



THE IMPACT OF SOCIAL MEDIA USAGE ON HI-TECH PRODUCTS PURCHASE DECISION OF GENERATION Y IN VIETNAM

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ABSTRACT

The use of social media is growing rapidly, especially among Generation Y. This study develops and tests a model of the impact of social media usage on hi-tech products purchase decision. The main objective of the research is to assess the impact of social media usage on hi-tech products purchase decision of Generation Y in Vietnam. Based on the literature review, the conceptual framework to research the main problem was defined. Both qualitative and quantitative methodologies were utilized in this study. Qualitative research was first carried out with focus group, which was conducted to derive measurement items for the interested constructs. Quantitative research used cross-sectional field design. Pilot design were first conducted to test measurement items draft. The official study conducted to test the proposed theoretical model and hypotheses. This is a feasible approach for measuring complex variables and for forming hypotheses. The model was tested and developed using data collected by questionnaire from a sample of 605 respondents by both electronic and paper surveys with non-probability and convenience sampling. SPSS 18 and AMOS 16 software was employed to help analyze the collected data. The results of structural equation modeling showed that social media usage impact on the intermediates variables perceived usefulness and trust, therefore, affected influence intention and purchase decision. Analyses confirmed the important effects of trust and perceived usefulness on intention and purchase decision for hi-tech products of Generation Y in Vietnam. Hypothesis and model were tested, and multiple group analysis were done. The summary, discussion of the finding, recommendations for future research and conclusion were presented.

Keywords: Social media usage, Impact of social media usage, Hi-tech products, Purchase decision, Generation Y in Vietnam.

1. Introduction

Before the Internet era, consumers usually searched for the information regarding things they want to purchase through their reference groups such as friends, family, marketing activity or sellers. Nowadays, people can search for information and have a possible review from other people who share the information through the social media networking. Social media can take many different forms. It is the set of online word of mouth forums, which include blogs, discussion boards, forums or social networks (Mangold & Faulds, 2009). Social media is perceived by consumers as a more trustworthy source of information when it comes to products and services than corporate sponsored communications transmitted via the traditional elements of the promotion mix (Foux, 2006). Vietnam has got over 45.5 million internet users as of June 30, 2015 (Internetworldstats, 2015) and 31.3 million Facebook users as of March 2015 (More corporation, 2015). Vietnamese netizens are the most likely in South East Asia to engage with companies via social media, with almost four in five (79%) having liked or followed a brand, company or celebrity, 10 points higher than the Southeast Asia average of 69 percent (Nielsen, 2011). Despite the rapid growth of global social media and its revolutionary impact on young generation's attitude, the research in this area from marketing communications perspectives is still at particularly exploratory stage in developing countries of South Asia.

1982 is the starting birth year for Generation Y (Millennial) in USA and some other countries (William Strauss, Neil Howe, 2000). Since 1986, Vietnam's economy has been transformed through a series of economic, social and political reforms. We define Generation Y in Vietnam as those who were born from 1986 to 1997. According to Bazaavoice (2012), 51% of Millennial say consumer opinions found on a company's web site have a greater impact on purchase decisions than recommendations from family and friends, 73% of Millennial think that other consumers care about their opinions more than companies do, and 84% of Millennial say user general content has at least some influences on what they buy compared to 70% of boomers.

This paper develops a causal model including social media usage, perceived usefulness, and trust factors resulted from previous studies in order to explain an individual's intention and purchase decision of Generation Y in Vietnam. Data collected by questionnaire is analyzed in

order to test and simplify the model using Structural Equation Modeling (SEM) techniques and the results of analyses are examined in relation. We conclude theoretical and practical implications.

2. Research Problem

The Internet and social media have been increasing fast globally and especially in Vietnam for the past 5 years. Social media usage influences purchase decision, satisfaction and brand loyalty of customers. However, the intention to use social media for business is still low in Vietnam. In view of growing number of social media users, the impact of social media usage on purchase decision needs to be explored. There are already some academic frameworks for business model analysis, but there is no such a framework for the issue discussed above. Hence, the aim of this study is to investigate deep into the impact social media usage has on hi-tech products purchase decision of Generation Y in Vietnam.

3. Research Objective

The main aim of this research is to identify the impact of social media usage on hi-tech product purchase decision of Generation Y in Vietnam. Thus, it is expected to achieve the following objectives:

- To investigate the relation between social media usage and hi-tech product purchase decision of Generation Y in Vietnam.
- To understand the relation between perceived ease of perceived usefulness, and trust of social media and hi-tech product purchase decision of Generation Y in Vietnam.
- To model the impact social media usage on hi-tech product purchase decision of Generation Y in Vietnam.

4. Research Questions

In order to achieve the above objectives, the following research questions were posed for this study:

- 1) How to relate between social media usage to hi-tech product purchase decision of Generation Y in Vietnam?

- 2) How to relate between perceived ease of use, perceived usefulness, and trust of social media to hi-tech product purchase decision of Generation Y in Vietnam?
- 3) What are the impacts of social media usage on hi-tech product purchase decision of Generation Y in Vietnam?

5. Literature Review and Conceptual Framework

This paper built on a framework which has six variables: social media usage, perceived ease of use, perceived usefulness, trust, behavioral intention to purchase, and purchase decision (Figure 1).

