

EMPIRICAL EVALUATION OF ACCEPTANCE OF IN E-SHOPPING IN OMAN

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ABSTRACT

Due to the advancement in the technology and increase in the number of internet users, it is observed that the number of online shoppers or E-shoppers is also increasing. The purpose of this research paper is to investigate the acceptability of E-shopping in Oman. The factors that influenced the acceptance of E-Shopping were studied. The questionnaire has been created using Google forms and electronically distributed among the peoples of various nationalities in Oman through email, SNS and SMS's (Short Message Services). The questionnaire consists of 27 survey questions and 5 demographic statements. The data was collected from January 2017 to September 2017. The acceptance study is based on Technology Acceptance Model (TAM). The structural equation modeling (SEM) technique was used to evaluate the causal model and to examine the reliability and validity of the measurement model. The variables used in this study are perceived ease of use, perceived usefulness, Attitude towards online shopping, Intention to shop online. The four hypotheses have been tested. The implications of the research have also been discussed.

Keywords: Online Shoppers, E-Shoppers, E-shopping, Technology Acceptance Model, Perceived Ease of Use, Perceived Usefulness, Attitude Towards Online Shopping, Intention to Shop Online.

INTRODUCTION

Over the most recent couple of hundreds of years, humanity has experienced mechanical and electronically uptrends. Internet, specifically web based business, is the main thrust of this insurgency. In the new electronic age, business exchanges and capacities have turned out to be economical in the electronic space. The Internet and online business are quickly spreading new and extremely viable methods for directing business exchanges. Increasing numbers of consumers are using electronic commerce (e-commerce) to shop for products and services (Ingham, Cadieux, & Berrada, 2015). The use or acceptance and deployment of e-commerce business operation activities facilities can be beneficial for business organizations and consumers. It is observed that the web based transactions are drastically increasing in Oman due to the expansion in the computer based education, popularity of internet, availability of internet, decreasing cost of internet and several other factors that leads to increase in web based transactions. The organizations can reduce the overhead cost and consumer can save the time and efforts. According to Sarwant Singh at Frost & Sullivan (Singh, 2015) the internet spending in the Middle East is booming with GCC countries expecting a 40 percent growth in E-Commerce by 2020 and is expected to reach \$41.5 billion. Oman is expected to have a total market share of 12 percent across the GCC countries. Internet users constitute 74.2% of the population of Sultanate of Oman. In one of the recent study published on the website (<https://www.go-gulf.com/blog/online-shopping-trends-middle-east/>) is around 72% of the customers from the GCC countries start purchasing online since 2013. Since, the E-shopping is used by the youngsters so they want same day delivery options. Part of consumers mostly middle age customers prefers in-store shopping because they want to "see, touch and try" the products. According to the leading credit card and debit card service providers, the UAE is leading the e-commerce revolution in the GCC with five in 10 people shopping for goods and services on the Internet.

Almost a third (31 per cent) of all online shoppers said that they have spent 11-50 per cent of their purchases on cross-border; with 12 per cent said that 51-100 per cent of their shopping were cross-border.

The top motivating factors to shop cross-border are: free shipping (selected by 49 per cent); safe ways to pay (49 per cent) and items, which are not available locally (39 per cent) — while they concerned that delivery/shipping costs (chosen by 49 per cent); identify theft/fraud (47 per cent) and difficulty that the item would not be as described (42 per cent); are the top barriers, which may prevent online shoppers from purchasing from overseas websites.

LITERATURE REVIEW

The researchers did large number of researches that shows the various reasons related to online purchase activities. The reasons specified in the research papers are vary from country to country based on the culture and ethics also. Our study is based on the well-established theory of technology acceptance factors that influence the adoption of online shopping in Oman. The TAM (Davis, 1989), with its basis in the TRA (Ajzen, 1991; Fishbein & Ajzen, 1975) has emerged as a powerful model in investigating the acceptance and use of information technology; (Ajzen & Fishbein, 1975) its relationship to TRA has been discussed extensively in the literature (Davis, 1989). The choice for using TAM as a research model to explain consumers' online shopping adoption is attributed to its consistent capability to explain a substantial portion of variances between behavioral intention and actual behaviors derived mainly from research into the purchase of technology related products.(King & He, 2006).Research by (Ahmad & Agrawal, 2014)concludes that the internet will revolutionize the dynamics of international commerce and, in particular, lead to the more rapid internationalization of small to medium –sized enterprises (SMEs).Although this model was originally conceived to model the adoption of information systems in the workplace (Davis, 1989), scholars in the area of consumer behavior have identified two specific dimensions which are relevant to online shopping: perceived ease of use and perceived usefulness (Gefen, et al., 2003).(Goldsmith & Flynn, 2004)state that the home catalog is another traditional selling channel where people can shop at home because of the varieties of products offered in the catalog.(Sultan & Henrichs, 2000) concluded that the consumer's willingness to and preference for adopting the Internet as his or her shopping medium was also positively related to income, household size, and innovativeness. (Vijay), revealed that Consumers, all over the world, are increasingly shifting from the crowded stores to the one-click online shopping format. (Wang, Wang, & Liu, 2016) concluded that relationship commitment, trust, and satisfaction were key determinants of stickiness intention.(Tang & Nguyen, 2013) integrates the concepts of satisfaction into TAM, trust and e-services quality in context of online shopping. Trust has been integrated to TAM, but his study interacts satisfaction into TAM. Further, they explained the correlations between trust and satisfaction by e-service quality. They also state that this is the first attempt to empirical a theatrical integrated e-service quality with trust, satisfaction, TAM and intentions the limitations of their research is that the system quality hasn't well-developed they also observed hasn't well measured.

