ATMs Solutions and Behavioral Involvement

(With special reference to the commercial banks' ATM facilities at Anuradhapura City Area)

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Abstract

The explorative study, was conducted by researcher to identify the behavior involvement of ATMs in Anurahdapura city area, where geo-demographic factors, Awareness (money transfer, payment, deposit, and withdrawing), Charging system, Location, Credibility were identified as independent variable with behavior involvement was considered as dependent variable. As population of the study researcher selected executive or manager grade persons located Anuradhapura city area being with ATM facilities. Stratified sampling was contributed to identify the sample size, where 193 customers were responded out of 200 customers. Three hypotheses were facilitated to conduct the research, where customer awareness was with very poor condition for inner solutions of ATMs except money withdrawing. And behavior involvement was changed by the ATMs attributes such as Transfer Facility, Depositing Facility, Withdrawing facility, Payment Facility, Accessible Location, and charging system for ATM. And being on hypothesis number three, almost demographic variables such as, marital status, age category, profession, monthly income, religious are the powerful factors having capacity to change customer involvement. Finally researcher is purposing strategies, to enhance behavior involvement, considering existing and potential ATMs usage pattern on customers.

Key Words: Behavior Involvement, ATMs Attributes, Geo-demographic Factors.

Introduction

In the dynamic business world, to being with competition, organization should consider about their solutions on flexible customer life, where in the banking industry, commercial banks have spread island-wide and offer much more customer solutions to attract and retain more customer than the competition. Auto mated Teller Machines (ATMs) is one of solution derived from bankers' competition and it has spread to each and every places to upgrade the customer satisfaction.

Anuradhapura city area is moderately developed metropolitan area, where more than twelve commercial banks such as Bank of Ceylon, Peoples Bank, National Savings Bank, National Development Bank, Union Bank, Commercial Bank, Sampath Bank, Nation Trust Bank, Pan Asia Bank, DFCC Bank, CDB, Seylan Bank, Hatton National Bank, are located with many customer oriented services with sound ATM facility. And being beyond the withdrawing money, ATMs allow to customers to check due balance, ask balance statements, money transfer within accounts, depositing money, bill payments, money exchange, and to enjoy other financial services too. Through this process every bankers are expecting a higher customer involvement with bank services operating 24*7 concepts.

Therefore this explorative study, is conducted to identify the nature of customer involvement with ATMs based solutions; where researcher expected to achieved following objectives' such as,

- To identify the existing services of ATMs and geo-demographic characteristics of ATMs users
- To investigate the consumer awareness level related on attributes of ATMs
- To explore the determinants, which are affecting to vary usage pattern of ATM users
- To purpose strategies for service providers to arouse holistic involvement of users.

And to achieved this objective researcher guided his research facilitating following hypothesis
H1   : There is high level of consumer awareness about the services of ATMs

H2   : ATMs services and its attributes are highly significant to increase Behavior involvements

H3   : Behavior involvement with ATMs is varying by the Consumer's geo-demographic nature.

Methodology

To conduct the research, as the population of the study, researcher considered all customers who are linked with commercial banks in Anuradhapura city area with ATM facilities from January to April 2014.

Among them, 193 customers randomly selected as the sample, where sample was enriched including Entrepreneurs, University lectures, Managers form non-financial institutes, Doctors, Government offices, Security officers, School teachers, who are already being with the ATMs facility. Sampling method was justified based on Nunnally contribution. As Farhana and Islam 2011, mentioned about Prof. Nunnally as he suggested in his book Psychometric properties the ideal sample size for any exploratory research is 40-60 members for sample.

At the research process, researcher facilitated Secondary and Primary data sources; therefore a questionnaire was facilitated to collect data on customer attitudes on ATMs with their demographic data; where customer responses were measured in a 5 point Likert Scale such as "strongly agreed (5) to strongly disagree (1)". Finally collected data is to be analyzed using MS Excel and SPSS tools including simple statistical methods.

Literature

Consumer's behavior involvement with ATMs was somewhat popular to with many researchers where Hood 1979, Murphy 1983 discussed about the association between consumers' usage patterns of ATMs and their demographic profiles.

Robert, have identified about five factors corresponding to convenience, ease of use, Compatibility (comfort level), reliability and accuracy with usage involvement of ATM machines. And Gender, Occupation, and Marital status, were the demographic variables identified with varying usage pattern of ATM.

Ostlund 1974, and Taylor 1977, has mentioned about an innovation, as it is playing a major role in the banking industry is as perceived by potential users to deal with ATMs facilities.

