .906 and perceived usefulness at .965. This indicates that all the UTAUT constructs measuring the adoption process for motor vehicle license renewal system have excellent internal consistency and are, therefore, presumed to be reliable and satisfactory for other statistical analysis. The following section presents mean results for online motor vehicle licencing renewal.

4.5.2 Mean results for the adoption of an online motor vehicle license renewal system

A mean score is the arithmetic average which is calculated by adding up all the values in a set of numbers and then dividing by the total amount of values. A mean score is frequently utilised as a measure of central tendency, which signifies the typical or most representative value in a dataset (Creswell and Creswell, 2022).

On the Likert scale of one to six where least is strongly disagree and the high score is strongly agree, the score of 3.5 is considered to be the central score and above average. The analysis of this section was presented as per the UTAUT construct which is facilitating condition, social influence, perceived usefulness and perceived ease of use. The Figure 4.3 presents the mean results for the adoption of an online license renewal system.

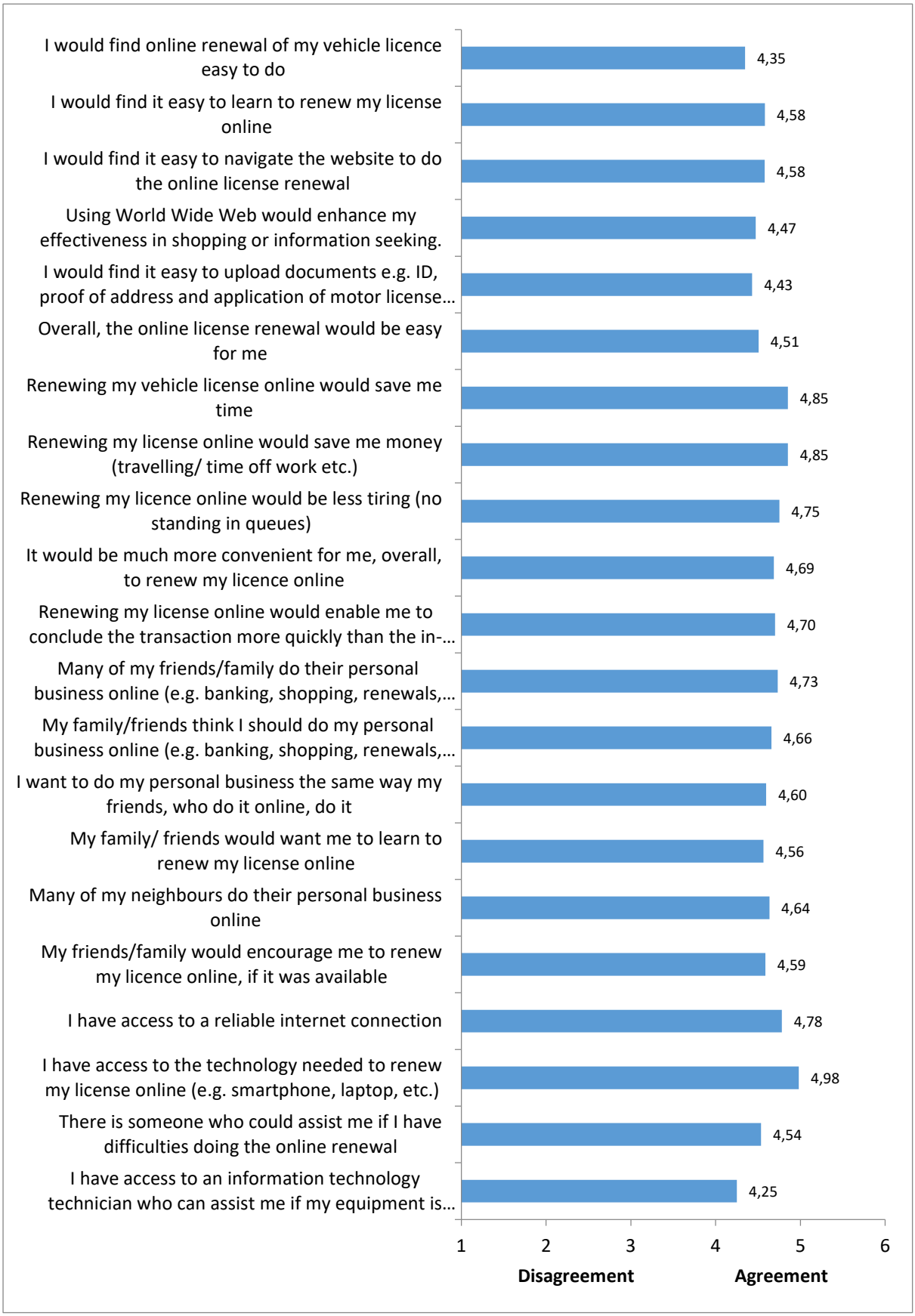

Figure 4.3: Mean results of online motor vehicle license renewal

Figure 4.3 depicts the mean values for each of the online motor vehicle licence renewal system variables. There were 21 scale items which were spread in accordance with four UTAUT constructs below the facilitating condition constructs mean results is discussed in details.

4.5.3 Facilitating Conditions for online motor vehicle licence renewal

Figure 4.3 shows all the variables related to the facilitating construct (FC) (mean scores = 4.25, 4.54, 4.98 & 4.78) scored above the central score of 3.5, therefore the participants agreed that they had sufficient business and technical infrastructure support to facilitate the usage of the online system. The two main contributors to the facilitating conditions were the statements "*I have access to technology needed to renew motor vehicle license online"* at men value of 4.98 and "*I have access to reliable internet connection"* at the mean value of 4.78. The overall results indicated the readiness of participants to adopt online licence renewal.

4.5.4 Social Influence of online motor vehicle licence renewal

Figure 4.3 shows that all variables related to the social influence (SI) construct (means scores = 4.59, 4.64, 4.56, 4.60, 4.66 & 4.73) scored above the central score of 3.5 indicating that participants were inspired by social practices and trends, so were ready to conduct their licence renewal business online. The statement "*Many of my family and friends do their business online"*at the mean value of 4.73 was a leading influencer followed by *"my friends and family thinks I should do my business online"* at the mean value of 4.66 and lastly *"I want to do my business online"at the mean value of 4.60.* This inspired customers to want to adopt the online motor vehicle license renewal system. And the overall results under the social influence construct indicated that the customers were aware of the online motor vehicle license renewal system since their circle were already adopted the system.

4.5.5 Perceived Usefulness for online motor vehicle licence renewal system

Figure 4.3 shows that all variables related to the perceived usefulness (PU) construct (means scores = 4.70, 4.69, 4.75, 4.85 & 4.85) scored above the central score of 3.5 therefore the outcome indicate that participants perceived the online system to be useful, which translates to customer participant readiness to adopt the online licence renewal system. The statements "*Renewing my licence online would save me time"* at the mean value of 4.85 and "*renewing my license online would save me money, travelling time off work etc"at the mean value of 4.85* was a leading influencer for customer eagerness to adopt the online license renewal system. Since the

participants perceived the online motor vehicle license renewal system as a useful system which brings more benefits.

4.5.6 Perceived ease of use variables for online motor vehicle licence renewal

Figure 4.3 shows that all the variables related to the perceived ease of use PEOU construct (means scores = 4.51, 4.43, 4.47, 4.58, 4.58 & 4.35) scored above the central score of 3.5 therefore the outcome shows that participants perceived online system as being easy to use, therefore were ready to adopt the online licence renewal system. The following statements, *I would find it easy to navigate the website to do the online licence renewal*" at the mean value of 4.58 and "*I would find it easy to renew my license online"at the mean value of 4.58* was a leading influencer for customers readiness to adopt the online license renewal system.

4.6 RESULTS OF ONE-SAMPLE T-TEST RESULTS FOR THE UTAUT CONSTRUCTS

The one sample t-test equates a sample mean to a hypothesised value (in this case 3.0, the neutral score for Likert scale), for the population mean to establish whether the two means are significantly different (Creswell and Creswell, 2022). For interpretation purposes, the four UTAUT constructs were combined to form a single composite variable that measured participants' readiness to adopt the online motor vehicle licence renewal system. Because of the length of the variables, the interpretation of results is presented as per the UTAUT constructs. Table 4.7depicts the results of the one-sample t test for online motor vehicle licence renewal.

