

DETERMINANTS OF CUSTOMER LOYALTY TO MOBILE PHONE BRANDS

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Abstract: *This study empirically examined customer loyalty to mobile phone brands in Nigeria with specific objectives of establishing customers' preference for the different brands of mobile phone; ascertain the rationale for customer loyalty and preference for mobile phones; and examining the influence of demographic variables on customer loyalty to mobile phone usage. A survey research design with the use of questionnaire was adopted to generate the needed data for the study. The population of the study comprised users of mobile phones in the university community, ministries, and secondary schools in Benin City, Nigeria. Copies of questionnaire were administered to two hundred (200) respondents out of which one hundred and ninety-four (194) were returned and found useable. Statistical tools including simple percentage, mean, t-test and analysis of variance (ANOVA) were employed for data analysis through the use of Statistical Package for Social Sciences (SPSS 22.0). The study found that there is a significant relationship between respondents' demographics (gender, age and educational qualification) and customer loyalty at a 5% level of significance. Based on the investigated factors influencing mobile phone purchases such as quality, functionality, cost, durability and ease of maintenance, the study revealed that Nokia, Blackberry and Samsung are the most preferred mobile phones in Nigeria. The study, therefore, recommends that manufacturers of mobile phones should ensure that their products are of good quality, durable, affordable, easy to repair and capable of performing multiple functions so that those customers who like using more than one phone with different functional varieties can be loyal to a particular brand.*

Keywords: Brand loyalty, Customer, Durability, Mobile phones, Quality.

JEL classification: M3, M31, M310.

1. Introduction

The whole world has now become a global village where people can reach one another in different parts of the world with the help of modern technologies such as mobile phones within a short period (Aidoo and Nyamedor, 2008; Srinivasan, 2018). Mobile phones have evolved from analogue to digital (Jin, 2018). The first generation of mobile phones were analogue, but subsequent generations have been predominantly digital (Pascal, 2007). In the 1990s, analogue phones were deployed by Nigerian Telecommunications Limited (NITEL), the only national carrier then. Satellite phone was also available (Adeyinka, *et al.*, 2007). However, these mobile phones were not accepted by the generality of Nigerians because they were not only expensive but also, they were seen as status symbols rather than a necessity (Pascal, 2007). The launching of a new mobile telecoms technology known as the Global System for Mobile communication (GSM) in Nigeria in 2001 transformed the telecommunication sector which has been instrumental to the rapid increase in telecommunications accessibility (Bakare and Gold, 2011). GSM dominated the digital

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cellular market with 70% of the market and more than 500 million subscribers in 169 countries in 2000 with worldwide mobile users of 2.13 billion and 4 billion in 2005 and 2011 respectively (Pascal, 2007).

Statistics record (Radicati, 2014) that as at 2004, there were over 5000 direct and 400,000 indirect employments the Tel-communication industry in Nigeria (Bakare and Gold, 2011; Adomi, 2006). This sector appeared to have improved the nation's GDP as its contributions increased from 0.32% in 2000 to 3.66% in 2009 (NCC, 2012) and generated over 200 billion Naira (Adeyinka *et al.*, 2007). It is purported that Nigeria has the largest market (the Computer Village in Lagos) for GSM in Africa (Kenneth, 2007).

Mobile phones are "one of the modern telecommunication technologies that have emerged over the past decades to facilitate communication among people within and across countries" (Dziwornu, 2013, p.151). Nowadays, mobile phones are used by different individuals in society (Lipschultz, 2019) such as the office cleaner, auto mechanic, drivers, students, farmers, market women to the businessman and the Chief Executive Officer (CEO) of both private and public institutions in Nigeria. They perform varieties of functions among which are making and receiving calls, text messages, music player, multimedia messaging and Internet browsing, among others. There are several brands and sizes of mobile phone handsets with different ranges of prices and functionalities as well as network providers on the Nigerian market that render the aforementioned services.

