

Examining the Influence of Mobile Payment Customer Experiences on Attitudinal and Behavioural Loyalty: Evidence from Tanzania

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Abstract

This study examined the influence dimensions of customer experience (CX) on attitudinal customer loyalty (ACL) and behavioural customer loyalty (BCL) in mobile payment (m-payment) service in Dar es Salaam, Tanzania. The unit of analysis employed was mobile payment customers, the sampling techniques used was convenient sampling and purposive sampling techniques to select service providers. Data analysis was conducted using Partial Least Square regression with sample size of 379 respondents. The results suggested that out of four dimensions of CX, moment of truth, peace of mind and outcome of focus have a significant positive relationship with both ACL and BCL. The product experience dimension revealed that in mobile payment context customer regards PEX as less important. The study recommends to managers to work on improving PEX through improving marketing strategies. Mobile phone operators/companies advocate customer experience in enhancing customer repurchasing and recommendations. The study contributes towards understanding of the role of customer experience in customer behavioural and attitudinal loyalty in mobile m-payment context. Also, the policymakers should support the provision of m-payment services, cross-product comparison and enhance freedom of choice.

Keywords: *Customer experience, attitudinal customer loyalty, behavioural customer loyalty, m-payment*

1.0 Introduction

For the past several decades, various academic practitioners have considered customer loyalty (CL) due to its ability to enhance sales revenues. Parallel to that, the rapid technological change in service marketing earmarks the alteration of consumer behaviour. One of the reasons is evolution of interrelated services both offline and online, and presence of contractual

relationships in mobile telecommunication services (Pavlović-Höck, 2022). Practices in Europe, India, China and other places in the world, reveals that integration of numerous technological changes (Japutra et al., 2021; Verhulst et al., 2020) and social media platforms (Hanafizadeh et al., 2021) enhances customer loyalty. However in sub-Saharan Africa, prevails insufficient digital knowledge and digital orientation (Astou et al., 2021; Matonya et al., 2019; Nandonde, 2018). Indeed, it is imperative to understand customer loyalty in such context such as Tanzania in order to explaining customer attitudinal and behavioural loyalty from such experiences.

The situation in Tanzania encompass m-payment services, such as personalised mobile services and customer-to-customer interactions which is essential in explaining good and bad experiences to customers. For example; interoperability increases mobile channels which sparked the service's rendering, providing room for customer experience assessment. On the other hand the industry has shown dropouts in market shares of giant service providers such as Vodacom (M-pesa), Airtel (Airtel money), and Tigo (Tigo-pesa) services explained (TCRA, 2020; 2015) (p.10; p.5). In 2015, the M-Pesa services were leading at 45 per cent, 30 per cent for Tigo-pesa, and 23 per cent for Airtel Money, but in 2020, five years later, the market share of Vodacom had dropped to 8 per cent. Likewise, in 2020, the infographic data revealed a drop to 37 per cent for M-pesa, 31 per cent for Tigo-pesa, and Airtel Money, which was 21 per cent (TCRA, 2020). Regardless of new entrants like TTCL (T-pesa) and Halotel (Halopesa) the TCRA infographics could not explain other important usage behaviours such as customer experience as a result little is known about customer experience. Customer experience in this study refers to the interaction between service employees, mobile device and customers.

Astou *et al.*, (2021); Matonya *et al.*, (2019); Nandonde, (2018) argued that what is missing in attaining customer loyalty is a brand experience and digital orientation due to digital illiteracy. Similarly, Rahman *et al.* (2020) added that perceived security and social influence plays a role in cashless payment. Unlike traditional payment services, the notion behind m-payment service is facilitating availability of service everywhere and anytime. Ochola, (2022) contended that in such situation the prevailing technological changes have triggered consumer behaviour (e.g. customer loyalty) which requires better business models. The implication implies that it is interesting to understand the customer experience of such services under such circumstances.

Furthermore, Hoyer, Kroschke, Schmitt, Kraume, & Shankar (2020) stated that the mobile channel has increased, and the digital revolution has updated the concept of experience quality. Likewise, Fall, Diop-Sall, & Poncin (2020) advocated that service providers are obliged to coach customers on usage competence in sub-Saharan Africa. The lack of empirical findings in the sector regarding customer loyalty challenges scholarly understanding of the service marketing perspective, specifically on customer focus. Though Lemon and Verhoef (2016) argued that experience quality occurs in the mobile channel customer journey, yet did not capture the essence of the service process (Jaakkola & Terho, 2021). Similarly Matonya, Jaensson & Ngaruko (2019) argue that brand experience influence brand loyalty but concentrated on MSMEs. Besides, regulations allow multiple subscriptions which may be different to other countries, and providers have introduced a specific department to manage customer experiences. In general, the study is interesting and explains what happens during service encounter regardless of customer own mobile device or from service vendor.