Construct	n	Mean	Standard deviation	t	df	p-value
Perceived ease of use						
I would find online renewal of my vehicle licence easy to do	281	4.35	1.722.	10.694	281	<.001*
I would find it easy to learn to renew my licence online	279	4.58	1.620	10.694	281	<.001*
I would find it easy to navigate the website to do the online licence renewal	277	4.58	1.571	10.694	281	<.001*
Using World Wide Web would enhance my effectiveness in shopping or information seeking.	279	4.47	1.631	10.694	281	<.001*
I would find it easy to upload documents e.g. ID, proof of address and application of motor licence renewal form	278	4.43	1.683	10.694	281	<.001*
Overall, the online licence renewal would be easy for me	278	4.51	1.703	10.694	281	<.001*
Perceived usefulness						
Renewing my vehicle licence online would save me time	279	4.85	1.478	13.947	277	<.001*
Renewing my licence online would save me money (travelling/ time off work etc.)	278	4.85	1.488	13.947	277	<.001*
Renewing my licence online would be less tiring (no standing in queues)	278	4.75	1.592	13.947	277	<.001*
It would be much more convenient for me, overall, to renew my licence online	278	4.69	1.634	13.947	277	<.001*
Renewing my licence online would enable me to conclude the transaction more quickly than the in-person licence renewal.	278	4.70	1.558	13.947	277	<.001*
Social Influence						
Many of my friends/family do their personal business online (e.g. banking, shopping, renewals, etc.)	278	4.73	1.389	13.816	277	<.001*
My family/friends think I should do my personal business online (e.g. banking, shopping, renewals, etc.)	278	4.66	1.428	13.816	277	<.001*
I want to do my personal business the same way my friends, who do it online, do it	278	4.60	1.492	13.816	277	<.001*
My family/ friends would want me to learn to renew my licence online	278	4.56	1.551	13.816	277	<.001*
Many of my neighbours do their personal business online	277	4.64	1.477	13.816	277	<.001*
My friends/family would encourage me to renew my licence online, if it was available	278	4.59	1.573	13.816	277	<.001*
Facilitating conditions						

I have access to a reliable internet connection	279	4.78	1.461	13.947	278	<.001*
I have access to the technology needed to renew my licence online (e.g. smartphone, laptop, etc.)	278	4.98	1.256	13.947	278	<.001*
There is someone who could assist me if I have difficulties doing the online renewal	278	4.54	1.538	13.947	278	<.001*
I have access to an information technology technician who can assist me if my equipment is giving me problems.	278	4.25	1.748	13.947	278	<.001*

Note: * = significant

Table 4.7: One sample t-test for the UTAUT constructs

4.6.1 Perceived ease of use results

Table 4.7 indicates that the p values for all variables were $p < .001$, so they were all significant. This suggests that the participants would find it easy to do an online motor vehicle licencing transaction since they find it easy to navigate the website to do online transactions and also affirmed that overall, they will find it easy to online motor vehicle license renewal.

4.6.2 Perceived usefulness results

Table 4.7 indicates that the p values for all the variables were $p < .001$, so they were all significant. This suggests that the participants perceived that an online motor vehicle licence renewal system would provide convenience as well as save money and time. These results indicated that customers were more inclined towards the adoption on an online motor vehicle license renewal system.

4.6.3 Social influence results

Table 4.7 indicates that the p values for all variables were $p < .001$, so they were all significant. This suggests that the participants agreed that they were inspired by how family and friends conduct their business online. This bring customer awareness on the existence of the online motor vehicle license renewal system and also the customer readiness to adopt the system.

4.6.4 Facilitating condition results

Table 4.7 indicates that the p values for all variables were $p < .001$, so they were all significant. This suggests that the participants agreed that they had the equipment and facilities required to conduct online business therefore results indicated that the participants were ready for the adoption of the online motor vehicle licence renewal system.

4.6.5 One-sample statistics for the overall UTAUT constructs

Table 4.8 shows the average score of all 21 UTAUT variables which measured the adoption process of online motor vehicle licence renewal.

	N	Mean	Std. Deviation	Std. Error Mean
SI	278	4.6295	1.36309	.08175
PEOU	282	4.4688	1.52136	.09060
FC	279	4.6380	1.33834	.08012
PU	278	4.7482	1.49216	.08949

Table 4.8: Mean value for the overall UTAUT constructs

Table 4.8 shows mean value of 4.6 for all UTAUT constructs, which is above the average score of 3.5. This can be regarded as indicative of participant readiness to adopt the online motor vehicle licence renewal system. The perceived usefulness, facilitating conditions, and social influence are perceived by participants as more important constructs in determining customer awareness and customer readiness to adopt the online system. The social influence constructs bring the element of customers awareness with regards to the existence of the online motor vehicle license renewal system.

Table 4.9 presents the one sample t-test outcome for all the UTAUT constructs related to online motor vehicle licence renewal.

	Test Value = 3.5					
					95% Confidence Interval of the Difference	
	t	df	Sig. (2-tailed)	Mean Difference	Lower	Upper
SI	13.816	277	.000	1.12950	.9686	1.2904
PEOU	10.694	281	.000	.96879	.7905	1.1471
FC	14.203	278	.000	1.13799	.9803	1.2957
PU	13.947	277	.000	1.24820	1.0720	1.4244

Table 4.9: One sample t-test for all the UTAUT constructs

Table 4.9 shows that overall there was significant agreement with all four components of UTAT tested with regards to online motor vehicle licence renewal system, because all the p values are p = .000. The results indicate that participants were aware and ready to adopt the online motor vehicle licence renewal since they perceived it as a system that would be easy to use and they also have all the necessary technology needed for the adoption of an online motor vehicle license renewal system.

4.7 ROTATED COMPONENT MATRIX OF ONLINE MOTOR VEHICLE LICENCE RENEWAL

The rotated component matrix table (Table 4.10) shows the factor loadings for individual variable and the number of factors that each variable strongly loads on. In order to explore the structure of the items and authenticate the projected scales of items in the model, factor analysis with promax rotation was used. During the exercise, some items were removed either because they did not load strongly onto any factor, or because they cross-loaded onto multiple factors. The reliability of putting together the items into a single latent variable was tested utilising Cronbach's alpha.

An alpha value of at least 0.7 is presumed sufficient. If items did not associate strongly enough with the other items in the construct and would therefore adversely impact the reliability, they were dropped. Factor extraction is considered to be effective if the

Kaiser-Meyer-Olkin measure of sampling adequacy (KMO) exceeds 0.6 and Bartlett's test of sphericity is significant.

	Factor			
	1	2	3	4
6.16 Many of my neighbours do their personal business online	.947			
6.15 My family/friends would want me to learn to renew my licence online	.898			
6.14 I want to do my personal business the same way my friends, who do it online, do it	.898			
6.12 Many of my friends/family do their personal business online (e.g. banking, shopping, renewals, etc.)	.864			
6.13 My family/friends think I should do my personal business online (e.g. banking, shopping, renewals, etc.)	.849			
6.17 My friends/family would encourage me to renew my licence online, if it was available	.718			
6.3 I would find it easy to navigate the website to do the online licence renewal		1.049		
6.2 I would find it easy to learn to renew my licence online		.912		
6.4 Using World Wide Web would enhance my effectiveness in shopping or information seeking.		.873		
6.6 Overall, the online licence renewal would be easy for me		.703		
6.1 I would find online renewal of my vehicle licence easy to do		.679		
6.5 I would find it easy to upload documents e.g. ID, proof of address and application of motor licence renewal form		.627		
6.20 There is someone who could assist me if I have difficulties doing the online renewal			.986	
6.21 I have access to an information technology technician who can assist me if my equipment is giving me problems.			.912	
6.19 I have access to the technology needed to renew my licence online (e.g. smartphone, laptop, etc.)			.704	
6.18 I have access to a reliable internet connection			.691	
6.9 Renewing my licence online would be less tiring (no standing in queues)				.951
6.10 It would be much more convenient for me, overall, to renew my licence online				.821

6.8 Renewing my licence online would save me money (travelling/ time off work etc.)				.702
6.11 Renewing my licence online would enable me to conclude the transaction more quickly than the in-person licence renewal.				.586

Table 4.10: Rotated component matrix table showing the factors loading for each variable

Item 7, "Renewing my vehicle license online would save me time" was dropped because it loaded onto multiples factors. Thus, it was essential looking at the factors and the groupings it appears as per the UTAUT constructs. The extracted four factors accounted for 81.16% of the difference in the data. A KMO of .952 and significant Bartlett's test (Table 4.11) indicate that the data remained was sufficient for effective and reliable extraction. Rotation occurred in six iterations. The factor structure indicating factor loadings (Table 4.10) shows that construct validity (discriminant and convergent validity) was attained.