In promoting the marketing concept of treating customers as kings, there is a need for mobile phone manufacturers to continuously pay adequate attention to the needs of their customers to make them loyal (Adomi, 2006). Satisfied customers are more likely to be loyal customers and give the firms a larger share of their businesses (Otto *et al.*, 2019). Companies are realizing that losing a customer means losing more than a single sale; it means losing the stream of purchases that the customer would make over a lifetime of patronage (Kotler and Armstrong, 2010). It is on this basis that this study examines the factors affecting customer loyalty to mobile phone brands in Nigeria. Specifically, the study sought to establish customers' preference for the different brands of mobile phones; ascertain the rationale for customer loyalty and preference for mobile phones; and identify the demographic variables that influence customer loyalty to mobile phone brands.

2. Review of Related Literature

Brand loyalty is a deeply held commitment to re-buy a preferred brand of goods or services in the future despite situational influences and marketing efforts having the potential to cause switching behavior (Krivic and Loh, 2018). It exists when a customer, because of experience, is sufficiently satisfied with a particular brand that he or she buys that brand or with a retailer, he or she buys from when the need arises without considering other alternatives (Etzel, *et al.*, 2007; Kotler and Keller, 2009; Agbaje, 2011). The concept of loyalty has admittance to the business context that is massively used in the field of marketing to describe the customer's willingness to continue patronizing a firm over the long term; it is emerging as the marketplace currency for the twenty-first century (Singh and Sirdeshmukh, 2000; Karunaratna, 2014). According to Anderson and Jacobsen (2000, p.65), "customer loyalty is the result of an organization creating a benefit for a customer so that they will maintain or increase their purchases from the organization." It is apparent that the success of a firm largely depends on its capability, not only to attract consumers towards its brand but also retain them in the long run.

Various authors at different times have identified several factors that influence customers' choice and loyalty to mobile phone brands across the globe. One of the pioneering studies on mobile phone choice by Riquelme (2001) examined how much self-knowledge consumers have when choosing between different mobile phone brands. The study was built on six key attributes such as telephone features, connection fee, access cost,

mobile-to-mobile phone rates, call rates and free calls. The study revealed that consumers with prior experience with a product can predict their choices relatively well.

Karjaluoto, *et al.* (2005) examined factors affecting consumer choice of mobile phone in Finland. The study focused on factors that influence the intention to acquire new mobile phones on one hand and factors that influence mobile phone change on the other hand. The study classified the factors into seven categories namely innovative services, multimedia, design, brand and basic properties, outside influence, price and reliability. The study revealed that factor innovative services and factor multimedia were the most important factors that affect mobile phone choice. Also, technical problems were found to be the basic reason to change mobile phones among students while price, brand, interface, and properties were the most influential factors affecting the actual choice between brands.

Aidoo and Nyamedor (2008) explored the factors that determine the choice of mobile phone brand among residents of Kumasi metropolis in Ghana. The study revealed that reliable quality and user-friendliness are the two most important factors underlying the choice of brand of mobile phone. The study also found that 76 percent of the respondents owned a mobile phone and also most people did not use mobile phone because of its high cost. The analysis also revealed that Nokia is the most used mobile phone and the brand of mobile phones used by the consumer is associated with educational level attainment and occupational status of the consumer.

Singla and Bansal (2010) identified and compared key attributes that influence mobile phone purchasing between Sangrur and Ludhiana consumers in India. According to the authors, mobile phone users wanted their handsets to be loaded with multiple functions, entertainment is the most important among them. They wanted their mobile phones to be fully loaded with top-end features, but at the same time, they wanted all these at affordable costs. Similarly, the study conducted by Mokhlis and Yaakop (2012) examined seven independent dimensions namely innovative features, image, price, personal recommendation, durability and portable aspects, media influence, and post-sales service as different choice criteria in mobile phone selection among Malaysian consumers. The study found that the top three most important factors influencing consumer choice of mobile phone handsets were: innovative features, personal recommendation and price. It was recommended that the promotion of new mobile phone models should go beyond highlighting properties to highlighting what users can do with all the technical features.