The dimensions of customer experience includes; product experience (PEX), a moment of truth (MOT), outcome focus (OUF), and peace of mind (POM) (Maklan & Klaus, 2013). Similarly, Raina *et al.* (2018) addressed the importance of marketing outcomes such as loyalty to banking services in India. Yet, there is insufficient evidence on how customer experience influences ACL and BCL in Tanzanian m-payment services.

To address this gap, this study extended the customer experience assessment literature and the relationship with customer behaviour, such as attitudinal and behavioural customer loyalty. The study empirically draws quantitative data using structural equation modelling with smart PLS to analyse data. This study examined the influence of the dimensions of CX on attitudinal and behavioural customer loyalty in m-payment services in Dar Es Salaam, Tanzania. The study was guided by the following research questions; how does customer experience influence the relationship between attitudinal and behavioural customer loyalty in m-payment services?

The rest of this study is explained as follows; section 2 is the literature review, section 3 is materials and methods, section 4 is results, section 5 is discuss the results, section 6 explains implication to the study and section 7 concludes the results.

2.0 Literature Review

The primary objective of this study is to expand the available literature on the influence of customer experience on customer loyalty in mobile payment

services. This study was built based on three interrelated theoretical foundations, which entail the customer loyalty framework by Dick & Basu (1994), social exchange theory by Blau (1964) and customer experience by Klaus & Maklan (2013). The sections below explain mobile payment in Tanzania, experience quality, and customer loyalty.

2.1 Mobile Payment Services in Tanzania

M-payment services entail the use of mobile devices or digital devices to acquire financial services which are not limited by space and time. The service spreads in towns and cities in the vicinity of the country because of involving a customer handset only. Indeed the importance of the m-payment service is further widened across Tanzanian borders, entire East Africa and the continent. The smoothness of the service provision and updated technological usage promote innovations in the service and competition in the industry. According to (UNCTAD, 2020) the cash method of payment is wide spread in the country both online and offline transactions as compared to mobile payment. Consequently, the practice shows that there are other substituted providers like m-banking and mobile apps; involving the interconnectedness of services such as health, education and mass usage across companies.

2.2 Attitudinal and Behavioural Customer Loyalty

Customer loyalty is defined as Herhausen et al. (2019) define customer loyalty as "a customer intention to engage in the journey of touchpoints provided by a given retailer and to transit from post-purchase to repurchase at this retailers." On the other hand Oliver (1999) "deeply held commitment to rebuy or repurchase a preferred product or service consistently in the future, thereby causing repetitive same brand or same brand set purchasing, despite situational influences and marketing efforts having the potential to cause switching behaviour.". This study has adopted the definition by (Herhausen et al., 2019) and state customer loyalty as a customer intention to participate in several channels of the service provider, post-purchase and repurchase at the same service provider.

The theoretical underpinning in this study explains the customer loyalty model by Dick & Basu (1994) is represented by two elements attitudinal customer loyalty (ACL) and behavioural customer loyalty (BCL). The concepts are prerequisites to be supported with theoretical foundations, i.e. in terms of trust, commitment, attitudes or behaviours (Damberg et al., 2022; Melián-Alzola & Martín-Santana, 2020). The model assumes that customer loyalty occur based on circumstances such as relative attitudes and relative

behaviour. The model further explains that customer attitude leads to customer behaviour at certain conditions facilitated by social influence and situational factors.

The ACL is referring to the relative attitudes which explain the continuous reminder of the service offerings like ads and extra services (Dick & Basu, 1994). Likewise, the customer saying positive things about the service to family friends and colleague and mentions the service to the social circle. BCL is referring to customer relative behaviour towards the service which is explained by customer tendency to repurchase or repeat patronage. In the present study, the rapid technological changes and competition compel the conceptualisation of the model in mobile payment context. Initially because of the interactions between customers who acquire service by mobile device then the interaction with service employees and service agents. On top of that is answering the call from recent studies which call for empirical investigation on changing consumer behaviours due to technological changes in the industry (Bapat, 2022) and also led to changes in consumer behaviour. The second reason behind using this model is the consideration of situation factors (ads, promotions, incentives-for competing providers) which may compel the customer decision environment to be consistent regarding attitude and behaviour. Likewise, this is useful in the digital era due to high competition among telecommunication service providers (Kalia, 2021). There is little empirical evidence in the industry (Matonya, 2019; Nandonde, 2019) that necessitates conceptualising customer experience.