Table 4.11 presents the outcomes of the KMO and Bartlett's test for online motor vehicle licence renewal. The KMO test was conducted to indicate what percentage of difference on the variables there might be because of the underlying factors (Yong, & Pearce, 2013, Creswell and Creswell, 2022). This test was utilised to test sample proficiency of the analysis being done. Values close to 0.1 show that the data extracted is useful. Values that are less than 0.50 shows that the data extracted is not useful. Table 4.11 indicates a KMO score of 0.952 which shows that the outcomes obtained from UTAUT variables were appropriate.

According to Creswell and Creswell, (2022) Bartlett's test of sphericity tests the supposition that the correlation matrix is an identity matrix, which suggests that the variables are unconnected and consequently, inappropriate for structure detection. Values of lower than 0.05 of the significance level shows that factor analysis may be valuable using the data. Table 4.11 indicates a score of 0.00, thus showing that the usage of factor analysis is appropriate.

Kaiser-Meyer-Olkin Measure of Sampling Adequacy.		.952
Bartlett's Test of Sphericity	Approx. Chi-Square	6935.967
	df	190
	Sig.	.000

Table 4.11: KMO and Bartlett's test for online motor vehicle licence renewal

4.8 MEAN RESULTS OF COMPOSITE COMPONENTS OF UTAUT FOR ONLINE MOTOR VEHICLE LICENCE RENEWAL

The four components of UTAUT were combined to form one single composite that measured the adoption process of the online motor vehicle licence renewal. On the Likert scale of one to six where least is strongly disagree and the high score is strongly agree, the score of 3.5 is considered to be central score and above average (Creswell and Creswell, 2022). Figure 4.4 presents the mean results of composite for each component of the UTAUT for online motor vehicle licence renewal.

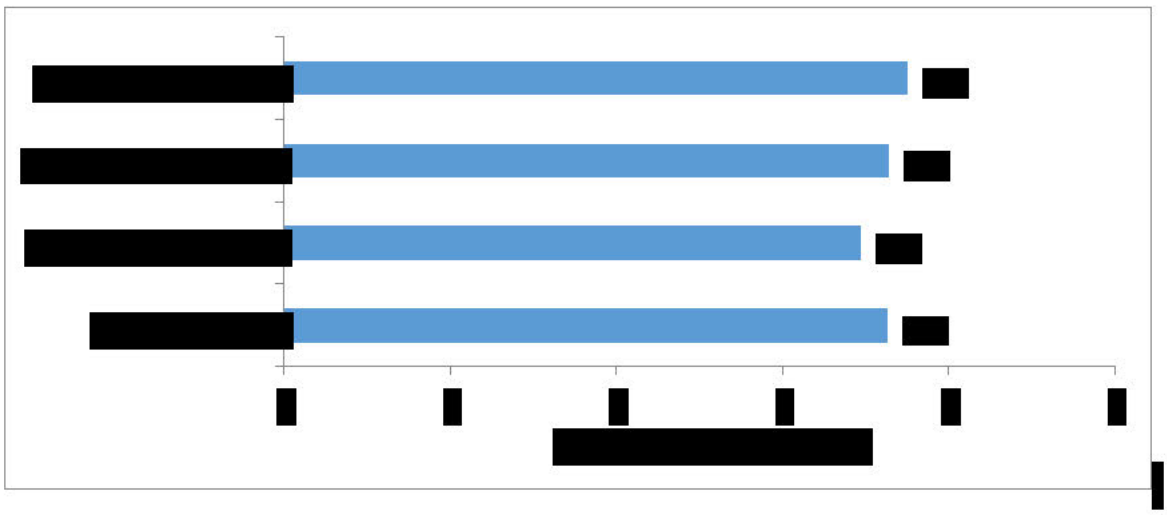

Figure 4.4: Mean results of composite for each component of the UTAUT for online motor vehicle licence renewal

As can be observed in Figure 4.4, all four components of the UTAUT scored an average score that is above 3.5. This indicates significant agreement on all 21 variables that were tested related to online motor vehicle licence renewal. The results reflected in Figure 4.4 affirm that

participant awareness and readiness to adopt the online licence renewal system as an alternative option that they can use to renew their motor vehicle license. The perceived usefulness, Perceived ease of use, facilitating conditions and social influence is considered more important in the adoption process on the online system. Since these four construct were used to access the customer awareness and customer readiness in the adoption process of the online motor vehicle renewal system.

4.9 SERVICE AUTOMATION

In this section, the findings of the service automation are presented using a mean values t-test analysis. The results are interpreted to give provide an understanding of the variables tested with regards to service automation. This section is linked to the study objective which sought to determine whether the adoption of an online license renewal impacts of service convenience as the results service automation.

4.9.1 One sample statistic for service automation

The t-test results in Table 4.12 present the average score of one sample statistical analysis of service automation variables on a rating scale of one to six. One presents a low mean score, 3.5 the central score, and 3.5 and above a high score.

	N	Mean	Std. Deviation	Std. Error Mean
7. If you could renew your licence on-line rather than in-person, how would you rate your satisfaction?	282	4.68	1.585	.094

Table 4.12: One sample statistic for service automation

As it can be seen on Table 4.12 the mean value is 4.68 which is a high score. This indicates that these participants are in agreement with the variable that automation of the licence renewal system would provide greater customer satisfaction than in-person renewal. These results also affirms the customer inclination towards the adoption of an online motor vehicle license renewal as an automated system.

4.9.2 One sample t-test for service automation

A one sample t-test finds whether variance in a sample is greater than would be expected by chance (Creswell and Creswell, 2022, McGivern, 2013). Table 4.13 presents the outcome of the one sample t-test for service automation.

	Test Value = 3.5					
	t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference	
					Lower	Upper
7. If you could renew your licence on-line rather than in-person, how would you rate your satisfaction?	12.476	281	.000	1.177	.99	1.36

Table 4.13: One sample t-test for service automation

Table 4.13 indicates that there is significant agreement on the variable tested which is service automation, having a p value of p = .000. This test indicates that participants perceived the automation of the motor vehicle licence renewal system as having a higher customer satisfaction level than an in-person licence renewal system. Prettner and Strulik (2020) affirm that service automation is an unattended automation approach, giving enhanced service delivery and manageability, high-value creation opportunities, faster value creation with less risk since it is a non-invasive and easier transaction resulting in significant cost savings.

4.10 ANALYSIS OF VARIANCE

ANOVA is an arithmetic analysis that is utilised to establish whether there are any statistically significant differences among the means of two or more independent groups (Hobbs and Katz fuss, 2023). In this study the groups refer to study participants and different geographic located branches they transact at. Table 4.14 presents the ANOVA of this study.