In the study conducted by Saif, Razzaq, Amad, and Gul (2012) on the factors that affect Pakistani consumers in their mobile phone choice decision, four important factors such as price, size/shape, new technology features and brand name were examined. The study found that when selecting between different mobile phone handsets, consumers prefer well-known brands instead of no familiar brands. The study further shows that price does affect consumers' choice for a mobile phone but becomes a less important factor as consumers move from low monthly income to higher income earning consumers. The study also revealed that male respondents were more interested in the new technological developments in the mobile phone industry as compared to female respondents.

Dziwornu (2013) investigated the factors affecting mobile phone purchase decision in the Greater Accra Region of Ghana, using a binary logit regression model approach. Results from the study show that Nokia and Samsung phones were the two main brands of phones used by majority of the respondents interviewed. Also, the study revealed that advanced technology features such as internet browsing, durability and quality of mobile phone handsets the main factors that are likely to positively and significantly affect mobile phone purchase decisions. It was therefore recommended that manufacturers and marketers of mobile phone handsets should produce and market more durable and high-quality mobile phone handsets with modern technology features that are targeted at the educated youth.

Adekunle and Ejechi (2018) examined how service quality measured by convenience, functionality and perceived usefulness impact on users' satisfaction and repurchase

intention. Data were collected using 486 validly filled copies of questionnaire by smartphone users. The study found that convenience, functionality and perceived usefulness significantly influence users' satisfaction. The study also revealed that perceived usefulness significantly impacts on users' repurchase intention. The study concluded that users' repurchase intention is influenced by users' satisfaction and service quality.

Inegbedion and Obadiaru (2019) in their study on modeling brand loyalty using the Nigerian telecommunication industry found that 21% of the GSM users in the country will be loyal to MTN while Airtel will retain 27% of the total market. The study also reveals that Globacom and 9Mobile will retain 35% and 1% of the market share respectively.

It can be observed from the review of previous studies that quality, recommendations by family and friends, durability, innovative services, multimedia, design, brand and basic properties, outside influence, price and reliability are the major factors that influence customers' choice and loyalty to mobile phone brands across the globe. This study, therefore, examined the opinions of customers on major attributes of mobile phones such as quality, cost, functionality, durability and ease of maintenance in Nigeria.

3. Methodology

The survey research design was adopted for this study. The population of the study comprised users of mobile phones in Benin City, Edo State, Nigeria. A sample of two hundred (200) mobile phone users were selected from the different stakeholders which include students, academic staff, non-academic staff and other business individuals working in the University community, ministry workers, secondary school teachers, among others. The copies of questionnaire used as a research instrument were administered in the Second Semester of 2012/2013 academic session when all the aforementioned stakeholders were fully on Campus for different academic and business activities at the Ugbowo Campus of the University of Benin. Also, seven popular brands of mobile phones in Nigeria namely: Nokia, Blackberry, Samsung, Tecno, LG, HTC and Sony Ericson were used for this study. The study obtained data from the primary source through questionnaire administration as a research instrument. The questionnaire consists of two (2) parts namely: respondents' demographics and questions that cover customers' loyalty, preference and rationale for a choice of mobile phone. Out of the two hundred (200) questionnaires administered to respondents, one hundred and ninety-four (194) were returned and found useable. The data collected were analyzed using different statistical tools such as frequency table, simple percentages, mean, t-test and analysis of variance (ANOVA) with the aid of Statistical Packages for Social Sciences (SPSS) software.

4. Results and Discussions

4.1. Description of Company Profile

This section presents the results that emanated from the data analysis in line with the research objectives as well as the discussion of findings. The respondents were asked where and how they obtained their phones to provide background information on the sources of mobile phones used by the respondents.

Table 1. Source of obtaining mobile phones among respondents

S/N	Source	Frequency	%
1	Accredited distributors	70	36.1
2	General market	61	31.4
3	Gift from others	63	32.5
Total		194	100

Source: Authors' fieldwork

The result reveals that majority of the sampled respondents either purchased their mobile phones from accredited distributors. This category accounts for 36.1%. 61 (31.4%) of the respondents obtained their phones from the general market place 32.5% of the respondents got their phone as a gift from someone/somewhere/friends.

