Global Scientific JOURNALS

GSJ: Volume 9, Issue 3, March 2021, Online: ISSN 2320-9186
www.globalscientificjournal.com

Evaluating adoption of electronic banking (e-banking), during the Covid 19 era: A discourse of barriers facing banking clients, in the Zimbabwean context.

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Key words: Electronic banking; internet banking; telephone banking, e-banking adoption

Abstract

The outbreak of coronavirus has forced the Zimbabwean government to impose aggressive lock downs strict travel restrictions since march 2020, leaving only essential services partly functioning. All individuals were forced to do their work and transact while at home. In addition, Zimbabwean banks have up-to-date e-banking facilities, but yet ques are still existence in the banking halls without regard to the call to stay at home. It is against this background that this study aims to discuss the barriers facing banking customers in adopting electronic banking during the Covid 19 era. The study applied mixed methodology approach where questionnaires were used to collect statistical data while interviews were administered to collect qualitative data. Stratified random sampling was used to select the sample for questionnaires while purposive sampling was used for selecting respondents for interviews. The study found out that among others age, cost, access, risk and other economic behaviours are barriers to adoption of e-banking facilities by banking clients. Conclusions made were that e-banking is not cost effective in the hands of banking customers, economic challenges prevent banking customers from adopting e-banking and Hwange banking customers are not conforming to the lock down rules imposed by the government

Introduction

Embracing internet and telephone banking (e-banking) by individual banking customers is inevitable during the novel corona virus (covid 19) era in Zimbabwe and beyond. Most banks in Zimbabwe have put in place varying self-service technology (SST) applications for use by its customers which includes among others automated teller machines (ATM), internet banking, real time gross settlements (RTGS), and mobile banking (Mutengezwana and Mauchi 2013) and today most of the banking transactions can be done anywhere and at any time. The services, for instance, in Hwange, banks like Agribank, Stanbic, and CABS are linked to websites and mobile phone networks which allow customers to check account balances, receive payments and transfer money over the internet.

Since establishment, most Zimbabwean banks have been offering their services over the counter, referred to as traditional banking where bank customers had to physically visit the bank branch for any transaction they needed to process (Makanyeza & Chikazhe, 2017). This type of service delivery was characterised by very long queues in the banking halls, time consuming and associated with high rate of human errors. Waiting time in queues resulted in customer inconveniences and proved costly for both the customer and the bank.

The increasing need and use of technology have led to changes in almost all the aspects of life from business, social to communication on a day-to-day basis (Dube, Chitura, & Runyowa, 2009). The internet has drastically changed the way in which most businesses operate in the world, be it product development or service delivery. This implies that technology has completely changed the way of doing business and banking has not been an exception. In the Zimbabwean business community, internet banking has facilitated quite a number of business transactions, for example in retailing, tourism, agriculture, mining industries just to mention a few. The introduction of SST has occurred across a range of industries such as hotels (Automated check in and check out facilities), Petrol stations (Pay at the pump facilities), Supermarkets (Self scan and pay systems), Airlines (Self-service boarding pass dispensers) and banks (Automated teller machines, internet banking etc.). Most businesses are actually moving along with time and technology and are adopting these SST applications in their day to day running of the business. It may be evident that SST help to improve service excellence, flexibility, offer reliable services and most importantly to cut on costs among other benefits to both banking institutions and clients.

The principal usage of e-banking in Zimbabwe has been for checking account balances, payment of bills and funds transfers (Mavaza, 2019). The adoption process (Dube, Chitura, & Runyowa, 2009) of e-banking by banks was troubled by many obstacles such as cost of implementation and security fears amongst others and to date some banks are failing to maintain an effective e-banking system. Although e-banking usage in Zimbabwe has improved since 2009, the adoption is still lower as compared to developed countries.

Moreover, the adoption of e-banking has been catalysed by the novel coronavirus outbreak announced by the World Health Organisation in March 2020. Zimbabwe as one of the affected nations, has been pushed to a number of nation lock downs (Matsungo and Chopera 2020) since 20 March 2020 in order to contain the spread of the pandemic. With the exception of essential services, which includes banks, all other economic sectors were closed, coupled with restricted movements, social distancing and stay at home mantra. The transacting banking clients were forced to use e-banking facilities while at the comfort of their homes.