		Sum of Squares	df	Mean Square	F	Sig.
SAT	Between Groups	30.202	5	6.040	6.773	.000
	Within Groups	250.621	281	.892		
	Total	280.823	286			
SI	Between Groups	71.199	5	14.240	8.734	.000
	Within Groups	443.473	272	1.630		
	Total	514.671	277			
PEOU	Between Groups	78.607	5	15.721	7.589	.000
	Within Groups	571.781	276	2.072		
	Total	650.388	281			
FC	Between Groups	88.780	5	17.756	11.847	.000
	Within Groups	409.157	273	1.499		
	Total	497.937	278			
PU	Between Groups	125.218	5	25.044	13.858	.000
	Within Groups	491.531	272	1.807		
	Total	616.749	277			
7. If you could renew your licence on-line rather than in-person, how would you rate your satisfaction?	Between Groups	134.646	5	26.929	13.017	.000
	Within Groups	570.989	276	2.069		
	Total	705.635	281			

Table 4.14: ANOVA

The ANOVA test was utilised to determine the significant variances among six variables, namely, customer satisfaction, SI, PEOU, FC, PU and service automation. Table 4.14 indicates that the p value for all six variables is p = .000 therefore all are significantly different. This statistics analysis implies that under the variable customer satisfaction, the participants were more satisfied with the overall in-person licence renewal system. The results from UTAUT variables indicated that participants were aware of the online system and they also showed readiness towards the adoption of an online motor vehicle license renewal system.

4.11 ANALYSIS OF COMPOSITE VARIABLE DIFFERENCES ACROSS DEMOGRAPHICS AND POST OFFICE LOCATION VARIABLES

4.11.1 Across gender

The analysis from the independent samples t-test shows that males (mean = 5.05) are more satisfied than females (mean = 4.79) with the overall in-person licence renewal process (t [285]

= 2.230, p = .027). The males were more satisfied by the way they were treated by SA Post Office employees, with employee efficiency also playing a role in providing satisfaction. The post office location provided easy access to the clients and the seating provided also contributed to the customers being satisfied. Females were only slightly satisfied with renewal notices from the Department of Transport. The receipt of the SMS notification and electronic copies of renewal notices contributed to customer satisfaction. However, the above stated results is the true reflection of the study gender distribution list which indicated the 58% of the male representation and 42% of female representation.

4.11.2 Across ethnicity

The analysis of variances ANOVA test was used to equate variances across ethnic groups. The results show that there was a significant variance in facilitating conditions across people of different ethnicity F (4, 274) = 2.457, p = .046. The Tukey post-hoc test indicates that Asians agree significantly more than Africans that they have access to facilities and assistance to do online licence renewal, p = .032. The result indicate that Asians have more access to facilities that will support them and enable them to transact online. This may be because of their location in the metropolitan areas. Development of African dominant areas are lagging, so residents of those areas sometimes have to travel a long way to access certain facilities including internet facilities. The result of the test showed no correlation with age for any of these variables.

4.12 THE GAMES-HOWELL POST HOC TEST ACROSS BRANCHES

The Games-Howell post hoc test is utilised to equate all potential combinations of group differences when the supposition of similarity of variances is violated (Hobbs and Katzfuss, 2023). This post hoc test gives confidence intervals for the variances amongst the group means and indicates whether the variances are statistically significant. The test is based on Welch's degrees of freedom correction and uses Tukey's studentised range distribution for calculating the p-values.

The test compares the variance between each pair of means with suitable adjustment for the multiple testing (Hobbs and Katzfuss, 2023) The Games-Howell post hoc test was utilised to conduct analysis of differences across branches. The analyses were conducted on five composite variables related to customer satisfaction with regards to motor vehicle license renewal system, and the four components of the UTAUT, namely, Percieved Ease Of Use (PEOU), Percieved usefulness (P U),Social Influence (S I) and Facilitating Conditions (FC).6

4.12.1 Games-Howell post hoc test – customer satisfaction

Table 4.15 presents the result of analysis of differences across branches regarding customer satisfaction.

Customer Satisfaction	N	Mean	SD	DF	F	P Value
Durban	45	4.4778	1.21410	**0**	**0**	**<.002**
Margate	50	5.3015	.92213	**0**	**0**	**<.001**
Mtubatuba	50	5.2180	91734	5; 281	6.773	<.001
Msunduzi	50	4.9000	.94394	**0**	**0**	**<.001**
Westville	51	4.5647	92689	**0**	**0**	**<.008**
Newcastle	41	5.2073	63733	**0**	**0**	**<.005**
Total	287	4.9435	.99091	5.281	6.773	< .001

Table 4.15: Games-Howell post hoc test – customer satisfaction

The Games-Howell post hoc test was utilised to conduct analysis of differences across branches regarding customer satisfaction. The results indicated in Table 4.15 show that participants at the following branches Margate post office at the mean value of 5.3015 (P <.001), Mtubatuba post office at the mean value of 5.2180 (P <.001), Newcastle post office at the mean value of 5.2073 (P <.005) were more satisfied with in-person motor vehicle license renewal system. The above stated branches showed that they more satisfied with following variables *"the way they were treated by SAPO employees and staff efficiency, branch location and the seating provided for customers"*.

However, the following branches were less satisfied with the overall in-person license renewal system when compared to the above stated branches, Durban post office at the mean value of 4.4778 (P <.002), Msunduzi post office at the mean value of 4.9000 (P <.001) and Westville post office at the mean value of 4.5647 (P <.008). Although they have scored less but they have score above 3.5 which is an average score. These results indicates that the participants were satisfied with an overall in-person license renewal system. The next section presents Games-Howell Post hoc test on social influence.

4.12.2 Games-Howell post hoc test – Social influence

Social Influence (SI)	N	Mean	SD	DF	F		P Value
Durban	45	4.9148	1.201165	**0**	**0**		**<.001**
Margate	49	4.5000	1.36846	**0**	**0**		**<.001**
Mtubatuba	43	4.1783	1.73067	5.272	8.734		<.001*
Msunduzi	49	5.0816	1.28070	**0**	**0**		**<.001**
Westville	51	5.1699	87209	**0**	**0**		**<.001**
Newcastle	41	3.7317	1.8965	**0**	**0**		**<.001**
Total	278	4.6295	1.36309	**5.272**	**8.734**		**<.001**

Table 4.16: Games-Howell post hoc test – Social influence

The Games-Howell post hoc test was utilised to conduct analysis of differences across branches regarding the UTAUT construct social influence. The results indicate that participants from the following branches Msunduzi post office at the mean value of 5.0816 (P <.001) and Westville post office at the mean value of 5.1699 (P <. 001) agreed more that social influence inspired them to do online motor vehicle licence renewal. These respondents from the above stated branches were greatly influenced by family and friends that they were already doing most of their business online and also encouraged by family and friends to do their business online.

The following branches Mtubatuba post office at the mean value of 4.1783 (P <. 001), Margate post office at the mean value of 4.5000 (P <. 001) and Durban post office at the mean value of 4.9148 (P <. 001) these branches were also inspired by their social circles to adopt the online licensing although they scored less compared to Msunduzi post office and Westville post office but they have scored above the average score of 3.5. The Newcastle post office branch scored lowest on this component with a mean value at 3.77317(P <.001) average mean score. This result indicates that participants from this branch were less encouraged by family and friends to do online licence renewal. These results must have been inspired by the branch location which services that great rural part of Newcastle which is still lagging behind in term of the internet connectivity and the popularity in term of online transacting. The next section present Games- Howell post hoc test – perceived ease of use (PEOU).

4.12.3 Games-Howell post hoc test – PEOU

The Table 4.17 presents the PEOU results of the analysis of differences across branches.

