IOSR Journal of Business and Management (IOSR-JBM)
e-ISSN: 2278-487X, p-ISSN: 2319-7668. Volume 20, Issue 12. Ver. III (December. 2018), PP 51-56
www.iosrjournals.org

Impact of Online Banking operations: Customers perspective in Coimbatore

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Abstract: *This paper studies the impact of technology on banking operations in customers' perspective. An appropriate model developed for the study. Also this study revealed that the bank for better users strategies for enhancing customer service and satisfaction. Online banking services are using by different customers. They are different in their education, career profile, region etc. During the online banking transaction, customers have different issues like security, unfinished transaction and too many steps to complete banking transaction. This study has attempted to provide an integrated understanding on the issue of online banking operations with online banking services providing by the bank. Main focus of the study is to explore the relationship of online banking impacts with various factors related to strategy, promotional techniques through online, personal factors, customer using level of technology, internet banking services and issues in technology usage in customers perspective. The quantitative and qualitative data was collected during December 2017.*

Date of Submission: 04-12-2018 Date of acceptance: 20-12-2018

I. Introduction

Technology enhancement is the ultimate justification for globalised customer satisfaction. All kinds of banks are continuously making efforts to improve their customer services and performance through providing online banking services. In India, Second tier cities like Coimbatore, customers are highly spread on basis of their technology awareness, skills to learn and use, dependency of using online banking operations. Here, this study reveals that the issues and factors determine the online banking services. Also, this article identifies the facing problems related to customer using level of technology, internet banking services and issues in technology usage. Changes in the customer learning culture, personal factors, revolution in banking sectors and technology advancement have triggered several critical issues before these online banking operations. The strategies adopted by bank to retain bio-graphically different customers, it depends on the user friendly operations online banking process. The challenges of increasing online banking usage create issues too. To managing demographically different customers are difficult for banking industry. This article bridge the gap between banking decisions regarding online banking with utilisation online banking services by the customers. Also, it supporting for development of global and national economy.

II. Literature Review

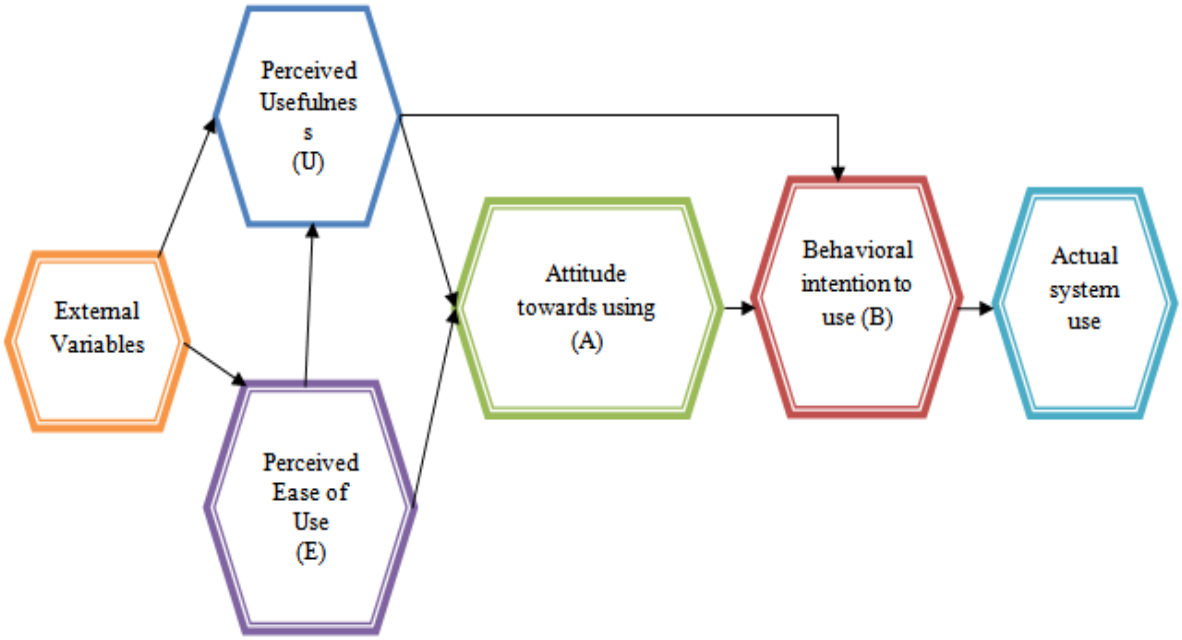
According to Kalakota & Whinston (1997) Electronic payment is a form of a financial exchange that takes place between the buyer and seller facilitated by means of electronic communications. An e-commerce electronic payment is a financial exchange that takes place in an online environment. Laudon & Traver (2002) stated that the need for paying with mobile devices has urged the development of payment systems for mobile electronic commerce. In addition, e-commerce provides the possibility to enhance current payment systems or substitute them with online variants. Guttmann (2003); Laudon & Traver (2002) also supported that the lack of the fit-for purpose payment mechanisms and infrastructure is one of the main restricting factors that hold back the growth and evolution of e-commerce; The following authors also supported these factors determined that major contribution for online banking success. Lack of usability; Kalakota & Whinston (1997), Lack of security; Guttmann (2003), and Laudon & Traver (2002), Lack of trust; Lietaer (2002), Lack of applicability; Kalakota & Whinston (1997) and Lack of efficiency. Guttmann (2003).