The theory is imperative in explaining undergoing mixed information on the nature of customer loyalty in terms of attitudinal loyalty and behavioural loyalty which will enhance understanding of the assessment of service quality. Thus consider customer loyalty as static, meaning that must follow conditions or phases. This is opposed by Curran et al. (2010) whereby explained that customer loyalty is dynamic and not static because customers may purchase a service with no reasons such as liking but happens anyway. Besides, there is a continuing debate concerning the use of two dimensions at a time but rather one (Melián-Alzola and Martín-Santana, 2020). Moreover, criticism of the frameworks is that they could not provide an association between customer loyalties with the customer experience of which this study will unleash.

2.3 Customer Experience

Customer experience is defined by (Meyer & Schwager, 2007) as “the internal and subjective response customers have to any direct or indirect

contact with the company” (p.2). The study conceptualises customer experience from Maklan and Klaus (2013) framework of customer experience namely Experience Quality (EXQ). The framework explains customer emotional responses to service during a service encounter. The dimensions of customer experience framework include; a moment of truth (MOT), product experience (PEX), outcome focus (OUF), and peace of mind (POM). The term "moment of truth" refers to a customer's assessment of a mobile operator's company involvement in increasing customer repurchasing and recommendations. "Peace of mind" refers to the customer's evaluation of the interaction on their customer journey (sending and receiving), before, during, and after experiencing service to establish a relationship with the mobile operator's company. In addition, "Product experience" refers to customer assessment of available choices for the rendered service and the ability to compare such offerings (Raina et al., 2018).

Moreover, Raina et al. (2018) define "outcome of focus" as a customer assessment of the cost associated with business operations, which implies the ability to find out what other mobile operators can offer. Mobile operators work on providing a better customer experience through an experience management unit that follows up closely customer responses to the m-payment service. For example, asking a customer to rate the service offered. The reason behind using this framework is to understand customer experience in m-payment context and how it influence ACL and BCL.

2.4 Hypothesis Development

2.4.1 Customer Experience on Attitudinal Customer Loyalty

The two key hypotheses form customer experience constructs are modified from the experience quality framework by Maklan & Klaus (2013), such as product experience (PEX), outcome focus (OUF), a moment of truth (MOT), and peace of mind (POM). These constructs link attitudinal and behavioural customer loyalty in m-payment services. According to Srivastava and Kaul (2016), POM influences customer loyalty in tourism services where customers have a memorable experience of the scenery. As in Raina et al. (2018), customer experience (POM, OUF, MOT and POM) influences customer loyalty in the banking sector in the Indian service context. Imhof and Klaus's (2019) addressed further that, customer experience dimensions positively influence CL, narrated in finding that a satisfied customer may have a better customer experience. Still, in some instances, there is a lack of alternatives that compel customers to become loyal even if they are dissatisfied. On the other hand, in m-payment services, where the expertise of the provider, convincing retention, and process of usage is familiar to the

customer, may bring a better understanding of the influence of PEX, OUT, MOT, and POM on customer loyalty.

Previous research by Brun et al. (2017) and Japutra et al. (2021) suggested that customer experience impacts customer loyalty, but the study focused on retailer apps. Besides, the customer experience in the digital era reveals subjective customer responses to their emotions. Customer loyalty remains on customer assessment of experience quality during service delivery from a customer-focused perspective. According to Bandyopadhyay & Mortell (2007), attitudinal customer loyalty (ACL) can be distinguished from behavioural customer loyalty (BCL) as it carries particular weight in understanding loyalty because of the inclusion of social-cultural influences like social bonding. In the context of advanced technology, Johns & Davey (2021) consider customers experiencing emotional vulnerability, which leads them to rely on close relations during service encounters. With social influence to learn and use the service, which makes sense of the power of social bonding in experiences acquired to influence ACL. On top of that, there is a quest for a deepening ACL/recommendation perspective as social influence factors are inevitable when there are numerous touchpoints such as Wakala, ATM (Automated Teller Machine) and POS (Point of Sale), which give customers different experiences. For instance, when a customer experience at the time inquires about a service from point of sale and connections between point of sale infrastructures and service provider is not responding, or there is internet failure. Hence it is important to examine whether the dimensions of CX has influence on attitudinal loyalty. The following are the proposed hypotheses;

H1a: *Peace of mind positively influence attitudinal customer loyalty*

H1b: *Outcome of focus positively influence attitudinal customer loyalty*

H1c: *Moment of truth positively influence attitudinal customer loyalty*

H1d: *Product experience positively influence attitudinal customer loyalty*

2.4.2 Customer Experience on Behavioural Customer Loyalty

The study addressed BCL when customers repurchase the service and contends that CX occurs throughout the service delivery process, including before, during, and after purchasing, as well as throughout the entire customer journey (Lemon & Verhoef, 2016). According to Meyer & Schwager (2007), customer experience is a subjective response linked with emotions and has used neurophysiological tools to measure responses (Verhulst et al., 2020). Likewise, it emphasises the physical environment, post-purchase perceptions, and retention (Kuppelwieser & Klaus, 2020). The fact that emotion plays a role in assessing the service is an eye-opener to how

