



Does social media browsing and usage intensity impact impulse purchase behavior of consumer? A moderating role of gender in f-commerce impulse purchase

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Abstract- With the emergence of web 2.0 and enhanced familiarity of social media, an innovative form of e-commerce has been emerged known as Facebook commerce (f-commerce). Numerous researches are conducted to evaluate the factors that influence the social media browsing and intensity of usage, however, few researches are available that evaluate the influence of social media browsing (specifically Facebook) and usage intensity on impulse buying and how these factors urge consumers to purchase. Moreover, current study examines the moderating effect of gender as well. Utilizing the SOR (Stimulus-Organism-Response) paradigm, quantitative analysis was performed on the data collected from Facebook users selected randomly. Most of the proposed hypotheses were statistically significant. Moreover, gender significantly moderates the relationship between urges to purchase and impulse buying. The results of current study can provide guidelines to the online business marketers in formulation of their social media policies and strategy and develop an understanding about the impulse purchase behavior of consumers.

Keywords: Facebook commerce, SOR (Stimulus-Organism-Response), impulse purchase

I. INTRODUCTION

The development of the social media web sites as well as web technology mentioned as web 2.0 has developed a new concept of e-commerce which is recognized as f-commerce (Facebook-commerce). This progress has radically enlarged the targeted customers by experiencing the massive populace regarding the social media marketing users. Nonetheless, numerous dissimilarities prevail among f-commerce and e-commerce. From the perspective of marketing, the primary concern of e-commerce is to enhance efficiency in shopping through advanced search, provision of catalogues of products, single click purchases and recommendation of products. While the focus of f-commerce on online shopping is secondary in nature because it is primarily focusing on social activities including sharing, collaboration and networking (Huang and Benyoucef 2013).

With regards to customer control, consumers ordinarily communicate individually and separately with websites of e-commerce because these websites are being controlled by the companies and don't allow the discussion on it. While with the help of web 2.0, f-commerce allows the customer with the blessings of real time involvement that empowers them and provides control on their sentiments which ultimately eliminate the physical distance among customers and organizations (Constantinides and Fountain 2008) however, their choice is depending not only the information provided by the seller but also the consumer ratings and User Generated Contents (UGC) which ultimately provide an additional value to the organizations (Hajli 2015; Hajli and Sims 2015).

E-commerce typically provides one-way communication, as consumer's views are not available to other potential buyers. On the other hand, f-commerce enables consumers to collaborate each other and share information and experiences freely that ultimately provides guidance for potential customers and help them in their purchase decisions. Hence, the sentiments provided in the form of UGC provide tremendous strength to consumers just because of Facebook that provides better decision-making options to consumers. Personal stimuli worth more in consumer purchase decision than those of the conventional marketing messages (Kotler et al. 2018), therefore consumer conservation on Facebook, their referrals and recommendations impact significantly on purchase decisions of consumers as compared to marketing stimuli.

Social media supports many organizations to carry out business around the world (J. V Chen, Chen, and Yang 2008). For example, Knoll (2016) reported that social media has obviously become an integral part of human life, especially for Internet users. As per eMarketer (2017), by the end of 2021, about 3.02 billion people around the world's Internet users will have access to social networking sites. Other reports show that over 1.3 billion Internet users watch video on YouTube every month (IQBAL 2020). At the

corporate level, social media use among the fortune 500 companies surged in 2018 (UMass 2019), with 91% of corporate users using Twitter, 89% of corporate users using Facebook, and 77% corporate users using YouTube. There is evidence that these Numbers are rising every year (McCann and Barlow 2015). Whitelock et al. (2013) believe that this continuous growth means the long-term trend and/or norms of social media use by enterprises (and personal brands). Therefore, social media has become a prime platform for enterprises and consumers to trade and connect with each other in a beneficial and mutually valuable way (Kumar et al. 2016).

Social media, known as "user-generated communication", has revolutionized the strategies and tools used by multiple organizations (Michaelidou, Siamagka, and Christodoulides 2011) to communicate with their customers, who have a strong influence on control of information. In fact, Mangold & Faulds (2009) refer to social media as a new element of the promotional mix with hybrid nature. It has been reported that more than 2.60 billion monthly active Facebook users (Statista 2020) spend an average 20 minutes per day (Brandwatch 2019), while there are 326 million monthly active Twitter users send 500 million tweets per day (Omnicores 2020). The third most prominent social media is Instagram which has about 1 billion monthly active user who hit like button 4.2 billion times per day (Adespresso 2019).

