

# THE DETERMINANTS OF CUSTOMER' SHOP ONLINE: A CASE OF STUDY FROM INDIAN CONTEXT

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## ABSTRACT

**Purpose:** *The purpose of this paper is to measure the developed online shopping construct in the Indian context and to examine the impact of demographics indicators on online shopping and their product preference in online shopping. The study also analyses the mediating role of consumer attitude relationship between quality of the product, price, product delivery, website information attribute, online services, and consumer buying behavior towards online shopping in the Indian context.*

**Design/methodology/approach:** *An offline survey was conducted by administering a structured questionnaire to the online shopper in selected metro cities in India. The data was collected through a structured questionnaire by applying a purposive sampling technique. Responses are recorded on a five-point Likert scale where: one stands for strongly disagree, three stands for neither disagree nor agree, and five stands for strongly agree.*  
**Originality/value:** *All data are collected a single time due to cost and time constraints. Longitudinal studies are more suitable to understand the customers purchasing preference. The sample of the survey was from Indian metro cities, i.e., Hyderabad, Chennai, Mumbai, Delhi, and Kolkata.*

**Managerial and Social Implications:** *The study helps online service providers or E-retail industries to understand customer attitudes and buying behavior in India. It also contributes to formulating the best marketing/e-marketing strategies to tap potential customers in India. Hence, the study also helps the e-retailers to provide better convenient policies to tier-1 tier-2 cities and rural customers in India.*

**Keywords:** Customer Attitude, Customer Buying Behaviour, E-Retailers, Online Shopping, E-Commerce in India.

## INTRODUCTION

The retailing sector is growing at a fast pace and gaining popularity. Developments in Information Technology have enabled online shopping; that gave scope for customers to order goods, the transactions to happen without the need for physical interaction with the retailers. In recent past years, the online shopping industry has gained popularity to the point where particular categories of customers would consider buying new products online rather than visiting the stores. Conventionally the physical location of a warehouse is seen as a source of competitive advantage. The new version of web-based retailing might alter the rules of the game. Online shopping sites provide virtual shopping space to the customers. It is easy to understand the main advantages of online shopping, while at the time there are also consumers who are sticking to offline shopping, and they have their reasons as well. A major challenge for an e-tailer is retaining a customer who frequently switches to another e-tailer

due to the negligible switching cost and minimal effort. E-fulfilment is one major area of e-tailer operations, which significantly influence customer shopping experience (Lee & Lin, 2005; lee et al., 2011; Thirumalai & Sinha, 2005; 2011; Kim et al., 2013; Koufteros et al., 2014; Pascoe, et al., 2017) and repurchase intention (Koufteros et al., 2014; Kaur & Khanam 2015; Pappas 2016). In this digital age, the Internet has a significant influence on customers' shopping process and behavior (Elms et al., 2016; Thaichon, 2017).

Online shopping is increasing in India, with Internet penetration improving in the country and smartphones becoming affordable along with changing lifestyles and preferences of customers. The way Indian consumers used to shop is also changing with the changing demographic profile of Indian consumers, as a result of a mostly young and working population. Although online shoppers prefer the convenience and choice available in online shopping, specific issues like lack of trust, privacy, payment security, and transaction safety, are concerns that need to be addressed by online retailers. The proposed study attempts to examine the product and process preferences of Indian shoppers towards online shopping.

India's Business to Business (B2B) e-commerce market is expected to reach US\$ 700 billion by 2020, whereas the Business to Consumer (B2C) e-commerce market is projected to reach US\$ 102 billion by 2020. Online retail is expected to be on par with the physical stores in the next five years. Indian e-commerce sales are projected to reach US\$ 120 billion! By 2020 from US\$ 30 billion in FY2016. Further, India's e-commerce market is expected to reach US\$ 220 billion regarding Gross Merchandise Value (GMV) and 530 million shoppers by 2025, led by faster speeds on secure telecom networks, more rapid adoption of online services and better variety as well as convenience. Amazon India expanded its logistics footprint three times to more than 2,100 cities and towns in 2015, as Amazon.com invested more than US\$ 700 million in its India operations since July 2014.

The rest of this article is structured as follows: Section 2 explores the presentation of literature and research hypotheses. Section 3 describes the methodology; section 4 reports the results; conclusions are reported in section 5.

## **LITERATURE REVIEW AND RESEARCH HYPOTHESES**

The purpose of this research is to develop and validate the construct in online shopping and test the structural model, which represents the causal relationship between the customer attitude buying behavior, price, quality of the product, website information attributes, timely product delivery, and online service offered by the e-retailers. Following is a brief overview and discussion of main concepts and interrelationships between them.

### **The Website Information Attributes**

There is very limited empirical research about Indian online shopping. A study showed that accurate information about product features, product quality, product warranties, avenues for customer feedback complaints, and certification of the website are factors that affect online shopping confidence among Indian consumers (Kiran et al., 2008). Indian customers are found to be more willing to disclose personal information on the Internet compared to US consumers (Gupta et al., 2010). Website information that adapts to Indian culture was shown to be more favorable perceived in a study conducted by (Singh et al., 2006; Elms et al., 2016). A website that was more culturally congruent was rated more favorably on navigation, presentation, purchase intention, and customer attitude towards the website. In an empirical study, they identified the dimension of website design (usability, information availability, product selection, and appropriate personalization), fulfillment/reliability, customer service and privacy/security (). The website information

plays a vital role in search of product reviews, customer purchase intentions, ease of use and convenience, and comfort to the customer.

*H1: Significant difference between website information & customer attitude.*

## **The Product Delivery Delay**

Delivery delay defined as a purchase arrives later than promised (Cho et al., 2001; 2002a; 2002b). Ahmad (2002) has indicated in his study that poor customer experience, such as delivery delay, may cause customer dissatisfaction in no appropriate recovery strategy exists. Diaz & Ruiz (2002) and Choi & Mattila, (2009), stated in his study that the waiting time positively influences anger and negatively influences the repurchase intention of customers. Kim (2005) and Xing et al., (2010), proposed in his study that timely delivery is the primary factor of online customer's repurchases behavior.