Despite the extent of e-banking technology adoption by banks in Zimbabwe, and the stay at home regulations induced by the Coronavirus outbreak, banking individuals are still frequently visiting the banking halls for banking services in Hwange and other parts of the country. This study therefore seeks to unearth the reasons why customers are failing to embrace self-service technologies available in the banking sector.

Statement of the problem

In the era of the novel corona virus outbreak, characterised by endless lockdowns and where people are forced to stay at home, queues of people seeking banking services are still witnessed at banking halls in Hwange and other parts of the country. This is happening despite the fact that all Zimbabwean banks have, in the past decade adopted economically driven e-banking facilities, in the form of both internet and mobile banking which can serve interests of their clients during this outbreak. Banking halls are now high risk areas of spreading the deadly virus and it is still unclear why the banking community is not embracing e-banking facilities, to carry out their transactions while in the comfort of their homes, instead opt to congest at banking halls increasing the chances of contracting the deadly virus.

Research Objective

To investigate barriers, preventing banking individuals to adopt e-banking in Zimbabwe during Corona Virus outbreak.

Research question

What are the barriers preventing adoption of e-banking by banking individuals during the corona virus outbreak?

Literature review: E-banking in brief

According to Basel Committee on banking supervision, (2004) E-banking is defined as the provision of retail and small value banking products and services through electronic channels. Such products and services can include deposit taking, lending, account management, the provision of financial advice, electronic bill payment, and the provision of other electronic payment products and services such as electronic money. Guided by this definition, the researcher strongly believes that E-banking services are aimed at achieving ease of transacting. The term "electronic banking" or "e-banking" covers both computer and telephone banking. It may be viewed as the use of information and communication technology by banks to provide services and manage customer relationship more quickly and most satisfactorily (Allen and Hamilton,2002). The attribute of e-banking is that it provides electronic connection between the bank and the customer in order to prepare, manage and control financial transactions.

E-banking is broad in scope, and the researcher understands that it as a banking facility meant to achieve customer satisfaction. It includes systems that enable financial institutions, customers, individuals and businesses, to access accounts, transact business, or obtain information on financial products and services through public or private networks, including the internet as alluded to by (Lustsik, 2004). Customers access e-banking services using intelligent electronic devices, such as personal computers (PC), personal digital assistants (PDA), automated teller machines (ATM). Private networks, "closed" restrict access to participants (financial institutions, customers, merchants, and third-party service providers) bound by agreement on the terms of membership (Lustsik, 2004). Public networks, "open" have no such membership requirements. Hence given the above, the researcher is of the view that, E-banking has unique characteristics that may increase an institution's overall risk profile which were minimal with traditional financial services, particularly, strategic, operational,

legal, and reputation risks. The researcher posits that, electronic banking is a form of banking in which funds are transferred through an exchange of electronic signals rather than through an exchange of cash, checks, or other types of paper documents. Fig 1 below demonstrate the concept of E-banking from the researcher's understanding.