Facebook has exploded tremendously for the last ten years and this has helped to create a wide social interaction that ultimately leads towards social capital building, word-of-mouth marketing and advocacy of countless brands (Jin 2013). Organizations are employing Facebook for multiple purposes such as community building for the creation of conversations while increasing fan base; for advertising and marketing to increase awareness of sales or upcoming events; and in addition to promote to improve brand name understanding. As per the findings provided by (Ng 2013), the usage of f-commerce can be divided into two ways: 1) lead to company website, 2) direct purchase from Facebook. The first type of usage is utilized by the organizations who have their Facebook fan pages and being the actual and potential customers to their parent website (e.g., HBL, Daraz, Agoda etc). while the second type of usage is utilized by the firms who directly selling products through Facebook store to the prospective buyers (e.g., Watson Malaysia, Hallmark, Groupon USA etc). The primary objective of the former companies is to enhance the consumer engagement and provide communication to their customers in an interactive way, so the followers can like comment and share the company information among friends.

Till this time, from the perspective of academia, very few studies have incorporated the concept "f-commerce" which ultimately needs to be addressed appropriately because of the deficiencies available in current literature. Former studies (e.g., Chung, Song, and Lee 2017; Kang and Johnson 2015) have not scientifically formulated and rigorously validated their studies through renowned methodological ways like Q-sort, expert panel reviews and index of content validity etc. Few of the researchers have incorporated the assumptions of multicollinearity and normality to enhance the significance of their research including the study of (Sukrat, Papasratorn, and Chongsuphajaisiddhi 2015; Leong, Jaafar, and Ainin 2018), while the other studies have not considered these multivariate assumptions and Common Method Bias (CMB) except Chung et al. (2017). Hence, there is a gap available in literature that need to be narrow down through intensive insight and comprehensive understandings of explained variable (Impulse purchase) specifically in the context of f-commerce. That will ultimately help the e-retailers, online marketers in development of successful marketing policies and strategies

II. LITERATURE REVIEW

2.1 F-commerce (Facebook Commerce)

F-commerce currently have various definitions. Shin (2013) defined F-commerce as a social network service that facilitates social interaction and user contributions to perform online transactions. F-commerce is like a subcategory of social-commerce that utilizes Facebook. It is all about to support online selling and buying of service and products.

As per Market Business News (2017), in the online business world, the term f-commerce is considered that mainly focuses on the development and design of storefront websites and content within the Facebook social networking website i.e. Sales of goods and services within Facebook.com. Technopedia (2017) defined f-commerce as e-commerce that is facilitated by social media networking website Facebook and where various transactions can occur on a page of Facebook or even through the use of Facebook Open Graph Protocol that integrates third-party websites with the website of Facebook.

In addition, Gartner (2017) defined f-commerce as a provider of retail transaction capability within the Facebook. This process is facilitated via Facebook APIs that enable the retailers to not only inform, show various deals to customers but also enable the customers to perform transactions while using Facebook. Further, as per the opinion of Menon et al. (2016), the f-commerce is a form of social commerce where Facebook is used as a platform for the purpose of execution and facilitation of sales transactions. The

recent definition of f-commerce is a subgroup of social commerce where commercial and business activities are performed via the use of Facebook and the transactions involving buying and selling of goods and services can be performed on the page of Facebook or on any third party website (Leong, Jaafar, and Ainin 2018). Current study continues discussion by keeping this definition of f-commerce.