Davis (1993) identified that user acceptance is a pivotal factor determining the success or failure of any information system project. Many studies on information technology report that user attitudes and human factors are important aspects affecting the success of an information system. Davis (1989), Burkhardt (1994) and Rice & Adyn (1991).

Davis (1986) introduced the Technology Acceptance Model (TAM), specifically modified for modeling user acceptance of information systems. The TAM model supports the computer acceptance related to user behavior

regarding technologies and user populations. In addition, TAM provides a basis for tracing the impact of external variables on internal beliefs, attitudes, and intentions.

Figure 1
Technology Acceptance Model



III. Objectives Of The Study

In view of the gaps observed in the available literature reviewed, the objectives of thepresent study are set as follows:

1. To identify the key factors for on online banking customers perspective in Coimbatore
2. To develop a model for study of online banking and valid that model with important variables
3. To suggest strategies to banking sectors regarding the phase wise introducing technology for optimised customers benefits and services.

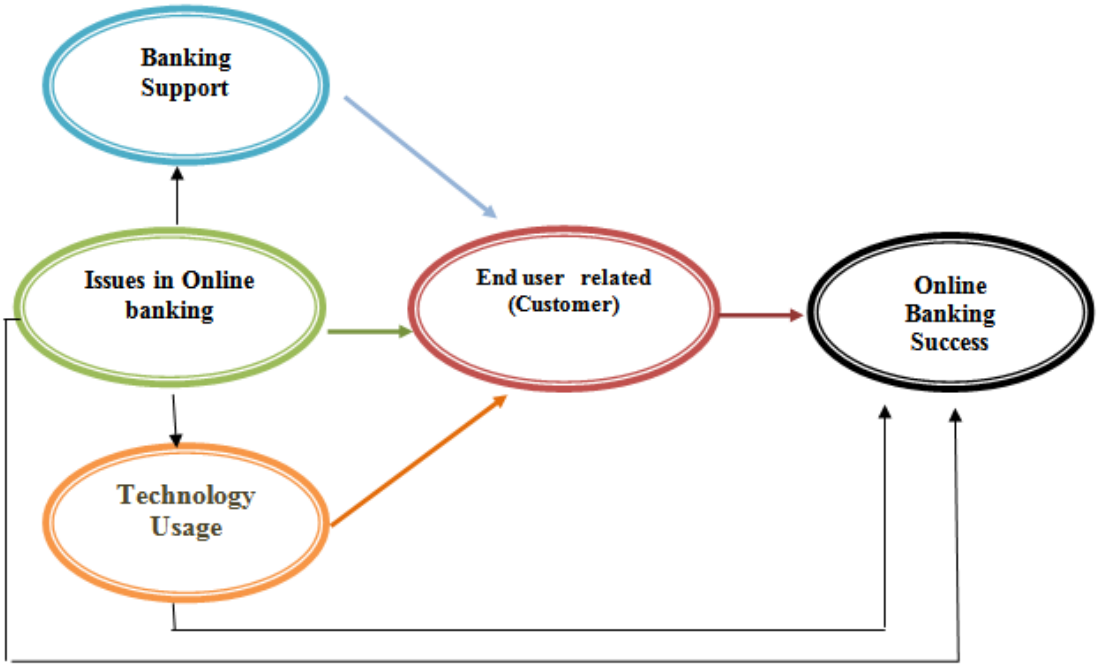
IV. Research Methodology

The methodology adopted for the study was a mix of the quantitative and the qualitative approaches for the analysis of data. Sample of the survey consists of 240 customers who are at present using online banking facilities. For this study, respondents were selected with all ranges of age, education, gender and other bio-graphical factors The primary data was collected through interview schedule. The data has been analyzed using both the quantitative as well as qualitative techniques. On basis of anlaysis, the findings are drawn.

Research Model

A research model was constructed to verify the included variables and their impact. The present study has taken inspiration from the end user (Customers perspective) and has attempted to measure effectiveness in terms of satisfaction of online banking services.

Figure: 2



The following variables have been conceptualized after obtaining inputs from literature review, experts' opinion, discussing with customers. On the basis various inputs and feedback from above sources following variables were conceptualized:
1. Technology Usage; 2. Issues in Online banking; 3. Banking support; 4. End user related (Customer); 5. Customers Education portal; 6. Online Banking Success

V. Data Analysis & Interpretation Of Variables

Various components of the above variables were identified and the researcher formulated these items for questionnaires accordingly.

Key Factors identification for Online Banking Success

Table: 1 Key factors identification in Technology Usage

Statement loadings of key factors in Technology Usage for the varimax rotated-principle components (N=240)

.Factors	Loadings	Eigen Value	% of Variance
Technology Usage			
Connected to the Internet at home or work to do their financial transactions	0.542	57.125%	17.716%
Uses E – mail	0.542		
ATM / Debit card service	0.615		
Credit card service	0.538		
Online banking services	0.501		
E – payments	0.512		
Electronic Fund Transfer (EFTs)/NEFT/RTGS	0.498		

The factor analysis using Kaiser Normalization measure (0.478) and Barlett's test (chi-square- 254.82 and significance- 0.000) reduced into three factor groups based on their eigen values greater than one.

Table: 2 Key factors identification in Issues in Online banking

Statement loadings of key factors in Issues in Online banking for the varimax rotated-principle components (N=240)

.Factors	Loadings	Eigen Value	% of Variance
Issues in Online banking			
Not being able to maintain security	0.312	53.676%	4.716%
Leaving the operation unfinished	0.415		
Internet banking can be tampered with by others	0.428		
Waiting for long time for conducting of transactions	0.472		
Too many steps inprocessing transaction	0.491		

The factor analysis using Kaiser Normalization measure (0.398) and Barlett's test (chi-square- 394.365and significance- 0.000) reduced into ten factor groups based on their eigen values greater than one.

Table: 3 Key factors identification in Banking Support
Statement loadings of key factors in Banking Support for the varimax rotated-principle components (N=240)

.Factors	Loadings	Eigen Value	% of Variance
Banking Support			
Online portal support	0.533	52.43%	7.16%
Customer care	0.587		
Attention and problem solving ability	0.604		
Size and operation strength of bank	0.681		
Experiences of the staff to help online related issues	0.557		
Training given by bank to their employees	0.693		

The factor analysis using Kaiser Normalization measure (0.598) and Barlett's test (chi-square- 394.365and significance- 0.000) reduced into ten factor groups based on their eigen values greater than one.