Social media usage

Social media users have opportunities to post status, post photos, record their daily lives and thoughts, reply others to derive a sense of self-assurance and belonging from such self-expression. In addition, they can gather information from the huge online database for purchasing decision. Social media has had an impact on purchase decision, for example, consumers who are a fan of a brand on social media, are more likely to recommend or buy that brand (Cruz & Mendelsohn, 2010). Consumers trust the information obtained from fellow consumer more than from one created by an organization (Nielsen, 2009), due to the advantages of social media in influencing customer perceptions and behavior (Williams & Cothrell, 2000). According to Mathupur, Black, Cao, Berger, & Weinberg (2012), social media independent variable is an important factor which often influences the purchase decision of a person and social media usage impact on purchase decision. On the other hand, Mangold & Faulds (2009) states that social media has influenced consumer behavior from information acquisition to post purchase decision such as dissatisfaction statements or behaviors. 71% of people state that family and friends make a great influence on their purchase decision (Harris, 2007). According to Bazzarvoice (2011) 51% of Millennial say consumer opinions found on a company's website have a greater impact on purchase decisions than recommendations from family and friends.

Perceived ease of use

Perceived ease of use is defined as “The degree to which a person believes that using a particular system would be free of effort” (Davis, 1989). In the Technology Accept Model (TAM) perceived ease of use and perceived usefulness are significantly correlated with system usage. Perceived ease of use has been widely known that system's perceived ease of use, as well

as perceived usefulness, have a direct influence on usage of an information system, and perceived usefulness mediates the effect of perceived ease of use on usage (Agarwal & Prasad 1999, Davis, 1989, & Venkatesh, 1999). In virtual communities, perceived ease of use has a positive influence on perceived usefulness and intention to use. It also has a positive effect on the individual's feeling of flow experience (Hsu & Lu, 2004). The model including perceived ease of use seems to have good predictive validity for the use of social media for purchase decision. Hence, I would expect that perceived ease of use has positive influences on perceived usefulness.

Perceived usefulness

Perceived usefulness has a direct influence on the intention to use an information system, as prior research claims (Agarwal & Prasad, 1999; Davis, 1989; Jackson, chow, & Leitch, 1997; Venkatesh, 1999). In the context of social networking system, according to Brandtzaeg & Heim (2009), Erickson (2002), it is interpreted as the degree to which the system provides useful community activities and responses in terms of its features, functionality, and reliability. The ultimate goal of using a social network service is that the system increases a user's satisfaction by facilitating the interaction between community members. Ultimately the system provides useful community activities and responses on the user's behalf (Erickson, 2002). When users feel that social media is useful, their intention to use is increased (Hsu and Lu, 2004). Hence, I would expect that perceived usefulness has a positive influence on behavioral intention to purchase.

Trust

Trust plays an important role in forming and maintaining long-term relationships (Sanchez Iniesta, Schlesinger, & Rivera, 2010). Rousseau, Sim, Ronald, & Colin (1998) debate that trust is defined in this research as a psychological state comprising the intention to accept vulnerability based on positive expectations of intentions or behavior of another. On the other hand, trust has also been seen as a set of specific, including ability, benevolence, integrity, and predictability (Gefen, 2002). Social media network users often express their thoughts, beliefs and choices and show trust in safety within their online community (Pitta & Fowler, 2005; Shin, 2010). The importance of trust has also been cited in electronic commerce. People rely on trust in order to reduce social ambiguity (Gefen, Karahanna & Straub, 2003). According to a survey of US mom internet users by online video review site expo, consumer reviews gained significantly more trust, nearly 12 times higher, than descriptions of manufactures. Over half of millennial (consumers aged 18 to 34) trust the opinions of strangers online over those of friends and family

(Bazaavoice, 2012). Online trust will also function as the facilitator for formulating positive purchase intention and further purchase decisions. Yoon (2002) said that both online and offline trust have great impact on the consumer's purchase decision. Trusting beliefs to depend strongly affect specific behavioral intentions and trust has a strong influence on three key consumer intentions (Harrison, Vivek, & Charles, 2002).

Behavior intend purchase

Intention refers to the willingness for a purchase decision. It has a positive influence on the purchase decision. Research following Theory of Reasoned Action (TRA) and technical acceptance models (TAM) by Bernadette (1986) showed a high correlation between intentions and actual use. Behavioral intentions are indicators that customers will stay or leave the companies (Zeithaml, Berry, & Parasuraman, 1996). The positive relationship between behavioral intentions and action was described by the TRA (Ajzen & Fishbein, 1980; Featherman & Pavlou, 2002) and the theory of planned behavior (Ajzen, 1985, 1991). In 2011, study conducted by Sommer show that behavioral intention refers to an individual motivation and conscious plan to expand effort and perform a behavior. In addition, research studies by Zeng, Hu, Chen, & Yang (2009), Brady & Robertson (2001) reveal that service quality and consumer satisfaction affect behavioral intention and indicate that behavioral intentions can be favorable and unfavorable as well. Positive attitude towards behavioral change can lead to favorable behavioral intention to perform the behavior. Study conducted by Phuong, D. T. H. (2012) indicated that online shopping intention was predicted by perceived ease of use, perceived usefulness, and perceived risk.

Purchase decision

Individuals factor mostly have control over their behavior, that is the behavior is voluntary and performed under the individual free will. However, if there is a strong attitude and intention toward performing a particular action, actual behavior will occur. A favorable behavioral intention is more likely to result in a repurchase than in the case of an unfavorable intention. In a study conducted by Davis, Foxall, & Pallister (2002) showed that an individual can intend to perform a particular activity but may not realize it because of some outside conditions. According to Akhter (2010), overall satisfaction has a significant positive impact on purchase intention, and purchase intention has a significant positive impact on actual repurchase. When asked what sources "Influence your decision to use or not to use a particular company, brand or

product” 71 percent claim reviews from family members or friends exert a “Great deal” or “Fair amount” of influence (social trends report, 2012).

