

# Assessing the Consumer Perspectives Significance of Price Acceptability & Promotional Offers in Digital Marketplace

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## Abstract

Online shopping platforms have grown in popularity in the modern digital age, made possible by technical developments. To keep up with the competition, firms need to understand customer behavior and preferences as e-commerce operations develop rapidly throughout the globe. This research delves into the several aspects that influence customer behavior when they shop online. The study included a quantitative survey of 125 Malaysians who regularly purchase online. Tests using Multiple Regression Analysis showed that variables including price acceptability, product quality, promotional offers, and online reviews substantially impact consumers' online purchasing behavior. Marketers and retailers, according to the survey, should prioritize using these components in their online marketing campaigns that target members of Generation Z and Y. The results also help marketers and merchants understand what factors influence customers' online behavior and purchases, which adds to the body of knowledge in the field of online retail.

## Keywords

price acceptability, promotional offers, consumer behavior, e-commerce businesses, digital marketplace, etc.

## Introduction

The advent of the internet has revolutionized traditional marketing today, shaping the future landscape to be heavily influenced by digitalization. This shift is evident across industries, impacting consumer behavior significantly. With smartphones and internet access readily available, consumers can now browse

and shop from anywhere in the world, making online shopping a convenient solution for the fast-paced lifestyle of modern society (Reio, 2010). Over the past decade, there has been a notable change in consumer shopping habits. While physical stores still appeal to some, many consumers find online shopping more convenient. The time-saving aspect of online shopping drives this preference, as individuals are increasingly pressed for time in their daily lives (Kadhi, 2009). Online shopping platforms offer consumers a compelling experience by providing access to information from multiple sellers, allowing them to compare products, read reviews, and make informed purchase decisions. As a result, internet shopping has witnessed substantial growth globally, encompassing B2B and B2C transactions. Statistics indicate a significant surge in e-commerce sales and orders, with the market projected to reach trillions of dollars by 2020 (Sari & Giantari, 2020). In Malaysia, internet usage is widespread, with a large portion of the population accessing social media and engaging in online activities. The National E-commerce Council (NeCC) predicts a substantial increase in online sales, contributing significantly to the country's GDP by 2020.

The internet has brought about significant changes for buyers and sellers, and the retail industry is no exception as it shifts towards online platforms (Mayzlin, 2006). In recent years, numerous online retail stores have been launched, while many physical retailers have also established their presence through websites or apps (Zhang *et al.*, 2014). This shift has enabled retailers to engage directly with their target consumers across various sectors, including fashion, electronics, and even groceries.

Technological advancements such as touch screens in grocery stores, intelligent shopping carts, and mobile apps have facilitated consumer engagement and connection to various IoT services (Mohan *et al.*, 2013). However, understanding consumer behavior online presents a significant challenge for marketers, as they cannot observe facial expressions or physical cues. Instead, marketers must analyze buying behavior and identify factors that influence purchasing decisions (Prater, 2005). N. R. Narayana Murthy, co-founder of Infosys, has emphasized integrating technology into the retail sector to benefit customers. Digitization has empowered consumers by giving them more control and choice (Yang Z., 2007).

Additionally, technology has enabled retailers to gather immediate feedback and respond promptly to consumer needs (Chen & Barnes, 2007). Meeting consumer demands is paramount for businesses, as satisfied customers are more likely to become repeat buyers (Wedel, 2016). The expansion of online shopping presents opportunities for growth, particularly in rural areas where internet access is increasing. Despite initial hesitations, consumers increasingly embrace online shopping due to its convenience and efficiency (Rajamma & Neeley, 2005). Research to understand online shoppers' preferences, habits, and satisfaction levels is essential for bridging existing knowledge gaps and optimizing the online shopping experience (Chakraborty, 2019).

## **Methods**

### **Research Design**

This research was conducted using quantitative methods, which involve systematic analysis of measurable data using statistical, mathematical, or computational techniques. Examples of such methods include surveys, online polls, and questionnaires, which yield numerical results. By carefully interpreting these numerical findings, researchers can predict future trends and make informed decisions about products or services. The study primarily employed a deductive approach to analyze consumer buying behavior, aiming

to connect existing theories with the collected data. Data collection followed a cross-sectional design, where information was gathered at a specific point in time from a population sample.

This study mainly aimed to analyze the behavior of online retail purchasers. For this purpose, this study was concerned with consumer behavior components such as product prices, promotional discount offers, and online review systems; besides these, some essential consumer characteristics were analyzed, such as demography, technology awareness, and culture. This study focused on online purchasers who do their online purchasing through Lazada, Shopee, etc., as they are widely used and reliable sources of online purchases. The research was designed based on Generation Y and Z.