2.2 Related literature

Many researchers have conducted studies related to f-commerce. Chung et al. (2017) conducted a study on eatery products and he investigated the impulsive purchase behaviors via social media. They found impulsiveness as an important predictor of utilitarian and hedonic shopping values and urge to buy impulsively. Scarcity was found as a moderator for the associations between utilitarian & hedonic shopping values and impulsiveness whereas serendipity was found moderating only the association between utilitarian shopping value and impulsiveness. This research only considered two factors of situational nature namely serendipity and scarcity while various other factors which may affect the urge of consumers to buy the various products of restaurants via social commerce were ignored. These factors may include food-related factors like types of pictures of restaurants, social commerce related like convenience, brand related like recognized brands. The authors have used process theory. Here output was the urge to buy impulsively, however. J. V. Chen et al. (2016) examined the influence of impulsiveness trait, information quality of ad and the amount of “likes” on consumers' UBI (urge to buy impulsively). For this study. Online field experiment was conducted by using the Latent-State-Trait Theory, observational learning, heuristic information processing and herding effect. The findings revealed that all of the six-text information quality had significant effects on urge to buy impulsively of the consumers. Further the amount of “likes” and impulsiveness had positive influence on urge to buy impulsively of the consumers. The unnatural setting of experiment might be a factor limiting the validity of the findings of this study because it is quite possible that participants of the study may not have provided their real response. Another limitation of this study was that this study used UBI as a proxy and did not measure actual impulse buying behavior.

Suraworachet et al. (2012) in a study conducted in Thailand to examine the influence of various attributes of Facebook like attitude towards f-commerce, beliefs in specific Facebook's attributes, f-commerce purchase intention, perceived ease of use in fan page. The perceived ease of use and attitude were found having direct influence on the purchase intention. Further the belief in individuals who like a fan page, a photo of any item posted by various other users and Facebook page had direct effect on purchase intention. The question of the accuracy of findings may be raised as only mock-ups scenarios were engaged and no real complete f-commerce transactions were involved in this study.

In a pilot study conducted by Sukrat et al. (2015) for the validation of the usage of Facebook as the online platform for farmers for the trade of rice. This study found that only perceived benevolence had positive effect on trust among farmers whereas information quality was found having positive influence on trust in Facebook. Both the trusts were found having significant effects on the intention of purchase. The validity of the result may be doubtful because of the convenience sampling technique used by the researcher as well as due to the sample size of 37 that is quite nominal.

Kang & Johnson (2015) used the purposive sampling to study online shopping intention for apparel via Facebook. For this study various personality traits extracted from “Meta-Theoretic Model of Motivation and Personality” model (Mowen 2000) were used. The traits engaged were surface, elemental, compound and situational. The results indicated that socializing gratification and information seeking gratification had positive effect on intention of shopping. Social browsing and market mavenism significantly influence intention of shopping and socializing gratification whereas social browsing was found positively affecting the information seeking gratification. The variable of value consciousness was found having positive effect on information seeking gratification intention of shopping. Arousal needs was found having positive influence on social browsing whereas openness to experience was found having positive effect on market mavenism.

Lastly, material resource needs was found having positive association with value consciousness, market mavenism and social browsing. The limitation of this study was that this study recorded the response of Facebook users who were also online social shoppers with age range from 18 years to 44 years while the responses of non-social users were ignored. Therefore, it will not be appropriate to generalize the findings.

From the review of available literature, it can be concluded that there a very few researchers who have conducted research to investigate impulse purchase behavior among the f-consumers. There exists a scarcity in research that may have examined the effects of Facebook browsing and usage intensity on f-

consumers' urge to purchase and impulse purchase. We can see that much social commerce researches have focused on intention to buy rather than impulse buying.

Further, there are studies available on browsing of Facebook (Lin and Utz 2015) and usage intensity (Pöyry, Parvinen, and Malmivaara 2013), but these studies ignored to examine f-commerce browsing and usage intensity and their resulting effects on urge to purchase and impulse purchase among f-consumers.

2.3 F-commerce (Facebook Commerce) browsing and usage intensity

The purpose of development of web browser is to provide the consumers a way where they can buy goods and services in a convenient and efficient way without going to physical markets. (Overby and Lee 2006). Web browsing provides the consumers a way where they can extract required information about desired products and services and then make purchases (Rowley 2002). Smith & Sivakumar (2004) opined that majority of the consumers widely rely on the information gathering through web browsing while they are doing online shopping. Though the web browsing is time consuming yet it is helpful in the reduction of risk that is associated with online shopping (E. J. Park et al. 2012a; Goic, Jerath, and Kalyanam 2020). Most of the earlier studies have assumed that the consumers browse in traditional brick and mortar stores but the browsing in online stores is quite difficult from the browsing in physical environment (Bloch, Ridgway, and Sherrell 1989). Whether the consumers make online purchase or not, yet they browse online to get information regarding wide range of products for the purpose of enjoyment (Rowley 2002; Smith and Sivakumar 2004). Online stores browsing provides the consumer attractive design and colorful display of products as well as special deals and these features may instigate the consumers to make online purchase (Rowley 2002).

