

Empirical Analysis on the Preference of Negros Oriental State University Students to Online Shopping

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ABSTRACT

Online shopping has grown exponentially over the years together with the internet age. The COVID-19 pandemic further boosted this trend with its convenience attribute. It is projected that online shopping will continue to propel in the years to come. Thus, it is empirical to study the factors affecting the online purchase behavior of consumers. This study looks at the demographics, online shopping experience, and online shopping preference of Bachelor of Science in Business Administration students of Negros Oriental State University. A total of 319 valid responses were gathered and analyzed through descriptive approach. There were more female respondents than male, mostly aged 20-23 years old. Almost all (93%) experienced online shopping, where clothes, accessories, footwears, beauty products, and electronic devices are the top products being purchased. 96% of the respondents also used cash-on-delivery as a method of payment. It was found that the perceived ease of use of the online shopping platform primarily drives online shopping among the respondents, followed by convenience, time saved, and security. Majority of the respondents prefer online shopping. Those who do not cited product quality risks and product delay as the reasons.

INTRODUCTION

Over the years, e-commerce has become a global trend, riding along the advent of digitalization. In 2022, the global e-commerce market is seen to be around \$5.7 trillion and is expected to rise as online purchase is projected to reach 20.8% in 2023 (Keenan, 2022). Industry reports predicts that the highest e-commerce retail revenue of more than \$2 trillion for 2023 will come from Asia (Pasquali, 2023). These data shows that e-commerce took its place in the pedestal in the global scene of retail business operations.

Although seldom used interchangeably, e-commerce and online shopping are different in concepts. E-commerce refers to the overall online business operations including sourcing, production, logistics, and distribution. Online shopping, on the other hand, is one of the activities in the e-commerce business and is referred to as the purchase of items in a digital platform.

Online shopping already existed for more than a decade now. However, the COVID-19 pandemic impacted the surge in online shopping in the recent years, where physical stores are closed down and people are not allowed to go out of their houses. With the growth projection of e-commerce sales in the coming years, online shopping is likewise expected to continue to flourish, including in the Philippines.

In a global study, 93% of Philippine-based respondents turn to online shopping for convenience and availability of price options (Cudis, 2021). According to a survey conducted by Meta among 2,000 people aged 18+ in the Philippines, almost 7 out of 10 purchased online, with 76% of which belong to the Gen Z and Millennials generation (Magkilat, 2022). This generation is considered to be tech-savvy and have more exposure and access to the internet.

However, COVID-19 protocols are easing up and in-store retail operations are almost back to pre-pandemic normal. Risks in online shopping is still prevalent such as mismatched products delivered, delays and returns of items, and online payment risks. With the option of physical store back, a change in consumer behavior towards online shopping may have occurred. And with Gen Z comprising part the population who are online shoppers, it is imperative to study the preferences of this generation when it comes to online shopping.

THEORETICAL REVIEW

This study is anchored on the theory of buyer behavior by John Howard and Jagdish Sheth (1969). The theory suggests that a consumer's buying behavior is influenced primarily by three factors: the stimulus, information processing, and the decision-making process (see Figure 1).

The stimulus includes all internal and external factors that can affect the buyer behavior, and may be significant (buyer's perceptions), symbolic (product advertising), and social (family, peers, reference groups' influence). The consumer or buyer processes this information based on their perceptual and learning constructs. Perceptual constructs (search for information, perceptual bias, sensitivity to information) serve to control, filter and process the stimuli that the buyer received. On the other hand, learning constructs

(motives, decision mediators, evoked set, predispositions, inhibitors, satisfaction) are factors achieved from the past or present purchases and may influence seeking new information and future purchases.