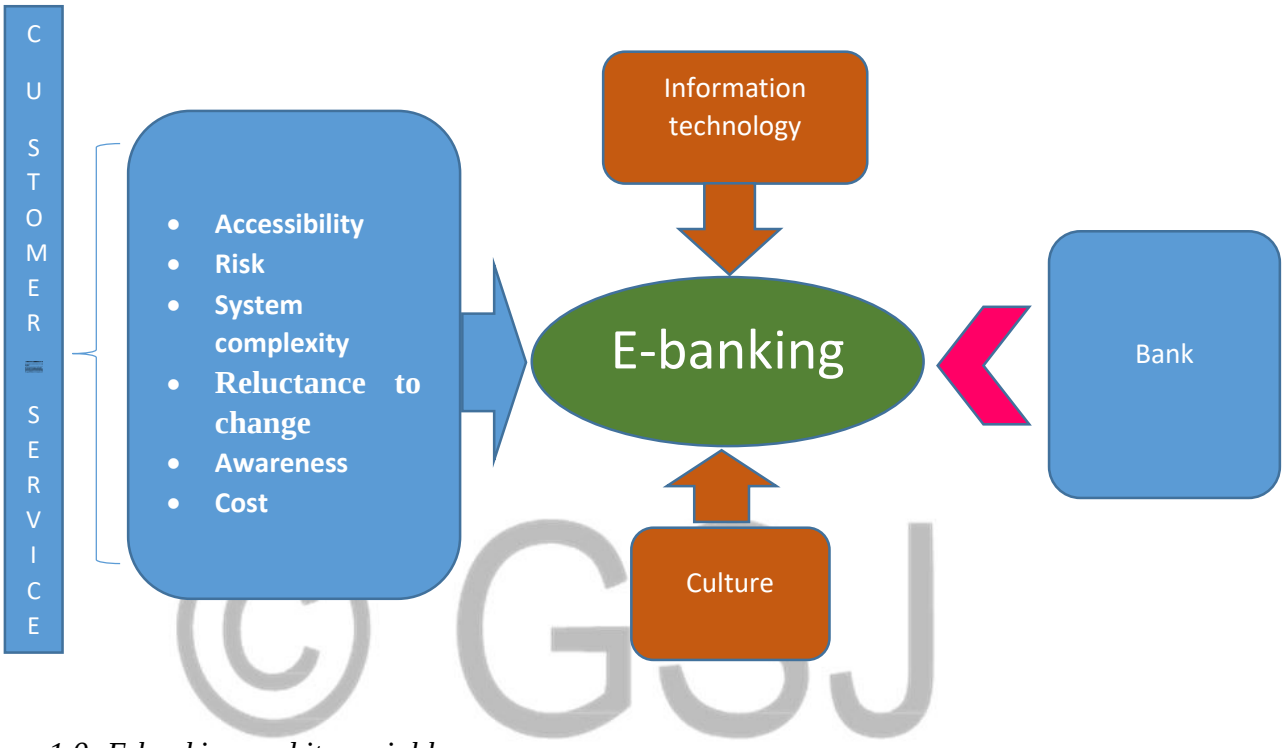


Figure 1.0: E-banking and its variables

Barriers to adoption of e-banking

Adoption can be defined as "the acceptance and continued use of a product, service or idea" (Hussen and Saad, 2016). The critical question is whether since the outbreak of the novel corona virus, banking customers will accept e-banking, hence the commission of this study. Many researchers have conducted researches to determine the various factors that are influencing the customers to adopt new technology/ internet banking. These factors include awareness, knowledge of new development, that is, computer/internet knowledge, accessibility, security concerns, risk, ease of use, cost concern, traditional prospective, psychological factors (Mutengezwana and Mauchi 2013). Because of these factors the researcher believes that development and adoptability of internet banking is very slow in many

of the semi-urban and urban areas. New technology adoption by the majority of the customers depends mainly on following factors:

Awareness: Acceptance a new product has always been difficult for many consumers of products and services. The consumers need to be convinced for them to confirm use of a new product or service and (Mazana, Rupere and Kabanda 2012; Mutengezwana and Mauchi 2013) emphasized that adoption consumers must become aware of new brand. Lack of awareness is the most important factor that provides a barrier to adoption of Internet banking. It is for this reason that in areas where awareness campaigns are not being implemented, there are low levels of utilization of internet banking.

System Complexity: Tan Sin et al, (2010) identifies "ease of use" as one of the three important characteristics from customer's perspective for adoption of innovative service. The researcher understands ease of use of a system as having clear well defined, few steps when carrying out an online transaction. Himmoud, et al (2018) studies in Lebanon found that system complexity is one of the barriers for customer acceptance internet banking. He argued that if the system is simple to operate, in relation to customers' general capabilities, it is easily accepted. A study conducted by a company called Cyber Dialogue has revealed that as many as 3.1 million USA adults have discontinued their use of online banking because they found the service was too complex and were dissatisfied with the level of customer service. It is therefore crucial for the Internet to be easy to use (Makosana, 2014) to increase the adoption rate of Internet banking since the understanding of consumers is an important element for the diffusion of innovation technology. For successful implementation of Internet banking, banks must ensure that the services are simple, easy and of sufficiently high quality to ensure customer satisfaction in order to maintain online customers.