Results & Discussion

H1: There is high level of consumer awareness about the services of ATMs

Using the hypothesis number one, researcher expected to measure the customer awareness level related to ATM facilities, and its usage ability. Percentage and mean values were facilitated to test the hypothesis. High consumer awareness level exists when mean values go beyond from 3.50. Awareness is moderate when mean values exist in between 2.50-3.49. Weak awareness is existed, when mean values are behind to 2.49.

Table 1: Behavior Intention to Use ATMs

Behavior to use ATM		Frequency	Percentage Value	Mean
Valid	Heavy usage	7	3.6	2.32
	Moderate usage	105	54.4	
	Rarely usage	81	42.0	
	Total	193	100.0	

Source: Research Data

These results showed that, around 54% customers use their ATMs in moderate situations, and around 42% customers are rarely using the ATMs being opposition to behavior expectation of ATMs providers.

In the sample, all of the customers (100%) had ATM card owned to Sampath Bank, while having a Sampath ATM, 87% ATM customers owned to Bank of Ceylon. Out of the all customers, 56% customers gone to Peoples Bank and Commercial Bank, and 24% for Hatton National Bank.

This information revealed that, Sampath Bank is 100% popular among the customers as they used at least Sampath ATM. Though these all ATM cards are offering many financial services such as withdrawing, depositing, payment, transferring, and even exchange facilities

to their customers; a very few customers have aware to use and have been practiced.

And related to the awareness to use ATMs, almost 50% customers responses as

"Agree and moderately agree" conditions than disagree or strongly agree. But related to one by one service on ATMs, customer awareness was identified as follows.

Table 2: Consumer Awareness about ATMs

		Frequency	Percentage Value	Mean
Valid	Moderately Agree	93	48.2	
	Agree	98	50.8	3.53
	Strongly Agree	2	1.0	
	Total	193	100.0	

Source: Research Data

Money transfer is a modern service offered by today bankers such as

Sampath, Commercial, and HNB. But on the results, almost (100%) customers did not know to use ATMs on transferring activities.

Table 3: Consumer Awareness to Use Money Transferring.

		Frequency	Percentage Value	Mean
Valid	Strongly Disagree	115	59.6	
	Disagree	73	37.8	
	Moderately Agree	1	.5	1.45
	Agree	4	2.1	
	Total	193	100.0	

Source: Research Data

It reveals that (table 3), all ATM customers identified that they have no awareness to use ATMs for money transferring services. And its mean values also reported as 1.39

being aligning to strongly disagree to disagree range.

Table 4: Consumer Awareness to Use Money Depositing

		Frequency	Percentage Value	Mean
Valid	Strongly Disagree	125	64.8	1.39
	Disagree	63	32.6	
	Moderately Agree	2	1.0	
	Agree	3	1.6	
	Total	193	100.0	

Source: Research Data

Though depositing money using ATMs, is becoming popular among the Sri Lankan, at Anuradhapura area, almost customers disagreed with their awareness to use ATMs to depositing money. 1.39 mean value on depositing money, and more than 95% of disagree level are facilitating to prove the less awareness to use withdrawing facility of ATMs. As usual identified by many researchers, awareness to use money withdrawing facilities, almost customers have strongly aware to use money withdrawing facility bearing high mean values as 4.96.

Table 5: Consumer Awareness to Use Money Withdrawing

		Frequency	Percentage Value	Mean
Valid	Agree	8	4.1	4.96
	Strongly Agree	185	95.9	
	Total	193	100.0	

Source: Research Data

Money exchanging and third party payment also enriched solutions provide by the ATM owners, where very poor awareness is existing among the customers for payment procedure using ATMs. 1.92 mean value and more than 85% disagreed level are facilitating to prove weak awareness.

Table 6: Consumer Awareness to Use Money Payments

		Frequency	Percentage Value	Mean
Valid	Strongly Disagree	47	24.4	1.92
	Disagree	118	61.1	
	Moderately Agree	25	13.0	
	Agree	3	1.6	
	Total	193	100.0	

Source: Research Data

Although almost members of the researcher sample represented modern ATM banking facilities such as Sampath, Commercial, Nation Trust and Hatton National, they are showing weak awareness for payment, deposits, transfer, except withdrawing; in means customer awareness to all ATM facilities are in weak position.