Perceived Ease of Use (PEOU)	N	Mean	SD	DF	F	P Value
Durban	45	4.4333	1.38917	0	0	<.001
Margate	49	4.3503	1.41472	0	0	<.036
Mtubatuba	46	3.9319	2.09310	5.276	7.589	<.027*
Msunduzi	50	4.8400	1.43884	0	0	<.001
Westville	51	5.3137	79278	0	0	<.001
Newcastle	41	3.7480	1.23273	0	0	<.027
Total	282	4.4688	1.52136	5.276	7.589	<.001*

Table 4.17: Games-Howell post hoc test – PEOU

Table 4.17 shows that participants from Westville at the mean value of 5.3137 (P <.001) agreed more strongly regarding the PEOU component. The participants from this branch strongly agreed that if the system is perceived to be easy to use, they will adopt system. However, the participants from the following branches Msunduzi post office at the mean score 4.8400 (P<.001), Durban post office at mean value of 4.433 (P <.001) and Margate post office at the mean value of 4.3503 (P<.036) has scored less compared to Westville post office branch. These results indicated that were ready to adopt the online license renewal system since the system is perceived ease to use. The Newcastle post office at the mean value of 3.748 (P<.027) and Mtubatuba post office at the mean value at 3.9319 (P<.027) scored the lowest at this component, these results indicates the slight agreement, although it is the lowest score, it is above the average of 3.5 and this implies that participants are ready to adopt the system if it is easy to use. Overall, despite the different mean scores from the post office branches, all the respondents from these branches affirmed that they would find it easy to renew motor vehicle licences online.

4.12.4 Games-Howell post hoc test – Facilitating Conditions

Facilitating Conditions (FC)	N	Mean	SD	DF	F	P Value
Durban	45	4.4000	1.26514	0	0	<.001
Margate	49	4.51553	1.39699	0	0	<.001
Mtubatuba	43	4.7442	1.35124	5.273	11.847	<.001*

Msunduzi	50	5.1650	1.14465	0	0	<.001
Westville	51	5.2598	.92461	0	0	<.001
Newcastle	41	3.5183	1.23919	0	0	<.002
Total	279	4.6380	1.333834	0	0	<.001

Table 4.18: Presents FC results of the analysis of differences across branches

Table 4.18 indicates that participants from Msunduzi post office at the mean value of 5.1650 (P <001) and Westville post office at the mean value of 5.2598 (P <.001) agreed more strongly on the facilitating conditions when compared to the following branches Durban post office of 4.4000 (P <.001), Margate post office at the mean value of 4.51553 (P <001) and Mtubatuba post office at the mean value of 4.7442 (P <.001).

Msunduzi and Westville post office branches are located in metropolitan areas with a wide variety of facilities which places these branches in a better position because of easy access to facilities, making it easy for customers to adopt and perform any online transactions. Newcastle post office, on the other hand, with a mean value of 3.5183 (P <.002) this scored less compared to all other branches. These results are inspired by its location since it's located in a small rural town where there are limited facilities to access the online transaction.

4.12.5 Games-Howell post hoc test – perceived usefulness (PU)

The Table 4.19 presents PU results of the analysis of differences across branches.

Perceived Usefulness (PU)	**N**	**Mean**	**SD**	**DF**	**F**	**P Value**
Durban	**45**	5.0778	**1.04965**	0	0	**<.001**
Margate	49	4.7500	**1.26656**	0	0	<.001
Mtubatuba	43	4.1570	**2.10938**	5.272	13.858	<.001*
Msunduzi	49	5.4902	**1.28340**	0	0	<.001
Westville	51	5.4902	**.70346**	0	0	<.001
Newcastle	41	3.4878	**1.37267**	0	0	<.001
Total	278	4.7482	1.49216	5.272	13.858	<.001

Table 4.19: Games-Howell post hoc test – PU

Table 4.19 indicates that participants from Durban post office at the mean value of 5.0778 (P <.001), Msunduzi post office at mean value of 5.4902 (P <001.) and Westville post office at the mean value of 5.4902 (P <.001) agreed more strongly on perceived usefulness components than all other post office branches. These above stated branches perceived this system as a good system that requires adoption, since it comes with numerous benefits such as convenience, cost saving and time savings particularly time spent standing in a queue.

However, the following branches, Margate post office at the mean value of 4.7500 (P <.001) and Mtubatuba post office at the mean value of 4.1570 (P <.001) also perceived the online license renewal system as a good system that provide convenience. The Newcastle post office branch at mean value of 3.4878 (P <.001) on the other hand, did not perceive this system as adding value since they have scored less than the average mean score. Participants from this branch are still comfortable with the in-person licence renewal system and less likely to adopt the online motor vehicle license renewal system.

4.13 GAMES-HOWELL POST HOC TEST ACROSS BRANCHES – SERVICE AUTOMATION

Table 4.20 presents service automation results analysis of differences across branches.

Service Automation	N	Mean	SD	DF	F	P Value
Durban	**45**	4.93	1.268	0	0	**<.001**
Margate	49	4.57	1.443	0	**0**	**<.001**
Mtubatuba	46	4.43	1.785	5.276	13.017	<.001*
Msunduzi	50	5.32	1.186	0	0	**<.001**
Westville	51	5.31	1.175	0	0	**<.001**
Newcastle	41	3.22	1.725	0	0	**<.001**
Total	282	4.68	1.585	5.276	13,017	<.001

Table 4.20: Games-Howell post hoc test – service automation

Table 4.20 indicates that participants from Msunduzi post office at the mean value of 5.32 (P <. 001), Westville post office at the mean value of 5.31 (P <.001) were more satisfied to be able to renew their motor licence online on the automated web-based platform. The following branches Durban post office at the mean value of 4.93 (P <.001), Margate post office at the mean value of 4.57 (P <.001) and Mtubatuba at the mean value of 4.43 (P <.001) have scored less when compared to Msunduzi and Westville post office branches.

However, these results indicate that participants from these branches would be satisfied if they could renew their motor vehicle license online. Since they perceived the automated service as a service that would bring convenience and saves time. The Newcastle post office branch on the other hand has a mean value of 3.22 (P <.001) which is a score that is below the average score of 3.5. This means that this branch still prefers the in-person license renewal system since they have indicated that they wouldn't be satisfied to renew their motor vehicle license on the automated platform which is the online motor vehicle license renewal platform. The next section presents the conclusion of the chapter.

4.14 CONCLUSION

Chapter 4 presented the analysis and the interpretation of findings and the outcome from all tested variables. The demographics of respondents was also outlined to provide a clear distribution of respondent's ages, racial composition, and gender and branch distribution. Customer satisfaction reliability statistics were presented to ensure internal consistency of the measuring tool and validity of the construct that was tested, and the mean result analysis was also conducted to establish the level of customer satisfaction.

The study further presented one sample statistic and one sample t-test statistics to establish the significance of results. The mean results analysis was presented for the online motor vehicle licence renewal, based on the four Unified theory of acceptance and use of Technology (UTAUT) constructs. Furthermore, the reliability results analysis for the four UTAUT constructs were presented to validate the internal consistency of the measuring tool and the validity of the constructs. One sample statistic and one sample t-test were presented.

The rotated components matrix for online motor vehicle licence renewal showed perfect loading of factors. The study further presented the Kaiser Olkin of sphericity sampling (KMO), which was appropriate analysis. Service automation analysis was also conducted. One sample statistic and one sample t-test statistics were presented, as well as ANOVA and Game-Howell post hoc tests. Overall, the results show that the participants were satisfied with the in-person licence renewal system, but they were ready to adopt the online motor vehicle licence renewal system as an alternative system. Hence, the next section presents chapter five conclusion and recommendations.

CHAPTER 5: CONCLUSIONS AND RECOMMENDATIONS

5.1 INTRODUCTION

The previous chapter presented the interpretation and analysis of the research findings in order to provide a good understanding of the findings. The overall study was aimed at reviewing customer satisfaction level with regards to in – person motor vehicle license renewal system and the study further explore the customer awareness and customer reediness for the adoption of an online licence renewal system.

Considering the number of vehicle licenses that must be renewed annually, this poses challenges with overcrowding being experienced within the physical spaces of licencing authorities. Furthermore, with the introduction of an online license renewal system in 2022, there were still evidence of longer queues at the licensing authorities.

This indicated a disconnection between the marketing communications promoting the existence of online motor vehicle licence renewals and customer awareness for the online license-service adoption. The limited range of internet coverage in rural areas, to support the access of online services, impacts service accessibility. Also, the digital divide attributed to lack of basic digital literacy, insufficient information communication technology (ICT) skills and devices especially in communities from remote areas which further hindered the access to online- services (Aruleba and Jere, 2022).