*H2: Significant difference between Product Delivery & Customer Attitude.*

## **The Customer Attitude**

Attitudes may be defined as a person's relatively enduring evaluation that develops positive or negative feelings and tendencies toward an object, be it a person, product, or idea. The customer has a cognitive, affective and conative component, and consumer behavior is a sum of these. Identification of factors that lead to the development of attitudes and a proper understanding of consumer attitudes toward online shopping can help retailers formulate strategies for future growth and success. This study is an attempt to identify such factors that lead to the development of positive attitudes toward online shopping. Consumers' attitude towards online shopping depends on the consumers' perceptions of functional and utilitarian dimensions (Monsuwé et al., 2004) or their perceptions of emotional and hedonic aspects (Burke, 2002; Sorce et al., 2005; Rajamma et al., 2007).

*H3: Significant difference between Product Attribute & Customer Attitude.*

## **The Price**

Price has a direct impact on the monetary aspect of transaction utility in mental accounting theory. The price may affect a customer's purchase behavior through total utility. In recent years, a significant amount of research has been directed towards understanding how consumers process and act upon price information in purchase situations. One applicable generalization from this literature is that consumers are highly sensitive to contextual cues in information supplied in price offers, which may lead them to make decisions that do not appear to be rational, from a purely economic interpretation. For instance, Inman et al. (2004) find that deals with restrictions such as "Limit to per customer" or "Offer good till specified date" elicit higher evaluations from consumers than the same deals without such restrictions.

Similarly, Choi & Mattila (2009), reports that consumers evaluate price offers more favorably when the prices were stated as "pennies-a-day" than when these are given in aggregate terms. Ravichandran, (2009) distinguished between the actual price of a product (which may include shipping costs in the context of Internet shopping) and the price encoded by customers. Xia & Matilla (2004) had found in a study that the customer usually does not remember the actual price of a product. Instead, customers encode prices in ways that are

meaningful to them. For example, they compare actual prices (e.g., Price offered by the current shopkeeper) with reference prices (e.g., The prices provided by the other vendors).

*H4: Significant difference between Price & Customer Attitude.*

## The online Shopping Convenience

Shopping convenience has been one of the principal motivations underlying customer inclinations to adopt online purchasing (Beauchamp & Ponder, 2010). A crucial point of departure for online retailers who wish to take steps designed to maximize the speed and ease of shopping is to develop an understanding of the salient feature of online shopping convenience and the specific domain within each dimension although online shopping convenience is one of the significant factors that prompt consumers to access online retailers' websites (Ahmad, 2002; Jayewardene et al., 2007; Kenneth et al., 2012).

*H5: Significant difference between Online Offered & Customer Attitude.*

The online services are essential in business to consumer (B2C) e-commerce because they represent ways to provide on-demand solutions to customers strengthening customer–service provider relations, creating transactional efficiencies, and improving customer satisfaction (Huseynov & Yildirim. 2016; Yao 2017).

## The Customer Buying Behavior

Hung et al., (2015); Hall et al., (2017), state that consumer buying behavior is the study of the ways of buying and disposing of goods, services, ideas or experiences by the individuals, groups and organizations in order to satisfy their needs and wants in their daily life.

*H6: Significant difference between Website Information & Customer Buying Behavior towards Online Shopping.*

*H7: Significant difference between Product Attribute & Customer Buying Behaviour towards Online Shopping.*

*H8: Significant difference between Product Delivery & Customer Buying Behaviour towards Online Shopping.*

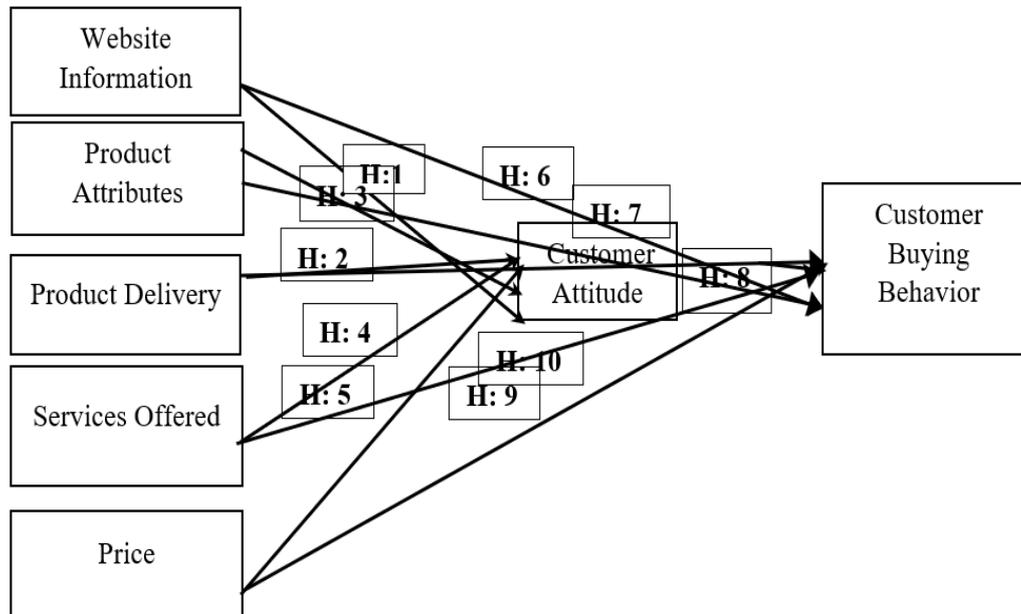
*H9: Significant difference between Price & Customer Buying Behaviour towards Online Shopping.*

*H10: Significant difference between Services Offered & Customer Buying Behaviour towards Online Shopping.*

<b>Table 1</b>		
<b>KMO AND BARTLETT'S TEST</b>		
Kaiser-Meyer-Olkin Measure of Sampling Adequacy		0.855
Bartlett's Test of Sphericity	Approx. Chi-Square	12295.945
	Df	435
	Sig.	0.000

Therefore, there is a consensus among the researcher with regards to casual order between these seven constructs. With the theoretical model/background, the present study proposed a conceptual model to test the complete meditation of website information attribute and product attribute. Product delivery, service offered and price towards customer buying behavior mediated by the customer attitude of the customer in the Indian context. Based on this theoretical model the hypotheses were intended to test the model IN Table 1.