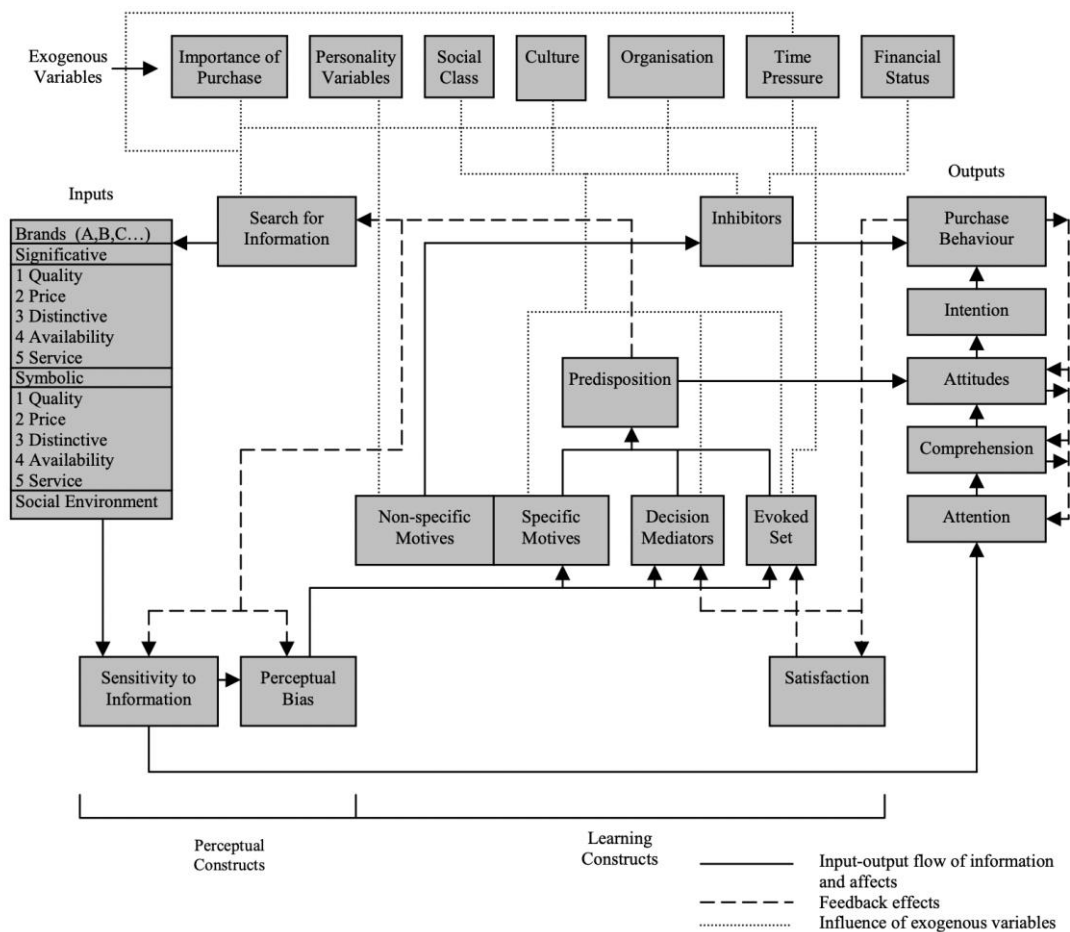


Figure 1. Theory of Buyer Behavior

Note: From A Theory of Buyer Behavior by Howard, J. A., & Sheth, J. N., 1969, *Journal of the American Statistical Association*, 467-487.

There are also exogenous variables that can intervene in the information processing of the buyer. All these leads to the buyer’s responses and decision-making process from the magnitude to of their information intake (attention) up to their actual purchase of the product (purchase behavior) Howard and Sheth also added that decision-making can differ according to the strength of the buyer’s attitudes to the available products, which is also governed by the buyer’s knowledge and familiarity of the product.

Overall, the theory of buyer behavior underlines the complexity of a buyer’s purchasing decision, considering all internal and external factors. As such, this theory can explain the online shopping preferences and decisions of the respondents of this study.

METHODOLOGY

This study looks into the demographics of the respondents and the factors that influence their online shopping, and determine their preference towards online shopping. Thus, this study employs a descriptive approach. Percentages, mean and standard deviation is used to present the demographic profile, the factors and the preferences of the respondents. A discussion and analysis of the results is also presented based on the data gathered. Conclusions and recommendations are then formulated base on the results of the study.