Security: The systems that are developed to improve the banking systems are the same systems again used in developing electronic fraud. Electronic crime which includes spamming, credit card fraud, ATM fraud, (Dzomira, 2014; Bamrara, Singh and Bahtt 2013), is one of the major barriers to adoption of internet banking. Security concerns are keeping both consumers and bankers away from Internet banking implying that some individuals do not consider electronic banking as they believe it to be a high risk platform. Many banking customers have a perception that their information is not safe like the pin number, transaction history and their

balances. Unless e-banking system security is improved, and customers are convinced, more households will not be willing to conduct their transactions over the Internet. Gerrard et al (2006) conducted study in Australia found that security concerns were discovered as the main cause for the slow growth of Internet banking in the country hence the researcher strongly believes that where security is guaranteed consumers will be ready to take up business online.

Cost: Price/costs is one of the single most important factors that influences the consumer adoption of innovation as backed by the study concluded by (Mutengezwana and Mauchi 2013) which found that cost is a characteristic of Internet banking. If consumers are to use new technologies, they must be reasonably priced relative to alternatives. Otherwise, the acceptance of the new technology may not be viable from the standpoint of the consumer. Hence the researcher holds it that millions of users are now turning their backs on the Internet due to its limitations and high access charges.

Accessibility: The studies of Himmoud, et al (2018) and Mavaza, (2019) found that lack of access to computers is one of the reasons for slow adoption of Internet banking. Daniel (2010) study in UK reveals that lack of customer access to suitable PCs as the main reason for low usage of electronic banking. In the same view the researcher believed that accessibility is one of the main reasons for non-adoption of Internet banking due to unavailability of one or more of Information technology infrastructure, technology gadgets and accessories and relevant education for most Zimbabwean banking population.

Remarkable research has been done on barriers to adoption of internet banking (Mutengezwana and Mauchi 2013; Nasim Z, 2009; Manzano et al,2009; Mavaza, 2019), and the studies resulted on the barriers summarised above. The socio-economic twists and turns, has resulted in informal economic re-dollarization coupled with the outbreak of the novel corona virus, hence an urgent need for a fresh study to look into the cultural, economic effects and technological infrastructure influences on adoption of e-banking in some parts of the country.

Research Methodology

In this mixed approach research, a descriptive design was used to study the banking customers in Hwange, on the barriers to adoption of e-banking for all the three banks available. A proportionate random sample from the three banks was selected from a population which was first stratified in terms of age group, to ensure all ages are proportionately represented with

CABS, AGRIBANK and STANBIC banks contributing 44,8%, 37,3% and 17,9% of the 6700 customers respectively. A quantitative questionnaire was used to collect quantitative data and it was distributed both personally and through email to 200 selected sample of respondents from which 180 were returned. In collecting qualitative data, interviews were administered to 25 purposively selected respondents based on the proportion to total customers for three banks. Quantitative data was presented using charts and tables, and analysed using simple statistical methods. With the exception of demographic data which was included in quantitative presentation, all other qualitative data was analysed into themes which were corresponding to quantitative data questions, and presented as narratives.

Data presentation and discussion

Demographic and Socio-Economic Characteristics of Respondents

The researcher analysed the data from demographic and socio-economic respondents such as level of age and academic qualifications so as to find out whether their characteristics have a relationship with usage of internet and telephone banking. The study initially held that, the adoption of internet and telephone banking is basically affected by demographic and social-economic factors such as age and level of education as supported by Navaratnaseelan and Elangkumaran (2014).