All the above hypotheses are framed for the theoretical model given in Figure 1.



**FIGURE 1**  
**THEORETICAL MODEL**

## METHODOLOGY

The primary concept in this study are customer who use website information attribute, price, product attribute, online service offered by e-tailer, product delivery on time, customer attitude towards online shopping and customer buying behavior and to measure the relationship between these variables in the e-retailing sector in India and to add empirical evidence to the existing filed of shopping preference knowledge of the customer.

The complete analysis was done in two stages. In stage one refers to the various steps in the process of development and validation of the instrument in online shopping in the Indian context. Exploratory and confirmatory factors analyses are used to extract the factors and assess the validity and reliability of the instrument. In stage two, structural equation modeling was used to measure the causal relationship between the latent variable. The study presents a structural model begins with theoretical justification to define the nature of the focal constructs and then uses a series of empirical test to support the causal direction between the constructs and their measures (Coltman et al., 2008; Konrad et al., 2008).

The first-order and second-order measurement models were developed using confirmatory factor analysis specifying that scale items are reflective indicators of their corresponding latent constructs and allowing the latent constructs to inter-correlated (Parasuraman et al., 2005). Determining the scale items are reflective or formative indicators to latent construct is a challenging and essential issue (Coltman et al., 2008; Bayraktarouglu & Atrek, 2010; Ibrahim et al., 2013)). The model is based on the review of literature, which

provides a set of decision rules for deciding whether the measurement model should be a normative or reflective one (Jarvis et al., 2003; Ellwart & Konradt, 2011).

The results substantiate the decision on a thoughtful approach to developing a measurement model. All the items of concern construct have high positive inter-correlation, and all the items of each construct have similar signs and significance of the relationship with the antecedents of the construct in Tables 2-4 and five, respectively, were included in the study. The items of each construct were measured for internal consistency via Cronbach's alpha, construction reliability, the average variance extracted, and factor loadings; content validity is established based on theoretical considerations and assessed empirically via convergent and discriminant validity.

### **Sample Size**

The current study aims to collect data across India. Purposive sampling is used in identifying the respondents of the study. The data collection is carried out across five metropolitan cities in India – Hyderabad, Mumbai, Chennai, New Delhi, and Kolkata. The targeted sample size in each city is 200 totaling 1000 respondents for the study. After the data tabulation and purification, the valid samples are Hyderabad (184), Mumbai (175), Chennai (175), New Delhi (156), and Kolkata (170) totaling to 860 respondents.

The sample size should be representative of the target population and large in number to minimize the sampling error” (Grossnickle & Raskin, 2001). Since the study has used structural equation modeling for the data analysis, the size of the sample should be large enough to estimate the model fit indices (Hair et al., 2010; Rose et al., 2012). There should be at least 200 subjects for performing structural Equation Modeling (Kelloway, 1998).

According to Hair et al., (2010), the size of the sample should be determined based on the number of attributes of the study and suggested that there should be five subjects for each attribute. The study comprised of seven observed variables for online shopping. Based on the criteria given by Black et al., the study required a minimum of 60 subjects. In online shopping categories, the final sample sizes were chosen to meet the criteria mentioned above, thereby justifying the sample size. The total valid sample size of the study was 860.

### **Survey Instrument**

The questionnaire (data collection survey instrument) is comprised of 60 items which in turn were segregated into three sections: A and B. The first section (A) comprised 14 items which covered demographic profile of the respondents (a. Gender, b. Age, c. Education, d. Occupation, e. Income) and internet usage related and online shopping related descriptive variables (average time spent in internet usage during a day, type of internet connection, past history of internet usage, various devices used for internet usage and payment method used for online shopping,). Section B covered 46 items related to online shopping price, product delivery, website attribute information, customer attitude, online shopping services, quality of the product, and customer buying behavior towards online shopping. All the items were measured on Likert five-point format scale. The range of the scale varied from 1 representing '*strongly disagree*' to 5 representing '*strongly agree*' for 60 items of online shopping. For the questionnaire, the scale was developed by the researcher based on the literature review, discussions with customer focus groups, and considering the inputs from subject experts. The researcher tested the developed scale at the stage of the pilot study.

### **Methods and Procedures of Data Collection**

The study adopted offline survey methods for data collection. The offline survey method was done across the main cities in India like (Hyderabad, Mumbai, Chennai, New Delhi, and Kolkata). Purposive sampling technique was adopted for the collection of data. The study carried out structured interviews with customers engaged in online shopping from metropolitan cities like (Hyderabad, Mumbai, Chennai, New Delhi, and Kolkata) in India. To purify the scale items and to check the feasibility, a pilot study was initially carried out. The pilot study was conducted in Hyderabad with a sample size of 210. Moreover, the final study was done with a sample size of 1000, from the metropolitan cities (Hyderabad, Mumbai, Chennai, New Delhi, and Kolkata) of India. The researcher personally interviewed the respondents in the selected metro cities and collected data.

## **RESULTS ANALYSIS AND DISCUSSION**

### **Results Analysis**

The sample consists of 634 males (73.7%) and 226 females (26.3%). Most of the respondents were in the age group of 18 to 25 years (48.6%), followed by the age group 26-30 years (43.1%), and the age group 31-40 year (7.4%). Most of the interviewees were postgraduates (61.0%) followed by Graduates (30.6%), and the highest level of qualification of the respondents was MPhil / Ph.D. (7.0%). The lowest level of qualification of the respondents was SSC (0.3%). As far as the occupation of the respondents was concerned, Private employees constituted most respondents (72.9%) followed by respondents who owned their own business (18.0%), and self-employed constituted 6.9% of the respondents. Government employees constituted only 2.2% of the sample respondents.

Most of the respondents were unmarried (68.7%), the remaining 31.3% were married. As far as monthly income (in rupees) is considered 417 respondents (48.5%) reported monthly income between Rs.15001 and Rs.25000. 282 respondents (32.8%) reported monthly income between Rs. 25001, and Rs.35000, 56 (6.5%), respondents reported monthly income between 35000-45000 while 51 (5.9%) respondents had monthly income below Rs.15,000. Most of the respondents were using the internet for the past 1-5 years ( 54.0%), followed by users in the 5-10 years category (36.4%) and users with less than one year were internet usage (9.0%). The respondents who constituted internet usage for over ten years accounted for only 0.7%.