The researchers in this study examined the habits of Malaysians who shop online. When consumers shop online, their inclination to buy is influenced by several things. This research first analyzed relevant studies on e-commerce and online consumer behavior to better understand customers' online purchase intentions. Academics in this study looked at pertinent previous hypotheses and analyzed the conclusions made by other scholars who had conducted comparable investigations. The researchers in this study set out to answer some open questions about consumer behavior by first reviewing existing literature on the topic and then connecting it to consumers' online shopping habits.

### **Population & Sampling**

There are 16.53 million internet users in Malaysia, as reported by the Export Government in 2019. The sample size for this research was 16.53 million people who shop online. The researchers in this study relied on convenience sampling because of constraints in both time and resources. Using the first primary data source that comes to mind without specifying any further criteria is known as a convenience sampling approach. This means that the researcher may discover participants wherever they are, which is a significant advantage of this sampling strategy.

Various sampling procedures are used to ascertain the population's sample size. The elimination of bias in the selection process relies on proper sampling procedures. They may also make it easier or cheaper to collect samples. The sampling approach developed by Krejcie and Morgan is among the most popular options. For a population larger than one million, the recommended sample size is 384 (Krejcie & Morgan, 1970). For a population of more than one million, Krejcie and Morgan suggest using 384 respondents with a 95% confidence level and a 5% margin of error (Chuan, Lee & Penyelidikan, 2006). Another approach to determine the sample is Taro Yamane sampling method. In 1967 Taro Yamane developed a formula to determine the sample size from any population. The mathematical formula to determine the sample size is

$$n = \frac{N}{1 + N(e^2)}$$

Here,

n = Signifies the sample size

N = Signifies the population under study

e = Signifies the margin error.

Out of the two options, this study is better suited to the Krejci and Morgan sampling technique. The number of respondents will be 384 since the sampling period for this survey is 16.53 million. Using the first primary data source that comes to mind without specifying any further criteria is known as a convenience sampling approach. Put another way, this sampling strategy entails recruiting volunteers wherever the researcher can locate a suitable sample, usually wherever it is most convenient. According to Saunders, Lewis, and Thornhill (2012), non-probability convenience sampling is a method of choosing research samples by randomly picking units of sampling that are the quickest and most straightforward to get. That being said, the study participants were selected at random.

### **Data Collection Method**

The questionnaire served as the primary study's principal instrument for gathering data. Questionnaires are helpful tools for collecting data on internet shoppers' habits. Respondents were sent online questions to fill out during the survey. Respondents were sent a survey link to complete an online questionnaire; those chosen to participate were then asked to share the link with their friends and family because the study was focused on internet consumers. Online surveys are a quick and easy way to gather data for studies, and they don't introduce interview bias.

### **Questionnaire Development**

The questionnaire was designed with a set of questions by which responds of participants were recorded. The kind of questionnaire to be adopted depended on the appropriateness of the study being investigated. For this reason, in this research the variables were operationalized using sound previous research to this study. The adoption of the questions was more useful in terms of reliability and validity, as to compare the present findings and the previous results of the research instrument. The questionnaire was structured into two parts (A & B):

Part A: Respondents' demographic information.

Part B: Questions about variables – Price Acceptability, Promotional Offers.

The variables' questions were borrowed from past research. The survey was crafted to be concise and direct. Respondents were asked to use a five-point Likert scale, ranging from 1 (Strongly Disagree) to 5 (Strongly Agree), to express their opinions. This scale was chosen for its ease of comprehension and reporting for the respondents.

### **Data Analysis Method**

The data was analyzed using multiple linear regression analysis in the research. This method was based on assumptions such homoscedasticity, multivariate normality, and linear correlations. Data analysis, hypothesis testing, and normality testing were all conducted using multiple linear regression. The data was explored using multiple linear regression techniques. To forecast the value of a dependent variable from a collection of independent variables, statisticians utilize multiple regression, also called multiple linear regression.

It is critical to decide the study's direction before data collecting. A popular statistical programme for primary research, SPSS, was used for data analysis. We used basic percentages, frequency tables, and averages for our descriptive statistics. It doesn't matter whether the dataset covers the whole population or only a subset; descriptive statistics provide a brief overview of both. Descriptive statistics primarily include measures of central tendency and variability. Mean, median, and mode are ways to quantify central tendency, whereas standard deviation, variance, minimum, maximum, kurtosis, and skewness are ways to measure variability.

In this study the sample size was 384. Including 20% non-response bias, distributed questionnaire was 461 which was distributed to the respondents accordingly. Out of 461 questionnaires 125 responses were received with the 27% usable response rate. The data collected were presented as follows with 20% non-response rate.