Increased duration of exposure results a rise in the potential effect of the products or services and this forces the consumer to think how much quantity of that particular good or service they need to buy (Jarboe and McDaniel 1987). Browsing results in sudden and unplanned behavior of buying. As the consumers starts browsing, they feel a powerful and abrupt urge to make online purchase (Rook 1987). Further, Bellenegeer et al. (1978) endorsed that browsing is the justification of sudden and unintended type of behaviors.

Rook (1987) found that when the customers view a list of products online, they feel a strong and abrupt urge to buy those products. The more time they spend on browsing any product, the more they become fond of those products and this experience of excitement leads towards impulse buying (Alonso-Dos-Santos, Alguacil Jiménez, and Carvajal-Trujillo 2019).

Bijari et al. (2013) believe that there are multiple self-reported scales to gauge the usage of Facebook usage. These scales focus on the users' spent time on Facebook that is measured on daily or weekly basis, number of people added as friends at Facebook, number of Facebook groups' membership and various activities on Facebook like reading and writing posts using the adoption of uni-dimensional measures. Ellison et al. (2007) presented a Facebook usage intensity scale for gauging the usage of Facebook. This scale contains the number of people added as friends, per day spending of time on Facebook and various supplementary items regarding the users' engagement and connection with Facebook.

Further Ross et al. (2009) also presented an instrument having twenty-eight items related the usage, attitude and user profile of Facebook. Meanwhile Ryan & Xenos (2011) presented an instrument having eighteen items related to usage of Facebook and preferred attributes of Facebook.

2.4 Impulse purchase behavior in f-commerce

The dominance of information technology and online channels has boosted the impulse purchase behavior among consumers because this dominance has not only eased the access of consumers to view goods and services by staying at home but also facilitated the payment process that has ultimately resulted in convenience and safe online transactions (J. V. Chen, Su, and Widjaja 2016). There exists widely consensus among the scholars that impulse purchasing is a result of lack of planning (Vonkeman, Verhagen, and van Dolen 2017). Like Chung et al. (2017) opined that unintended, unplanned and spontaneous causes impulse purchase. Usually it is observed that majority of people use Facebook for the connectivity and interaction with friends and other people or even for various brands liked by them. In this way, they are exposed with stimuli that may ultimately results an impulse purchase. Since while shopping online, physical money is not being handed over so most of the e-shoppers overspend (Wu et al. 2020). The stimuli creating due to e-marketing has made the purchasing easier (E. J. Park, Kim, and Forney 2006).

III. DEVELOPMENT OF HYPOTHESES

In a study conducted by Jarboe & McDaniel (1987) it was found that in the premises of a mall, the people browsing for longer period made more unplanned nature of purchases as compared to the people with short period of browsing. The reason behind was that the people browsing for longer time, were likely to experience more stimuli that leads towards the tendency of impulse buying urge. Rook (1987) found that consumers face severe situation to repel the urge after their encounter with a product. After the happening of this craving situation, the point of reference of consumer changes (Hoch and Loewenstein 1991). Hence, the in-store browsing creates an immediate urge to purchase and this urge is very difficult to resist because of the physical proximity of that particular item. Rowley (2002) found that consumers while browsing websites interact with attractive design of products and special deals offering discounts and these might lead the consumer towards real purchase decision. In a study conducted by Koski (2004), it was also found as more the consumers browse the store, there are more chances that consumers will make impulse purchase (Xu, Zhang, and Zhao 2020). Likewise, while browsing the f-commerce pages, the f-consumers (Facebook consumers) face multiple marketing stimuli and these stimuli trigger impulse buying. The way the products are displayed, presented and the information regarding products is portrait, influences the impulse intentions (Adelaar et al. 2003; Martínez-López et al. 2020). Further, Verhagen & van Dolen (2011) asserted that there exists a positive relation between browsing of web and urge to buy online. Using above arguments, the following hypothesis can be formulated:

H1: Browsing of F-commerce positively effects on urge to purchase behavior of consumer