The majority of the respondents were using Desktop computers for online shopping (52.2%) followed by Laptops (37.1%), and only 10.7% of respondents were using Mobile/Smartphone for online shopping. Most of the respondents (33%) were using the internet for more than 4 hours a day followed by 31.5% using the internet between 30 minutes and 1 hour. Others included 19.8% of respondents using the internet above 4 hours a day, and 13 respondents (1.5%) reported using the internet for less than 30 minutes on a typical day. The analysis also revealed that most of the respondents (58.5%) were using LAN based internet connection followed by 23.4 % using mobile data and 17.8% respondents reported using a Wi-Fi connection to use the internet.

### **Exploratory Factor Analysis for Online Shopping**

The first step in carrying out the Exploratory Factor Analysis (EFA) is to verify the KMO value to check whether factory analysis will be appropriate or not using KMO and Bartlett's test of Sphericity. KMO value varies between 0 and 1. The value 0.000 indicates that the sum of partial correlations is significant relative to the sum of relationships, indicating factor analysis was likely to be inappropriate. Kaiser (1974) recommends a value above 0.5 as acceptable. The results show a KMO value as 0.855, which can be considered

as a good value and therefore factor analysis is appropriate. Bartlett's measure tests the null hypothesis that the original correlation matrix is an identity matrix. Thus, there are as many factors as the items, and for doing factor analysis, this test should be significant (Hair et al., 1998). For this data, Bartlett's test is highly significant ( $p= 0.000$ ), and therefore factor analysis is appropriate. The results for KMO and Bartlett's test are presented in Table 2, Table 3 and Table 4.

Component	Initial Eigenvalues			Extraction Sums of Squared Loadings			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
1	6.483	21.609	21.609	6.483	21.609	21.609	3.139	10.465	10.465
2	2.825	9.415	31.024	2.825	9.415	31.024	3.055	10.183	20.648
3	2.570	8.567	39.591	2.570	8.567	39.591	2.983	9.945	30.593
4	2.268	7.560	47.151	2.268	7.560	47.151	2.814	9.378	39.972
5	1.885	6.283	53.434	1.885	6.283	53.434	2.791	9.302	49.274
6	1.631	5.436	58.870	1.631	5.436	58.870	2.297	7.655	56.929
7	1.205	4.017	62.887	1.205	4.017	62.887	1.788	5.959	62.887

	Component						
	1	2	3	4	5	6	7
PA1	0.747						
PA2	0.804						
PA3	0.841						
PA4	0.736						
PA5	0.734						
CBB1		0.893					
CBB2		0.885					
CBB3		0.899					
CBB4		0.500					
CA 1			0.690				
CA 2			0.686				
CA 3			0.668				
CA 4			0.792				
CA5			0.636				
WI1				0.851			
WI2				0.846			
WI3				0.810			
WI4				0.750			
PD1					0.749		
PD2					0.809		
PD3					0.867		
PD4					0.752		
P1						0.763	
P2						0.756	
P3						0.780	
P4						0.694	
SO1							0.689
SO2							0.731

SO3							0.662
SO4							0.532
Extraction Method: Principal Component Analysis.							
Rotation Method: Varimax with Kaiser Normalization.							
a. Rotation converged in 5 iterations							

Variable / Construct	Composite Reliability	Average Variance Extracted (AVE)	Construct Validity Cronbach Alpha
Customer Attitude	0.83	0.497	0.798
Website information	0.88	0.650	0.845
Product Attribute	0.84	0.522	0.842
Price	0.80	0.509	0.744
Services Offered	0.85	0.600	0.710
Product Delivery	0.84	0.575	0.838
Customer Buying Behavior	0.81	0.522	0.919

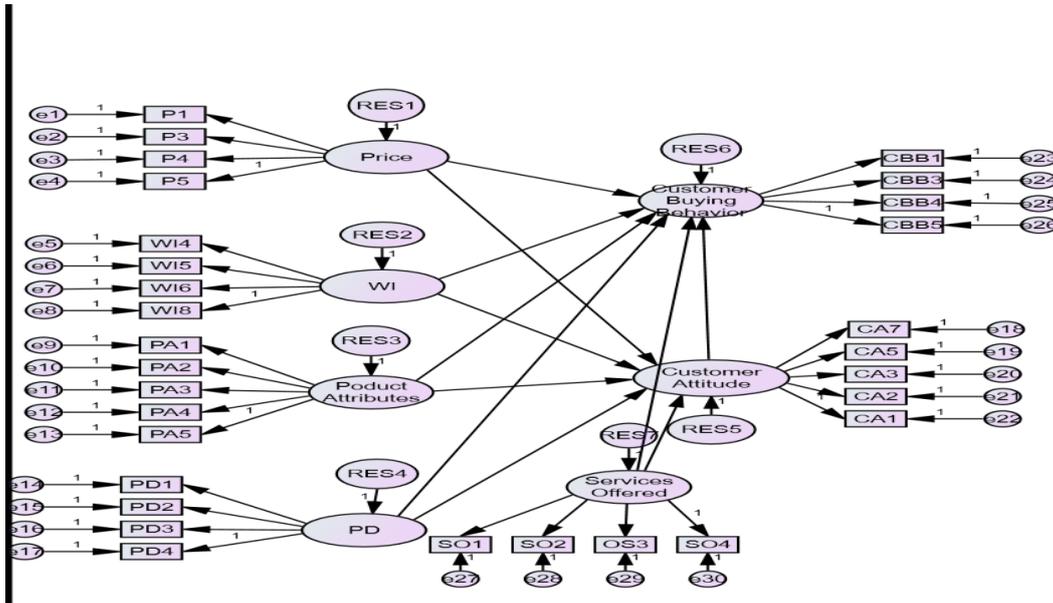
WI= Website Information, CA= Customer Attitude, P= Price, PA= Product Attributes, CBB= Customer buying behaviour towards online shopping, and finally, SO= Services Offered for the online product.