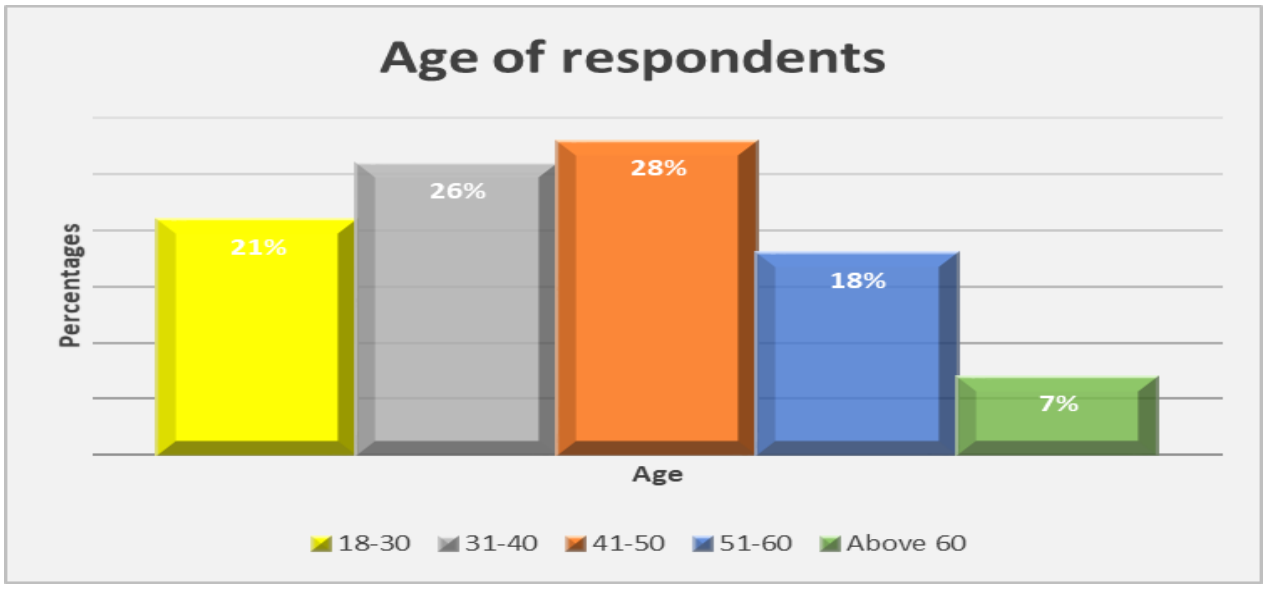


Figure 2.0 Age of respondents

Figure 6 above shows that most of the respondents are between the age of 41-50 years with a percentage of 28 % followed by 31-40 years age range which has 26%.The middle class seemed

to dominate since they are likely to be working class or precisely put the group is economically active and so many regularly visits banks to access their cash since their salaries will be deposited into the banks, unlike the Pension group which is above 60 years with the least respondents of 7% they now have little to access to the banks.