Then, hypothesis one is rejected, null hypothesis is accepted, in means **there is no high level of consumer awareness about the services of ATMs.**

H2: ATMs services and its attributes are highly significant to increase Behavior involvements

Behavior involvement of customers can be identified, if they have enough trust when dealing with ATMs, proving safe practices at ATMs, and if they tend to use heavily ATMs. Accordingly, aggregate mean of behavior involvement was measured on ANOVA with ATMs services such as withdrawing, depositing, payment, Location, charging system, other E-banking services and transferring.

Table 7: ATMs Attributes with Behavior Involvements

ANOVA

Behavior Involvement with	Sum of Squares	df	Mean Square	F	Sig.
Transfer Facility	1.838	3	.613	4.073	.008
Depositing Facility	1.383	3	.461	3.017	.031
Withdrawing facility	5.535	1	5.535	42.747	.000
Payment Facility	2.256	3	.752	5.076	.002
Accessible Location	2.954	3	.985	6.814	.000
Charging system for ATM	.011	1	.011	.070	.792
Other E Banking services	2.008	1	2.008	13.573	.000

Source: Research Data

Among the results, all variable were significantly related with behavioral involvement except charging system for ATM, therefore towards the involvement, service providers should consider about location to install ATM, enhance the awareness to highly bind with money transfer, deposit, and payment facilities as well. And to check the strength of the significant correlation was facilitated, where except transfer and charging system, other variables were significant to change the customer behavior involvement. As withdrawing is so popular since traditional era, it was

positively affected to keep behavior involvement, but deposits, payments, were rarely touched by customers at Anuradhapura area, in means those were significantly reduced behavior involvement. If there is high awareness to use deposits & payment such as withdrawal, customer involvement may be increased. And when increasing the E banking facility, customers leaving from ATMs to E-Banking, which is affected to the significantly reduce the involvement.

Table 7: ATMs Attributes with Behavior Involvements

Behavior Involvement	N	Pearson Correlation	Sig.
Transfer Facility	193	.028	.350
Deposit Facility	193	-.211	.002
Withdrawal Facility	193	.428	.000
Payment Facility	193	-.206	.002
Easy Location	193	-.245	.000
Reasonable charging	193	-.019	.396
Use other E services	193	-.258	.000

Source: Research Data

Therefore attributes of ATMs is significantly affected to increase the behavior involvement, in means hypothesis two is accepted; null hypothesis is rejected.

H3: Behavior involvement with ATMs is varying by the Consumer's geo-demographic nature.

To check the Customers geo-demographic factors, such as age, sex, income, marital status, religion, and awareness to use ATMs, whether have significantly affect to

change behavior involvement, ANOVA was facilitated.

Related to the ANOVA results, sex was measured with chi-squire, and others applied with one way ANOVA based on the categorical data. Sex is not significant, to change the behavior involvement. And behavior involvement, was not varies by the customer awareness to use ATMs, in

the practice though all customers have capability to identify ATMs and use their cards with machines, that was not significant to enhance involvement with ATMs. Other all demographic variables such as, marital status, age category, profession, monthly income, religious are the powerful factors having capacity to change customer involvement.

Table 8: ATMs Attributes with Behavior Involvements

ANOVA

Behavior Involvement with (95% confidence level)	Sum of Squares	df	Mean Square	F	Sig.
Sex (Chi-squire)	.016	1	.016	.102	.750
Marital Status	3.183	2	1.592	11.167	.000
Age	2.499	3	.833	5.671	.001
Profession	14.248	3	4.749	56.046	.000
Monthly Income	15.352	4	3.838	48.391	.000
Religious	1.951	3	.650	4.340	.006
Awareness to use ATM	.916	2	.458	2.965	.054

Source: Research Data

Among the sample, under marital status, more portions represented by married members (52.3%), affected to change involvement, and among them 30-39 age categories owned to high income category, represented 62% portion in

sample helping to age and income as significant to change involvement.

Finally on the results given by ANOVA, more factors were significant to vary behavior involvement, except sex and awareness. In means hypothesis three was accepted, null hypothesis was rejected.

Conclusion & Recommendation

The proposed study will produce an analysis of banks customers' determinants on usage of ATMs. And as a conclusion, three hypothesis were tested, where awareness to use ATMs facilities were in weakest level, ATMs attributes significantly affected to change behavior involvement, and through final hypothesis, clarified that, demographic variable were significant to vary customer behavior involvement. And as the recommendations, researcher purposes suitable strategies' to adopt or upgrade existing practices with ATMs, and enhance the consumer awareness through promotional campaign such as audio visual media. And through increasing credibility with ATM services, allowing for easy access, risk free environment to use with enough safe are the practices should be upgraded by ATM providers in Anuradhapura area.

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