The respondents of this study are BSBA students in the College of Business Administration of Negros Oriental State University Main Campus 1, chosen by stratified random sampling. With the college’s total population of 1,575, the sample size determined was 309. However, the survey yielded a total of 319 valid responses. Table 1 shows how the sample size is distributed among the major programs of the college.

Sample Size Distribution				
BS in Business Administration	Population	% to Total Pop.	Sample Size	Actual Valid Samples
Major in Financial Management	1,166	74%	229	239
Major in HR Management	409	26%	80	80
Total	1,575	100%	309	319

Table 1 Stratified Random Sample Size Distribution

Note: Primary Data Computation

A survey questionnaire was distributed among the target respondents, which gathered the necessary information for data analysis. The questionnaire is divided into parts. Part I consists of questions about the demographic profile of the respondents such as age, course, year level, and monthly allowance. They were also asked about their online shopping experience and the products they usually purchase online.

Part II is a five-point Likert scale that contains statements that determine the factors influencing the respondents online shopping preferences. The instrument used is adopted from the questionnaires of previous studies (Sultan & Uddin, 2011 and Dani, 2017) and customized to update terminologies. There is an introductory statement prior to the survey, which contains a brief about the study and a confidentiality clause for the respondents.

	Strongly Disagree (1)	Disagree (2)	Neutral (3)	Agree (4)	Strongly Agree (5)
Convenience					
1. I get on-time delivery by shopping online					

2. Detailed information is available while shopping online					
3. I can buy the products anytime 24 hours a day while shopping online					
4. It is easy to choose and make comparison with other products while shopping online.					
Ease of Use of App/Website					
5. The app/website design helps me in searching the products easily					
6. While shopping online, I prefer to purchase from a app/website that provides safety and ease of navigation and order					
7. The app/website layout helps me in searching and selecting the right product while shopping online					
8. I believe that familiarity with the app/website before making actual purchase reduce the risk of shopping online					
9. I prefer to buy from app/website that provides me with quality information					
Time Saving					
10. Online shopping takes less time to purchase.					
11. Online shopping doesn't waste time					
12. I feel that it takes less time in evaluating and selecting a product while shopping online					
Security					
13.I feel safe and secure while shopping online.					

14. Online Shopping protects my security.					
15. I like to shop online from a trustworthy app/ website.					

Table 2 Online Shopping Preference Questionnaire

Note: From Consumers' Attitude towards Online Shopping by Sultan, M., & Uddin, M. (2011)

RESULTS

A survey among 319 business administration students was conducted to determine their perceptions about online shopping. Out of 319, there are a total of 239 (75%) financial management majors and 80 (25%) human resource management majors who participated. Table 2 shows the complete demographic profile of the respondents of the study.

Majority of the respondents were female (77%), while males are only 23%. Almost half are fourth year students (45%), which complements the age bracket of 20-21 (38%) and 22-23 (30%) year-olds. Except for the 30 respondents (9%) that are more than 24 years old, the demographic data shows that the respondents are close in age and likely belong to the same generation.

Around 224 (76%) respondents revealed to have a monthly allowance between Php3,000 to Php5,999, while 18% (52) receives Php1,000 to Php2,999 and the rest are at least Php6,000 and above. Note that only 294 respondents answered this question.

	#	%		#	%
Course, n=319			Gender, n=319		
Financial Mgt	239	75%	Male	73	23%
HR Mgt	80	25%	Female	246	77%
Year Level, n=319			Age, n=319		
1 st Year	65	20%	18-19	71	22%
2 nd Year	58	18%	20-21	121	38%
3 rd Year	53	17%	22-23	97	30%
4 th Year	143	45%	>24	30	9%
Monthly Allowance (Php), n=294					
1,000-2,999	52	18%			
3,000-5,999	224	76%			
6,000-10,999	15	5%			
11,000-14,999	3	1%			

Table 2 Demographic Profile Distribution

Note: Primary Data

Almost all of the respondents (297 or 93%) experienced online shopping, while 7% claimed to have never purchased an item online (see Table 3). The most popular items purchased online by the respondents are clothes (28%), accessories (23%) and footwear (22%). Other items purchased online include beauty products (13%) and electronic devices (11%). Cash-on-delivery (96%) is the primary mode of payment being used. There are some respondents who frequently shop online once or twice a month (26%) and three to five times a month (7%); but majority (67%) only purchase online whenever needed.

