



Data Article

Dataset on Vietnamese students' impulse buying behavior on TikTok shop



Dinh Huan Phan, Quang Duy Nguyen*, Vinh Khang Nguyen Phuc

FPT University, Can Tho Campus, Can Tho 900000, Vietnam

ARTICLE INFO

Article history:

Received 1 August 2024

Accepted 10 October 2024

Available online 18 October 2024

Dataset link: [Exploring factors influencing the impulse buying behavior of Vietnamese students on TikTok Shop \(Original data\)](#)

Keywords:

E-commerce platform
Online impulse shopping
Scarcity
Serendipity information
Trust
Hedonic motivation
Shopping lifestyle
Product presentation

ABSTRACT

This article aims to provide a dataset on the factors affecting the online impulse buying behavior of university and college students in Vietnam. The examined factors include scarcity (SC), serendipity information (SI), trust (TR), hedonic motivation (HM), shopping lifestyle (SL), and product presentation (PP). In particular, the survey focuses on impulse shopping behavior on TikTok Shop, a rapidly growing e-commerce platform that is increasingly popular among Generation Z in Vietnam and other Asian countries. The data collection process was conducted from January 2024 to March 2024 through an online questionnaire and resulting in 361 valid responses from 10 provinces and cities in the Mekong Delta. This dataset could be valuable for enterprises operating on TikTok Shop or those planning to join the platform by providing insights into consumer behavior. Furthermore, it facilitates broader comparative studies across different regions or shopping platforms.

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* Corresponding author.

E-mail address: duynq28@fe.edu.vn (Q.D. Nguyen).

Specifications Table

Subject	Business, Management and Decision Sciences.
Specific subject area	Online impulse buying behavior
Data format	Raw, Analyzed
Type of data	Table, Figure
Data collection	The data was collected via an online questionnaire administered through Google Forms. This questionnaire was distributed to Vietnamese students at universities and colleges in the Mekong Delta. Subsequently, the collected data was analyzed using Microsoft Excel, IBM SPSS, and AMOS software.
Data source location	City/Town/Region: Mekong Delta Country: Viet Nam Latitude and longitude: 10° 2' 24" N, 105° 48' 0" E
Data accessibility	Repository name: Mendeley Data Data identification number: 10.17632/46bxcjgws4.1 Direct URL to data: 10.17632/46bxcjgws4.1
Related research article	None.

1. Value of the Data

- The information from the study's findings illustrates the relationships among various factors such as scarcity, serendipitous information, trust, hedonic motivation, shopping lifestyle, and product presentation, and their influence on the impulse buying behavior of Vietnamese students on TikTok Shop.
- The data has the potential to provide valuable insights into emerging consumer trends and behaviors among students, who represent potential customers on TikTok Shop as well as other e-commerce platforms. Understanding these patterns can also help predict future shifts in online retail and social commerce dynamics.
- The dataset offers an opportunity for conducting comparative studies across different countries or regions. This valuable resource can serve as a starting point for exploring similarities and differences in impulse buying behavior, making it an important resource for researchers, marketers, and policymakers interested in the intersection of e-commerce, consumer behavior, and digital marketing. By facilitating interdisciplinary research, these data can support studies that integrate perspectives from marketing, psychology, and information technology. This integration can lead to a more comprehensive understanding of the factors influencing impulse buying behavior in the digital age.
- The data can also be used as an educational tool for business students and academics. It provides a practical example for understanding the application of marketing theories and consumer behavior models, thereby enhancing the academic learning experience through real-world case studies.

2. Background

Impulse buying behavior has received wide attention from researchers for over 70 years. In the 1950s, Clover [1] examined the mix of impulse purchases, pointing out which product categories are more likely to be sold on impulse. The subsequent research by Betty and Ferrel [2] also partly expanded previous perspectives with the definition of impulse buying behavior as "a sudden and immediate purchase" without any prior planning, either to complete a certain buying task or to purchase a particular product category. Most earlier studies on the definition of impulse buying took place in a traditional market. Impulse buying has been more prevalent in online retail settings since the internet era and the growth of e-commerce. Thus, consumers may engage in online impulse buying given the enormous growth potential of online shopping [3]. Our theoretical model is established based on related studies on online impulse buying behavior

to extend its application to the TikTok Shop as an emerging e-commerce platform of Vietnam. The dataset obtained from reputable universities and colleges in the Mekong Delta bears substantial significance in scrutinizing the determinants influencing impulse buying behavior among university students via TikTok Shop, who generate an increasingly attractive consumer segment.

3. Data Description

This article is a descriptive analysis of data related to the factors influencing the Impulse buying behavior of university and college students on TikTok Shop. Data were collected through a questionnaire to evaluate the participants' opinions. Convenience sampling method was used in this article. The survey utilized in this study includes 7 constructs and 28 measurement items. These items were adapted from previous research and are listed in [Table 1](#). All items were designed as closed questions using a five-point Likert scale (from 1- strongly disagree to 5- strongly agree).