Since the online f-consumers can shop without time limit. This f-commerce flexible attribute empowers the users to perform online browsing and shopping with great ease. This provides the f-commerce an edge over the brick and mortal model of business and they can frequently browse their favorite pages on Facebook. There exists a positive relationship between the frequency of browsing Facebook pages and enticement of consumers by any particular item. So, it can be said that chances of the development of urge or feelings to buy increase due to the higher intensity of Facebook. Positive mood of consumers towards f-commerce enhances their likelihood to use Facebook pages intensively (Assadam 2020). (Beatty and Ferrell 1998) found that positive mood of consumers and urge to purchase impulsively were having correlated relationship. Furthermore, Gonzales & Hancock (2010) claimed that social networking might enhance self-esteem of individuals. Further, (Wilcox and Stephen 2013) found that the use of online social network like Facebook etc. enhances the self-esteem and this higher self-esteem may decline an individual's self-control that as a result would lead towards impulsive behavior. Higher usage of social media might direct the individuals towards making irrational kind of choices and causing in increase in expenditures (Farah and Ramadan 2020). Therefore, we can develop the following hypothesis:

H2: Usage intensity of F-commerce positively influences the urge to purchase behavior of consumer

Gerbing et al. (1987) found that three behavioral mechanisms are the base of impulsiveness and these three behavioral mechanism include "spontaneity" that is avoiding preparation, seeking of excitement, "carefree" that is basically the careful behavior, "not persistent" that is avoidance of complication, distractibility. Weinberg & Gottwald (1982) stated that the feeling of the urge to buy impulsively is a state of desire that is result of encountering an object in the given environment. Leong et al. (2017) in his opinion stated that urge to purchase influences on impulse purchase. So it can be derived that higher urge to purchase leads towards higher tendencies to engage in impulsive purchase. Hence, the below hypothesis can be formulated:

H3: Urge to purchase positively influences the impulse purchase behavior of consumer

Madhavaram & Laverie (2004) found that web browsing had significant effect on impulse purchase. They opined that browsing is a situational factor that acts as predictor for purchase among the consumers. Various researchers like (Wiranata and Hananto 2020; Kempa, Vebrian, and Bendjeroua 2020; e.g., Amos, Holmes, and Keneson 2014) found that impulse purchase is particularly linked with browsing for products that are fashion related. Lee & Lee (2003) discovered that hedonic browsing influences positively on impulse purchase behavior. E. J. Park et al. (2012) found that browsing of web had significant influence on impulse purchase in online websites of clothing related products. Hence, the following hypothesis can be formulated:

H4: F-commerce browsing has positive influence on impulse purchase behavior of consumer

According to Gonzales & Hancock (2010), self-esteem of users and their engagement can be derived though the application of social networking sites (SNSs) i.e. Facebook and the users of such websites have control over the information shared by them so there are more chances that the users will provide

positive information with their friends (Assadam 2020). Beatty & Ferrell (1998) found that the positive information usually results in positive responses which cause an enhancement in self-esteem and the ultimate affects are the generation of positive social benefits and wellbeing. Recent studies (Wilcox and Stephen 2013; e.g., Dhandra 2020) affirmed that the higher level of self-esteem due to the use of social networking site could cause the decline in user's self-control and this lower self-control will lead towards behavior that is more impulsive. Hence, we can anticipate that the level of impulse purchase is directly related to usage intensity that mean more the usage intensity, the more impulse purchasing. Therefore, the following hypothesis is formulated:

H5: Usage intensity of F-commerce has positive influence on impulse purchase behavior of consumer

Moderating effect of gender

Gender plays an important role in consumer buying behavior. Numerous researches have evaluated the effect of gender as moderator on the consumer buying process. According to theory of empathizing-systemizing, significant gender differences are available in systemizing and empathizing. Female are dominated emotionally in their psychology and behavior as compare to men. Male consumers are cognitively dominating (Baron-Cohen 2016). Recent study shows that consumer perceived relative advantage and habit are effected by gender (Ameen and Willis 2019). Moreover, impulse purchase decision of consumer is also dominated by gender difference (H. R. Park 2010; Gutierrez 2004). Therefore, we formulate the following hypotheses:

H6: Gender moderates the relationship between urges to purchase and f-commerce impulse purchase.

H7: Gender moderates the relationship between f-commerce browsing and f-commerce impulse purchase.

H8: Gender moderates the relationship between f-commerce usage intensity and f-commerce impulse purchase.