Conceptual model

In order to achieve the study’s objectives, an impact of social media usage to purchase decision model is developed technology acceptance model (Venkatesh & Davis, 1996) with Theory of Reasoned Action (Fishbein & Ajzen, 1975). According to Theory of Reasoned Action of Fishbein & Ajzen (1975), person’s actual behavior could be determined by considering their prior intention along with the beliefs that the person would have for the given behavior. The intention that a person has prior to an actual behavior as the behavior intention of that person, and defined it as a measure of one’s intention could be determined by considering both the attitude that a person has towards the actual behavior (Fishbein & Ajzen, 1975). The strong correlation related between perceived usefulness to intention behavioral purchase. Perceived usefulness and perceived ease of use were to have direct influence on behavioral intention (Davis, Bagozzi & Warshaw, 1989). Perceived usefulness influences on actual system use. The attitude variable eliminated any unexplained direct influence observed from the system characteristics to the attitude variable. I modified the conceptual framework by applying six theoretical frameworks to find out the impact of social media usage on hi-tech products of Generation Y in Vietnam (Figure 1). This study focused on independent variable, four intermediate variables and dependent variable was purchase decision.

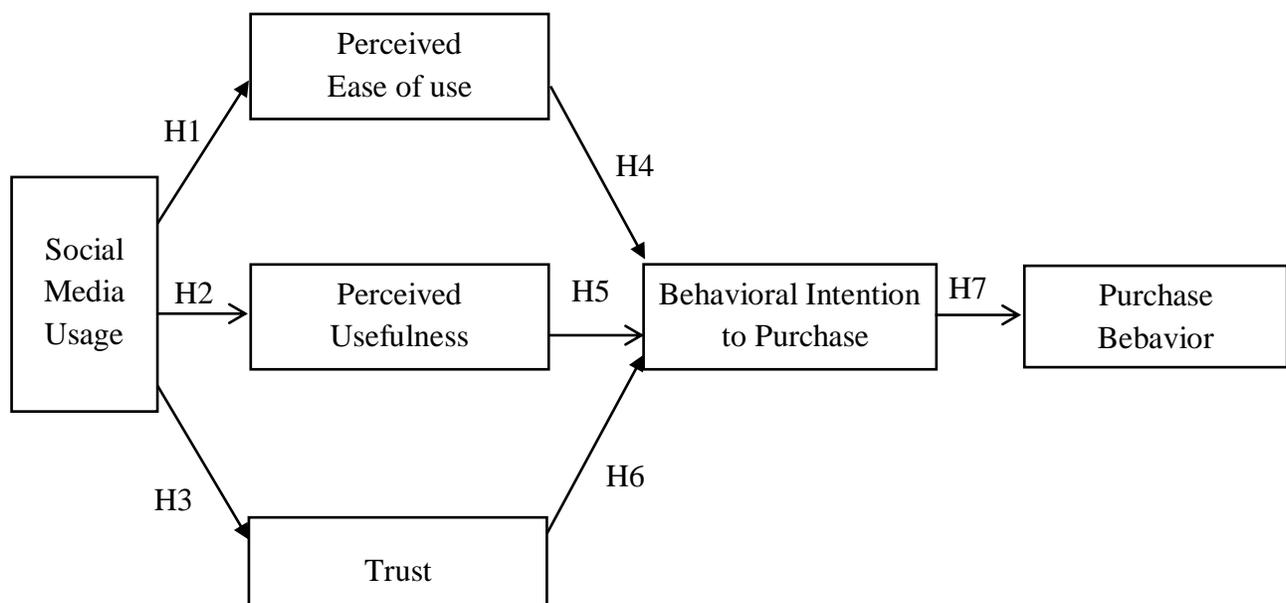


Figure 1: Conceptual Model

6. Hypotheses

The formulation of a hypothesis is often a function of the literature review, although hypotheses are also frequently formulated from theory. The primary purpose of this study is to test nine hypotheses.

H1: Social media usage will be positively related to Perceived ease of use.

H2: Social media usage will be positively related to Perceived usefulness.

H3: Social media usage will be positively related to Trust.

H4: Perceived ease of use will be positively related to Behavioral intention to purchase.

H5: Perceived usefulness will be positively related to Behavioral intention to purchase.

H6: Trust will be positively related to Behavioral intention to purchase.

H7: Behavioral intention to purchase will be positively related to purchase decision.

7. Research Method

This study used cross-sectional field design, as it is a best way to identify relatively strong effects on dependent variables, intermediate variables, which enhances the statistical results. This is a feasible approach for measuring complex variables and forming hypotheses as well. I take both qualitative approach and quantitative approach for this study. This qualitative research was carried out by a focus group in Ho Chi Minh City following sampling method target (Coyne, 1997). In this study, a quantitative approach is applied through the questionnaires. The questionnaire is developed on the basic of extant literature. The first and second question in the questionnaire is a screening question, requiring a selection of whether they have used social media and purchase hi-tech product around 12 month, and into Generation Y. For investigate the objectives of this study and test the model and hypotheses, SPSS 18 and AMOS 16 software help us analysis the collected data. This study applied non-probability and convenience sampling. The study was conducted in three regions as Southern, Central and Northern of Vietnam. A sample size of 605 was determined which satisfies the criteria for the statistical validity of the descriptive and SEM statistical techniques (Yurdugul, 2008). Data is collected using a self-administered questionnaire where the measurement of variables is based on existing measuring instruments. The form of questionnaire in this research applied a 7 point Likert scale (1= strongly disagree; 7= strongly agree). The questionnaire was test for validity and reliability by focus

group and was also done before collecting the data. Questionnaires were distributed both electronically using Google Drive document and questionnaire paper. The data for this study were obtained by an electronic survey distributed to Facebook, email, and face to face survey. The administration process took 15 days and produced 605 usable survey responses (176 paper & 429 electronic responses).