behavioural loyalty forms. Similarly, Iv et al. (2015) explained communication as meaningful in enhancing BCL. For example, a customer may decide not to switch to other providers but keeps buying from the same provider and not elsewhere. The active participation of customers in the service, like self-service customer encounters and those from vendors, may improve dimensions of CX (PEX-freedom of choice, OUF-result focus, MOT-proactivity, and POM-expertise) familiarity) Moreover, this may influence BCL. However, because of peer-to-peer interaction, BCL differs across industries as the nature of experience differs (Pekovic & Rolland, 2020a), which is essential to conceptualise m-payment. Therefore it is important to empirically examine whether the dimensions of CX has influence of on behavioural customer loyalty. Therefore the study proposes the following hypothesis;

H_{2a}: Peace of mind positively influence behavioural customer loyalty

H_{2b}: Outcome of focus positively influence behavioural customer loyalty

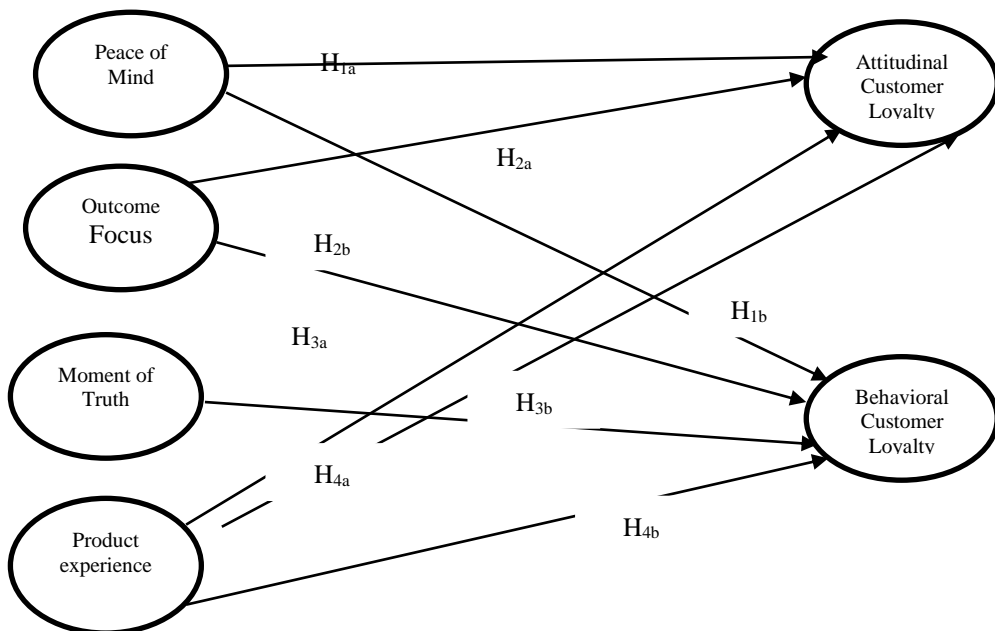
H_{2c}: Moment of truth positively influence behavioural customer loyalty

H_{2d}: Product experience positively influence behavioural customer loyalty

2.5 Conceptual Framework

Independent Variable

Dependent Variable



Dimensions of Customer Experience

Figure 1: Conceptual Model

Based on the literature reviewed in this paper, the independent variable is dimensions of customer experience namely; POM (Peace of Mind), OUT (Outcome of Focus), (MOT), Moment of Truth and PEX (Product Experience). The hypothetical development discussed above and the conceptual framework in Figure 1. illustrates that these dimensions influences the dependent variable which is mobile payment attitudinal customer loyalty (ACL) and behavioural customer loyalty (BCL).

3.0 Materials and Methods

This study employed explanatory research design where the objective was to deduce causal effect (Bhattacharjee, 2012). Unit of analysis was comprised of individual m-payment customers because the objective of this study focused on customers. In order to acquire the best representation of the sample, three large companies were selected with a large customer base among Tanzanian mobile payment service operators identified by the Tanzanian Communication and Regulatory Authority (TCRA). These operators are Vodacom which provide M-pesa services, Tigo which provide tigopesa and Airtel with Airtel-money. The sampling technique used was purposive sampling which involved selecting the three companies. Sample Size was obtained using Cochran formula (Cochran, 1977). Below is the respondent formula of sample size;

Respondents sample Size Determination Using Cochran Formula

$$n = \frac{z^2 pq}{e^2}$$

Where n=sample size, z is a critical value of desired confidence level, p is the estimated proportion of an attribute in the population of mobile payment customers (Using standard value of 0.5% since its unknown), q=1-p (1-0.5) and e is the Margin error of 5%. Taking p=0.5, q=1-0.5=0.5; e=0.05; z=1.96, So $n = \frac{(1.96)^2 \times 0.5 \times 0.5}{(0.05)^2} = 384.16 = 384$ (Sample size for respondents from infinite population)

$$= \frac{3.8416 \times 0.25}{0.0025} = 384.16$$

The population obtained was 384 prior to data collection. The returned questionnaires and following coding and data cleaning was 379 questionnaires at a response rate of 94.75 per cent employed for further analysis. Data collection took place between Januarys to March, 2021 in Dar es Salaam region.