### **Results and Discussion**

#### ***Missing Values and Normality***

Using a Google Form link, 461 questionnaires were delivered online for this investigation. Respondents accurately completed all parts of the survey. No missing values were noted in the data that was gathered for analysis (Table 1). All of the questions that were asked were answered by the respondents.

The most fundamental presumption in multivariate analysis is normality, which is defined as the relationship between the normal distribution—the standard for statistical methods—and the form of the data distribution for each metric variable (Hair et al., 2010). Skewness and kurtosis tests to make sure everything

was okay. According to George and Mallery (2009), a greater level of normalcy is indicated by skewness and kurtosis values between -1 and +1. Table 4.2 shows that, with the exception of online review, which is marginally higher than +1 and marginally lower than -1, the skewness and kurtosis values for the majority of the variables were between -1 and +1. The histogram graph still showed a belt-shaped curve for all the variables, indicating that the data is normal.

Table 1: Values of Skewness and Kurtosis of Main Variables (N= 125)

Main Variables	Normality	
	Skewness	Kurtosis
Price Acceptability	-0.203	-0.147
Promotional Offers	-0.422	0.039

### **Reliability of Measurements**

After collecting data, we conducted a reliability analysis to ensure that the measured items accurately reflected the intended constructs. One common method for assessing reliability is by calculating Cronbach's Alpha values (Sekaran, 2003). This value ranges from 0 to 1, with a minimum acceptable value of 0.70 indicating sufficient reliability (Hair et al., 2010). Table 2 presents the Cronbach's Alpha values for each measurement. Our analysis revealed that all items demonstrated good internal reliability, thus validating their inclusion in the statistical analysis.

Table 2: The Reliability of the Coefficients of Measurements (N=125)

Measurement	Item Number	Cronbach's Alpha
Price Acceptability	5	0.760
Promotional Offer	5	0.826

### **Demographic Details**

In this study, 125 responses were recorded; the data shows 56% were male and 44% were female. This study focuses on Generation Y and Z, so the age range of participants was kept between 15 and 40 years. Most responses were recorded within the age range of 21-25 years, 44%, and 27.2% were within 26-30 years. Respondents aged between 21-30 years are active online shoppers. Data about occupation was collected to observe the effect. Respondents were from different occupations; some were students, some were business people, and some were doing jobs. Based on the occupation, respondents were categorized into two sectors: skilled and unskilled. Data shows skilled workers are 34.4% and unskilled workers are 65.6%. As most respondents were students, the percentage of unskilled workers increased. The last demographic question was asked about online retail purchases. 92% of the total respondents were active online retail shoppers, 4.8% were inactive, and 3.2% were partially busy shoppers. Table 3 summarizes the characteristics of 125 respondents and their personal information.

Table 3: Distribution of Demographic Details of Respondents (N=125)

No	Demographic		Frequency	Percentage (%)
1	Gender	Male	70	56
		Female	55	44
		Total	125	100
2	Age	15-20 years	7	5.6
		21-25 years	55	44
		26-30 years	34	27.2
		31-35 years	18	14.4
		36-40 years	11	8.8
		Total	125	100

3	Occupation	Skilled	43	34.4
		Unskilled	82	65.6
		Total	125	100
4	Do you purchase products form online retail sites?	Yes	115	92
		No	6	4.8
		May be	4	3.2
		Total	125	100

**Descriptive Analysis of Main Variables**

In order to grasp the overall trends among respondents regarding key concepts examined in this study, descriptive statistics including mean and standard deviation were employed. Data on group characteristics was collected as outlined by Black (2013). Table 4 below presents the descriptive findings for the primary variables.

Table 4: Descriptive Analysis of Main Variables

Main Variables	Mean	Standard Deviation
Price Acceptability	3.48	0.746
Promotional Offer	3.66	0.730

On a five-point Likert scale, Table 4.5 depicts the mean values of the independent and dependent variables. The mean values of the variables are respectively price acceptability is 3.48, product quality is 3.62, promotional offer is 3.66, online review is 3.99 and consumer online buying behavior is 3.73. These values shows that the concepts were understandable to respondents. The standard deviations for all variables were above 0. They were price acceptability (0.746), product quality (0.813), promotional offer (0.730), online review (0.806) and consumer online buying behavior (0.756). the standard deviations are consistent with all the variables. It indicated that respondents had similar perception about the variables.

**Multi-collinearity Statistics**

This study focused to determine the relationship between various hypotheses using regression analysis. One potential issue encountered in such analysis is multi-collinearity, where independent variables are highly correlated. When two variables show strong correlation, it's termed collinearity; when three or more are involved, it's termed multi-collinearity. This study involved four independent variables: Price acceptability and Promotional offers. The variance inflation factor (VIF) was utilized to assess the relationship between these variables. According to O'Brien (2007), VIF values of 10 or higher, or even as low as 4, can indicate significant multi-collinearity issues. Upon conducting linear regression analysis, it was found that the VIF values for each pair of independent variables were below 3. This helps that the variables are sufficiently distinct from each other, indicating the absence of multi-collinearity. Therefore, it can be concluded that the independent variables are indeed distinct and do not suffer from multi-collinearity.