8. Results

Focus group

An instrument with variables and scaled draft items for the constructs of interest was developed theoretically through a focus group study. Based on their opinion debate, the variables and draft items were further revised and finalized. The results of the focus group: one variable (Perceived encouragement) with five scale items were deleted after focus group.

Descriptive analysis

This survey is a total of 629 collected responses, 24 invalid responses were eliminated and 605 responses were retained for analysis. The response rate is 96.18%. The basic attributes of responses are shown in this section, including seven major items in this study: gender, year of birth, education, job, residence, and social media usage. In the aggregate sample, 42.5% of respondents are males and 57.5% are females. 100% of them belong to the Generation Y, defined as people who were born between 1986 and 1995 and they all use social media. About 26.8% of respondents are from the North, 19.8% from the Central and 53.4% of them are from the South of Vietnam. Almost 81.3% of the respondents' education background is at college/university level and above. Of the respondents, 80.5% are students and 19.5% are workers and staff. The result showed that the mass majority of participants visit social networks every day. 424 respondents prefer to log in to social media site several times a day, accounting for 70.1%. Less frequently, 121 respondents access to social networks once a day with the figure constituting 20%. Only 3.8% of the respondents do not often visit those sites, to be specific one time over week.

The massive 92% of participants responded that it took them more than 15 minutes to scroll over their social networks. Only 7.1% of respondents spent under 15 minutes per visit. There are 282 respondents, who visit social media for over an hour each time making up 46.6% as can be seen in. Facebook and YouTube are the two most – visited sites. In this survey there are

97.19% and 69.09% respondents using Facebook and YouTube, respectively. In Vietnam, Twitter is not a popular site and only 70 respondents use this network, which is 11.57% of the total number.

Draft items measurable test

The first developed measurement reliability scales draft by Cronbach's alpha. 110 responses for draft scale test by pilot study used in reliability analysis shows the homogeneity of research questions. Under this framework, the alpha coefficients of the variables and survey form are as follows. Only item-measurable SM4 have corrected item-total correlation = 0.254 lower than 0.3 so it is not acceptable. Cronbach's alpha test for all item-measurable other are more than 0.6 and corrected item-total correlation more than 0.3 which is acceptable and all six variables exhibit high degrees of reliability (Nunnally, 1978., Peterson, 1994., Staler, 1995). The result measurement reliability draft scales shown in table 1.

Reliability and validity test

The measurement items are refined using Exploratory Factor Analysis (EFA) and poorly fitted items are excluded from the sales. In this study, extraction method Principal axis factoring with promax is used. The result showed that SM3, PEOU1, PEOU2, PEOU3, PEOU4, TL4, PB4 of the constructs are not acceptable because factor loading is less than 0.5. The results of the measurement model, which includes the standardized factor loadings, standard errors, construct reliabilities, and proportions of variance extracted for each construct are presented in (Table 2). Factor loadings of the indicators for each construct were statistically significant and sufficiently high to demonstrate that the indicators and their underlying constructs were acceptable. The reliabilities and variance extracted for each latent variable revealed that the measurement model was reliable and valid. Table 2 shows the result of factors loading the extracted reliabilities and variance ranged from 0.536 to 0.879 and Kaiser-Meyer-Olkin Measure of Sampling Adequacy = 0.919. Extraction sums of squared loadings = 52.45%, Bartlett's Test of Sphericity Sig = 0.000. The results of the factor analysis show that the dimensions proposed for each construct in table 2 have been demonstrated as acceptable. All of the factor loadings, ranging from 0.536 to 0.879, are greater than the conventional value of 0.50 (Hair et al., 2006). The domains of the constructs change significantly from the original conceptualization. The social media variable separated

into two variables, behavior intention to purchase variable and purchase decision variable merged into one variable.

The results of Confirmative Factor Analysis (CFA) show in figure 3 that an acceptable fit of the data ($\chi^2 = 416.962$, $df = 194$, $p = 0.000$, $\chi^2/df = 2.149$, $GFI = 0.942$, $TLI = 0.954$, $CFI = 0.962$, $RMSEA = 0.044$), values exceeding 0.9 and RMSEA values below 0.08 (Browne & Cudeck 1992). All factor loading are highly 0.5 significant on the expected constructs (Steenkamp & Geyskens, 2006). Together, these demonstrate adequate convergent validity of the measures. Composite reliable and variance extracted is calculated on the basis of standardized weights estimated in the CFA model.

Table 1: Results of Reliability Scales Draft Tests

Scale	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Cronbach's Alpha if Item Deleted
Social Media Usage (Cronbach's alpha = 0.708)				
SM1	22.5727	33.476	0.475	0.658
SM2	22.7364	33.425	0.520	0.644
SM3	22.8455	33.985	0.514	0.647
SM5	23.1909	35.514	0.426	0.673
SM6	23.6818	36.879	0.301	0.713
SM7	22.7909	34.626	0.418	0.676
Perceived Ease of Use (Cronbach's alpha = 0.734)				
PEOU1	19.4545	22.324	0.512	0.682
PEOU2	19.4818	23.224	0.562	0.663
PEOU3	19.6273	24.163	0.465	0.699
PEOU4	20.0909	23.735	0.528	0.676
PEOU5	19.6000	25.068	0.416	0.717
Perceived Usefulness (Cronbach's alpha = 0.784)				
PU1	19.2818	21.874	0.593	0.732
PU2	19.3182	24.127	0.579	0.739
PU3	19.3727	23.557	0.533	0.752
PU4	19.0364	23.558	0.596	0.733
PU5	18.9909	23.605	0.507	0.761
Trust (Cronbach's alpha = 0.820)				
TL1	11.8364	17.184	0.707	0.746
TL2	11.3636	18.178	0.543	0.820
TL3	11.6273	15.759	0.721	0.735
TL4	11.6182	18.220	0.611	0.788
Behavior Intention to Purchase (Cronbach's alpha = 0.729)				
BIP1	11.5182	17.646	0.515	0.671
BIP2	11.3545	16.800	0.573	0.637
BIP3	11.6182	16.440	0.588	0.627
BIP4	11.3545	17.680	0.412	0.734
Purchase decision (Cronbach's alpha = 0.687)				
PB1	10.4182	16.227	0.479	0.616
PB2	10.8545	15.722	0.500	0.602
PB3	10.6727	16.516	0.440	0.640
PB4	10.2455	15.655	0.460	0.628