Moreover, non-probability sampling procedure was employed because of the availability and sensitivity of m-payment data and complications in customer mobility. Besides, the sampling procedure involved a convenient sampling technique in response to (Jaakkola *et al.*, 2022) that contended for research that comprise touchpoints outside service provider control. The respondents were drawn based on their willingness to respond at m-payment vendor shops and seller point of sale. Also, have used the service for over one year and subscribed to Mpesa, Tigopesa, or Airtel money service providers.

3.1 Measurement of Constructs

The two dimensions for customer loyalty model by Dick and Basu (1994) is employed as study employed and modified with constructs from previous literatures (Melián-Alzola and Martín-Santana, 2020; Matonya et al. 2019; Mandhachitara, 2011) These dimensions are namely attitudinal customer loyalty and behavioural customer loyalty as dependent variable. The items were ACL is explained by “Saying positive things about service” and “Encouraging share of information about service”. Likewise, BCL was explained by “continue usage of service and Repurchase service”. The independent variable includes dimensions of customer experience obtained from Experience quality framework (EXQ) by Maklan and Klaus (2012) which were introduced in the literature review discussion.

The study employed both dimensions of customer loyalty and the dimensions of customer experience namely peace of mind, moment of truth, outcome of focus and product experience. The research model tested in this study is developed based on the relationship between the dimensions of customer loyalty Dick and Basu (1994) and the dimensions of customer experience by Maklan and Klaus (2012). Moreover, this conceptualization allows an extensive examination of each dimensions in the m-payment context. The outcome of research model as explained by hypotheses in Fig. 1 that four dimensions of customer experience are; POM, MOT, OUF and PEX (Kuppelwieser & Klaus, 2020; Roy 2018; Klaus, 2013; Raina 2019). These determinants affect both dimensions of customer loyalty (ACL and BCL). Measurement scales of the constructs employed multiple scale items which are useful in handling complex multi-dimensional constructs (Damberg et al., 2022). All constructs employed in this study, were adopted from previous studies with validated measurement. Overall indicators were measured using 7-point Likert scale which ranged from 1=strongly dis-agrees to 7= strongly agree.

3.2 Questionnaire Development

In this study, survey method was employed whereby questionnaire had three sections; demographic profile of respondents, customer experience and loyalty. For example, there were three major parts; the respondent's demographic profile, which helped understand customer loyalty; the frequency of application to the service; gender; and subscription status. The questionnaire carried six sections whereby two constructs, ACL and BCL, explained customer loyalty. In contrast, the customer experience was explained by four constructs: peace of mind, outcome focus, product experience, and moment of truth. The questionnaire was written in English and later translated to Swahili, whereby experts were involved in translations. The reason was that the respondents were individual customers, most of whom use the latter language. These questionnaires were self-administered whereby a researcher followed customers at the point of sales and requested them to respond to the surveyed questionnaires at their convenience.

3.3 Demographic Profile of the Respondents

The descriptive analysis revealed the following; the majority of the respondents were male, at 52.5%, while the female respondents were at 47.2 per cent. About 70.4 per cent of respondents were self-employed, while 20.8 per cent were full-time employed and 8.2 per cent were not employed. Meanwhile, the respondents were from three major service providers, whose distribution was as follows: Tigo from Tigo, 66 per cent, Mpesa from Vodacom, 46 per cent, and Airtel from Airtel money was 43.5 per cent. The reason includes; that respondents register with more than one m-payment service provider. The demographic profile supports the study's clear picture of customer experience and loyalty.

Table 1: Descriptive Statistics (N=379)

No.	Measure	Details	Frequency%	Percentage %
1.	Age	Young	295	78
		Old customers	84	22
2.	Gender	Male	190	53
		Female	189	47

4.0 Data Analysis and Results

4.1 Evaluation of the measurement model

Data analysis employed the Statistical Package for Social Science (SPSS) version 26. The tool enables computation for psychometric properties, reliability, validity, and factor loading through confirmatory factor analysis (CFA). According to (Sarstedt et al., 2020), PLS-SEM involves measuring

model assessment followed by structural model assessment following evaluations of reliability and validity. The table 2 illustrates results for dependent and independent variables using composite reliability.