	#	%
Have purchased a product online, n=319		
Yes	297	93%
No	22	7%
Type of Products Bought (multiple responses)		
Clothes	260	28%
Footwear	205	22%
Electronic Devices/ Accessories	100	11%
Accessories	211	23%
Beauty Products	124	13%
Appliances	27	3%
Others (Groceries, Book, Motor Parts)	8	1%
Mode of Payment Used, n=319		
Cash on Delivery	306	96%
Debit/Credit Card	4	1%
E-wallet	9	3%
Frequency of Shopping Online, n=319		
1-2x a month	83	26%
3-5x a month	21	7%
As needed	215	67%

Table 3 Online Shopping Experience Distribution

Note: Primary Data

The respondents were also asked about the common factors influencing their online purchase. These factors are convenience, ease of use (of website or

app), time saved, and security. A five-point Likert scale was used to measure their perceptions about these factors (1-Strongly Disagree, 2-Disagree, 3-Neutral, 4-Agree, 5-Strongly Agree). Table 4 shows the mean and standard deviation of the students' responses.

Factor	Mean	Standard Dev.
Convenience	3.66	0.97
Ease of Use	4.00	0.85
Time Saved	3.60	0.94
Security	3.51	0.98

Table 4 Mean and Standard Deviation, n=319

Note: Primary Data

In terms of convenience, the students mostly agree that online shopping provides a more convenient option ($M=3.66$, $SD=0.97$). Statements pertaining to this factor includes asking the respondents about the on-time delivery of products, availability of products and product information, and comparing and choosing products. Some students commented that purchasing online is "less hassle", where "you can stay at home" and the "products get delivered at your doorstep". Moreover, students also cited that it is "easy to compare products and prices" from a "wide variety of options", and be able to "choose items that fits their budget the most".

The students strongly agree that the ease of use of the app or website is an important factor in their online shopping experience ($M=4.00$, $SD=0.85$). In this factor, the students were asked the about the ability of applications or websites in aiding product search, providing ease in navigation, and quality product information. Students cited that apps and websites are "easy to access" and "easy to use for busy students".

The students were also asked to rate online shopping in terms of the time efficiency including the lesser time used in evaluating products, and in actual purchase. The respondents generally agree that online shopping saves time ($M=3.60$, $SD=0.94$). They commented that factors such as the "excruciating heat of the sun" and "having not enough time" to go to a physical store makes online shopping appealing to them. The convenience of ordering online requires "less transportation" and "less effort", making them save time.

Security factor was also rated, where students evaluate the safety and security of shopping online, and the trustworthiness of the application or website. The students show indecisiveness in terms of this factor ($M=3.51$, $SD=0.98$). The deviation in the results could be a result of the students perception on the possibility of the sellers in the application or website to be scammers.

Overall the respondents were asked if they prefer online shopping. Majority of the respondents (87%) preferred to purchase online, while the remaining 13% do not (see Table 5).

Do you prefer shopping online?, n=319	#	%
Yes	279	87%
No	40	13%

Table 5 Preference to Online Shopping

The preference towards online shopping may be brought about by the factors of convenience, ease of use, time saved and security. However, other factors come into play, which leads to non-preference of some towards online shopping. Comments on the non-preference can be summed up to product quality risk and product delay.

In terms of product quality risk, respondents cited that online shopping takes away the opportunity of assessing the quality of the product. Thus, there is a possibility of not getting the best quality product, or not the desired specifications, or even the wrong product. Some comments are as follows:

"You don't know what exactly is the product you are getting."

"I prefer to look at the products in their physical form to make sure that the products have the best quality and worth it."

"I prefer to buy things in the market than online because this way I can check for the products appearance better."

"I still prefer in person shopping because I get to test the products quality and try the items."

"Because there is a possibility of getting the wrong item."