Education level of respondents

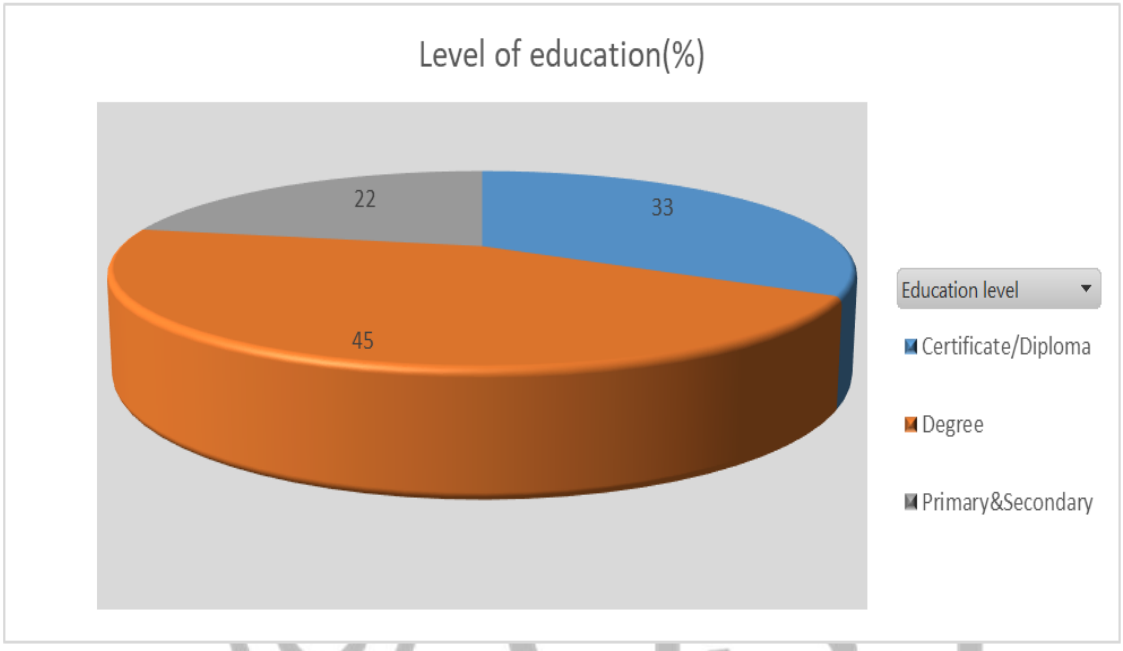


Figure 3.0: Level of Education

In order to establish the level of knowledge of personnel involved in the usage of internet banking, the respondents were asked to disclose their highest educational qualifications. The results obtained reveals that 45% of the respondents at least attained a degree qualification, followed by 33% with Diploma level and are formally employed. The 22% on the other category consist of respondents with no educational qualifications, some of which only attained the secondary level. From the observation, none of the respondents have the primary education as the highest education level, and this shows that the respondents are educated enough to understand the research questions in the questionnaire so as to appropriately respond.

Barriers to adoption of e-banking

The researcher sought to find out the nature of barriers that prevent adoption of e-banking in the Hwange community within the framework of Covid 19 regulations. The results are shown in figure 2.0 below.