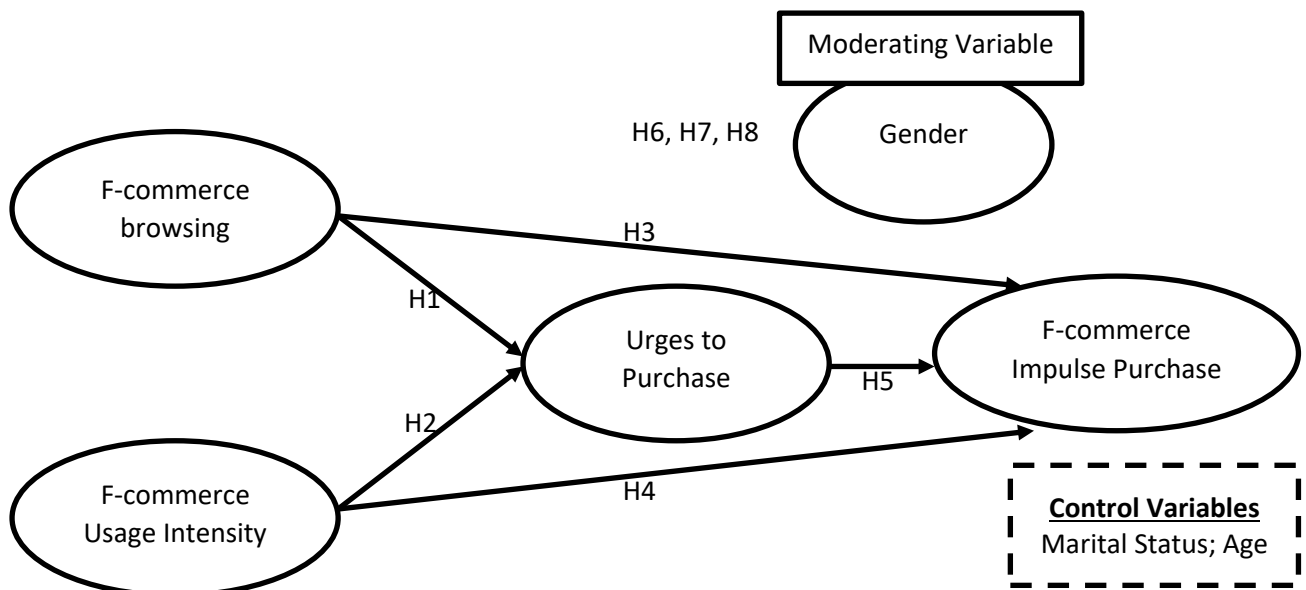


Figure 1 The Theoretical Framework

Seven-point Likert scale was used to reduce the neutral response and enhance the degree of dispersion for the measurement of study variables. However, large scales may confuse the respondent but these is more useful in exactly discriminating the opinions Bass et al. (1974) by minimizing the impreciseness than 5-point Likert scale (Burns, Bush, and Sinha 2014). Therefore, all variables were measured at 7-point Likert scale ranging 7 = strongly agree to 1 = strongly disagree with 3 as neutral point. All variables are adopted from published researches to ensure the construct and content validity. Moreover, a panel of three academic experts ensured the face validity of the instrument. All variables have the value of Cronbach's alpha significantly higher than the threshold level of 0.70 that confirms the construct reliability (Wong et al. 2016). Appendix-I shows the variable items and the origins from they were extracted.

Data collection

The population of current study are the adult f-commerce users living at district Bahawalnagar. The target respondents have purchased at least once in past one year in the study area using the Facebook. The selection of this population justifies that these consumers have the buying power as well as f-commerce accessibility. A self-administered questionnaire is used to collect data from social media users who have purchased online at least once from Bahawalnagar district, Pakistan. Purposive sampling technique has been used for data collection with sample size of 254.

Data analysis

Path analysis was used following the study of Anderson & Gerbing (1988) to measure the discriminant and convergent validity to evaluate the quality of instrument by assessing the structural model ((Hafeez et al., 2018; Hameed et al., 2019; Muneer et al., 2019; Nisar et al., 2021; Nuseir et al., 2020; Zahra et al., 2019; Asada et al., 2020; Yan et al., 2020). To accomplish the purpose of current study, Structural equation modelling technique was applied to measure the results in AMOS. The value of CMIN/DF is 2.789, CFI is 0.951, NFI= 0.922, RMSEA is 0.057 and Pclose value is 0.029 showing the good fitness of the structural model. Interaction term among the explanatory variables and moderator was used to evaluate the moderating effect of gender.