Construct	MSV	ASV	1	2	3	4	5	6	7
Customer Attitude <sup>1</sup>	0.013	0.05	0.71						
Website Information <sup>2</sup>	0.12	0.03	0.184	0.81					
Product Attribute <sup>3</sup>	0.34	0.08	0.257	0.068	0.72				
Price <sup>4</sup>	0.01	0.00	0.056	0.038	0.024	0.71			
Services Offered <sup>5</sup>	0.12	0.04	0.028	0.153	0.014	0.073	0.77		
Product Delivery <sup>6</sup>	0.13	0.05	0.380	0.039	0.170	0.081	0.028	0.76	
Customer Buying Behavior <sup>7</sup>	0.34	0.09	0.612	0.253	0.291	0.118	0.020	0.378	0.72

Relation	Estimate	P-Value	R <sup>2</sup>
WI → CA	0.209	0.000	0.275
PA → CA	0.257	0.000	
PD → CA	0.404	0.000	
Price → CA	0.049	0.201	
SO → CA	0.008	0.849	
CA → CBB	0.691	0.000	0.477
WI → CA → CBB	0.144	0.000	
PA → CA → CBB	0.178	0.000	
PD → CA → CBB	0.279	0.000	
Price → CA → CBB	0.034	0.194	
SO → CA → CBB	0.006	0.859	
<b>Model fit indices:</b> $\chi^2 = 1002.983$ ; $df = 399$ ; $p\text{-value} = 0.000$ ; $GFI = 0.928$ ; $CFI = 0.950$ ; $NFI = 0.919$ ; $RFI = 0.912$ ; $IFI = 0.950$ ; $TLI = 0.945$ ; $RMSEA = 0.042$ .			

Tables 5 and 6 shows of maximum shared variance and correlation matrix of online shopping the correlation matrix related to the Convergent and Discriminant validity of the construct has been considered of online shopping. The Maxim Shared Variance and Average Shared Variance should be less than the average variance extracted of the construct and square of average variance extracted should be greater than correlation loadings of other constructs Appendix A.

From the above table, the critical point to be observed, i.e., MSV & ASV should be less than AVE. Square of AVE should be greater than correlation Loadings of other constructs.

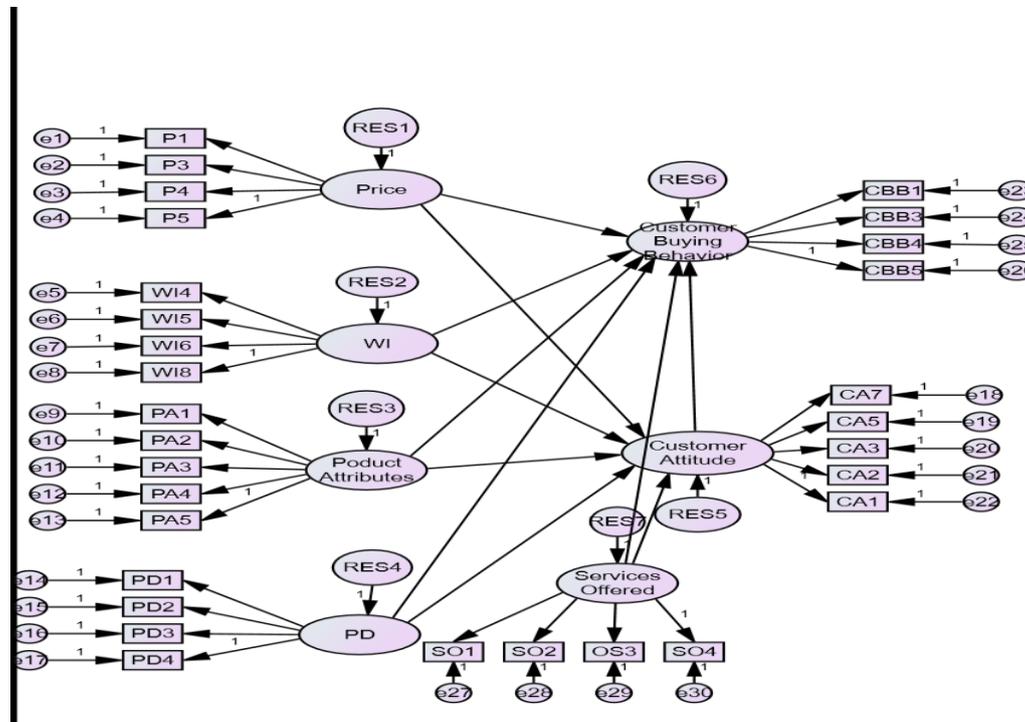


**FIGURE 2**  
**FINAL MODEL: ONLINE SHOPPING**

Table 7 FINAL MODEL: ONLINE SHOPPING			
Relation	Estimate	P-Value	R <sup>2</sup>
WI → CA	0.181	0.000	0.244
PA → CA	0.243	0.000	
PD → CA	0.389	0.000	
Price → CA	0.032	0.425	
SO → CA	0.014	0.753	0.474
WI → CBB	0.117	0.000	
PA → CBB	0.077	0.014	
PD → CBB	0.091	0.007	
Price → CBB	0.071	0.026	
SO → CA	-0.021	0.548	
CA → CBB	0.590	0.000	
WI → CA → CBB	0.107	0.000	
PA → CA → CBB	0.143	0.000	
PD → CA → CBB	0.230	0.000	
Price → CA → CBB	0.019	0.406	
SO → CA → CBB	0.008	0.759	
<b>Model fit indices:</b> $\chi^2 = 972.809$ ; $df = 394$ ; $p\text{-value} = 0.000$ ; $GFI = 0.930$ ; $CFI = 0.952$ ; $RFI = 0.914$ ; $IFI = 0.952$ ; $NFI = 0.922$ ; $TLI = 0.947$ ; $RMSEA = 0.041$ .			