Table: 4 Key factors identification in End user related (Customer)
Statement loadings of key factors in End user related (Customer) for the varimax rotated-principle components (N=240)

.Factors	Loadings	Eigen Value	% of Variance
End user related (Customer)			
Personal characteristics	0.681	58.125%	7.716%
Status of usage	0.557		
Reduced time of transactions	0.693		
Cost effectiveness	0.622		
Ease of use	0.705		
Technology savvy	0.512		
Familiarity of computer usage level of your bank	0.703		

The factor analysis using Kaiser Normalization measure (0.715) and Barlett's test (chi-square- 42.56 and significance- 0.000) reduced into three factor groups based on their eigen values greater than one.

Table: 5 Key factors identification in Customers' Education portal
Statement loadings of key factors in Customers' Education portal for the varimax rotated-principle components (N=240)

.Factors	Loadings	Eigen Value	% of Variance
Customers' Education portal			
Awareness & Understanding of Cyber security	0.659	52.77%	5.16%
Website support for learning online banking	0.544		
Newspaper & Magazines related to online banking	0.546		
Online discussion forum	0.568		

The factor analysis using Kaiser Normalization measure (0.678) and Barlett's test (chi-square- 24.64 and significance- 0.000) reduced into three factor groups based on their eigen values greater than one.

Table: 6 Key factors identification in Online Banking Success
Statement loadings of key factors in Online Banking Success for the varimax rotated-principle components (N=240)

.Factors	Loadings	Eigen Value	% of Variance
Online Banking Success			
Account information and balance enquiry	0.742	57.125%	17.716%
E- payments	0.842		
Account to Account transfer	0.625		
Due installment enquiry	0.538		
Increased online transaction	0.801		
Reduced errors and mistakes in online handling of the branch	0.712		

The factor analysis using Kaiser Normalization measure (0.724) and Barlett's test (chi-square- 62.45 and significance- 0.000) reduced into three factor groups based on their eigen values greater than one.

Online Banking Success Model – Fit

The Multilayer Perception (MLP) procedure produces a predictive model for one or more dependent (target) variables based on values of the predictor variables. Using the Multilayer Perception procedure, you have constructed a network for predicting the probability that a given data. The model results are comparable to those obtained using Logistic Regression or Discriminant Analysis, so you can be reasonably confident that the data do not contain relationships that cannot be captured by those models; thus, you can use them to further explore the nature of the relationship between the dependent and independent variables.

After factor identification, six major factors were reduced to four. That four factors are 1. Bank Support 2. End users related (Customer) 3. Customer Education 4. Online Banking Success

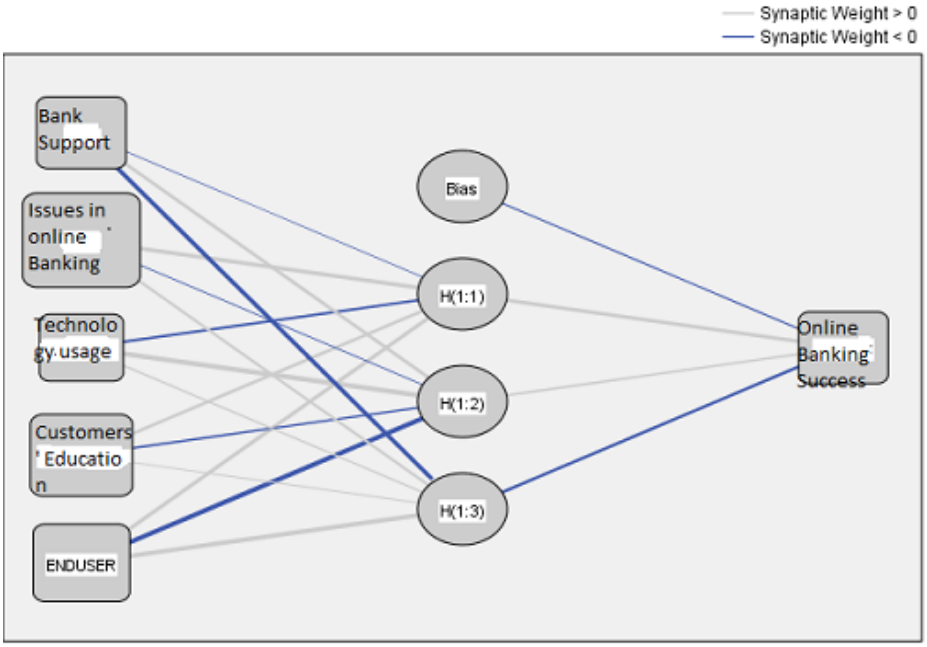
Table: 7 Case Processing Summary

		N	Percent
Sample	Training	171	71.1%
	Testing	69	28.9%
Valid		240	100.0%
Excluded		0	