Table 5: Multi-collinearity Statistics

Variables	Tolerance	Variance Inflation Factor (VIF)
Price Acceptability	0.494	2.03
Promotional Offers	0.574	1.74

**Hypothesis Testing**

H<sub>1</sub>: Price acceptability has a great effect on consumer online buying behavior.

H<sub>2</sub>: Promotional offers have an important effect on consumer online buying behavior.

A regression model was constructed to develop a prediction model to test the hypotheses mentioned above. Table 6 indicates the model's fit was strong (F value = 67.86, p-value = 0.000). The R<sup>2</sup> value of 0.693 suggests that 69.3% of the variance in consumer online buying behavior can be explained by price ac-

ceptability and promotional offers. The independent variables did not account for the remaining 30.7% of the variance, indicating that other factors influenced consumer behavior.

The analysis revealed that both price acceptability (t value = 3.364, p-value = 0.000) and promotional offers (t value = 2.048, p-value = 0.043) had a significant impact on consumer online buying behavior at the  $p < 0.05$  level, based on a two-tailed relationship. Therefore, hypotheses 1, 2, 3, and 4 were supported.

The standardized coefficients, represented by  $\beta$  values, provide insight into the relative importance of the independent variables. Table 6 shows that the  $\beta$  values for price acceptability and promotional offers are 0.265 and 0.142, respectively. This indicates that consumer online buying behavior would increase by 0.265 and 0.142 units for every one-unit increase in price acceptability and promotional offers, respectively.

Table 6: Regression coefficients between Price Acceptability, Promotional Offers (Hypothesis Testing Results).

Model		$\beta$ value	T	Sig.	R	R2	F	Sig.
1	Constant	0.160	0.688	0.493	0.8333	0.693	67.836	0.000
	Price Acceptability	0.265	3.634	0.000				
	Promotional Offers	0.142	2.048	0.043				

A reliability test was run after data cleansing to make sure the data was consistent internally. Because respondents were required to self-report their answers, CMV analysis was crucial for identifying potential biases. Following that, specifics on the respondents' demographics were provided. Additionally, the primary variables were analyzed descriptively. The hypotheses were tested using a multi-collinearity test. Multiple linear regression analysis was used to examine the hypotheses. As seen in Table 7, each of the four hypotheses was confirmed.

Table 7: Summary of the Findings According to Hypotheses.

Hypotheses	Results
H <sub>1</sub> : Price acceptability has a significant effect on consumer online buying behavior.	Supported
H <sub>2</sub> : Promotional offers have a significant effect on consumer online buying behavior.	Supported

The main goal of this study was to investigate the impact of customer behavior, specifically focusing on online consumer behavior. The data collected indicated that 44% of respondents were female, while 56% were male. The results revealed that men are more inclined to make purchases online, and various aspects of consumer behavior strongly influence men. Consequently, internet shopping is gaining popularity among Malaysian men. These findings are consistent with previous research by Usha Vaidehi (2014), which found that men tend to shop online more frequently than women. Factors such as price acceptability, product quality, promotional offers, and internet reviews influence men more than women. This aligns with earlier studies by Sorce (2005) and Mummalaneni and Meng (2009), which identified that most Malaysian online shoppers belong to Generation Z, with 44% of respondents falling in the 21–25 age group (Sinha *et al.*, 2023). Thus, it can be concluded that Generation Z men in Malaysia are significant online consumers, and the data supports the hypothesis that they are more affected by factors like price acceptability and special offers when making online purchases.

## Conclusion

Understanding consumer buying behaviour has long fascinated marketers and retailers, as it holds the key to gaining a competitive edge in the market. With the rise of online shopping, especially among younger generations in the era of Industrial Revolution 4.0, it has become imperative for brands to adapt to this new trend. In this digital age, the ease, convenience, and time-saving nature of online shopping appeals to Generation Y, Z, and millennials. Consequently, consumer purchasing decisions differ between online and offline platforms, leading to varying influencing factors. Price acceptability and promotional offers play crucial roles in shaping consumer behaviour online. Price comparison, along with product reviews and ratings, guides consumers in making informed purchase decisions. Marketers and retailers must, therefore, strive to offer competitive prices and quality products to satisfy consumers and cultivate loyalty. Moreover, promotional offers serve as catalysts for online purchases, while online reviews aid in product selection. By analyzing and leveraging these influencing factors, businesses can develop effective strategies to gain a competitive advantage and carve out a niche in the online retail landscape.

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