RESEARCH METHODOLOGY

In order to answer research questions, qualitative and quantitative methods were used. In this research, both of these research methodologies are used and implemented throughout the study known as mixed approach. The method adopted under the mixed methodology approach is survey.

Survey research is most commonly used in non-experimental design and is considered most appropriate for theory testing. A survey research could support the external validity of the study results from managerial perspectives(Bakos & Treacy, 1986).

There are many types of surveys such as oral survey, written survey, online survey and example survey. This study focuses on oral and written surveys. According to (Fowler Jr, 2013) a written survey can be grouped as administered questionnaires, mail survey or drop-off survey. A mail survey was used in this study.

THEORETICAL FOUNDATIONS OF PROPOSED WORK

➤ The Technology Acceptance Model (TAM)

Technology Adoption Model (Fred D Davis, 1989) has been the foundation of many technology adoption and diffusion research and it is rooted in the Theory of Reasoned Action (TRA). As per TAM, the two important independent variables of actual use of technology are: Perceived ease of use, defined as 'the degree to which a person believes that using a particular system would be free of effort Perceived usefulness, defined as the degree to

which a person believes that using a particular system would enhance his or her performance? The presentation of (Davis Jr, 1986) is shown below:

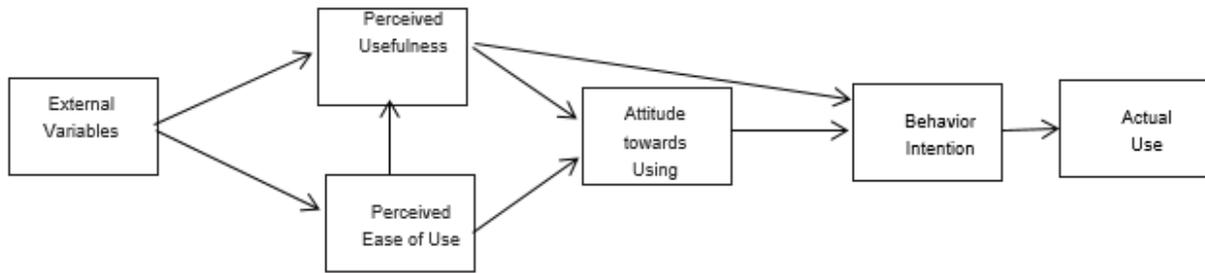


Figure1: The principle scheme of original Technology Acceptance Model

TAM was developed to explain and predict particular IT usages. However, this particular model has been using by many researchers in studying adoption and diffusion of various IS technologies.

The TAM has been used widely to explain users' behavioral intentions toward a new system or technology. The TAM is an adaptation of(Ajzen & Fishbein, 1980)theory of reasoned action, which is used to explain the causal relation- ships between users' internal beliefs, attitudes, and intentions regarding technology. According to the original model, the acceptance of a technology is determined by the voluntary behavioral intention to use it. This intention is the result of an individual's attitude toward a technology and the perception of its usefulness, and these attitudes are formed on the basis of an individual's beliefs of the PU and PEOU of the technology (F. D. Davis, Bagozzi, & Warshaw, 1989).

The hypothetical model proposed and tested in this study is illustrated in Figure 2.

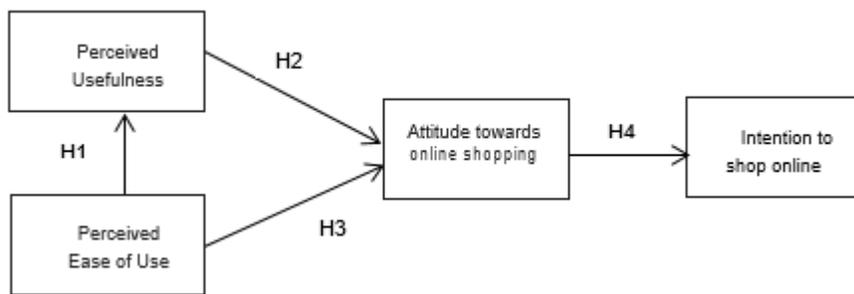


Figure 2: The hypothetical model.

The discussion leads to the following hypotheses:

- H1:**Perceived Ease of Use has a positive impact on Perceived Usefulness.
- H2:**Perceived Ease of Use has a positive impact on Attitude towards online shopping.
- H3:** Perceived Usefulness has a positive impact on Attitude towards online shopping.
- H4:** Attitude Toward Using Facebook has a positive impact on Intention to shop online.