Product delay is also another concern. While online shopping enables purchased items to be delivered door-to-door, it takes times before the product arrives, compared to buying onsite where you can take home the products immediately. There are also issues pertaining to delays in shipping and causing delay in the supposed delivery time.

Overall, those who do not prefer online shopping attribute that they only buy online when they *"badly need it and the only way to have it is to purchase online"*; thus, *"buying online is only an option"*. This is due to their preference in ensuring the purchase of quality products on time.

DISCUSSION

The result of the study aligns with Howard and Sheth's (1969) theory of buyer behaviour. Various stimuli such as non-availability of a product in a physical store, cheaper options, and time constraints prompted the respondents to search for product options online, evaluate product information, before making a purchase.

The study shows agreement to previous studies that the demographic profile of the respondents, in this case in terms of age and monthly allowance, do not affect their buying behavior (Dig, Domingo, and Consignado, 2017; Li & Zhang, 2002). Since the respondents of the study are college students, their ages are close and can be seen to belong in the same generation. Majority of the respondents as well have Php6,000 and below monthly allowance, which can a little low considering this period's economic status. Yet, most of the students

experience online shopping (93%) and prefers it over going to physical stores (87%). Although, the frequency of shopping is also low and majority of the students purchase items only when necessary. Since 77% of the respondents are female and preference to online shopping comprised 87%, it can be assumed that females are likely to shop online than male. This is aligned to the results of study of Dig, Domingo, and Consignado (2017).

Slightly contrary to foreign studies, the most popular items purchased online are fashion-related products such as clothes, footwears and accessories (Raj, 2016; Farah, et al., 2018). However, it is aligned with the results of Philippine-based study (Delelis, 2019). Although electronic devices and accessories ranked 5th in the items purchased by the respondents online. The classification of items purchased may be due to the fact that most of the respondents are female who are inclined to fashion. Moreover, this study also revealed that respondents prefer more the cash-on-delivery mode of payment, just as other studies suggest (Raj, 2016; Delelis, 2019).

In terms of the factors that affect the preference towards online purchase, this study showed that the perceived ease of use of the online shopping platform is the primary driver of the respondents. This study aligns with the results of previous research (Sultan and Uddin, 2011; Farah, Ahmad, Muqarrab, Turi, & Bashir, 2018; Dani, 2017). This can be attributed to the accessibility of the applications or website in this time and age, the availability of product information, and the ease in navigating through the platform for product search and purchase.

Convenience come in second as the factor that respondents agree with considering the availability of online shopping platforms 24/7 and access to wide variety of product options globally (Makhitha, 2014; Dani, 2017). This factor also leads to savings in time because consumers do not need to travel and spend time in a store to purchase a product. These factors seem attractive to the respondents as students because they may have limited time to spend for shopping.

However, respondents of this study are concerned with security risks thus the almost neutral disposition about this factor. Issues about online scammers may have affected the confidence of the respondents about the safety and security of online shopping platforms. This may perhaps be a reason why almost of the respondents prefer cash-on-delivery method (96%).

CONCLUSIONS AND RECOMMENDATIONS

The results of this study showed that online shopping is a preferred option among the student respondents. This could be due to the cited advantages of online shopping in terms of convenience, time saved, perceived ease of use of the shopping platform, and security. However, there are security risks, such as the presence of online scammers, that affects the purchasing decision of some respondents. Other risks on product quality and product delay were also cited. Data also showed that the respondents are not frequent shoppers but only purchase online when needed.

Although the findings generally agree with the results of past research, it can be noted that there is a difference in the results between Philippine-based

studies and foreign research. Several factors may come into play such as culture, period the studies were conducted, and the demographics of the respondents. The data may also be limited due to the profile of the respondents.

As such, it is recommended that more studies be conducted on this topic focusing on demographic profiles as determinant to the preference of online shopping where respondents can be expanded to more diverse age bracket, occupation, and other factors. This is particularly relevant since online shopping could further boom in the coming years, and consumer behavior may also have changed with the ease in pandemic health protocols. Current and future online shopping platforms can also take note of the security and product quality risks concerns raised in this study to provide a more satisfactory online shopping experience and increase the overall confidence of consumers to prefer and continuously patronize online shopping.

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