The result presented in Table 7 and Figure 2 indicates that the direct paths from website information (WI), Product Attributes (PA), Product Delivery (PD) and customer attitude to customer buying behavior are significant with p-value < 0.001 and their loadings are 0.209, 0.257, 0.404, and 0.691, respectively. Other two independent variables labeled price and SO were found to be insignificant with p-value 0.201 and 0.849. The indirect path estimates were tested from independent variables. Customer Attitude mediates customer shopping behavior. Results indicate that three circuitous paths from website information (WI), Product Attribute (PA), and Product Delivery (PD) leading to Customer buying

behavior (CBB) were significant. The other two indirect paths were insignificant. Independent variables cumulatively showed 0.275 percent of the variation in customer attitude. Customer buying behavior variables have observed with 0.477 percent of variation from the model. Model fit indices were showing the good fit of the model with  $\chi^2 = 1002.983$ ;  $DF = 399$ ;  $p\text{-value} = 0.000$ ;  $GFI = 0.928$ ;  $CFI = 0.950$ ;  $NFI = 0.919$ ;  $RFI = 0.912$ ;  $IFI = 0.950$ ;  $TLI = 0.945$ ;  $RMSEA = 0.042$ .



**FIGURE 3**  
**ASSUMPTION MODEL OF ONLINE SHOPPING**

Table 8 and Figure 3 indicates that direct paths from website information (WI), Product Attributes (PA), Product Delivery (PD) and Customer Attitude resulting in Customer buying behaviour are significant with  $p\text{-value} < 0.001$  and their loadings are 0.181, 0.243, 0.389, and 0.117, respectively. Other two independent variables labelled Price and Services offered (SO) were found to have insignificant results on preference for online shopping with  $p\text{-value} 0.425$  and  $0.753$ . Indirect path estimates were tested from independent variables namely Website Information (WI), Product Attributes (PA), Product Delivery (PD), Price and Services Offered by the online retailer (SO) resulting in customer buying behaviour mediated by customer attitude. Results indicate that three circuitous paths from website information, Product Attribute and Product Delivery to Customer buying behaviour were significant. The other two indirect paths were insignificant. Independent variables cumulatively showed 0.244 percent of the coefficient of determination variation on shopping preference. Model fit indices were showing the good fit of the model with  $\chi^2 = 972.809$ ;  $DF = 394$ ;  $p\text{-value} = 0.000$ ;  $GFI = 0.930$ ;  $CFI = 0.952$ ;  $NFI = 0.922$ ;  $RFI = 0.914$ ;  $IFI = 0.950$ ;  $TLI = 0.947$ ;  $RMSEA = 0.041$ .

Table 8 ONLINE SHOPPING MEDIATION HYPOTHESIS RESULTS		
S. No	Hypotheses	Decision
H <sub>1</sub>	There is a significant relationship between website information and customer attitude.	Supported

<b>H<sub>2</sub></b>	There is a significant relationship between product attributes and customer attitude	Supported
<b>H<sub>3</sub></b>	There is a significant relationship between product delivery and customer attitude	Supported
<b>H<sub>4</sub></b>	There is a significant relationship between price of online products and customer attitude	Not Supported
<b>H<sub>5</sub></b>	There is a significant relationship between Services offered by online retailers and customer attitude	Not Supported
<b>H<sub>6</sub></b>	There is a significant relationship between website information and customer buying behaviour.	Supported
<b>H<sub>7</sub></b>	There is a significant relationship between Product attribute and customer buying behaviour towards online shopping	Not Supported
<b>H<sub>8</sub></b>	There is a significant relationship between Product Delivery and customer buying behaviour towards online shopping	Not Supported
<b>H<sub>9</sub></b>	There is a significant relationship between Price and customer buying behaviour towards online shopping	Supported
<b>H<sub>10</sub></b>	There is a significant relationship between Services offered and customer buying behaviour towards online shopping	Not Supported

## DISCUSSION

The originality of this research is based on the development of a comprehensive model that examines the factors affecting customer online shopping. Although, studies have been conducted in online shopping in the retail sector in the Indian context. The present studies of online shopping in the retail sector are significant because the Indian retail sector is the untapped market and there is a huge scope to conduct retail business on the internet (E-Commerce) in India.

The study test the direct and indirect relationship between the website attribute information (WIA), product attributes (PA), product delivery (PD), price, Services offered (SO), website attribute information (WAI) and customer buying behaviour (CBB), Product attribute (PA) and customer buying behaviour (CBB), Product Delivery (PD) and customer buying behaviour (CBB), Price and customer buying behaviour (CBB), Service offered (SO), and customer buying behaviour (CBB) towards online shopping.

The finding of the study shows the direct effect of the website information on customer attitude is significant followed by the direct effect of price on customer attitude is significant. The direct effect of product attributes on customer attitude is significant. The direct effect of product delivery on customer attitude is significant. The direct effect of services offered on the customer attitude is not significant. The direct effect of customer attitude on customer buying behaviour is significant. The effect of price on customer buying behavior is significant, and product attribute on customer buying behaviour is insignificant. The direct effect of services offered on customer buying behaviour is insignificant. The effect of website information mediated by customer attitude is significant. The effect of product delivery mediated by customer attitude is significant. The effect of price on customer buying behaviour mediated by customer attitude is significant. The effect of services offered on customer buying behaviour mediated by customer attitude is insignificant. The effect of product attribute on customer buying behaviour mediated by customer attitude is significant.

## CONCLUSION

The research contributes to E-retailing sector to develop online shopping model which identifies variables and dimension of retailing customer attitude, price, product attribute, and

product delivery on time, service offered, and customer buying behaviour towards online shopping in the Indian context. Exploring the important factors of online shopping which motivate the customer to purchase online rather than shop offline. The present study developed scales for measuring online retail preferences in Indian context the study has identified and validated the Factors Affecting customer to shop online.

The advent of information technology coupled with the adaptation of the Internet (which is yet to reach its full potential) by customers has paved the way for online retailing. Online retailing offers opportunities and challenges for the customers as well as retailers. The traditional retailing formats are bound to undergo a radical change in the wake of online retailing. While online retailing promises to deliver greater value to the customers (it does not require a huge investment in physical retail space in prime locations), it also poses challenges to the retailers, regarding ensuring secure transaction procedures, managing seamless supply chain and efficient logistics systems.