This chapter concentrates on the recommendations and conclusions arising from the study. These are linked to the study objectives which were as follows:

- To determine customer satisfaction level with regards to in- person licence renewal system in KwaZulu Natal.
- To ascertain the extent of customer awareness on the existence of online motor vehicle licence renewal system
- To ascertain the extent of customer readiness on the adoption of online motor vehicle licence renewal system.
- To determine whether the adoption of an online licence renewal system impacts on service convenience.

5.2 ACHIEVEMENT OF THE OBJECTIVES

The overall study aim was to review the customer satisfaction level on the in-person motor vehicle licence renewal system, and further explore customer awareness and customer readiness for the adoption of the online licence renewal system. Chapter 2 and Chapter 3 presented a comprehensive literature review and theoretical framework regarding the overall study objectives. The data gathered was collected from the literature to give a better understanding of the status of the motor licence renewal system locally and internationally and of customer readiness to adopt an online motor vehicle licence system. The study objectives were achieved.

5.2.1 To determine customer satisfaction level with regards to in-person licence renewal system in Kwazulu-Natal

The above stated research objective was achieved. The study was able to ascertain participants' satisfaction levels with regards to in-person motor vehicle licence renewal system. The research findings revealed that participants from different geographical areas were satisfied with the overall in-person licence renewal system.

The study was conducted in six different post office branches, namely, Durban, Mtubatuba, Msunduzi, Margate Newcastle and Westville. The respondents were asked ten question on the construct customer satisfaction. All six branches scored above the average mean score of 3.5, which affirms satisfaction overall with regards to the in-person licence renewal system. The four top variables that scored above 5.0 were the way the customers were treated by the SA Post Office employees (5.30), the efficiency of SA Post Office employees who assisted with licence renewals (5.28), the location of SA Post Office outlets (5.11), and the seating provided for customers who came to renew licence at SA Post Office (5.17). The above stated results represented the quality service determinants which were reliability, tangibility, empathy, responsiveness and assurance.

The above results were supported by t-tests which indicated significant satisfaction across all ten variables tested. The reliability test also affirmed internal consistency with a Cronbach's alpha of .906. The statistics and interpretation stated above confirms the attainment of the above specified objective.

5.2.2 To ascertain the extent of customer awareness on the existence of an online motor vehicle licence renewal system

This objective was achieved in terms of the UTAUT framework. The framework consisted of four constructs, namely perceived usefulness, perceived ease of use, social influence and facilitating conditions. The Social influence constructs was adopted to assess the customers awareness of the existence of motor vehicle licence renewal system. The study results revealed that customers were aware of the existence of the online motor vehicle license renewal system. The six-point Likert scale method with a central score of 3.5 was used. All tested variables scored above the average score of 4.0 and the score was presented as follows:

- *Many of my friends/family do their personal business online (e.g. banking, shopping, renewals, etc.) (4.73).*
- *My family/friends think I should do my personal business online (e.g. banking, shopping, renewals, etc.) (4.66).*
- *I want to do my personal business the same way my friends, who do it online (4.60)*
- *My family/ friends would want me to learn to renew my license online (4.56)*
- *Many of my neighbours do their personal business online (6.64)*
- *My friends/family would encourage me to renew my licence online (4.59).*

This objective was achieved based on the above statistics. The respondents showed that they were aware of the existence of the motor vehicle license renewal system. Since, their family and friends were already using the system and they also encouraged them to try the new system. The most contributor to the customer's awareness was the neighbours that were already conducting their business online at the mean score of (6.64). This was significant in creating customer awareness on the existence of the online transacting. The above results were supported by the t-test that were conducted and the reliability test that were also conducted using the Cronbach alpha which scored above .901 across all UTAUT constructs.

5.2.3 To ascertain the extent of customer readiness on the adoption of an online motor vehicle licence renewal system

This objective was achieved, the UTAUT construct was used to assess the achievement of this objectives the participants were more inclined toward the adoption on an online system. The participant's perceived the system as useful and ease to use and they had internet and all other necessary equipment needed to do an online licence renewal. The social circle had a great

influence since they have already using the online system. The tested variables scored as follows:

- *Renewing my motor vehicle licence online would save me time (4.85*
- *Renewing my licence online would be less tiring (no standing on queue (4.75).*
- *I would find it easy to renew may licence online (4.58)*
- *Overall, the online licence renewal would be easy for me (4.51)*
- *I have access to technology needed to renew my licence online (eg Smartphone, laptop etc) (4.98).*
- *I have access to a reliable internet connection (4.78)*

This objective was achieved based on the above statistics. The respondents showed that they were ready to adopt the online motor vehicle licence renewal system. The most contributor the customer readiness to adopt the online system was that customers had all necessary technology needed to renew their motor vehicle license online at the mean score of (4.98). The above results were supported by the t-test that were conducted and the reliability test that were conducted using Cronbach's alpha which scored above .901 across UTAUT constructs.

5.2.4 To determine whether the adoption of an online licence renewal system impacts of service convenience

This objective was achieved. The respondents were asked *"if you could renew your licence online rather than in- person, how would you rate your satisfaction*? The results revealed that respondents would be satisfied if they could renew their motor licence online since they perceived the online system as the system that is easy to use and provide convenience and enabled participants to transact anytime.

This could be due to the increased options to access the service as much as the participants were satisfied with the in- person licence renewal system, they also showed a positive interest in trying the new online system because of the benefits it brings. These results are supported by the average mean score of 4.68. The one sample statistics and one sample test also showed a significant level of satisfaction with regards to service automation online licence renewal system.

5.3 OVERVIEW OF THE EMPIRICAL RESEARCH STUDY

Empirical research is a method of attaining knowledge by means of direct and indirect observations or experience. Data from an empirical research study can be analysed qualitatively and quantitatively through enumerating the evidence or making sense of it in a qualitative form (Creswell, 2009). The study employed the case study approach in which the SA Post Office was utilised as a case study.

The research study aim was to review customer satisfaction levels on the in- person motor vehicle licence renewal system in KwaZulu Natal and further explore customer awareness and customer readiness on the adoption of the online licence renewal system.

The motivation to do this research study originated from the research problem that was stated as follows: motor vehicle licence renewal is a compulsory process where all automobile owners must register their automobile and renew their licences annually. Considering the number of vehicles that must be renewed annually, this poses challenges where there is overcrowding within the physical spaces of the licencing authorities, non-receipt of renewal notifications and time spend waiting on queue which impacts on the customer satisfaction with regards to in-person licence renewal system. With the introduction of an online motor vehicle license renewal system in 2022, the licensing authorities were still experiencing longer queues which has created overcrowding at the physical outlets. There was a disconnect between the marketing communications promoting the existence of online motor vehicle licence renewals and customer awareness for the online license-service adoption (Apleni and Smuts, 20220).

The limited range of internet coverage in rural areas, to support the access of online services, impacts service accessibility. Also, the digital divide attributed to lack of basic digital literacy, insufficient information communication technology (ICT) skills and devices especially in communities from remote areas which further hindered the access to online- services (Aruleba and Jere, 2022).

The unavailability of onsite and offsite portals which would potentially serve as customer alternatives, to access the service, especially in remote areas and would contribute to the online service adoption process. Hence, the study aimed at investigating customer satisfaction levels with regards to the in- person licence renewal system and further explored customer awareness and customer readiness for the adoption of the online licence renewal system.

To address the research problem a detailed research method was produced. The process entailed consultation with the senior management of the SA Post Office where the research project was piloted, and consent was obtained. A detailed letter of information and consent was handed to all potential study participants when approaching them to partake in the study.

5.4 IMPLICATION OF RESULTS FOR THE MOTOR VEHICLE LICENCE RENEWAL SECTOR

A research project of this kind is essential for the Department of Transport and its agencies which are the SA Post Office and local municipalities. The dominance of the use of information technology, artificial intelligence and ever-changing customer consumption patterns make it necessary for these kind of research studies to be conducted. Information technology is the future of this country, because many services that were previously offered in person have now been automated and are being offered online.