The results in table 3 shows the values of composite reliable and variance extracted of variables were greater than 0.5 (Hair, 2000) except that the variance extracted of sharing information is 0.412 and purchase decision is 0.487 (less than 0.5), but still acceptable due to insignificant difference. Therefore, this variable has satisfactory reliability and variance extracted

aggregate. Cronbach's coefficient alpha reliability of the variables that have values greater than 0.6 scales should also meet the requirements of reliability coefficients. The correlation coefficient results show that P-value = 0.000 of each pair of variable different from the one at the 95% confidence level, the correlation coefficients are less than 1. Therefore, the variables gained valuable distinction.

Table 2: Exploratory Factor Analysis of Items Measurable

Item-measurables	Factor				
	1	2	3	4	5
BIP2	0.791				
BIP3	0.723				
PB4	0.674				
PB1	0.658				
BIP1	0.641				
PB2	0.641				
BIP4	0.635				
PB3	0.625				
PU1		0.780			
PU2		0.771			
PU3		0.691			
PU4		0.670			
PU5		0.651			
PEOU5		0.536			
TL3			0.639		
TL1			0.582		
TL2			0.539		
SM6				0.671	
SM7				0.647	
SM5				0.536	
SM1					0.879
SM2					0.680
Initial Eigenvalues	8.008	2.305	1.306	1.154	1.084
Kaiser-Meyer-Olkin Measure of Sampling Adequacy = 0.919. Extraction sums of squared loadings = 52.45%. Bartlett's Test of Sphericity Sig = 0.000					

Extraction method: Principal axis factoring. Attempted to 5 factors extract. More than 25 iterations required (Convergence = 0.04). Extraction was terminated.

Table 3: Composite Reliability, Variance Extracted, and Cronbach's Alpha

	Frequency Information	Sharing information on social media	Trust	Perceived usefulness	Intention & purchase decision
Composite Reliability (ρ_c)	0.764	0.676	0.797	0.858	0.883
Variance Extracted (ρ_{vc})	0.620	0.412	0.568	0.504	0.487
Cronbach's Alpha	0.887	0.855	0.793	0.675	0.760

Adjustment Conceptual Model

The domains of the variables change significantly from the original conceptualization. The social media variable is separated into two variables, while behavior intention to purchase variable and purchase decision variable merged into a variable. Deliverable (Figure 2) presents a conceptual model to analyze adjustments in the Conceptual model adjusted include five variables and 22 measurement items.

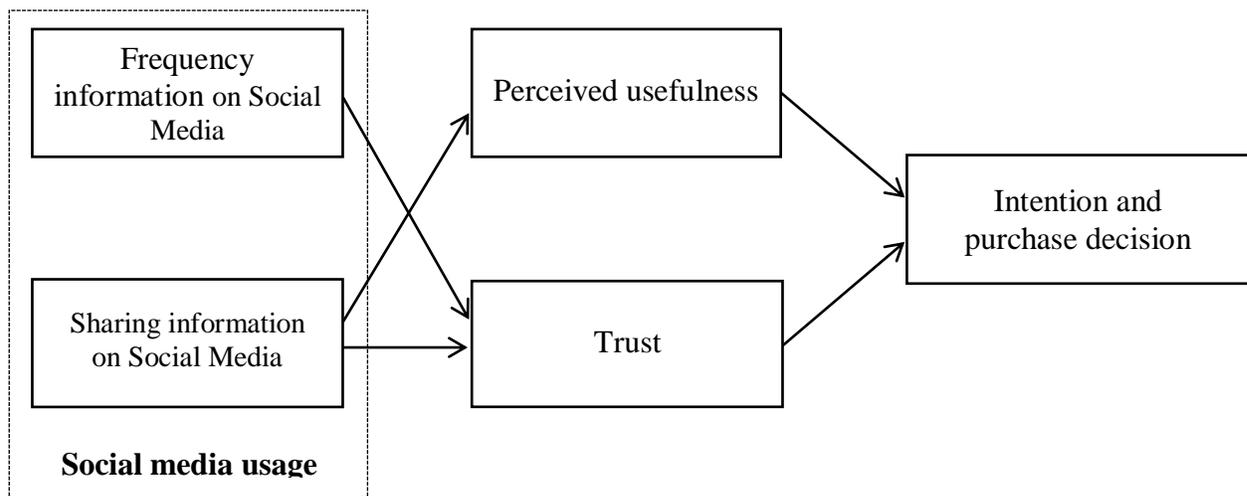


Figure 2: Conceptual Model Adjusted

Chi-square= 416.962 ; df= 194 ; P= .000 ;

Chi-square/df = 2.149 ;