Table 2: Assessment of Reliability, Convergent Validity and Collinearity

Variables	Items	Loading >.7	CR >.7	AVE >.5	VIF <.3	
Attitudinal Customer Loyalty	ACL_1	I will say positive things about my m-payment providers	0.881	0.867	0.686	2.001
	ACL_2	I always consider my m-payment provider as my first choice	0.856			1.875
	ACL_3	I consider myself to be a loyal customer	0.740			1.328
Behavioural Customer Loyalty	BCL 1	I will keep using m-payment service provider	0.819	0.844	0.644	1.484
	BCL 2	I will use this provider the next time, I need a new service	0.820			1.488
	BCL 3	I will do most of my m-payments with the same provider as I have now	0.767			1.332
Peace of mind	POM 1	I am confident with mobile payment service	0.707	0.822	0.537	1.299
	POM 2	My dealing with this provider is easy	0.741			1.293
	POM 3	My service provider provide free advice on which service will suit my needs	0.771			1.348
Moment of Truth	MOT 1	Mobile payment service provider gives me good customer service	0.811	0.851	0.588	1.111
	MOT 3	The service provider keeps me informed with each new information coming	0.811			1.111
Outcome of focus	OUF 1	My provider gives me better offers, then why should I worry; here I know I will get it	0.727	0.794	0.658	1.387
	OUF 2	Mobile payment service gives me what I need swiftly	0.733			1.389

Variables	Items	Loading >.7	CR >.7	AVE >.5	VIF <.3	
Product experience	OUF 3	I prefer my mobile payment service provider over their competitor	0.766		1.530	
	OUF 4	My provider's services are superior than their competitor	0.837		1.792	
	PEX 1	I can choose different options from my mobile payment service provider	0.773	0.841	0.638	1.352
	PEX 2	I receive offers from my mobile payment service provider	0.784			1.383
	PEX 3	I can compare different offers from my service provider	0.837			1.535

The results obtained from composite reliability in the table 2, are in-line with Henseler et al. (2016), presenting above 0.7 standard thresholds. According to Hair *et al.* (2019), convergent validity is explained with appropriate AVE value that should be 0.5 and all AVE in table 4 illustrates between a range of 0.527 to 0.668 which is acceptable.

Table 3: Discriminant Validity of the Constructs- Heterotrait Monotrait (HTMT)

Latent Variable	ACL	BCL	MOT	OUF	PEX	POM
Attitudinal Customer Loyalty						
Behavioural Customer Loyalty	0.594					
Moment of Truth	0.666	0.811				
Outcome of Focus	0.698	0.648	0.38			
Product Experience	0.434	0.468	0.629	0.614		
Peace Of Mind	0.643	0.615	0.738	0.663	0.628	

The Discriminant validity was computed using Heterotrait Monotrait ration (HTMT) which explains that the discriminant validity was acceptable as per (Hair et al., 2019). The values below the diagonal shape should be below 0.8. The results in Table 3 above are below the threshold hence acceptable for further analysis.

4.2 Evaluation of Structural model

4.2.1 4.3.1 SEM Results

The Evaluation of the structural model with partial least square regression technique tests the relationship of the hypotheses follows after estimation of the measurement model according to (Hair et al., 2019)(Hair et al., 2019). The structural model initial assess the collinearity problems which is computed by Variance Inflation Factor (VIF). This estimation check enables comparison and understanding of the size of the coefficients in the model. In table 2 the VIF values are below threshold of 3, illustrating acceptable values. The model explanatory power is then estimated, structural model results depicted a good model fit for the Standardised Root Mean Square Residue (SRMR) presented in this study for measuring model fit, which is 0.039 for both the measurement model and structural model. The implication of the criterion for model fit supports that a model has explanatory power and is useful for the analysis.

Table 4: Model Goodness Fit

Indices	Measurement Model	Structural model
SRMR	0.039	0.039
d_ULS	0.159	0.159
d_G	0.062	0.062
Chi-Square	122.162	122.162
NFI	0.926	0.926

Table 4 illustrates the analysis of the model fit; the analysis establishes the measurement and structural models through path analysis. According to Diamantopoulos and Winklhofer (2001), the rule of thumb in evaluating these results requires a scale reliability value of 0.6 to 0.7. The path coefficients and R-square values estimates are from the structural model for measuring the strength of the causal relationship. The relationship entails the dependent variable ACL and BCL and the independent variables CE with constructs (POM, MM, OUF, and PEX), as well as measuring the amount of variance explained by independent variables and the predictive power of the model. The study is consistent with Hair et al. (2019), Henseler et al. (2016), and Hair et al. (2011), whereby the tool supports non-normal data, is useful for marketing studies and when the structural model is complex with various constructs.