The outbreak of Covid-19 in 2020 made it necessary for every business organisation to inspect their systems and the way they conducted business. There was a great need for some of the services to be automated to be accessible online. Many of the businesses that were not geared or prepared to disseminate their services online closed permanently and some services had to be put on hold for a while until there was a downwards trend of the pandemic.

The key components that served as determinants of service quality which is perceived to yield customer satisfaction were employee friendless at the mean score of 5.30, employee efficiency 5.28, central location of licencing outlets 5.11, seating provided for customers at the mean score of 5.11 and overall in-person licence renewal process at the mean score of 5.03. These results generally indicate that customers were satisfied with an in-person licence renewal system.

However, there were some areas that required improvements which were renewal notifications at 4.18, long queues, 4.70, and transaction durations 4.85. As much as these results scored above the average score of 3, 5 it indicated that customers were slightly satisfied on these identified items.

This implied that motor vehicle licencing authorities must improve on delivery of renewal notices, reduce transaction time and further promote other licence renewal options which will results in queue reductions. As an example, the promotion of an online licence renewal system and the introduction of service portals will serve as an additional self-service counter, and this will assist in improving customer satisfaction.

The key components in determining the customer awareness with regards to online motor vehicle licence renewal system was explored using the four components of UTAUT. The focus was on, the social influence components to determine the levels of customer awareness. The study revealed the scores across various dimensions as follows:

- *Many of my family and friend to their personal business online 4.73,*
- *my family and friends think I should do my business online 4.66,*
- *my neighbours do their business online 4.64 and my friend and family want me to learn to business online 4.46.*

These results indicate that customers were aware of the online motor vehicle licence renewal system since their social circles have already adopted the system. This served as further impetus for the customers to adopt the system.

The key components to determine the customer readiness for the adoption of an online motor vehicle licence renewal system were as follows.

- *I have access to the technology needed to renew my licence online at mean score at 4.98,*
- *renewing my licence online would save me time 4.85.*
- *renewing my licence online would be less tiring since there is no standing on a queue 4.75,*
- *I have reliable internet connection 4, 78,*
- *It will be much more convenience for me to renew motor vehicle online 4.66 and I will find it easy to renew my licence online 4.51.*

These results indicated that customers are inclined towards the adoption of the online renewal system. Since the customer perceived the system as easy to use, it would result in a saving of time and cost. The customers already have the necessary equipment and internet connection needed to connect and perform online transactions. The social circle has a major influence in the adoption process since customers are already aware of the existence of the system and its benefits

The main purpose of this study was to contribute to the academic body of knowledge, in general, and to the motor vehicle licencing industry in particular, more precisely to the SA Post Office.

5.5 OVERALL RECOMMENDATIONS FOR THE MOTOR VEHICLE LICENCING SECTOR

The motor vehicle licencing sector should continuously conduct customer satisfaction surveys to ascertain customer satisfaction levels and make improvements where necessary. In addition:

- The motor vehicle licencing sector should continuously update its customer information especially, email addresses, residential addresses and cell phone numbers for easy communication and information sharing and ease distribution of renewal notices.
- The design of the motor vehicle licencing form should be reviewed, as some customers find it cumbersome and not easy to complete. Some customers have to be assisted to complete the form.
- The motor vehicle licencing sector should consider installing Wi Fi in all its outlets for wider accessibility of the internet to boost online transacting, especially in branches situated in rural areas. This will assist in improving service accessibility thereby contributing to customer satisfaction.
- The online motor vehicle licencing option should be marketed. An aggressive marketing strategy should be adopted to promote the product line and posters promoting this option should be displayed in all motor vehicle licencing centres.
- The motor vehicle licensing sector should drive a training campaign that will educate individuals on how to perform the online license renewal especially the rural community that might be interested in adopting the service but don't know how to go about when doing it.
- For service efficiency and expansion of customer's choices, all physical outlets should have one service portal terminal for customers who prefer to do their licencing online but do not have access to internet and necessary equipment to perform an online licence renewal. This will contribute in reducing long queues and popularise the online motor vehicle licence renewal system.
- In addition to courier delivery, introduce automated parcel lockers system and place them in central and busy places like community centres, fuel stations, shopping malls and so on, as an extra facility for customers who do not want

their licence disc either posted or couriered to them. They can access their licence disc at their preferred time.

- Partnering with other business can be explored to expand on the collection points e.g. supermarkets, chain stores even local supermarkets situated in rural communities.
- The motor vehicle licencing sector should consider adopting or developing a cell phone application that will enable customers to transact on it and be able to download and upload documents. This app can also serve as a communicating tool between customers and motor licencing centres.
- It is essential for the licencing sector to take into account the above listed points for the effective and continuous improvement of customer satisfaction with regards to motor vehicle licence renewal, and for popularisation of the online motor vehicle licence renewal system, which can eradicate overcrowding at licencing centres.

5.6 LIMITATIONS OF THE STUDY

The researcher acknowledges that the inclusion of Department of Transport and local municipality licensing centres would have provided a total representation of the motor vehicle licensing sector. However due to access limitation, funding and time factor, the study occurred in KwaZulu-Natal only. However, the study outcome can be generalised to all motor vehicle licencing centres outside KwaZulu-Natal due to nature of the study and the methodologies that were selected. The future research should include all motor vehicle licensing authorities in all provinces of South Africa.

5.7 RECOMMENDATIONS FOR FURTHER RESEARCH STUDY

Similar studies should be conducted at all motor vehicle licencing centres across South Africa. Such studies must include the Department of Transport, local municipalities and the SA Post Office to have a greater and more inclusive representation of the motor vehicle licencing sector. Future research should extend beyond motor vehicle licence renewal to include individual driver's licence renewal as well as vehicle registration and deregistration. The research question should be presented in English and other indigenous language depending on the dominant language where the study is conducted. This will increase the level of understanding of questions in the questionnaire and reduce errors that might occur during the completion of the questionnaire. The current study employed only quantitative research method the future

research study should be extended to employ the mixed method approach where qualitative and quantitative research method are used together to provide for wider interpretation of research result. The further research study should be extended to include the digitisation of driver's licenses focusing on professional driver permits. This should include the digitation of doctor's eye test results, doctor's medical reports and the uploading of the driver recent photo, which impacts on services accessibility and reduces the long queues at the licensing authorities.

5.8 CONCLUSION

The study was conducted in relation to the motor vehicle licencing sector with a focus on adoption of an online motor vehicle licence renewal system. This chapter presented an overview of the whole study. The achievement of the objectives was discussed in detail. The results of the study show that the objectives were all achieved. Arising from the results, certain recommendations were provided, including aggressive marketing to popularise the online motor vehicle licensee product. The introduction of online service portals especially in the rural areas for the expansion of service accessibility. The introduction of the interactive cell phone application (APP) that will provide access to all services offered by department of transport which will allow downloading and uploading of documents, promoting two-way communication between the customer and department.

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APPENDICES

Appendix A: Study questionnaire

RESEARCH QUESTIONNAIRE

Section A of the questionnaire deals with the background and biographical information, respectively. Although I am aware of the sensitivity of these questions, this information will help to compare results from the various groups of respondents. Once again, I assure you that your response will remain anonymous. Your co-operation is appreciated.