4.2. Customer preference for the different brands of mobile phones

In establishing the mobile phone users' preference for the different brands of mobile phones, respondents were asked to indicate their preference for some selected popular brands of phones in Nigeria. The responses to the different questions are presented in Table 2:

Table 2. Preference for mobile phones

S/N	Variable/Brand of Phones	Frequency	%
<i>Preferred mobile phone(s)</i>			
1	Nokia	97	49
2	Blackberrv	44	22
3	Samsung	24	12
4	Tecno	13	07
5	HTC	14	07
6	Sony Ericson	04	02
7	LG	04	02
Total		200*	100

Note: * indicates that a respondent ticked more than one option

Source: Authors' fieldwork

Table 2 presents popular brands of phones in the market as at the time of the study and how they are preferred by the respondents. The result shows that Nokia, Blackberry and Samsung products are the most preferred and popular brands of mobile phones with 49%, 22%, 12% respectively. The other brands such as Tecno, HTC, LG and Sony Ericsson were jointly preferred by only 17% of the entire respondents. The finding that Nokia, Blackberry and Samsung phones are the most preferred is consistent with Dziwornu (2013).

4.3. Rationale for customer loyalty and preference for different mobile phones brands

In ascertaining the rationale for customer loyalty and preference for the different brands of mobile phones sampled for this study, respondents were asked to express their opinions on some factors such as durability, functionality of the brand, quality, cost and ease of maintenance that can influence customers to be loyal to a particular brand of mobile phone. The result is shown in Table 3 below:

Table 3. Customers' opinions on factors of mobile phones brands

S/N	Brand of Phone	Durability		Quality		Functionality		Easy to Maintain		Product Cost		Ranking
		Freq	%	Freq	%	Freq	%	Freq	%	Freq	%	
1	Nokia	69	30	57	25	38	17	46	20	20	09	1st
2	Blackberry	09	18	13	26	19	38	03	06	06	12	2nd
3	Samsung	11	24	14	31	12	27	06	13	02	04	3rd
4	Tecno	07	29	05	21	07	29	05	21	00	00	4th
5	HTC	02	13	04	25	05	31	03	19	02	13	5th
6	Sony	04	36	05	45	00	00	01	09	01	09	6th
7	LG	02	33	02	33	01	17	01	17	00	00	7th
Total (Freq)		104		100		82		65		31		
Ranking		1st		2nd		3rd		4th		5th		

Source: Authors' fieldwork

Respondents were asked to use the aforementioned factors to rate the different brands of mobile phones selected for this study. The result as shown in Table 3 reveals that Nokia, Blackberry and Samsung are the most preferred mobile phones in Nigeria as they were ranked first, second and third respectively. Others such as Tecno, HTC, Sony Ericson and LG were ranked fourth, fifth, sixth and seventh respectively. In the same vein, Table 2 also reveals that durability and quality are the main factors that promote customer loyalty to the brand of the phone(s) they use as these factors were ranked first and second respectively. Functionality, ease of maintenance and product costs were ranked third, fourth and fifth respectively.

This study found that product quality and durability are the major factors that keep customers loyal to a particular brand of a mobile phone. This finding is in agreement with the study of Aidoo and Nyamedor (2008) that found that reliable quality of the mobile phone is the most important factor considered by users. Also, product functionality is found to be an important factor in this study. This finding agrees with that of Karjaluoto, *et al* (2005) that consumers purchase new phones because their existing one's capacity is not appropriate. Importantly also, this study revealed that product cost was not a major factor considered by customers to make them loyal. This finding is supported by studies conducted by Aidoo and Nyamedor (2008), Singla and Bansal (2010), and Saif, *et al*, (2012) that found that mobile phone users wanted their mobile phones to be fully loaded with top-end features, but at the same time they wanted all these at affordable costs. However, Pakola, *et al*. (2007) found that price was regarded as the most important motive affecting the decision to purchase the current mobile phone model for consumers in Finland.