The raw data is collected and presented in an Excel file that contains 362 rows and 32 columns. The first row indicates the measurement items and demographic characteristics, while rows 2–362 represent the data of each of the 361 participants in the survey. Data on the measurement items is included in columns 1–28, and information about the survey respondents' demographic characteristics is presented in columns 29–32.

Information on survey respondents' characteristics is presented in [Table 2](#), including province or city, gender, university or college, and income level. The data indicates that females constitute the majority of respondents, who come from 10 provinces or cities in the Mekong Delta. The respondents were mainly students of 7 reputable universities and colleges in the Mekong Delta, the remaining respondents were from smaller schools. Most respondents have an income of less than 5 million VND.

In this article, the collected data was processed and analyzed using SPSS and AMOS software through various analytic methods. The descriptive statistics' result showed that the mean of items is between 3.32 and 4.08, and the standard deviation (SD) is between 0.611 and 1.006. Subsequently, the exploratory factor analysis method was used to evaluate the convergent validity and discriminant of the scales. The results revealed that the Kaiser–Meyer–Olkin (KMO) value is 0.831 (> 0.50) and Barlett's test is significant at 0.000. The total variance explained value is 67.504 % (> 50 %), and Eigenvalues are greater than 1.000 (see [Table 3](#)).

On the other hand, the confirmation factor analysis proved a goodness of fit measures for the model exhibited values within acceptable ranges with the results of $\chi^2/df = 1.431$ (< 3.0), $GFI = 0.917$ (≥ 0.90), $CFI = 0.967$ (≥ 0.90), $TLI = 0.962$ (≥ 0.90); and $RMSEA = 0.035$ (< 0.08) [9]. In terms of convergent validity, coefficients within acceptable ranges with the results of P -value < 0.05 and estimate values > 0.5 , this result proves that the scales have convergent validity. Additionally, the article evaluated the scale's reliability through Cronbach's Alpha coefficient. As shown in [Table 3](#), the Cronbach's Alpha values of all the variables exceeded the 0.70 threshold [9] (see [Table 4](#)).

In terms of discriminant validity, maximum shared variance (MSV) coefficients are smaller than average variance extracted (AVE) coefficients. Furthermore, the square root of AVE (SQRTAVE - bold diagonal) of the constructs were greater than all the inter-construct correlations (see [Table 5](#)). These results prove that the scales have convergent validity [10].

4. Experimental Design, Materials and Methods

All constructs in the survey were measured using scales adapted from current literature to investigate the factors affecting the impulse buying behavior of Vietnamese students on TikTok Shop. These scales were slightly modified to fit the context of e-commerce and impulse buying e-commerce platforms in Vietnam. Scarcity (four items) and serendipity information (five items)

Table 1
Scale of components.

Construct	Coding in survey	Measurement item	Source
Scarcity	SC1	Shopping on TikTok Shop makes me think about deadlines.	[4]
	SC2	Shopping on TikTok Shop makes me worry about time constraints.	
	SC3	TikTok Shop makes me worry with limited quantities.	
	SC4	Shopping on TikTok Shop makes me worry about a sold-out sign.	
Serendipity Information	SI1	I unexpectedly discovered what I wanted to buy before when shopping on TikTok Shop.	[4]
	SI2	I find things that surprised me while shopping on TikTok Shop.	
	SI3	I obtain unexpected insights when shopping on TikTok Shop.	
	SI4	TikTok Shop gives me new information while shopping.	
	SI5	TikTok Shop gives me new information in accordance with the item I want to buy unexpectedly.	
Trust	TR1	There are no risks involved while shopping on TikTok Shop.	[5,6]
	TR2	Shopping on TikTok Shop can be trusted.	
	TR3	I believe merchants on TikTok Shop can fulfill people's needs.	
	TR4	I believe merchants on TikTok Shop sell products honestly.	
	TR5	I believe product information on TikTok Shop matches the real conditions.	
Hedonic Motivation	HM1	Shopping helps me reduce stress and feel comfortable.	[3]
	HM2	I am more motivated to shop if the product has a discount or promotion.	
	HM3	I am more motivated to shop when I buy products for others.	
Shopping Lifestyle	SL1	The product has similarities with famous brand products, making me buy more quickly.	[7]
	SL2	New products launched, making me buy more quickly.	
	SL3	Products with famous brands make it easier for me to buy.	
	SL4	Products with differences in design and shape help me buy faster.	
Product Presentation	PP1	The product information on TikTok Shop is adequately described.	[8]
	PP2	The product illustrations on TikTok Shop have high quality.	
	PP3	The product illustrations on TikTok are portrayed from many different angles.	
	PP4	The product-related information on TikTok Shop is extensive and diverse.	
Online Impulse Buying	OIB1	I did not plan this purchase before visiting the TikTok Shop.	[4]
	OIB2	I have no intention of making this purchase before visiting the TikTok Shop.	
	OIB3	My purchase is spontaneous.	

was adapted from Akram et al. [4]; trust (five items) from Liyanapathirana [5] and Daniel et al. [6]; hedonic motivation (three items) was measured using items adapted from Dawson and Kim [3]. Shopping lifestyle (four items) was adapted from Liantifa and Siswadi [7], while product presentation (four items) was adapted from Mesiranta [8].