The customers of online retailing expect the convenience of shopping with the click of a button (without the need to move from the home, facing heavy traffic, dealing with parking space, etc.) making price comparisons online and search across a wide variety of product assortments in the virtual space. However, the customers also face the challenges of dealing with unknown retailers making online payments and ordering products which they can only feel and touch after the physical delivery of the product. Given the vast potential of electronic retailing, especially in the context of Indian environment which constitutes a higher percentage of the younger population, the role of demographics in online purchasing should be carefully analysed for the success of online retailing. This would enable the retailers to understand the needs and concerns of various target groups and, accordingly, offer the services.

### **Practical Implications**

The study has practical implications for online retailers for better understanding the shopper behavior in the context of changing consumer's demographic and psychographic characteristics in an emerging Indian retail market. The findings may help the retailers to segment and target by altering retail formats to capture the customer's and its preference, to choose more regular online retail stores for their shopping needs. The study has highlighted areas to address for the online retailing. The study also provides the marketing manager's issues to address the determination of consumer attitude for online shopping compare to the offline shopping channel. The study has identified the demographic profile of shoppers who prefer online shopping. The study has identified the product categories which have a higher preference among consumers for online shopping.

### **Limitations of the Study and Directions for the Future Research**

The research has its own limitations. As the sample of the survey was from Indian metro cities, i.e., Hyderabad, Chennai, Mumbai, Delhi, and Kolkata. Therefore, the future studies can focus semi-urban and rural areas of the country. The study adopted purposive sampling methods which are non-random, and there may be a chance of sampling bias. Therefore, the primary study can utilize random sampling methods for further validating the study results. This study was done in a single time due to cost and time constraints. Longitudinal studies are more important to understand the customers purchasing preferences. Thus, future study can adopt the longitudinal approach. Future studies can test the scale for further validation in other parts of the country. Future studies may add other related factors like risk, satisfaction, trust, personal data privacy, etc. in the online shopping model. The study did not address the role of factors like hedonics (pleasure derived etc.), the presence of

friends and family members during the purchase process, etc. Customer to Customers (C2C) shopping models like Olx and Quikr are not considered for the study. The study developed and validated of online shopping model which is predominantly in an Indian context, which may not be applicable at a universal level.

## REFERENCES

- Ahmad, S. (2002). Service failures and customer defection: a closer look at online shopping experiences. *Managing Service Quality*, 12(1),19-29.
- Bayraktarouglu, G., & Atrek, B. (2010). Testing the superiority and dimensionality of SERVQUAL vs. SERVPERF in higher education. *The Quality Management Journal*, 17(1), 47-59.
- Beauchamp, M.B., & Ponder, N. (2010). Perceptions of retail convenience for in-store and online shoppers, *The Marketing Management Journal*, 20(1), 49-65.
- Burke, R.R. (2002). Technology and the Customer Interface: What Consumers Want in the Physical and Virtual Store, *Journal of the Academy of Marketing Science*, 30(4), 411-432.
- Cho, Y., Im, I., Hiltz, R. & Fjermestad, J. (2001). Causes and outcomes of online customer complaining behavior: implications for Customer Relationship Management (CRM). In Proceedings of the Seventh American Conference on Information Systems (ed. by J. De Gross), 900-907.
- Cho, Y., Im, I., Hiltz, R. & Fjermestad, J. (2002a) the effects of post purchase evaluation factors on online vs. offline customer complaining behavior: implications for customer loyalty. *Advances in Consumer Research*, 29, 318-327.
- Cho, Y., Im, I., Hiltz, R. & Fjermestad, J. (2002b) an analysis of online customer complaints: implications for Web complaint management. In Proceedings of the 35th Hawaii International Conference on System Sciences (HK5502), ed. by R.H. Sprague.
- Choi, S., Mattila, A. (2009). Perceived fairness of price differences across channels: the moderating role of price frame and norm perceptions. *Journal of Marketing Theory and Practice* 17(1), 37-48.
- Coltman, T., Devinney, T.M., Midgely, D.F., & Veniak, S. (2008). Formative versus reflective measurement models: Two applications of formative measurement. *Journal of Business Research*, 61, 1250-1262.
- Diaz, A., & Ruiz, F. (2002). The consumer's reaction to delays in service. *International Journal of Service Industry Management*, 13(2), 118-140.
- Ellwart, T., & Konradt, U. (2011). Formative Versus Reflective Measurement: An Illustration Using Work–Family Balance, *The Journal of Psychology*, 145(5), 391-41.
- Elms, J., De Kervenoael, R. & Halls worth, A. (2016). Internet or store? An ethnographic study of consumers' internet and store-based grocery shopping practices. *Journal of Retailing and Consumer Services*, 32, 234-243.
- Grossnickle, J., & Raskin, O. (2001). What's ahead on the internet, *Marketing Research*, No. Summer, 9-13.
- Gupta, B., Iyer, L.S., & Weisskirch, R.S. (2010). Facilitating global e-commerce: a comparison of consumers' willingness to disclose personal information online in the US and in India, *Journal of Electronic Commerce Research*, 11(1), 41-53.
- Hair, J.F., Black. W.C., Babin. B.J., & Anderson. R.E., (2010). *Multivariate Data Analysis*, 7th ed. Pearson Prentice Hall, New Jersey.
- Hung S.W, Cheng M.J. & Hsieh S.C... (2015). Consumers' satisfaction with online group buying – an incentive strategy. *International Journal of Retail & Distribution Management* 43(2), 167-182.
- Huseynov F., & Yildırım S.Ö. (2016). Behavioural Issues in B2C E-commerce. *Information Development* 32(5), 1343-1358.
- Ibrahim, E., Wei Wang, L., & Hassan, A. (2013). Expectations and Perceptions of Overseas Students towards Service Quality of Higher Education Institutions in Scotland. *International Business Research*, 6(6), 20-30.
- Inman, J., Shankar, V., & Ferraro, R. (2004). The Roles of Channel-Category Associations and Geo demographics in Channel Patronage, *Journal of Marketing*, 68(2), 51-71.
- Jarvis, C.B., MacKenzie, S.B., & Podsakoff, P.M. (2003). A critical review of construct indicators and measurement model misspecifications in marketing and consumer research. *Journal of Consumer Research*, 30, 199-218.
- Kaur, G., & Khanam, Q.T. (2015). Factors obstructing intentions to trust and purchase products online, *Asia Pacific Journal of Marketing and Logistics*, 27(5), 758-783.