For each question, select the ONE option that best applies to you

SECTION A – BACKGROUNG AND BIOGRAPHICAL INFORMATION

1	**Gender**	**Male**			F**emale**	
2	**Age group**	18 – 27 Years	28 – 38 Years	39 – 49 Years	50- 60 Years	61 and above
3	**Ethnic Group/ Nationality**	African	Asian	White	Coloured	Foreign National
4	**Branch Name**					

Section B: Customer Satisfaction

5 Indicate your level of satisfaction with the following aspects relating to in-person renewal of vehicle licences in the PO:

		Very [redacted]	[redacted]	[redacted]	[redacted]	[redacted]	Very [redacted]
5.1	Notification from the department about my renewal date (e.g. do you receive it?; do you receive it in good time? etc)						
5.2	The location of the SA Post Office outlet where I get my licence renewed.						
5.3	The seating provided for customers who wait in queues to renew their vehicle licence at the SA Post Office.						
5.4	The length of the queue I stand in when getting my vehicle licence renewed.						
5.5	The design of the application form for licencing of motor vehicles.						
5.6	The length of time it takes to get my vehicle licence renewed.						
5.7	The efficiency of the SA Post Office employees who assist with licence renewal						
5.8	The way I am treated by the SA post office employee who assist with licence renewal.						
5.9	Efficiency (duration it is offline) of the system in the PO when renewing in-person						
5.10	The overall in-person licence renewal process.						

Section C: Online Motor vehicle licence renewal

6. Indicate your level of agreement with the following statements **regarding online vehicle licence renewal**:

		Strongly Disagree	Disagree	[redacted]	[redacted]	Agree	[redacted]
	Perceived ease of use						
6.1	I would find online renewal of my vehicle licence easy to do						
6.2	I would find it easy to learn to renew my licence online						
6.3	I would find it easy to navigate the website to do the online licence renewal						
6.4	Using World Wide Web would enhance my effectiveness in shopping or information seeking.						
6.5	I would find it easy to upload documents e.g. ID, proof of address and application of motor licence renewal form						
6.6	Overall, the online licence renewal would be easy for me						
	Perceived usefulness						
6.7	Renewing my vehicle licence online would save me time						
6.8	Renewing my licence online would save me money (travelling/ time off work etc.)						

6.9	Renewing my licence online would be less tiring (no standing in queues)						
6.10	It would be much more convenient for me, overall, to renew my licence online						
6.11	Renewing my licence online would enable me to conclude the transaction more quickly than the in person licence renewal.						
	Social influence						
6.12	Many of my friends/family do their personal business online (e.g. banking, shopping, renewals, etc.)						
6.13	My family/friends think I should do my personal business online (e.g. banking, shopping, renewals, etc.)						
6.14	I want to do my personal business the same way my friends, who do it online, do it						
6.15	My family/ friends would want me to learn to renew my licence online						
6.16	Many of my neighbours do their personal business online						
6.17	My friends/family would encourage me to renew my licence online, if it was available						
		[redacted]	Disagree	[redacted]	[redacted]	Agree	[redacted]
	Facilitating conditions						

6.18	I have access to a reliable internet connection						
6.19	I have access to the technology needed to renew my licence online (e.g. smartphone, laptop, etc.)						
6.20	There is someone who could assist me if I have difficulties doing the online renewal						
6.21	I have access to an information technology technician who can assist me if my equipment is giving me problems.						

Section D: Service Automation

7 If you could renew your licence on-line rather than in-person, how would you rate your satisfaction?

Very dissatisfied	Dissatisfied	Slightly dissatisfied	Slightly satisfied	Satisfied	Very satisfied

THANK YOU FOR YOUR TIME

Appendix B: Informed Consent Letter

Informed Consent Document

Dear Participant,

My name is Xolani Protus Simamane. I am a Masters candidate studying at the University of KwaZulu-Natal, Westville Campus. The title of my research is: Reviewing customer satisfaction level with regards to motor vehicle license renewal system in Kwazulu Natal. The aim of the study is to review the customer satisfaction level with regards to motor vehicle license renewal system and further explore customer awareness and customer readiness in the adoption of the online motor vehicle license renewal system. I am interested in interviewing you so as to share your experiences and observations on the subject matter.

Please note that:

- The information that you provide will be used for scholarly research only.
- Your participation is entirely voluntary. You have a choice to participate, not to participate or stop participating in the research. You will not be penalized for taking such an action.
- Your views in this interview will be presented anonymously. Neither your name nor identity will be disclosed in any form in the study.
- The interview will take about ten to fifteen minutes of you time.
- The record as well as other items associated with the interview will be held in a password-protected file accessible only to myself and my supervisors. After a period of 5 years, in line with the rules of the university, it will be disposed by shredding and burning.
- If you agree to participate please sign the declaration attached to this statement

I can be contacted at: College of law and management studies, University of KwaZulu-Natal, Westville: X o l a n i . [redacted] a
Cell: [redacted].
My supervisor is Dr 'Devika Pillay who is located at college of law and management studies Westville Campus University of KwaZulu-Natal. Contact details: email 'Devika Pillayd6@ukzn.ac.za Phone number: [redacted]
The Humanities and Social Sciences Research Ethics Committee contact details are as follows: Ms Phumelele Ximba, University of KwaZulu-Natal, Research Office, Email: ximbap@ukzn.ac.za,Phone number +27312603587.

Thank you for your contribution to this research study.

DECLARATION

I…… hereby confirm that I understand the contents of this document and the nature of the research project, and I consent to participating in the research project.

I understand that I am at liberty to withdraw from the project at any time, should I so desire. I understand the intention of the research. I hereby agree to participate.

I consent / do not consent to have this interview recorded (if applicable)

SIGNATURE OF PARTICIPANT DATE

……

Appendix C: Ethical clearance certificate

UNIVERSITY OF KWAZULU-NATAL
INYUVESI YAKWAZULU-NATALI

11 April 2023

Xolani Protus Simamane (219084105)
School Of Man Info Tech & Gov
Westville Campus

Dear XP Simamane,

Protocol reference number: HSSREC/00004785/2022
Project title: Study of motor license renewals system and its effects on customer satisfaction in KwaZulu-Natal.
Degree: Masters

Approval Notification – Expedited Application

This letter serves to notify you that your application received on 22 September 2022 in connection with the above, was reviewed by the Humanities and Social Sciences Research Ethics Committee (HSSREC) and the protocol has been granted **FULL APPROVAL**.

Any alteration/s to the approved research protocol i.e. Questionnaire/Interview Schedule, Informed Consent Form, Title of the Project, Location of the Study, Research Approach and Methods must be reviewed and approved through the amendment/modification prior to its implementation. In case you have further queries, please quote the above reference number. PLEASE NOTE: Research data should be securely stored in the discipline/department for a period of 5 years.

This approval is valid until 11 April 2024.
To ensure uninterrupted approval of this study beyond the approval expiry date, a progress report must be submitted to the Research Office on the appropriate form 2 - 3 months before the expiry date. A close-out report to be submitted when study is finished.

HSSREC is registered with the South African National Health Research Ethics Council (REC-040414-040).

Yours sincerely,

[redacted]

Professor Dipane Hlalele (Chair)

/dd

Humanities and Social Sciences Research Ethics Committee
Postal Address: Private Bag X54001, Durban, 4000, South Africa
Telephone: +27 (0)31 260 8350/4557/3587 **Email:** hssrec@ukzn.ac.za **Website:** http://research.ukzn.ac.za/Research-Ethics
Founding Campuses: Edgewood Howard College Medical School Pietermaritzburg Westville

INSPIRING GREATNESS

Appendix D: Gate keepers letter of approval

Post Office South Africa

104 Locust Rich Road

Newlands west

Durban

4037

Permission to conduct a research study at the South African Post Office

Dear: XP Simamane

Student No: 219084105

Kindly be informed that the permission to conduct a research project at South African Post Office has been granted. The proposed research tittle: **The Study of motor license renewal system and its effects on the customer satisfaction in Kwazulu Natal: A case study.** Data can be collected from the following offices which are doing motor vehicle licensing. Durban main Post Office, Westville, Msunduzi, Newcastle, Margate and Mtubatuba Post Office. Looking forward for the research study results.

[redacted]

SIGNATURE

DATE 2022/08/25

Kind Regards

Henry Edwards

General M[redacted]ons Retail KwaZulu Natal

martini.c[redacted]ce.co.za

Signature [redacted]

Date ...2022/08/25...

S.A POSKANTOOR BPK

STREEKHOOFBESTUURDER/

REGIONAL GENERAL MANAGER

RETAIL

DURBAN 4000

S.A POST OFFICE LTD