The survey was conducted from January to March 2024 with 361 responses collected and carefully reviewed for completeness and accuracy. The research targeted students from various universities and colleges. A convenience sampling method was employed, including leveraging social media to reach the respondents.

The data were analyzed using a series of statistical techniques to validate the constructs and test the hypotheses. The software tools used for the analysis were SPSS 20.0 and AMOS 24.0. This study also adhered to ethical guidelines for research involving human subjects. Informed consent

Table 4
Confirmation factor analysis results.

Constructs and Items	Estimate
Trust (Cronbach's Alpha = 0.862)	
TR5	0.805
TR1	0.772
TR4	0.787
TR2	0.687
TR3	0.689
Serendipity Information (Cronbach's Alpha = 0.851)	
SI4	0.770
SI5	0.721
SI1	0.730
SI2	0.696
SI3	0.743
Shopping Lifestyle (Cronbach's Alpha = 0.855)	
SL4	0.755
SL3	0.753
SL1	0.803
SL2	0.778
Scarcity (Cronbach's Alpha = 0.858)	
SC2	0.818
SC1	0.769
SC3	0.767
SC4	0.750
Product Presentation (Cronbach's Alpha = 0.824)	
PP2	0.759
PP1	0.758
PP3	0.716
PP4	0.704
Hedonic Motivation (Cronbach's Alpha = 0.786)	
HM1	0.716
HM2	0.778
HM3	0.737
Online Impulse Buying (Cronbach's Alpha = 0.776)	
OIB2	0.684
OIB3	0.749
OIB1	0.767

Table 5
Discriminant validity.

	CR	AVE	MSV	MaxR(H)	TR	SI	SC	SL	PP	OIB	HM
TR	0.865	0.562	0.275	0.871	0.749						
SI	0.852	0.536	0.142	0.854	0.285	0.732					
SC	0.859	0.603	0.180	0.861	0.119	0.094	0.776				
SL	0.855	0.597	0.259	0.857	0.158	0.017	0.268	0.772			
PP	0.824	0.540	0.117	0.826	0.177	0.341	0.059	0.052	0.735		
OIB	0.778	0.539	0.275	0.782	0.524	0.377	0.424	0.509	0.244	0.734	
HM	0.788	0.553	0.250	0.790	0.320	0.280	0.115	0.059	-0.076	0.500	0.744

was obtained from all participants, and their responses were anonymized to ensure confidentiality.

Limitations

Although the sample of 361 Vietnamese students from various universities and colleges provides valuable insights into the impulse buying behavior on TikTok Shop, there may be limited generalizability of this data to the larger community. The convenience sampling method for

survey distribution may have resulted in a sample that is not entirely representative of the overall student population.

The dataset's size, while adequate for the analyses conducted, may still be limited in capturing the full spectrum of impulse buying behaviors among students. Furthermore, the cross-sectional design of the study restricts the ability to infer causality or observe changes in behavior over time. Despite meticulous translation processes, subtle nuances might have been lost or misinterpreted, potentially impacting the accuracy of responses.

To mitigate these limitations, future studies should consider broadening the sample to include a wider range of participants, such as individuals from various age groups, socioeconomic backgrounds, and universities across Vietnam. Additionally, longitudinal studies could provide deeper insights into the evolution of impulse buying behavior. Comparative analyses with datasets from other contexts would also enhance the robustness and applicability of the findings, contributing to a more comprehensive understanding of the factors influencing impulse buying on e-commerce platforms.

Ethics Statement

The authors have read and followed the ethical requirements for publication in *Data in Brief* and confirm that the current work does not involve human subjects, animal experiments, or any data collected from social media platforms.

The authors confirm that informed consent was duly obtained from all respondents. We explicitly informed participants that the purpose of the survey is solely for scientific research and non-profit objectives, and that their information will be kept strictly confidential. Institutional Review Board (IRB) approval was not required for this study.

CRedit Author Statement

Dinh Huan Phan: Conceptualization, Data curation, Original draft preparation, Supervision; **Quang Duy Nguyen:** Conceptualization, Data curation, Writing – review & editing; **Vinh Khang Nguyen Phuc:** Methodology, Validation, Investigation, Software.

Data Availability

[Exploring factors influencing the impulse buying behavior of Vietnamese students on TikTok Shop \(Original data\)](#) (Mendeley Data).

Acknowledgments

I sincerely thank all the students who participated in this survey. In addition, I would be grateful for helpful suggestions from the Editors and anonymous reviewers.

Declaration of Competing Interest

The authors declare that they have no known competing financial interests or personal relationships that could have appeared to influence the work reported in this paper.

Supplementary Materials

Supplementary material associated with this article can be found, in the online version, at doi:[10.1016/j.dib.2024.111047](https://doi.org/10.1016/j.dib.2024.111047).

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