Common method bias (CMB)

Multiple remedies have been utilized to evaluate the CMB problem including procedural and statistical remedies (Podsakoff et al. 2003). Respondents were informed that there is no wrong or correct option, you just have to provide your appropriate option candidly and your responses will kept confidential as a procedural remedy. Harman's single factor was used to measure the CMB problem as a statistical remedy. The result showed that 35.7% of the variance is explained, confirm the absence of CMB (Hew and Syed A. Kadir 2017).

IV. RESULTS

Measurement model

Table-1 shows the values of average variance extracted (AVE). All the AVE values are larger than the threshold level of 0.50. Discriminant validity has been confirmed by following the Fornell-Larcker's criterion that all the square-roots of AVEs are greater than their respective correlation values (Hew and Kadir 2016). Moreover, construct reliability has been approved by measuring Cronbach's alpha and composite reliability which are larger than 0.70.

Table 1 Discriminant validity, Convergent validity, construct reliability and R-square

	FCB	UTP	FCUI	FCIP	CA	AVE	CR	R ²
FCB	0.775				0.747	0.600	0.818	0.350
UTP	0.404	0.763			0.728	0.582	0.806	
FCUI	0.529	0.560	0.806		0.805	0.650	0.928	0.682
FCIP	0.543	0.457	0.616	0.791	0.725	0.625	0.892	

Diagonal values are the sq-root of AVE; FCB = f-commerce browsing; UTP= urges to purchase; FCUI= f-commerce usage intensity; FCIP= f-commerce impulse purchase; CA= Cronbach's Alpha; AVE= average variance explained; CR= composite reliability.

5.1 Structural model

Structural equation modelling (SEM) was employed to measure the structural model. Results show that the model measure 35% and 68.2% of variance in UTP and FCIP.

Table-2 shows the results of the structural model.

Table 2 Structural Model Result

			Estimate	S.E.	C.R.	p-value
UTP	<---	FCB	.167	.068	2.470	.013
UTP	<---	FCUI	.615	.077	7.939	***
FCIP	<---	UTP	.203	.047	4.354	***

FCIP	<---	FCB	.286	.064	4.474	***
FCIP	<---	FCUI	.260	.080	3.238	.001
FCIP	<---	UTPxGENDER	-.190	.062	-3.049	.002
FCIP	<---	MARITALS	.116	.095	1.216	.224
FCIP	<---	AGE	.097	.077	1.253	.210
FCIP	<---	FCBxGender	-.098	.093	-1.055	.291
FCIP	<---	FCUIxGender	.330	.109	3.022	.003

Note: *** significant at 0.000; CMIN/DF = 2.789; CFI = 0.951; NFI = 0.922; RMSEA = 0.057; Pclose = 0.029

Hypothesis testing

The results show that FCB and FCUI have significant positive impact of UPT ($\beta=0.167$, $p=0.01$; 0.615, 0.00 respectively). Hence, hypotheses H1 and H2 have been approved (Table-3). Moreover, FCB and FCUI have significant positive impact of FCIP ($\beta=0.286$, $p=0.00$; 0.260, 0.00 respectively), therefore H3 and H4 hypotheses are approved. The results show significant positive impact of FCB on FCIP ($\beta=0.286$, $p=0.00$), hence approve hypothesis H5.

Gender moderates the relationship between UTP and FCIP, and FCUI and FCIP ($\beta= -0.190$, $p=0.00$; 0.330, 0.00 respectively) but moderating effect of gender has insignificant results. Therefore, hypotheses H6 and H8 are approved and only hypothesis H7 was disapproved.