Table 4. Number of phones and manufacturers' information

S/N	Variable	Frequency	Percentage
1	Respondents with more than one phone	107	55.15
2	Respondents with only one phone	87	44.85
Total		194	100
1	Phones from the same manufacturers	32	29.91
2	Phones from different manufacturers	75	70.09
Total		107	100

Source: Authors' fieldwork

Table 4 above reveals that 107 (55.15%) of the sampled respondents use more than one phone. 87 out of the 194 respondents used only one phone. This latter category accounts for only 44.85% of the total respondents used for this study. In providing more information on how loyal a customer is to the product of a particular company, the respondents that indicated that they have more than one phone were asked whether the phones were produced by the same manufacturer or company. The result shows that only 32 out of the 107 respondents purchased their phones from the same manufacturer. This accounts for only 29.91% of the entire respondents. 70.09% of the respondents did not patronize the same manufacturer in getting the other phones.

4.4. Influence of respondents demographics on their loyalty to a brand of phone

This section presents the analysis of consumers' demographic influences on mobile phone brand loyalty using simple percentages, T-Test and analysis of variance (ANOVA). Also, post hoc analysis was conducted using Student-Newman-Keuls (S-N-K) Procedure.

Table 5. Gender influences on customer loyalty

S/N	Sex	Yes	%	No	%	Total	%	t-value	p-value	Decision
1	Male	23	71.9	26	34.7	49	45.8	-2.979	0.000	Significant
2	Female	9	28.1	49	65.3	58	54.2			
Total		32	100	75	100	100	100			

Source: Authors' fieldwork

The t-Statistic of -2.979 with the p-value of 0.004 reveals that there is a significant difference in customer loyalty between male and female mobile phone users. Table 5 further shows that majority of the respondents that have more than one phone are female as this group accounts for 54.2% while their male counterpart accounts for 45.8%. Notwithstanding, more females use multiple phones, loyalty index of 0.762 (23 out of 32) indicates that the males are more loyal with index of 0.28. Of the 49-total number of males using multiple phones, 46.9% were found to be loyal while only a meager 15.5% (9) of the 58 female respondents using multiple phones were found to be loyal in the selection of cell phones. This finding aligns with the studies of Karjaluoto, *et al* (2005), Ogunyemi (2010), and Balakrishnan and Raj (2012) that found that differences exist between males and females concerning what attracts them to buy a particular mobile phone.

Table 6. Age influences on customer loyalty

S/	Age	Yes	%	No	%	Total	%	F-Value	P-value	Decision
1	18 – 30	29	90.6	40	53.3	69	64.5	7.998	0.001	Significant
2	31 – 40	1	3.1	25	33.3	26	24.3			
3	41 and Above	2	6.3	10	13.3	12	11.2			
Total		32	100	75	100	100	100			

Source: Authors' fieldwork

Also, the results reveal that most of the respondents fall between the age brackets of 18 – 30 years old. This group account for 64.5% of the entire respondents. This is followed with respondents between the age of 31 – 40 years old while respondents that are 41 years old and above have the least percentage. The percentages of these categories are 24.3% and 11.2% respectively. The analysis of variance (ANOVA) results with F-Statistic of 7.998 and p-value of 0.001 shows that there is a significant difference between respondents' age and their loyalty to the brands of mobile phones. Of the 69-total number of respondents age between 18 – 30 years using multiple phones 42% (29) were found to be loyal. For age between 31 – 40 years, only 3.8% (1) of the multiple phone holders were discovered to be loyal. Lastly, of the 12 respondents, age above 40 years old users of multiple phones, only 16.7% (2) were found to be loyal. Further analysis revealed that 90.6% (29) of the loyal 32 (30%) were between the age of 18 – 30 years while only a very small proportion 3.15% (1) of loyal users are between ages of 31 – 40years. Lastly, only (2) 6.25% of loyal users are ages 41 and above.

Table 7. Loyalty to mobile phone selection and respondents' age: Multiple range tests based on Student-Newman-Keuls (S-N-K) procedure

	More Loyal Users	Less Loyal Users
INDEX	Group 1	Group 2
Mobile Phone	Users between 18 – 30 years Users age above 40	Users age above 40 yrs Users between 31 to 40 yrs

Source: Authors' fieldwork

It could be seen from the post hoc (S-N-K) analysis that the respondents between 18 – 30 are as loyal as those above 40 years of age, but are not as loyal as those between 31 – 40 years of age.