Table: 8 Network Information

Input Layer	Covariates	1	BAK
		2	ONLSUC
		3	CUSEDU
		4	ENDUSER
	Number of Units[a]		4
	Rescaling Method for Covariates		Standardized
Hidden Layer(s)	Number of Hidden Layers		1
	Number of Units in Hidden Layer 1[a]		3
	Activation Function		Hyperbolic tangent
Output Layer	Dependent Variables	1	ONLSUC
	Number of Units		1
	Rescaling Method for Scale Dependents		Standardized
	Activation Function		Identity
	Error Function		Sum of Squares
a. Excluding the bias unit			

Figure: 3 Model fit (Neuro Network Path



Hidden layer activation function: Hyperbolic tangent

Output layer activation function: Identity

Table: 9

Independent Variable Importance		
	Importance	Normalized Importance
ONLSUC	.364	100.0%
CUSEDU	.144	39.5%
ENDUSER	.264	72.4%
BAK	.228	62.5%

After the test results of the measurement model states that the data collected were valid and reliable, then the next step is calculating the independent variable importance for the variable behavioral intention amounted to Online Banking Success 0.364, Customer Education 0.144, End user related (Customer) 0.264 and Bank support 0.228.. These values indicate that the independent variable performances are Customer Education (39.5%), End user related (Customer) (72.4%), Bank support (62.5%) and Online Banking Success (100%) It is able to explain the variable behavioral intention amounted to online Banking Success(100%).

VI. Conclusion

Having examined a comprehensive list of factors included for this research. After identified factors influencing online banking success, these factors validity are tested with factor analysis. Factor analysis helps to reduce the key factors. That key factors are used to test (neural network analysis) model fit analysis. The discriminate analysis proved that the online banking success is depend on the Bank support, Customer Education and customer related factors. Through analysis found that these factors contribute more for success of Online banking (E- payments, Increased online transaction, Reduced errors and mistakes in online handling of the branch), Banking Support (Training given by bank to their employees, Size and operation strength of bank), End user (Customer) related (Ease of use, Familiarity of computer usage level of your bank, Reduced time of transactions and Personal characteristics) and Customers' Education portal (Awareness & Understanding of Cyber security and Online discussion forum).

References

[1]. Davis, F., Bagozzi, R. P., & Warshaw, P. R. (1989). User acceptance of computer technology:a comparison of two theoretical models. Management Science, 35, 982-1003.
[2]. Guttmann, R. (2003). Cybercash: the coming era of electronic money. Basingstoke: Palgrave.
[3]. Kalakota, R. & Whinston, A. (1997). Electronic commerce: a manager's guide. Addison-Wesley.
[4]. Laudon, K. C. & Traver, C. G. (2002). E-commerce: business, technology, society. London:Addison Wesley.
[5]. Lietaer, B. (2002). The Future of Payment Systems. Unisys Corporation.
[6]. A. Prameela (Research Scholar, DCMS, Andhra University) "Factors influencing the customer's adoption/usage of technology in banking services in Visakhapatnam city"
[7]. Venkatesh, V., and Davis, F. D. (2000) "A Theoretical Extension of the Technology Acceptance Model: Four Longitudinal Field Studies." Management Science, INFORMS, 46(2), 186-204.

Dr. K. Karthikeyan.", Impact of Online Banking operations: Customers perspective in Coimbatore. " IOSR Journal of Business and Management (IOSR-JBM), Vol. 20, No. 12, 2018, pp. -.51-56.