GFI= .942 ; TLI = .954 ; CFI =.962 ; RMSEA =.044

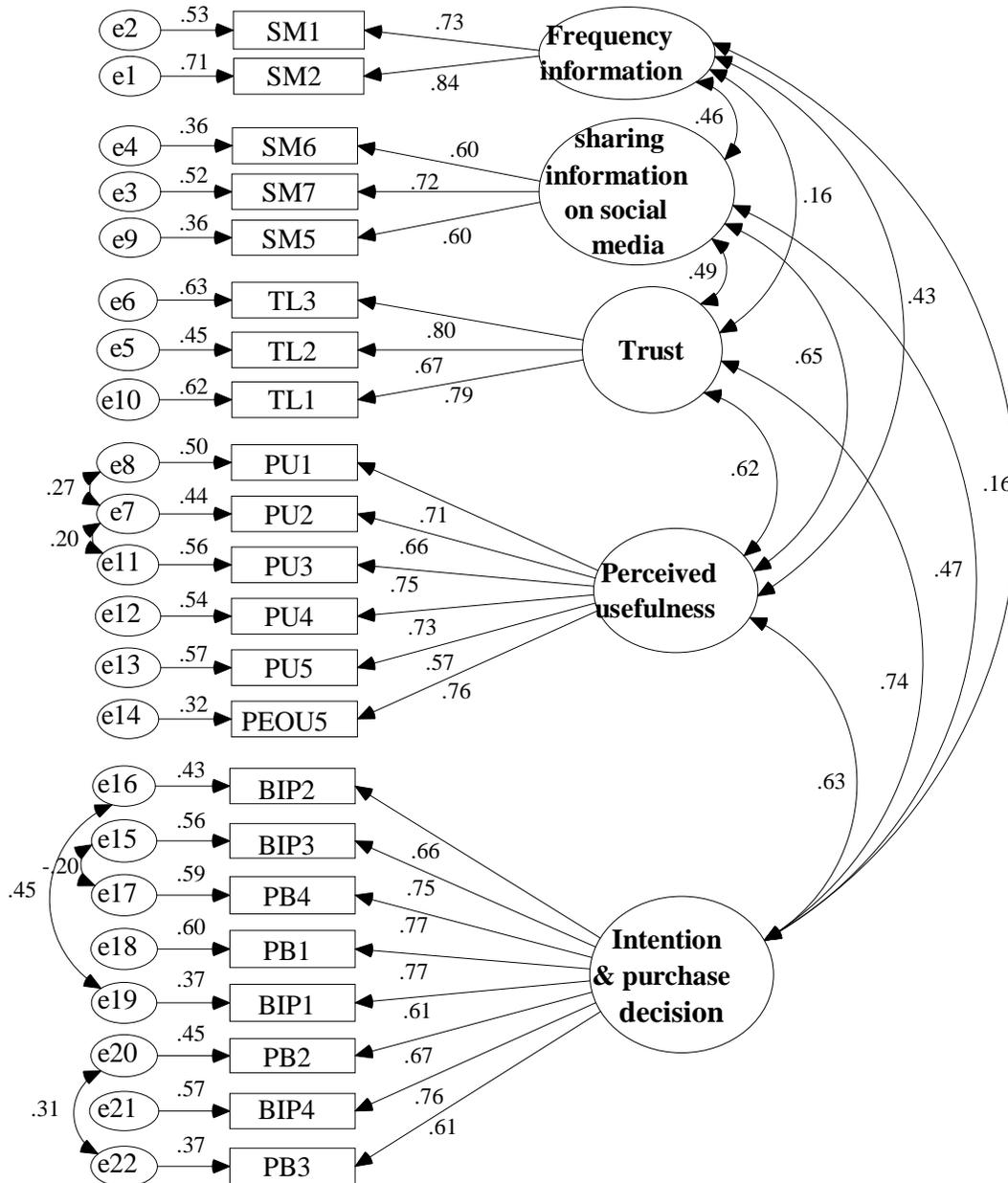


Figure 3: The Standardized Result Confirmative Factor Analysis

Structural Equation Model (SEM)

This study aims to identify the relationships among frequency information, sharing information on social media, perceived usefulness, trust and intention & purchase decision. To achieve this objective, the SEM is employed to test the interrelationships among all the research constructs, and to compare the modelled relationships with the observed scores. The proposed structural equation model second order is shown in Figure 4. The likelihood ratio chi-square test assesses the overall model fit. Chi-square is significant in this case ($\chi^2 = 474.988$, $p = 0.00$). $\chi^2/\text{degree of freedom (CMIN/DF)} = 2.399$, satisfying the recommend < 3 criterion for a good fit. Other indices of model fit including all exceed the recommended threshold level of 0.9 (GFI=0.934, NFI=0.921, IFI=0.952, TLI= 0.944, CFI= 0.952). The root mean square error of approximation (RMSEA) describes the discrepancy between the proposed model and the population covariance matrix. RMSEA is 0.048, below the recommend < 0.08 level (McKnight, Choudhury, & Kacmar, 2002; Gefen, Straub, & Boudreau, 2000). Thus the overall model has a good fit. Therefore, we could proceed to examine the path coefficients of the structural model. Results are presented in table 4, the parameters in the SEM model for the P-value are less than 0.05 so the relationships are significant in the model. Sharing information on social media is positively correlated to the perceived usefulness with standardized estimate is 0.783. Sharing information on social media is positively correlated to Trust (standardized estimate = 0.756). Frequency information on social media is positively correlated to Trust with standardized estimate is -0.239. Trust is positively correlated to intention & purchase decision (standardized estimate = 0.573). Perceived usefulness is positively correlated to intention & purchase decision (standardized estimate = 0.302).