Table 8. Educational influences on customer loyalty

S/N	Education	Yes	%	No	%	Total	%	F-value	P-value	Decision
1	WASSCE/NECO	21	65.6	17	22.7	38	35.5	10.652	0.000	Significant
2	HND/B.Sc	9	28.1	44	58.7	53	49.5			
3	M.Sc/PhD	2	6.3	14	18.6	16	15			
Total		32	100	75	100	107	100			

Source: Authors' fieldwork

Lastly, respondents with HND/B.Sc dominated the sample as this group accounts for 49.5%. This is followed by respondents with WASSCE/NECO and M.Sc/Ph.D with 35.5% and 15% respectively. In the same vein, the analysis of variance (ANOVA) results with F-Statistic of 10.652 and p-value of 0.000 shows that respondents' loyalty to the brands of mobile phones is dependent on their educational qualification. Still, on the educational factor, 55.3% (21) of the 38 WASSCE/NECO holders who use multiple phones were found to be loyal, while 17% (9) of the 53 HND/B.Sc holders were discovered to be loyal, only 12.5% (2) of the 16 M.Sc./PhD holders were loyal in the selection of mobile cell phones.

The result of the Student-Newman-Keuls (S-N-K) post hoc test ranked holders of WASSCE/NECO as the more loyal group while HND/B.Sc holders and MSc/PhD were ranked in group two as the less loyal users of cell phones.

Table 9. Loyalty to mobile phone selection and respondents' education: Multiple range tests based on Student-Newman-Keuls (S-N-K) procedure

	More Loyal Users	Less Loyal Users
INDEX	Group 1	Group 2
Mobile Phone Selection	WASSCE/NECO holders	HND/B.Sc holders MSc/PhD holders

Source: Authors' fieldwork

The result of the S-N-K post hoc ranked holders of WASSCE/NECO in group 1 as the more loyal while HND/B Sc holders and M Sc/PhD were ranked in group two as the less loyal users of cell phones.

5. Conclusion

Mobile phones are gaining rapid acceptance among different individuals in the society such as the office cleaner, drivers, auto mechanic, students, market women to the businessman and the Chief Executive Officer (CEO) of both private and public institutions in Nigeria. The rapid acceptance and usage of mobile phones in Nigeria is positioning the manufacturing firms and other stakeholders in the business in a strategic way to maximize profit. However, for firms manufacturing mobile phones as well as their dealers to keep on maximizing profit, regular and continuous patronage must be guaranteed by customers. This will enhance their survival and growth. The orientation of some business organizations is that because they are opened for transaction and they have what the customers may need, is enough for

customers to come in and continuously trade or do business with them. But unknown to so many organizations that there are so many factors, influences and other considerations that make customers patronize them. It is on this premise that this study empirically examined customer loyalty to mobile phones brand in Nigeria. The study identified some demographic variables such as gender, age and educational qualifications and found that the variables significantly influence customer loyalty. Also, an empirical analysis of factors influencing mobile phones purchases such as quality, functionality, cost, durability and ease of maintenance revealed that Nokia, Blackberry and Samsung are the most preferred mobile phones in Nigeria.

6. Recommendations

Based on the research findings, the study, therefore, recommends as follows. First, manufacturers of mobile phones should ensure that their products are of good quality, durable, affordable, easy to repair and capable of performing multiple functions. Second, manufacturers of mobile phones should produce phones that have different features and functions that can serve multiple purposes so that those customers who like using more than one phone with different functional varieties can be loyal to a particular brand. Third, the use of distributors who have good advertising and publicity capacities and also have large networks of sales points should be given priority so that their brand can be easily accessed as this would help maintain a good image and enhance customer loyalty. Fourth, cell phone manufacturers and marketers should target or focus more on the male youth with a low educational background as they were found to be more loyal in the use of a particular brand of phone. Finally, the managerial implication of this study is that it will help manufacturers and marketers of mobile phone products to know the product attributes that can make their present and potential customers to be loyal and therefore redesign their products to meet the needs and aspirations of their target markets.

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