DEMOGRAPHIC DATA

The demographic characteristics of the respondents are presented in following figures. The total number of respondents is 151 in which 59% were male and 41 % were female. The Age of the respondents that shows that % of respondent’s age is between 20 and 30 years and 69% % and 31% are more than 30 years. Since, the data has been collected by the student’s researchers from the HCT, Muscat so, the number of respondents whose age is more than 30 years is less. In our survey questionnaire there are four levels respondents, most of people are in diploma level with 48.7%. However, the lowest numbers of percentages are masters or higher were 3.2%. The second higher are the bachelor responds 29.4% and the others have 18.7%.

DESCRIPTIVE STATISTICS, RELIABILITY AND VALIDITY OF INSTRUMENT

All the analysis of the data was done in SPSS 21.0. The descriptive analysis has been done that shows N=151 and N=146 is valid for data analysis as shown in Table 2.

The reliability and validity of survey instrument is assessed with Cronbach’s alpha in SPSS 21.0. The result showed that Cronbach’s alpha of the entire instrument was 0.953. The reliability of each variable is greater than the minimum threshold of 0.7, indicating that the scale had adequate reliability.

The result of Factor Analysis indicated that the instrument had acceptable validity. The factors were extracted using Principal Component Analysis. The factors with Eigen values greater than 1 will be retained. The six factors extracted, each had an eigen value that was greater than 1, the accumulative variance explained was 74.258%, and the minimum Average Variance Extracted (AVE) of the variables was 0.582, which is larger than the threshold of 0.5 and the rotations converged in six iterations.

Table 1: Descriptive Statistics

Items	N	Minimum	Maximum	Mean	Std. Deviation	Variance
PEOU1	151	2	5	3.07	.978	.956
PEOU2	151	1	5	2.98	1.278	1.633
PEOU3	151	1	5	2.92	.977	.954
PEOU4	151	1	5	2.77	1.116	1.246
PEOU5	151	1	5	2.90	.922	.850
PEOU6	151	1	5	3.16	1.286	1.655
PU1	151	1	5	2.91	1.064	1.133
PU2	151	1	5	3.03	1.113	1.239
PU3	151	1	5	3.21	1.127	1.271
PU4	150	1	5	3.11	1.072	1.148
PU5	148	1	5	2.92	.937	.878
PU6	151	1	5	3.02	1.029	1.060
PU7	151	1	5	2.77	1.157	1.339
PU8	151	1	5	3.14	1.276	1.627
ATOS1	151	1	5	2.85	.897	.805
ATOS2	151	1	5	2.92	1.043	1.087
ATOS3	151	1	5	2.95	1.079	1.165
ATOS4	151	1	5	3.15	1.298	1.685
ATOS5	151	1	5	3.01	1.055	1.113
ATOS6	151	1	5	2.90	.978	.957
ATOS7	151	1	5	3.09		1.018

Table 2: Descriptive Statistics

ISO1	151	1	5	2.89	1.059	1.122
ISO2	151	1	5	2.81	.955	.912
ISO3	150	1	5	2.93	1.069	1.142
ISO4	151	1	5	3.10	1.165	1.357
ISO5	151	1	5	2.87	1.109	1.231
ISO6	151	1	5	3.11	1.108	1.229
ISO7	151	1	54	3.74	4.252	18.076
Valid N	146					

MODEL TESTING

After checking the validity and reliability of the instrument regression analysis will be performed to test the relationships between the variables and intention to use C2C mobile business application. The following Table 3 shows the regression results on using Online Shopping.

Table 3. Hypothesis Results

Independent Variable	Dependent Variable	R ²	Standardized Beta	Standard Error	t	p	Result
Perceived Ease of Use	Perceived Usefulness	.655	.809	.043	16.81	.000*	H1 Supported
Perceived Ease of Use	Attitude towards online shopping	.691	.832	.045	18.341	.000*	H2 Supported
Perceived Usefulness	Attitude towards online shopping	.519	.721	.062	12.686	.000*	H3 Supported
Attitude towards online shopping	Intention to shop online	.411	.641	.075	10.19	.000*	H4 Supported

Overall Model fit $p=0.000^*$; $R^2=.655, .519, .691, \text{ and } .411$

CONCLUSION

The sultanate of Oman has very good economic growth rate that motivates number of multinational organizations to start the business operations in Oman that will stimulates the growth of E-commerce in Oman. It is observed that E-shopping has big influents to the users. It can be useful sometimes and sometimes not to the people from ages between 20 to more than 30. As we can see, nowadays everything depend on technology and that makes our life easy and many ways, everything have pros and cons as well E-shopping. That’s why we have to use it wisely and carefully with the help of E-shopping we can purchase many useful things that we can find in our local markets. E-Commerce service provides can improve this technology and make it more efficient to users.

LIMITATIONS

The data is collected from one of the big city of Sultanate of Oman. If data is collected from any other city the results may not be same. In our study most of the respondent’s age is between 20-30 years and this young generation grown up in a mobile and digital environment. For this generation convenience or access to online services is a key characteristic. It is even more important than ease of use. In this study our main focus is on acceptance and intention to use the E-Shopping. If the other factors like age, gender etc. will be considered the results may vary.

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