- Kelloway, E.K. (1998). Using LISREL for structural equation modeling: A researcher's guide. Thousand Oaks: Sage Publications.
- Kim, J., & Park, J. (2005). A consumer shopping channel extension model: attitude shift toward the online store. *Journal of Fashion Marketing and Management: An International Journal*, 9(1), 106-121.
- Kim, J., Yang, K. & Kim, B.Y. (2013). Online retailer reputation and consumer response: examining cross cultural differences, *International Journal of Retail & Distribution Management*, 41(9), 688-705.
- Kiran, R., Sharma, A., & Mittal, K.C. (2008). Attitudes, preferences and profile of online buyers in India: changing trends, *South Asian Journal of Management*, 15(3), 55-74.
- Konradt, U., & Ellwart, T. (2011). Erfolgsfaktoren des lerntransfers unter computergestutztem lernen: Der einfluss von lernstrategien, lernmotivation und lernorganisation [Factors of successful learning transfer in computer-assisted learning: The impact of learning strategies, motivation, and setting]. *Zeitschrift fur Personalpsy, chologie*, 7, 90-103.
- Kotler, P., & Keller, K.L. (2011). A Framework for Marketing Management. Prentice Hall. 5th. 2011.
- Koufteros, X., Droge, C., Heim, G., Massad, N. & Vickery, S.K. (2014). Encounter satisfaction in e-tailing: are the relationships of order fulfillment service quality with its antecedents and conseq.
- Lee, C., Eze, U., & Ndubisi, N. (2011). Analyzing key determinants of online repurchase intentions, *Asia Pacific Journal of Marketing and Logistics*, 23(2), 200-221.
- Lee, G.G., & Lin, H.F. (2005). Customer perceptions of e-service quality in online shopping, *International Journal of Retail & Distribution Management*, 33(2), 161-176.
- Pappas, N. (2016). Marketing strategies, perceived risks, and consumer trust in online buying behaviour. *Journal of Retailing and Consumer Services*, 29, 92-103.
- Parasuraman, A., Zeithaml, V.A., & Malhotra, (2005): A.: E-S-QUAL: A Multiple-Item Scale for Assessing Electronic Service Quality. *Journal of Service Research*, 7, 213-234
- Pascoe, M., Wright, O. & Winzar, H. (2017). Using best-worst scaling to reveal perceived relative importance of website attributes. *Asia Pacific Journal of Marketing and Logistics*, 29(2), 393-408.
- Rajamma, R.K., Paswan, A.K., & Ganesh, G. (2007). Services Purchased at Brick and Mortar Versus Online Stores, and Shopping Motivation, *Journal of Services Marketing*, 21(2), 200-212.
- Ravichandran, R. (2009). Online Shopping is Recession-Proof in India. The Financial Express, Retrieved from <http://www.financialexpress.com/livearchive/print-news>
- Singh, N., Fassott, G., Zhao, H., & Boughton, P.D. (2006). A cross-cultural analysis of German, Chinese and Indian consumers' perception of web site adaptation, *Journal of Consumer Behaviour*, 5, 56-68
- Sorce, P., Perotti, V., & Widrick, S. (2005) Attitude and Age Differences in Online Buying, *International Journal of Retail & Distribution Management*, 33(2), 122-132.
- Thaichon, P. (2017). Consumer socialization process: The role of age in children's online shopping behavior. *Journal of Retailing and Consumer Services*, 34, 38-47.
- Thirumalai, S., & Sinha, K.K. (2005). Customer satisfaction with order fulfilment in retail supply chains: implications of product type in electronic B2C transactions, *Journal of Operations Management*, 23(3), 291-303.
- Thirumalai, S., & Sinha, K.K. (2011). Customization of the online purchase process in electronic retailing and customer satisfaction: an online field study, *Journal of Operations Management*, 29(5), 477-487.
- Wolfenbarger, M., & Gilly, M.C. (2003) ETailQ: Dimensionalizing, Measuring and Predicting Etail Quality. *Journal of Retailing*, 79, 183-198.
- Xia, L., & Monroe, K.B. (2004). Price partitioning on the internet, *Journal of Interactive Marketing*, 18(4), 63-73.
- Xing, Y., Grant, D.B., McKinnon, A.C., & Fernie, J. (2010). Physical distribution service quality in online retailing, *International Journal of Physical Distribution & Logistics Management*, 40(5), 415-432.
- Yao. J.M. (2017). Supply chain resources integration optimisation in B2C online shopping. *International Journal of Production Research*, 55(17), 5079-5094.

## APPENDIX

Appendix A THE OPERATIONAL DEFINITION OF THE VARIABLES	
Variable	Operational Definition
Website Information	Website Information defined as the dimension of website design (usability, information availability, product selection, and appropriate personalization), fulfillment/reliability, customer service and privacy/security (Wolfenbarger and Gilly, 2003).
Product Delivery Delay	Delivery delay defined as a purchase arrives later than promised (Cho et al., 2001; 2002a; 2002b).

Convenience	Online shopping convenience is one of the significant factors that prompt consumers to access online retailers' websites (Ahmad, 2002; Jayewardene et al., 2007),
Online Services	Online services are essential in business to consumer (B2C) e-commerce because they represent ways to provide on-demand solutions to customers strengthening customer–service provider relations, creating transactional efficiencies and improving customer satisfaction (Ruyter et al., 2001)
Quality of Product	Product quality means the actual functionality of the product, consistency between the quality specification of Internet shopping mall and real quality of the physical product. Variety is the assortment or a range of goods available from a shop.
Customer Attitude	Consumers' attitude towards online shopping depends on the consumers' perceptions of functional and utilitarian dimensions (Ruyter et al., 2001; and Monsuwé et al., 2004)
Customer Buying Behaviour:	Kotler and Keller (2011) state that consumer buying behaviour is the study of the ways of buying and disposing of goods, services, ideas or experiences by the individuals, groups and organizations in order to satisfy their needs and wants in their daily life.