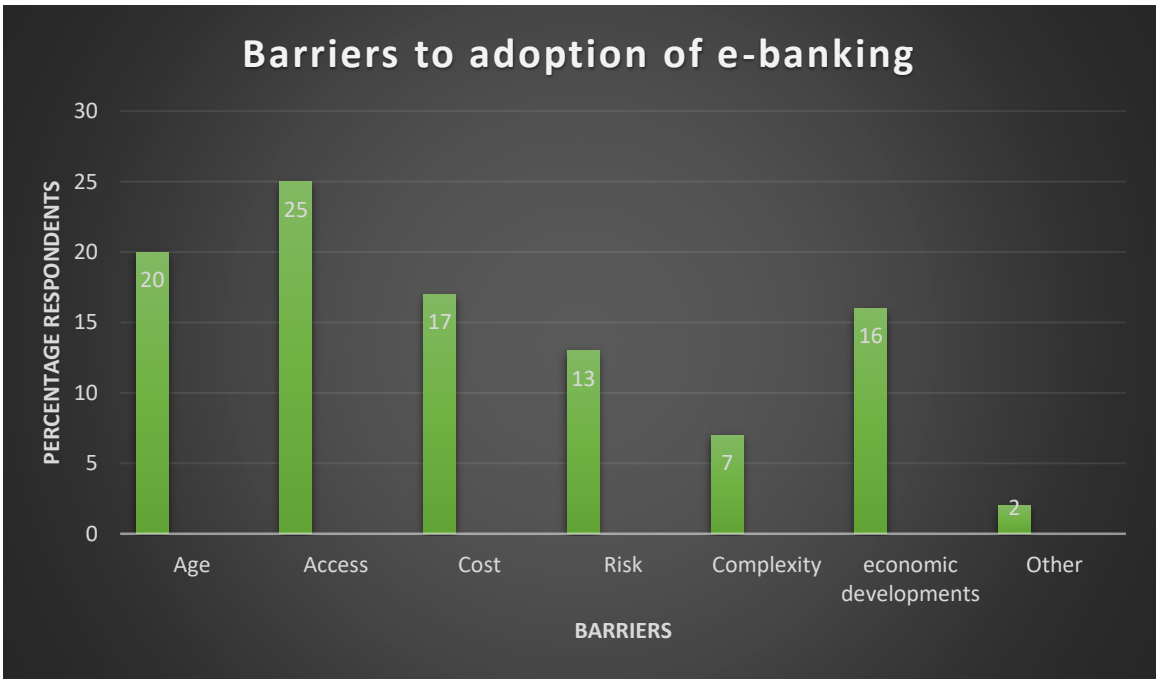


Figure 4.0: Barriers to adoption of electronic banking

The majority of respondents (25%) indicated that they do not have enough access to e-banking facilities. The major concern was on unavailability of gadgets, and internet connection due to lack of funding as established through interviews. The results are consistent with the findings of Himmoud, et al (2018) and Mavaza, (2019). In addition, the age factor also appears to be a barrier as indicated by 20% of the respondents but however the extent of the effect to the Hwange community is discussed in the following paragraphs. The results are in tandem with the findings of Mutengezwana and Mauchi (2013) who held that ages between 26 to 45 are more likely to adopt e-banking than ages which are more than that.

The transaction costs as indicated by 17% of the respondents is also one of the major barriers. Both the government and banking institutions are overburdening e-banking users through the 2% transaction tax and prohibitive ordinary transaction charges respectively. E-banking transactions become too expensive when compared to cash transactions, which forces the banking clients to seek cash at the banking halls. This habit is further aggravated by the disconnection of most ATMs.

Economic developments were captured from 16% of the respondents as one of the barriers. This was also captured on interviews and the respondents indicated that they visit the banks in search of cash to buy their needs especially when some forms of electronic payments are rejected. Some indicated that cash give them advantage over the three tier pricing currently prevailing in the commodity market, that is, varying price for Zimbabwe dollar, United States dollar and electronic money (swipe/ecocash) for the same commodity.

Of the other causes, represented by 2% of the respondents, the researcher was interested in societal culture, the barrier which was also captured during interviews. The Hwange community perceives culturally that adopting e-banking exposes your bank account to hacking especially with internet banking. The respondents however acknowledge that they are receiving some information on the safe e-banking adoption tips from their bankers.

Relationship between age and resistance to e-banking

The researcher sought to find out if there is a relationship between age and resistance of e-banking. A statistical, Chi –Square test was used to test the relationship of variables. The Chi-Square test of association was conducted at 5% confidence interval to determine whether there was a relationship between age and resistance of electronic banking using the following hypothesis.

Ho-There is no relationship between age and resistance of electronic banking?

H1- There is a relationship between age and resistance of electronic banking?