Table 3 Hypotheses testing result

Hypotheses	Result
H1: UTP	<--- FCB Approved
H2: UTP	<--- FCUI Approved
H3: FCIP	<--- FCB Approved
H4: FCIP	<--- FCUI Approved
H5: FCIP	<--- UTP Approved
H6: FCIP	<--- UTPxGENDER Approved
H7: FCIP	<--- FCBxGender Not Approved
H8: FCIP	<--- FCUIxGender Approved
FCIP	<--- MARITAL STATUS Control variable
FCIP	<--- AGE Control variable

V. DISCUSSION

This study is the first one conducted in under-developed area of Bahawalnagar, in a developing economy like Pakistan. The significance of this study can be credited as Bahawalnagar is the largest district of province Punjab. About 21% of the population of Pakistan uses social media. 93% social media users use Facebook in Pakistan and this ratio is increasing continuously. It is important for the marketers specifically f-commerce organizations to know about the factors influencing impulse buying on Facebook. The purpose of current study is to evaluate the impact of Facebook browsing and usage intensity on impulse buying and how these factors urge the consumers to purchase. Moreover, current study evaluated gender as the moderating effect on the relationship among the explanatory variables and explained variable.

All the proposed hypotheses have been approved except H7. More specifically, FCB has significant positive impact of UTP. Our findings are in-line with the findings of (Leong, Jaafar, and Ainin 2018; Jarboe and McDaniel 1987). These results are also consistent with the study of Rowley, 2002 who concluded that the web browsing positively effects real purchase. Moreover, FCUI has significant positive impact on UTP. The

approval of this hypothesis supports our conjecture that increase in usage intensity urges the user higher to purchase. The user's frequent visits to Facebook fan page make him able to view different offers and attractive ads which urge the consumer to purchase and lead him / her to actual purchase (Rowley, 2002). Regular users are more prone to purchase from f-commerce than occasional users. This finding provides critical insight to the practitioners and f-commerce researchers about the impact of usage intensity and urges to purchase.

FCB has significant positive impact on FCIP and this result is in-line with the study of (Novak, Hoffman, and Duhachek, 2003; Podsakoff et al. 2003; Madhavaram and Laverie, 2004). The results prove that FCUI has significant positive effect on UTP. Moreover, FCUI also has significant positive effect on FCIP. This finding is in-line with the study of Leong et al. (2018), which provides guidelines to theorizers that higher the f-commerce usage of a consumer, higher the degree of impulse purchase. The findings of this study approve the positive impact of UTP on FCIP. This result approves the findings of the former research about the relationship between UTP and FCIP (Beatty and Ferrell 1998; Weinberg and Gottwald 1982). Hence, this finding provides guidelines to theorizers that higher the f-commerce urges to consumers to purchase, the higher the degree of impulse purchase. FCB and FCUI have significant positive impact on FCIP. The possible reason of the current findings is that when a consumer spends more time in browsing of brand Facebook page and his usage intensity is high and this high usage intensity leads him to high impulse purchase behavior.

Gender significantly moderates the relationship between UTP and FCIP. The results show that male consumers are less likely to make impulse purchase than the female consumers. Moreover, Gender significantly moderates the relationship between FCUI and FCIP. The results show that male consumers are less likely to make impulse purchase than the female consumers.

The results show that female consumers are more likely to move toward impulse purchase at f-commerce. The possible reason behind this might be the fact that most of the f-commerce sales are coming from apparel and cosmetics products. Female buyers are more prone to buy these items than male.

VI. CONCLUSION

Numerous researches are conducted to evaluate the factors influencing the social media browsing and intensity of usage, however, few researches are available that evaluate the influence of social media browsing (specifically Facebook) and usage intensity on impulse buying but no research available in consideration of developing countries especially Pakistan.

The purpose of current study is to evaluate the impact of Facebook browsing and usage intensity on impulse buying and to find out how these factors urge consumers to purchase. Moreover, current study examines the moderating effect of gender on the relationship among the explanatory variables and explained variable.

The results show that all the formulated hypotheses approved except one; the moderating effect of gender between FCB and FCIP. FCB and FCUI significantly impact on UTP which shows that the people who use Facebook more have high chances of UTP as compare to low intensity user of Facebook. Gender significantly moderates the relationship between UTP and FCIP. The results show that male consumers are less likely to make impulse purchase than the female consumers. Moreover, gender significantly moderates the relationship between FCUI and FCIP. The results show that male consumers are less likely to make impulse purchase than female consumers. The results show that female consumers are more likely to move toward impulse purchase at f-commerce. The possible reason behind this might be the fact that most of the f-commerce sales are coming from apparel and cosmetics products. Female buyers are more prone to buy these items than male. The results of current study can provide guidelines to the online business marketers in formulation of their social media policies and strategies and develop an understanding about the consumers' impulse buying behavior.

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