Bootstrap Estimate Model

To assess the reliability of estimates of the quantitative research method this study using sampling methods. Because the sample is not large in terms of linear analysis, the study used bootstrap methods (Schumacker & Lomax, 2004) with the number of repeat samples $N = 1000$ to estimate the model in practice. The estimation results are averaged together with the bias are presented in table 5. The CR (bias/SE- bias) absolute value is less than 2.0 should be able to say that the bias is very small, not statistically significant at the 95% confidence level. And thus, we can conclude that the estimates in the models (Figure 3 and Figure 5) can be trusted and fit.

Table 4: Regression Weigh in SEM Model (Second Order)

Parameter		Standardize d Estimate	Unstandardized				
			Estimate	S.E.	C.R.	P	
Perceived usefulness	<---	Sharing information on social media	.783	.674	.061	10.975	***
Trust	<---	Sharing information on social media	.756	.738	.081	9.137	***
Trust	<---	Frequency information on SM	-.239	-.191	.054	-3.719	***
Intention & purchase decision	<---	Trust	.573	.659	.064	10.298	***
Intention & purchase decision	<---	Perceived usefulness	.302	.395	.061	6.487	***

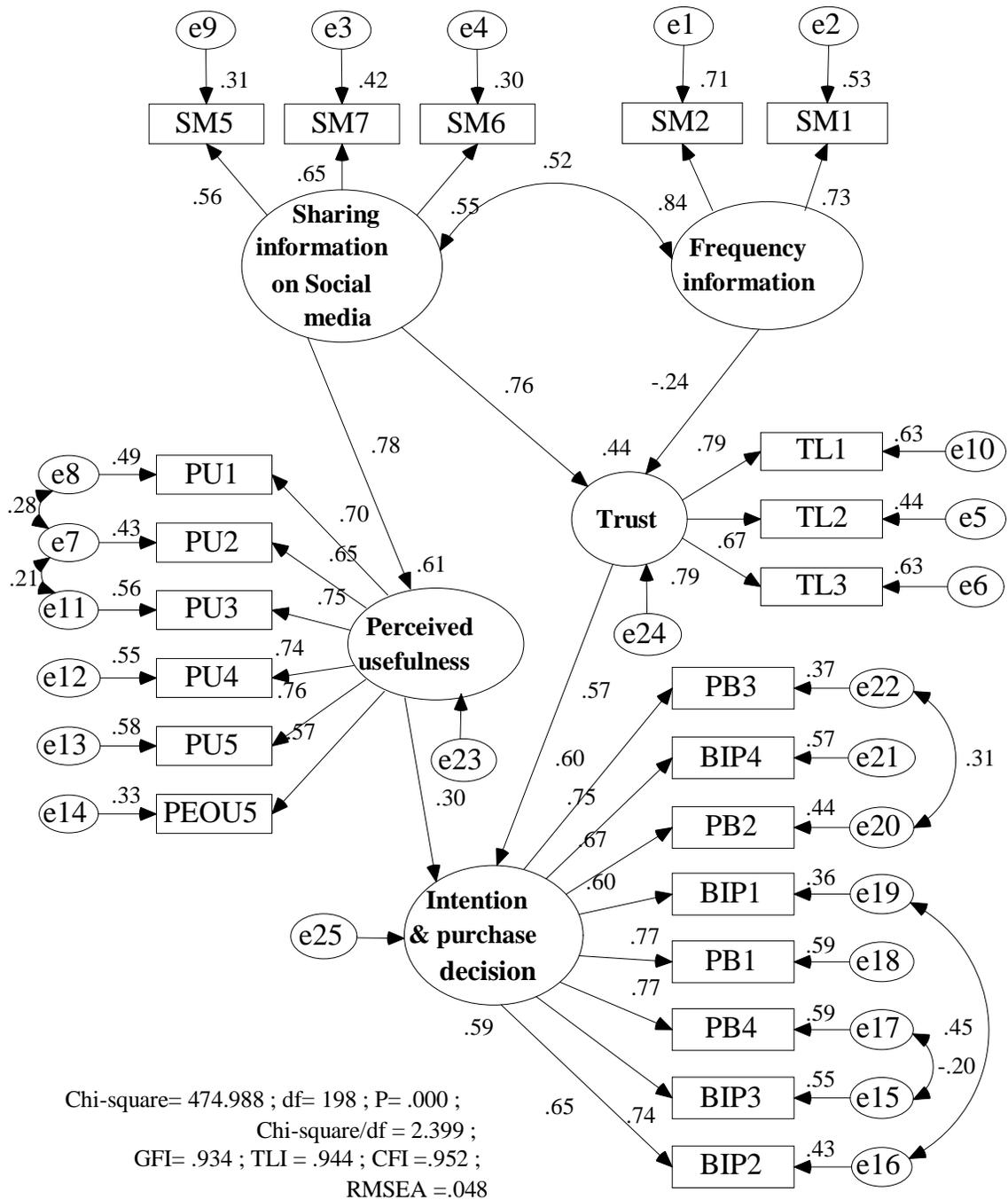


Figure 4: SEM Analysis of Conceptual Model (Second Order)

Table 5: Bootstrap Estimate Model

Parameter			Estimate	SE	SE-SE	Mean	Bias	SE-Bias	CR
Perceived usefulness	<---	Sharing information on social media	.783	.042	.001	.785	.002	.001	2
Trust	<---	Sharing information on social media	.756	.068	.002	.754	-.002	.002	-1
Trust	<---	Frequency information on SM	-.239	.074	.002	-.239	0	.002	0
Intention & purchase decision	<---	Trust	.573	.055	.001	.577	.004	.002	2
Intention & purchase decision	<---	Perceived usefulness	.302	.052	.001	.299	-.003	.002	-1.5