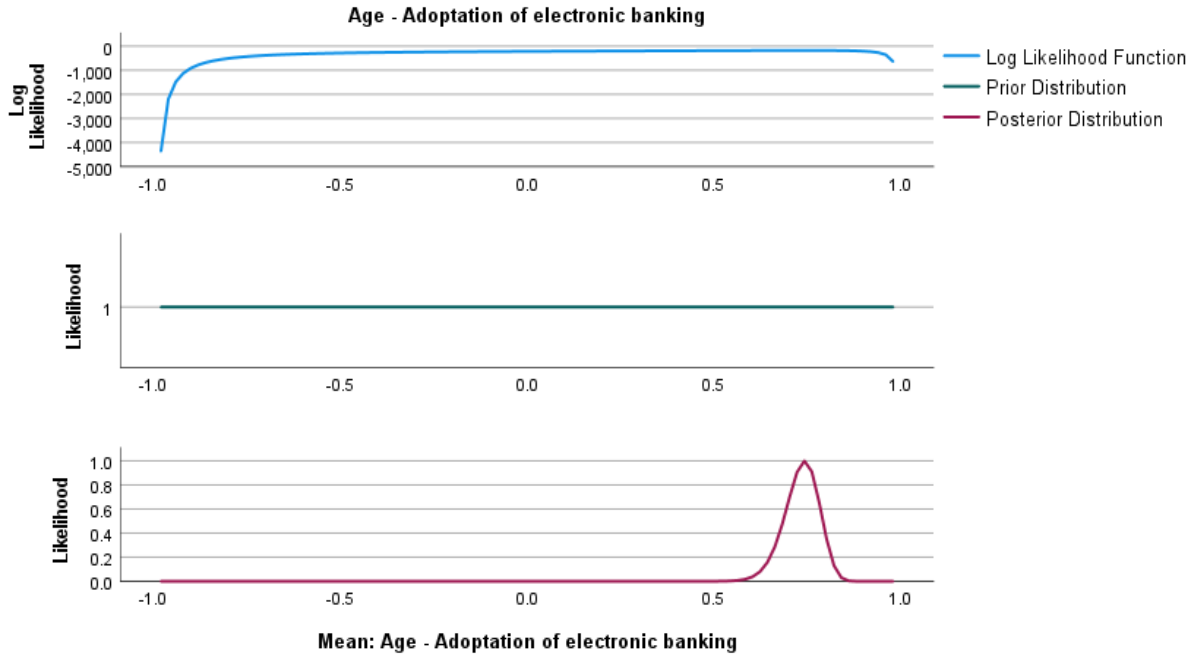
If $P>0.05$ Accept Ho; Reject H1

If $P<0.05$ Accept H1; Reject Ho

Table 1.0: Correlations between age and resistance of electronic banking

		Age	Resistance of electronic banking
Age	Pearson Correlation	1	.745**
	Sig. (2-tailed)		.000
	Sum of Squares and Cross-products	143.040	36.920
	Covariance	1.445	.373
	N	200	200
Resistance of electronic banking	Pearson Correlation	.745**	1
	Sig. (2-tailed)	.000	
	Sum of Squares and Cross-products	36.920	17.160
	Covariance	.373	.173
	N	200	200

**. Correlation is significant at the 0.01 level (2-tailed).



Therefore, since 0.05> correlation significant of 0.01, We do accept H1 and Reject H0. This means there is a strong correlation between Age of users and resistance of electronic banking. The researcher also looked at the Covariance of the two variables and observed that both Age and resistance of electronic banking had a positive Covariance of 1.445 and 0.373 respectively, providing an insight into how these two variables are related to one another. This suggest that age goes with resistance to e-banking, and the younger ages have lower resistance as alluded to, by Mutengezanwa and Mauchi (2013).

Extent to which age prohibits adoption of e-banking

The researcher sought to find out the extent to which age prohibits the adoption of e-banking. The demographic information was analysed, together with the extent of computer or internet literacy of respondents and the results are shown in table 1.0 below. All figures are expressed as a percentage of the total population.

	18-30	31-40	41-50	51-60	Above 60	**Total**
Degree holders	5	13	18	8	1	**45**
Diploma/Certificate	6	4	10	11	2	**33**
Secondary	6	7	5	4	-	**22**
Computer/internet literacy	**17**	**24**	**28**	**12**	**1**	**82**

Though there is a positive correlation of age and resistance to internet banking, the results show that the age barrier is not affecting the Hwange banking community to a greater extent as indicated by an 82% computer and internet literacy. The results are consistent with the educational demographics of respondents, with the more knowledgeable, degree and diploma holders constituting 78% of respondents. With the age and resistance to e-banking relationship in mind, the research results indicate that respondents above 50 years of age have significant resistance to e-banking as supported by age demographics whereas respondents aged 50 years and below are more adaptable.

Conclusions

In light of the findings, the researcher concludes that e-banking is not cost effective in the hands of customers. Transaction costs are far more than what the customers expect. Banks are also

unable to formulate effective marketing strategies tailor made for their computer literate Hwange community banking clients to convince them on security and ease of use of their e-banking facilities.

The researcher further concludes that the current economic challenges are preventing banking customers from adopting e-banking as customers' rush to banks in search of hard currency to transact, which to many is too little to afford them e-banking gadgets and required connectivity.

Lastly the researcher concludes that the Hwange banking customers are not conforming to the lock down rules imposed by the government to stay at home during the novel corona virus outbreak, hence risk the spread of infections in search of banking services at banking halls.

Recommendations

Bank officials must embrace Covid 19 in their marketing strategies and encourage its clients to stay at home. Their marketing strategy should be designed in such a way that they target their computer literate banking individuals and convince them facility security and ease of use.

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