The results in Table 4 illustrate that the model has explanatory power because the values of the measurement and structural models are similar. SRMR is 0.08 as a threshold, but for marketing studies between 0.25-0.3 is good and acceptable, showing the robustness of the model.

Table 5: Model Predictive Power and Predictive Relevancy

	Q ² predict	RMSE	MAE R	R ²
Attitudinal Customer Loyalty	0.332	0.833	0.499	0.350
Behavioural Customer Loyalty	0.297	0.860	0.544	0.324

The findings revealed that ACL = R² = 35 per cent and BCL = 32.4 per cent, which is acceptable for marketing studies. The R² explains that the influence of CE on CL is explained by ACL for about 38.2 per cent, while BCL has explained 36.4 per cent of the rest for other variables. The coefficient of determination R² is explained by dependent variables which explain variances. Besides to the study make decision about the model the out of sample predictive power by running the PLS(predict) analysis which for dependent variables ACL and BCL which is suggested by (Shmueli et al., 2019). In this assessment a positive Q² indicate that the model is acceptable

for further analysis. The results for Q2 in table 4 reveals that Q2 for ACL and BCL are positive hence acceptable for further analysis.

4.2.2 Hypothetical Results

A bootstrapping result employed 5000 samples following testing of the hypotheses and structural relationships and estimate the model. This value of SRMR depicts goodness of fit at a threshold of <0.08, which is acceptable (Hair et al., 2011). SEM was carried out in the partial least square estimation method to analyse the measurement model (proposed hypothesis). Table 6 illustrates hypothetical results as follows;

Table 6: Hypothesis Test

H ₀	Relationships	Path Coef (β)	T Value	P values	Decision
H _{1a}	Peace of Mind -> Attitudinal Customer Loyalty	0.255	3.487	0.000	Accepted
H _{1b}	Peace of Mind -> Behavioural Customer Loyalty	0.203	3.170	0.002	Accepted
H _{2a}	Outcome Focus -> Attitudinal Customer Loyalty	0.361	6.050	0.000	Accepted
H _{2b}	Outcome Focus -> Behavioural Customer Loyalty	0.217	3.153	0.002	Accepted
H _{3a}	Moment of Truth -> Attitudinal Customer Loyalty	0.086	1.428	0.153	Rejected
H _{3b}	Moment of Truth -> Behavioural Customer Loyalty	0.247	4.332	0.000	Accepted
H _{4a}	Product Experience -> Attitudinal Customer Loyalty	0.017	0.317	0.751	Rejected
H _{4b}	Product Experience -> Behavioural Customer Loyalty	0.057	0.791	0.429	Rejected

Source: Researcher, *ACL-Attitudinal Customer Loyalty, BCL-Behavioural Customer Loyalty,*

The results indicated positive and significant relationship of H1a that influence of POM on ACL ($\beta = 0.255$, $p < 0.000$) hence the hypothesis is accepted. The results of OUF revealed that there is a positive significant relationship between OUF and ACL in H2a ($\beta = 0.361$, $p < 0.000$). On the other hand H3a which explain the influence of MOT on ACL revealed a negative relationship ($\beta = 0.086$, $p > 0.153$). The hypothesised effect of PEX in mobile payment services, showed that H4a has a negative relationship with ACL, the results were ($\beta = 0.017$, $p > 0.751$).

Moreover, In H1b, the findings depicted that the change of Peace of Mind (POM) influences significantly positive change in ACL ($\beta = 0.203$, $p < 0.002$) and was accepted. OUF in H2b was accepted, revealing a positively significant influence of OUF on BCL ($\beta = 0.217$, $p < 0.002$) which was accepted. Similarly, there was a significant positive influence on the relationship in H3b, between MOT and BCL ($\beta = 0.247$, $p < 0.000$) the decision was accepted. However, the hypothetical result in H4b revealed a non-

significant relationship between PEX and ACL with ($\beta=-0.057$, $p>0.429$) hence rejected.

5.0 Discussion and Implications

This study examined the influence of dimensions of customer experience; peace of mind, outcome of focus, moment of truth and product experience on attitudinal and behavioural loyalty in mobile payment services. Based on the literatures, the relationship between peace of mind (POM) and attitudinal customer loyalty (ACL) for mobile payment services in the proposed model is significant. This finding implies that customer assessment of experience quality; before, during, and after rendered service has influence on customer recommendations of the service. They further suggested that familiarity with the service as well as expertise of the service provider of the “POM” is essential to determine both ACL and BCL. The study was in line with (Hoyer et al., 2020; Pekovic & Rolland, 2020), suggesting that customer experience influences customer loyalty.