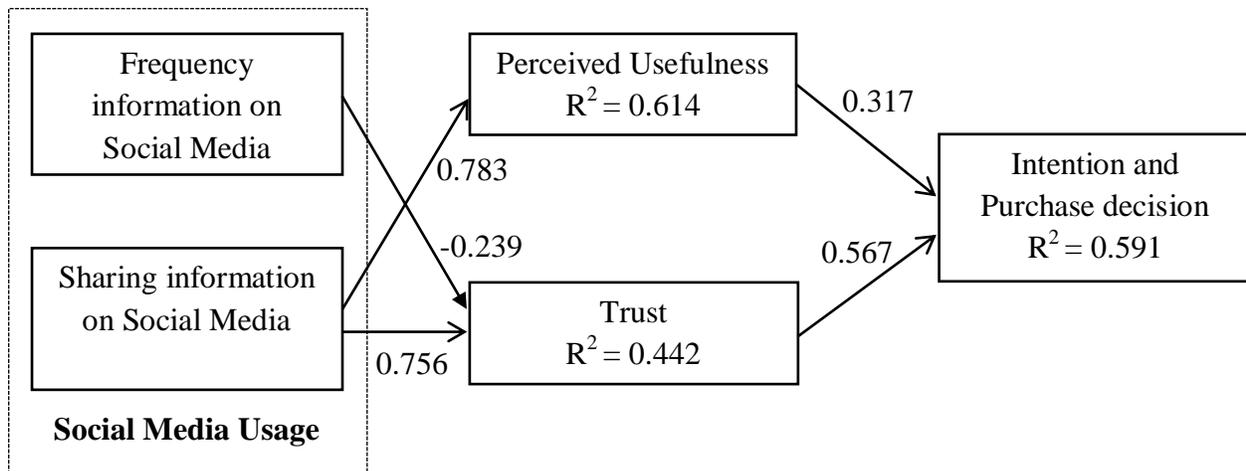


Figure 5: Final Model

The final model fit statistics indicate that the overall variables were supported. All the hypotheses paths were significant except three, with significant at less than the $p < 0.01$ level.

Overall, all the path coefficient-related hypotheses were supported. The social media usage factor (frequency information and sharing information on social media) explained over two thirds of the variance in perceived usefulness ($R^2 = 0.545$). Sharing information on social media explained 60.3% of the variance in trust ($R^2 = 0.364$). The perceived usefulness and trust explained 88.4% of the variance in intention and purchase decision ($R^2 = 0.594$). The final model posited that social media usage (frequency information and sharing information on social media) impact on intermediate variables (trust & perceived usefulness) and thereby impact on intention and purchase decision.

Table 6: Conclusions Hypotheses

Hypotheses	Correlation
H1 Social media usage (frequency information and sharing information) will be positively related to perceived ease of use.	Reject
H2 Social media usage (frequency information and sharing information) will be positively related to perceived usefulness.	Positive, significant
H3 Social media usage (frequency information and sharing information) will be positively related to trust.	Positive, significant
H4 Perceived ease of use will be positively related to intention & purchase decision.	Reject
H5 Perceived usefulness will be positively related to intention and purchase decision.	Positive, significant
H6 Trust will be positively related to intention and purchase decision.	Positive, significant
H7 Behavioral intention to purchase will be positively related to intention and purchase decision.	Reject

Multiple Group Analysis

Structural analysis method for multi-group analysis compares models according to a group of qualitative variables. In this study, those comparison showed the impact of social media usage compensation to purchase decision following time to visit, between two group: “more 1 hour per visit” and “ \leq 1 hour per visit”. The result show that goodness of fit statistics variance model

excellently fit the data indicated by the chi-square = 755.757; df = 396; chi-square/df = 1.908; RMSEA = .039; and GFI = .900; TLI = .929; CFI = .939; IFI = .940; AGFI = .872. Results indicated by the goodness of fit invariance model were chi-square = 768.145; df = 401; chi-square/df = 1.916; RMSEA = .039; and: GFI; TLI; CFI; IFI; AGFI; (.898; 928; 938; 938; 871) value, respectively. The results of tests are suggested that there was not statistically a significant change in chi-square ($\Delta\chi^2 = 12.388$; $\Delta df = 5$). The p-value = .0298 ($< .05$) were statistically significant indicating that the hypothesis of invariant model not be excepted. Therefore, variance model was selected. The results show that there is a difference in the relationship between frequency information, trust between (more than 1 hour per visit) and (≤ 1 hour per visit) groups. With the (more than 1 hour per visit) group, frequency information did not affect trust because P-value = .136 ($> .05$). But the (≤ 1 hour per visit) group, frequency information influenced trust (P-value < 0.05).

9. Conclusions and suggestions

Conclusions:

The aim of this study was to identify the impact of social media usage, perceived usefulness and trust to intention and purchase decision. Based on the SEM model and final model described in this study, there are some primary conclusions: The results of this study showed that the impact of social media usage involves two influences (frequency information and sharing information) to perceived usefulness and trust. However, frequency information only affects trust while sharing information effects to perceived usefulness and trust. Intermediate variables (perceived usefulness and trust) are positively related to intention and purchase decision. This study also found an interesting discovery that sharing information on social media and trust variables has an impact on intention and purchase decision more than frequency information and perceived usefulness. There were differences between “ ≥ 1 hour per 1 visit” group and “ < 1 hour per visit” group. Frequency information on social media was not effective to build trust for “ ≥ 1 hour per 1 visit” group but was effective to build trust for “ < 1 hour per visit” group. This results proved that time access on social media and frequency information on social media are important factors, which influence the purchase decision.

Research limitations and future research

There are several limitations of this research that should be considered when interpreting its findings. We did not research multiple group analysis, such as effects of male and female;

Southern, Central and Northern. This limitation of the study would be an interesting topic for future research.

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