Moreover, the outcome of focus (OUF) influenced positive significantly the ACL and BCL. These results implied that customers' assessment of customer experience towards the services in terms of; better offers, swiftness of the service, and service preference compared to the competitors is better to enhance repurchasing (BCL) and recommendation (ACL). The results were in line with (Raina et al., 2018) regarding positive relationship of which the previous relationships were in mortgage and real estate businesses.

The study findings revealed that the relationship between moment of truth and ACL was insignificant. This means that the impression of the customer regarding the m-payment did not influence saying positive things to others like family members, colleagues and friends. which is essential to the customer's assessment of the m-payment services to enhance customer loyalty. Likewise MOT influences BCL positively significant which is contradicting with ACL. This implied that customer impression of m-payment service play part in the repurchases of m-payment services. This study was consistent to past studies Olaleye et al., (2020); Raina et al. (2018) and Rahman et al., (2020) based on BCL but inconsistent with ACL.

Furthermore, the study revealed a significant negative relationship between product experience (PEX) and ACL, and PEX and BCL. These findings demonstrate that customers with m-payment service experience were exposed to different choices of m-payment service providers, can compare these offerings, and appraise the feeling of a variety of choices that do not

influence their repurchasing (BCL) and recommendation (ACL) of the service. The findings contradicted Imbug et al. (2018) the previous finding regarding the relationship between customer experience and customer loyalty, which contends that the relationship is positively associated. The implication is that if a service provider does not communicate customer assessment of experience quality well. In that case, the customer has no choice but to comprehend what is offered. This further implied that when other limitations take place during service provision like network coverage, availability of services and connectivity occur in developing countries, which is considered disloyalty (Bhatnagar et al., 2019; Mbawuni & Nimako, 2016). On top of that, although there was freedom of choice and proactivity from the service provider, it does not reflect customer loyalty. The reason behind could be technological changes, which support previous researcher's suggestion for a need for digital customer orientation (Johns & Davey, 2021; Klaus & Manthiou, 2020; Nandonde, 2019a) affect customer experience. For example, when a customer uses a new mobile phone and wants to undertake m-payment services, there is little concern from the service provider which affect PEX to enhance the ACL and BCL in m-payment service.

6.0 Implications

This study responded to the call for more insights from researchers and service marketing practitioners in understanding customer experience using EXQ measures in service research (Jaakkola & Terho, 2021; Kuppelwieser & Klaus, 2020). The study contributes to the body of knowledge by combining customer experience framework and customer loyalty model. The paper conceptualises specifically customer assessment of customer experience with a customer perspective and contributes explicitly to the attitudes such as recommendations about the service and behaviours such as repurchasing. The theoretical underpinning suggests that MOT, POM and OUF in customer experience influence CL in terms of ACL and BCL except for PEX.

Contrary to previous studies such as (Raina et al., 2019), PEX exceptions might be caused by the touchpoints outside service providers control whereby m-payment customers encounters the service with both device and other service vendors. The proposed research model is useful in developing economy perspective and in provision of marketing strategies. Similarly, it is responding to scholars' concerns on change in customer behaviour due to technological changes and presence of many touchpoints(Jaakkola et al., 2022).

Practically, the m-payment sector in Tanzania should work on providing memorable experiences and follow up on customer queries and concerns to

keep them using the service. Experiences include improving follow-up on social media platforms because customers use that to communicate their experiences. Therefore several actions can be taken as strategies for enhancing ACL and BCL as an important indirect performance measure of the company. Policymakers should consider the dimensions of customer experience on their agendas on consumer protection.

7.0 Conclusion and Recommendations

This empirical paper explains the influence of the dimensions of customer experience (peace of mind, outcome of focus, moment of truth and product experience) on attitudinal and behavioural customer loyalty in mobile payment services in Tanzania. The findings indicated that three dimensions of CX (MOT, POM and OUF) influence ACL and BCL but one dimension of CX which is PEX revealed a negative relationship. The conceptual model explains that in the mobile payment context, POM, OUF and MOT are important in influencing CL. The results derived from the hypothetical test explaining that mobile payment service providers should work on improving PEX because the service involves technology set up in mobile devices, which involves customer experience; in that case, it may help to use it for competitive advantage.

However, this study has several limitations and area for future studies to embark on m-payment services studies. The three big providers (M-pesa, Tigopesa and Airtel money) involved in the study are a limitation whereby other studies can consider all providers in the industry. This study employed a field survey; future studies could replicate it, involving a qualitative approach like an in-depth interview and focus group discussion. On top of that, other studies can concentrate on vendor-based m-payment services and their effect on customer loyalty. Lastly, there were numerous opportunities through customer-to-customer interactions where the service providers can use them to communicate more with their customers in understanding their experience quality assessment and use them as a competitive advantage. The study focused only on customers; hence future studies can also research on social interactions in other service settings.

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